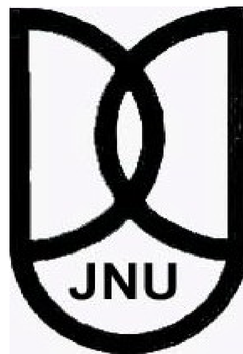
PUBLIC PRIVATE PARTNERSHIPS IN HEALTH SERVICES IN INDIA: A STUDY OF THE NATIONAL RURAL HEALTH MISSION IN MAHARASHTRA

Thesis submitted to Jawaharlal Nehru University
for the award of the Degree of

DOCTOR OF PHILOSOPHY

SAMAN AFROZ



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The theses entitled **"Public-Private Partnershipsin Health Services in India: A Study of the National Rural Health Mission in Maharashtra"** is submitted for the award of the degree of Doctor of Philosophy of Jawaharlal Nehru University. This thesis has not been submitted previously for any other Degree of this or any other University and is my original work.

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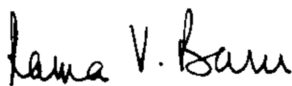

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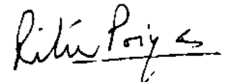

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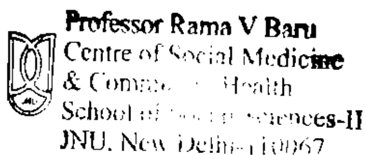

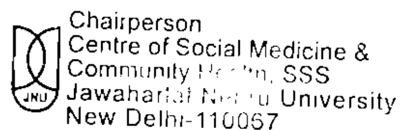

TO,

ASHAR, SHOAIB, ABBU& AMMI

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SAMAN AFROZ

LIST OF ABBREVIATIONS

ADHO	:	Additional District Health Officer
ANM	:	Auxiliary Nurse Midwife
ASHA	:	Accredited Social Health Activist
AYUSH	:	Ayurveda Yoga Unani Siddha Homeopathy
AVLT	:	Automatic Vehicle Location System
AWW	:	Anganwadi Worker
ANC	:	Ante-natal Care
AGCA	:	Advisory Group of Community Action
ARC	:	Apex Resource Centre
BLS	:	Base Line Survey
BMC	:	Bombay Municipal Corporation
BPL	:	Below Poverty Line
BPC	:	Best Practice Centre
BUMS	:	Bachelor in Unani Medicine
CAPART	:	Council for Advancement of Peoples Action and Rural Technology
CBM	:	Community Based Monitoring
CHC	:	Community Health Centre
CHV	:	Community Health Volunteer
CHI	:	Community Health Initiative
DH	:	District Hospital
DHO	:	District Health Officer
DHS	:	District Health Society
DMER	:	Directorate of Medical Education and Research
DPM	:	District Program Manager
DRCHO	:	District RCH Officer
ECG	:	Echo Cardiogram
EMRI	:	Emergency Medical Relief Institution
EMS	:	Emergency Medical Service

EmOC	:	Emergency Obstetric Care
EPI	:	Expanded Program on Immunization
FGD	:	Focused Group Discussion
FNGO	:	Field NGO
FOGSI	:	Federation of Obstetric and Gynaecological Society
FRU	:	First Referral Unit
FRCH	:	Foundation for Research in Community Health
GDP	:	Gross Domestic Product
GIS	:	Geographic Information System
GOI	:	Government of India
GNM	:	General Nurse Midwife
GPS	:	Geographical Processing System
GR	:	Government Resolution
HACC	:	Health Advisory Call Centre
HLL	:	Hindustan Latex Limited
HLLFPT	:	Hindustan Latex Family Planning Promotion Trust
ICPD	:	International Conference of Population Development
ICMR	:	Indian Council of Medical Research
IEC	:	Information Education and Communication
IMA	:	Indian Medical Association
IMF	:	International Monetary Fund
IMR	:	Infant Mortality Rate
IPHS	:	Indian Public Health Standard
ISRO	:	Indian Space Research Organization
IUD	:	Intra Uterine Device
JAC	:	Joint Action Committee
JSY	:	JananiSurakshaYojana
KEMP	:	Kerala Emergency Medical Relief Service Project
KIDROP	:	Karuna Internet Assisted Diagnosis for Retinoplasty
KITTH	:	Karnataka Integrated Tele-medicine and Tele-health Project
LLE	:	Life Line Express

MCGM	:	Municipal Corporation of Greater Mumbai
MCH	:	Maternal and Child Health
MCS	:	Mobile Communication System
MD	:	Mission Director
MEMS	:	Maharashtra Emergency Medical Services
MLDT	:	ML Dhawale Trust
MMU	:	Mobile Medical Unit
MMR	:	Maternal Mortality Rate
MNGO	:	Mother NGO Scheme
MNREGA	:	Mahatma Gandhi National Rural Employment Guarantee Act
MO	:	Medical Officer
MOU	:	Memorandum of Understanding
MPW	:	Multipurpose Worker
NHSRC	:	National Health Systems Resource Centre
NPM	:	New Public Management
NPP	:	National Population Policy
NMCP	:	National Malaria Control Program
NLEP	:	National Leprosy Eradication Program
NRHM	:	National Rural Health Mission
NREGA	:	National Rural Employment Guarantee Act
NGO	:	Non-Governmental Organization
NHP	:	National Health Program
OBC	:	Other Backward Caste
OPEC	:	Organization of Petroleum Exporting Companies
OPD	:	Outpatient Department
PCPNDT	:	Pre-Conception and Pre-Natal Diagnostic Technique
PHC	:	Primary Health Center
PIP	:	Program Implementation Plan
PNC	:	Post-Natal Care
PPP	:	Public-Private Partnership
PSP	:	Private Service Provider

PSI	:	Population Service International
RCH	:	Reproductive and Child Health
RH	:	Rural Hospital
RKS	:	RogiKalyanSamiti
RNTCP	:	Revised National Tuberculosis Program
ROP	:	Retinopathy of Prematurity
RRC	:	Regional Resource Center
RTI	:	Reproductive Tract Infection
SAP	:	Structural Adjustment Program
SC	:	Sub Center
SC	:	Scheduled Caste
ST	:	Scheduled Tribe
SCDCP	:	Sickle Cell Disease Control Program
SCSI	:	Sickle Cell Society of India
SDH	:	Sub District Hospital
SHS	:	State Health Society
SIFPSA	:	State Innovations in Family Planning Services Project Agency
SNGO	:	Service NGO Scheme
SOPS	:	Standard Operation Procedures
TAC	:	Technical Advisory Committee
TFR	:	Total Fertility Rate
TMO	:	Taluka Medical Officer
TOR	:	Terms of Reference
UN	:	United Nations
UNDP	:	United Nations Development Project
UNICEF	:	United Nations Children's Fund
UNFPA	:	United Nations Fund for Population Activities
VRHP	:	Vadu Rural Health Project
WHO	:	World Health Organization

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INTRODUCTION

Introduction

In the Neoliberal paradigm where the state has withdrawn from its responsibilities, thereby enlarging the role of the market in terms of health service provisioning, access to health care is greatly denied to the poor and the marginalized sections of society. It is ironic that this kind of scenario exists in a country like India, which at the time of independence, had declared itself a welfare state committed to providing health, education and housing as social security measures to its citizens.

Post-independence, various committees and policies dedicated to health service planning committed themselves to the task of providing free/ affordable health services to the entire population. However, due to resource crunch, the Structural Adjustment Policy and subsequent entry of markets, these policy goals still remain a distant dream. Today, the rich have access to state of the art health services, but the poor cannot afford even basic health care. In other words, health care has become a commodity, the purchase of which is determined by one's ability to pay. This has affected the poor and the middle class more adversely, as they don't even have insurance coverage.

In this context, it is interesting to understand the entry of markets in the health sector, which happened in the 1990s through privatization of government institutions, entry of international pharmaceutical industries, drug patenting and subsequent rise in the cost of drugs, along with the introduction of user fees in Public Health Institutions and Public-Private Partnerships. Each of these fall under the aegis of Health Sector reform package which included an enhanced role of private sector in providing care, cutback on tertiary medical care in the public sector, introduction of cost recovery mechanism in the public sector and implementation of an "essential clinical package for primary level care" (World Bank 1993). Health sector reforms have been widely criticized for making health care costly and out of reach for the poor.

This thesis is an attempt to study an important institutional arrangement suggested under the Health Sector reform package, which is Public-Private Partnership. It seeks to examine the plurality and design of PPPs under NRHM, across major states in India, across districts of Maharashtra, with a special focus on Thane district. While all existing PPP projects in the state of Maharashtra have been mapped out, special focus has been given to understanding three successful models (as mentioned by government officials) of PPPs in Thane district. Case Study method has been employed to understand these projects. Maharashtra has been chosen for the study due to paucity of literature on PPP projects within the state. Also, it is one of the oldest states in terms of health sector reforms with a heavy presence of private sector across all levels of care. Thane district has been chosen because of its proximity to Mumbai and high levels of poverty and deprivation, mainly due to the high presence of tribal population.

The rationale for PPPs came up in the backdrop of the inadequacies of the state to deliver good quality health care, affordable to all sections of society. The policy of blanket privatization further deteriorated the scenario. Thus arose the need of a new institutional arrangement of health care provisioning, which could encompass the better of the two sectors (public and private) in providing efficient, affordable and good quality health care to all. Hence, during the 1990s, PPPs were widely promoted by the World Bank and other bilateral agencies and became an important constituent of health policy in India and the rest of the world. In fact, PPPs formed an integral tool of the New Public Management which aimed at increasing the efficiency of public provisioning of services across all sectors.

Various studies have been done to understand the structure, functioning and implementation of PPP projects across states. However, there is a paucity of research that focuses on the evolution of these programs, nuances like partnership formulation, roles of the two partners, relationship between the two, financial aspects and its implications for quality, replicability and sustainability. Besides, there are hardly any studies on the PPP component of NRHM.

The study on 'Public-Private Partnership under the National Rural Health Mission-Study of Thane district, Maharashtra,' is an attempt to fill the above mentioned gaps, as it tries to look at the PPP projects under NRHM across states. Focusing on the state of Maharashtra, it looks at the PPP projects in Thane district. Case studies have been done on the three most successful PPP projects in the district, which tries to understand the structure and design of the chosen projects while also looking at nuances like the evolution of these projects, relationship between the two partners, financial details, mechanisms used for monitoring and the problems experienced in implementation of these projects. Information on the above aspects have been collected through detailed discussions with the providers and beneficiaries of the program. These components have been further used to analyze the implications on equity, replicability and sustainability. Finally, the study attempts to give recommendations for further improving these projects on the basis of feedback received from the providers and beneficiaries of the concerned projects as well as the researchers own observations. Besides, by interacting with the villagers, the study further intends to understand the level to which the program has been able to penetrate into the interior regions, which is also the main objective behind the design of any PPP project.

This theses tries to capture the result of the above mentioned study which has been presented in eight chapters:

The **first chapter** on **Public-Private Partnerships in Health Care - An Overview**, attempts to review relevant literature on evolution, typology and characteristics of PPPs in Health and NRHM in particular. This introduces the problem and helps to understand it better. Besides, it presents some relevant international and national studies done on PPPs in Health and NRHM in particular which helps in building the rationale for this particular study.

The **second chapter** on **Methodology** of the study, conceptualizes the problem; it also talks about the aims, objectives, area of study and the methods used in data collection and data analysis. It also covers the limitations and problems faced during the study.

The **third chapter** on **PPPs under NRHM: An Inter State Analysis** presents an interstate analysis of the nature and types of PPPs present across the country under NRHM. This helps in understanding the plurality of projects that exists within the country across states.

The **fourth chapter** on **Public-Private Partnerships under the NRHM in Maharashtra state and Thane district** gives a brief overview of the socio-demographic and health indicators of the state of Maharashtra. It also talks about the presence of private sector at various levels of health care within the state, the emergence of health sector reforms and finally the growth of Public-Private Partnerships within the state. This chapter analyses the presence of different kinds of PPP projects within the state, across its various districts, by listing similarities and differences between these projects and finally, examines the PPP projects specifically within Thane district.

The **fifth chapter** on **Case Studies of Selected PPPs in Thane district of Maharashtra: The Sickle Cell Disease Control Program** presents the case study of the Sickle Cell Disease Control Program, a PPP project run in partnership with the District Health Society and NGOs of each of the 18 tribal districts of the state. The chapter gives a detailed description of this PPP program in terms of the partnership formulation, role of the two partners, activities, implementation, funding, and measures used to maintain quality, equity, replicability and sustainability. It also captures the experiences of the providers as well as the beneficiaries of the program vis-à-vis its implementation and finally gives suggestions to further improve the program by analyzing the problems experienced in its implementation.

The **sixth chapter** on **The Mobile Medical Unit** presents the case study of the Mobile Medical Unit project. By presenting the views of the providers and beneficiaries of the program, the chapter brings forth the intricate nuances of this PPP project. This includes its structure, design, evolution, services provided, financial details as well as issues of quality, equity and replicability. The views of the beneficiaries and measures to further improve the program have also been presented in details.

The **seventh chapter** on **The Service NGO Scheme** gives an overview of the Service NGO scheme which is being run in a PPP mode not only in Thane district but in various districts across the country. In Thane district, the scheme is being implemented by the ML Dhawale trust in the Vikramgad block of the district. The recently started scheme, known for providing RCH services, is a great success in the block as the ML Dhawale trust has been working in the area of RCH for several years. This chapter is an attempt to present details of the Service NGO scheme in Thane district. Aspects such as the evolution, activities, implementation, funding, cost effectiveness as well as measures for maintaining quality, equity, replicability and sustainability of the scheme have been looked into. The chapter also attempts to examine the outcome of this scheme by looking into the core issues on which the program works. These include the place of delivery, antenatal care, immunization and family planning. Suggestions to further improve the scheme have also been given in this chapter.

Finally, the **eighth chapter** on **Discussion andConclusion** sums up the major findings of the study and uses these findings to analyze the three chosen PPP projects as well as other PPP projects in the country and within the state of Maharashtra mentioned in this study. This analysis is then linked with the larger discourses on Public-Private Partnerships, mainly to check their relevance in Maharashtra, particularly in Thane district. This chapter also puts forth suggestions for further research in the area. Overall, the chapter is an attempt to analyze the effectiveness of PPP as a tool in achieving the NRHM goals of providing quality health care which is affordable and accessible to the majority, especially those residing in the un-served and underserved areas.

CHAPTER I

Public-Private Partnerships In Health Care: An Overview

Introduction

The inability of the state to deliver welfare services to its citizens, in terms of public utilities (such as roads, power and water supply) and merit goods (such as education and health) due to lack of resources and management issues, led to a new wave of thinking which believed in enhancing the role of markets in provisioning of public services. This thinking was propagated by the neo liberal ideology of the 1970s, which emphasized upon free thought, and hence free markets and free trade. This served as a precursor to a series of changes introduced in the provisioning of public services, mainly to increase its efficiency, under the 'New Public Management' (NPM). As mentioned by Larbi, G. (1999),

"Key elements of NPM includes various forms of decentralizing management within public services (e.g., the creation of autonomous agencies and devolution of budgets and financial control), increasing use of markets and competition in the provision of public services (e.g., contracting out and other market-type mechanisms), and increasing emphasis on performance, outputs and customer orientation" (p.iv).

Hence one can see that Public-Private Partnerships (PPP), which mostly gained popularity in the 1990s,are a tool of NPM which was largely introduced as a cost cutting device for developing countries facing economic and fiscal crisis in the 1980s. Hence,PPPs arose as a result of the crisis in public provisioning of services.

Similarly, in the Health Sector,PPPs arose mainly to resolve the crisis in the public provisioning of health services in developing countries. Thus,the last two decades have seen a phenomenal growth of Public-Private Partnerships in health, especially in developing countries. These partnerships aim to collate the best practices of the two sectors (public andprivate) in order to make quality health care affordable and accessible to all. In other words,PPPs in health aim at increasing the efficiency and equity of the health sector.

In the Indian context, cooperation and collaboration between the private sector and government in health programmes has been promoted in the planning process from the 1st Five Year Plan. Earlier collaborations were mostly with the 'non-profit' sector, which moved towards the 'for-profit' sector post 1990s. In the earlier PPPs, the role of the non-state partner was peripheral to that of the state whereas in the latter, both partners were equal and there was a formal Memorandum of Understanding between the two (Baru & Nundy, 2006).

The various National Health Policies, from the 1982 policy to the latest National Rural Health Mission, 2006 have advocated for Public-Private Partnerships. NRHM, which aims at providing accessible, affordable and quality health care to the rural population with special focus on 18 states, adopts Public-Private Partnerships as an integral strategy for delivering the same. Several existing PPPs in the health

sector have been merged with NRHM and newer ones are being initiated. Partnerships mostly exist with the non-governmental sector for providing Information, Education and Communication (IEC) and also for direct service provisioning. PPPs also exist in a range of National Health Programmessuch as TB, Malaria, Leprosy, Reproductive & Child Health (RCH), etc. Among all these programmes, it is the Reproductive and Child Health programme which has the maximum number of collaborations, historically as well as in the present context.[1] This thesis is an attempt to evaluate the effectiveness of PPPs as an instrument for achieving the NRHM goals. This has been done by mapping PPPs under NRHM at three levels: first across states, second within the state of Maharashtra across districts and third within a specific district of the state, i.e. Thane district. Thane district is known for its poverty and deprivation, largely because of the presence of a huge tribal population. The three most successful PPPs in the district, as per NRHM officials, have been studied in detail through case studies, mainly to understand the structure, design, implementation and evolution of these programmes, both from the perspective of providers as well as beneficiaries of the programme.

The present chapter is an attempt to review the existing literature in the area, mainly to understand the concept, evolution and models of implementation of Public-Private Partnership programmes in the nation, pre and post NRHM. The chapter has been divided into four sections. While the **first** looks at the concept and evolution of Public-Private Partnership in general, the **second** looks at PPPs in health, its definition and the context in which it started, as well as the models of implementation. The **third** section describes the Health PPPs in India: their evolution in various plan periods through different health policies and the PPPs in Disease Control Programme. Finally, the **fourth** section of the chapter talks about PPPs under NRHM. It also cites examples of PPP projects under NRHM across different states of the country.

1.1. PUBLIC-PRIVATE PARTNERSHIPS- Concept & Evolution

The report of PPP Sub group on Social Sector, GOI during the early part of 2000, stated that:

"*Public-Private-Partnership or PPP is a mode of implementing government programmes/schemes in partnership with the private sector. The term private in PPP encompasses all non-government agencies such as the corporate sector, voluntary organizations, self-help groups, partnership firms, individuals and community based organizations. Here the services are delivered by the private sector while the responsibility for delivering them rests with the government. This arrangement requires the governmentto*

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[1] For details refer to Baru, R. and Nundy, M., 2009, Health PPPs in India: Stepping Stones for Improving Women's Reproductive Health Care? In Martina Timmerman and Monica Kruesmann (eds), Partnerships for Women's Health Striving for Best Practice Within the UN Global Compact, United Nations University Press, Tokyo, New York, Paris

either enter into a 'contract'with the private partner or pay for the services (reimburse) rendered by the private sector" (GOI, 2004, p.4).

In other words, Public-PrivatePartnership (PPP) provides an opportunity for private sector participation in financing, designing, construction, operation and maintenance of public sector programmes and projects. The task force on Public-Private Partnership for the 11th Plan has given one of the widely used definitions of PPP, which is as follows,

"*For definitional purpose,'Public' would define Government or organizations functioning under State budgets, 'Private' would be the Profit/Non-Profit/ Voluntary sector and 'Partnership' would mean a collaborative effort and reciprocal relationship between the two parties with clear terms and conditions to achieve mutually understood and agreed upon objectives following certain mechanisms*"(GOI, 2006, p. 3).

The context in which these PPPs emerged has rightly been explained by Nishtar (2004), according to whom, "*PPPs arose in the context of the inability of the State to deliver the various welfare services to its citizens in terms of public utilities (like road, power and water supply) and merit goods (like education and health) due to the lack of resources and management issues.The inability of the public sector to deliver the public goods entirely on its own in an efficient, effective and equitable manner necessitated the development of different interface arrangements, which involved the interfacing of organizations that had the mandate to offer public good on one hand, and those that could facilitate this goal*"(p.1).

Hence, Public-Private Partnerships emerged as a new instrument to meet the developmental challenges which could not have been addressed by the State alone, mainly due to resource crisis. As mentioned earlier, PPP was a result of neo liberal ideas which led to NPM, of which PPP was a vital tool.

History of PPPs

The earliest form of PPP was found with regard to the implementation of '*the war on poverty'* programmes of the federal government in the United States of America during the 1960s, in which the poor assumed the responsibility for planning and implementing the war on poverty at the local level. Financial resources were allocated to low income neighbourhoods by the CommunityAction Agency(CAA), and citizens were expected to elect individuals as members from their neighbourhoods on the CAA Board of Directors. This served as the beginning point for contracting/public-private partnership for most social services funded by the federal government, which led to the proliferation of government sponsored non-profit service agencies (GOI, 2004).

In the Indian Context, PPPs have formed an integral component of the Planning process and has been encouraged from the first five year plan. As mentioned by the PPP Sub group on Social Sector, GOI (2004),

"The earliest form of PPP can be seen during the First Plan period when the government sought 'community support' for the construction ofirrigation canals. Subsequently, during the Seventh Plan, the Ministry of Rural Development set up CAPART for implementing rural development programmes through non-profitagencies. Even the ninth Five Year Plan explicitly recognized the role of NGO's/Voluntary Organizations for social development" (p. 2).

1.2. PUBLIC-PRIVATE PARTNERSHIP IN HEALTH

Definition of PPP

The task force on PPP for the 11th Plan, made a specific reference to the definition of PPP in the health sector. They stated that:

"*Public-Private Partnership or PPP in the context of health sector is an instrument for improving the health of the population.PPP is to be seen in the context of viewing the whole of medical sector as a national asset with health promotion as goal of all the health providers, private or public. The Private and Non-profit sectors are also very much accountable to the overall health systems and services of the country. Therefore, synergies where all the stakeholders feel that they are a part of the system and do everything possible to strengthen national policies and programmes needs to be emphasized with a proactive role from the Government*" (GOI, 2006, p.3).

The definition of Public-Private Partnership in the health arena that is proposed by Buse & Walt (2000a) is most appropriate. They define global PPPs as:

"A collaborative relationship which transcends national boundaries and brings together at least three parties, among them a corporation (and/or industry association) and an intergovernmental organization, so as to achieve a shared health-creating goal on the basis of a mutually agreed division of labour (p. 550).

Hence, through these definitions, one sees a clear demarcation of roles between the public and the private sector in terms of provisioning of health services.

Very often,PPPs are confused with privatization of health sector. Scholars have pointed out that there is a significant difference between the two. While in the case of privatization, the responsibility for delivery and funding a particular service as well as its ownership lies only with the private partner, in a PPP the government is responsible for these. Similarly, in privatization the nature and scope of services is

determined solely by the private sector, but in a PPP it is contractually determined between the two parties (GOI, 2004).

Contextual Background

Worldwide,PPPs in health is a phenomenon of the 1990s and arose as a result of the crisis in health service financing. Globally, demands for health services were multiplying as a result of population growth and appearance of new problems such as HIV/AIDS and many other associated conditions. However, the capacity of developing countries to meet these demands was shrinking due to on-going economic crisis. The genesis of this economic crisis can be attributed to the rise in the price of oil declared by OPEC in 1973 and 1979, to import which these countries had to take loans from foreign investments at high rates of interest. The situation worsened with the world economic recession, which reduced the demand for import from these countries (Andrews & Mohan, 2002).It is at this point that the international financial institutions, World Bank and IMF stepped in to help these nations come out of the debt trap by offering loans on the condition that they accept the Structural Adjustment Programme (SAP), a set of policies for restructuring their economy. As mentioned earlier, SAP was a part of the NPM strategies for increasing the efficiency of public services. Under SAP, developing countries were suggested cutting their spending on welfare sectors like health and education. This led to a dramatic decline in public health spending which severely affected the health sector. Health care institutions lacked drugs and equipment and health workers were underpaid due to which they were poorly motivated to provide services.

To resolve the on-going crisis of the health sector and to generate alternative sources of financing, a series of reforms were suggested by the World Bank and IMF. An immediate solution, which formed a part of the reform package, was privatization of health services. Private health providers, big and small, started booming in multiple proportions across the globe. However, this policy of blanket privatization was soon found to have negative consequences for health outcome, access and utilization of health services across developed and developing countries. The private sector was offering services which were extremely costly and out of reach for the poor. Moreover, they also remained unregulated in terms of standards and quality. Hence, as a response to this, the roles of markets and states were redefined in policy discourses. While the state was expected to provide preventive services, markets were expected to provide curative services. This role division has been clearly articulated in the World Bank report of 1993, '*Investing in Health*' (World Bank, 1993). Another solution to the problem, as felt by the policy makers, was to regulate the private sector by involving them in partnership programmes with the government sector (GOI, 2006).

Thus, limited public investments, weak public services and later the experience of market failures in health provided the context in which PPPs emerged in the National Health Programmes (NHPs) and health sector reforms in most developing countries. Multilateral agencies such as the World Bank and

other bilateral agencies played a very vital role in promoting PPPs in health across the developing world. According to Baru & Nundy (2006),

"*The World Bank played a significant role in influencing the design of PPPs in health programmes during the early 1990's, which enhanced the role of the private sector and gave it legitimacy in the National Health Programmes. These ideas were also incorporated in the national plan documents of these countries. As a result, there was an expanded role of these partnerships with a plurality of designs across states, institutions and levels of care*" (p. 12).

Models of PPP

A review of Public-Private Partnerships across regions indicates the presence of different mechanisms of partnerships. These mechanisms are also referred to as models of PPP. Annigeri et al. (2004) have listed down four basic mechanisms of PPP, which are as follows:

1. Social Marketing

2. Social Franchising

3. Contracting In

4. Contracting Out

These models are most frequently used in the design of PPPs and are also known as generic models of PPP.

The Task Force on Public-Private Partnership has outlined fivebasic mechanisms or models of partnership, which are as follows (GOI, 2006):

1. Contracting in: Government hires individual on a temporary basis to provide services.
2. Contracting Out: Government pays outside individual to manage a specific function.
3. Subsidies: Government provides funds to private groups to provide specific services.
4. Leasing or rentals: Government offers the use of its facilities to a private organization.
5. Privatization: Government gives or sells a public health facility to a private group.

The same Task Force has also listed down a host of models based on the generic models of Contracting In and Out, Social Franchising and Social Marketing to suit the local needs. These are mentioned in Box 1.1. (GOI, 2006).

Box 1.1: Various Models of PPP

- Contracting:
  - Contracting Out
  - Contracting-In
- Franchising:
  - Partial Franchising
  - Full Franchising
  - Branded Clinics
- Social Marketing
- Joint Ventures
- Voucher Schemes
- Hospital Autonomy
- Partnership with corporate sector/ industrial houses
- Involving professional associations
- Build, operate and transfer
- Donation & Philanthropic contributions
- Involvement of social groups
- Partnership with co-operative societies
- Partnership for capacity building
- Partnership with non-profit community based organizations.
- Running mobile health units.
- Community based health insurance.

Source: Government of India. (2006), p.17

However, for the purpose of this study, the four generic models are discussed in detail, as they are the ones used most frequently in the design of PPPs delivering services under the NRHM.

1. Social Marketing: Social Marketing as defined by Annigeri, is the application of Commercial Marketing techniques to achieve a social objective. The model has been applied to expand the use of, and access to contraceptives for nearly 30 years now (Annigeri et al., 2004). According to Annigeri et al. (2004),

"*There are two broad models for social marketing of contraceptives: the distribution model and the manufacturer's model. The distribution model focuses on maximizing access and usually relies on donated or subsidized products. The manufacturer's model usually includes an agreement with the contraceptive manufacturer to provide products at a reduced price in return for demand creation that is*

achieved through information, education and communication (IEC) or behaviour change communication programme. RCH products that have been socially marketed include male and female condoms, oral contraceptives, intrauterine devices (IUD's), injectable contraceptives, emergency contraception, oral rehydration salts (ORS), micronutrients, mosquito nets, and safe delivery kits" (p.3).

2. Social Franchising: Franchising is an established business model designed to allow growth and replication while retaining certain controls and quality standards (Annigeri et al., 2004). In Franchising, service delivery points or franchisees contribute resources of their own in exchange for the right to offer a defined set of health services and products of a franchiser for a perceived market advantage or to pursue a common social mission (McBride & Ahmed, 2004). Thus, in a franchising programme the franchisees offer the health services and products of the franchiser and in return get brand name and advertising from them, as a result of which their client volume increases, manifold. Besides, in order to maintain their brand image and quality, the franchiser provides training to the franchisees which enhances their technical skills. In lieu of all these advantages, they charge a fee from the franchisee and a commitment to adhere to certain quality standards. Sulzbach et al. (2002) has criticized the franchisee mechanism by mentioning that,

"The costs of participation, in the form of franchise fees, compliance with franchise standards and outlays for service delivery, remain lower than franchise-derived benefits of increased client volume and fee income, improved technical skills, and free advertising"(p.5).

Hence, at times the franchise may not be cost effective for the franchisee. Besides social commitments, franchisees enter into a franchising programme with a variety of objectives such as training opportunities, increased clientele, potential revenue, and opportunity to open, sustain or expand a practice, etc. Thus, joining a franchise can give providers access to new expertise and capital while allowing them to replicate a successful model of service provision quickly.

Two primary models have evolved in social franchising: Stand alone or Full franchises, and Fractional or Partial Franchises. In a standalone social franchise, the franchiser controls all goods and services. An example would be Apollo Family Health Clinics. Apollo provides the blue prints for facilities, equipment, protocol for services, screening all staff, sets prices, and handles quality assurance and related issues. In fractional franchise, the franchiser only controls one or a few of the goods and services. The *Vanitha* Clinics, which are limited to IUDs, condoms and Oral contraceptives, illustrate this type of franchise (McBride & Ahmed, 2004).

3. Contracting: As defined by Annigeri et al. (2004),

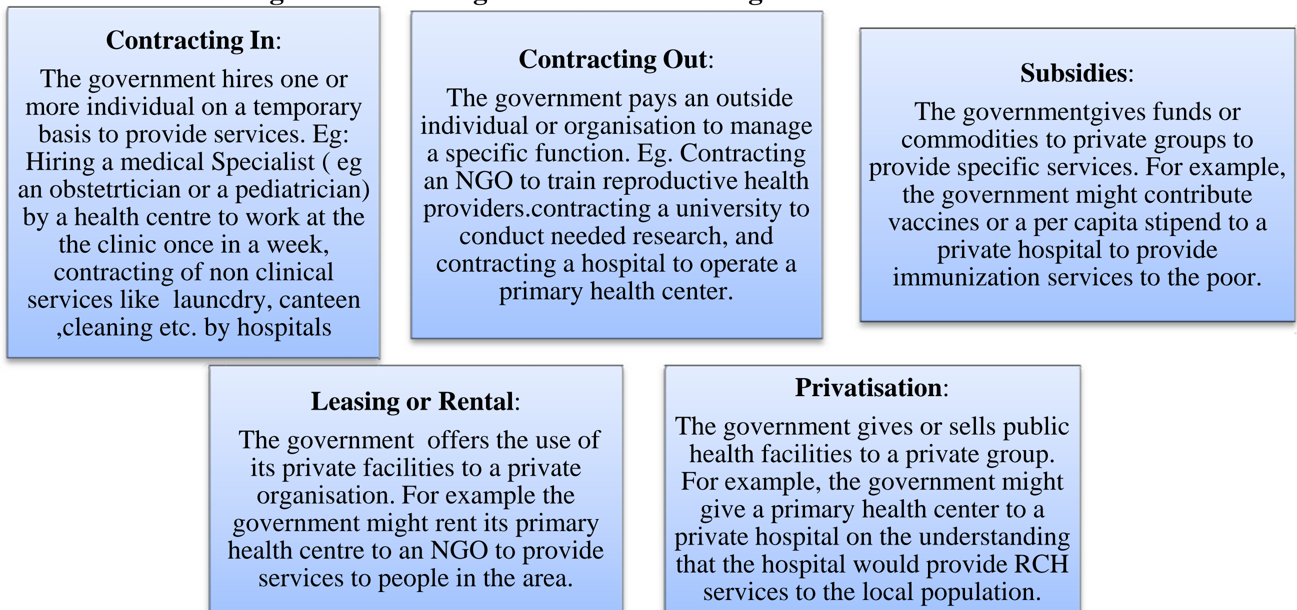
"A contract is a legally binding legal agreement between two or more parties that specifies something provided (such as products and services) and something received in return (usually payment for the product or services). In most RCH cases, the government contracts with an individual or organization to provide certain products (such as contraceptives, posters, Test kits) or services (for example training, HIV testing-rays) in return for money." (p.5).

There are five mechanisms for contracting, namely:

- contracting in
- contracting out
- subsidies
- leasing or rentals
- privatization

Details of these mechanisms have been described in Figure 1.1.

Fig. 1.1: Describing different Contracting Mechanisms



Source: Rosen, 2000, p.4

Examples of PPP from India discussed in the section below would further help in elucidating the above mentioned models of PPP. One also observes from these examples that out of the above mentioned models of PPP, contracting is the most common model used for forging PPPs on account of its simple design. The process of selection of the private service provider in the contract is usually done through the following three processes:

1. **Competitive Bidding:** The government invites bids from competing contractors, suppliers or vendors by openly advertising the scope, specifications and terms and conditions of the proposed contract as well as the criteria by which the bids will be evaluated. The process aims at obtaining goods and services at the lowest prices by stimulating competition, and by preventing favouritism. Competitive bidding is of two types:

a. Open competitive bidding, wherein the sealed bids are opened in full view of all those who may wish to witness the bid opening.
b. Close competitive bidding, wherein the sealed bids are opened only in the presence of authorized personnel (SIHFW, 2008).

2. **Competitive Negotiation**: This is a variant of competitive bidding wherein the government specifies the service objectives and invites proposals through advertisements. The government then negotiates and finalizes the contract with the selected bidders. This kind of private partner selection is usually seen in the case of social sector projects involving VOs, NGOs, local communities or projects involving proprietary technology or a franchise, linkage project related to a mega project or a major activity. Negotiations may be 'simple' (direct) or 'complex' (indirect). In the second case, the government negotiates through a *'master contractor'/mother NGO*. In other words, *contracts for (public) services are contracted out* and the master contractor handles all dealings with sub-contractors/franchisees (GOI, 2004).

3. **Swiss Challenge Approach:** In this approach, the proposals are directly submitted by the private participant to the government and after that the private sector provides all details regarding its technical, financial and managerial capabilities as well as its expectations of government support/concessions. Government then examines the proposal and if it belongs to the declared policy of priorities, then it may invite competing counter proposals from others with adequate notice. If a better proposal is received, the original proponent is given the opportunity to modify the original proposal. Finally, the better of the two is awarded the project/programme for execution (SIHFW, 2008).

Scholars working in the area of PPP have heavily criticized the process of competitive bidding, as many times, in order to get contracts, the private party quotes the lowest bid. Later, during the course of implementation, they find it difficult to provide quality services at that amount. Hence, the quality of the programme suffers in the process (Venkatraman & Bjorkmann, 2006).

1.3. HEALTH PPPs IN INDIA

Similar to the worldwide phenomena, in the Indian context too,PPPs emerged in the 1990s. Like in most developing countries, the World Bank promoted the entry of PPPs in the health policy discourse, by making it a part of the conditionality for funding of selected NHPs that included Reproductive and Child Health programme, Tuberculosis, Leprosy, HIV/AIDS, Malaria and Blindness control (Baru & Nundy, 2006).

Partnerships with the non-governmental sector had occurred prior to this. But, these collaborations differed from the PPPs of the 90s in the sense that,

"*Initially partnerships were sought by the state from the non-governmental organizations (NGO's) mostly in terms of programmatic support but gradually this collaboration was extended to other primary, secondary and tertiary levels of care*" (Ibid, p.5).

Moreover, earlier the collaborations were mostly with the 'non-profit' sector, while post the 1970s there was an increasing presence of the 'for-profit' sectors in these ventures.

PPPs in Five Year Plans

Cooperation and Collaboration between the private sector and government in health programmes has formed a very integral part of Indian planning. The First plan clearly articulated the need for non-governmental collaboration with the state for implementing the national health programmes. Up to the Fifth plan, the main focus was on NGOs, which at best provided supplementary support to the public sector. The non-profit sector mostly collaborated with local practitioners, that too in the urban areas. The increased involvement of the non-profit sector came in from the Sixth plan onwards as the Health Policy of 1982 clearly stated the need of involving the 'for-profit' and 'non-profit' sectors to meet the goal of providing 'Health for all'.

A clear division of labour and role definition of the 'non-profit' and 'for-profit' sectors occurred in the Seventh plan. The 'non-profit' sector was expected to focus on social mobilization of communities, social marketing of devices, providing knowledge regarding programmes, counselling and ensuring follow up (Baru & Nundy, 2006). The 'for-profit' sector on the other hand, was concerned with providing curative services in the form of sterilization and insertion of Intra-Uterine Devices across primary and secondary levels of care. The expansion of the for-profit sector in the arena of health further occurred in the late 1980s when the government provided a variety of subsidies in the form of land, water and electricity at lower costs to private entrepreneurs, for setting up specialty and super-specialty hospitals at the tertiary level. As mentioned by the task force on PPP for the Eleventh Plan,

"*More recently the Tenth Five Year Plan (2002-2007), has defined the role of the government, private and voluntary organizations in meeting the growing needs for health care services including RCH and other national health programmes. The Mid Term Appraisal of the Tenth Five Year Plan also advocates for partnerships subject to suitability at the primary, secondary and tertiary levels"* (GOI, 2006,p.5).

PPPs in Health Policies

The above mentioned planning was translated into policies, as a result of which partnerships were given a major focus in most government health policies. As mentioned earlier, the health policy of 1982 legitimized the existence of a dual health service system characterized by private services for the affluent and government services for the poor. The National Health Policy-2002 took this a step forward by clearly defining the role of the public sector as the providers of primary level of care and the private sector as providers of secondary and tertiary level of care (Qadeer, 2002). The policy also suggested the participation of the non-governmental sector in the national disease control programmes so as to ensure that standard treatment protocols are followed. According to the policy,

"*National Rural Health Mission (NRHM 2005-2012) launched by the Prime Minister of India proposes to support the development and effective implementation of regulating mechanism for the private health sector to ensure equity, transparency and accountability in achieving the public health goals"* (GOI, 2006, p. 5).

The NRHM document mentions PPP as an important strategy for delivering its goals. Besides these policies, the GOI has constituted a Technical Advisory Group consisting of officials of Government of India, development partners and other stakeholders for tapping the resources available in the private sector and for conceptualizing the strategies for PPP (Ibid).

Maurya (2012) has identified four phases in the policy making of Public-Private Partnership in healthcare in India,

"*The first round started in the year 1960, with the pronouncement in the third five year plan to collaborate with the private sector in the family planning programme. Shortly after this, there was second round in the area of tertiary care which started in 1970s and in last decade tertiary care sector has seen a number of PPPs taking place in this arena. Third round took place in the area of primary and secondary care during the period of structural adjustment. Fourth round started after the pronouncement of National Health Policy 2002 when, partnership with private sector was considered as critical to improve health service accessibility in all areas"* (p. 13).

These four phases as described by Maurya (2012) can be seen in Table 1.1.

PPPs in National Health Programmes

Amidst all health programmes, it is the family planning programme that has the maximum number of collaborations. According to NRHM report,

"*The Government of India is committed to voluntary and informed choicein family planning, reproductive and child health care services. Towards this end, the Government, the corporate sector, voluntary and non-voluntary sector are expected to work together in partnership. The professional bodies like Indian Medical Association, Federation of Obstetrician & Gynaecologists are also involved in the partnership to achieve the desired goal*" (NRHM [n.d], p.101)

The earliest collaborations between the government and private sector in the National Health Programmes were seen in the Family planning programme over the various plan periods. This can be seen in Table 1.2. As seen here, the government has been seeking partnerships from the private sector for implementation of the family planning programme from the first plan period. These partnerships became further pronounced in the ninth and tenth plans after the International Conference of Population Development (ICPD) in Cairo, which emphasized upon the involvement of the private sector in the delivery of RCH. In this conference, Reproductive Health was defined as a right rather than a means to an end to fertility reduction. RCH package emerged as a result of this conference and was implemented across nations including India. Contraception, safe motherhood, child survival, reproductive tract infections and sexually transmitted diseases were the essential components of this package. The package was to be integrated at the primary level of services and the private sector was to be involved. In fact, a complete chapter of the post conference document published by ICPD talks about the importance of PPPs in RCH services. It defines the role of NGOs mainly in terms of formulation, implementation, monitoring and evaluation of RCH programmes(UnitedNations,1994).

Table 1.1: Phases in the development of PPPs in India

Phase	Period	Decision Process	Event at the start of the phase	Event at the end of the phase	Differentiating feature of the phase
1.	1960-77	Using private sector in family planning.	Third Plan advocated using private sector todeliver family planning services.	Emergency period and paradigm shift in the family planning programme.	Contract with the private providers; terms of partnership dictated by public sector; urgency to reach the goal as a key motivation for forming partnerships.
2.	1977-88	Collaborating with privatesector; incentives to provide Tertiary healthcare.	Import subsidy for medical equipment.	Different states adopted the ideas of giving subsidy to private sector to establish hospital inreturn for providing concessional treatment to the poor.	Use of financial subsidies, terms of partnership decided jointly; lack of public resources as a key motivation for forming partnership. Later activities in this phase were characterized by public financing and private delivery.
3.	1991-99	Increasing participation of private sector in primary and secondary healthcare financing and service delivery.	WB initiative to give grants for health system development projects.	Other states started adoptingmany approaches advocated in the health system development project.	Improving efficiency as a key motivation for these partnerships. World Bank and other development agencies guided these reforms.
4.	2002 to present	Forming partnerships with the private sector at all levels of care.	10thfive year plan and Formulation of National Health Policy.	Continues	Partnership with the private sector as the only option left for improving healthcare accessibility.

Source: Maurya, 2012, p. 14

The 'for-profit' sector was expected to be involved in the production and delivery of reproductive health and family-planning commodities and contraceptives. In order to facilitate this process, governments were strongly encouraged to set standards for service delivery and review legal, regulatory and import policies. There was also a suggestion that governments must remove restrictions for the involvement of private sector. These ideas gained currency in both global and national policies and was endorsed by multilateral and bilateral agencies while funding programme in developing countries. Both RCH-I and RCH-II documents have defined the role and scope of the private and voluntary sectors in the areas of social marketing, Information, Education and Communication (IEC), Monitoring and Service Provisioning (Baru & Nundy,2006). Several initiatives have been proposed to strengthen socialfranchising initiatives under the RCH Programme Phase II (2005-2009).

As seen in Table 1.2, the private and non-profit sectors have always existed within the family planning programme over the last four decades. What started as minor collaborations have now increased in number and become more complex in terms of actors and design.

Besides being an integral part of the programmes for women's health, PPPs also form a very integral part of other National Health Programmes. The Ministry of Health and Family Welfare, Government of India, has evolved guidelines for public-private partnerships in different National Health Programmes like RNTCP (Tuberculosis), NMCP (Malaria), NLEP (Leprosy), RCH (Family Planning), etc.

Similar to RCH, RNTCP (Revised National Tuberculosis programme) has also received support from external funding and have initiated several PPPs across states. According to Baru & Nundy (2008),

"*These partnerships reveal plurality and complexity involving multiple actors with multiple roles which results in diffusion of authority and power across the various actors*" (p. 64).

The partnerships initiated at primary and secondary levels of care are vertically integrated between the global, national, state and local levels. Partnerships in the TB programme mainly emphasized case detection and hence advocated partnership with private practitioners at primary level of care for case detection. While most of these partnerships were successful in increasing demand by active detection of TB cases, the constraint was related to the notification and referral of patients detected with tuberculosis to the national programmes. While detection and treatment were seen as the responsibility of the private practitioners, referral services was essentially the responsibility of the programme. This division of role and responsibilities between the market and state leads to fragmentation of the programme that is bound to affect its comprehensiveness and effectiveness (Baru & Nundy, 2008).

Table 1.2: **Collaboration of Government and Private Sectors in Family Planning and Reproductive & Child Health Programmemes in India**

Five – year plans	Components and levels of services rendered
1st Plan (1951-1956)	• Setting up ante-natal and post-natal clinics by NGOs. • Licensing private nursing homes for Maternal and Child Health Services.
2nd and 3rd Plans (1956-1961)	• Government subsidies and grants were given to states, local authorities, NGOs and scientific institutions for family planning clinics and research relating to demographic issues.
4th and 5th Plans (1969-1974) and (1975-1977)	• NGOs to integrate family planning as part of health services that they extended to the community. • Distribution of contraceptives and education. • In urban areas, it was proposed that private practitioners provide advice, distribute supplies and undertake sterilisations. • Financial support from government to private practitioners and NGOs.
6th Plan (1980-1984)	• Encourage private medical professional and non-governmental agencies for increased investment. • Government offers organised logistical, financial and technical support to voluntary agencies active in the health field.
7th Plan (1985-1990)	• NGOs involved in the extension, education and motivation in FPP. • Scheme for assisting private nursing homes for family planning work continued. • Increased emphasis laid on MCH activities by supporting NGOs, village health committees, and women's organisations.
8th and 9th Plans (1992-1997) and (1997-2002)	• Encourage private initiatives, private hospitals. • Role of NGOs continues.
10th Plan (2002-2007)	• Increased involvement of voluntary and private organisations, self-help groups and social marketing organisation in improving access to health care. • NGO sector to support the government in handling RCH services like providing transport for emergency obstetric care for which funds would be devolved at the village level. • Preparation of IEC material and • Counselling services for adolescents, parents; • Social marketing of contraceptives has been handed over to the NGO sector.

Sources: Government of India, Planning Commission; Plan Documents of Various Years (from Baru & Nundy, 2006)

Some examples of PPP projects, pre-NRHM

This section aims to not only look at some successful PPP projects that existed in the nation pre-NRHM, but also attempts to explain the various models of PPP described in section 1.2 above, as the projects described here are based on the above mentioned models.

1. Social Marketing: Social Marketing has been included in the **RCH and malaria programmes**. These include marketing of variety of products related to RCH, like contraceptives (condoms, oral pills, injectables and Intra-Uterine Devices), and oral re-hydration salts, safe delivery kits and mosquito nets for the malaria programmeme (Annigeriet al.,2004).

Another very good example of social marketing has been implemented in rural Uttar Pradesh by **SIFPSA** (State Innovations in Family Planning Services project Agency).SIFPSA is involved in social marketing of contraceptives. It has awarded performance-based contracts to several organizations for communications support and distribution of contraceptives. The GOI provides contraceptives at a subsidised rate to SIFPSA's partners for distribution and sale. Private partners such as Hindustan Latex Limited (HLL), Population Services International (PSI), and Hindustan Latex Family Planning Promotion Trust (HLFPPT) have created standard sales distribution systems in their assigned areas. A distributor-retailer chain has been established and field personnel are employed to maintain this chain (Annigeri et al., 2004).

2. Social Franchising: One of the best and most popular examples of Social Franchising is the ***Janani***project in Bihar, Jharkhand and Madhya Pradesh. Primarily using the principles of social franchising, *Janani* works in the field of family planning by providing contraceptives, sexual and reproductive health services, such as counselling (including HIV/AIDS prevention); educational packages on relevant issues of Reproductive Health; pregnancy testing and treatment of Reproductive Tract Infections/ Sexually Transmitted Infections (www.janani.org, accessed in January 2012).

3. **ContractingIn and Out**: **Contracting out** in the primary level of care is most commonly seen in cases **of primary healthcentres** being contracted out to NGOs. For example, The Government of Karnataka contracted out the management of primary health centres in Gumaballi and Sugganahalli to a local NGO, Karuna Trust. This project has been described in detail in the section below on NRHM. This model has been replicated in several other states as well.

Other forms of simple contracting that is visible at the tertiary level are **contracting out of diagnostic services** such as CT scan and MRI to a private agency.

Contracting in of non-clinical servicessuch as cleaning and maintenance of buildings, security, waste management, scavenging, laundry, diet, etc. to the private sector has been tried in states like Himachal Pradesh, Karnataka, Orissa (cleaning work of Capital Hospital by Sulabh International), Punjab, Tripura (contracting Sulabh International for upkeep, cleaning and maintenance of G.B. Hospital and the surrounding area), Uttaranchal, etc. (GOI, 2006). For example, several public hospitals in Mumbai have contracted-in private parties to provide dietary services. The rationale for this kind of contracting is to minimize wastage and promote cost-effectiveness (Bhatia & Mills, 1997).

Another very successful and innovative example of Contracting is that of **Chiranjeevi Scheme** in Gujarat. This scheme was launched in April 2005 by the Government of Gujarat with the objective of encouraging private medical practitioners to provide maternity health services in remote areas which record the highest infant mortality and maternal mortality and thereby improve the institutional delivery rate in Gujarat (Bhat et al., 2006).The scheme covers services at the secondary level for deliveries. It also provides Emergency Obstetric Care and emergency transportation for pregnant women who are below the poverty line. The government has entered into a partnership with selected private hospitals and also has provisions of hiring private practitioners for government hospitals. The private provider submits an application that is forwarded to the health officer at the district level. The memorandum of understanding (MOU) and appointment letter is sent to the private provider. The beneficiary gets registered with the Auxiliary Nurse Midwife (ANM) from the respective areas for ante-natal checks. The ANM informs the beneficiaries of papers required and prepares beforehand for the transportation by alerting the local transport operator of the tentative date of delivery. The private providers are initially given a fee as soon as they are registered by the state. They are further reimbursed for the services on a monthly or fortnightly basis (Baru & Nundy, 2006).Usually payments are made for a batch of 100 deliveries. The scheme also has a voucher system to target people below the poverty line. The nodal officers at the block and district level conduct monitoring of the private providers. The ANM receives feedback on the services delivered by the private provider to the beneficiary and if there are discrepancies, she has to report the same to the officials. A modified version of this scheme has been implemented in one district of Tamil Nadu (Bhatet al., 2006).

Another popular example of contracting which falls under the category of subsidies or leasing is seen in the states of Punjab, Rajasthan and Delhi, wherein the state governments provided land, water and electricity at a subsidized rate along with concessions on import duty on diagnostic equipment to many private hospitals, with the condition that they should provide 30% inpatient facilities and 40% of outpatient diagnostic services free of cost for people below the poverty line (Qadeer & Reddy, 2006). This was done mainly to augment the participation of private sector in the provision of secondary and tertiary care owing to the limited capacities of the state (as mentioned in the National Health Policy, 1982). However, an inspection in Delhi by the Qureshi Committee, 2001 headed by Retired Justice A. S. Qureshi, revealed that hardly any hospital was providing free care to the BPL patients as per the original deal (Ibid).

Table 1.3. lists PPP projects based on the various models of PPP, across states that existed pre-NRHM.

Table 1.3: PPP projects across states

S. No.	PPP Model	Name	Services	Private Partner
1.	Conventional Contracting (in)	SMS Hospital, Jaipur	Radiology & Drug store	Private Company
		Bhagajatin Hospital, Kolkata	Diet, Cleaning, Laundry	Individual Entrepreneurs
2.	Contracting Out	ASK, Molarband, Delhi,	Manage Maternity health centre	Charitable NGO
		Karuna Trust, Karnataka	PHC Management	Charitable NGO
		Shamlaji Hospital, Gujarat	CHC Management, Managing	Charitable NGO
		Rajiv Gandhi Hospital, Raichur	Tertiary Care Hospital	Private Company
3.	Performance Management Contracts	APUHS Project, Adilabad, AP	RCH Services	Charitable NGO
		Chiranjeevi Yojana, Gujarat	RCH/MH services	Private clinics
		Ambulance, Theni, T. Nadu	Ambulance	Charitable NGO
		Mobile Clinic, Sundarbans,WB	Health Camps	Charitable NGO
4.	Technology Demo	UMH&RC, Bhimtal, UK	Mobile Diagnostics	Private Research Organisation
		KIT&TH project, Chamrajnagar	Tele-Medicine	Private Hospital Consortium
5.	Community Social Health Insurance	Yashaswani Scheme	Surgical Care	Private Hospitals Consortium
6.	Voucher scheme	Arogya Raksha Scheme, AP, SIFPSA, Agra UP, SCOVA, Haridwar, UK	Hospitalisation/ Maternity Care, Institutional Delivery	Private Hospitals/PSU Insurance Private Hospitals
7.	PPP Mix	Mahavir Trust Hospital Hyderabad, Delhi, Pune, etc.	RNTCP TB Care	Private Trust Hospital
8.	Hospital Autonomy	RKS Bhopal and Other Places	Patient Welfare Committee	Public Hospital
9.	Franchising	Merri Tarang; Merri Silver; MerriGold; Life Spring-HLFPPT/SIFPSA's Janani, Bihar	Maternal and Child Health / Other curative Services	Franchised private entrepreneurs
10.	Social Marketing	SIFPSA, UP/ DKT Intl.	Sale of Contraceptives	International private agency
11.	Operational Leasing	Delhi, Punjab, Rajasthan	Super Speciality Care	Private Hospital

Source: Venkatraman, A. (2008)

1.4. PPPs UNDER NATIONAL RURAL HEALTH MISSION

The National Rural Health Mission (NRHM) launched in April 2005, uses Public-Private Partnerships as an important strategy for achieving the public health goals of providing quality health care which is affordable and accessible to the majority, especially those residing in the rural interiors. Hence, post NRHM a plethora of PPP projects have been launched across states. Besides, the already existing PPP projects have been merged with the NRHM. Details of these projects across various states of the country have been presented in Chapter III of this thesis, as it is one of the objectives of the present study on Public-Private Partnerships under the NRHM.

1.5. GAPS IN LITERATURE AND RATIONALE FOR THE STUDY

Hence, from the above section one gets an idea of a range of PPPs that exist within the health sector across states. These partnership programmes mostly existed before NRHM. Post NRHM, these were merged with the NRHM and a host of new PPP projects were also launched. Differences exist between each of these in terms of their structure, design and operationalization; however, each is committed in meeting the same objective of increasing the efficiency and equity of health services. Studies have been done to review and analyse some of these PPP projects. These reviews were mostly done to make recommendations for further improvementof these projects in meeting its objectives and suggesting a future course of action. For example, Annigeri et al.(2004) reviewed seven major models of PPP throughout the different Indian states, (some of these models are mentioned above) and suggested changes for enhancing their services. Similarly, the Planning Commission, Government of India constituted a task force on public-private partnership to improve health care in the eleventh five year plan. This task force reviewed public-private partnerships in health care across rural and urban areas (GOI, 2006). Venkatraman & Bjorkman (2006) did a detailed case study of 16 PPP projects in nine states in order to reflect and assess the different models of public-private partnership. The study critically reviewed the cases in depth, through contract document, government orders, memoranda of understanding and other documents as well as through feedback from different stakeholders of the programme and compiled the operational issues in the management and functioning of the schemes.

In addition to these, there are a few studies which have focused on specific models. For example, Prakash & Singh (2006), in their study have reviewed the outsourcing or contracting-out of health services in the Directorate of Medical and Health Services (DMHS), Rajasthan. They found out that outsourcing is improving the effectiveness of health services; however, its effect on efficiency and equity is not very clear (Ibid). Similarly, Bhat et al. (2006) studied the Chiranjeevi scheme in Gujarat, wherein they have looked at the evolution of the scheme as well as its implementation. They have also analysed as to how far the scheme is successful in reaching out to the BPL families. Kumar (2003) assessed the impact of

Rogi Kalyan Samiti in Madhya Pradesh State, focusing on *Badnagar tehsil*. This study found that the enhanced involvement of citizens in decision making has made the functioning of the government hospital more transparent, accountable and sensitive to the needs of patients. Ravindran (2011) has analysed the effectiveness of PPPs in Maternal Health Services in delivering quality maternal health services accessible at affordable prices to the poor and marginalized sections of the population. This study has pointed out that PPPs with the 'for-profit' private sector has not increased either availability or physical access to services for a vast majority of women living in rural areas. Sulzbach et al. (2002) studied the impact of franchising on both the service provider as well as the client, in five social franchising programmes across the globe providing RCH services, one of them being*Janani*in Bihar. The study revealed that franchise models for contraceptive service delivery offers apparent benefits to providers as well as clients, and the opportunity to expand access to quality reproductive health services among the poorer subgroups.

However, most of these studies have just done a cursory level of analysis and lack depth and rigour (Annigeri, 2004; GOI, 2006). The few studies that have looked into specific programmes in detail have done that mainly to understand that programme in terms of its structure, administration, and implementation. Hardly any one of them has tried to evaluate the extent of coverage and health impact of the PPPs. They also havenot evaluated the success of these partnerships in meeting their main objective of bringing about efficiency and equity of health services. Similar concerns have also been raised by Baru & Nundy (2006) who have expressed that,

"*If the main objective of PPPs is improving 'efficiency' and 'equity' then there is limited evidence to point out the fulfilment of these objectives*" (Baru & Nundy, 2006, p. 13).

Mills & Broomberg (1998) too felt the same while reviewing the contracting of health services in developing countries, as they found very little data on the impact of these contracts on efficiency and equity. Similar observation was made by Annigeri et al. (2004) while reviewing some of the successful Indian models of PPP. For example, while reviewing *Janani* they mentioned that,
"The greatest drawback of the programme is the lack of evaluation of the programme in terms of coverage i.e. the effect of the programme on contraceptive prevalence or other RCH indicators. Till now, coverage of the programme has been assessed by using CYP data (Couple year of protection). The health impact of the programme has also not been assessed." (p.25).

Baru (2009) in her analytical paper on PPPs has quoted these studies and has mentioned that,
"*While these studies provide a fair amount of description regarding the architecture of these partnerships, characteristics of private organizations in these partnerships, few details regarding MOU's*

and concerns regarding the issue of equity, they haven't really tried to explore the process of building of partnership, terms and conditions of partnerships and systematic study of MOU's that would help in strengthening the conceptualization of partnership in health care" (p.1).

Also comprehensiveness, cost effectiveness and power relations between the two partners in the various programmes have not been explored.

Where NRHM is concerned, several studies have been done to evaluate its implementation on the whole as well as specifically on its various components. Studies have been done to assess the progress of NRHM in its first five years. For example, The Indian Institute of Population Studies, Mumbai had undertaken a national study in the year 2009 for the Ministry of Health and Family Welfare mainly to evaluate the implementation of NRHM in all the implementing states (IIPS, 2009). Similarly the Earth Institute, Columbia University did a midterm evaluation of NRHM (Bajpai, 2009). The most recent evaluation of NRHM was done by the Planning Commission of India in 2011 in seven states of Uttar Pradesh, Madhya Pradesh, Jharkhand, Orissa, Assam, Jammu & Kashmir and Tamil Nadu (GOI, 2011). All these studies have looked at various aspects like infrastructure, presence of manpower, fund utilization, schemes like Accredited Social Health Activist (ASHA) and *Janani Suraksha Yojana*(JSY) under NRHM, but haven't looked at PPP projects under NRHM.

Studies have specifically been done on different components of NRHM such as ASHA, *Rogi Kalyan Samiti*, Village Health and Sanitation committee and schemes like Community Based Monitoring scheme and JSY. For example, a rapid appraisal was done on the functioning of ASHA in the community and its interface with community and service providers in Uttar Pradesh by National Institute of Health and Family Welfare and BRD Medical College, Gorakhpur. The study found that even though the ASHAs are doing good work in the field, they pay more attention on immunization and delivery for which they get more incentives, and less on awareness creation on sanitation and hygiene or counselling on family planning, for which they receive lesser incentives (Nandan, 2009).

Similarly, several studies have been done to assess the implementation of *Janani Suraksha Yojana*. A concurrent assessment of the scheme was conducted in large states of Bihar, Madhya Pradesh, Rajasthan and Uttar Pradesh by the UNFPA for the Ministry of Health and Family Welfare (UNFPA, 2009). Another evaluation of the scheme was done by National Health Systems Resource Centre (NHSRC) in the eight high-focus states of Bihar, Chhattisgarh, Jharkhand, Madhya Pradesh, Orissa, Rajasthan, Uttar Pradesh, and Uttarakhand, which together account for 84.3% and 66% of India's maternal mortality and infant mortality respectively (NHSRC,2011). Both these studies have shown an increase in the institutional deliveries post the implementation of the scheme which is the main objective of JSY.

Studies on PPP projects under NRHM are few. The NHSRC did a study on the “104” services in Andhra Pradesh, which is meant to to assist the people, particularly inrural and interior areas, who are facing difficulties in getting access to a qualified doctor and information on any health problem. The project being implemented in partnership with the Govt. of Andhra Pradesh and Health Management Research Institute, Hyderabadis also termed as the HMRI model. The study tried to assess the role of HMRI Model in improving access to health services to rural population and for strengthening the public health delivery system in the State. It also tried to capture the community’s perception in in improving the access to health services (Mokashi et al.,2011).

The NHSRC has also studied the publicly financed Emergency Response and Patient transport system meant to transport pregnant women to the health facility for delivery. The project being implemented in a PPP mode under NRHM was studied through Case study of three models operating in the state of Jharkhand (Mamta Vahan Seva), Chattisgarh (Matahari Express) and Orissa (Janani Express). The study not only looked at the design of these models but also analyzed aspects like cost, coverage, equity, outcome and sustainability. The experiences of the beneficiaries accessing the services of the projects were also compared with those of the non-beneficiaries. The study made recommendations for the design of future projects and for enhancing their efficiency and effectiveness (Sundararaman et al.,2012).

Another study done on the PPP component of NRHM was undertaken by FRCH in 2011. This study tried to see the PPP component of Janani Suraksha Yojana in Ahmednagar district of Maharashtra by studying the phenomena of accreditation of private institutions for delivery under the scheme (Chaturvedi & Randive, 2011).

Hence, the review above shows that even though various studies have been done from time to time to evaluate NRHM on the whole as well as its specific components, few studies have tried to understand andevaluate the effectiveness of Public-Private Partnership projects under NRHM. Thus, one can conclude that PPP projects under NRHM have always remained a weak and unexplored component.

Review of literature also indicates a paucity of literature on PPP projects that exist in Maharashtra. This is mainly because when the task groups of PPPs were constituted to evaluate the existing projects in the country, Maharashtra was not included. The only literature that points to the presence of PPP projects in Maharashtra is the study done by Bhatia and Mills in which the effect of contracting of ancillary services by municipal hospitals in Mumbai has been studied during the late 1990s (Bhatia & Mills, 1997).

The literature on PPPs in general, as well as those under NRHM, shows gaps in research at multiple levels, which helped in conceptualizing the present study. First,PPPs under NRHM is an unexplored area; second data on PPPs in Maharashtra has been insufficient right from the beginning and third, the various studies on PPPs have been done at a very rudimentary level. They focus only on the structure and design of the partnership programmes and donot look at nuances such as the evolution, power equation and relation between the two partners, cost efficiency and implications on quality, equity and replicability. They are also mostly from the providers perspective and do not capture the experiences of beneficiaries, and thus are unable to comment upon the outcome of the programme.

Hence, this study tries to fill all the above mentioned gaps by looking at the PPP projects under NRHM in Maharashtra. It not only looks at the design and implementation of the chosen PPP projects but also traces their evolution, nature of partnership and relationship between the two partners. Aspects like replicability and sustainability have also been looked at. Besides, the study tries to understand the outcome of these projects and analyses the gaps, if any, between the design of these projects and their actual implementation in the field. It also analyses the problems that come in the way of successful implementation of these projects and makes suggestion to further improve the same. Overall, the study tries to analyse the success of these projects in making quality health services accessible at affordable prices to the poor and marginalized sections of the population, as envisaged by policymakers.Since there have hardly been any studies of this kind done on PPPs under NRHM, this study would add immense value to the existing body of literature.

CHAPTER II
METHODOLOGY

2.1. CONCEPTUALISATION OF THE PROBLEM

The previous chapter has presented an overview of the evolution, typology and characteristics of PPPs in health, and NRHM in particular. Examples of some successful models, pre- and post-NRHM, across states have also been discussed. Variation is seen in PPP projects across the developed and underdeveloped states. While developed states show the presence of PPP projects at the tertiary level, the same is not the case in under developed states, where more partnerships are seen at the primary and secondary level.[2] It is also seen that while partnerships at the primary level are mostly forged with the 'non-profit' sector, those at the tertiary level are forged with the 'for-profit' sector. This is mainly because of the fact that more profits are associated with curative care.

The review also suggests that most studies on PPP projects in India are either descriptive or evaluative in nature and hardly any study has been done on the PPP component of NRHM. Also, these studies tend to focus more on the design and implementation of the PPP projects. There are few empirical studies that have examined the perceptions and experiences of providers and beneficiaries in the implementation of the programme and the implications of the programme on quality, equity, replicability and sustainability.

This study intends to fill the above mentioned gaps, as it not only tries to understand the structure, functioning and administration of the chosen PPP projects, but also looks at their implications on quality, equity, replicability and sustainability, both from the providers' as well as the beneficiaries' perspective. This has been done by mapping PPP projects under NRHM across states and across districts in Maharashtra. In this analysis, we have looked at the levels of care in which these partnerships are forged, the actors involved - 'for-profit' or 'non-profit', donor funding if any, and the type of model. This is used to comment on the variations in the type and distribution of these partnership programmes.

In order to gain greater depth, case studies of selected PPPs were undertaken for a district that is socio-economically poor and inhabited mostly by tribal population. The selection of PPPs for the case study is based on the evaluation of the NRHM, as three of the better performing PPP projects, as identified by NRHM officials at the state and district level, were selected. These include the Sickle Cell Disease Control Programme, Mobile Medical Unit and the Service NGO scheme. All these are managed by NRHM in partnership with NGOs or Private Trust Hospitals, but they differ in terms of service provisioning. While the Sickle Cell Disease Control Programme is working primarily for the control of a specific disease which is widely prevalent amongst the tribal population of Thane district, the Mobile Medical Unit provides general health services to the most remote villages where there is no health facility and the Service NGO scheme specifically works in improving the RCH indicators of reducing the Infant

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[2] For details, refer chapter III

Mortality Rates (IMR) and Maternal Mortality Rate (MMR) and increasing Institutional Delivery, which is the main objective of the NRHM. All these PPP projects are being implemented in interior regions of the district, mainly to cater to the main objective for which they have been initiated, which is to take the health services to the most unserved and underserved areas.

Hence, this study is an attempt to map out the existing PPP projects across the country, specifically in the state of Maharashtra and to understand the evolution, structure, design and implementation of the three chosen PPP projects in Thane district of Maharashtra. In addition, it assesses the experience of the beneficiaries of these programmes. Aspects such as quality, equity, replicability and sustainability of these projects have also been looked at. Quality has been evaluated by assessing the steps that these projects are following for maintaining the quality, especially in terms of training and monitoring. Equity has been analysed by understanding the access of the programme among people of different caste, class, gender and location. Here only the physical aspect of equity is looked at and the social aspect is not considered, as the NRHM document also talks about the physical aspect of Equity. Replicability and sustainability has been assessed by asking the providers about the measures followed in replicating the programme, funding aspects, support from the state and future course of the programme. While the three chosen PPP projects are based on the contracting model by forging a partnership with NGO or private trust hospitals which are 'non-profit' sectors, they are very different in terms of service provisioning. Here is a brief about the three PPP projects:

1. **Sickle Cell Disease Control Programme:** This PPP programme runs in all 19 tribal districts of Maharashtra in partnership with NGOs which are chosen by the State Health Society for each district since 2008. The District Health Society (DHS) of Thane district of Maharashtra has contracted with the NGO, *Navoday Grameen Sanstha* stationed at Jawhar for running the Sickle Cell Disease Control Programme (SCDCP) in all 11 tribal blocks of Thane district where the disease is considered to be highly prevalent. It is operational in 36 Primary Health Centres (PHCs) falling under this block. The programme runs through a network of volunteers who are chosen for each PHC from the local community by the NGO. Their work is to spread awareness and to bring people into the PHC for testing. Majority of people are tested and made aware about the disease in camps which are occasionally organized by the PHC within the villages. This serves as an easy way of reaching out to people. The work of the volunteer at each block is supervised by a Field Supervisor appointed by the NGO and the whole team is headed by a Programme Coordinator at the NGO level. The programme aims to screen the entire tribal population in the district for the presence of the disease and spread awareness amongst them regarding the same.

2. **Mobile Medical Van:** This PPP programme is at a very nascent stage and is under the process of initiation in all districts of Maharashtra, where the DHS has given contracts to NGOs to run a Mobile Medical Van catering to the most unserved and underserved areas, where there are no government health facilities. In a few districts, the selection of NGO hasn't occurred yet. In Thane district, the contract to run the van has been given to Dayanand Charitable Society, which is a missionary trust and runs a 100-bed hospital. The government provides the vans – one for equipment and another smaller one for staff and medicines. The staff is appointed by the NGO, while their salary is provided by the government. The NGOs responsibility is to take the van on a daily basis to two to three villages in order to cover 56 villages falling under Jawhar and Mokhada blocks of the district in a month. These villages were chosen by the District Health Society. While the main focus of the programme is to provide ANC and PNC, it also provides services for other illnesses. Critical cases are referred to the nearest government health facility or to Dayanand Hospital.

3. **Service NGO scheme:** The Mother NGO and Service NGO scheme is being run all over the country to provide RCH services under RCH Phase II. The scheme existed even before NRHM was initiated. However, in Thane district, these schemes have been recently initiated. The programme in the district started with the Mother NGO scheme, the term of which expired a few years back. In July 2011, the Service NGO scheme was initiated by the District Health Society in partnership with ML Dhawale Trust. The scheme covers 93 villages falling under the three PHCs of the block. However, intensive work is being done in 25 villages falling under the Krunze PHC. The goal of the programme is to reduce IMR and MMR by promoting institutional deliveries, immunization and family planning. To achieve this goal, the Service NGO operates two vans which provide ANC, PNC and other health services to the beneficiaries of the scheme, at their doorstep. The unique feature of this programme is to create health awareness through a network of Community Health Volunteers (CHV), mostly local women, chosen by the trust in consultation with the villagers for each hamlet of the village. The programme has been quite successful, mainly because it has also been running the Mother and Child Health programme since a long time, of which the CHVs have been an integral part. Hence, work done by the trust in the past is proving of immense help to this partnership programme now.

Hence, one can see that these PPP projects are providing varied kind of services to its clientele and in each programme, the private partner plays a different role. In SCDCP, the role of the NGO is primarily awareness generation and mobilizing people towards the service providers, which is the PHC. In the other two programmes, the private partner is also involved in service provisioning besides IEC. This is also because the private partners in both these cases are Health Institutions specializing in curative care,

although differences exists between the two in the type of service provided. While Service NGO scheme is specifically focusing on RCH services, the Mobile Van is providing General Health services of which RCH is an integral component.

In order to study the structure and function of the above mentioned PPP projects, the following methodology was used:

2.2. PURPOSE OF THE STUDY

The purpose of the study has been guided by the following **Research Questions**:

1. What is the goal of the PPP projects? Do the private and the public partner share the same goal? If not, does it affect the comprehensiveness of the project?
2. How did these partnership programmes evolve? How were the private partners selected for these projects?
3. What are the roles of each partner? Is there any clash of role between the two partners?
4. Is the partnership based on equal terms? What is the power relationship between the two?
5. Who formulates the Memorandum of Understanding? What terms and conditions are mentioned in the MOU?
6. How are the projects implemented in the field?
7. What are the funding mechanisms of these projects and under which heads the fund is utilized? Is the project cost effective for either of the two partners?
8. How important is quality for these programmes and what are the measures followed for the same?
9. What are the implications of the programme for equity, replicability and sustainability?
10. What is the outcome of the programme and how does it impact upon the beneficiaries?
11. What are the strengths and weaknesses of the programme?
12. What are the problems that come in the way of the effective implementation of the programme and how can they be resolved?

In order to address the above mentioned research questions,the overall objective of the study is as follows:

Overall Objective

To study the structure and functioning of PPPs under National Rural Health Mission that exists in India, with a special focus on Thane district, Maharashtra.

The Specific Objectives of the study are as follows:

1. To study the history, characteristics and implementation of PPPs under NRHM across states, with a special focus on the state of Maharashtra.
2. To study the evolution, structure, designs and implementation of PPP projects under NRHM in Thane district of Maharashtra.
3. To study the perceptions and experiences of providers and beneficiaries in selected PPPs under NRHM in Thane district.
4. To study the implications of these partnerships for quality, equity, replicability and sustainability.

In order to address the above mentioned objectives we have relied upon both primary as well as secondary sources of data collection, which are discussed below:

First Objective

Mapping of the existing PPP projects in the country as well as in Maharashtra state has been done by an intensive review of secondary literature, including the official records of the government, MOUs of different PPP projects and NRHM websites of various states. Primary interviews with key informants of the PPP projects in Maharashtra were also conducted. This mapping was mainly done to understand the structure and functioning of PPPs across different Indian states, with a focus on Maharashtra. Aspects like the mechanism used for forging partnerships, the levels of care and partners involved have been looked at.

Second Objective

In order to meet the second objective of the study, in-depth interviews were conducted with government officials of the existing PPP projects in Thane district, holding important positions vis-à-vis these projects at the district as well as at the state levels. Staff members of the Private Partner (NGO) were also interviewed. These interviews were done mainly to understand the structure, functioning, administration and implementation of the projects. In addition, the context in which these PPP projects were started, their evolution over a period of time and cooperation with the public/private partner were also explored. The nature of partnerships, activities planned for the future, cost, quality, equity, replicability and sustainability issues were also looked at from the point of view of the providers. The mechanism followed

by the government to regulate/monitor the private sector was also assessed while the MOU of the programmewere studied and analysed in detail. Data on the available infrastructural facilities, daily and monthly client volume, the most common ailments for which services are sought from the programme, patient profiles, their geographical locations, etc. were also collected as and when applicable for each project.

Third Objective

Interviews were conducted both with the providers and beneficiaries of the three chosen programmes to assess their experiences vis-à-vis these programmes. The providers were also asked about their roles with the programme, the problems that they face in fulfilling these roles and their suggestions for improving the programme. The training component and the staff's satisfaction from the same were also assessed.

The outcome of theprogramme was assessed by randomly selecting villages in the programme's area of operation. Villagers were then asked questions mainly to assess their level of awareness on the program and its activities. In some cases like SCDCP, the outcome of the programme was assessed by conducting FGDs with the beneficiaries as well as non-beneficiaries of the programme. FGDs with the beneficiaries were done mainly to assess their levels of satisfaction and preference of the programme over other services. Suggestions for improving the programme were also sought in these discussions. Information received in these FGDs was then substantiated by key informant interviews, exit interviews and interviews of OPD patients accessing the services of the specific programmes.

Fourth Objective

Equity of the programme, in terms of reaching out to beneficiaries in the most remote and interior regions of the district, was assessed by talking to the providers about the mechanism that they follow for ensuring equity as well as by observing whether the same is being followed in the field. Interviews with different groups of villagers also helped in assessing the level to which the programme has reached different segments of the society which is stratified on grounds of caste, creed, gender and profession.

Aspects of cost efficiency, replicability, sustainability and quality was assessed by interviewing the staff of the programme on issues of financing, mode of replication, support from the state government, future plans for the programme and the mechanism that it follows for ensuring the quality of the programme.

2.3. AREA OF THE STUDY

Maharashtra State has been chosen for the study of Public-Private Partnerships projects under the NRHM, mainly to understand the growth of PPPs which is an important strategy under NRHM to meet its goals, in a non-high focus state like Maharashtra with reasonably good health indicators. Another reason for selecting the state was because the researcher wanted to understand the PPP component of a state which

has historically seen high presence and growth of the Private Sector across all levels of care. The paucity of literature on PPP within the state is another reason for choosing it.

The PPP projects for detailed case study have been chosen from Thane district of Maharashtra, as almost all PPP projects under NRHM being implemented in the state of Maharashtra, are also being implemented in this district. Additionally, special PPP projects have been initiated specifically in this district as it has always been the hub for developmental activities mainly because of its large tribal population living in extreme conditions of deprivation. Hence, it can be considered as a model district vis-à-vis the implementation of PPP projects. The districts proximity to Mumbai, the commercial hub of the country, is another reason for bringing it into the limelight. The fact that this district is the oldest in terms of initiation of health sector reforms was another reason to select it for the present study. Also, according to state officials, the components of NRHM are best implemented in this district.

Socio-economic and demographic features of Thane District

Thane district is located in the North of Maharashtra state. As per the 2011 census, it is the most populated district in the country with a population of 11,054,131 and population density of 1,157 inhabitants per square kilometre (3,000 /sq. m.). It has a sexratio of 880 females for every 1000 males, much below the sex ratio of the state, which is 946 for every 1000 males. This shows that the socio-economic indicators of the district are poor in comparison to the overall state. However, the literacy rate of the district is 86.18 % (District Census, 2011) which is above the states average of 82.9%.[3]The district has 15 blocks, out of which 11 are tribal blocks. These are: Jawhar, Wada, Mokhada, Vikramgarh, Shahpur, Murbad, Vasai, Bhiwandi, Dahanu, Palgarh and Talassari. Only Thane (urban), Kalyan, Ulhasnagar and Ambernath are non-tribal blocks. This shows the predominance of tribals in the district. Owing to the huge presence of tribals within the district, which is known to exist in extreme conditions of poverty and deprivation, the socio-economic condition of the district is poor in comparison to the rest of the state.

The beneficiaries of the PPP programmes covered in this study belonged to the tribal group, mainly because of the predominance of tribals within the district. Hence, it would be useful to understand their living conditions and characteristics and the same has been described in the section below.

The important *kharif* crops of the district are Rice, *Vari* and *Nachani* (finger millet). Rice is the main crop. *Vari* and *Nachani* are grown in the hilly areas of the eastern part of the district, namely Jawhar, Murbad, Vikramgad, Shahapur and Mokhada talukas.

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[3]Data as per 2011 census

The public health facilities in the district include 79 Primary Health Centres, 492 Sub-centres, 12 *ZillaParishad* dispensaries, 23 Primary Health Units, 35 Rescue Camps, 16 Rural Hospitals, four Sub District Hospitals and One Civil Hospital (Mr. Gujar, District Extension & Media Officer, 11th January 2012, District Health Society, Thane). The location of the district in the state of Maharashtra can be seen in Exhibit 2.1., while Exhibit 2.2 shows the map of Thane district indicating the location of existing health facilities.

Exhibit 2.1. Location of Thane district in Maharashtra

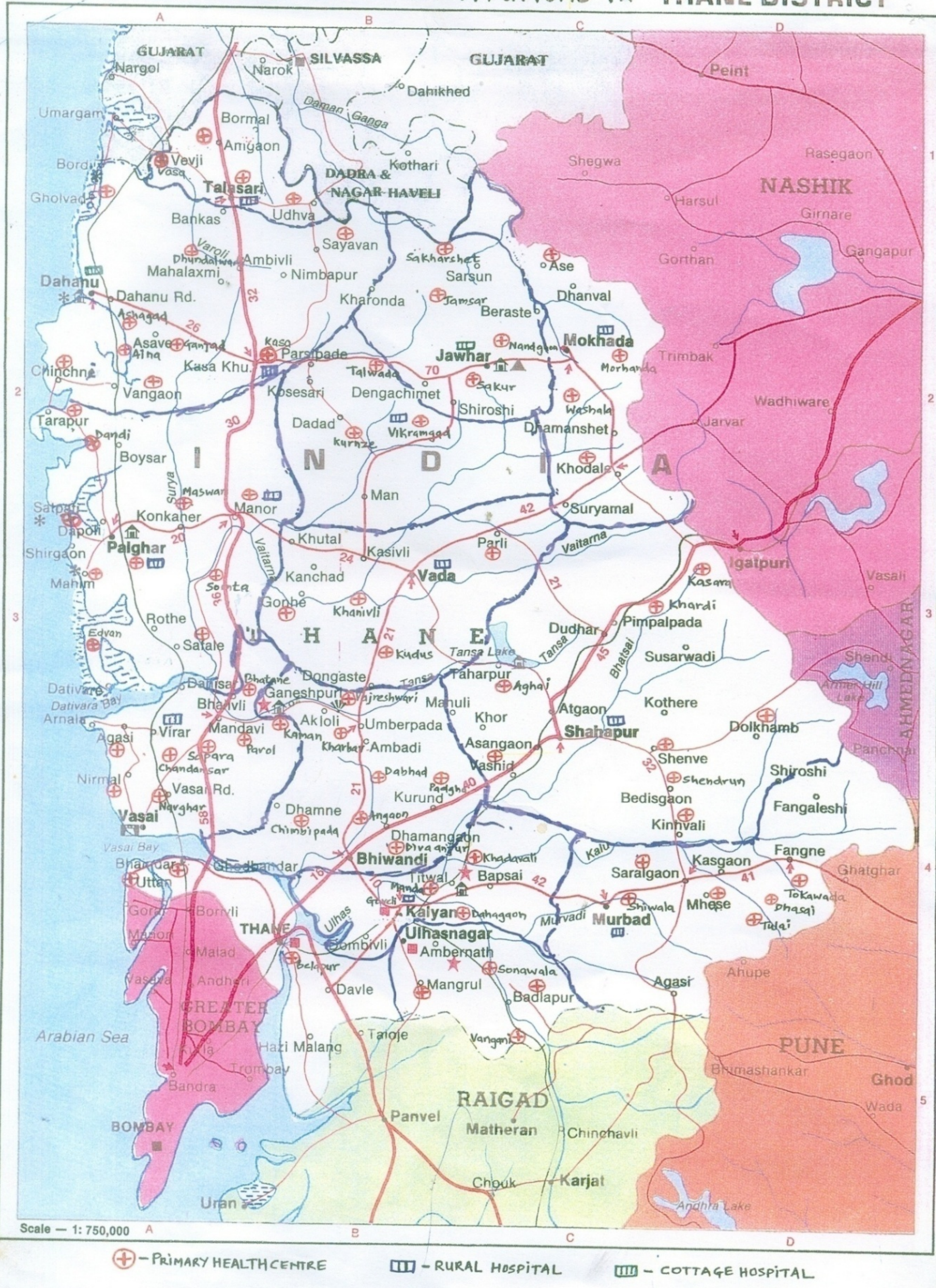

Exhibit 2.2. Primary Health Centres, Rural Hospitals and Cottage Hospitals in Thane district

Tribals in Thane district

Tribals residing in Thane district belong mainly to four different groups, the *Malhar Koli*, *Warli*, *Katkaris* and *Kokanas*. Each of these groups differs from each other in terms of their language, cultural pattern and socio-economic categories. Tekale (2006) in their study on malnutrition among the *Warli* tribal children residing in Jawhar, Wada and Mokhda talukas found that these children are more prone to nutrition and health issues, mainly because their agricultural practices are mostly traditional and unproductive. This results in an increased dependence on forests and forest produce, as a result of which their diet is mostly vegetarian and hence devoid of essential micronutrients. In the last couple of years, the situation has worsened due to growing deforestation, which has snatched their primary source of livelihood and further deteriorated their nutritional status. This view is also shared by several other anthropologists studying the tribal population. According to Prabhu (1992), a major factor affecting the wellbeing of the tribal population is growing deforestation. The tribals have been living in forests for ages, so their life support system is intricately linked to it, as they derive their *anna*, *aarogya* and *aasra* (food, wellbeing and security) from the forests. They share a symbiotic relationship with the forest and increasing deforestation has affected their life to a great extent.

In his analytical paper on tribal deaths in Thane district in the 1990s, Prabhu (1992) holds deforestation as one of the main reasons for deaths among the tribals. Explaining this, he describes how the tribals, from the beginning of the monsoon till the first crop is harvested, take recourse to the forest for food supplies in the form of fruit, tubers, roots, shoots and leaves. This food is supplemented with wildlife (now extinct) and fish (now poisoned by pesticides and industrial waste) as the main sources of protein. Hence, it is natural that due to deforestation their nutritional intake has been affected to a great extent. Also, deforestation destroys the herbal remedies which they have traditionally been using to cure their illnesses. Therefore, it is obvious that in the absence of forests, their health and living conditions would deteriorate. The unavailability of modern health services in the areas where they reside worsens the situation. All these factors result in various diseases, especially those related to under nutrition.

Incidences of under nutrition are reported to be highest among the tribes residing in Jawhar and Mokhada blocks of the district, which are known for their poverty and deprivation. These two blocks have become a hub for various kinds of developmental activities, mainly because of large numbers of tribal deaths in this area were reported in the early 1990s. Besides under nutrition, some other health problems of the tribal population include gastrointestinal disorders, malaria, tuberculosis, which are all diseases of poverty. In addition, there is a fairly high prevalence of genetic disorders such as sickle cell anaemia and thalassemia. Due to the difficult terrain in which they reside, their accessibility to health services is poor and this has a further impact on their already poor health status. The lack of access to maternal and child health services has led to high fertility as well as high maternal and infant mortality among this

population. Table 2.1 summarizes the health status indicators of tribals in Maharashtra which shows the poor health status of the tribes in Thane compared to the general population of Maharashtra.

Besides health, the other areas of concern for this group of people are poverty, illiteracy, ignorance and superstitious beliefs. One of the major reasons for these is the fact that they live in remote forest areas, as a result of which they remain isolated, untouched by civilization and largely unaffected by the developmental processes proceeding in the rest of the state. Hence, these groups remain backward, particularly in health, education and socio-economic aspects (Kate, 2000).

Another characteristic of this group of people is migration. In September, with the harvesting of the first crop, people start moving to cities in search of livelihood. Nearly 40% of the tribals migrate as a family. In another 40%, the male members migrate, leaving behind the women and small children. Most tribals work in semi-bonded conditions, particularly in the brick kilns, salt pans and the sand dredgers. As mentioned by Prabhu (1992),

"Not a single migrant tribal is paid the minimum wages. If tribals were paid minimum wages, 90% of starvation, malnutrition and mortality would cease to exist" (p. 2527).

Migration also has an impact on the health of these people, especially pregnant women and children. Most women miss antenatal check-ups and children their immunization, during periods when they are away.

Table 2.1: Health Status Indicators in tribes of Maharashtra

S. No.	**Indicators**	**Situation in Maharashtra**	**Tribal Situation**
1.	Infant mortality rate	59	110
2.	Crude death rate	7.9	13
3.	Maternal mortality rate	2	Not Available
4.	Low Birth Weight Babies	28%	40%
5.	Family Size	3.8	4.2
6.	Delivery by Trained Birth Attendant	86%	12%

Source: Kate, 2000,p.2

2.4. DESIGN AND METHODS USED FOR THE STUDY

In-depth case study method has been used to understand the structure, functioning and implementation of the three chosen PPP projects in Thane district of Maharashtra. According to Creswell (1994),

"*A Case study is a single bounded entity, studied in detail, with a variety of methods, over an extended period of time."*

This qualitative research method is often used to understand a complex issue or object and can extend experience or add strength to what is already known through previous research. Case studies emphasize detailed contextual analysis of a limited number of events or conditions and their relationships ('The Case Study as a Research Method', 1997). The nature of this study essentially required a descriptive approach, which heavily depends on the narratives of participants in the study. Thus, the current study draws heavily on a qualitative methodology which is inductive, dynamic, unique and context-specific with a flexible design. However, some quantitative data from both primary as well as some select secondary sources have been used to corroborate and supplement the narratives. Thus, the use of a mixed method where both qualitative and quantitative data were employed, helped in some sort of methodological triangulation for the purpose of confirmation and completeness of the narratives, explicated through qualitative methods (McEvoy & Richards, 2006).

2.5. TOOLS OF DATA COLLECTION & SAMPLE SELECTION

Qualitative data has been collected using a structured Interview Schedule, Interview Guide, Focussed Group Discussions, Observations and Content analysis of secondary data.

The three PPP projects have been chosen as they are the better performing projects as per district and state officials. Also, they differ in their service provisioning. While in one the private partner is focusing on creating awareness and bringing the people to the government health facility, thus helping the government machinery in the disease control programme (SCDCP), in the other, the private partner is only concentrating in providing the curative component (Mobile Medical Unit) and in the third project the private partner is providing both IEC as well the curative services (SNGO scheme). These projects also differ in their areas of operation. While SCDCP is being run in all 11 tribal blocks of the district, the Mobile Medical Unit only runs in Jawhar and Mokhada blocks and the Service NGO programme caters to the RCH needs of just one block, Vikramgad.

Each project has been looked at both from the providers, as well as the beneficiary's perspective. In order to collect information on the structure, design, evolution, implementation, role of the two partners and other programmatic details related to funding, quality maintenance, equity and replicability, various government officials associated with the programme, both at the district as well as the state level and the staff of the private partner were interviewed. In-depth interviews, using an interview guide were conducted with the above mentioned providers of the programme. Most of these interviews were digitally recorded and were later transcribed into text data.

In addition, the researcher also captured views of the beneficiaries of each of these programmes by conducting FGDs with them. Key informant interviews were also conducted in these villages with the

Sarpanch, ASHA, Anganwadi Worker (AWW), school teachers, shopkeepers etc. The sole purpose of this was to cross check whether field realities matched the project on paper or as described by the providers. In other words, this whole exercise has been done to identify the gaps in implementation of the selected PPP projects. In some cases, FGDs were conducted both with the beneficiaries and non-beneficiaries of the programme to assess its outcome, for example SCDCP. Exit Interviews and interviews with OPD patients were also conducted in some cases.

As each project has a unique style of implementation, different methodologies have been used for selecting the villages for carrying out FGDS with beneficiaries. This is described in the section below:

1. Sickle Cell Disease Control Programme:

The programme has been studied in two blocks of Thane district - one close to Mumbai and the other far from the city. This has been done mainly to assess the difference in services vis-à-vis the proximity of the block to a major city. Shahpur block has been chosen on account of its proximity to Mumbai and Jawhar block has been chosen on account of its distance. Also, the NGO operationalizing the scheme is located in Jawhar block, hence one would be able to understand the difference in the implementation of the programme depending upon the location of the private service provider.

Two PHCs from each block were then chosen by random sampling. In Shahpur, Vashind and Shendrun PHCs were selected, while in Jawhar, Sakarsheth and Jamser PHCs were chosen. At the PHC level, the sickle cell volunteer was interviewed along with the Medical Officer, Technician, ANM and other staff involved in the programme. Interviews were also conducted with the OPD patients who had been tested at the PHC for the disease. Further, two villages were chosen from each block - one near the PHC and one located at a distance from it. This was done to assess the difference in the levels of awareness in the two villages, and thus the penetration of the programme in interior villages. In Shahpur, Aasangaon village was chosen because of its proximity to a PHC and Nandgaon was chosen for its distance from one. In Jawhar block, Chalatwad village was chosen as it is very close to the Sakarsheth PHC and Adkadak village was chosen as it is far from one. Hence, a total of four PHCs and four villages were chosen from two blocks of the district. FGDs were conducted with beneficiaries and non-beneficiaries of the programme in each of the four villages, with the sole purpose of assessing the outcome of the programme by comparing the responses of the two groups in terms of awareness about the disease. Here, beneficiaries refer to people who have undergone testing for the disease. Key informant interviews were also conducted with the Sarpanch, AWW, ASHA, school teachers, etc. of these villages to substantiate the findings of the FGDs. Exit interviews were also conducted with patients having undergone the Solubility test at the four chosen PHCs, namely, Vashind and Shendrun in Shahpur along with Jamser and Sakarsheth in Jawhar block.

Officials of the NGO (*Navoday Grameen Sanstha*) and District and State level were also interviewed in detail to understand the structure, design, implementation and evolution of the programme. While a structured interview schedule was administered to the PHC staff and OPD patients, an interview guide was administered to the officials.

2. Mobile Medical Van:

This programme was studied in two blocks: Jawahar and Mokhada. These are the only two blocks where the programme is being implemented in the district, chosen by the government mainly because of their interior and remote location, which is it's criteria for deciding the regions where mobile vans would be run. To capture the experience of the beneficiaries of the programme, a sample of four villages were chosen, two each from Jawhar and Mokhada, which are the two blocks where the programme is operational. From Jawhar block, two villages namely Aayre and Adkadak were visited by the researcher, accompanying the van on days when it goes to these villages. Similarly, from Mokhada block, Kalambgaon and Pasolidpada were covered. FGDs were conducted with the villagers residing in these villages. Furthermore, exit interviews were conducted with the patients visiting the OPD in the van. Key informant interviews were also conducted with the AWW, ASHA, school teachers, shopkeepers, and the *Sarpanch* of the villages visited, depending upon their availability.

Officials at the District and State level associated with the programme were also interviewed along with the staff of Dayanand Trust, the NGO responsible for running the programme in Thane district.

3. Service NGO scheme:

This programme is being run in just one block of the district, which is Vikramgad Block and covers 93 villages. To assess the impact of the programme on the beneficiaries, as well as to capture their experiences vis-à-vis the scheme, FGDs were conducted with married women in the age group of 20-35 years, having at least one child less than three years of age, in six villages in and around the Bhopoli centre, where the Service NGO (SNGO) is doing active work through the service of the Mobile Van. This was done to assess the impact that the SNGO has in providing ANC, PNC, Institutional delivery, immunization and family planning, etc. to beneficiaries in the block. The villages were chosen on the basis of their location. While three were located near the Bhopoli centre (Vilsheth, Tallavali and Sheel), the remaining were located further away, at a distance of 10-15 kilometres from the centre (Uparale, Satkhor and Daharje). Key people involved with the programme at the level of the NGO and officials at the State and District level associated with the programme were also interviewed with the help of an Interview guide.

Besides the providers and beneficiaries associated with each of the three programmes, key officials at the District and State level associated with the NRHM were also interviewed to assess their overall views on

these programmes, specifically on public-private partnership projects in Health in general. These officials included the Mission Director of NRHM and the officials handling different PPP projects at the State Health Society (SHS), District Health Officer (DHO), District RCH officer (DRCHO), District Programme Manager (DPM) in Thane district. An interview guide was used as a tool for carrying out in-depth interviews of these officials.

Hence, one can see that in order to understand the programme in detail, data has been collected at various levels, using multiple tools. Table 2.2 summarizes the tools used for data collection for each of the three case studies**.**

2.6.DATA ANALYSIS

Data constituted responses contained in the individual interview schedules, voice recordings of the in-depth interviews and FGDs as well as several pages of field notes and materials collected from various sources. Interview schedules had few components which were pre-coded, but most entries were open ended. For each of these components, the responses were manually listed, categorized into meaningful groups and then coded. Thus, the entire data was coded and entered into the computer.

Discussions conducted with government and NGO officials as part of the in-depth interviews were mostly in the form of digital voice recordings, which were transcribed and electronically transferred into the computer. Thus, the logged narratives of individual participants were taken through a process of hermeneutical analysis (Bruner, 1986), which refers to listing responses under various themes or categories in the discussion guide and indexing the schedule number in an excel workbook.

Responses received in FGDs were also similarly categorized on the basis of the themes. Responses of a few respondents were directly quoted to preserve the original richness of the data. Most of the quantified data that emanated from the quantitatively coded part of the individual interviews was used to support and supplement the arguments generated from the narratives. Hence, one can say that 'Triangulation'[4] or comparative analysis was used in order to verify, validate, and compare data. 'Methods triangulation' was used to discover the consistency of findings generated by different methods; for example, data derived from interviews or discussions were compared to that generated by FGDs. 'Triangulation of sources' was also used to compare data derived from key informant interviews in the villages to discussions

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[4]Data triangulation involves using different sources of information in order to increase the validity of a study. In extension, these sources are likely to be stakeholders in a programme—participants, other researchers, programme staff, other community members, and so on. It is also used to discover the consistency of findings generated by different methods (Patton,1990).

withbeneficiaries in FGDs, or that derived from the government officials with key people of the private partner.

In addition, a variety of data including the researcher's observations in the field, photographs taken, and materials gathered, other than the data collected through the tools, have all formed an inter-connected data system and has added to the richness of this dissertation.

2.7. CHALLENGES FACED DURING THE STUDY

The major challenge that was faced by the researcher during the entire course of the study was in terms of language, as she is not familiar with the language Marathi. Hence, the researcher had to be accompanied by an interpreter during all visits to the villages.

Difficulty was also faced due to the interior locations of the villages where the chosen PPP projects are operational. Most of these were not connected by means of public transport, as a result of which the researcher had to hire a private vehicle for the field work, which proved to be very expensive.

The most difficult part of the study, however, was to obtain permission for collecting data for the study from the Mission Director, NRHM, Maharashtra. Procurement of this letter took almost a year and involved several visits to various officials in the State Health Society, Maharashtra. Fortunately once this letter was attained by the researcher, officials at each step cooperated for the study.

The researcher also faced some resistance from the private partners of the chosen PPP projects who initially felt that the research is a part of the government's evaluation. This misunderstanding was created mainly because the researcher's letter was signed by the Mission Director NRHM and also, she was introduced to the private partners through the government officials at the District Health Society, Thane. Once the private partner was convinced that this was not the case, they were happy to share information with the researcher.

2.8. LIMITATIONS OF THE STUDY

Some of the limitations of this study have been mentioned below:

- Due to time constraints, the researcher could not collect primary data from across various states and from different districts within the state of Maharashtra. For these, she had to rely upon secondary data. Primary study across different states as well as districts of Maharashtra would have enhanced the richness of this study. A large scale study covering two or three districts in different states of India would help in presenting a wider picture on PPPs operating under NRHM.
- Due to time constraints, the researcher was unable to cover more villages where the programmes are running to assess its outcome and to understand the experience of the beneficiaries of the programme. A larger sample size would have helped in getting a more representative sample.

- Generalization on Public-Private Partnership projects on the whole is not possible on the basis of the case study of three projects.

Table 2.2. Tools used for Data Collection at various levels for the three chosen programmes

S. No.	Programme	Area of Study	Levels	Respondents	Tools used
1.	Sickle Cell Disease Control Programme	2 PHCs (Vashind & Shendrun) from Shahpur Block & 2 PHCs (Jamsar & Sakarsheth) from Jawhar Block. Two villages one near the PHC and one far from the PHC from each block for the study of beneficiaries. Shahpur: Aasangaon (near)and Nandgaon (far); Jawhar: Chalatwad (near), Adkadak (far)	NGO (Navoday Grameen Sanstha)	NGO President: Mr. Kotwal,Programme Officer: Miss Bhawana	Interview Guide
			Village Level	10 Beneficiaries and non-beneficiaries and Key informantssuch as Sarpanch, ANM, AWW, school teachers, shopkeepers, etc. in each chosen village.	Focussed Group Discussion Structured interview schedule
			PHC level	Medical Officer, ANM, Lab technician, NGO volunteer, Exit Interviews with 10 OPD patients in each PHC.	Structured interview schedule
			Block level	Block Medical Officers of Shahpur & Jawhar Blocks	Interview Guide
			District Level	DHO, DPM, DRCHO, District Coordinator of the Programme	Interview Guide
			State Level	MD, NRHM-Dr.Vikas Kharge, State level Coordinator: Dr. Tayde, Quality Control Officer: Ms. Saranya	Interview Guide
2.	Mobile Medical Unit	Aayre and Adkadak from Jawhar blocks, Kalambgaon and Pasolipada from Mokhada blocks	NGO (Dayanand Charitable Society)	Staff of the trust responsible for the administration of the programme at the level of NGO & staff of the van	Interview Guide
			Village Level	10 Villagers Key informants like Sarpanch, ANM, AWW, school teachers, shopkeepers, etc. in each chosen village. Exit Interviews with 10 patients accessing the services in each of the villages.	Focussed Group Discussion, Structured Interview Schedule
			Block Level	Block Medical Officer of Jawhar and Mokhada blocks.	Interview Guide

			District Level	DHO, DPM, DRCHO, Monitoring & Evaluation Officer coordinating the programme	Interview Guide
			State Level	MD, NRHM-Dr.Vikas Kharge, State Level In charge of the programme: Mr. Jadhav, IAS Officer, Programme Officer: Mr. Arun	Interview Guide
3.	Service NGO	Sixvillages in and around the MLDTs centre at Bhopoli: Vilsheth, Tallavali and Sheel (near the centre) & Uparale, Satkhor and Daharje (far from the centre)	NGO (MLDT Bhopoli centre)	Director: Dr. Goda, SNGO Coordinator: Mr. Naresh Dhanwa, Medical officer SNGO: Dr. Sayyed, MPW supervisor, MPWs, CHVs, Staff of the van.	Interview Guide
			Village Level	10 Married women in the age group of 20-35years having at least one child less than three years of age in each village	Focussed group discussions
			Block Level	Block Medical Officer of Vikramgad Block, Medical Officer of Krunze PHC, ANM of Bhopoli sub-centre	Interview Guide
			District Level	DHO, DPM, DRCHO	Interview Guide
			State Level	MD, NRHM-Dr.Vikas Kharge ,Additional Director, State Health Society, Pune- Mr. Umesh Mohad, Training Coordinator, Regional Resource Centre, Family Planning Association of India, Mumbai- Mr. Subhas Khake	Interview Guide

CHAPTER III

Public-Private Partnerships under the NRHM: An Interstate Analysis

The National Rural Health Mission (NRHM), launched by the Prime Minister of India on 12th April 2005, seeks to provide accessible, affordable and quality health care to rural populations, with special focus on 18 states, namely, Arunachal Pradesh, Assam, Bihar, Chhattisgarh, Himachal Pradesh, Jharkhand, Jammu & Kashmir, Manipur, Mizoram, Meghalaya, Madhya Pradesh, Nagaland, Orissa, Rajasthan, Sikkim, Tripura, Uttaranchal and Uttar Pradesh. As mentioned in the study done by GOI & IIPS (2009),
"*The mission aims to achieve infant mortality rate (IMR) of 30 per 1000 live births, maternal mortality ratio (MMR) of 100 per hundred thousand live births and total fertility rate (TFR) of 2.1 children per woman by the year 2012. To achieve these goals, the Mission envisages to increase spending on health care from 0.9 percent of the GDP to 2-3 percent of the GDP during 2005-12. The Mission has undertaken several architectural corrections of the health system to enable and promote policies that strengthen public health management and service delivery within the country. The mission further envisages to revitalize the health systems through decentralized management at the local level and addresses issues related to sanitation and hygiene, nutrition, safe drinking water, women and vulnerable groups, and regional disparities in health care provisions*" (p. 2).

The NRHM uses Public-Private Partnerships as an important strategy for achieving the public health goals of providing quality health care which is affordable and accessible to the majority, especially those residing in the rural interiors. This chapter attempts to map out various PPP projects present in the country under NRHM. PPP projects have been looked at in five high focus and three non-high focus states, mainly to analyse the nature of these partnerships, the levels of care as well as the providers, both 'for-profit' and 'non-profit'.

NRHM also talks about the regulation of the private sector as 75% of health services are currently being provided by it. The regulation needs to be transparent and the regulatory bodies need to be reformed or created wherever necessary. The NRHM Mission document mentions that guidelines for PPP in health sector needs to be developed and the public sector needs to play the lead role in defining the framework and sustaining the partnership (NRHM, 2005). This in itself defies the very notion of an ideal partnership, wherein both the partners should be equally involved in designing and implementing the partnership programme. However, this might have been mentioned mainly to ensure that the state is involved in the provisioning of health services. Another statement in the document which tries to ensure the participation of the government in the health programme is that,
"*Public-Private Partnership under National Rural Health Mission would not imply transfer of government responsibility of providing health care, but instead means synergizing the efforts of the private sector to provide quality, accessible and affordable comprehensive health care facilities to people*" (cited in Baru, 2005, p. 20). The document also mentions that,

"*PPP initiatives are intended to improve access to good quality health care services, promote exchange of skills and expertise between the public and private sector and mobilize additional resources for healthcare activities. These initiatives seek to improve the availability as well as efficiency of healthcare services by filling the gaps in the existing health systems and at the same time widening the range of services and number of service providers by inviting the private sector to complement the functioning of public healthcare providers"* (Ibid, p. 21).

Hence, even the NRHM document expects the private sector to complement the public sector in enhancing its range of services. However, how far this is really happening is questionable. This study seeks to examine these aspects through an in-depth case study of selected PPP projects in Thane district of Maharashtra.

A task force on PPPs, set up to advice the government, recommended that PPP is a useful strategy for meeting the massive requirement for resources, manpower and management capacity under the NRHM. The report emphasized that the purpose of PPPs should be to contribute to the goal of providing basic healthcare to all citizens of India, and that super-speciality services were therefore not to be considered under PPPs. Regulation of the private sector and placing quality-control and accountability mechanisms were also highlighted by the report (NRHM, 2009). Baru (2005) in her analytical paper on PPPs in NRHM has also raised concerns regarding the availability and quality of private sector for these partnership programmes, mainly because NRHM is operational in some of the poorest districts of the country, where the formal private sector is virtually absent.

The reason for enlisting PPP as an important strategy for implementing the Public Health Goals under NRHM is the lack of capacity in the high focus[5] states to implement multiple tasks rangingfrom preparations of district plans to running of mobile medical units. This coupled with huge inflow of funds from Government of India (GOI) along with a pressure to increase the spending on health under NRHM necessitated partnerships with the private sector (Gupta, 2009). As mentioned by Gupta (2009),
"*National Rural Health Mission brought an influx of funds which was unprecedented. The funds available through the treasury route has a huge salary component and the second largest component is for the construction of health facilities, but RCH-II came with restrictions of no new constructions and administrative cost (including salaries of programme managers to be restricted to 8%), which left a huge sum unutilized as most of the high focus states did not have the capacity to utilize the funds. The huge funds coupled with few hands to utilize them served as the starting point of PPP initiatives"* (p. 2).

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[5]The NRHM gives special attention to 18 states as they are the ones with weak public health indicators. These states are referred to as high focus states, while the rest are referred to as non-high focus states.

All PPP initiatives, under NRHM across states, were started with an aim to increase accessibility of health services, which otherwise was not possible for the state governments because of paucity of funds and human resources. NRHM provided an unprecedented flexibility in planning and execution and also encouraged innovative ways to improve service delivery. The structure of the State Health Society created to implement NRHM facilitated faster decision making. The government system required a decision to go through minimum six to seven levels, whereas in Society structure it was barely two to three. These factors led to planning of many projects within a short span of time, majority of which were executed in PPP mode. In a small period of time, many PPP projects were planned and implemented simultaneously (Ibid).

Hence post NRHM, many PPP projects were initiated in various states. In many states, the PPP projects that existed pre NRHM were merged with it.

3.1. PPPs UNDER NRHM ACROSS STATES

PPP projects like Community Based Monitoring, Mobile Medical unit, Accreditation of Private Specialists for Institutional delivery under JSY, Contracting of PHC, Ambulance services through Emergency Medical Services and transport services for pregnant women are being implemented in almost all the states following the same standard guidelines. However, different states have also developed their own specific projects to cater to their area specific needs. The section below describes the PPP projects under NRHM in five high focus states, namely, **Bihar, Orissa, Rajasthan, Madhya Pradesh and Assam** and three non-high focus states namely, **Kerala, Tamil Nadu and Maharashtra**. These states have been chosen purposively depending upon the availability of literature. Since the high focus states under NRHM are more than the non-high focus states, hence for the purpose of this study, more high focus states have been chosen in comparison to the non-high focus states. Data has been collected through the NRHM Programme Implementation Plans (PIPs) of each state. Table 3.1. provides an overview of the PPP projects present across states and the following section talks about them in detail.

Table 3.1: PPP projects under NRHM in five high focus and three non-high focus Indian States

S. No.	State	Type of State	Levels of Care	Name of Partnership	Type of Partnership
1.	Bihar	High Focus	Primary	Janani Scheme, operation of ambulance, Mobile Medical Units, running additional Primary Health Centres, alternative system of vaccine delivery	All are based on Contracting Model, except the Janani scheme which is based on Social Franchising
			Secondary	Outsourcing of hospital maintenance, running state and district data centres, Provision of office equipment, preparation of District Action Plans, provision of pathology and diagnostic services, contracting private specialists, sterilization services, Emergency Medical Services	
			Tertiary	Hospital maintenance, provision of pathology and diagnostic services, contracting private specialists, sterilization services, 102 ambulances-Emergency Medical Services, 1911- doctor on call	
2.	Orissa	High Focus	Primary	Contracting of Primary Health Centres, the Mother NGO and Service NGO scheme, Urban Health Centres for slum population, Janani Express,Health Advocacy through NGO networks and social marketing of contraceptives through CBD approach, Mobile Medical Unit.	All are based on Contracting Model. Only in the case of accreditation of private institutions for JSY scheme, cross subsidization occurs.
			Secondary	Running CHC under PPP, accreditation of private hospitals for JSY scheme	
			Tertiary	----	
3.	Rajasthan	High Focus	Primary	Mobile Medical Unit, Mid-Day Meal Scheme	All are based on Contracting Model. Only in the case of accreditation of private institutions for JSY scheme, cross subsidization occurs.
			Secondary	Diabetic Centre at Bikaner, Emergency Medical Relief Institution, Accreditation of private institutions under Janani Suraksha Yojana	
			Tertiary	Facilitation of private providers for setting up speciality and super speciality clinics, Rajasthan Medical Relief Society	
4.	Assam	High Focus	Primary	Mobile Medical Unit	All are based on Contracting Model.
			Secondary	Accreditation of Charitable Hospitals, Tea Garden Hospitals	
			Tertiary	---	
5.	Madhya Pradesh	Non- High Focus	Primary	Mobile Medical Unit, Janani Express, Vijaye Raje Janani Kalyan Yojana, Janani Suraksha Yojana	All are based on Contracting Model except Vijaye Raje
			Secondary	Rogi Kalyan Samiti, Emergency Medical Services, Janani	

				Sahyogi Yojana	Janani Kalyan Yojana and Janani Sahyogi Yojana, which are based on cross subsidization.
			Tertiary	Rogi Kalyan Samiti	
6.	Kerala	Non-High Focus	Primary	Mobile Medical Units and Mother NGO scheme	All are based on Contracting Model.
			Secondary	Kerala Emergency Relief Service Project	
			Tertiary	---	
7.	Karnataka	Non-High Focus	Primary	Karuna Trust, Community Health Insurance Scheme, *Yeshaswini* Scheme	All are based on Contracting Model.
			Secondary	----	
			Tertiary	Integrated Tele-medicine and Tele-health Project, partnership with Rajiv Gandhi Super Speciality Hospital in Raichur and Apollo Hospital groups and Karuna Internet Assisted Diagnosis for Retinoplasty (KIDROP)	
8.	Maharashtra	Non-High Focus	Primary	Vadu Rural Health Project, community based monitoring, Health Advise Call Centre, Sickle Cell Disease Control Programmeme, Mobile Medical Unit, MNGO/SNGO scheme, Palliative Care Project & Impact India project in Thane district.	All are based on Contracting Model except accreditation of private hospital for JSY scheme which is based on cross subsidisation.
			Secondary	Emergency medical and referral services, organization of specialist medical and dental camps through medical colleges in Tribal hospitals, organization of Epilepsy camps with the help of Epilepsy Foundation Mumbai, involvement of private specialist organization for providing specialists, Health Advice Call Centre, Accreditation of private hospitals for JSY scheme.	
			Tertiary	----	

Sources:
1. NRHM PIP of the various states
2. Gupta, M. (2009)
3. Government of Maharashtra (2007)
4. www.mohfw.nic.in
5. www.nrhm.maharashtra.gov.in

Bihar

One of the earliest state governments to start public-private partnerships after the announcement of NRHM was Bihar. Most of these partnerships occur at the primary level, which includes *operation of ambulance services, Mobile Medical units, running of additional primary health centres, IEC/awareness campaigns,* etc. A popular PPP project that existed in the state pre-NRHM, and which has now been merged with the NRHM is the *Janani scheme,* which aims at providing primary level of care in the area of RCH.

PPP projects that exist at the secondary and tertiary levels include *outsourcingof hospital maintenance*, *running of state and district data centres, provision of office equipment and preparation of District action Plans*. The *provision of pathology and diagnostic services*[6], *contracting private specialists, sterilization services, 102 ambulances-Emergency Medical Services, 1911- doctor on call* are also included at these levels.

Most of the earlier initiatives in Bihar were based on 'contracting' model (mostly by contracting out and a few by contracting in). Only the *Janani* scheme is based on the social franchising model. This model received a lot of attention at the Centre and State level. It was hailed as a successful model by the media, since it made services accessible in remote areas. A recent PPP initiative at the primary level called '*Alternative system of vaccine delivery'* was also launched under the aegis of NRHM. It engaged local people with bikes to provide services as privatecarriers, to carry vaccines from PHCS to the ANMs at sub-centre. On the days of immunization, which occurs twice in three weeks, these private carriers use their bikes to collect vaccines in cold boxesfrom PHCs early in the morning to transport it to ANMs at sub-centres. In the evening, they collect theremaining vaccine and immunization report and take it back to the PHC. One person is allowed to cater toa maximum of four sub-centres and is paid Rs.150 per sub-centre. Though this initiative experiencesproblems every year due to delay in payment to the carriers, it is said to have helped in saving timeand effort of the ANMs who otherwise had to collect vaccines themselves. It was assumed that the time andeffort saved will be used in catering to children and women (Ibid).

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[6]According to the 6th Common Review Missions Report the early attempts at outsourcing for diagnostics and facility management attempted in Bihar and other states, have either not survived or demonstrated success as yet. The cause may be the poor contract design or mismatch with existing systems (NRHM 2012).

Orissa

Public- Private Partnerships have emerged as an important strategy for health sector reforms within the state of Orissa. Initiatives have been taken by NRHM and the Department of Health & Family Welfare of the state to undertake different PPP initiatives, mainly to meet the growing needs of health services which include RCH-II and other National Health Programmes like Malaria, TB, etc. The existing NGO Cell of the department has been revamped and strengthened to function as NGO-PPP Cell under NRHM, Orissa. Further, to augment the PPP initiatives, a Regional Resource Centre (RRC) has been established to provide technical support for PPP – NGO activities in the State. Orissa PPP policy in Health Sector has also been drafted, besides guidelines on PPP in PHC management, PPP in Urban Health, PPP in Malaria Control, etc. ('Public-Private Partnership', May 2012). Most of the partnership programmes in the state exist at the primary level of care, which includes *Contracting of Primary Health Centres, the Mother NGO and Service NGO scheme, Urban Health Centres for Slum Population, Janani Express, Health Advocacy through NGO Networks, Social marketing of contraceptives through CBD approach*. Each of these has been discussed in detail in the section below. Some other forms of PPP initiatives at the primary level established more recently within the state include *Mobile Medical Units, Sponsoring SC / ST students for GNM Course – Swasthya Sevika Nijukti Yojana and Build – own – operate (BOO) model for Diagnostic Centres.* At the secondary level, projects such as *running CHC under PPP* and *Accreditation of private hospitals for JSY scheme* have been established (Ibid).

One of the most common forms of PPP that exists within the state and is proving to be quite successful is contractingof some of the worst Primary Health Centres to private partners, mostly NGOs. In such an arrangement, the government provides the building and all its equipment, furniture, and supplies. It also pays for staff salaries and medicines annually as per the government norm. The NGO receives the facilities and uses its own funds for whatever is needed, including renovation, equipment, furniture, and beds. The NGO hires all staff, provides training as needed, and handles procurement. While the government bears 90% cost of the project, the NGO is expected to bear at least 10%. This project was inspired by the Karuna Trust model in the state of Karnataka, which has been discussed in the section specific for that state.

Other forms of PPP projects that exist within the state include*Mother NGO (MNGO) – Service NGO (SNGO) Programme,*where the government partners with a network of NGOs in providing RCH services. As of December 2007, the state had 17 MNGOs and 97 Field NGOs (FNGOs) working in 207 sub-centres of 21 districts of the state providing RCH services to a population of about 13,00,000. In addition to this,

there were two SNGOs targeting a population of about two lakh. Besides regular activities, the MNGOs are also involved in capacity building of ASHA workers.

Urban Health Centres for Slum population: Under this scheme11 Urban Health Centres (Tier one Urban Health Centre) have been started through NGOs in Rourkela, Balasore, Bhubaneswar, Sambalpur and Cuttack, covering about 3,50,000 in slum population. This PPP model involves partnership between Orissa Health & FW Department and qualified NGOs to serve the urban slum population. The NGOs have hired their own staff and are providing all required primary health services, including outreach.

Janani Express: This programme has been launched mainly to encourage institutional deliveries by making transport facility available for pregnant women round the clock. The scheme is being implemented in 124 blocks where the delivery load is 50 and higher on a monthly basis. The vehicle used for transportation is available at government hospitals, community health centres, primary health centres and other such suitable places in the respective blocks. PPPs also exist within the Malaria control programmeme wherein a partnership has been established with 42 NGOs in six districts namely Angul, Keonjhar, Sundargarh, Mayurbhanj, Kandhamal, Nawarangpur. In Dhenkanal, the Japan Bank for International Corporation (JBIC) has provided Rs. 43 lakhs to the district for Malaria Control Programme. In other districts, more than 62 NGOs including MNGOsand FNGOs have been involved in Malaria Control.

Besides this, 17 *private NGO hospitals have been accredited*by the district health society of various districts within the state, to conduct Institutional Delivery. JSY money of Rs. 1,500 per delivery is being provided to accredited hospitals for conducting institutional deliveries for women below poverty line. The achievements in terms of institutional delivery, including C-Section operation at accredited hospitals has increased remarkably due to the scheme. PPP is also seen in health institutions wherein cleaning and security services have been outsourced to private partners. The District Head Quarter Hospitals, Capital Hospital, Rourkela Government Hospital, etc. have been outsourced to private agencies for cleanliness and security services. There has been visible improvement in the cleanliness level and security in all the above hospitals through PPP initiatives. ‘Help Desks for Patient’ are also being established in these health institutions under PPP to provide quality and timely services to people especially the poor segment (Ibid).

Rajasthan

The earliest form of PPP that existed within the state of Rajasthan was at the tertiary level of care which included the *facilitation of private providers for setting up specialty and super specialty clinics,* by providing subsidies in the form of land and medical equipment. The private partner, in turn was obliged to provide free services to the poor (Bhatt, 2000).

Rajasthan Medical Relief Society (RMRS) is one of the older PPP models within the state which aimed at generating alternate sources of financing in hospitals through user fee and in hospital pharmacies. This strategy was first started in a tertiary level hospital, SMS hospital, Jaipur and the success in this hospital led to its replication in other medical colleges, district hospital and sub-divisional hospitals. The SMS hospital established a Life Line Fluid Drug Store to contract out low cost, high quality medicine and surgical items on a 24-hour basis inside the hospital. The agency to operate the drug store was selected through bidding. The contractor appointed and managed remuneration of the staff from sales receipts. The SMS hospital shared resources with the drug store such as electricity, water, computers for daily operations, physical space, stationery and medicines and provided all medicines to it. The contractor provided all staff salaries, daily operations and distribution of medicine, maintenance of records and monthly reports to SMS Hospital. Through this project, the contractor gained substantial profits, expanded his contacts and gained popularity, but at the same time, it had to abide with the rules and regulations of the contract document.

The SMS Hospital has also contracted out the installation, operation and maintenance of CT-scan and MRI services to a private agency. The agency is paid a monthly rent by the hospital in lieu of free services to 20% of the patients belonging to the poor socio-economic categories (GOI, 2006). The success of this model led to the creation of several PPP projects in government medical colleges within the state, where the contract of diagnostic testing like MRI and CT scan is given to private partners. Other terms and conditions in these contracts are similar to that which exists in the case of SMS hospital. At present, these existing partnership programmes have come under the purview of NRHM, and newer PPP projects like *Mobile Medical Unit* and *Mid-Day Meal Scheme* have come up at the primary level. Most of these programmes are also found in other states. At the secondary level, PPP projects like setting up of a *Diabetic centre* in Bikaner, *Emergency Medical Relief Institution* and *Accreditation of private institutions under Janani Suraksha Yojana* have come up (SIHFW, 2008).

Emergency Medical Relief Institution (EMRI) is a call centre within the state which aims at providing emergency care with private sector efficiencies. People in need can call the centre and an ambulance, which has all medical facilities, is made available to them. The capital cost for purchase and equipping the ambulances, land and building of the call centre, was provided by the Government of Rajasthan under NRHM funds. Hence, the state is well endowed with PPP projects which are found to exist across all levels of care. Besides, Rajasthan is the only state to have an external committee to inspect, visit, review and monitor any PPP project, regarding its implementation, execution, operation and management. These are called the Public-Private Partnership Appraisal Committee (PPPAC) (Ibid).

Partnership with the private sector also exists for the implementation of *Janani Suraksha Yojana* wherein private hospitals are accredited by the District Health Societies to provide deliveries to BPL women free of cost. The empanelled private institution is in turn reimbursed an amount of Rs. 1,500 per delivery.

Assam

According to NRHM, one of the most successful PPP projects in the state of Assam is the *Mobile Medical Unit* which, like the other states, aims to provide primary health services to the unserved and underserved areas of the state. This scheme was started in 2007 in 10 districts and now covers the entire state. The programme is also being run in the form of Boat clinics in the riverine islands. The scheme which was fully functional in fivedistricts in 2008, is now providing preventive and promotive services in the *char* areas of ten districts - Dibrugarh, Tinsukia, Morigaon, Dhemaji, Dhubri, Nalbari, Barpeta, Jorhat, Sonitpur, and Lakhimpur (Department of Health & Family Welfare, Govt. of Assam, 2007). The NGO partner for the scheme is Centre for North East Research and Policy Reforms, which is an NGO. In addition to these *Accreditation of charitable hospitals* is another PPP initiative within the state under NRHM. Government of Assam has also entered into partnership with *Tea garden hospitals,* wherein 60 hospitals were taken in the first phase and another 150 hospitals were included in 2008-09 (Rao, 2009). While the MMU occurs at the primary level of care, the other two projects occur at the secondary level of care.

Madhya Pradesh

The earliest form of PPP in the state was '*Rogi Kalyan Samiti' (RKS),* which loosely translates to '*Patients Welfare Society'*. The RKS seeks partnership of all concerned actors at the local level, to raise funds for the upkeep of secondary and tertiary public hospitals and, in turn, ensures their participation in the management of health services. This includes administration at the local level, charitable organizations, donors, leading citizens of the area, people's elected representatives as well as hospital

staff. The Madhya Pradesh scheme of PPP is all the more unique in the sense, that unlike other states, where partnership has been sought from market forces (excepting the areas where NGOs are involved), the RKS seeks direct involvement of the users (people) and service providers (doctors, para-medicos) in running the public hospitals (Kumar, 2003). RKS now forms a part of NRHM. While RKS operates at secondary and tertiary level of care, a plethora of new PPP projects have come up within the state under the umbrella of NRHM. They are mostly in the area of maternal health and child health. Some of these also work upon providing extra benefits to BPL families. While *Mobile Medical Unit, Janani Express, Vijaye Raje Janani KalyanYojana* and *Janani Sahyogi Yojana* occur at the primary level, schemes such as *Emergency Medical Services* and *Janani Sahyogi Yojana* operate at the secondary level.

Vijaye Raje Janani Kalyan Yojana is an innovative scheme being run in the state where the BPL pregnant women are given services like free normal delivery in accredited private hospital, Rs. 1,000 discount on Caesarean on the prefixed price in a private hospital, Rs.1,000 in case of institutional delivery in government hospital, compensation of Rs. 50,00 in case of death during delivery or causes related to pregnancy and delivery and coverage of Rs. 1,000for expenses related to an abortion of more than 16 weeks. This is being implemented in partnership with United India Insurance Co. Ltd. which mainly ensures the timely settlement of claims. The state government has borne the cost of premium of Rs. 11 per BPL Family.

Under *Janani Sahyogi Yojana,* government has entered into a partnership with several private and NGO hospitals, which are reimbursed for the delivery and services to the new born on a case-to-case basis. This scheme is mostly to increase institutional deliveries (Govt. of Madhya Pradesh, 2007).

Kerala

A look at the NRHM PIP (2011-12) of the state of Kerala shows the presence of partnership programmes in the form of *Emergency Medical Services, Mobile Medical Units* and *Mother NGOscheme*. While the Mobile Medical Unit and Mother NGO schemes provide primary level of care, Emergency Medical Services provide secondary level care. All these programmes are being implemented in a fashion very similar to the other states. The emergency medical services also known as the *Kerala Emergency Relief Service Project (KEMP)* were started on a pilot basis in 2010, mainly to provide health services to patients in times of emergencies such as road accidents, pregnancy problems, suicides, asthma attacks, snake bites, epidemics and natural disasters.

The *Mother NGO* scheme initiated in the state in 2007-08, aims at complementing the government health system in providing the goals of RCH in the unserved and underserved areas of the district. Under RCH II, 11 MNGOs were selected in 14districts of the state. Among these, nine MNGOs completed three years of intervention. Newer NGO programmes have been proposed for these nine districts for the year 2011-12.

Another PPP initiative of the state, which is also being implemented in other states, is the *Mobile Medical Unit,* which aims at providing free health care services predominantly in the tribal and hilly areas of the state since they lack basic health infrastructure. *Floating Dispensary*, an extension of this scheme, is an innovative step of National Rural Health Mission in Kerala, to bring health care professionals and services to the people of the island panchayats of Ernakulam and Alapuzha districts. Besides this, the *TeleMedicine* project is also being implemented in a PPP mode within the state (Government of Kerala, 2011).

Karnataka

The State of Karnatakaboasts of some of the most innovative PPP projects, most of which were initiated much before the introduction of NRHM. One sees a good mix of partnerships present at the primary as well as tertiary levels of care. However, the researcher could not come across any partnership programme at the secondary level of care, even though it might be present within the state. At the primary level, partnership programmes such as the *Karuna Trust, Community Health Insurance Scheme* and the *Yeshaswini Scheme* are present. At tertiary level, schemes like '*Integrated Tele-medicine and Tele-health Project'(KITTH),Partnership with Rajiv Gandhi Super Speciality Hospital in Raichur and Apollo Hospital groups* and *Karuna Internet Assisted Diagnosis for Retinoplasty (KIDROP*) are present. Details of these schemes have been mentioned in the section below.

The earliest form of PPP project within the state started when the Government of Karnataka contracted with the *Karuna Trust* for managing Primary Health Centres in Gumaballi and Sugganahalli in 1996. This PPP project serves as a model in terms of contracting out of the management of a PHC to a private partner and has been replicated in many other parts of the nation. The project has been described by Annigeri et al. (2004) as one of the most promising models of PPP within the country. 90% of the cost of this project is borne by the government and 10% by the trust. Karuna Trust has full responsibility for providing all personnel at the PHC and the Health Sub-centres within its jurisdiction, maintenance of all assets at the PHC and addition of any assets if required at the PHC. The agency ensures adequate stocks of essential drugs at all times and supplies them to patients for free. No patient is charged for diagnosis, drugs,

treatment or anything else, except in accordance with the Government policy. The staff salaries are shared between the government and the Trust (GOI, 2006).

Another very old PPP project within the state is the *Community Health Insurance scheme,* which was also launched by the Karuna Trust in collaboration with the National Health Insurance Company in 2001. The scheme covers Yelundar and Narasipuram talukas, and undertakes the responsibility for improving the access and utilization of health services to prevent impoverishment of the rural poor due to hospitalization and health related issues. The scheme is fully subsidized for Scheduled Castes and Scheduled Tribes who are below the poverty line and partially subsidized for non-SC/ST BPL. The field workers and health workers working with the project make door-to-door visits to identify poor patients and make them aware about the scheme. They also collect insurance premiums from them and deposit the same in the bank (GOI, 2006).

Another health insurance scheme within the state is the *Yeshaswini Co-operative Farmer's Healthcare Scheme*. The scheme was initiated by Narayana Hrudayalaya, a super-specialty heart hospital in Bangalore, and by the Department of Co-operatives of the Government of Karnataka. The Government provides a quarter (Rs. 2.50) of the monthly premium paid by the members of the Cooperative Societies, which is Rs.10 per month. The incentive of getting treatment in a private hospital with the Government paying a quarter of the premium attracts more members to the scheme. The cardholders of the scheme can access free treatment in 160 hospitals located in all districts of the state, for any medical procedure costing up to Rs. 2 lakhs. Another successful PPP project run in collaboration with the same private partner, is the *Integrated Tele-medicine and Tele-health Project (KITTH).* The other partner in the scheme is the Indian Space Research Organization. With the help of satellite connections, the project functions in the coronary care units of selected district hospitals that are linked with the hospital (Ibid).

Another PPP project that exists within the state is between the *Rajiv Gandhi Super-Specialty Hospital in Raichur Karnataka and the Apollo Hospitals group*. The programme aims at providing super specialty health care to people below the poverty line. This programme is an example of multiple partnerships with transnational linkage, wherein the land and hospital building, staff quarters, road, water and other infrastructural facilities are provided by the government, while Apollo provides fully qualified, experienced and competent medical facilities for operating the hospitals. Financing for this programme is provided by the Organization of Petroleum Exporting Countries (OPEC). Apollo is also responsible for the maintenance of the hospital premises and buildings. It also maintains a separate account for funds generated by the hospital from fees for registration, tests and medical charges. A Governing Council

reviews the performance of the hospital periodically (twice a year) and provides recommendations in areas of administration and dispute resolutions (Ibid).

Hence, one can see that in the state of Karnataka, the same private partner has been involved in more than one project. Post-NRHM, most of these existing projects were merged with NRHM and newer programmes have been introduced. However, there is a paucity of literature pointing out which of the above mentioned projects are being continued under NRHM or even about on-going projects under NRHM within the state. An innovative project being run under NRHM within the state is *KIDROP(Karuna Internet assisted diagnosis for retinoplasty).* According to e India, 2012,
"*The project is India's first and now the world's largest Tele-medicine network to tackle infant blindness. Using cutting edge technology, an award winning, indigenously developed, customized tele-Ophthalmology platform, KIDROP screens the retinae (the nerve of the eye, which lies at the back) of babies a few days old in their rural hospitals, provides remote diagnosis of these images by experts and provides for treatment of these babies in the periphery without the need for these babies to travel to the city. All this is achieved by a team of specially trained non doctors, obviating the need of the specialist in the rural areas"* (e India, 2012).

The project focuses on the prevention of blindness by identifying the condition called Retinopathy of Prematurity (ROP), which is the leading cause of infant blindness worldwide. The project was initiated in 2008 in partnership with Narayana Nethralaya, which ranks among the top five eye hospitals in the country. After the success of the pilot project, KIDROP became a PPP since 2009, in collaboration with the National Rural Health Mission, Ministry of Health & Family Welfare and the Government of Karnataka (Ibid).

Maharashtra

In contrast to the high focus states where PPP projects in health were launched quite early, that is, immediately after the launch of NRHM, the emergence of PPP in Maharashtra under NRHM has been a recent phenomenon. In fact, most PPP projects under the umbrella of NRHM are emerging now. A reason for this can be the fact that Maharashtra has been one of the better performing states vis-à-vis health indicators, and is also not a high focus state listed under NRHM. One of the oldest and most popular PPP models that the state boasts of is that of the *Vadu Rural Health Project,* which started as an outreach programme of KEM Hospital, Pune and has now developed as a unique PPP model in Maharashtra. This project was started in 1970s to cater to 22 villages in the Vadu area, 14 falling under Shirur block and eight from Haveli Block. The programme carries out all activities of a primary health centre. An

international philanthropic organization '*Shyamdasani Foundation'* has financed the construction of the hospital building. The government provides financial support for personnel, equipment and supplies while KEM Hospital manages the whole programme. Historically, the focus has been on Maternal and Child healthcare, which is now being expanded to communicable and non-communicable diseases (Deoshatwar, 2009). The programme has now become a part of NRHM and the focus is on Maternal and Child Health, mainly to achieve the NRHM targets of lowering the IMR and MMR.

Under NRHM, partnerships are mostly seen with the Non-Governmental sector in terms of providing services in the remote areas, where it is difficult for the government machinery to reach. Services range from providing *mobile medical services to remote areas,* to *providing RCH care, disease control programmes* and *even management of PHCs and sub centres*. In many instances, the state has sought partnership with the private entity, so that it can act as a catalyst towards helping people access the government schemes. These partnership projects mostly occur at the primary and secondary levels. Community Based Monitoring, Health Advise Call Centre, Sickle Cell Disease Control Programme, Mobile Medical Unit, MNGO/SNGO scheme, Palliative Care Project and Impact India project in Thane district are seen at the primary level of care. Partnerships at the secondary level include emergency medical and referral services, organization of specialist medical and dental camps through medical colleges in Tribal Hospitals, organization of Epilepsy camps with the help of Epilepsy Foundation Mumbai, involvement of private specialist organization for providing specialists, Health Advice Call Centre and accreditation of private hospitals for JSY scheme. Details of these PPP projects in the state have been mentioned above. The state is conspicuous due to the absence of partnerships at the tertiary level of care, which is unlike the trend seen in non-high focus states.

3.2. CONCLUSION

To conclude, one can say that a range of partnership projects exist in the arena of health care across states. PPPs in health sector are mushrooming across the country; especially post NRHM, as it is one of the most important strategies of NRHM. Also, enhanced funds under NRHM can be utilized best by starting new projects, for which PPPs are the easiest route as they provide enhanced manpower to do focused work on a particular issue. Additionally, PPPs help in enhancing the outreach of the programme as NGOs have more contacts with the local communities.

A closer look into these projects across states indicates that more attention is given to PPP projects in the high focus states where these projects were started when the NRHM was launched in 2005. On the other hand, in the non-high focus states, PPP projects are not a priority and most of them have been launched very recently. This can be attributed to the huge fund inflow in the high focus states, the utilization of which can happen easily through PPPs. Also, while a lot of innovative projects were seen in the high

focus states, the same was not the case in the non-high focus states, where very few PPP projects were found to exist besides the regular ones such as Mobile Medical Unit, MNGO scheme and Emergency Medical Services, which exist in all the states under NRHM. Another difference observed between these two categories of states is that while the PPP projects at the tertiary level are completely absent in the high focus states, quite a few of them occur in the non-high focus states. This can be attributed to the high levels of development in these states, as a result of which, there is a high presence of 'for-profit' specialty and super specialty hospitals which are interested in forging partnerships with the government. It is also observed that while the involvement of the 'non-profit' sector is seen most in providing the primary level of care, the 'for-profit' sector is involved in providing tertiary level care. One also observes that the most popular model seen for forging partnerships across states is the Contracting Model. In rare cases, Social Franchising and Cross-Subsidization was also seen. The following chapter closely looks at the various PPP projects being implemented in Maharashtra state under NRHM.

CHAPTER IV

Public-Private Partnerships under the NRHM in Maharashtra State and Thane District

4.1. MAHARASHTRA STATE – Demographic Indicators

Maharashtra is the second most populous state in India after Uttar Pradesh and the third largest by area in India. It is the richest state in India, contributing 15% of the country's industrial output and 13.3% of its GDP(World Bank, 2008). Maharashtra also leads the country in terms of per capita income and credit. Hence, one can say that it is one of the most developed states in the country.

The state is bound by Arabian Sea in the west, Gujarat in the north-west, Madhya Pradesh in the north and east, Andhra Pradesh in the south-east and Karnataka and Goa in the south. It consists of two major relief divisions, the plateau which is a part of the Deccan tableland and the Konkan coastal strip abutting the Arabian Sea. Geographically, historically and according to political sentiments, Maharashtra has five main regions**:** theVidharbha Region consisting of Nagpur and Amravati Divisions, the Marathwada region consisting of Aurangabad division, the *Khandesh* or Northern Maharashtra region consisting of Nashik Division, *Desh* or *Pashchim* Maharashtra Region consisting of Pune Division and the Konkan region ('Profile of Maharashtra state', 2007).

Maharashtra has an area of 307,713 sq. km. and a population of 96.88 million. During 1991-2001, the state's population grew by 22.6% which was marginally higher than the national growth rate of 21.3%. It has the highest level of urbanization among major states in India, with 42.4% of the population residing in urban areas (Census 2001). There are 37 districts, 358 blocks and 43711 villages. The State has a population density of 314 per sq. km. (as against the national average of 312). As mentioned above, Maharashtra has six revenue divisions, seven health circles, 35 districts, 354 talukas, 27920 gram panchayats, 41095 inhabited villages, 22 municipal corporations and 222 municipal councils (Ibid).

About 16.5% of the state's geographical area is inhabited by tribals, which constitutes 10% of the state's total population. In total, there are 47 scheduled tribal population groups in the state; 17 are major groups and most of them are inhabitants of the geographically difficult hilly terrain. There are three mountain ranges in the state, known as *Sahyadri*, *Satpuda* and *Gondwan* ranges. In the *Sahyadri* ranges, there are Mahadeo Koli, Katkari, Warli, Malhar Koli and Kokana groups. Among the *Satpuda* ranges, Bhil, Pawara, Korku and Tadwi are the major groups while the Madia, Gond, Pardhan, Halbi Otkar, and Andha are found in the *Gondwan* range. Out of the 35 districts of the state, 16 areconsidered to be tribal districts. According to the Maharashtra State Cooperative Tribal Development Cooperation of India, the tribal population is largely concentrated in the western hilly districts of Dhule, Nandurbar, Jalgaon, Nashik and Thane (*Sahyadri* Region) and the eastern forest districts of Chandrapur, Gadchiroli, Bhandara, Gondiya, Nagpur, Amravati and Yavatmal (*Gondwan* Region) ('Tribal Sub Plan Area', 2012).

The 2001 census places Maharashtra second in literacy among the major states, even though it's school enrolment rates for middle and secondary levels is not amongst the best. The literacy rate is 77.3% (86.3% for males and 67.5% for females), which is higher than the national average. Two areas of concern plague the state; one is food availability (rather access), which is the cause of unacceptable levels of malnourishment, and the other is the declining sex ratio, especially in the 0-6 year age-group, which is mainly due to malnutrition and sex selective abortion (Duggal et al., 2005).

4.2. HEALTH INDICATORS

In terms of health indicators, Maharashtra is considered to be a better performing state, as the Infant Mortality and Maternal Mortality within the state is lesser than the national average while the sex ratio is marginally higher. Also, the overall literacy rate (general as well as female) is much higher than the national average (Refer Table 4.1). Comparative figures of major health and demographic indicators are as follows:

Table 4.1: Demographic, Socio-economic and Health profile of Maharashtra State compared to India figures

S. No.	Item	Maharashtra	India
1	Total population (Census 2011)	11.23 crores	121 crores
2	Decadal Growth (Census 2011) (%)	15.99	17.64
3	Crude Birth Rate (SRS 2008)	17.9	22.8
4	Crude Death Rate (SRS 2008)	6.6	7.4
5	Total Fertility Rate (SRS 2008)	2.0	2.6
6	Infant Mortality Rate (SRS 2008)	33	53
7	Maternal Mortality Ratio (SRS 2004 - 2006)	130	254
8	Sex Ratio (Census 2011)	946	940
9	Population below Poverty line (%)	25.02	26.10
10	Schedule Caste population (in million)	9.88	166.64
11	Schedule Tribe population (in million)	8.58	84.33
12	Literacy rate (Census 2011) (%)	82.9	74.04
13	Female Literacy Rate (Census 2011) (%)	75.48	65.46

Source: Health Indicators of Maharashtra. Retrieved from http://mohfw.nic.in/NRHM/State/maharashtra.htm, accessed on July 2012

4.3. HEALTH SERVICES

The organization and presence of public health infrastructure at various levels within the state can be seen in Figure 4.1.

Although the state is sufficiently endowed with public health infrastructure, it is the private sector which is widely preferred by the masses, as they are considered better service providers than the public health

system. The high level of development of the state is another reason responsible for the same. Baru (1993) in her study done to compare the poorer and richer districts of Andhra Pradesh, found that the number of private institutions at the secondary level of care were skewed, and in favour of the developed districts as compared to the poorer ones. Hence the study empirically proved the relationship between economic development and the growth of private services.

This trend has also been observed across other states. Baru (2005) in her interstate analysis of the growth of private institutions since the mid-1980s observed, that the better developed states show a growth of private institutions at the secondary and tertiary levels. Maharashtra is one among several developed states which show a similar trend in terms of the growth of the private sector.

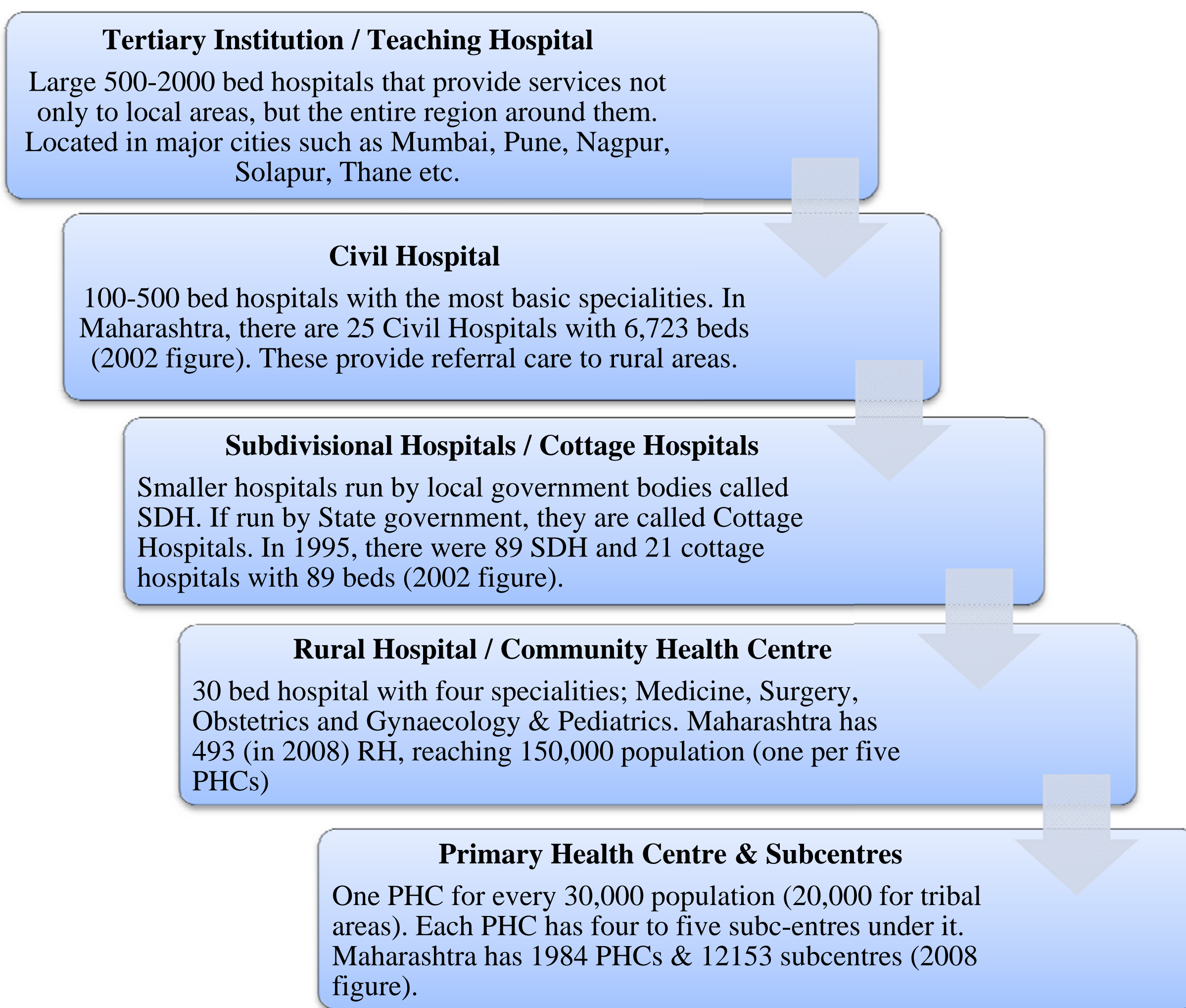
Maharashtra being a developed state has a significant number of rich and middle class populations who can afford to pay for private health services. These sections prefer private health services to the public health services as the latter is poorly equipped with staff and equipment, and is also unavailable at times. The unavailability of public health services sometimes even forces the poor to private hospitals, where the cost of treatment is several times higher (as shown by a study in Mumbai) (Dilip & Duggal, 2004). The preference for the private sector in the state has resulted in the presence of private service providers within the state. According to Maharashtra HDR, 2002, Maharashtra's private health sector is not only one of the largest in the country, but also the most developed (Government of Maharashtra, 2002). Some of the largest and most well-known private hospitals in the country are located in Maharashtra, especially in Mumbai, which mostly offer tertiary level of care. Secondary level of care is offered by nursing homes, which again, are mostly concentrated in urban areas. Baru (2006) while analysing the presence of private sector at secondary level of care across Indian states found that,
"At the secondary level of care, which consist of nursing homes, the economically developed states like Maharashtra, Punjab, Tamil Nadu and Gujarat have a higher proportion of beds in the private sector compared to the public sector" (p. 13).

While private providers offering secondary and tertiary care are concentrated in urban areas, primary level providers of private health services are distributed across both rural and urban areas. These mostly consist of individual practitioners who have been either formally or informally trained.

In Maharashtra, a few studies have also focused on the regional variations in terms of the distribution of the private sector. The more developed regions of Marathwada and Konkan have better facilities and access, as compared to the poorer region of Vidharbha (Budhkar, 1996). Budhkar observes that there has been a strong tradition of local bodies in the provisioning of health services in Maharashtra. During the

late seventies, those regions that experienced agrarian prosperity, namely Marathwada and parts of Konkan, also witnessed a spurt in the growth of the private sector at the secondary level of care. She also shows that dispensaries and small nursing homes, which are skewed in favour of urban areas, dominate the private sector. This trend was also observed in a study of the distribution of NGO's in Maharashtra, where the better developed districts were found to have a greater concentration of NGO's than the poorer ones (Jesani et al., 1986).

Figure 4.1: Public health infrastructure available in the state of Maharashtra



Hence, one can conclude that while private practitioners have penetrated to the remotest of areas, they may not necessarily be qualified or certified. Because of the poor penetration by public health sector as well as the inadequacies within it, the private health sector has cut across the masses and even the poor use it in large numbers (Duggal, 2005).

The wide preference for the private sector is resulting in its further expansion within the state. The number of private hospitals in Maharashtra has grown from 68% of the total number of hospitals in 1981, to 88% in 2001 (Deosthali et al., 2011). The two NSSO surveys of 42nd and 52nd rounds show that between 1987 and 1996, private health sector utilization in Maharashtra grew from 56% to 68% in rural areas, and 54% to 68% in urban areas for inpatient care. In case of outpatient care, the private health sector was already accounting for three-fourths share in 1987, and this increased marginally to 77% in 1996 (Duggal, 2005). Additionally, ruralMaharashtra ranks fifth in the country for thepresence of private doctors in villages, but15th among the 28 states for the ratio of numberof beds in the public sector to population (Health Information of India, 2005).

In 2005, the public sector in the state dominated only in delivering contraceptive and immunization services, while the private sector was themajor provider of other health care services, as most primary health centres and sub-centres werenot equipped to provide curative services (Duggal et al., 2005; Saha, 2005). InMaharashtra, the increase in utilization of privatehealth services grew from 84% in 1993–94 to89% in 2003–04 (NSSO, 1996; NSSO, 2004).Though the private sector is widely used by all classes, a study in Mumbai clearly showed that the non-availability of public healthcare services drove the poor to private hospitals, where the cost of treatment was several times higher (Dilip & Duggal, 2004). Among live births inMaharashtra, out of total deliveries recorded,64.6% were institutional deliveries, of which37.6% were at a private facility (NFHS-3, July 2012).

The existing private health sector within the state has further expanded by the increasing privatization of public health institutions, which first started in 1988 with a Government Resolution (GR) suggesting the levying of user charges at district hospitals. The rationale they used were the findings of the NSSO 42nd round, which revealed that even the poor used private health care services, and therefore there was a willingness to pay (Government of Maharashtra, 1997). The immediate impact of this resolution was reflected in the performance budget report of subsequent years, which showed drastic declines in OPD and inpatient users at most district hospitals. After this 'bad experience', most hospitals began to ignore the GR and it was never seriously implemented, which brought back patients to district hospitals. The user charges collected have varied from 0.1% to 0.18% of the total public health expenditure between 1989 and 1996 (Duggal et al., 2005).

Given the large presence of private health sector within the state, two major concerns need to be addressed; first is the issue of quality and minimum standards for the services provided. Studies of private institutions and providers have shown the completeabsence of any minimum standards, physical and clinical, irrational drug use, etc. The second issue is that the private health sector operates in an absolutely

unregulated fashion (Duggal et al., 2005). While the government has set-up some regulations, they are not implemented. Professional medical bodies on the other hand, have not shown any concern for regulating private practitioners. Both these issues are now being taken seriously at the level of policy makers as well as by professional groups.

Public-Private Partnerships in Health Care

Recognizing the vast presence of the private sector in the state, and the need for regulating the same, the state government has tried to utilize their resources by involving them in an appropriate Public-Private Partnership from time to time. The policy makers felt that Public-Private Partnerships would emerge as a viable alternative to private health services, which was inefficient, expensive and out of reach of the poor. According to Bhatt (2000), the focus of these public-private collaborations has been to develop strategies for utilising untapped resources and strengths of the private sector mainly to enhance the governments capacity for meeting the growing health needs, to reduce its expenditure on specialty and super-specialty care, to reduce regional and geographic disparity in healthcare provision by ensuring access and to improve efficiency through evolving new management structures.

Association with the private sector was first seen in the 1970's, in the form of collaborations of the government with the private sector for Community Health Projects mostly in the field of Maternal and Child Health Program. These projects were based on the ideology of "Peoples Health in people's hands'. Dr. Anthia, Dr. Abhay Bhang and Dr. Banoo Coyagi were some of the pioneers of these projects. These projects may not be considered as partnership and can best be called as 'Public-Private Collaborations', however they acted as starting points for the emergence of PPP projects within the state.

The earliest form of partnership (as it is deemed today)within the state emerged post the Structural Adjustment Program (SAP), after which things began to change rapidly within the health sector. In the name of Public-Private Partnership, public facilities were extended for use to private health providers. For instance, Community Health Centres (CHCs) were given to private ophthalmologists for surgical camps, public sector patients were referred to private institutions for sophisticated investigations like CT scans and MRIs, often when the concerned public institutions would have their own such facility. Nine district hospitals were leased out to private medical colleges in the state, for as small a sum as Rs. 10.8 million a year (Duggal et al., 2005). In Mumbai, the Bombay Municipal Corporation agreed on a policy initiative to privatize all peripheral hospitals and maternity homes, which are 42 institutions with nearly 6000 beds. However, local protests have prevented any such action. The BMC has still been able to successfully privatize non-clinical services and a study shows that while the unit costs went down, the quality deteriorated (Bhatia & Mills, 1997).

Apart from these, most of the earlier partnership projects were initiated with the 'non-profit' sector, mainly due to its large presence within the state. Here, by 'non-profit' sector we are referring to NGOs. In fact, among all states, Maharashtra leads in terms of the percentage of villages (34.4%) with presence of NGOs (Mahal et al., 2000). Another reason for involving NGOs in partnership programs is the fact that it is much easier to control them. Also, the NGOs contact with communities helps the government reach out to the masses, and thus meet the public health goal of equity.

One of the oldest and most popular PPP models that the state boasts of is that of the Vadu Rural Health project, which started in the 1970s as an outreach program of KEM Hospital, Pune. The program has now developed into a unique PPP model in Maharashtra. The project caters to 22 villages in the Vadu area, 14 falling under the Shirur block and eight under the Haveli block. The purpose was to establish a highly efficient, technically robust outreach program that would be implemented by the PHC, but managed by KEMH.

In this model, outreach activities of a Primary Health Centre (PHC) are financially (in terms of personnel, equipment and supplies) supported by the government. Activities include vaccinations, family planning and welfare, school health check-ups, and other national programs. The program carries out all activities that are supposed to be carried out by a PHC, except that the headquarters are run by the KEMH according to its norms. In addition, the hospital provides services of a radiologist, an ophthalmologist, a surgeon, an ENT surgeon twice a week, and occasional visits (as per requirement) by a laparoscopist and other skilled surgeons who commute from Pune. The fees are much lower than that levied by the private sector for these services (Deoshatwar, 2009).

An international philanthropic organization based in Hong Kong, 'Shyamdasani Foundation' provided additional funding to construct a hospital under this program, and has been supporting repairs and maintenance of the building on an ad-hoc basis. This actually adds to the appeal of VRHP in terms of a unique PPP, where the government collaborated with a NGO, and a privately owned funding agency provided additional financial support to create a program that would provide good quality healthcare to the rural population at affordable costs. Historically, the focus of the program has been on Maternal and Child healthcare. It is now being expanded to communicable and non-communicable diseases. The program has now become a part of NRHM and the focus is on Maternal and Child Health, mainly to achieve the NRHM targets of lowering the IMR and MMR.

The Mother NGO and Field NGO schemes launched under RCH-I in 1997 have been operational in most districts of the state, mainly to provide services in the area of Population Stabilization and RCH. The scheme is discussed in detail in Chapter VI of this thesis.

In the 1990s, other forms of PPPs that existed within the state were mostly in the form of contract given by public hospitals to private service providers for cleaning and maintenance of buildings, security, waste management, scavenging, laundry, dietary services, etc., for example, dietary services in many public hospitals run by the Bombay Municipal Corporation (BMC) in Mumbai,were either contracted in or out to private bodies (Bhatia & Mills, 1997).

The growth of Public-Private Partnership projects within the state has been sporadic after the launch of the National Rural Health Mission in 2005, since it uses public-private partnerships as an important strategy for achieving the public health goals of providing quality health care, which is affordable and accessible to the majority, especially those residing in the rural interiors. It is interesting to note that the growth of PPPs in Maharashtra, post NRHM, has happened much later when compared to other states. In fact, most PPP projects in Maharashtra have been launched in the past two to three years. A possible reason for this can be the fact that Maharashtra has been one of the better performing states vis-à-vis health indicators, and it is not a 'high-focus state' listed under NRHM.

The section below summarizes existing PPP projects in Maharashtra, with a special focus on those in Thane district, which is the main objective of this thesis. Information has been collected from primary as well as secondary sources. Primary sources include in-depth interviews with key officials of the concerned partnership program, both from the public as well as the private partner. Secondary Sources include data from official records of the State and District Health Society and other concerned offices, Memorandum of Understanding of the concerned PPP program and information from the NRHM website.

4.4. PPP PROJECTS IN MAHARASHTRA

Table 4.2. gives an overview of the existing PPP projects under NRHM in Maharashtra, particularly in Thane district. The followingsection then describes each of these projects in details.

Table 4.2: PPPs in Maharashtra under NRHM- At a Glance

S. No.	Name	Year of Initiation	Partners		Existence of MOU (Yes / No)	Level of Care	Goal	Services Provided	Area of Operation
			Public	Private					
1.	Community Based Monitoring (CBM)	2007	State Health Society	Sathi Cehat, Pune (NGO) Van Niketan-District Nodal agency for Thane district	Yes	Primary	To regulate the functioning of government health services through community participation	- Data collection (PHC & RH level) - Filling up the sub centre, PHC and RH level report cards and conveying information to higher authorities through the same. - Training & workshop - Committee meetings - Jan Sunwai & Jan Sanwad	Amravati, Nandurbar, Osmanabad, Pune, Thane (pilot phase); Chandrapur, Gadchiroli, Raigad, Solapur, Beed, Nashik, Aurangabad & Kolhapur (expanded phase).
2.	Emergency Medical and Referral Services (EMS)	2012	State Health Society	Bharat Vikas Group, Pune	Yes (in the process of development)	Primary & Secondary	To offer assistance to accident victims and other critical patients in the crucial first hour, known as the 'golden hour'	972 ambulances would be made available through a Control Room at Aundh Hospital Pune, which can be reached by a toll free number. After providing primary level care, the ambulance would transfer patients to the nearest hospital.	All across the state except within the limits of MCGM, Thane, Pune, PCMC, Nagpur, Nashik and Aurangabad Municipal Corporations.
3.	Health Advisory Call Centre (HAAC)	2011	State Health Society	Health Management Research Institute, Hyderabad	Yes	Primary & Secondary	To provide 24x7 medical advice to healthcare provider facilitating quick decisions to provide smooth, effective and qualitative health care	Health advice will be given to caller who will simply dial three-digit numbers from landline or a mobile phone. The callers would include ANMs, ASHA worker, School Health personnel and Medical Officers, who would be guided mainly for timely referrals, proper intervention and managements of the patients and effective implementation of National program.	Across the state
4.	Impact India — a. Community Health	2005	Government of Maharashtra	Impact India Foundation	No (partnership is established through a	Primary	To fill in the gaps of provision by the government	Immunization, Ante-natal care, Haemoglobin estimation in adolescent girls, Under-five years Malnutrition control, Janani	One sub-centre in each of the blocks of Palgarh, Dahanu,

		Initiative				government order)		health system and work in the area of ante-natal care and immunization, with the broader goal of disability reduction.	Suraksha Yojana, Promotion of Home gardens and health awareness programs.	Talassari, Jawhar, Mokhada, Vikramgad, Wada and Shahpur. Four sub-centres in Shahpur block are chosen for the project.
		b. Pfizer India	2012	District Health Society, Thane	Impact India Foundation and Pfizer India	Yes (in the process of signing)	Primary	Up-gradation of Parli & Bilgarh sub-centres in Wada block.	Training of health staff and infrastructure upgrade of chosen sub-centres, mobilizing the community to access the services of the sub-centres.	Parli and Bilgarh sub-centres in Wada block.
5.	Involvement of Private Specialist Organization for Providing Specialist		2010	District Health Society	Private Medical Associations of selected districts	Yes	Secondary	To provide specialist services in government health institutions providing secondary level of care (CHCs, Sub district and District Hospital)	Specialists made available in private institutions to check patients on an OPD basis for at least 3 days in a week, to attend emergency cases within half an hour of call & to make ward rounds.	Parbhani, Chandrapur, Raigad, Beed, Jalgaon, Yavatmal, Solapur & Gadchiroli
6.	Janani Suraksha Yojana		2005	District Health Society	Accredited private institutions	No	Secondary	To increase choice of service providers for beneficiaries of the scheme.	- Assistance of Rs. 1,500 provided to government institutions for hiring private specialists to handle complicated delivery cases. -For women delivering in private institutions, the empanelled institutions are reimbursed an amount Rs. 1,500 per case.	All over Maharashtra, but institutions in very few districts fulfil the criteria for empanelment.
7.	MNGO/SNGO scheme		1992 (MNGO),2005 (SNGO)	District Health Society	MNGO/SNGO (ML Dhawale Trust in case of Thane district)	Yes	Primary	To complement the government machinery in achieving the goals of RCH II.	- The role of MNGO involves capacity building of smaller NGOs (FNGOs) and guiding them in the implementation of RCH projects in the area of Maternal Health, Institutional delivery, family planning, Immunization and IEC. - Besides undertaking activities of the FNGO in the above mentioned	MNGO was operational in 32 districts of the state. All except two have finished their tenures recently. These two include Gadchiroli

								areas, the SNGO is also involved in providing clinical services like abortion, IUD services and safe abortion.	&Nandurbar. The MNGO for Parbhani district is in the process of selection. SNGO- Pune, Wardha, Akola, Latur, Ahmednagar & Thane. For the districts of Sangli, Kolhapur, Ratnagiri, Pune, Osmanabad, Aurangabad, Gadchiroli and Jalgaon, SNGOs have been selected and they will start operations soon.
8.	Mobile Medical Unit	2011	District Health Society	NGO chosen for specific districts (Maharashtra Dayanand Society in case of Thane districts)	Yes	Primary	To provide health services in the un-served and underserved areas.	The unit provides primary health care services in the assigned geographical area, which include curative services, first aid, referral services, family planning services, antenatal and postnatal care, immunizations (only for children who missed the routine immunization programme), management of epidemic outbreaks, implementation of National Health Programs, health education activities etc.	All 33 rural districts of the state. This excludes Mumbai and Mumbai suburban.

9.	Organization of Epilepsy Camps with the help of Epilepsy Foundation Mumbai	2011	State Health Society	Epilepsy Foundation, Mumbai	Yes	Secondary	To educate the community about misconceptions related to the disease, its prevention as well as treatment; to train the School Health Medical Officers.	Organising camps for education, prevention and treatment of epilepsy.	Seven camps organized on a pilot basis in the districts of Sindhudurg, Nashik, Satara, Parbhani, Amravati, Thane and Gondiya in 2011-12.
10.	Organization of Specialist Medical and Dental Camps through Medical Colleges in Tribal Hospitals	2010	State Health Society	Private Medical Colleges	No	Secondary	To organize specialist camps in Sub district Hospitals on a fortnightly basis.	Specialists called from the private medical colleges to organize camps in the sub-district hospitals in tribal areas. There is no formal contract between the private medical colleges, the specialist receive honorarium for their work along with travel and stay grants.	In the year 2010-11, 57 camps were organized across the state. It has been proposed to organize 60 camps on a yearly basis now.
11.	Palliative Care project	2011	Jawhar Cottage Hospital	Tata Memorial Hospital, Mumbai	Yes	Primary	To integrate palliative care into the existing health care system in Jawhar & Mokhada blocks.	Training of medical professional which includes the PHC staff andASHA workers on Palliative care, creating awareness in the community on palliative care and provide home bound care to the bed ridden chronically ill patients.	Jawhar and Mokhada Blocks
12.	Pre-Conception and Pre-Natal Diagnostic Technique (PCPNDT)	2005	--	--	--	Primary	To ensure measures for effective implementation of the PCPNDT act.	There is no formal MOU with any NGO, but the government works in collaboration with NGOs, media etc. to undertake activities for effective implementation of the act. This includes awareness generation, sting operations to find out the sonography centres not following the provision of the PCPNDT act.	All 34 districts of Maharashtra

13.	Sickle Cell Disease Control Program	2008	District Health Society	Concerned NGO of the state (Navoday Grameen Sanstha in case of Thane district)	Yes	Primary	Prevention and control of Sickle cell disease in the state	Counselling and testing for the disease in the PHC as well as the camps, awareness generation on the disease.	All tribal districts of the state which include Thane, Nashik, Nandurbar, Amravati, Gondiya, Gadchiroli, Bhandara, Nagpur, Chandrapur, Wardha, Yavatmal, Jalgaon, Nanded, Washim, Akola, Bhuldhana, Aurangabad and Raigad.

Sources:

1. NRHM PIP of Maharashtra state.
2. www.nrhm.maharashtra.gov.in
3. Primary interviews with officials of the concerned programs

4.4.1. Community Based Monitoring

Community Based Monitoring (CBM) is an integral component of NRHM, meant to ensure that health services offered under NRHM reaches those for whom they are meant. CBM is seen as an important aspect for promoting accountability and community-led action in the field of health ('Community Based Monitoring', 2012). It is being used as an instrument to increase the quality and accountability of health services, by enabling locals to evaluate and direct the health services available to them, as well as hold healthcare providers accountable to program objectives.

CBM was launched in 2007 as a pilot project in nine states namely; Assam, Chhattisgarh, Jharkhand, Karnataka, Madhya Pradesh, Maharashtra, Orissa, Rajasthan and Tamil Nadu. Madhya Pradesh dropped CBM after the pilot phase in 2009 (Mrs. Indavi Tulpule, Secretary Van Niketan, District Nodal Organisation, Thane, 21st January, 2012).

The objectives of this most-innovative scheme under NRHM include:

- To provide regular and systematic information about community needs, which will be used to guide the planning process appropriately.
- To provide feedback according to locally developed yardsticks, as well as on some key indicators.
- To provide feedback on the status of fulfilment of entitlements, functioning of various levels of the public health system and service providers, identifying gaps, deficiencies in services and levels of community satisfaction, which can facilitate corrective action within a framework of accountability.
- To enable the community and community-based organizations to become equal partners in the health planning process. It would increase the communities' sense of involvement and participation, and also improve responsive functioning of the public health system ('Community Based Monitoring', 2012).

The project is being implemented in a PPP mode. MOU is signed with the State Health Society and the State Nodal Agency of various states. Dr. Abhay Shukla, Coordinator of Sathi Cehat, who was one of the key persons involved in the evolution of CBM under NRHM, states that,

"CBM cannot be put under the classical category of public-private partnership. It is different and can be considered as a public-public or public-people partnership as it aims in motivating people to improve the public health system. Also, Sathi Cehat and other organizations implementing CBM cannot be considered as private organizations, as all of them are Peoples organization or people's body working for the

improvement and strengthening of public health system for the benefit of the public, none of them works with the profit motive" (25th January, 2012, *Sathi Cehat* Office, Pune).

Evolution

Much of the initial work to develop an Indian model of CBM was driven by the Advisory Group of Community Action (AGCA); a group of experts specially constituted by the Union Health Ministry to provide technical and other inputs on how to implement NRHM programmes, wherever community action was envisaged. The health advocacy non-governmental organization *Sathi Cehat*, in collaboration with many local community-based people's organizations, played a key role in coordinating the pilot CBM projects. According to Dr. Abhay Shukla, Coordinator of *Sathi Cehat*, the nodal organization for CBM in Maharashtra, a complex combination of multiple factors led to the evolution of Community Based Monitoring in India. The process started with 2004 general election, which gave a mandate that something needs to be done for the common people.

To satisfy the growing discontent of the people towards the existing neoliberal policies, pro-poor policies such as the National Rural Health Mission (NRHM), Mahatma Gandhi National Rural Employment Guarantee Act (MNREGA) and Right to Education, were framed. When NRHM was launched in 2005, officials at the national level wanted the program to deliver. A National Planning Task Group was set up as part of NRHM, which was headed by Mr. Amarjeet Sinha, and Dr. Abhay Shukla was a part of this task group. This task group strongly advocated CBM as the only measure to ensure transparency in implementation of NRHM, to identify the gaps in implementation and to find out what people are experiencing. The NRHM AGCA was constituted at this point in time, to draw blueprints for CBM and to facilitate its implementation in nine states. *Sathi Cehat* became the Nodal Agency for CBM activities in Maharashtra and it invited its partner organizations, who were mostly associated with it in Ja*n Arogya Abhiyan*, to act as District Nodal agencies for various districts (the list of district nodal agencies for the five pilot districts are mentioned in the section below).

In the expansion phase, NRHM has chosen NGOs on its own, through the process that it follows for other PPP projects. Sathi-Cehat, along with a lot of other organizations who are now a part of CBM, was demanding for CBM since a long time under *Jan Aarogya Abhiyan*. Finally, the National Human Rights Commission accepted it in 2004, and recommended that there should be a system of participatory monitoring at different levels (Dr. Abhay Shukla, 25th January 2012, Sathi Cehat, Pune). According to Dr. Abhay Shukla,

"*The journey of establishment of CBM at the national level and its coming down to the state level has only been possible because some enlightened officials in the NRHM felt that it is important to receive*

feedback directly from the field about how effectively the programs under NRHM are functioning and where the irregularities are taking place. So for them, CBM is like a narrational tool for supervision and monitoring and that is why they accepted it. However, the same officials do not like it when issues come to higher levels because then it can start affecting them, that is the reason as to why the State level committee of CBM has not been formed as yet in-spite of pressures from State nodal agency as well as the Jan Arogya Abhiyan" (25th January, 2012, Sathi Cehat Office, Pune).

CBM in Maharashtra & Thane district

In the pilot phase 2007-09, five districts were selected from Maharashtra namely, Amravati, Nandurbar, Osmanabad, Pune, and Thane. In each district, three blocks, and in each block, three primary health centres (PHCs) were selected. Similarly, under each PHC, five villages were selected to implement the project. Thus in each district, three blocks, nine PHCs and 45 villages were selected to implement the project. In the second phase (April 2009 onwards), an additional eight districts were added to the program, namely Chandrapur, Gadchiroli, Raigad, Solapur, Beed, Nashik, Aurangabad and Kolhapur.

For the purpose of monitoring, a monitoring committee is set up at various levels. The structure of the same is depicted in Figure 4.2.

Fig 4.2: Structure of Monitoring Committees under CBM

For the effective implementation of the project, there is a nodal NGO at every level. The State Nodal Agency is *Sathi Cehat*, located in Pune. The district nodal agency of each district is as follows:

1. Amravati – *Khoj*
2. Nandurbar – *Jannarth*
3. Osmanabad – Tata Institute of Social Services
4. Pune – *Mahila Sarvangin Uthkarsh Mandal*
5. Thane – *Van Niketan*

The Block Nodal NGOs for the chosen blocks in the CBM districts are depicted in Table 4.3.

In Thane district, the project was being implemented in Jawhar, Dahanu and Murbad blocks in the pilot phase. Shahpur and Mokhada blocks have been added recently, after 2009, in the expansion phase. The project is operational in 15 villages of each block (Ms. Indavi Tulpule, Secretary, Van Niketan, 21st January2012, Murbad). The impact of CBM in terms of utilization of health services has been very good in the state, particularly in Thane district, as per a report of CBM by *Sathi Cehat*. In Thane district, between 2007-08 and 2009-10, the increase in percentage of monthly OPD attendance was 17% in the entire district, while in the six CBM PHCs of the district, it was 34%. Similarly, the increase in in-patient admissions has been 50% for the entire district, while for the CBM PHCs it was 73%. While the increase in PHC deliveries for the district between 2007-08 and 2009-10 has been 48%, for the CBM PHCs it has been 101% (*Sathi Cehat* [n.d]). These figures substantiate the point made by Dr. Shukla, which is,

"NRHM is leading to some increase in utilization, but CBM is like a synergistic activity which complements the other supply side inputs of NRHM and induces people to go and demand services and thus tries to restore faith of people in the public health system, which has been very much damaged because of poor quality of services and poor responsiveness" (25th January, 2012, Sathi Cehat Office, Pune).

Activities

Activities under CBM include collection of information, conveying these through report cards, training and workshops, dialoguing with authority in the form of committee meetings and public hearing (*Jan Sunwai*) or Public dialogue (*Jan Samvad*), once or twice a year. New activities launched in 2010–11 include ASHA and VHSC Convention workshops, Block/District/State Level Planning Workshops & Regional Workshops (www.nrhm.maharashtra.gov.in, June 2012). Explaining CBM activities further, Ms. Indavi Tulpule, Secretary of *Van Niketan*, the nodal agency for CBM at Thane district, mentioned that the first step in monitoring is data collection, which is done by means of a standard questionnaire for the entire state of Maharashtra.

Table 4.3: Block Nodal NGOs for the implementation of CBM in Maharashtra

District	Block Name	Block Level NGOs
Amravati	Chikhaldara	Khoj Melghat
	Dharni	Apeksha Homeo Society
	Achalpur	Mamta Bahudeshiya Society
Nandurbar	Shahada	Jannarth Adivasi Vikas Sanstha
	Akkalkuwa	Lok Samanway Pratishthan
	Dhadgaon	Narmada Bachao Andolan
Osmanabad	Osmanabad & Kalam	Lok Pratishthan
	Tuljapur	Halo Medical Foundation
Pune	Velhe	Rachana – Society for Social Reconstruction
	Purandar	MASUM
	Khed	Chaitanya
Thane	Dahanu	Kashtakari Sanghatna
	Jawhar	BAIF
	Murbad	Van Niketan

From each health institution, data is collected by means of interviews with the staff as well as patients, on aspects such as the availability of infrastructure, facilities like water, electricity, equipment, cleanliness, staff behaviour, problems of staff and patients, etc. Observation is another important method used for collection of information. Patients are not only interviewed at the health facility but also once they are discharged (this kind of interview is referred to as an Exit Interview). This is done mainly because patients would say different things on and off the healthcare premises; in fact they were more honest in their views once they left the facility. At the village level, there are no health institutions, so the work of CBM involves overseeing the work of ASHA, ANM, Anganwadi workers and to ensure that schemes like *Janani Suraksha Yojana* and *Matrutva Anudan* are reaching people. This is done by interviewing the actual beneficiaries.

At the Anganwadi, weight of the children is taken so that CBM workers can cross check the weight mentioned in the register with the actual weight of the child. The data collected is then presented in meetings of the monitoring committees and the issues emerging from the same are tried to be resolved. Issues that cannot be resolved at the lower level committee are taken to a higher level. One member of the lower level committee is present at the higher level committee. For example, one member of the village committee is present at the PHC and one member of the PHC committee is present at the block (Ms. Indavi Tulpule, Secretary, Van Niketan, 21st January 2012, Murbad, Thane). The meeting of these committees takes place every two – three months. Committees existing at various levels can be seen in Figure 4.2.

Representatives of Health Officials, Panchayati Raj Institutions, Community Based Organizations / NGOs / Peoples Movements and villagers are members of these committees. The State Mentoring Committee is responsible for taking strategic decisions and overseeing the implementation of the CBM process at the State level. It also provides technical guidance and support to the state nodal NGO in implementing the project. Similar to the State Mentoring Committee, in every district a District Mentoring Committee is constituted to support the implementation of the project. The District mentoring committee is expected to carry out specific facilitations with the district health authorities, ensure the quality of district and block nodal NGOs interventions, and scrutinize periodic reports prepared by the District nodal NGOs ('Community Based Monitoring', 2012). When issues are not resolved at various committees, they are presented at *Jan Sunwais*, where higher officials are called and people discuss their issues. This occurs at the PHC level, block level as well as at the district level. At each level, an official from a higher level committee is present. For example, if *Jan Sunwai* is at the PHC level, then the Taluka Medical Officer is called; similarly if it is at the block level, then the DHO is invited and for *Jan Sunwais* at district level, the Deputy Director is invited (Ms. Indavi Tulpule, Secretary, Van Niketan, 21st January 2012, Murbad, Thane). According to Ms. Indavi,
"*Issues at JanSunwais are mostly related to non-accessibility of a particular scheme or health denial. Cases of health denial includes instances, like if X-ray has not been done in a government facility and the person is sent to the private facility where he has to pay exorbitant amounts, similarly forceps delivery suction etc. should be conducted in the PHC but it is not done. Officials mostly respond by offering money in compensation of the harm done to the patient"* (21st January, 2012, Murbad, Thane).

Finally, Ms. Tulpule mentioned that,
"*According to me, there can't be any project on monitoring. Every citizen should understand that all the systems are made for him and it is his right to secure its benefits. Hence, no external agency can monitor, people themselves have to monitor"* (21st January, 2012, Murbad, Thane).

Staff

Staff at the district level includesthe District Coordinator of the Nodal Agency, Block Coordinator for every block and Village Facilitators for every village. The post of Village Facilitator does not exist in CBM guidelines, and have been specifically appointed in Thane district. They are given TA/DA for their work, and are selected by the village committees. Another exceptional practice specifically followed by the Nodal organization of Thane district vis-à-vis staff, is that even though there is a position of Block Coordinator for Murbad block, the work is jointly being done by all workers of the *Sanghatna*, and the salary is not being paid to any individual. The same practice is not being followed by other Block nodal organizations (Ms. Indavi, Secretary, Van Niketan, 21st January 2012, Murbad).

Fund

Funding for the program is received from the State Health Society by the State Nodal Organization, which is then distributed to the District Nodal Organisation. The District Nodal Organization distributes the same to organizations at the block level. Funds are received for staff salary and for running the program, which includes organizing capacity-building activities and workshops, meetings of village health committees, *Jan Sunwai* and Public hearings. Funding is also given to the State Nodal Agency for publication of quarterly magazines, other publications and also for monitoring visits. Every District Nodal Organisation has to give audited reports to the State Nodal Organisation, which then provides it to the government, after which the fund release happens, although this is often delayed (Ms. Indavi, Secretary, Van Niketan, 21st January 2012 and Dr. Shukla, Coordinator, Sathi Cehat, 25th January 2012)

Outcome

According to Ms. Indavi Tulpule, CBM has only been able to achieve results wherever money is required, as NRHM has huge funds. For example, through NRHM funds, the health institutions are able to buy vehicles for transporting pregnant women from their homes to the institutions for delivery.Similarly, health institutions have stopped prescribing medicines and instead providing medicines bought with RKS funds. This has a flip side as well, as it provides opportunities to the Medical Officer for fund misappropriation. However CBM has not been able to improve the attitude of staff at the health institutions and prevent corruption. None of the officials at fault have been removed from their job as punishment by the efforts of CBM. Ms. Indavi mentioned that,

"*We have been trying to address problems of vacant positions, doctors not being present in the PHC, non-availability of mobile squad vehicles through CBM since long, but none of them have been addressed. They can be addressed only if staff feel threatened that they may lose their jobs, but this doesn't happen; instead they get transferred which many times makes them happy in case they don't want*

to stay at a particular place. In Jan Sunwais, the official at fault is just scolded by the senior official and people get happy with this. But this doesn't tackle the problem in anyway as the same official later apologises with the junior officer" (21st January 2012, Murbad, Thane).

Hence, according to Ms. Indavi Tulpule the *Jan Sunwais* are like a mock play and CBM is just a mechanism of show off for the government, using which it pretends to be transparent in its policies. When CBM had just started, officials in CBM areas took it seriously and were prompt in their services, but very soon they realized that it is a mock play and no action would be taken on them, hence they too became complacent. (Ms. Indavi Tulpule, Secretary, *Van Niketan*, 21st January 2012). However, Dr. Abhay Shukla had a different view. According to him,

"*Even though there are larger systemic issues still at the local level, the activities of CBM have definitely put pressure on the system. Through CBM, utilization of public health services has improved; it has also checked various kinds of undesirable practices like illegal charging by doctors etc."* (25th January, *Sathi Cehat* Office, Pune).

Dr. Shukla also felt that CBM has resulted in building confidence amongst people and helped them dialogue with government officials and demand their rights, which they could not do before. This point was even made by Ms. Indavi, according to whom the greatest outcome of CBM is that it has resulted in creating awareness among people. Most villagers, where CBM is operating, have become aware of their health rights. However, CBM is just targeting a few villages and this work on awareness creation needs to be expanded.

Another good outcome of CBM is that it has greatly helped in mobilizing people for addressing issues related to health. In NRHM, people are supposed to be involved in planning at the village level. Although the PIP is to be prepared at the village level and sent to the district, in reality this is not happening. Now, for the first time in some areas like Amravati, Nandurbar and Pune, village level awareness meetings, village level discussion of RKS, Panchayati Raj and CBM committees are taking place to decide the pertinent issues that needs to be addressed and the strategies devised for the same, before finalization of PIP (Dr. Abhay Shukla, Coordinator, *Sathi Cehat*, 25th January 2012, Pune).

Problems in Implementation

CBM as a policy is a unique one, which can greatly help in keeping a check on the Public Health System by the people; however, it does suffer from problems mainly due to bureaucratization and corruption at various levels, where government officials refuse to take action and punish offenders. According to Dr. Abhay Shukla, one of the key person involved in the evolution of CBM,

"It is a huge task to turn around a system which since the last 60 years has become so bureaucratised and unresponsive, It is like waking up a sleeping Dinosaur" (25th January 2012, *Sathi Cehat* Office, Pune).

The CBM works on a two pronged approach, where on one hand it tries to make people aware of their health rights and encourages them to demand for the same, on the other hand, it tries to put pressure on the government, so that they can improve the delivery of public health services. Both are extremely difficult. For people, health is not a priority like livelihood, land and water. Similarly, for governance, the main priority is the urban sector. In the rural sector, their priorities are the cost of crops and land. Hence, it becomes very difficult to work on health issues. Another big problem that comes in the way of implementation of CBM is the delay in funds by the government (Ms. Indavi Tulpule, Secretary, *Van Niketan*, 21st January 2012, Murbad).

Steps to improve the program

Some suggestions to improve CBM activities as per some key officials associated with the program are mentioned below:

- Funds for the project need to be supplied on time (Ms. Indavi Tulpule, *Van Niketan*, 21st January 2012, Murbad, Thane).
- The state level committee needs to be formed on an urgent basis. In the pilot stage, issues would just come from five districts; now they would come from 13 districts. Formation of a state committee would lead to a logical end of the CBM process (Ms. Indavi Tulpule, Secretary, Van Niketan, 21st January 2012, Murbad, Thane). According to Ms. Tulpule,

  "*If the committee at the state level is not formed then it clearly shows that the state machinery is not responsive, and hence not serious towards CBM and in that case CBM should stop operating in the state"* (21st January 2012, Murbad, Thane).
- Newer villages to be added for CBM work. According to Ms. Tulpule,

  "The only success and satisfaction that we are getting through CBM work is by creating awareness among villagers, hence we want to expand this work".

  Ms. Tulpule also mentioned that,

  "We don't want to continue CBM work, if at all we continue we want to expand the number of villages for awareness creation and even if we stop CBM, we would continue this work" (21st January2012, Murbad, Thane).

- Multi-sectorial approach for health planning is needed. Health needs to be integrated with issues like nutrition, water supply and food security (Dr. Shukla, Coordinator, *Sathi Cehat*, 25th January 2012). According to Dr. Shukla,

  "*Public system in our country like Public health, Public Education, Food security, water supply can improve only when people are organized, demand their rights and are also involved in planning and monitoring them regularly"* (25th January 2012, Sathi Cehat Office, Pune).

4.4.2.Emergency Medical & Referral Services (EMS)

The Government of India has accorded approval to provide Emergency Medical & Referral Services at all levels of health care delivery system under NRHM.During the year 2010-11, a total of 690 (517 BLS & 173 ALS) ambulances were sanctioned, phasing out in three years. For the current year, 370 ambulances were proposed with the budgetary provision of Rs. 88.80 Cr. This program is already operational in a PPP model in the states of Gujarat, Rajasthan, Kerala, Karnataka, Andhra Pradesh, Meghalaya, Assam, Tamil Nadu, Goa, Uttarakhand, Punjab, Himachal Pradesh and Chhattisgarh ('Emergency Medical and Referral Services', 2012).The project is commonly known as 108 emergency response services as the caller can get the transport services for referrals by dialing the number 108. The 6th Common Review Mission's report of 2012 mentions it as one of the most successful PPP projects that exists across states (NRHM, 2012).

The Maharashtra government also intends to launch the Maharashtra Emergency Medical Services (MEMS), in a public-private partnership mode with a fleet of 972 ambulances, to cater to the emergency medical needs of both the rural and urban areas. A recent news article mentioned that these ambulances have been provided to the state by a UK based hi-tech company and the bid for running the program was recently awarded to the Bharat Vikas group – aPune based private sector firm which specializes in providing varied services like mechanized housekeeping, landscaping and gardening, attendant services, logistics and transport, civil engineering, electrical and mechanical, fire fighting, environmental services, engineering, catering, domestic, urban and industrial services. Logistics and transport is one of the main services provided by the company, hence it has been selected for partnership in providing the Emergency Medical Services in Maharashtra. It is important to note that EMS does not come under the purview of Corporate Social Responsibility of the company, which means that the project would bring in some profit. Hence, in this partnership program, one sees the role of multiple partners; while the state government funds the program, it is actually being run by the private sector company with funding for the ambulances being provided by a UK based company. This is a classic example of translational links in PPPs at the State level.

EMS aims at offering assistance to accident victims and other critical patients in the crucial first hour known as the 'golden hour' (Shivadekar, 2012). The project thus aims to reducing mortality within the state by 20%.

Box 4.1: Roles and Responsibilities of the Public and Private Partners in the EMS Project

Role of the State Health Society

- Bear the capital cost of setting up control room of a world class centre and procurement of well-equipped ambulances.
- Provide ambulance stations/shelters, offices and night halt facilities in suitable health care institutions.
- Set up expert committees to facilitate empanelment of Private Hospitals/ Trauma Centres by involving successful bidders to deal with medical emergencies.
- Take up, with concerned authorities in the Health and Family Welfare Department, to issue necessary instructions for making available required emergency medical facilities and strengthen facilities in all PHCs, CHCs, General Hospitals, and other hospitals in the district.
- Make all efforts to ensure availability of medical and paramedical staff, equipment, medical supplies, and drugs for effective handling of emergencies in government hospitals, and to coordinate with all departments for making healthcare services available to beneficiaries.
- Undertake to coordinate with concerned authorities in the Police, Fire, Transport, Highway Authorities, Medical Education and other departments, to issue appropriate instructions to the field officers of these departments to make available required assistance and resources.

Role of the Private Service Provider

- Procurement of well-equipped ambulances as per technical specifications.
- Setup and operate Control Room / Emergency Response Centre (ERC).
- Provide technological leadership, administrative and managerial support as the partner, in an open and transparent manner to produce mutually agreed outcomes.
- Develop a suitable integrated solution including Computer Technology Integration, Voice logger system, General Packet Radio Service (GPRS), Geographic Information systems (GIS), Geographical positioning systems (GPS), Automatic Vehicle Location & Tracking (AVLT) Computer Aided Dispatch (CAD) and Mobile Communication Systems.
- Operate Emergency Response Centre for 24 x 7 hours through a centrally operated toll free telephone number. Shall provide minimum 10 parallel lines per District with hunting facilities initially and later shall expand depending upon number of the calls received.
- Provide the Application Software and the hardware components for the project.
- Operate the ambulances and ensure that ambulance services are available on a 24 x 7 hours and 365 days a year basis without any charges levied from the public, and make efforts to reach the required spot with average response time of equal to or less than 20 minutes in urban areas and 30 minutes in rural areas from the time of call.
- Facilitate empanelment of Private Hospitals / Trauma Centres to deal with Medical Emergencies with the approval of the Committee to be set up by the Government.
- Recruit, train and position required man power (Annex-X), including Pilots (drivers), and Emergency Medical Technicians [EMT] who will be present in the ambulance while shifting an emergency case to a hospital.
- Ensure that in every ambulance operated under this scheme, at least one Pilot and one EMT shall be present at any given point of time to provide patient stabilization, first-aid and other pre-hospital care.
- All ambulance vehicles must be in working condition 24x7 hours and in case of break-down, immediate replacement of an ambulance shall be at the cost of bidder.
- Provide daily (operational), monthly (administrative and financial) reports and quarterly (fund utilization) statements to the SHS, Maharashtra.
- Attend periodical review meetings held by the Government or SHS, Maharashtra (physically or virtually) for an assessment of the operationalization of the scheme.
- Conduct periodic training programs for paramedics, nurses, doctors and others engaged in Emergency Response Service in the Government healthcare institutions. Periodic training programs also need to be conducted for operational staff including Driver and Emergency Medical Technician.
- Undertake applied research assignments in implementing Emergency Response Services in the field.

Source: Emergency Medical and Referral Services. Retrieved from www.nrhmmaharashtra.org, June 2012

The project would provide its services across the state, except within the limits of Municipal Corporation of Greater Mumbai (MCGM), Thane, Pune, PCMC, Nagpur, Nashik and Aurangabad Municipal Corporations. However, Government of Maharashtra has sanctioned an additional 247 ambulances to cover the excluded Municipal Corporation Area.

The ambulances meant for providing emergency services in case of road accidents, disasters, epidemics or any other emergency situation, would be made available by virtue of a call to a toll free number. The ambulances would then carry patients to the nearest government or private health facility. The private service provider would be required to set up a call centre, which would act as a control room for the project. Government Chest Hospital at Aundh, Pune has been selected for the same. The project would incorporate tie ups with agencies such as police, fire, health, highway authorities, NGOs, etc. and would also follow an integrated approach to provide emergency response services which include computer technology integration, voice logger system, GIS (Geographic Information System), GPS (Geographic Position System), AVLT (Automatic Vehicle Location System) and Mobile Communication System (MCS).

Roles of the public and private partner in the implementation of the project have been described in Box 4.1.The project is yet to take off in a full-fledged manner. However, an EMS cell has been set up at the state level. The process of selection of the private service provider has also been completed after scrutiny of several applications from private bidders within the state. AIIMS, New Delhi has agreed to assist the project by providing free technical support services.

4.4.3. Health Advice Call Centre (HACC)

The Health Advice Call Centre aims at providing 24x7 medical advice to health care providers for making quick decisions, to provide smooth, effective and qualitative health care. To begin with, a call centre of 10 seats is proposed in the first phase, which would be expanded in subsequent phases after observing the response and impact of the project on the health system. The health advice will be given to callers who will simply dial a three-digit number from a landline or mobile phone. In the beginning, the call centre may render advice to ANMs, ASHA workers, school health personnel and medical officers. It will guide health personnel for timely referrals, proper intervention and management of patients, and effective implementation of national programs. It will work as an effective tool for disease surveillance as well as in disaster management. The Health Advice Call Centre will be very useful in giving instructions to health care providers during epidemics and other health campaigns to callers. Advice from specialists,

such as Paediatricians, Gynaecologists, etc. and other public health specialists will also be provided 24x7 to callers.

This project is being implemented in partnership with a private service provider, the Health Management Research Institute, Hyderabad. A formal Memorandum of Understanding has been signed between the Maharashtra State Health Society and the private service provider (Dr. N.J. Rathod, Senior PPP consultant, State Health Society, 3rd January, 2012, Mumbai). The role of the PSP includes provision of hardware and software – theservice provider will procure the necessary hardware and software including computers, routers, switches, networking etc. at their own cost, customization of IT solutions to meet local needs in Maharashtra, in Marathi and English, setting up and managing 24x7 Health Advice Call Centre uninterrupted (Health Information Helpline), recruitment of medical specialists, medical, paramedical and other staff, and training and maintaining necessary staff to run the centre in optimum capacity.

The private service provider would solely manage the Health Advice Call Centre (Health Information helpline) to provide 24x7 uninterrupted services by putting in place a robust technical and managerial support system. It will provide all call logs, voice logs, voice recordings and other necessary details as and when required by the Public Health Department. It is also expected to conduct research and analyses of data generated, and furnish conclusions to reach to the designated officials of the health department on a regular basis. Hence, just like other partnership programs, contract for running the entire program is given to the private service provider and the government's role is limited to funding and monitoring.

For selection of the service provider, an open tender notice was given. After the PSP was selected, it established the call centre at the District Hospital Pune on 1st February,2011 (Dr.N.J. Rathod, Senior PPP Consultant, State Health Society, Maharashtra, 3rd January 2012). The manpower selection and training was then done, after which the software was developed and the hardware was provided by the PSP. In spite of the fact that the hardware and software is developed and provided for by the PSP, and the program is run by the PSP, the ownership of the hardware and the software as well as the project rests with the Government of Maharashtra ('Emergency Medical and Referral Services', 2012).

On a long term basis, the program aims at establishing linkages with the Emergency Medical Services, Rajiv Gandhi *Jeevandai Arogya Yojana*, Telemedicine and Mobile Medical Unit.

4.4.4. Impact India Project

The Impact India Foundation was launched in October 1983 as part of an international initiative against avoidable disablement, promoted by the UNDP, UNICEF and WHO in association with the governments of each participating country as a result of the National Plan of Action. Decision to launch the project in India was taken in a Seminar at Leeds Castle, England in 1981, where an international group of scientists, politicians and health specialists decided to work for the cause of disability prevention. Voltas Limited donated the skills of its senior management, communications and technical professionals to firmly launch the project in India. The trust was then constituted by the Government of India on 2nd October, 1983 through the New Delhi Declaration by the President of India. Hence, one can say that Impact India acts as a catalyst in bringing together the government, corporate sector, existing NGOs, medical professionals and the community together, in rural health projects using the available delivery systems and existing infrastructure of the government (Impact India Foundation publication). The main goal of the foundation is prevention and control of disability. The foundation is best known for the world's first hospital train, the Life Line Express (LLE), which was launched in 1991. The train takes quality health services, free of cost, to the disabled poor in rural India and has provided free medical and surgical treatment across 17 states, serving approximately 600,000 patients. An estimated 100,000 medical professionals have donated services to the project.

The foundation is also known for the Community Health Initiative program launched in 2005, in partnership with the Maharashtra state government under the National Rural Health Mission. To establish partnership with the foundation, the state government did not sign a Memorandum of Understanding and instead issued a Government Order on November 7th, 2007. Through this order, the Deputy Director Health services, Thane was appointed as a Liaison Officer for the CHI project. The project is being implemented in 7 blocks of Thane district namely Palgarh, Dahanu, Talassari, Jawhar, Mokhada, Vikramgad and Wada. Shahpur block has been added recently to the program. According to Mrs. Neelam Kshirsagar, G.M. Special Projects of the foundation, Thane district has been chosen for the CHI project as it is the second largest tribal district in the state, with the largest number of malnutrition deaths (7th December 2011, Mumbai). Activities under the CHI project include immunization, ante-natal care, haemoglobin estimation in adolescent girls, under-five years' malnutrition control, *Janani Suraksha Yojana*, promotion of home gardens and health awareness programs, all of which are conducted in coordination with the government staff. A survey of disabled persons revealed that the initiatives of the foundation has helped in reducing disability by 65% through surgeries, and availability of free aids and appliances in seven blocks for patients has helped in restoring a life of fulfilment ('Impact India Foundation,' 2012).

Shahpur block has been added recently to the program, hence it is focusing on establishing its base in the block. Four sub-centres of this block have been adopted for active work while work from the earlier blocks of Talassari, Mokhada and Wada have been phased out. The CHI project is now operational in Palgarh, Dahanu, Jawhar and Wada blocks by adopting one sub-centre in each block. In Shahpur block, four sub-centres have been adopted. In each of these sub-centres, the project is trying to establish a sustainable, replicable, model program under NRHM and is thus trying to fill the gaps of provisioning left by the government health machinery (Dr. V. M. Tapsalkar, Project Director, CHI, 2nd December 2011).

After the successful implementation of the Community Health Initiative (CHI), the foundation is in the process of setting up another Public-Private Partnership Project in Thane district, where it plans to upgrade and maintain two sub-centres of Wada block in the district, namely Parli and Bilgarh, to meet the Indian Public Health Standards (IPHS) and set it up as a model sub-centre. The funding for this project would come from Pfizer India, which would also provide technical expertise in the area of developing Standard Operation Procedures (SOPs) Training Modules to help guide Impact India foundation in training the PHC staff and local community. The District Health Society would ensure the availability of infrastructure, equipment, materials and manpower in the sub-centre. The role of Impact India Foundation would include training of community health workers and PHC staff on various health issues, including conducting health awareness activities within the local community and mobilizing the community to access services at the sub-centres. This is a one year, time bound project. Memorandum of Understanding (MOU) with the District Health Society, Impact India and Pfizer India is in the process of finalization and is yet to be signed (Neelam Kshirsagar, G M Special Projects, Impact India Foundation, 7th December 2011, Mumbai). This is a unique PPP model in Maharashtra as well as Thane district, where funding would be provided by a private sector company and instead of two, three parties are involved in this partnership program.

4.4.5. Involvement of Private Specialist Organization for Providing Specialists

In Maharashtra, secondary care is provided by Community Health Centres, sub-district hospitals and district hospitals. Posts of specialists are sanctioned in these hospitals, but they remain vacant. Some of these hospitals, which are included for up-gradation under IPHS, have hired private specialists on contract basis. The State Health Society has delegated powers to hire such specialists to executive committee of the RKS of that hospital. In spite of this, majority of the hospitals are not getting specialists and therefore cannot be upgraded to IPHS.

Under this scheme, a contract will be entered into with private medical associations, who would be required to be present for OPD in the government institutions for at least three days a week for half days

(four hours) and should attend to emergency cases within half hour after being called in by the hospital. They should also make ward rounds, if patients of his/ her specialty are admitted. The organization will be asked to appoint one coordinator and hospitals will only contact the coordinator. It will be the job of the coordinator to contact the concerned specialists and send for the call. Remuneration of specialists will be decided by RKS as per approved Indian Public Health Standards (IPHS) guidelines.

According to Dr. N J Rathod, Senior PPP consultant at the Maharashtra State Health Society, the project was launched on a pilot basis in 2010-11 in Parbhani and Chandrapur districts, where a MOU was signed with the Indian Medical Association. In 2011-12, Thane, Raigad & Beed proposals were received and scrutinized by the Technical Advisory Committee (TAC), which recommended that the same be evaluated by the Joint Action Committee (JAC) at the district level. New advertisements have been given in local newspapers for Jalgaon, Yavatmal, Solapur and Gadchiroli districts.

4.4.6. *Janani Suraksha Yojana*

Janani Suraksha Yojana (JSY) is a flagship program of NRHM. It is a 'safe motherhood' intervention being implemented with the objective of reducing maternal and neo-natal mortality, by promoting institutional delivery among the poor pregnant women. The scheme is being implemented in Maharashtra since 2005, and is applicable only to SC/ST/ BPL pregnant women not less than 19 years of age, since it is a high performing state. The beneficiaries of this scheme receive Rs. 500 in case of home delivery. For institutional delivery, the benefit amount is Rs. 600 in case of urban areas and Rs. 700 in the case of rural areas, while Rs. 1,500 is given in case of C-sections. These benefits are given to the beneficiaries by cheque, applicable to the women only up to two deliveries. ASHAs incentive for bringing JSY beneficiary to Institutional delivery is Rs. 200 in non-tribal areas and Rs. 600 in tribal areas. According to government officials and reports, the scheme is performing well, both in Maharashtra as well as in Thane district.

The scheme is available at all sub-centres, primary health centres, community health centres, rural hospitals, sub-district hospitals, district hospitals, accredited hospitals, hospitals under medical colleges, Municipal Corporation hospitals, Corporation hospitals and all Government Granted hospitals ('*Janani Suraksha Yojana*', 2012).This scheme also has a component of Public-Private Partnership. To increase the choice of delivery care institutions, the GOI has allowed district governments to accredit two private institutions for each block. Contract is given to these private institutions and JSY provides assistance of Rs. 1,500 for hiring specialists from these institutions in case of any complications, while the patient receives free Emergency Obstetric Care (EmOC) at the First Referral Unit (FRU). Hence, this PPP is based on the contracting-in model. At times, the program also utilizes cross-subsidization for women

preferring private facilities. In such cases Rs. 1,500 is provided to the empanelled specialist when he/she produces the discharge summary to the Medical Officer (Chaturvedi & Randive, 2011).

When the JSY program was initiated, many private institutions noticed a marked decrease in clients who sought services from accredited government facilities. Private institutions sought accreditation status with hopes of increasing their reputation for quality services, regaining clients, and exposing new clients to the services offered (Dagur et al., 2010, p. 13).

According to Mrs. Wagh, official at District Health Society, Thane the following criterion is followed in Thane district for accreditation of private institutions:

- The hospital should be registered.
- It should have a delivery room with all facilities.
- Emergency facility should be available.
- It should have a gynaecologist and an anaesthetist.
- It should have nursing staff especially trained for deliveries.
- It should be ready to give the JSY benefits to the patients.

The private accredited institution having all the above mentioned health facilities should sign a Memorandum of Understanding with the District Health Society. However, this is hardly seen to be happening in the state of Maharashtra. Officials at the District Health Society, Thane revealed that none of the private institutions had all the above mentioned facilities, and were thus not found fit to be accredited for the provision of the JSY scheme. The Taluka Medical Officers of the concerned districts also revealed the same. Hence, the component of Public-Private Partnership in the implementation of the JSY scheme is completely lacking at Thane district. Similar findings have also been revealed in other districts of Maharashtra.

A study undertaken by FRCH in Ahmednagar district of Maharashtra revealed that no formal Memorandum of Understanding is signed between the private institutes and government. Hence, none of the institutes are formally accredited for providing EmOC. The scheme just operates by cross subsidization for C-section cases. According to government officials, the main reason for this is the fact that private institutions do not fulfil the criteria for accreditation (Mrs. Wagh, 2nd January 2012, DHO office, Thane). The providers on the other hand feel, that the amount of Rs. 1,500 for hiring a specialist under the scheme is too less, as the cost of a C-section delivery as per current rates is more than Rs. 3,000 (Chaturvedi & Randive, 2011). The criterion for accreditation of private institutions according to the government guidelines is mentioned in Box 4.2.

Box 4.2: Criteria for accrediting private institutions under *Janani Suraksha Yojana*

Private institution willing for empanelment under the scheme should have casualty services round the clock with availability of:

- An obstetrician and surgeon,
- Pediatrician and anesthetist (to be accessible either as full time employees or available on call),
- Separate outdoor facility for examination of the patient (including PV examination), casualty room, labor room, Operation Theater, and at least a 4 bedded ward.
- Life-saving drugs, IV fluids & blood transfusion facility.
- Patient transport system within the hospitals/institutions.
- Power backup in case of electricity failure.
- Telephone connection with interconnectivity in OPD, causality, labor room, operation theatre, ward and laboratory.
- Laboratory services for routine investigations.
- Emergency obstetric procedures: vacuum extraction, D&C, forceps delivery, LSCS, emergency hysterectomy and laparotomy.
- Every delivery is to be attended by staff nurse trained in newborn resuscitation and pediatrician to be available on call round the clock for emergency interventions.

Source: Dagur et al., 2010, p. 35

4.4.7. MNGO/SNGO scheme

The MNGO scheme launched in 1992 is being implemented in the state on a large scale for the past several years. Various NGOs in the state were chosen as an MNGO, whose main role comprised capacity building and supervision of smaller NGOs called Field NGOs (FNGOs) working in the area of RCH. The scheme is now being replaced by a newer scheme of Service NGO (SNGO) under NRHM. The SNGO not only provides services like FNGOs, but is also actively involved in providing clinical services related to RCH. Partnership in these programs exists between the NGO and the District RCH Society. Details on various aspects of this project have been presented in Chapter VII of this thesis.

4.4.8. Mobile Medical Unit

This recently launched partnership program has started operations in almost all districts of the state, except Mumbai. The program is one of the costliest PPP project in the state, and works towards providing health services to people residing in the most interior and deprived pockets of the state. The government

provides van, equipment and medicines to NGOs in each district, which then operate the van on a daily basis in the area chosen by the government Details of this project are described in Chapter VI.

4.4.9. Organization of Epilepsy Camps, with the help of Epilepsy Foundation, Mumbai.

Epilepsy is one of the important non-communicable diseases with public importance. In the state of Maharashtra, more than 5000 students have been found suffering from epilepsy, and specialist care is required to overcome the problem. Stigma about the disease prevents patients from receiving good care and service. Students suffering from epilepsy particularly need more attention, as early diagnosis and treatment will cure the disease and prevent it from affecting the academic performance of the child.

Considering this, the Government of Maharashtra plans to organise epilepsy camps within the state in collaboration with the Epilepsy Foundation, Mumbai, mainly to educate the community about misconceptions related to the disease, its prevention as well as treatment. The program would also aim at training school health medical officers. Specialists coming for these camps would be reimbursed for their travel and would also be given accommodation facilities.

The program is a new initiative under NRHM and has just started. In 2011-12, the program organized seven camps on a pilot basis in the districts of Sindhudurg, Nashik, Satara, Parbhani, Amravati, Thane and Gondiya. About 242 patients, including 127 students were examined in these camps. These camps were very successful and in 2012-13, more such camps are proposed to be organized.

4.4.10. Organization of Specialist Medical and Dental Camps through Medical Colleges in Tribal Hospitals

Maharashtra has 455 hospitals of various bed strengths. Almost all these hospitals are well equipped with wards, Operation Theatre, labour theatre, labour rooms, nurses and equipment. However, because of the shortage of specialists by almost 50%, these hospitals are not in a position to provide specialist care. Considering this situation, in the year 2010-11 the Maharashtra government proposed to arrange specialist camps in Sub-district hospitals (SDH), particularly the SDH in tribal areas, once a fortnight. Specialists from Medicine, surgery, paediatrics, obstetrics, anaesthesia and dental faculty attended these camps. Other specialties such as skin VD, ophthalmology, ENT and orthopaedics were requested as per the need for their services.

All PHCs and hospitals in areas falling under the SDH are informed about the six months calendar of the specialties to be made available through specialist camps. PHCs/CHCs screen the patients and send them to SDH on the day of the camp.

According to the official website of NRHM Maharashtra, SDH will be selected on the basis of the following criteria:

a) Tribal SDH

b) Well constructed OT with all necessary equipment

c) Laboratory with facility of all basic investigations

d) Blood storage centre

e) Adequate nursing staff

f) Adequate medicine

g) At least 2 MBBS doctors to take post-operative care

Medical College specialists halt at the SDH for four days. The first day is for screening patients, the second and third days for operations and the last day is for post-operative care. The specialists are not only given grants for travel and stay during the camp, but are also given an honorarium of Rs. 1,500 per day. In this partnership program, Memorandum of Understanding has not been signed by the state government with the medical colleges; the government just hires the specialists and pays them on a daily basis (Dr. Rathod, Senior PPP Consultant, State Health Society, 3rd January, 2012, Mumbai).

The camps organized in 2010–11were very successful; in fact, due to the response received the number of camps organized (57) were much more than the number proposed (36). 54,328 tribal persons screened by the PHCs/CHCs were examined by the specialists, out of which, 5,831 major surgeries were conducted. In addition, students with serious diseases and Sickle cell patients with complications were also treated in these camps. Considering the overwhelming response received by the tribals, it is proposed to increase the number of these camps to 60 in a year. If there is great demand for these camps, their number would be further increased, depending upon the availability of budget (‘Public Private Partnership,’ 2012).

4.4.11. Palliative Care project

Palliative Care is a multi-disciplinary approach to alleviate the suffering of patients with chronic life-limiting illnesses, and their families. It is aimed at improving the quality of life through relief of physical, psychosocial and spiritual suffering. Palliative care is required in terminal stages of cancer, neurological and cardio respiratory diseases.

The Palliative Care Project is unique to Thane district of Maharashtra. It is being run on a pilot basis in partnership with Jawhar Cottage Hospital in Jawhar and Tata Memorial Hospital, Mumbai. The project, operational since February 2011, aims to integrate palliative care into the existing health care system in the Jawhar and Mokhada tribal blocks. It also intends to provide home bound care to the bed-ridden

chronically ill patients suffering from chronic life-limiting illnesses residing in Jawhar and Mokhada blocks, who cannot travel to Tata Hospital; for example, Patients of Cancer, HIV/AIDS and TB.

The objectives of the project include:

- Training health care professionals, including physicians, nurses, medical and social workers (at the block and the primary health centre level) in palliative care, to enable them in identifying patients requiring palliative care and delivering appropriate holistic care to such patients.
- Training outreach health workers such as ASHA workers, ANMs, etc. in basic palliative care principles and practice, so that they can identify patients in the community who require palliative care and deliver basic care in the patients home or in the community.
- Ensuring availability of morphine and other opioids at the block level.
- Increasing awareness about palliative care in the community.
- For children with life-limiting conditions, ensuring access to appropriate paediatric palliative care facilities ('Integration of Palliative Care', 2012).

Cottage Hospital Jawhar is chosen for the project as it is a big hospital and caters to the needs of the villagers residing in remote areas, not only in Jawhar block but also in nearby blocks. The project is operational in four PHCs each of Jawhar and Mokhada blocks and all villages falling under these PHCs. The main role of Tata Memorial Hospital is to provide training and technical support for the program, as well as operational running costs for which it receives an annual sum of Rs. 13 lakhs from the State Health Society. This is used for travel of the staff to TMH for training, transport of patients, drugs, organizing training programs, salary of the social worker etc. (Dr. Ramdas, Superintendent, Jawhar Cottage Hospital, 20th November 2012, Jawhar).

The main activities of the program include training the staff of the PHC as well as ASHA workers in palliative care, so that they are able to identify patients requiring palliative care and can deliver appropriate holistic care to such patients, increasing awareness in the community about palliative care, ensuring availability of morphine and other opioids at the block level and ensuring access for children with life-limiting conditions to appropriate paediatric palliative care facilities.

While money for the drugs is provided by the NRHM, Tata Memorial Hospital provides training to the staff of the PHCs, including the MO, ANM and ASHA worker of each village for palliative care. The MOs and ANMs of the PHCs, as well as doctors of the Cottage Hospital along with 223 ASHA workers have been trained in Tata Memorial Hospital. The ASHA workers have received training at least two to three times. Training includes aspects like identifying patients and providing holistic care, covering

physical, social and spiritual aspects. All staff receiving this training is also given first aid kits and the necessary basic drugs. The project has also ensured that PHCs are stocked with lifesaving drugs as well as drugs required at the end stage, such as morphine. The idea is to make the last stage of terminally ill patients soothing and pain free. A medical social worker has also been appointed at the cottage hospital.
Under this program, the ASHA worker is given an incentive of Rs. 100 for identifying a patient for palliative care, providing him/her with medicines and counselling. However, as reported by Dr. Ramdas, Superintendent of Cottage Hospital, Jawhar,
"*Not a single patient of palliative care has been identified by the ASHA workers of the two blocks"* (20th November 2011, Jawhar).

This can be due to the fact that the ASHA worker has multiple roles to perform, and for every role they receive an incentive. The incentives received by ASHA for some other activities are higher than the incentive offered to them for palliative care work and hence, they are not interested in undertaking it. Thus, in order to make ASHA workers work for palliative care, their incentives should be enhanced. Dr. Ramdas also shared that Jawhar hospital has identified about 33 patients for palliative care and they came to the hospital on their own. About four patients came in July, ten in August, seven in September and twelve in October, 2011. These were critically ill patients suffering from terminal illness. They were admitted in Cottage Hospital, their care has been completed within the hospital and they have now been discharged. The social worker appointed for the project shared that he tries to do a follow up of the discharged patients to see whether they are following the treatment and to assess whether they are receiving home bound care from ASHA, ANM etc., but this is very difficult as these patients live in the interior villages, making them difficult to locate and reach; even if they manage to reach, they are unable to follow-up as most of them are in the fields.

Hence, one can say that the success of the project is in question as ASHA is not identifying cases at the village level or bringing them to the Cottage Hospital, Jawhar and follow-up of discharged patients is not happening entirely. The program is successful only in terms of fulfilling the targets of training the MO, ANM and ASHA workers. It has been only a few months since the project has been operational. In case the project does not pick up in a years' time in terms of case identification at the village level by the ASHA workers, it might get shifted to Ratnagiri or Sindhudurg district as reported by Dr. Ramdas, Medical Superintendent, Cottage Hospital, Jawhar.

4.4.12. Pre-Conception and Pre-Natal Diagnostic Techniques (PCPNDT)

In India, abortion is legal under certain circumstances as defined by the Medical Termination of Pregnancy Act, 1971. These reasons are, for example, danger to the mother's life, foetal abnormality, rape or contraceptive failure. However, the law does not permit abortion for the reason of sex selection.

The Pre-Conception and Pre-Natal Diagnostic Techniques (Prohibition of Sex Selection) Act, 1994 (Amendment 193) was enacted by the Indian Parliament to provide for the regulation of the use of pre-natal diagnostic techniques for the purpose of detecting generic or metabolic disorders, chromosomal abnormalities, certain congenital malformations, sex linked disorders and for the prevention of the misuse of such techniques for the purpose of pre-natal sex determination leading to female feticide.

The salient features of this act are mentioned in Box 4.3.

Box 4.3: Salient Features of PCPNDT Act

- Use of Pre-natal diagnostic techniques is allowed only on medical grounds for detecting abnormalities and anomalies, and not for sex determination (Section 6 a, b,c).
- No person conducting pre-natal diagnostic procedures shall communicate to the pregnant woman concerned or her relatives, the sex of the fetus by words, signs or in any other manner (Section 5).
- All clinics conducting ultrasounds must be registered and certificate displayed – No. of machines, qualification of person conducting sonography and period of registration – (Section19(4)).
- All clinics should display prominently 'disclosure of sex of the fetus is prohibited under the law' in English, as well as local language (Rule 17 (1)).
- All clinics should have available copies of the Act (Rule 17 (2)).
- Doctors or clinics advertising sex determination test in any form are liable for punishment (Section 22).
- Woman is exempt from punishment – Presumption in case of conduct of pre natal diagnostic techniques (Section 24).
- Every offence under this Act is cognizable, non-bailable and non-compoundable (Section 27).
- Implementing Authority under the Act is Appropriate Authority (Section 17).
- Under Act, Appropriate Authority has power to search, seize and seal clinics (Section 30).
- Act has made it mandatory to maintain records of every scan done (Section 29, Rule 9 and Section 5, Rule 10 (1A)).

Source: PCPNDT Act, retrieved from www.nrhm.maharashtra.gov.in, accessed on July 2012

Any medical professional who contravenes any provision of the act or any person seeking prenatal diagnostic facilities for sex selection is liable for heavy punishment under the act.

In 2011, the sex ratio of Maharashtra was 925, which was much less than the national average of 940. The low sex ratio drew the attention of the government to the issue, and ever since a lot of emphasis is being paid by the Government of Maharashtra on strict implementation of the PCPNDT act.

To ensure effective implementation of the act, the Government has set up committees consisting of important officials at the state, district and block levels, known as 'Appropriate Authorities', who have the power to search, seize and seal clinics. The Additional Director of Health Services (FW, MCH & SH), Pune is the State Appropriate Authority for implementation of PCPNDT Act in Maharashtra. The appropriate authorities in Thane district consist of the collector, 2 additional collectors, 5 sub divisional officers, 15*tahsildars*, 30 deputy *tahsildars*, 7 commission corporations, 14 divisional commissioner corporations, 66 ward officer corporations, 9 chief officer councils, the Civil Surgeon of the District Hospital, the Medical officer of the Health Municipal Corporation and the Superintendent of the Rural Hospital.

The appropriate authority makes random visits to various sonography centres in its region and checks whether it is complying with various components of the PCPNDT act. In case they are not, they are punished, and their clinics sealed. The authority, through its checks has to ensure that the sonography centre has proper radiology machine and the radiologist has the appropriate degree and experience of working in the government set up. Also, the sonography centre should have a gynaecologist with a work experience of more than six months (Mr. Mangesh, UDC, Civil Hospital, Thane, 2nd December, 2011).

In Thane rural, there are 156 sonography centres, out of which 40 have been inspected until November, 2011 by the appropriate authorities (Data from Civil Hospital, Thane). The clinics are also required to maintain complete records of pregnant women whose sonography is conducted at their centres by filling Form F prescribed in the act, and they have to submit the same to the appropriate authorities. In Thane district, the forms are submitted to the Civil Hospital. Advocate Sunita Ghone and Mr. Mangesh, were especially appointed for this project to keep these records. Ms. Ghone mentioned that her main responsibility includes dealing with all court cases related to non-compliance of the act, and creating awareness about the act by organizing various IEC activities such as fortnightly campaigns, rallies etc. in the community, usually in collaboration with local NGOs. Besides this, she is also involved in organizing workshops for appropriate authorities, mainly to brief them about the issue, the act and their roles, training for online data entry of F form, etc. (Advocate Sunita Ghone, Civil Hospital, Thane, 31st December, 2011).

Another important component of the act in which Ms. Ghone is actively involved, is conducting sting operations. NGOs are heavily involved in conducting sting operations along with the appropriate authorities of the area, of suspected radiology centres. These centres are shortlisted by scrutiny of completed F forms, which are uploaded on the internet. It is expected that audio/visual recording of the sting operations would provide strong evidence in filing cases in court, under the PCPNDT Act. So far, 32 stings have been conducted in the state by NGOs involving decoy clients. One doctor has been convicted with fine and imprisonment for revealing the sex to a decoy client while other cases are still in court. A total of 158 cases are currently lodged in various criminal courts against violators of the provisions of the PCPNDT Act ('PCPNDT', 2012).

In addition to this, the state has undertaken several other innovative initiatives to strengthen the implementation of the act. Some of these are mentioned below:

- A help line – ***188002334475*** and a website – ***amchimulgi.gov.in*** have been initiated by the state for reporting erring doctors. As soon as a complaint is lodged on the website, the Appropriate Authority of the concerned district receives automatic email intimation and can take action on the complaint.
- An innovation in the form of an ICT led initiative consisting of online filling of F form, a mandatory requirement under the PCPNDT Act, and an active tracker to record images of all sonographies done, has been initiated in Kolhapur. The initiative is being evaluated to understand its efficacy for replication.
- To create public awareness on the issue and promote a positive image of the girl child, the state has appointed two celebrity couples, Sachin and Supriya Pilgaonkar and Ajay and Kajol Devgan as goodwill ambassadors on the issue.
- A few films on the issue have been made and are being given to multiplexes to be screened before film shows.
- To create awareness on the issue, discussion programs have been organized on Doordarshan. Bus panels and hoardings with messages on sex selection have been put up while radio jingles with messages on sex selection are also being regularly broadcasted.
- The ***Aarogya Patrika,*** which is a magazine of the health department and has a circulation of 20,000 copies, carries regular articles on the issue of sex selection. The July 2011 issue of the *Aarogya Patri*ka was a special issue on this theme.
- The State IEC Bureau has developed a mobile exhibition on the theme of the girl child and sex selection which is made available to all districts for events. The Bureau has also developed an audio-visual show on the theme, which is taken to all districts through a mobile van called the ***Parivartan express.***

- To stimulate behaviour change and community action on the issue of sex selection and promote a positive image of the girl child, the State has collaborated with ***NGOs*** and multilateral organizations like the United Nations Population Fund, to work with different stakeholders such as the media, elected representatives, youth and NGOs on the one hand, while on the other, work has been initiated with the medical and nursing community as they are the first contact point for any couple intending to go in for sex selection. Some of the activities are as follows:

a. All MNGOs and FNGOs which are part of NRHM have been trained on the issue of sex selection and PCPNDT Act, and have been advised to undertake advocacy and action in their respective areas for community mobilization and bringing about a mind-set change.

b. To draw attention of the media and public to the positive efforts in the media on the issue of sex selection and to create public awareness about the issue, UNFPA and Population First have supported the institution of awards for gender sensitivity in media. This has led to increased media coverage on the issue of sex selection.

c. Work has been done in the state with the youth, to address their role on the issue as future parents. The work with youth is being done through colleges, wherein workshops on gender and sex selection are being organized through the *Mahila Aayog* and the Women and Child Development Department. For out-of-school youth, popular culture and entertainment in the form of street theatre, which is a very popular medium of communication, has been used.

d. The issue of sex selection and PCPNDT Act have been included in capacity building of SHG members under the *Mahila Arthik Vikas Mahamandal* (MAVIM), which covers 7.5 lakh women across the state. Frontline functionaries of MAVIM have also undertaken theatre campaigns on the issue of behaviour change.

e. The state has worked with professional medical associations like the Indian Medical Association (IMA) to break the bridge between demand and supply for sex selection. The IMA is committed to engage with civil society by forming 'Doctors forums against sex selection for community mobilization.' The state is in continuous dialogue with the Federation of Obstetric and Gynaecological Society (FOGSI), and has sought their help in organizing trainings and capacity building workshops for gynaecologists and obstetricians.

f. The state undertook training of professors from all medical colleges across Maharashtra, to integrate the issue of sex selection as part of co-curricular and teaching activities. Similarly, the state has also undertaken capacity building of nursing trainers to address the issue of sex selection and the nursing curriculum is currently being revised to include this issue.

Hence, even though no formal partnership with any particular NGO exists under this project, the government is seeking support of several NGOs across the state mainly for IEC activities and sting operations in order to strengthen the implementation of the PCPNDT act.

4.4.13. Sickle Cell Disease Control Program (SCDCP)

This partnership program is being implemented in almost all tribal districts of Maharashtra, and is considered a flagship program under NRHM, which aims at eradication and control of the widely prevalent disease, that is Sickle Cell Disease, among tribal communities of the state. Further details have been given in Chapter V.

4.4.14. Telemedicine

Telemedicine is a rapidly developing application of clinical medicine, where medical information is transferred via telephone, internet or other networks for the purpose of consulting, and sometimes remote medical procedures or examinations. Telemedicine may be as simple as two health professionals discussing a case over the telephone, or as complex as using satellite technology and video-conferencing equipment to conduct real-time consultation between medical specialists at two different places.

The telemedicine project was first started in four districts of the state as a partnership project between Indian Space Research Organization (ISRO), Department of Space, Government of India and Municipal Corporation of Greater Mumbai. MOU of project was signed on 7th September, 2006 to provide telemedicine services to five hospitals in the state through specialists from KEM Hospital Mumbai (‘Telemedicine Project’, 2012).

The project, which started in 2007, has been run in three phases. In 2011, the third phase ended and the fourth phase started. Health institutions included in the project in the three phases have been described in Table 4.4.

Table 4.4: Health Institutions working on the Telemedicine Project

S. No.	Type of Node	Phase I (2007-08)	Phase II (2008-09)	Phase III (2010-11)	Total
1.	Controlling Node	0	1	0	**1**
2.	Specialist Node	1	3	1	**5**
3	Patient Node	5	22	30	**57**
	Total	**6**	**26**	**31**	**63**

Source: Telemedicine Project. Retrieved from www.nrhm. maharashtra.gov.in, accessed on July 2012

At present, there are five specialist nodes and 57 patient nodes under the project with KEM Hospital, Mumbai as the controlling node. Speciality nodes situated at medical colleges are giving opinion to patients referred from patients nodes situated at the district and sub district hospitals. Renowned medical colleges like the Sir J.J. Hospital, Mumbai, Government Medical College, Nagpur, B.J. Medical College, Pune, Government Medical College, Aurangabad and Nanavati Hospital, Mumbai act as the Specialist Nodes. Since the project started in 2008, approximately 27,947 patients have received the opinion of specialists from the Telemedicine Centre (Ibid).

In Thane, the District Hospital acts as a Patient Node. Critical patients requiring specialist services are referred from nearby PHCs/CHCs or Cottage Hospital to the District Hospital. The case history of the patients is taken and video conferencing is arranged with specialists from KEM Hospital. If specialists are not available from KEM, other specialist nodes are contacted. Treatment is offered to patients within 24 hours. For critical cases, it is offered as fast as within two hours. The program is run with the help of prognosis software, where the case history of the patient is uploaded and contact is made with specialists. The patients and their relatives also receive appropriate counselling by the staff at the Patient node in the Civil Hospital, Thane (Mr. Dinesh, Telemedicine In-charge, District Hospital, Thane, 2nd December 2012).

4.5. CONCLUSION

Hence, from the above section one can observe that a plethora of PPP projects exist in the state of Maharashtra, under NRHM and the large presence of private sector – 'for-profit' and 'non-profit', in the state can be a reason for the same.

An analysis of existing PPP projects in Maharashtra reveals that most of these projects have started very recently. This shows that it is only recently that the government has realized the importance of initiating public-private partnership projects in health programs within the state. While some partnerships are formulated at the state level with the State Health Society entering into partnership with the private sector, the other partnership programs are formulated at the district level with the District Health Society signing an MOU with the private partner. Partnership at the district level mostly occurs when different private partners are involved at each district; when partnership is formulated with a single actor for the entire state, then the partnership is formulated at the state level with the private partner.

Where the number of partners is concerned, in all these partnership projects, two parties are involved; only in the yet-to-be-launched project, Impact India with Pfizer India in Thane district, three parties are involved, where two are private and one is public. Also, while in all projects money is given by the state,

in this particular project, Pfizer India is funding the up-gradation of the chosen sub-centres. The presence of a third party is also seen in the Emergency Medical Services, where the funding for ambulance is provided by a UK based multinational company. All private partners in these projects belong to the state of Maharashtra; it is only in case of the Health Advisory Call Centre (HACC) project that the private partner is from outside the state that is from Hyderabad. The reason for the same remains unknown to the researcher.

Most of these partnership projects are based on the contracting model; hence one can say that it is the most common model for partnership that exists within the state. In an exception case, in the JSY scheme, cross-subsidization also occurs wherein the private doctor of the accredited institution is reimbursed an amount of Rs. 1,500 for handling a particular case.

As one can see in Table 4.3, there is an equal mix in terms of presence of partnerships with 'for-profit' private and 'non-profit' private sector. Out of the 13 PPP projects that exist within the state, seven are with the 'for-profit' sector and six are with the 'non-profit' sector. It is observed that while the 'non-profit' sector compromises of NGOs and trust hospitals, a range of actors occur in the 'for-profit' sector, which includes multinational companies, research institutes, teaching hospitals, pharmaceutical companies, private medical associations and institutions.

It is important to note that all PPP projects within the state occur at the primary and secondary level, and none exists at the tertiary level. Partnership programs with the 'non-profit' sector are mostly providing primary level of care, which includes awareness generation, for example The Community Based Monitoring project, Impact India, PCPNDT and Sickle Cell Disease Control Program. In just two cases the non-profit private partner is also involved in providing secondary level care, which includes curative services along with awareness creation. These include the MNGO/SNGO scheme and the Mobile Medical Unit. This is mainly because the private sector organizations involved in these projects are trust hospitals, which specialize in providing curative services. The reason for involving NGOs in awareness generation within the community is mainly because of their strong foothold within the community, on account of doing developmental work, and awareness generation matches a NGOs philosophy and nature of work.

Partnership programs with the 'for-profit' sector on the other hand, are mostly involved in providing tertiary level care. This is mainly because curative services are the forte of the private partners involved in these projects, as they are either research institutes, teaching hospitals, pharmaceutical companies, private medical associations and institutions, all of which specialize in providing tertiary level care. Another reason for the involvement of the 'for-profit' sector in providing curative services is the fact that curative services are more profitable.

It is interesting to note that while partnership with the 'non-profit sector' is for programs which are run on a continuous basis, partnership with the 'for-profit sector' is mostly for programs which are organized on an ad-hoc basis; for example, organisation of epilepsy camps, medical and dental camps, etc. NGOs, due to their contacts in the field, are sought for programs being run at the field level, whereas the private sector is mostly being sought for their expertise in specific fields, whether it is medical (for example, involvement of private specialist organizations for providing specialists, organisation of epilepsy, medical and dental camps etc.), or technical (for example, HAAC, EMS, etc.).

While a formal Memorandum of Understanding is signed with all 'non-profit' sector organizations with which partnerships are entered into, the same is not the case with the 'for-profit' sector, where many times the private doctors are paid an honorarium for their services. This substantiates the point mentioned earlier that partnership with the 'for-profit' sector is more on an ad hoc manner than with the 'non-profit' sector. It was also observed that the government gives a lot more freedom of operation to the 'for-profit' sector than to the 'non-profit' sector, which is subject to rules and regulations for each and everything they do. One cannot ignore the inherent attitude of the government officials wherein they feel that by partnering with the 'non-profit' sector, they are doing them a favour by providing them with funds, whereas in partnerships with the 'for-profit' sector, the private partner is doing them a favour by providing them their expertise.

It is also seen that among the 'non-profit' partnership programs, partnership is not just made with one NGO but several NGOs across districts, and each is responsible for the implementation of the program within their district. A nodal NGO is responsible for overseeing the program across the state and an MOU is often signed with this organization. However, in case of 'for-profit' partnership programs, partnership is made with just one private provider which implements the program in the entire state.

An analysis of the presence of PPP projects across the nation in the earlier chapter has revealed that some projects like Emergency Medical Relief System, Community Based Monitoring, Mother NGO/Service NGO scheme, Mobile Medical Unit, Sickle Cell Disease Control Program, accreditation of private hospitals to JSY, Palliative care and PCPNDT are just not specific to the state of Maharashtra, but are present in some other states as well. However, projects such as Health Advisory Call Centre (HAAC), involvement of private specialist organization for providing specialists, organization of Epilepsy Camps with the help of Epilepsy Foundation, Mumbai and Impact India Foundation project are specific to the state of Maharashtra. All these occur in partnership with the 'for- profit' sector. Hence, one can conclude that while a uniform pattern is followed for partnership with the 'non-profit' sector across states, the same

is not the case with the 'for-profit' sector. Partnerships are formed depending on the local needs, availability and interest of the existing 'for-profit' private providers within the state.

While mapping the presence of these projects across various districts of the state, it was noticed that projects like the Health Advisory Call Centre (HACC), accreditation of private hospitals to JSY, Mobile Medical Unit, PCPNDT and Organisation of Specialist Medical and Dental Camps through Medical Colleges in Tribal Hospitals occur throughout the state. For the rest of the projects, the 18 tribal districts are favourite sites for implementation. These include Thane, Nashik, Nandurbar, Amravati, Gondiya, Gadchiroli, Bhandara, Nagpur, Chandrapur, Wardha, Yavatmal, Jalgaon, Nanded, Washim, Akola, Bhuldhana, Aurangabad and Raigad, mainly on account of these being backward districts. While the Sickle Cell Disease Control Program is operational in these districts, other programs like Community Based Monitoring, organization of Epilepsy camps with the help of Epilepsy Foundation Mumbai and involvement of private specialist organization for providing specialist occur in some the tribal districts such as Beed, Parbhani, Yavatmal, Solapur and Kolhapur; all of these again, being socio-economically backward districts. Thus, the linkage between under-development and the subsequent implementation of developmental programs is established in this case as well.

A few projects such as the Community Health initiative and Pfizer India Project of Impact India Foundation for up-gradation of Parli and Bilgarh sub-centres and the Palliative Care Project are specifically operational in Thane district. This can mainly be attributed to the fact that the district has a large presence of tribal population which exists in extreme conditions of deprivation, and thus draws the attention of NGOs and policy makers towards their health. The proximity to Mumbai and the presence of a large number of NGOs are some of the other reasons responsible for the growth of PPP projects in Thane district. The performance of NRHM as reported by government officials is one of the best in the district, which can be another reason as to why the District Health Society, Thane is motivated to take up innovative projects in partnership with the private sector. The rest of the PPP projects that exist in the state of Maharashtra also exist in Thane district, except involvement of Private Specialist Organization for providing specialist. The forthcoming chapters focusses on understanding the PPP projects in Thane district through detailed case studies of the three most successful PPP projects in the district, as mentioned by officials at the state and district level. These chapters would further throw light upon the issues that have been discussed in this chapter.

CASE STUDY OF SELECTED PPPs IN THANE DISTRICT OF MAHARASHTRA

CHAPTER V

The Sickle Cell Disease Control Program

The Sickle Cell Disease Control Program (SCDCP) is one of the oldest and most successful models of Public-Private Partnership in the state of Maharashtra, as mentioned by government officials at the district and state levels. The program, which aims at preventing Sickle Cell Anaemia, a widely prevalent disease amongst the tribal population, is being implemented in all 19 tribal districts of the state.

SCDCP is one of the flagship programs of the National Rural Health Mission (NRHM) in Maharashtra, more so because it is executed in a public-private partnership mode, which is one of the important strategies under NRHM. Partnership exists between the District Health Society and the selected NGO in each district. The program is also the earliest PPP program to be started in the state under NRHM; hence it has been chosen for detailed case study for the larger study on Public-Private Partnership under NRHM in Thane District.

This chapter is an attempt to present the findings of the detailed study of SCDCP in Thane district of Maharashtra. The program has been understood and presented from two angles: one through that of providers at the state, district, block and PHC levels of the two chosen blocks, namely Shahpur and Jawhar in Thane district; and the other, through the beneficiaries residing in villages of these two blocks. This has been done mainly to identify gaps in the implementation of the program. Aspects like the objective of the scheme, its evolution, implementation, problems experienced in its successful implementation, financial aspects, issues of equity, replicability, sustainability, monitoring and the effectiveness of PPP as a mechanism for implementing this scheme have been looked at.

The methodology used to study the program has been described in Box 5.1. The chapter relies on qualitative data collected by focused group discussions and interviews of various stakeholders of the program. It has been presented in four sections: the **first** section explains the concept of the disease and its prevalence, both globally and nationally and the control programs designed to tackle the same across the nation. This has been done by an extensive review of secondary literature. The **second** section describes the Sickle Cell Disease Control program in Maharashtra, with a special focus on Thane district. The **third** section deals with the experiences of beneficiaries' vis-à-vis the implementation of the program in Thane district and finally, the **last** section concludes the chapter.

Box 5.1: Methodology followed for the Case Study of SCDCP

Information presented in this chapter has been gathered through both primary and secondary sources. Primary sources included interviews of important stakeholders of the program. Secondary sources include various national and international journals, as well as government reports at both the state and district levels. This includes state level and district level officials handling the scheme, Taluka Medical officers of both talukas under study, key officials of the district level NGO-Navoday Grameen Sanstha and staff of the four chosen PHCs (two from each block) associated with the program. Experience of the beneficiaries have largely been gathered through focused group discussions and exit interviews of program beneficiaries, along with key informant interviews in the chosen villages of the study.

5.1. SICKLE CELL DISEASE – The Clinical Picture

Sickle cell disease is a unique genetic abnormality of the haemoglobin, whose control and cure still eludes mankind. It is found in significantly higher proportions amongst Indian tribes; hence it has surged to the fore as an important public health problem amongst the tribal population (Babu et al., 2002).

Haemoglobin is the prime protein present in the red blood cells that transport oxygen in the body for various metabolic activities. Various diseases occur due to haemoglobin abnormalities and Sickle Cell Anaemia is one such disease where the presence of abnormal haemoglobin causes the red blood cells to become sickle shaped. The haemoglobin molecule is a conjugated protein which consists of four heme and four polypeptide globin chains (Kate & Lingojwar, 2002). The abnormal haemoglobin molecule causing sickle cell anaemia occurs due to the alteration in the sequence of amino acids in any of the four globin chains of one of the four haemoglobin molecule present in the red blood cells. Since the disease occurs due to distortion in the haemoglobin molecule, it is also termed asa molecular disease.

The abnormal haemoglobin causing the disease was first observed in 1910 by Herrick in the blood smears of a black student. The same was named as *Sickle haemoglobin* by Pauling and his colleagues in 1949. The change in the shape of the red blood cells due to the presence of the sickle haemoglobin is termed as *Sickling*.Sickle haemoglobin gets polymerized at low oxygen tension and deforms the red blood cell from discoid shape to sickle like (crescent) form (Gupta, 2006). Normal blood cells move easily through the blood vessels to carry oxygen to all parts of the body. Sickle-shaped cells do not move easily through blood; they are stiff, sticky and tend to form clumps, eventually getting stuck in the blood vessels. The clumps of sickle cells block blood flow in the blood vessels to the limbs and organs. Blocked blood vessels can cause pain, serious infections and organ damage (‘Sickle Cell Anaemia,’ 2012).

The disease occurs in two forms depending upon the inheritance of genes from the parents. If a person receives only one gene responsible for the sickle haemoglobin from either parent, the condition is called

Carrier or *Trait*. If one inherits two defective genes, one from each parent, the condition is called sickle cell disease and is also termed as *Sufferer*. The Carrier state is known to provide protection against malaria mortality, hence it is also found to occur in high proportions in tropical regions where Malaria is rampant.

Persons with the trait, or in other words 'Carriers' of this disease lead a normal life, but the diseased person or the 'Sufferer', suffers from various complications throughout their life. These include anaemia, bone and joint pain, joint swelling, recurrent infection, osteomyelitis, necrosis of bone, aplastic crises, abdominal pain, splenic sequestration crises, hepato-splenomegaly etc. (Serjeant & Serjeant, 2001). The common clinical features observed in Sickle Cell patients, as per Kate & Lingojwar (2002) are anaemia (moderate type), intermittent jaundice (yellow sclera), joint pains (severe), vaso-occlusive crisis (painful) and splenomegaly. Intermittent jaundice and joint pains are characteristic of the disease.These symptoms are usually visible at the age of three to four years, and severity increases with the age. Extreme hot or cold temperatures and unexpected changes in the atmosphere aggravate symptoms. A vascular necrosis of bones and grade I early proliferative changes involving periphery of the retina are observed in elderly patients. Pregnancy loss, that is, repeated abortions in families where both parents are carriers are recorded. Carriers are usually asymptomatic, except few cases of painless haematuria (Ibid).

Respondents of the study, both providers as well as beneficiaries, were asked to mention the symptoms of the disease as per their knowledge, mainly to test their level of awareness about the disease. Most of them mentioned joint pain, swelling, anaemia and weakness as some of the common symptoms of the disease. As expected, the providers of the program knew much more about the disease in comparison to the beneficiaries. Among the providers, the NGO functionaries were the ones who possessed the maximum knowledge about the disease; in fact much more than even the government staff. This is mainly because the NGO takes special efforts to organize trainings for its staff, which the government does not. This serves to be beneficial for the program, as it is primarily the NGOs prerogative to spread awareness about the disease in the community.

The *treatment* of the disease is debatable. While some literature says that the disease is incurable (Kate & Lingojwar, 2002), others have mentioned Gene Therapy and Bone Marrow transplantation as possible cures for the disease, although it has still not been proven that these are definitive treatments for the disease(Castro,1999). Also, these procedures are complicated and involve high costs. Since transplantation has cured some cases of the Sickle Cell Disease, the Directorate of Medical Education and Research (DMER), has not been able to label the disease as incurable, in spite of constant pressure from

activist groups.[7]Even if bone marrow transplantation was a cure of the disease, its management cost is prohibitively high; neither the government can afford to provide it to a wide segment of patients nor patients themselves can afford it, as they generally belong to the low economic groups.

SL Kate, who has worked extensively on Sickle Cell disease in Maharashtra, has categorized the treatment strategies for the disease into five categories, namely, anti-sickling agents, vasoactive drugs, enhancing foetal haemoglobin production, bone marrow transplantation and gene therapy. At the same time, he also mentions that none of these facilities are available in tribal areas. Hence, the tribals have no choice but to approach their traditional healers – '*Bhagat*' on whom they have complete faith and confidence (Kate, 2000). Thus, in tribal areas the disease may be considered as incurable. It is mainly because of this fact that even medical officers of the studied PHCs were unaware about the treatment for the disease. They do offer symptomatic treatment to patients by giving them iron and folic acid as well as antibiotics and painkillers, which may temporarily relieve symptoms such as anaemia, joint pain and other discomforts, but their inability to cure the disease makes them feel helpless. The MOs were not even aware about options like gene therapy and bone marrow transplantation, and expressed the need for more training in the area. The MO of Shendrun PHC mentioned that,

"*The program can become successful in the true sense if we are able to cure the sufferers and prevent them from dying*" (Dr. Pushpa Mathure, MO, Shendrun PHC, 21st December 2012).

Since there is no specific treatment available for the disease, the only alternative is prevention. Health education and genetic counselling are good preventive strategies (Kate, 2000). Preventive measures also include screening of the unmarried population and preventing marriages between two carriers, identifying high-risk couples for this disorder at the time of antenatal care and monitoring the pregnancy, counselling of the couple after prenatal diagnosis for aborting the sufferer foetus, etc. According to Gupta (2006),

"*With a comprehensive medical care and management approach, the health status and life expectancy of these patients can be improved considerably"* (p. 4).

Hence, the entire discourse on the treatment of the disease can be summed up in the words of Dr. Saranya, an official working on Sickle Cell at the State Health Society, Maharashtra,

"*One can say that there is no treatment for this disease, as the treatment measures like bone marrow transplantation is extremely costly and occurs at selective places. Symptomatic treatment can be provided*

[7]Activists from Sickle Cell Society of India, Nagpur, have been trying to get information from DMER, Maharashtra through an RTI, as this would help Sickle cell patients avail several facilities which are available to patients of other incurable diseases, like travel concessions, etc. (Source: Times of India, Nagpur, July 23rd, 2011).

to the patients. Prevention is the only cure for this disease" (Dr. Saranya, Quality Control Officer, State Health Society, Maharashtra, 25th January, 2012).

5.2. DISTRIBUTION OF SICKLE CELL DISEASE IN INDIA

Globally, sickle cell and thalassemia are among the world's leading genetic conditions, with over five percent of the world's population carrying clinically significant haemoglobin gene variants (Modell & Darlison, 2008).

50% of the world's sickle cell population resides in India ('HCG opens first,' 2011). Hence, India leads the world in the prevalence of this disease. Over 20 million individuals throughout the country are affected by the disease (ASHWINI, 2010). According to the Indian Council of Medical Research, an estimated 1,21,375 sickle cell anaemic and 24,34,170 sickle cell carriers are expected to be present among tribals in nearly 75 districts in India (ICMR, 1988). Rajasthan, Gujarat, Maharashtra, Madhya Pradesh, Chhattisgarh, Orissa, Tamil Nadu, Andhra Pradesh, Karnataka and Kerala are the states which lead in terms of the prevalence of this disease (Babu et al., 2002).

The disease which was first identified by Lahmann and Cutbush about 50 years ago amongst some tribal groups of the Nilgiri Hills in South India and the North-eastern hill region in Assam, is now established to be highly prevalent among the Scheduled Caste (SC), Scheduled Tribe (ST) and Other backward communities (OBC) of Central and Southern India (Bhatia & Rao, 1986; Kar, 1986 and unpublished reports). In South India, the prevalence of sickle cell trait is as high as 34.7% recorded in the Pardhan tribe of Andhra Pradesh, and 34% reported among the Paniyars of Nilgiri hills of Tamil Nadu. Relatively higher incidences of the disease are reported in some Indian populations such as Adiyan of Kerala (32%), Irulas of Nilgiri hills (31%) Griza Oriahas of Assam (29%), Sorathis of Western India (30.6%), Gamit of Gujarat (31.4%), Paniyars of Kerala (29.7%), Maharas of Madhya Pradesh (28.2%), Kouda Kammara of Andhra Pradesh (28%), and Raj Gond (27.8%) and Muria (26.6%) of Bastar, Madhya Pradesh (Babu et al., 2002).

In *Madhya Pradesh,*out of 45 districts, 27 fall under the sickle cell belt. The prevalence rate of sickle haemoglobin in the state ranges between 10-33% among different castes and tribal groups. The prevalence of sickle haemoglobin varies from 10-25% among the Gonds and 15-33% among the Bhils, which are the two largest tribal groups in the area. About 3,358 new-borns with sickle cell disease are expected to be added every year and about 13,432 pregnancies are at risk annually. About 70,000 high-

risk couples of eligible age group need to be counselled regarding management and prevention of sickle cell disease (Gupta, 2006, p. 3).

In *Chhattisgarh* too, the disease is prevalent in alarming proportions, as more than 30 lakh people within the state are suffering from the genetic disorder which constitutes 20% of the state's population. Every year, about 10,000 people die of the disease and about six percent of infants die within six months of birth('Project to tackle,' 2004).

The prevalence of the disease is high amongst the tribal population residing in hilly areas of *Andhra Pradesh*. These include Pardhan (31.78%), Kouda Kammara (22.3%), Bod Mali (15%), Valmiki (14.8%) and Manzai Mali (13.7%). About one out of every ten tribal individuals of Andhra Pradesh carries the sickle haemoglobin gene. It is estimated that every year, among the tribal population of the state, about 342 births are occurring with the sickle cell disease and 11,279 sickle cell carriers are emerging (Babu et al., 2002).

Orissa too is a leading state in terms of prevalence of the disease. The prevalence is highest among Konda Dora (7.6%), Kutia Khond (6.7%), Binjal (4%) and Parang Gadaba (3.9%) tribes. Around 320 sickle cell anaemic and 15,523 carriers are taking birth every year among the tribal population (Ibid).

According to a recent survey conducted by the Indian Council of Medical Research (ICMR), the incidence of genetic disorders that causes severe sickle cell anaemia is highest amongst the tribal population in the state of *Gujarat*. Almost 34% of the samples examined for the study in the state were found to have sickle cell anaemia (Majithia, 2011).

5.3. SICKLE CELL DISEASE IN MAHARASHTRA

Maharashtra is one of the leading states in terms of prevalence of Sickle Cell Anaemia (Kate & Lingojwar, 2002, p. 166). One reason for the same may be the presence of a huge tribal population in the state. Available data shows that it is widely spread in all districts of Eastern Maharashtra (known as the Vidharbha region), North Maharashtra (Satpuda ranges) and some parts of the Marathwada region. It is estimated that districts with more than 5,000 cases of sickle cell anaemia are Gadchiroli, Chandrapur, Nagpur, Bhandara, Yavatmal and Nandurbar (Ibid). Table 5.1 shows the prevalence of sickle cell disorder in various districts of Maharashtra. As per the DMER draft proposal of June 2008, out of 35 districts of the state, sickle cell disease is prevalent in 19. These are Thane, Nashik, Nandurbar, Amravati, Gondiya, Gadchiroli, Nagpur, Chandrapur, Bhandara, Wardha, Yavatmal, Dhule, Jalgaon, Nanded, Washim, Akola, Bhuldhana, Aurangabad, Raigad ('Sickle Cell Anaemia,' 2012).

Table 5.1: District-wise prevalence of Sickle cell disorder amongst the Scheduled Tribe Population in Maharashtra

District	Prevalence (in percentage of total tribal population in the district)
Chandrapur	24
Gadchiroli	23
Nagpur	22
Bhandara	18
Gondiya	15
Thane	12
Wardha	7
Washim	7
Aurangabad	7
Nandurbar	5
Pune	5

Source:Kate & Lingojwar, 2002, p.165

Dr. Kate and his associates in BJ Medical College, Pune have been conducting population genetic surveys in different tribal areas of Maharashtra between 1990-2000, by using simple, inexpensive, rapid and reliable laboratory techniques for detecting the prevalence of sickle cell disorder. These techniques, which were developed by them, are suitable for field work and require minimum amount of blood (only a few drops). The results are available within half an hour, and the test is very cost effective. The tests include:

1. Solubility test
2. Electrophoresis at alkaline pH using cellulose acetate membrane as supporting medium.[8]

As a result of these surveys, the prevalence of the disease amongst the different tribes was seen. The same is presented in Table 5.2.

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[8]The same tests developed by BJ Medical College by Dr. Kate and his associates are being used extensively in the Sickle Cell Disease Control Program of Maharashtra state.

Table 5.2: Prevalence of Sickle Cell Disorder (carrier) among Scheduled Tribe population groups in the state of Maharashtra

Tribe	District	Prevalence (%)
Otkar	Gadchiroli	35
Pardhan	Gadchiroli, Chandrapur, Nanded, Yavatmal	32
Pawara	Nandurbar, Dhule, Jalgaon	25
Madia	Gond, Gadchiroli, Yavatmal	21
Bhil	Nandurbar	21
Halbi	Gadchiroli	13
Malhar Koli	Thane	14
Rajgond	Gadchiroli	11
Korku	Amravati	10
Kolam	Yavatmal	09
Warli	Thane	09
Katkari	Pune, Raigad, Ratnagiri	06
Kokana	Dhule, Nashik	04
Andha	Nanded	02
Mahadeo Koli	Pune, Nashik	01
Thakur	Pune, Raigad, Thane, Ahmednagar	01
Paradhi	Solapur	00

Source: Kate & Lingojwar, 2002, p.164; Kate, 2000

Population genetic survey data from BJ Medical College (2000) indicates that the prevalence of sickle cell disorder in the overall population of Maharashtra is less than 0.1%. However, prevalence is very high (20-35%) among the Bhil and Pawara tribal groups from the Nandurbar District and the Madia, Pardhan, Otkar and Gond from the Gadchiroli District. The highest recorded prevalence is among the Oktar group in Gadchiroli district, that is, 35%. It is estimated that there are more than 10,000 sickle cell patients in the Nandurbar district itself while the Gadchiroli District is expected to have more than 5,000. The same tribal population groups residing in neighbouring states of Gujarat, Madhya Pradesh and Andhra Pradesh

have a similar prevalence. The sickle cell gene is practically absent among the Mahadeo Koli, Thakar and other tribal groups from Western Maharashtra. The overall prevalence among tribal populations is about 10% for the carrier state and 0.5% for sufferers (Kate, 2000).

According to the 2001 census, when the population of the state was 100 million and SC, ST and OBC population was 25 million, ten percent of this population were expected to be carriers, that is, an 2.5 million and 0.5% of this population were expected to be sufferers, which is an estimated 0.125 million (Kate & Lingojwar, 2002). Recent data on the prevalence of the disease amongst different tribes is not available. However, between 2010 and January 2012, the Sickle cell disease control program of Maharashtra has been able to screen 37,41,725 people in the state of Maharashtra, out of which 56,640 are carriers of the disease and 6,004 are sufferers of the disease ('Sickle Cell Anaemia,' 2012).

5.4. INTERVENTIONS TO CONTROL THE DISEASE ACROSS STATES

As seen in the section above, the disease is widely spread across the nation, and still there is no nationwide comprehensive health program to address the same. It has been rightly mentioned in the manual by ASHWINI (2010), according to who despite the wide prevalence of the disease in the country, there isn't any comprehensive nationwide program to address the same. The disease has traditionally received little attention from health services in India.

In most states, the disease receives scant attention from the government health services. Basic facilities to manage patients are usually absent, systematic screening is not a common practice and diagnosis is usually made at a later stage of the disease. Largely, only civil society organizations are working on this issue, with small scale projects, in segregated areas, without proper documentation and regular follow up (One world Net, 2011).

Various states have initiated their own programs to tackle the disease, all of which are based on the assumption that there is no cure for the disease, and any strategy meant to deal with it has to focus on prevention and early diagnosis to ensure effective management. In some states, the disease control program is being run by the state government (Maharashtra, Gujarat, Chhattisgarh) while in others (Karnataka, Tamil Nadu) they are run by voluntary organizations and private bodies; for example, in Karnataka, the Health Care Global Enterprises Limited (HCG) has opened its first sickle cell clinic which provides patient care, education, screening and counselling for afflicted patients and their families ('HCG opens first,' 2011). In Tamil Nadu, a private sector organization ASHWINI (Association for health welfare in the Nilgiris) has been implementing a well-designed and comprehensive Sickle Cell Control

programme for more than ten years among the Adivasi and Chetty population of about 30,000 in the Gudalur valley, Nilgiri district, Tamil Nadu.

In most states, the disease control program is being implemented in partnership with NGOs. The first state to launch the Sickle Cell Disease Control Program was Gujarat. The program was launched in four districts of south Gujarat. *Valsad Raktdan Kendra*, an NGO working on Sickle Cell Anaemia since 1984, was appointed as a nodal agency to implement this GO-NGO partnership program, in collaboration with district health authorities. In 2010, the program was extended to all 12 tribal districts of Gujarat and steps were taken to form a Gujarat Sickle Cell Anaemia Control Society, under the Society's Registration Act 21 of 186. The activities of the program include New Born Screening (NBS), treatment and counselling of Sickle Disease patients, including prevention by marriage counselling and prenatal diagnosis ('Sickle Cell Anaemia Control,' 2011). The success of the program can be gauged from the fact that a total of 13,96,904 tribal people have been screened by the program between 2006 and March of 2011. The screening has helped in identifying 10,673 sickle cell disease patients and aided in ensuring that adequate treatment and guidance is delivered to them (One world. Net, 2011).

In Chhattisgarh, the state government has launched a program in collaboration with the Chhattisgarh InfoTech and Biotechnology Promotion Society and the International Genetic Engineering and Biotechnology Centre ('Project to tackle Sickle Cell,' 2004). The program is run on lines similar to that of Gujarat and Maharashtra.

5.5. SICKLE CELL DISEASE CONTROL PROGRAM IN MAHARASHTRA

In Maharashtra, the Sickle Cell Disease Control Program is being run in collaboration with various local nongovernmental organizations (NGOs). The program is functional in 19 districts of the state, which have been indicated by DMER in a 2008 report, as districts where the disease is prevalent. SCDCP is being implemented in these districts in a phase-wise manner by NRHM since 2008. Thane, Nashik, Nandurbar, Amravati, Gondiya and Gadchiroli were the districts where the program was started in the first phase in 2008. In 2009-10 (Phase II), five more districts were added, namely, Bhandara, Nagpur, Chandrapur, Wardha and Yavatmal. In 2010-11 (Phase III), while in Phase IV (on-going since 2011), seven new districts have been added, namely, Jalgaon, Nanded, Washim, Akola, Bhuldhana, Aurangabad and Raigad (www.nrhm.maharashtra.gov.in, 2012). According to Dr. Saranya, Quality Control Officer, SCDCP, State Health Society-NRHM, Maharashtra,

"*The program was implemented phase wise because it was difficult to start the program in all 19 districts at one go*" (25th January 2012, State Health Society, Mumbai).

It is interesting to note that the program is being run in collaboration with NGOs in districts where it was started in the first and second phases. NGO involvement is not seen in districts which have been added to the program in later phases; instead the program is being run by the existing health staff, which includes the ANM, MPW and ASHA. A reason for this as explained by Dr. Saranya is that,

"A lot of politics happens in the NGO selection. NGOs try to use their clout for influencing the government for selection. The NGOs that are not selected do a lot of bad mouthing about the government, as well as the NGO that is selected. Hence in the newer districts, we are doing away with NGO involvement" (25th January 2012, State Health Society, Mumbai).

Stake holders of the Program

Important stakeholders involved in this program at the PHC level include the following: The NGO volunteer who is primarily responsible for awareness generation, the technician, ANM and Medical Officers who are involved in testing and treatment of the disease. Other officials at the PHC level, like the MPW and ASHA workers are also important for the program, as they are expected to play a key role in awareness generation of the disease. However, the field level study revealed that they were not informed of the same, as in many villages, ASHA workers were unaware about the disease and the control program. Other important stakeholders of the program include supervisors and other NGO staff – Program coordinator and NGO President in this case; staff of rural hospital, sub district and district hospitals which conduct the electrophoresis test as well as the blood transfusion; staff of District Health Society of Thane which includes DPM, the coordinator of the program and the staff looking after the program at the State Health Society. The Block Health Officer, commonly known as the Taluka Medical Officer also plays an important role in this program, as they are expected to monitor it at the block level. Besides the NGO, all PHCs send a copy of their monthly report to them. Also, the TMO is responsible for the disbursement of funds to various PHCs in his *taluka*. The kits for solubility test are bought by the TMO, who then distributes the same to different PHCs.

During the course of the study, the researcher has tried to gather views of all above mentioned stakeholders involved in this program by conducting in-depth interviews. The next section is an attempt to understand various aspects of the program from the perspective of these stakeholders, whom we refer to as the providers of the program.

SCDCP from the perspective of Providers of the Program

Goal and Objectives

The goal of the program is to prevent the birth of affected children (Dr. Saranya, State Health Society, NRHM Maharashtra, 25th January 2012), to identify existing Sickle Cell patients, and to treat them. The program aims to achieve this by testing the tribal population within the state and spreading awareness amongst them about the disease. The target age group of the program is 1-30 years, with special focus on pregnant mothers and adolescent children, especially adolescent girls, as it is easy to locate them (Dr. Deolalkar, MO Vashind PHC, 7th December, 2011). At present, the focus of the program is on prenatal testing, spouse testing and partner testing before marriage (Dr. Saranya, 25th January 2012). Prenatal testing of pregnant women is done in KEM hospital. Volunteers bring these women from the villages for testing, and if their babies are sufferers, they can abort the foetus, if they desire so. The objectives of the program, as per the NRHM Maharashtra website, is mentioned in the Box below:

Box 5.2: Objectives of SCDCP

Creating public awareness, screening general population, with special focus on target group, training of Medical Officers & other paramedical staff at PHC, RH & DH for testing, counselling & treatment, equipping hospitals with electrophoresis machines, providing testing facilities at Primary Health Centres, Rural Hospitals, Sub District Hospital & District Hospital, referring positive cases from Solubility positive samples for electrophoresis test to nearest Electrophoresis testing Centres, identifying carriers and sufferers, issuing yellow cards to carriers and red cards to diseased individuals, counselling carriers and sufferers for marriage and importance of regular treatment. Providing prophylactic and symptomatic treatment at Primary Health Centre, Rural Hospitals and District Hospitals; along with Speciality treatment at District Hospital and Medical Colleges.

Source: Sickle Cell Anaemia. Retrieved from http://nrhmmaharashtra.org/sickle.htm,accessed on 6th March 2012

On the whole, the program focuses on creating awareness in the community about the disease, identifying sickle cell carriers and sufferers by administering the Solubility and Electrophoresis tests and treatment of the disease.

Evolution of Sickle Cell disease control program in Maharashtra

As mentioned in the earlier section, the problem of Sickle cell in Maharashtra came to the fore through the Population Genetic Survey conducted by SL Kate and his associates in BJ Medical College, Pune in 2000. Soon after this, the Indian Council of Medical Research (ICMR) launched a preventiveprogram on a trial basis, among high risk tribal populations in the State of Maharashtra, considering the wide prevalence of the disease in the state. Since Nandurbar and Gadchiroli were the districts leading in the prevalence of the disease, two community control programme centres were established in a block in each

of these districts and a few villages under each block were chosen for intervention. The main activities of the centre included, carrying out population genetic survey programs to detect carriers and sufferers, follow up of sickle cell anaemia patients, health education, genetic counselling, marriage counselling and providing pre-natal diagnosis whenever required (Kate, 2000).

One of the most important landmarks in the evolution of SCDCP in Maharashtra was the DMER Maharashtra's report of 2008, which indicated the prevalence of Sickle Cell Anaemia in all 19 tribal districts of the state, namely Thane, Nashik, Nandurbar, Amravati, Gondiya, Gadchiroli, Nagpur, Chandrapur, Bhandara, Wardha, Yavatmal, Dhule, Jalgaon, Nanded, Washim, Akola, Bhuldhana, Aurangabad and Raigad. Following this, the Sickle Cell Disease Control Program was launched in 2008 in the six most affected districts namely, Nandurbar, Nashik, Thane, Gadchiroli, Gondiya and Nagpur. The program is now operational in all 19 districts indicated by DMER, which were added in different phases of the program. This was mainly due to the efforts of activists from the Nagpur based National level NGO, Sickle Cell Society of India (SCSI). Even though the disease control program envisaged covering all 19 affected districts, the same did not happen by 2011. Social activists of the SCSI, Mr. Sampat Ramteke (president) and Mr. Namdeo Gaikwad (member) took the matter to the state *Lokayukta*, as a result of which the newer districts of Akola, Washim, Bhuldhana, Aurangabad, Jalgaon, Raigad and Nanded were added in Phase IV of the SCDCP in 2011 (Shrivastav, 2011).

These activists have been fighting for the cause of Sickle Cell patients in the state of Maharashtra, whose numbers have reached 2.5 lakhs within the state, for over two decades now. It is because of their demands that a range of privileges are made available to Sickle Cell patients by the government. These include provision of Rs. 600-900 per month to the sufferer of the disease for buying ration and the provision of free blood transfusion and other health care services to sickle cell patients in any government hospital. The group is also fighting for travel concessions for sickle cell patients and their attendant, which is available to patients of other incurable diseases. However, this has not happened yet as the DMER has not confirmed the incurable status of the disease.

5.6. SICKLE CELL DISEASE CONTROL PROGRAM IN THANE DISTRICT

Thane is one of the districts which were adopted in the first phase of implementation of the program in 2008. The District Health Society of Thane district of Maharashtra gave the contract to the NGO, *Navoday Grameen Sanstha*, stationed in Jawhar block of the district, to run the Sickle Cell Disease Control Program (SCDCP) in all 11 tribal blocks of Thane district where the disease is considered to be highly prevalent. These are Jawhar, Wada, Mokhada, Vikramgarh, Shahpur, Murbad, Vasai, Bhiwandi,

Dahanu, Palgarh and Talassari. The program is spread across 53 PHCs at 53 villages of these blocks, and operates through a network of volunteers who are chosen for each PHC from the local community by the NGO. The work of volunteers at each block is supervised by a Field Supervisor appointed by the NGO; for every six volunteers, there is one field supervisor. Hence, a total of nine field supervisors are there in the program. This team of volunteers and field supervisors is headed by a Program Coordinator, who is stationed at the NGO headquarter in Jawhar. In addition, the program staff includes a Project Manager and an Accountant cum Data operator (Ms. Bhawana, Program Coordinator, Navoday Grameen Sanstha, 1st November, 2011).

Box 5.3: About the NGO, *Navoday Grameen Sanstha*

Navoday Grameen Sanstha is an NGO with a rich history of working in the area of health and family welfare programs. Situated in the Jawhar block of Thane district, and registered under the Society Registration Act in 2003, the NGO has worked with the government on various projects. Recently it was associated in the pilot phase of the NRHM project on Adolescent Reproductive and Sexual Health (ARSH), run in partnership with the District Health Society Thane, which has now been handed over to another State level NGO-SPARSH. Education & Literacy, HIV/AIDS, Nutrition, Rural Development & Poverty Alleviation, Tribal Affairs, Women's Development and Empowerment are the other key issues on which the NGO works.

Evolution of the program in Thane district

The first step towards starting the program in Thane district was selection of the NGO. For this, the government gave an advertisement in the newspaper, to which approximately 27 NGOs responded and out of these, seven were shortlisted for verification. The minimum criteria for the NGOs selection included:

- Five years of experience working in the health sector.
- Experience working in tribal areas.
- A minimum number of staff, a place for conducting meetings, furniture and vehicles.
- The NGO should be able to meet the running cost of the project in case funds are delayed. (Mr. Kotwal, President Navoday Grameen Sanstha, 2nd December, 2011).

The applicant NGOs were also required to submit their registration papers and financial statement of the last five years. On the basis of the above mentioned criteria, committees at the district and state level reviewed the applications of all the 27 NGOs and shortlisted seven. Following a second round of review of the shortlisted NGOs, the committees selected *Navoday Grameen Seva Sanstha*, as it met all the above mentioned criteria (Mr. Shashikant Chauhan, District Coordinator, SCDCP, 28th October, 2011). The NGO president Mr. Mushtaq Kotwal said that,

"The main reason for us to get this project was due to our reputation of doing good and honest work. Also the NGO shares good contacts with the government on account of having been involved in a government project on Adolescent Reproductive and Sexual Health (ARSH) in the past" (2nd December 2011, Jawhar, Thane).

As reported by the District Program Coordinator, Thane district, Ms. Reeta Gaikwad, ARSH project ceased its operations because the government did not approve its continuation in partnership mode. This program is being run entirely by the government now (10th December 2011, District Health Society, Thane). Mr. Kotwal however, had a different version on this. According to him, the project was withdrawn from them after the pilot phase, and handed over to a state level NGO named SPARSH.

After the contract for running the project was finalised with *Navoday Grameen Sanstha*, the NGO president Mr. Kotwal contacted his friends in Nandurbar who were working in the area of Sickle cell as a part of the Population Education Project. It is from them that he got to know about the disease and its prevalence amongst the tribal population. Through them, Mr. Kotwal also got in touch with a group of people working in the area of Sickle cell, who introduced him to Mr. Sampat Ramteke, a civil engineer by profession and president of the Sickle Cell Association of India. Mr. Ramteke himself lost his son as a result of this ailment, which motivated him to take up the mission of creating awareness about this disease and fighting for the cause of Sickle Cell patients. Mr. Ramteke organized training on Sickle Cell for the NGO staff through the Nagpur Medical College. Mr. Ramteke and his associates also trained the NGO to prepare red, yellow and white cards, and distribute the same to the sufferers, carriers and negative patients respectively (Mr. Kotwal, President Navoday Grameen Sanstha, 2nd December, 2011).

Partnership Formulation

The two parties, namely the District Health & Family Welfare Society and *Navoday Grameen Sanstha* entered into a contract by signing a formal memorandum of understanding, the terms and conditions of which were decided mostly by the government. Some of the highlights of this MOU can be seen in Box 5.4.

Box 5.4: Highlights of the MOU between District Health & Family Welfare Society, Thane &*Navoday Grameen Sanstha*, Jawhar

- The agreement between the two parties is on an Rs.100 stamp paper.
- Signed on 8th September 2009.
- Duration of contract: 11 months. Hence, the contract is being renewed since 2009 for a period of 11 months.
- DHS is the grantor and the NGO is grantee. Hence the DHS provides funds and the NGO implements the program as per the terms and conditions of the agreement. The guidelines for implementing the program are set by the DHS.
- The grantee will submit reports and necessary documents as mentioned in the agreement on time.
- The financial allocation for the NGO for a period of one year is Rs.40,05,000/- (Rupees Forty lakhs and five thousand only).

Source: MOU between the District Health Society, Thane and Navoday Grameen Sanstha, 2009

Role of the partners and Coordination between them

The government's role in the program includes providing funds for its operation, training of the staff, testing, diagnosis and treatment, while the NGOs role is awareness generation. Hence one can see that the government's responsibility in the program is far more than that of the NGO. However, it is important to note that during the course of implementation of the program, the government has withdrawn itself from all its roles, and passed it on to the NGO. The NGO thus does the testing, training and staff selection, along with its original role of awareness generation. Hence the entire responsibility for running the program has fallen on to the NGO, while the government has limited its role to that of a funder. The fact that the government is providing funding for the program has also given it the liberty to withdraw from all its responsibilities and pass it on to the NGO. They have also assumed the authority to control the entire program. They act as a 'watch dog', always trying to find out the NGOs fault. There is no-one to control them.

This tendency of the state to pass the buck on to the NGO is inflicting a lot of harm to the population for which the program is meant. Testing, which is purely the job of a technician, and should be conducted by the lab technician of the PHC, is often conducted by volunteers of the NGO who are not technically qualified for the same. When the same was reported to Dr. Pooja Singh, DRCH officer, Thane district, she denied it saying that this is illegal and is not happening anywhere. The president of the NGO Mr. Mushtaq Kotwal explains this by stating,

"*The technicians in most of the PHCs are not willing to go to the camps for testing, hence we had no other option but to train our volunteers for testing as we had to meet the targets*" (2nd December 2011, Jawhar, Thane).

The same reason was also given by most NGO volunteers who shared that the pressure to meet the target is so high that they are compelled to conduct the tests themselves; otherwise they would not be able to meet the targets ever. Another reason for this can be the fact that the technicians have to take care of patients who come to the PHC for testing on an OPD basis, so it is difficult for them to leave the premises and join the camp site. Another facet observed by the researcher and also shared by some volunteers was that people coming in for any blood test to the PHC are tested for Sickle cell without the patient being informed. This is mainly done to meet the targets set for testing by the government. Hence, the Sickle Cell Disease Control Program is violating the principles of Medical Ethics to a great extent.[9] The principles of beneficence and non-maleficence are defied, as testing is being done by people who are not trained or authorized to conduct the same. This might lead to the procedure being carried incorrectly, thereby harming patients in the long run. The principles of autonomy, truthfulness and honesty are defied as people are being tested without being informed, when according to this principle, each individual has a right to decide his line of treatment and should give an informed consent for the same.

Similarly, training which should be organized by the government for all staff (government as well as NGO), has also been taken over by the NGO. The government has organized just one training, that too with the support and contact of the NGO. The program staff reported that this training was completely unsuccessful in improving their knowledge base about the disease. The training component of the program has been described in detail in subsequent sections.

Coordination between the partners is often a problematic area in most PPP programs, hence the researcher focused on exploring this aspect of SCDCP. Most respondents from both sides (government and NGO) responded that good coordination exists between them. However, some of them revealed that the government's behaviour towards the NGO was not good. Mr. Mushtaq Kotwal, President Navoday Grameen Sanstha mentioned that,

"The government officials do not give respect to the NGO people, their behaviour is not good towards us" (2nd December 2011, Jawhar, Thane).

Almost all volunteers as well as other staff of the NGO felt that the PHC or the government gives all its attention to national programs like TB, Malaria, leprosy, immunization, RCH, etc. and do not give importance to Sickle cell as it is not a national program. Also, they reported that the government has a tendency of passing the entire responsibility to the NGO and the program is considered to be the NGOs

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[9]The six universal principles of medical ethics include: Principle of Autonomy, Beneficence, Non-maleficence, Justice, Dignity, Truthfulness and honesty.

'baby'.Government officials on the other hand, had some other grievances with the NGOs. One of the Medical officers, Dr. Deolalkar expressed that,

"There is a tendency of the NGO to expose the government. This is not good, we don't expose the NGO" (14th December, 2011, Vashind PHC).

The technician of Jamser PHC, Jawhar, Mr. Gavit Dharamdas reported of a lack of communication between the government and NGO, as a result of which the government is not aware of the problems that the NGO faces.

Target

As reported by the District Coordinator of SCDCP Mr. Shashikant Chauhan,

"The target of the program for the year is to test at least 35,192 people, which is 20% of the population, and to spread awareness to the entire population at least twice" (28th October, 2011, District Health Society, Thane).

The Program Coordinator of the NGO, Ms. Bhawana reported that the target is too high to achieve, which puts a lot of pressure on them. The pressure on the NGO gets translated into pressure on the NGO volunteers for performance. This was also reported by volunteers at various PHCs. The volunteer of Shendrun PHC had tears in her eyes when she reported that there is an immense pressure on her from the NGO to meet the targets. She has often been threatened by the NGO with removal from her job; in case she does not meet the targets of testing and awareness.

There is a positive side to this as well; the pressure put on the NGO and its staff, makes them work hard and achieve their targets. This was also reported by Mr. Shashikant Chauhan, the coordinator of SCDCP for Thane district, who had high praises for the NGO, mainly because they have been achieving 100% of their targets for testing and awareness since the past four years. The question that arises here is,

"*Is it right on the government's part to put so much pressure on the NGO, in order to make them perform, which in this case was leading the NGO to adopt malpractices for target achievement."*

Activities & Implementation

When the program first started, it just focused on awareness generation and there were no targets for counselling and testing (Mr. Shashikant Chauhan, District Coordinator, SCDCP, 28th October, 2011). Gradually, testing was introduced and targets were set for the same.According to Mr. Kotwal, President of Navoday Grameen Sanstha,

"*In the initial phase, the program focused more on awareness creation for which IEC materials were prepared"* (2nd December, 2011, Jawhar, Thane).

The volunteer of Jamser PHC, Mr. Pravin Baban Avatar, reported that awareness generation activities at the initiation of the program included rallies, village meetings, arrangement of camps and door-to-door camps (2nd December 2011, Jamser, Jawhar, Thane dist.).

Later in 2009, training was imparted for testing, which was organized by NRHM in collaboration with a Nagpur based Global Bioscience Company, which is also the manufacturer of the testing kits. This training was organized both for the NGO as well as the lab technicians and Medical Officers of the PHCs, for conducting the solubility and electrophoresis test (Mr. Shashikant Chauhan, District Coordinator, SCDCP, Thane district, 28th October, 2011). The NGO president claims that they had taken a lead in organizing this training, and the contribution of NRHM was limited to funding for the training. Once the staffs were trained, testing and awareness started going hand in hand in the program (Mr. Kotwal, President Navoday Grameen Sanstha, 2nd December, 2011, Jawhar, Thane).

Besides NGOs, other institutions that are involved in the program include health institutions at the district level, like the Primary Health Centre, Rural Hospital (RH) or the Sub-district hospital (SDH) and the District Hospital (DH). The services provided by the PHC include: conducting solubility test to identify sickle cell Carriers and Sufferers, counselling of the tested patients, regular Health check-ups of Carriers and Sufferers, provision of Prophylactic and Symptomatic treatment to Carriers and Sufferers and maintenance of records and register. The RH or the SDH, besides providing all services offered at the PHC, are also involved in conducting electrophoreses testing, in case it is designated by the program as an Electrophoresis centre. Where the RH/SDH has a blood storage centre, it also provides blood transfusion to Sickle cell sufferers. Besides fulfilling the functions of PHC and RH/SDH, District Hospital also provides specialty services.

As mentioned earlier, the program works through a network of volunteers placed at the PHC level, whose work is supervised by supervisors placed at block level. The work of the volunteer includes creating awareness about Sickle Cell Disease within the community and motivating them to get themselves tested for the same, transportation of positive blood samples for electrophoresis test, registering the Sickle cell sufferers and carriers and counselling them. The volunteers are also expected to distribute the colour coded cards (Red-Sufferer, Yellow-Carrier, White-Negative), prepare IEC in local language and distribute the same, arrange meetings and testing camps for schools, colleges, Ashram schools etc. The supervisors, besides supervising the work of the volunteers are also expected to carry blood samples for testing.

The volunteers work on creating awareness in the villages using different types of IEC activities, which include addressing youth groups and *Mahila Mandals*, distributing IEC materials to them, organizing

testing and awareness camps in colleges, schools etc. and bringing them to the PHC for check-ups. In Jawhar block, the volunteers even reported using innovative strategies like street plays and rallies for awareness generation. Awareness generation also encompasses counselling, which includes counselling sufferers for regular treatment, premarital counselling for carriers above 15 years and counselling pregnant mothers for early registration and prenatal diagnosis. According to the Program Coordinator of Navoday Grameen Sanstha, Ms. Bhawana,

"Premarital counselling becomes extremely critical in case of carriers, because marriage between two carriers leads to a sufferer child" (1st November 2011, Jawhar, Thane).

Testing is done at the PHC using the Solubility test, which is a preliminary test and can be conducted in 10 minutes. As mentioned earlier, it was developed by Dr. Kate and his associates at BJ Medical College, Pune in 1999. The samples that are found positive in this test are referred to the nearest Electrophoresis centre by the volunteers or supervisors for the Electrophoresis test, which confirms the presence or absence of Sickle Cell Carriers and Sufferers. The Electrophoresis centres in the district include Rural Hospital, Wada, the Sub-district Hospital in Shahpur as well as Dahanu and Cottage Hospital, Jawhar. The severe cases of sufferer are referred to the Civil Hospital, Thane for treatment. Treatment is arranged from experts at KEM and JJ Hospital through Telemedicine. A Day Care Centre has been created for the Sickle Cell Patients in Civil Hospital, Thane, which was inaugurated on 20th January, 2012 by the Health Minister of Maharashtra. This is a special ward where sickle cell sufferer patients can stay and receive treatment as well as care (Mr. Mushtaq Kotwal, President, Navoday Grameen Sanstha, 2nd December 2011).

Testing is done at the PHC on an OPD basis, as well as in camps. Almost all volunteers as well as other staff of the PHCs reported that hardly anyone comes on their own to the OPD for testing. Dr. Mathure, MO of Shendrun PHC reported that in a month, around two-three people come for testing on their own. However, the volunteer of the Shendrun PHC shared that about 10-15 people are tested in the OPD daily, but these do not come specifically for the test; they come to the PHC for some other ailments and once they give their blood sample for any test, the Sickle cell test is also conducted without their knowledge. Most of them are ANC cases. During the course of the study, the same practice was observed in all PHCs, though it was not reported by the volunteers. Hence, as discussed earlier the program is violating the principles of medical ethics.

Most of the testing is done in camps which are organized once a week. Two days of the week are assigned for testing at each PHC. On an average, about 100-150 people are tested in a camp and six-seven camps are organized by the PHC on a monthly basis. Hence, on average, in a months' time, approximately 600-700 patients are tested in the PHC. The Figures of testing and number of cases detected in each of the four

PHCs covered under the study since the beginning of the program until December 2011 can be seen in Table 5.3.

As seen in Table 5.3, Vashind PHC has the largest population falling under it, but the percentage of people tested in comparison to the total population is very low; whereas Jamser PHC has the minimum population falling under it compared to the other three PHCs, but the number of people tested is the highest. Hence one can say that Jamser PHC is performing best in terms of testing among the chosen PHCs of study, and Vashind PHC is the lowest performing. The performance of Sakarsheth PHC is also good; in fact in terms of percentage of population tested, it is second after Jamser. Hence, one can see that the PHCs in Jawhar block are performing better than those at Shahpur block. This can also be due to the fact that the NGO – *Navoday Grameen Sanstha*, is located in Jawhar block, hence monitoring of the PHC by the NGO is more stringent here than at Shahpur, which leads to its better performance in the block. However, any generalization cannot be made on the basis of two PHCs of the block. Another reason for the good performance of Jawhar block is the use of innovative activities like rallies, one act plays, announcements, etc., as a result of which, awareness generation is happening more effectively[10] and more people are coming for testing.

The same strategies of awareness are not followed in Shahpur block. As discussed earlier, the presence of the NGO in the block can again be a reason for the same. The researcher feels that the close monitoring by the NGO is making volunteers at the PHC in Jawhar block work harder interms of awareness generation in the area. There can be other reasons for this as well.

The volunteers of these PHCs were also asked the figures for tested population last year as well as this year. When the two were compared, a remarkable leap was observed in all PHCs in the tested figures, except Sakarsheth PHC. For example, in Jamser PHC, while 2,056 people were tested in 2009-10, 4,957 people were tested in 2010-11. A similar leap was also observed in Vashind and Shendrun PHCs, but in Sakarsheth PHC, the testing Figure dropped from 1,422 last year to 1,338 this year. This can be considered as an exceptional case, and the leap in testing figures is due to the fact that the target set for the program increases every year. Also, the performance of the program in terms of target achievement has been improving each year. When the program had just started, PHCs reported that they were not able to meet the targets; however, this is not the case now. All PHCs are successfully achieving the targets set for the program by the government.

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[10]Awareness level about the disease was found more in Jawhar block in comparison to Shahpur. This was reflected during FGDs with villagers and has been presented in the section on beneficiaries.

The volunteers of Vashind and Shendrun PHC reported that they cover 30 people on a daily basis for awareness generation. In a month, about 1,000 people are covered for awareness generation. On the other hand, in Sakarsheth PHC, they cover 60-70 patients on a daily basis for awareness generation, covering around 2,000 people a month. This substantiates the finding at the field level, where people in Jawhar block were found to be much more aware about the disease than those in Shahpur block. This has been described in detail in the section on beneficiaries. This also explains the high figures of testing in Sakarsheth PHC in comparison to those of Shahpur block. Since the PHC covers more people in awareness generation, it is obvious that they would be able to cover more people in testing. This further strengthens the finding that the PHCs in Jawhar block are performing better than those in Shahpur block.

Future Activities

Dr. Saranya from the State Health Society, Maharashtra reported that in future, the program would focus more on neo-natal and ante-natal testing, as it would lead to early detection and treatment of the disease. In addition, the program would also focus on recommending abortion to positive cases among pregnant ladies.

In Thane district, the program is focusing on getting all sufferers and carriers registered under the scheme where they get free ration worth Rs. 600 per month, similar to a BPL family. Volunteers of the NGO are busy preparing proposals for the same, which they would soon be submitting to the government (Mr. Shashikant Chauhan, Mr. Mushtaq Kotwal, Ms. Bhawana).

Financial Details

The stakeholders of the program at various levels, NGO and PHC, revealed that funds for the program are received on time. This is unlike other PPP projects in Thane district, where there is a serious problem of fund delay. Funding for the PHCs is received by the Taluka Medical Officer from the District Health Society, who then distributes it to all PHCs in his block. The District Hospital/ RH/SDH and NGO directly receives fund from the DHS. The amount allocated for the NGO by the DHS is Rs. 46,14,000 annually. An amount of Rs. 3 lakhs is set aside for the District Hospital, RH and SDH, while Rs. 26,50,000 is allocated for the 53 PHCs of the district annually (Mr. Shashikant Chauhan, Sickle Cell Coordinator, Thane District, 28th October 2011).

However, the NGO president Mr. Kotwal reported that they are receiving an amount of Rs. 40,05,000 annually and the same amount is also mentioned in the Memorandum of Understanding between the NGO and the government signed in 2009. A possible reason for this can be the fact that the amount was revised recently, but the same may not have been received by the NGO yet. Fifty percent of this amount is given

in advance and the rest is released after six months, post submission of the utilization certificate of the advance amount. Sixty percent of this amount is utilized in IEC, ten percent in travelling and the remaining thirty percent is used for staff salaries and office maintenance (Mr. Kotwal, President, Navoday Grameen Sanstha, 2nd December 2011). Each PHC receives an amount of Rs. 5,000 annually, which they use for preparation of banners, buying medicines and testing kits as well as organizing camps and rallies.

Table 5.3: Figures of population tested, number of carriers, sufferers and solubility negative cases present in the four PHCs studied in Jawhar and Shahpur blocks between April 2009 and December 2011

S. No.	Taluka	PHC	Total Population	Total Solubility Tests performed	Total Solubility Tests positive	No of solubility positive sample sent for electrophoresis	Result of Electrophoresis test			Total Negative
							Sufferer	Carrier	Negative	
1.	Jawhar	Jamser	32,758	9,311	288	288	7	97	184	9,207
2.		Sakarsheth	35,073	8,764	168	168	5	72	91	8,687
3.	Shahapur	Vashind	60,317	9,059	162	162	2	39	121	9,018
4.		Shendrun	36,486	7,690	90	90	0	14	76	**7,**676

Source: Data compiled by Navoday Grameen Sanstha, Jawhar, Thane district

Till 2009, PHCs received Rs.10,000, out of which Rs. 5,000 was allocated for camp related expenses including travel, banner and medicines while the remaining was spent on purchase of kits. Now, the PHCs only receive Rs. 5,000 for camp arrangements and the money for kits is given to the TMO, who purchases and sends the same to PHCs. There is no monthly allocation for travel, and the PHC has to manage within the resources available for other planned activities. Note that the PHC has to spend a lot of money on travel related to organization of camps, rallies, etc. from other resources. This does create a hindrance in wide scale coverage of people for awareness generation (Mr. Gavit Dharamdas, Technician Jamser PHC, 2nd December 2011). Mr. Kotwal also reported that an additional amount of Rs. 5 lakh is given to each PHC for running the Sickle Cell week, out of which most of them utilize only Rs.1 lakh and the rest is misappropriated.

One question which often arises in all discourses on Public-Private Partnership is that of ***cost effectiveness***. Is it economically viable for both partners to enter into partnership? This question was asked to both the government as well as the NGO staff handling the program at the field level. While the government officials expressed that the cost of advertising and selecting the NGO, training them and monitoring them is quite high, the NGO president as well as the program coordinator of the NGO reported that they do not have much to gain in terms of money from the program as the entire fund is used for staff salaries, IEC materials and training. In fact, many times they have to use their own money. There is hardly any travel allowance for referral of patients, which compels the NGO to bear the travel cost of carrying the sufferer patient for telemedicine treatment at the District Hospital, Thane. Besides, the NGO also has to utilize its resources for staff training. Due to these reasons, Mr. Kotwal, the president of *Navoday Grameen Sanstha*, strongly felt that an 'NGO cost' should be included in the program funding.

In spite of the monetary burden, the NGO staff reported that association with the government does give them name, fame and enhances their credibility within society, besides giving them the satisfaction of doing good work (Mr, Kotwal & Ms. Bhawana). As mentioned by Ms. Bhawana,

''*The government banner certainly enhances our prestige within the community, it will also help us in getting projects in the future"* (1st November 2011, Jawhar, Thane).

The researcher however, feels that there might be other, stronger reasons for the NGO to carry on a program which is not economically viable, and which drains so much of their resources. It is a big price for the name, fame and credibility that they claim of getting from such projects. However, she was unable to decipher these reasons during interviews with the NGO staff, as they were not ready to reveal the same. A deeper enquiry into this aspect is needed by further studies.

Quality

The quality of the program is maintained by staff training and monitoring.

Trainingis critical for the successful implementation of any program as only trained staff can deliver the desired goals. In a contracting model of partnership, training becomes all the more critical as the sub-contractor is expected to deliver results as per the requirements of the contractor, for which training by the contractor (NRHM in this case) is essential. Interviews with the providers of SCDCP, especially the PHC staff, revealed that they did not possess much knowledge about the disease and this reflects the poor quality of training imparted to them by the government. Preliminary training of the PHC and NGO staff was organized by NRHM in 2009, that too at the initiative of the NGO. Thereafter, no training has been organized by NRHM. The NGO on its own initiative and expense organizes periodic training for its staff, as a result of which they are much better versed about the disease in comparison to the PHC staff. Hence, the government is not fulfilling its primary responsibility of training and the NGO has to take on this additional task as well. This is also a reflection of the NGOs zeal to perform well, for which they are going out of their way. The NGO realizes that only when their staff members are well informed about the disease can they fulfil their prime responsibility of awareness generation.

At the PHC level, the Medical Officers were found to be well informed about the disease. They reported of having gathered this information during their training at Medical colleges. On the other hand, knowledge of the technicians and ANMS was found to be very limited. Most technicians of the PHCs reported of not having received any training for testing, as a result of which their knowledge of the disease was limited. They also expressed the need for more training in the area. The lab technician of Jamser PHC, Mr. Gavit Dharamdas was the only technician who was found to be extremely well versed about the disease. This is mainly because he is very well qualified, and has an MSc degree in Biotechnology along with DMLT. He has studied a lot about the disease as a part of his educational training. Besides, he also mentioned collecting a lot of information about the disease through the internet, as the training imparted by NRHM was not effective. However, not everyone is so well aware or informed. Some ANMs and ASHAs were also interviewed, but they barely knew anything about the disease. They were aware about other health programs being run by the PHC, but not this one. This shows the lack of importance given by the government to this program. ANMs and ASHAs are key workers responsible for health awareness in a community; if they are not aware about the disease, then it is obvious that the program is far from creating the much claimed awareness among the community, which is also the prime reason for it being implemented in a PPP mode.

Thus there is an immense need for conducting periodical training of the staff at various levels by the NRHM. This would tremendously help in improving the performance of the program in terms of awareness creation, which was found to be a weak component of the program.

While on one hand training is a weak component of the program, on the other, the program boasts of stringent and systematic monitoring at various levels, from the PHC to the State. At the PHC level, monitoring is done by the Medical Officer, the Taluka Medical Officer is responsible for monitoring the program at the block level. At the district level, the program is monitored by the Sickle Cell Coordinator along with the DHO and DPM. At the state level, monitoring is done by the program officers placed at the State Health Society. Besides, the NGO, through its own network of supervisors, also regularly monitors the program. Supervisors keep a close watch on the work of all volunteers in his/her respective block. Monthly meetings of volunteers and supervisors are held at the NGO at Jawhar, where they submit the monthly reports and share the figures of testing and awareness, as well as their problems. A monthly meeting is also held at the office of the District Health Society, Thane where besides the regular reporting the NGO also shares the problems that they face at the field.

For the sake of monitoring, the figures of monitoring and testing are tracked and compared with targets. This is done mainly by checking and collating the daily and monthly records. Constant reporting is done by the NGO volunteers, which is submitted both to the NGO supervisor as well as to the TMO. The two together send it to the DHO, who forwards it to the state level NRHM office. Most of the monitoring is done over the phone and internet. Monitoring by site visit are done and feedback of beneficiaries taken in rare cases (as reported by PHC staff). However, Mr. Shashikant Chauhan, the program coordinator mentioned that in order to assess the program, he visits villages at random and asks villagers about the disease. Performance of the staff is also monitored.

Further, quality of the program is maintained by following a stringent mechanism for maintaining the quality of testing kits. This includes regular training of technicians who prepare the kit (conducted by the NRHM), sending the solubility negative samples for electrophoresis (this helps in assessing the reliability of the Solubility test) and chromatography for quality control of electrophoresis (Dr. Saranya, Quality Control Officer, State Health Society, Maharashtra, 25th January 2012). In spite of these mechanisms, the solubility test kits do show wrong results sometimes (Dr. Pushpa Mathure, MO of Shendrun PHC, 21st December 2011). The same was also reported by the technician of Jamser PHC, Mr. Gavit Dharamdas. According to him, the kits showed wrong results in a quality control workshop that he attended once. In that workshop, the test was giving positive results even for negative samples.

Quality of the program can also be enhanced by improving the quality of testing for which more technicians need to be appointed at the PHC level, which would prevent volunteers from conducting tests. Other measures for quality enhancement may include improving strategies for awareness generation, reaching out to people with the help of villagers and panchayats, etc.

Equity, Replicability and Sustainability

Equity

One of the main reasons for the government to partner with NGOs for implementation of SCDCP is to maximize the outreach of the program, and thus enhance its equity component. This is mainly because NGOs have much better contacts with the community than the government. In order to achieve this target, the SCDCP operates through a network of volunteers who belong to the local community. According to the program manager of *Navoday Grameen Sanstha*, Ms. Bhawana,

"This is the most important factor responsible for ensuring equity of the program, as the volunteers are able to communicate with the population falling under the PHC in their own local language, spread awareness about the disease and bring them to the Primary Health Centre for testing"(1st November 2011, Jawhar, Thane).

Another mechanism useful for ensuring the outreach of the program in interior regions as mentioned by most respondents is the organization of camps. Around six-seven camps are organized by the PHC on a monthly basis in remote areas where there are no PHCs. Testing and counselling done in these camps greatly helps in enhancing the outreach of the program.

Most of the staff at the PHC level felt that the program is able to reach out to the poorest segment of the society. Strategies like rallies, pamphlets, banners, door to door visit, camps and provision of free services help them reach out to maximum people. The volunteers are also able to reach out to the maximum people as they are able to communicate in the local language. The Anganwadi workers as well as the ANMs are also helping them in the process (Jyoti Bhasker, volunteer, Shendrun PHC). The volunteer of Vashind PHC, Mr. Gaikar shared that,

"*The program tries to reach out to all the people, as there is no discrimination for provision of services among people of different caste, creed and class"* (11th November 2011, Vashind, Shahpur).

Administration of the test in sub-centres is another measure that is used to ensure the equity of the program (Dr. Deolalkar, MO Vashind, 14th December 2011).

In spite of the above mentioned measures, equity remains a major concern for the providers of the program. This was reflected during interactions with some volunteers of the PHCs and also the president of the NGO, *Navoday Grameen Sanstha*, Mr. Mushtaq Kotwal, who reflected upon the reasons as to why the program is not able to reach out to many people. According to him, the program volunteers are unable to reach the very interior villages, as most are not connected by public transport; one can reach them only by hiring a private vehicle, for which there is no allowance within the program. The volunteers receive a salary of Rs. 3,000 and an extra Rs. 1,000 for travelling, which is insufficient to meet the travelling expenses required to reach the interior villages. Mr. Kotwal shared that volunteers at their own cost, take the serious cases for treatment to Civil Hospital, Thane, where they receive treatment by telemedicine from JJ Hospital and KEM Hospital. This reflects their involvement with the patients and dedication to their work.

The NGO president also mentioned that they had submitted a proposal for a Mobile Van to the government, mainly to travel to remote villages for awareness generation and testing, but the government rejected the same. They then approached the Dayanand Hospital in Talassari, which runs the Mobile Van in Jawhar and Mokhada blocks under another PPP program of NRHM (for details of this program, refer Chapter VI) for carrying out testing in the remote villages where they travel, so that the program can reach the maximum people in the most interior villages. Dayanand Hospital has agreed for the same.

This reflects that, in spite of monetary constraints, the NGO is trying its best to reach out to maximum people. This also shows that the NGO is dedicated and is concerned with enhancing the outreach of the program, while the government is not as it is unwilling to increase the monetary allowance of the NGO necessary for it to take corrective measures for the program's outreach. On contrary, Dr. Tayde, senior official at the State Health Society and in-charge of Sickle cell program mentioned, that they realize awareness generation is a weak component of the program and are this focusing on improving the same. This clearly shows the dichotomy in the operation of government officials; where they say something but not necessarily practice the same.

The problem of transport allowance was also reported by most of the PHC staff, who shared that they are unable to go everywhere because of difficulties in transport, as a result of which awareness generation in remote areas becomes challenging. A government employee at the PHC mentioned that PHCs must be given a monthly allowance for travel, without which it is very difficult to organize camps in interior villages. The PHC often has to take money from other funds to meet the travel expenses involved in SCDCP (Mr Gavit Dharamdas, Technician, Jamser PHC, 2nd December 2011).

Another hindrance that comes in the way of awareness generation is that very few people are willing to listen about the disease, as they feel that they are perfectly fit and there is no chance of them having the disease, thus, there is no point knowing about the same. This finding is very similar to that observed by Banerjee & Anderson (1963) wherein they tried to assess the percentage of population symptomatic with Tuberculosis in Tumkur district of Tamil Nadu, before designing a disease control program for them. In the process they came across very few people who were ready to answer the questions on the presence of physical ailments, as they felt that they were perfectly healthy. Even among the people suffering from the disease, awareness of symptoms was seen in just 70% cases, and the remaining felt that they were fine.

These reflections by the NGO and PHC staff are substantiated by the findings of the FGDs with the villagers of selected villages of the chosen blocks, which show low levels of awareness about the disease and its control program, especially those residing in the interior villages.[11]This clearly shows that the program has not been able to achieve the main objective for which it is being implemented in a PPP mode i.e. equity. On the contrary, government officials at district and state levels reported that the outreach of the program is quite good, as they do random surveys in remote villages and most people know about the disease.

Replicability

Gujarat was the first state to start a disease control program in 1984. SCDCP in Maharashtra was heavily inspired by the program running in Gujarat. Chhattisgarh too is running a similar program. Hence, most states with a high tribal population are running a program to control the disease, as it is widely prevalent amongst them. Similar programs to control sickle cell anaemia may start in other states as well; hence the program is being replicated. However, a closer look on the running of program in Thane district raises questions regarding its replicability.

If the program is being replicated in a manner similar to that of Thane district, then it would be difficult to sustain it for long and hence replicate it elsewhere. The disease control program as observed in Thane district is highly driven by targets, which puts a lot of performance pressure on the NGOs. Moreover, the NGO is overloaded with responsibilities, while the government is merely playing the role of a funder and a monitoring body, or in other words, a watch dog always on a lookout to find faults in the NGO, without actually understanding the problems that they face in operating at the field level. The fund for the program is also less as compared to what is needed to run the program in an effective manner. In addition,

[11]Details of the same can be seen in the section on the beneficiaries of the program

the contract of 11 months makes the NGO feel highly insecure. All these factors make the NGO partner uncomfortable and feel unequal in the partnership program, as a result of which the partnership may not last for long. Hence these concerns need to be addressed, in case the program is being replicated elsewhere.

Sustainability

Sustainability of the program is questionable as many providers expressed that the program would have to stop if the government stops funding for the same. A NGO volunteer, Mr. Gaikar of Vashind PHC, expressed his concern, saying,
"*The government might stop the program once it feels that the entire population has been tested for sickle cell and are aware of the same*" (11th November 2011, Vashind, Shahpur, Thane dist.).

However, the NGO coordinator Ms. Bhawana shared that,
"*Even if the government stops funding for the program, as an NGO we would continue the awareness generation work for which we do not require the governments money, but testing would have to be stopped without the funds*" (1st November 2011, Jawhar, Thane dist.).

Hence without the government funds, only one component of the program can run, while the other would have to be stopped; thus we can say that the program is not self-sustaining and cannot run without the government's funds. In order to make the program self-sustaining, the NGO would have to generate its own funds for testing.

Outcome and Success of the Program

One of the biggest outcome of the program is that it has been able to create some awareness about the disease, along with identifying the affected patients. The same was expressed by different stakeholders of the program. According to the NGO president, Mr. Kotwal, the greatest outcome of the program is that it is able to create awareness amongst the villagers about the disease. However, awareness generation has happened only among 60% of the population, as the villagers have a tendency of not listening about the disease. The ones who listen about it do not register, and those who register do not remember. Hence, it is a challenging job to create awareness amongst the tribal population (Mr. Kotwal, President, Navoday Grameen Sanstha, 2nd December, 2011).

This view was shared by most program providers at various levels. Some respondents also shared that the good outcome of the program can be assessed from the fact that people are understanding about the importance of testing, and are coming on their own for the same. In many instances, youth are getting

their blood test done before choosing their partner. Some views of stakeholders regarding the outcome of the program can be seen in Box 5.5.

Box 5.5: Views of Stakeholders on the Programs Outcome

- *"The biggest outcome of the program is that people are getting tested before marriage" (Ms. Jyoti Bhasker, Volunteer, Shendrun PHC).*
- *"Good outcome of the program can be assessed from the fact that many people know that two sufferersshould not marry. People are not marrying within relations"(Dr. Pushpa Mathure, MO, Shendrun PHC).*
- *"One good outcome of the program is that it is preventing next generation sufferers"(Mrs. Suvarna Nitin Shivgaonkar,technician, Vashind PHC).*

The stakeholders of the program were also asked whether they feel that the program is being implemented successfully, to which most of them responded in the affirmative. Most of the PHC staff including MOs, technicians and volunteers, were satisfied by the implementation of the program in their area of operation, mainly because they felt that people are getting ready to get themselves tested easily. High levels of satisfaction were also prevalent amongst the providers of the program, as they felt that the program is benefitting the people by making them aware about the disease and diagnosing them for the same.
According to Mr. Shashikant Chauhan, Sickle Cell coordinator, Thane district,
"The program is running successfully in Thane district as it has been achieving its targets for testing and counselling. Till now the program has been able to identify 62 sufferers and 7,000 carriers" (28th October 2011, District Health Society, Thane).

Ms. Bhawana Program Coordinator, Navoday Grameen Sanstha shared that,
"*The success of the program can be estimated from the fact that marriage between two sufferers is not happening since thelast three years"* (1st November 2011, Jawhar, Thane).

Officers at all levels, state, district and block, had high praises regarding the success of the program. According to most officials at the state and district level, SCDCP is one of the best functioning PPP program in the state as well as the district. Taluka Health Officers, who are also responsible for monitoring the program, of both Jawhar and Shahpur blocks where the program was studied in great detail, had high opinion about implementation of the program in their blocks. The Taluka Health Officer of Jawhar block, Dr. Masal said that,
"*Sickle Cell Disease Control Program is doing good work in Jawhar block*". (2nd December, 2011, Thane).

According to the DHO Thane District, Dr. R V Kadam,

"*Sickle Cell program is doing well in Thane district as the working pattern of the NGO is good, as a result of which the outcome of the programe is good in comparison to the other NGOs. The coordination of the NGO with the district level officials is also good*" (10th December 2011, Jawhar, Thane).

The NGOs work was praised by other officials as well. Mr Chauhan shared that,

"Even though the PHC staff are trained by NRHM for conducting the testing as well as counselling, counselling is primarily the doctor's job; still it is being done by the volunteers, this shows that the NGO works better than the PHC staff" (28th October 2011, District Health Society, Thane).

SCDCP from the lens of Beneficiaries

Officials at the district level as well as the NGO felt that the program is one of the most successful and important PPP project in Thane district, as it has been able to create awareness among 60% of the population within the district (Mr. Kotwal, 2nd December 2011, Jawhar, Thane). However, in reality, the researcher got a very different picture in the field.

In order to study the program from the beneficiary's perspective, a sample of four villages were chosen, two each from Jawhar and Shahpur blocks; with one village situated near the PHC and another located far from it. This was mainly done to assess the difference in the levels of awareness in these two villages, and thus to assess the penetration of the program in the interior regions. In Shahpur, Aasangaon village was chosen as a PHC village and Nandgaon was chosen as a far-off village. In Jawhar block, Chalatwad village was chosen as it is very near to the Sakarsheth PHC and Adkadak village was chosen as it is far from it. FGDs were conducted with beneficiaries and non-beneficiaries of the program in each of the four villages. The beneficiaries of the program comprised people who have been tested for the disease. Key informant interviews were also conducted with the Sarpanch, Anganwadi worker, ASHA, school teachers, etc. of these villages. Besides this, exit interviews were also conducted with patients having undergone the Solubility test at the four chosen PHCs, namely; Vashind, Shendrun in Shahpur and Jamser, Sakarsheth in Jawhar block.

Awareness about the disease

A remarkable difference was seen in the levels of awareness in the two blocks. While in Shahpur block, hardly any non-beneficiary of the program knew about the disease in both villages, in Jawhar block, quite a few non-beneficiaries, even in the interior village, Adkadak knew about the disease. This does substantiate the information collected from volunteers of both blocks, wherein the volunteers in Jawhar block mentioned a much higher figure of people covered in awareness generation as compared to that mentioned by volunteers of Shahpur block. This observation about levels of awareness in the two blocks

further substantiates the figures of testing mentioned in Table 5.3. Since the awareness generation is high in Jawhar block, the number of people tested in proportion to the total population is much higher in Jamser and Sakarsheth PHC, than in Shahpur block. Again, as mentioned in the section above, a possible reason for this discrepancy may be the location of the NGO. Since the NGO coordinating this program is located in Jawhar, there would be close monitoring on the work of volunteers, which keeps them on their toes and makes them perform well.

Most beneficiaries had got themselves tested in the camp, which substantiates the information given by providers about the fact that the test is mostly done in camps and not in the PHC.

Shahpur Block

In *Aasangaon* village, FGD was conducted with adolescent boys and girls group who had undergone testing for the disease. This group was chosen for the FGD because they are the target group for the program. Some members of these two groups were even carriers of the disease. Both these groups were well versed with the illness and knew that it was a genetic disease in which the shape of the blood cells becomes sickle shaped. Few of them were also aware of the symptoms of the disease, which include body pain, weakness and fever. They also somewhat knew the difference between the carriers and sufferers, and the fact that two carriers should not marry otherwise their children would become sufferers. Though the respondents of the FGD did not know the name of the test, they were aware that the test is conducted at two levels. Hardly anyone knew the significance of the colour cards: white, yellow and red.

Some of the girls were also aware of the fact that there is no cure of the illness. The boys group seemed to know better about the disease than the girls, as besides getting information from the sickle cell volunteer, most of them had gathered the same from other sources like internet, to which girls did not have access. This shows that in a society stratified on the lines of gender, technology and the resulting knowledge does become the privilege of men, who have better access to the same. The girls, even though were aware about the disease, were feeling inhibited about expressing themselves. The boys on the other hand were quite vocal. Though most of the information amongst the group was gathered from the sickle cell volunteers, one or two participants mentioned having gathered the same from other sources, which included the ANM, ASHA and even friends. The pamphlets distributed by volunteers as well as the banners at PHC were important sources of printed information. None of the non-beneficiaries at the village level knew about the illness. Though the Anganwadi and ASHA worker knew about the disease, the *Sarpanch* of the village was not aware about the same.

In *Nandgaon* village, which was located about 10 kilometres away from the PHC, the scenario was even worse. Though the PHC volunteer reported having tested around 400 people; 150 in sub-centre and 250 in Municipal school, none of them were aware about the disease. Beneficiaries as well as non-beneficiaries

were completely unaware about the disease. Even the *Sarpanch* and ASHA worker did not know anything about the disease or the disease control program. This shows that people were tested in ANC clinics just to meet the targets, and no real counselling was given to them. In fact, the researcher did witness one such camp in Aasangaon village of the block, organized by Vashind PHC. This was an ANC check-up camp. The women coming for ANC checks were tested for Sickle cell and were not even informed about the same. They were given white cards, but did not know the significance of the same. Later, when the volunteer was questioned about this, he explained that since the technician did not accompany him to the camp, it was impossible for him to test as well as counsel at the same time.

A similar scenario existed in most villages studied, where villagers did not know about the name of the disease but knew that they have been given White cards. Hence in most instances, even tested patients did not know about the disease. They may have been tested to meet the targets set for testing, but were not told about the disease. Hence, the figures for awareness generation did not match the actual figures of tested people, and even if it did, some of the tested people were definitely not made aware of the disease.

The poor awareness created by the program is explained through multiple reasons by the NGO. These are, lack of transport to reach interior regions for awareness generation, lack of manpower at the PHC level wherein one volunteer is too less to cover the entire population falling under its purview, lack of cooperation from the villagers where people are unwilling to listen about the disease or if they listen, they do not register, and if they register, they do not remember. Some volunteers also reported that many times people are not at their homes, as they may have gone to the farms or, during the rainy season, they migrate to cities seeking construction work.

Jawhar block

As mentioned earlier, the situation in Jawhar block was observed to be better than what existed in Shahpur block.

Exhibit 5.1: Informative poster on Sickle Cell Disease displayed at Shakur PHC, Jawhar

Exhibit 5.2: One of the sample villages – Adkadak, Jawhar block, Thane district

Chalatwad Village

Focussed group discussions with non-beneficiaries in Chalatwad village, located one kilometre away from Sakarsheth PHC, revealed that most of them were aware about the disease and its control program run by the government to some extent. This reflects the good work done by volunteers in creating awareness generation in this village. The proximity to the PHC may be a reason why volunteers may easily be able to reach out to this village, as the lack of transport money in the program does not act as a hindrance for awareness generation in this block. Volunteers are using strategies like street plays, rallies and banners for awareness generation in the village. The level of awareness about the disease was found to be better amongst beneficiaries of the program than non-beneficiaries for obvious reasons. Most beneficiaries knew about the disease being genetic, the symptoms of the disease, difference between carriers and sufferers and the two types of tests used to detect the illness. The difference between carriers and sufferers as quoted by most of the respondents was,
"*Carriers can transmit the disease from one generation to the other while sufferers have severe pain*".

They were also aware that 'would-be' partners should be tested before marriage. The key informants interviewed in this village included a k*irana* shop owner, Anganwadi worker, NGO member, two government servants and ASHA worker, all of whom had a fair amount of knowledge about the disease.Most respondents reported having received the information from the sickle cell volunteer while one or two reported having gained the same from ASHA workers.

Exit interviews of individuals having undergone the test in this PHC revealed that they were aware of the test that they underwent. However, the same was not true in Jamser PHC, where the situation observed was same as that in Shahpur block. Women were being tested for Sickle cell Anaemia but they did not know the name of the test that they underwent.

Adkadak Village

This village is located very far away from the PHC and is not even well connected by roads. Villagers were randomly asked about the disease, however, very few were aware about the disease and its control program being run by the government. There were instances where people did not know anything about the disease or the disease control program, but had received White cards. It is interesting to note that people had kept these cards very carefully, without even knowing its significance. Few key informants, who included a government servant and shopkeeper, were aware about the disease. However, their awareness level was very poor, as they merely knew that the disease is genetic and did not have any other information about the disease. Still, the situation was far better than the interior village of Shahpur block, where no-one knew about the disease, not even the tested.

Hence in Jawhar block, the awareness levels in the village located near the PHC was far better than that of the interior villages, as non-beneficiaries as well as OPD patients undergoing the test were aware of the illness. The same was true in Shahpur block where, in spite of the low level of awareness, some villagers were aware about the disease though none in the interior village were. This only corroborates what is well known through studies regarding how access to functional health services brings about higher utilization of services.[12]The awareness level of beneficiaries of the program is better than those of non-beneficiaries for obvious reasons.

In contrast to the above finding, villagers even in interior villages knew about other government health programs like HIV, Polio and JSY. Hence, partnership with an NGO has not ensured equity of the program since government programs are reaching out better to the people. Another fact that needs mention, is that while the study revealed that hardly anyone in the interior villages knew about the disease, government officials reported that when they conduct random checks in the interior villages and ask villagers about the disease, all of them seem to know about the same (Dr. Tayde, State Health Society and Mr. Shashikant Chauhan, District Health Society, NRHM). The researcher is bound to doubt the validity of this statement.

Satisfaction levels

Exit interviews of tested patients and FGDs with beneficiaries revealed that the satisfaction level of beneficiaries with the program is quite high. The favourite reason for the same, quoted by many, is good services provided free of cost. People are also happy with the SCDCP as it helped them gain awareness about the disease through good information provided by volunteers. They were also satisfied by the medicine offered by the program and the behaviour of the staff. Many respondents reported that information about the disease can be useful for their children's future. Mrs. Swapna Patawle, Headmaster of Zilla Parishad School in Aasangaon mentioned that,

"*I will get my 'would-be' daughter-in-law and son tested before getting them married*" (11th November 2011, Aasangaon, Shahpur, Thane dist.).

While most beneficiaries of the program were satisfied by the services offered, a few reported being partially satisfied as they felt that volunteers did not inform them about the disease in an open fashion. The component of the program that was liked most by beneficiaries was counselling. Testing was the second most appreciated component.

[12]One of the landmark studies that brought forth this point was done by Dr. D Banerjee and his associates in 19 villages of eight states in India. 11 villages had a PHC while the rest were located far from one. This study observed that the number of villager accessing health services were far more in villages with PHC than those without.

Strengths of the Program

The greatest strength of the program, as reported by some of the PHC staff (government and NGO), is involvement of the local people in the program, which is done through selection of volunteers from within the community, who make services available at people's doorsteps, for free.Another strength of the program, as reported by most respondents, is that it is able to detect patients afflicted by the disease.

Partnership with NGO in the implementation of the program was also mentioned as a strength by most respondents. Since the NGO has a strong relationship with the community, the program has been able to reach a large section of society, which has resulted in significant awareness about the disease (most of the PHC staff). This would not have been possible if it were entirely run by the government, as their staff is already overburdened with multiple health programs. Involvement of NGO has helped in creating a band of people who are working specifically on a particular programme; hence it is obvious that more results would be generated through such a partnership (RV Kadam DHO Thane, Mr. Nagre TMO Shahpur, Dr. Deolalkar, M O Vashind). According to the MO Shendrun PHC, Dr. Pushpa Mathure,
"Both the NGO as well as the government complement each other in the program. NGO has a hold over field which the government does not have, and the government has doctors to manage the treatment of the disease which the NGO does not have. Together they can work towards the benefit of people" (21st December 2011, Shendrun, Shahpur, Thane dist.).

Some government officials however shared a different view about partnership with NGOs in such programs. The DPM, Thane district mentioned that,
"The NGOs have a tendency to take all the credit for a program, hence we try to implement most of the programs on our own and avoid entering into a partnership to the greatest extent possible"(Reeta Gaikwad, DPM, Thane district, 10th December, 2011).

Dr. Tayde, Senior official of the State Health Society handling the program mentioned that,
"We cannot consider SCDCP as a PPP, as we are giving the entire fund as well as the guidelines for the program. The NGO is just implementing it. We could call it a partnership only if NGO is providing the funds as well" (15th December 2011, State Health Society, Mumbai).

This shows the attitude of government officials who negate all the contribution of the private partner, only because of the fact that the funds are provided by the public partner.

The greatest strength of the program, as revealed by the FGDs with beneficiaries, is the fact that the program is able to identify people affected by the disease through testing, and also provides symptomatic

treatment through medicines for free.[13] Some other strengths of the program, as revealed during FGDs with beneficiaries and non-beneficiaries, exit interviews and key informant interviews, included awareness generation even in interior villages, counselling and availability of doctors and volunteers for help.

Weaknesses/Problems in Implementation

This section mentions some of the weaknesses of the program, which acts as a hindrance in its successful implementation. These have been gathered through interviews of important stakeholders of the program.

The greatest weakness of the program, as reported by most respondents, is the shortage of human resources. The tribal population falling under each PHC is huge, and cannot be covered by just one volunteer. This problem was also felt at the district level, by the district level coordinator of the program Mr. Shashikant Chauhan, who expressed that,

"One person for monitoring the program in the entire district is too less" (28th October 2011, District Health Society, Thane).

Another important weakness, as reported by most volunteers, is the lack of cooperation from the villagers for awareness generation. Most volunteers reported that people are not ready to listen about the disease as they feel that they are fit and hence there is no possibility of them having the disease. Only the educated people are somewhat receptive. Hence, the volunteers target the educated masses for awareness generation, which is why camps are mostly organized in schools and *anganwadis*. Also, in schools it is easy to reach out to the adolescent groups, who are the main focus of the program. The volunteer of Shendrun PHC, Mrs. Jyoti Bhasker reported that,

"*Since people are not ready to listen about the disease, hence we are approaching schools where it is easy to convince the teachers and conduct camps"* (21st December 2011, Shendrun, Shahpur, Thane dist.).

She also shared that,

"*It is difficult to reach out to the uneducated tribal population; we need to tell them about the disease at least three-four times before they get ready for testing"* (21st December 2011, Shendrun, Shahpur, Thane dist.).

There are also instances where people are even afraid of testing. Another volunteer Pravin Baban Avatar of Jamser PHC expressed that,

[13] As mentioned earlier, the treatment of the disease is very expensive and is not provided under the program.

"*Awareness generation does become difficult at times because when they go to the homes of people for door-to-door campaign, they are usually in the fields and hence it is difficult to cover all of them for IEC*"(2nd December 2011, Jamser, Jawhar, Thane district).
This problem becomes all the more pronounced because of the migratory nature of the tribes, who usually migrate to the cities during the monsoon season.

Some of the NGO staff also reported that the *Sarpanch* of the villages do not cooperate in the awareness generation program (Mr. Kotwal, Ms. Jyoti Bhasker, Volunteer Shendrun). The researcher met the *Sarpanch* of Nandgaon village, where hardly anybody knew about the disease, in spite of the fact that about 400 people were tested in the village, both in the school camp as well as ANC camp at the sub-centre. Even the *Sarpanch* of this village did not know anything about the disease. However, he assured the researcher that he would organize awareness generation talks in the village on the disease, and requested the researcher to ask the NGO people to contact him. But in reality, the NGO staff reported that the *Sarpanch* does not listen to them. This scenario is very similar to what exists in Kerala. Devika & Rajshree (2008) in their study on sickle-cell anaemia patients among the Chettys in Wayanad district of Kerala exposed the failure of public action in healthcare. It emphasized the need for sustainable care of these patients, which can be made available only if panchayats take an active interest. However, the sick get less support from the panchayats and mainstream political parties. This is also a reflection of the present crisis in the public healthcare system, which is characterized by poor quality and falling utilization rates.

The program also lacks essential infrastructure like training kits and refrigerators for blood sample storage. Some of the NGO staff reported that there is no refrigerator in the PHCs to keep the blood samples that need to be taken to the Electrophoreses centres. Even if the fridge is there, there is no power, as a result of which the blood samples get destroyed. Shortage of testing kits proves to be a big hindrance in the implementation of the program, as reported by the NGO staff as well as volunteers.

Money for the purchase of testing kits is given to the Block Medical Officer of each block, who purchases the kits and sends it to all PHCs in his block. However, the purchase of kits usually takes a very long time, and at times, it is not even purchased. The NGO staff reported of corruption at the block level and misuse of money allocated for the kits. When the Block Medical Officer of Jawhar block, Dr. Masal was asked about the problem of kits, he reported that they are not getting the kits on time because of delay in the government procedure of passing tenders, getting quotations, etc. In the absence of testing kits, it becomes very difficult for the NGO to meet the target for testing. And yet, they somehow arrange by borrowing resources from other programs like Malaria and AIDS running at the PHC.Till 2009, money

for the kits was given directly to the PHC, but is now sent to the TMO, mainly because some instances of fund misappropriation were seen in the PHC. The NGO president, Mr. Kotwal, reported that they have been requesting the government to give them the money for buying the kits, so that this problem may be solved, but the government is not agreeing.

The absence of proper treatment for the illness was also reported to be a problem in the successful implementation of the program by the Medical officers of the studied PHCs, who reported that they do offer symptomatic treatment to the sufferers by giving them iron and folic acid, antibiotics and painkillers, but are not aware how to cure them or prevent deaths (Dr. Deolalkar, MO Vashind PHC; Dr. Pushpa Mathure, MO Shendrun PHC). This is due to the fact that treatment of the disease through measures like bone marrow transplantation and gene therapy is costly and out of reach of the tribal population. Also, neither is proven to provide a guaranteed treatment to the disease. Hence, the disease may be considered incurable. Dr. Mathure mentioned that,
"*The outcome of the program can be even better if we are able to treat the sufferers and prevent their deaths"* (21st December 2011, Shendrun, Shahpur, Thane).

The NGO staff, especially volunteers were found to be unhappy with their job conditions, as their salary was too low and they lacked long term security. Moreover, they felt very pressurized to achieve the targets assigned by the government for testing and counselling. At times, this demotivates them from performing their best, which acts as a hindrance in the implementation of the program. The volunteer of Vashind PHC Mr. Gaikar shared that,
"The monetary incentive given to volunteers is too less and it is almost impossible for them to cover the entire area, that too when they don't have any vehicle allocated to them and are given only Rs.1,000 as an allowance for travel" (11th November 2011, Vashind, Shahpur, Thane dist.).

Even one of the MOs, Dr. Deolalkar (MO Vashind) felt that the salaries of volunteers should be increased for the better interest of the program, as they are pivotal in running it. When the researcher asked volunteers as to why they were still continuing to work, they responded that they are continuing in the hope that they might get a permanent government job in future. They are also from poor economic backgrounds, and because of the problem in getting employment anywhere else, they are continuing. The researcher also feels that getting associated with the program does give them a lot of respect within their community, as people look up to them as a government official.

A big problem, as reported by most NGO staff, was the shortage of funds for running the program. There is no allowance for travel in the program, which makes it very difficult to reach out to people in interior regions. Many times, the NGO has to utilize its own money for meeting the running cost of the program. Most of the staff of the NGO was disappointed by the government's attitude, which showed minimal involvement in the program. According to them, the government had shirked most of its responsibilities and passed it on to the NGO, as a result of which they felt pressurized. Government's non-involvement in the program is also reflected by the fact that they are not ready to increase the monetary allocation of the program, in-spite of demands from the NGO. The president of the NGO, Mr. Mushtaq Kotwal reported that the government is not receptive towards granting them any extra money. He said that,

"*Whenever we ask the government for some extra money for using innovative measures for awareness generation, we are not granted the same. Recently, we asked them money for making a video film on sickle cell patients which could act as an effective IEC measure, but we did not receive the same*" (2nd December 2011, Jawhar, Thane).

Some of the weaknesses of the program, as reported by the villagers, include facts like many people are unaware about the disease as volunteers are unable to reach far and interior places, the staff strength is less, medicines used for treatment are not powerful and all youth are not being tested before marriage. Some respondents also reported that at times, proper testing is not done in camps and timely help or counselling is not provided to the needy patients. Some of the other weaknesses of the program, as reported by some other villagers, include the fact that there is no complete cure for the illness and the result for electrophoreses test takes a very long time to be declared.

5.7. CONCLUSION AND SUGGESTIONS

Even though the Sickle Cell Disease Control Program is being implemented in a partnership mode, partnership between the government and the NGO is not on equal terms. This is revealed from instances such as the MOU of the partnership is made without consulting the NGO. The government has passed all its responsibilities to the NGO, and puts pressure on them to perform by setting high targets. The government officials also misbehave with the NGO staff. Hence, SCDCP may not be even termed as a true partnership program, because in a partnership program, both partners are on equal terms. This was also felt by top officials of the State Health Society, though for a different reason. For them, the program cannot be called a partnership program as the involvement of the NGO is minimal, where the NGO is merely implementing the program as per guidelines provided by the government.

On the whole, one may conclude that the Sickle Cell Disease Control Program is surely doing a good job in terms of detecting positive cases of sickle cell and treating them. However, it has not been able to create awareness in the community, which is the main reason for it being implemented in a PPP mode.

The effectiveness of the program can be summed up in the words of Dr. Deolalkar, MO Vashind, according to whom,

"*The program is just able to diagnose people inflicted by the disease, but has not been able to create awareness among them"* (7th December 2011, Vashind, Shahpur, Thane).

The reason for this can be the attitude of people, poor motivation of the PHC staff, lack of funds for travel to interior regions, etc. The program has also been successful in preventing the birth of Sickle cell sufferers to an extent; however, it has still not been able to provide a cure for the disease. The section below collates suggestions made by important stakeholders as well as beneficiaries of the program, which can help in improving the program to a great extent. Some suggestions are also a result of the researcher's observation and analysis of the program. These are as follows:

- More testing equipment need to be made available.
- Travel money for referral services need to be provided.
- The program is targeting the educated masses as it is easy to convince and reach out to them; the uneducated masses are left out. Strategies need to be evolved to reach out to the uneducated masses as well.
- Use of innovative strategies for awareness generation, which would help in reaching out to even the uneducated masses; for example, movie, street play, use of media-newspaper, TV and radio. Use of charts, videos, demos may also be considered. According to the State level official associated with the program, Dr. Tayde, a radio jingle on Sickle cell has been recently introduced for advertising the program, which is aired on *Akashwani* Marathi in the morning.
- The government needs to involve itself more actively in the program. It is the government's job to carry out monitoring, but they hardly make any site visits. All monitoring is done through internet and phone, which shows their lack of involvement in the program. The government officials are just bothered with the Figures of the tested population, sufferer and carrier cases; they should also make field visits to verify these Figures.
- More staff needs to be appointed at the PHC level; only then can proper awareness generation happen. Salary of volunteers also needs to be increased to make them more motivated. NGO cost should be included in the budget of the program.
- Leaving the implementation of the program entirely on the NGO partner makes the program suffer. The ANMS, ASHA, MPW as well as AWW should also be involved in awareness generation; only then will maximum people be able to know about the disease or the program.
- Government is just giving money and setting targets for the NGO. The money given to the NGO is not enough for running the program; and the targets set puts a lot of pressure on the NGO. The

program should move beyond targets.

- Training is a weak component of the program, and requires more focus. There is an immense need of training the PHC staff which has just been educated about administering the test without being given any knowledge about the disease.
- Volunteers should be given a vehicle; even a cycle would do. This would help in enhancing their mobility for awareness generation work.

Some suggestions made by important stakeholders of the program for its improvement have been mentioned in Box 5.6.

Box 5.6: Some suggestions to improve the program as per its stakeholders

- *More focus on IEC and awareness generation (Dr. Deolalkar, MO Vashind PHC).*
- *All couples should be identified before marriage and be tested.(Dr. Pushpa Mathure, MO Shendrun PHC).*
- *More staff to be employed at the district level for monitoring the program (Mr. Shashikant Chauhan, District Coordinator, SCDCP Thane).*
- *For the better interest of the program as well as volunteers, their salary should be increased, as they work really hard for the program (Dr. Deolalkar, MO Vashind PHC).*

Beneficiaries of the program, during key informant interviews, exit interviews as well as FGDs suggested various mechanisms to further improve the program which has been described below:

- In order to enhance the outreach of the program, the volunteer should do door-to-door campaign of the program, even in interior villages.
- More camps to be organized in villages through *gram panchayats*, which is the most powerful body in the village (at present camps are being organized only in schools, as it is easy to reach out to teachers).
- Modern means of quick communication, such as internet and SMS should be used for awareness generation. Strategies like use of media and banners for advertising the program may also help. One of the village ladies suggested that more awareness generation talks need to be held for ladies, as this would help them in educating their children and can also help in their empowerment.
- A respondent mentioned that, *"The program must aim at testing allthe youth before marriage"*.

- Similarly another respondent mentioned that, *“All the people in the villages should be covered in awareness generation and all of them should be tested”*.

Other measures to improve the program on the whole, may include appointment of more trained staff, increase in the number of electrophoreses centres and treatment to completely cure the illness. Besides people being tested for the disease should be informed and their consent should be taken before the test. This is not happening at the moment.

Hence, concerted efforts from the NGO as well as the government would help in achieving the uphill task of awareness creation among the uneducated masses. This would definitely enhance the outreach of SCDCP, and make it more effective in terms of addressing the problem of Sickle Cell Anaemia amongst the tribal population of Thane district.

CHAPTER VI
The Mobile Medical Unit

Access to health care and its equitable distribution are fundamental requirements in achieving the Millennium Development Goals of the United Nations[141] and the goals set under the National Rural Health Mission (NRHM). The goal of the NRHM, which is to improve the availability and accessibility of quality health care to people, especially those residing in rural areas, the poor, women and children; could not have been met by a strategy better than the Mobile Medical Unit (MMU) which aims to provide health services at the doorsteps of people in rural areas, especially those residing in the most underserved and unserved areas ('Mobile Medical Units', 2008).

Many areas in the country, predominantly the tribal and hilly regions, even in well-developed states, lack basic health care infrastructure which limits access to health services. Over the years, various initiatives have been taken to overcome this difficulty with varied results. Many states have successfully tried to operationalize Mobile Medical Units through NGOs, trust hospitals or the government itself. The first nationwide scheme of Mobile Medical Units, aiming to take health care to the doorsteps of people in the unserved and underserved areas, was launched by the Government of India under National Rural Health Mission in 2008. It is considered to be an innovative scheme of NRHM, as the Mobile Medical Units are outsourced to NGOs/RKS for providing Medical Services in their area of operation on a day-to-day basis. The programme operates in a Public-Private Partnership mode, mainly to improve its access and that is what makes it unique.

Since MMU is a unique model of PPP under NRHM aimed to improve the accessibility of health services in the remote areas, it has been chosen for detailed case study for the broader study on Public-Private Partnership under NRHM in Thane district of Maharashtra. This study of the unit in Thane district not only looks at the implementation of the unit from the provider's perspective, but also from that of beneficiaries, mainly to identify the gaps in its implementation. This chapter is an attempt to present the findings of the case study on the Mobile Medical Unit operating in Thane district of Maharashtra. It looks into aspects like evolution of the unit, mode of implementation, services provided and problems in implementation and the experiences of beneficiaries availing the scheme. The methodology used for the study of MMU in Thane district has been described in Box 6.1. Before going into the details of the programme in Thane District, it would be useful to get an overall picture of the scheme which is operational in the entire country under the umbrella of NRHM.

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[14]The United Nations Millennium Development Goals are eight goals that all 191 UN member states have agreed to try to achieve by the year 2015. The United Nations Millennium Declaration, signed in September 2000 commits world leaders to combat poverty, hunger, disease, illiteracy, environmental degradation, and discrimination against women.

Box 6.1: Methodology followed for the case study of MMU

- The experiences of providers have been captured by interviewing government officials associated with the programme at various levels. This includes staff of the State Health society, District health society and the Taluka medical officer of the two blocks chosen for the study.
- Providers also included the staff of Dayanand Trust responsible for running the MMU, as well as the staff of the van.
- The experiences of beneficiaries were captured through exit interviews of villagers receiving services from MMU on an OPD basis, in few chosen villages where the van is providing its services. Besides, FGDs were conducted with men's and women's group within these villages to assess their views regarding the van. Key informant interviews were also conducted with significant persons like *Sarpanch*, ASHA, Anganwadi Worker, school teacher, shopkeeper, etc.

6.1. MMU IN INDIA: An Overview

The scheme was first initiated in the North-Eastern States, Himachal Pradesh and Jammu & Kashmir, mainly because of their difficult hilly terrain, non-approachability by public transport and long distances from health centres. Eventually, MMU was initiated in every state, in each of its districts, under the directive of NRHM. Initially, two kinds of MMUs were envisaged; for the North-Eastern states, Himachal Pradesh and Jammu & Kashmir (J&K), besides diagnostic facilities, specialized services such as X-Ray, ECG and ultrasound were also made available in the unit, whereas for the rest of the states, only diagnostic facilities were available (Ibid). However, now MMUs in all states are equipped not only with diagnostic facilities, but also with the above mentioned specialized facilities. The only difference within the states is that each of them is expected to address the diversity and ensure the adoption of the most suitable and sustainable model for MMUs to suit local requirements.

The guidelines for operationalization of Mobile Medical Units are provided by the Joint Secretary Health, Government of India. In some states like Gujarat, it is solely operated by the state; this requires intense monitoring by senior district officials and may divert their focus from other important activities. Hence, most states like Bihar, Madhya Pradesh, Maharashtra and Andhra Pradesh have contracted the running of MMU to private providers. The objective of contracting is to scale up faster and ensure better performance at less cost. In these states, private providers interested in providing services as per prescribed norms were invited, applications from potential providers were scrutinized, and finally three organizations were shortlisted. Each MMU was to be paid Rs. 4, 68,000 per month, which was a fixed

budget. There are also instances where states did not feel the need of such service because of the presence of strong primary health care services; for example, Kerala. This may be true only for one state in India, as it has a large semi-urban population, good literacy levels and many primary health care centres which are performing well ('Dindayal Mobile Medical Unit', 2012). The states of West Bengal, Bihar, Assam, Andaman and Nicobar Islands and Lakshadweep have Boat Clinics to serve the riverine districts ('Guidelines for operationalization of MMU', 2012)

The Mobile Medical Unit usually comprises a van with diagnostic equipment such as X-ray, Ultrasound and portable ECG machine. Generator and air conditioner are also provided. Besides this, a supporting vehicle (jeep) is provided for the travel of Medical Officer and staff to the designated areas, which is also used for dispensing medicines. In some states, the unit also consists of a third vehicle, usually a ten-seater passenger vehicle for the staff, such as in the north-eastern States, J&K and Himachal Pradesh (GOI, 2007).

The States have the flexibility to decide the type and number of vehicles to be procured within the given budget. The staffs of the unit is appointed on a temporary basis by the NGOs, and includes a Lady Medical Officer, Nurse, Lab Technician, Pharmacist, Helper, and drivers depending upon the number of vehicles.

The scheme is planned and managed by the state, while the NGO merely acts as an implementing body (Mr. Jadhav, IAS, Coordinator MMU, Maharashtra State, 23rd January, 2012, Mumbai). The day-to-day plan for operating the vehicles, as well as the locations where the MMU vehicle would dispense medicines, is decided by the District Health Society.

6.2. MMU ACROSS STATES

MMU was first initiated in the North Eastern states. In ***Assam,***MMU was launched as early as 11th November 2007 in 10 districts of the state, and now the entire state stands covered. Assam being a large state with difficult terrain and poor connectivity, the MMU has become a boon in terms of improving accessibility to health services in the remotest areas of the state. These units are equipped with ultra-modern diagnostic facilities such as portable X-ray machines, Microscope, ECG, Ultrasound, Autoclaves, Stretchers, a Pharmacy, etc. Besides, the inbuilt TV/DVD system fitted with a big screen within these units helps in spreading information on health services under NRHM during the night. In Assam, these units comprise a vehicle (Mahindra Scorpio) for the staff and two 709 Tata Bus with inbuilt OPD, laboratory facility and other essential diagnostic accessories.A generator for power supply is also fitted within the unit.Similar initiatives have also been started for providing health services for people living in

the *char* (riverine) areas through boat clinics. These Boat Clinics are providing preventive and promotive services in the *char* areas of 10 districts - Dibrugarh, Tinsukia, Morigaon, Dhemaji, Dhubri, Nalbari, Barpeta, Jorhat, Sonitpur, and Lakhimpur (Govt. of Assam, 2007).

Even though the ***Bihar*** government had planned to launch Mobile Medical Unit in all 38 districts (nine divisions) in 2009 itself, it was finally launched in September 2011 in Patna, Munger, Magadha, Kosi, Darbhanga, Purnia, Tirhut, Saran and Bhagalpur. The units, named as *Dhanwantri Raths*, comprise 10 vehicles which tour the chosen divisions to provide free medical advice and medicine as well as to conduct different medical investigations. Facilities like X-ray, Pathological Tests, Ultrasound, ECG, vaccination and pregnancy check-ups are also provided within the unit. The responsibility for running the unit has been given to three agencies namely, Spake Systems (14 districts), Jagran Solution (12 districts) and Jain Studios Limited (12 districts). According to a news article in the Times of India, Patna, the Bihar government would get a sum of Rs 4.68 lakh per month from the Central Government. The Centre, under the National Rural Health Mission, has provided a fund of Rs 16.56 crores to Bihar for running the MMUs in 2009-10(Verma, 2009).Each MMU is accompanied by a doctor, nurse, X-ray technician, lab assistant, OT (operation theatre) assistant and a paramedic. These mobile units have facilities for emergency operations, pathological investigations, incubator, kits for pregnancy and HIV tests, etc.

In ***Jharkhand,*** the MMU was launched in all districts in 2008. The unit comprises a vehicle (Mahindra Scorpio) for the staff and two 709 Tata Bus with inbuilt OPD, laboratory facility and other essential diagnostic accessories. A generator for power supply is also fitted in the unit (NIHFW & UNFPA, 2009).

Mobile Medical units were operational in the state of ***Madhya Pradesh*** since 1988. Units by the name *Jeevan Jyoti Yojana* were started in tribal areas of Hat Bazaar. Under this scheme, 39 MMUs were operational, and in 2003, 10 more were added in five districts. The states experience of running the MMUs made it realize that it required intense management inputs, maintenance, availability of staff and provision of drugs for effective functioning, all of which were difficult to achieve, since it was handling multiple health programmes. Hence the state proposed that NRHM operate this programme through Public-Private Partnership. That is how Mobile Medical Unit by the name of *Dindayal Mobile Medical Units Rath*was launched by the state in partnership with Jagran Solutions in the year 2007. The Mobile Medical Vans are air conditioned and carry medical equipment and facilities for Pathological tests, X-Ray, ECG, Operation Theatre Table and standard accessories such as dressing and instrument trolleys, oxygen cylinders, in addition to a facility to conduct emergency operations. Pathological and Radiological tests are performed in the vehicle and drugs are issued for free, apart from offering free consultation. Each MMU is accompanied with a Doctor, Lab Attendant, Pharmacist, operation theatre assistant and a driver.

These MMUs have Global Positioning System (GPS) which help in tracking the vehicle and monitoring its movement ('Dindayal Mobile Medical Unit,' 2012).

In ***Uttar Pradesh,*** the Mobile Medical unit was launched on 15th January 2011 under the name of '*Mukhya Mantri Mahamaya Sachal Aspatal Yojana'*, as it was launched on the birthday of the Chief Minister of the state, Ms. Mayawati. The scheme is being run in 15 districts of the state and would soon be launched in 36 more; the proposal for which has already been approved by the Governing board of NRHM. The plan is to start five MMUs in each of the 36 districts ('Thirty six more districts to get Mobile Medical Units', 2012).

6.3. MMU IN MAHARASHTRA

Maharashtra is one of the states where the launch of MMU has been recent, that is in 2011, mainly because of the fact that it is a non-high focus state of NRHM, with good public health indicators. The unit is being run in all 33 rural districts of the state (except Mumbai and Mumbai suburban), in partnership with NGOs since August 2011. Some districts like Nandurbar, Gondiya and Gadchiroli have more than two units because of their large size. All together, the state has 40 vans and 40 supporting vehicles, for a total of 80 vehicles operating in the state (Mr. Jadhav, IAS, MMU Coordinator at State Health Society, Maharashtra, 23rd January, 2012, Mumbai). The earliest units were started in Sangli, Sindhudurg, Nanded, Latur, Kolhapur and Jalgaon districts (State Health Society Maharashtra, 2011).

The process of NGO selection for running the MMU is stringent. It starts with an advertisement in the local newspaper. The first level of selection is done by the Technical Advisory committee at the DHO office, followed by a visit to shortlisted NGOs by the Joint Appraisal Committee (JAC), which is again at the district level. The organizations shortlisted by JAC are then referred to the State Level committee, which does the final selection of the NGO (Mr. Arun, Programme Manager, MMU, State Health Society, Maharashtra, 23rd January 2012, Mumbai). According to Mr. Jadhav, MMU Coordinator at the State Health Society,

"The process of NGO selection for running the MMU across the state is quiet transparent" (23rd January 2012, Mumbai).

The NGOs are selected on the basis of their work done in the field of health. Besides, they should have a minimum of three years' experience of working in the field of health, particularly curative care, should have a minimum turnover of Rs. 25 lakhs annually and should at least have five types of doctors and a 50-bed hospital, so that at times of emergencies, patients can be brought back by the van for treatment. Overall, the NGO selected should have a sound service background and should be able to deal with all

kinds of emergency situations, such as epidemics, disasters, etc. This is possible only if they have good infrastructure along with a strong team of doctors (Mr. Jadhav, IAS, MMU Coordinator at State Health Society, Maharashtra, 23rd January 2012, Mumbai). It is important to note that the above mentioned criteria is not fulfilled by many NGOs, as there are hardly any with such vast infrastructure and sound economic background providing specialized services in health care. NGOs usually operate on a small scale and lack such elaborate infrastructure and resources. Hence, the pool of NGOs for selection of the NGO to run the MMU is usually very small, and hence the competition is between very few NGOs.

Like other states, the Mobile Medical Units in Maharashtra aim at providing primary, preventive, curative, promotive and referral health services to people residing in remote villages of the unserved and underserved areas, at their doorstep. The service is extremely useful in the interior tribal pockets with poor connectivity. According to the state level coordinator of the scheme, Mr. Jadhav,
"*The aim of the MMU is to provide health services at the doorstep of villagers residing in remote areas, where there are no health facilities and which are poorly connected by roads"*(23rd January, 2012, State Health Society Mumbai).

According to a report in the Times of India, Nagpur,
"With the help of the unit, the villages would be able to avail some facilities that have never been able to reach them. Equipped with a minor OT, the van can be very useful for helping women in rural areas deliver babies in a safe manner. The facility could also be used for pre-natal and ante-natal care" (Shrivastav, 2011).

This information was further substantiated whenmost stakeholdersof the scheme mentioned that the unit primarily focuses on maternal and child health, and aims at reducing the IMR and MMR. However, the researcher feels that the focus on Maternal and Child Health Services alone destroys the comprehensiveness of the programme, and diverts the focus from overall primary health care.

The important stakeholders of the programme include the Mission Director, NRHM, the staff looking after the programme at the State Health Society, which includes the Coordinator and the Programme Officer, the DHO, the DPM and other staff working on the programme at the District level, including the Monitoring and Evaluation officer and a clerk specifically working on the programme. At the Block level, Medical Officers are not involved in the programme as yet, which is an important omission. However, as reported by Mr. Arun, State level Programme Manager,
"Soon the Block Medical Officers would be required to pay monitoring visits at the site of the MMU" (23rd January 2012, Mumbai).

At the village level, the Sarpanch, ASHA and AWW can be extremely instrumental in running the programme, as the van staff collects the list of ANC and Immunization drop outs from them and requests them to bring these people to the van. They are also expected to create awareness in the village, inform villagers about the dates of the van's visit and bring them to the same for check-up. However, in reality, they were not found to be performing their role effectively, as most villagers were unaware about the day of the van's visit, and came to learn about it through spot announcement. There can be two reasons for the same; firstly, the Mobile Van is a recent initiative, hence, even key people in villages do not know about it as they have not been oriented about the same and secondly, the ASHA workers receive an incentive for other work, but not for this and hence she is not motivated to do the same. In order to enhance the outreach of the programme, the ASHAs, ANM, AWW and *Sarpanch* need to be closely integrated and actively engaged in the programme.

The other important stakeholders of this programme are the Sisters responsible for running the programme at the trust, and the van staff which includes the Medical Officer, GNM, lab technician, pharmacist and the drivers.

The following section is an attempt to collate basic information about the programme that is being run in Thane District of Maharashtra, the chosen area of our study, as reported by the above mentioned stakeholders as well as beneficiaries of the programme. The section not only describes the evolution of the unit in Thane district, mode of implementation, services provided, problems in implementation and experiences of the providers and beneficiaries availing the scheme, but it also looks at nuances like financial details, staff composition, their selection, training and satisfaction levels. Besides, the section also tries to draw an analysis as to whether the programme is equitable, replicable, sustainable, and is able to provide quality services.

6.4. MMU IN THANE DISTRICT, MAHARASHTRA

The Mobile Medical Unit or *Phirta Vaidkiya Dawakhana* (Marathi name of the van) is being run in 54 villages of Jawhar and Mokhada blocks of Thane district since August 16th, 2011. These villages have been chosen by the government mainly on account of their remote location. The unit is being run by the District Health Society of Thane district in partnership with the Maharashtra Dayanand Society, which is run by a group of Canoscian sisters. The society is registered as a charitable trust under the Charity Commissioner of India. The trust comprises a 100-bed hospital, Leprosy clinic, School for Nursing Training, hostel for tribal girls and 75 Self-Help Groups, beside the Mobile Medical Unit, which is referred as the NRHM Project (Sister Mary John, Manager and Vice President, Maharashtra Dayanand Society, 17th November, 2011, Talassari, Thane). Details about the trust are mentioned in Box 6.2.

Box 6.2.: Details of Maharashtra Dayanand Society

Maharashtra Dayanand Society, commonly known as the Dayanand Hospital, was started in the year 1975 by the Canoscian Daughters of Charity Mumbai. The Hospital is situated in a village Vadoli, which is two kilometers away from Talassari town and provides health services to a substantial population of *Adivasis* living in BPL conditions in Talassari and Dahanu talukas. The presence of the Canoscian sisters has been, and continues to be, a blessing to the less fortunate.

The hospital team comprises five full-time doctors, including a gynecologist, physician, pediatrician, surgeon and RMO. Besides, there are six part-time doctors, who include a surgeon, cardiologist, dentist, orthopedic, psychiatrist and ophthalmologist. Services provided by the hospital include: Daily OPD (averaging 150 outdoor and 60 indoor patients), major and minor surgeries (averaging 35 surgeries a month including Laproscope), Neonatal Intensive Care Unit (NICU) with four warmers and two phototherapy unit and CPAP, Intensive Care Unit (ICU), Diagnostic laboratory and regular Immunization programme for children. Other activities of the trust include: ANM nursing schools for girls completing 10th standard, ongoing training programmes for nurses, Mobile Medical units, two Rehabilitation centers for patients of Hansen's Disease, boarding facility for 110 girls, networking with Government on Tuberculosis DOT, Leprosy and Polio Surveillance, Community Development and Income Generation programmes through 80 Self Help Groups in 30 hamlets, Community Health and implementation of Government Health schemes through 16 health workers, Empowerment through learning for life programmes for youth, children, women and balwadis.

Evolution of the Programme

The first step in the formulation of any partnership programme is the NGO selection. Even though the scheme of Mobile Medical Unit was launched by the Central Government in 2007, the advertisement for NGO selection for 16 districts in Maharashtra was given by the State Health Society, Maharashtra in newspapers on 1st April, 2011. Thane was one of the districts for which NGOs were asked to apply. Following this, Dayanand Hospital applied for the project because they liked the programme, and it aligned with the larger goal of the trust, which was to serve the needy. Besides, there were repeated pressures from the TMO of Talassari block on the trust to apply for the project, as he felt that they are doing good work and were apt to run the project (Sister Monica, Principal, Nursing School, Maharashtra Dayanand Society, 24th November, 2011, Talassari, Thane). The society was then asked to submit papers to the government, which included their account statement for the last three years, society registration papers and details of all the work done by them. This was followed by a visit to the trust by NRHM officials from the District Health Society, comprising Ms. Reeta Gaikwad, DPM and some other officials, mainly for verification of information already submitted. The team was quite impressed by the infrastructure of the hospital, and decided to choose them for the partnership programme. The terms and conditions of the partnership were explained by the team to the trust's staff. As mentioned by Sister Mary, president of the trust,

"*Seeing the terms and conditions of the partnership we were quiet nervous and apprehensive, but the NRHM officials convinced us to sign the contract*" (17th November 2011, Talassari, Thane).

According to the Monitoring and Evaluation Officer District Health Society, Ms. Archana Deshmukh, "*Three NGOs from Thane had applied to this advertisement. A Joint Action Committee (JAC) was formed from the NRHM which comprised the Mission Director NRHM and other senior officials from the District Health Society for selection of the NGO. The JAC committee evaluated the proposals of the three NGOs and forwarded the same to the State Level Committee, which selected the Maharashtra Dayanand Society to run the Mobile Medical Unit in partnership with the District Health Society, Thane district*" (2nd November 2011, DHS, Thane).

According to the staff of the trust, they were selected due to their proven dedicated work in the area of health, good infrastructure and reputation (Sister Naina, Staff Nurse and Sister Pakuli, Social Worker, Dayanand Society, 17th& 24th November, 2011, Talassari, Thane).

The partnership formulation was then legalized by signing a formal Memorandum of Understanding (MOU) which laid down the terms and conditions for partnership. The MOU is signed on a Rs. 100 stamp paper and is prepared as per the guidelines of the State Health Society. The NGO was involved in its formulation, although only notionally. Some highlights of this MOU can be seen in Box 6.3.

It is important to note that even though the MOU mentions 64 villages to be covered in the two blocks, the van in reality is only covering 54 villages with the approval of district officials.

The next step that follows NGO selection is staff selection. Staff positions for the unit were advertised in local newspapers, post which, interviews were conducted by a panel comprising two district level NRHM officials, two NGO representatives and two local doctors (Sister Naina Pawar, Staff Nurse, Maharashtra Dayanand Society, 17th November, 2011, Talassari, Thane). A lady doctor, one staff nurse, one lab technician, one pharmacist and two drivers were selected for the purpose of running the unit. As mentioned by most trust staff members, selecting an MBBS lady doctor was proving to be problematic for the trust as no one was ready to join the programme, mainly due to the long distances of travel involved. Finally, they had to settle for a Bachelor in Unani Medicine (BUMS) lady doctor. As reported by the trust staff, even she is not very interested in her work and threatens to quit every now and then (Sister Mary, Manager and Sister Monica, Principal, Dayanand Hospital, 17th& 24th November, 2011, Talassari, Thane).

After selection, the staff received a day's training in the District Health Society, Thane. This process was completed on 14th of August, 2011 and the next day, the programme was inaugurated. From 17th August, 2011, the programme was operational in Jawhar and Mokhada blocks. A list of 56 villages were selected

by the DHO for running the van, on account of their interior location, non-availability of health services in the vicinity, and lack of connectivity through transport facilities (Sister Mary John, Manager, Dayanand Society; Mrs. Archana Deshmukh, M & E Officer, DHS; Dr Sunita Chowdhury, MO, MMU, Mr. Washim Sheikh, Driver, MMU). Before the van was handed over to the NGO on 15th August, 2011, it was run by the Additional District Health officer (ADHO), Jawhar in Jawhar and Mokhada blocks for one month, since the vehicle for the unit had already been purchased and the NGO selection had not been completed. However, the ADHO as well as the DHO of Jawhar & Mokhada blocks were ignorant about the programme and its activities.

Box 6.3.: Highlights of the MOU between District Health Society, Thane and Maharashtra Dayanand Society Canoscian Convent, Vadavali, Tal- Talassari

- Agreement on 25th July 2011, between Maharashtra Dayanand Society Canoscian Convent, Vadavali, Talassari and District Health Society, NRHM, represented by District Health Officer.
- Agreement on stamp paper (Rs. 100) signed by R V Kadam (DHO), with Pooja Singh (District RCH officer) and Reeta Gaikwad (District Programme Manager) on behalf of District Health Society serving as witnesses. On behalf of Maharashtra Dayanand Society, MOU was signed by Sister Mary John, Vice President, Maharashtra Dayanand Society. With Sister Monica, Principal of School of Nursing and Sister Naina, staff nurse serving as witnesses.
- The contract is for one year, starting from 25thJuly,2011, and can be renewed on the basis of performance.
- 64 villages in two blocks of Jawhar & Mokhada to be covered by the van and each village to be covered at least once a month.
- Ownership of MMU is by the government; it is handed to the NGO only for operational purpose.
- Appointment of staff to be done by the NGO. Recruitment rules and regulations would be given by the DHO. The staff members are NGO staff, and they cannot claim employment under Government of Maharashtra; appointment letter is given by NGO.
- Both vehicles along with the equipment would be insured by a Public Insurance company by paying a premium amount.
- The vehicle would be parked either in secured premises or in the government health center, overnight and on holidays.

Box 6.3. *continued*.

- Payment conditions: 50% of the amount would be released in advance after signing of the agreement and the second installment would be released on production of statement of expenditure or Utilization certificates.
- In case of delay in release of advance, the NGO should spend the money from their funds, which would then be reimbursed.
- Payment to NGO per annum for maintenance of vehicles, equipment, etc. would be Rs. 9,28,000 and for staff salary would be Rs. 7,68,000.
- NGO would insure the safety and security of their staff.
- The NGO should maintain the vehicle and keep it in proper condition. In case of any damage to the vehicle, other than normal wear and tear, the NGO would have to pay the essential cost of repairs to the govt.
- The logo to be displayed on the vehicle should be 'Firte Vaidkiya Pathak, Maharashtra Dayanand Society Canoscian Convent, Vadavali, Talassari'.
- The MMU should be exclusively utilized by the NGO to provide services in the allotted area of the district, as per operational guidelines issued by the State Health Society, NRHM, Mumbai.
- A log book is to be maintained by the NGO and kept with the driver, and should be available for verification by the DHS officer, whenever called for.
- Monitoring to be done by District Integrated health and family welfare society, District RCH officer under supervision of DHO, to ensure that the MMU is strictly used to provide health care in the allotted area.

Source: Memorandum of Understanding between Maharashtra Dayanand Society, Vadavali, Thane and District Health Society, Thane.

Goal of the programme

The goal of the programme is to provide health services to the poor in remote areas, where there are no health facilities. These areas are termed by the NRHM as the unserved and underserved areas. The focus of the programme is to provide ante-natal and post-natal care to pregnant and lactating mothers, and to reduce the Maternal Mortality Rate and the Infant Mortality Rate. The goals of the programme, as mentioned by some staff members of the trust, are mentioned in Box 6.4.

Box 6.4: Goal of MMU, as mentioned by some important Stakeholders of the programme

- *To provide health services in remote areas and to reduce the IMR & MMR as the focus of the unit is antenatal care(Mrs. Archana Deshmukh, Monitoring & Evaluation Officer, District Health Society).*
- *To reach out to the most needy, neglected and malnourished people of the district (Sister Monica, Principal Nursing School, Maharashtra Dayanand Society).*
- *To provide dedicated and genuine services to the poor residing in interior villages, where there are no health facilities (Sister Pakuli Lopes, Coordinator, MMU, Maharashtra Dayanand Society).*
- *To reach out to the most interior and most poor segments of the society, especially in hilly areas (Dr. Sunita Chowdhury, Medical Officer, Mobile Medical Unit).*

Role of the Partners and coordination between them

The unit, comprising a big van and a Tata Sumo, are owned by the government and are handed over to the NGO for operational purposes. Similarly, the equipment within the van, as well as medicines is also provided by the government. Thus, one can say that the Mobile Medical Unit completely belongs to the government, and the NGO is a mere implementing body. The same view was also shared by most government officials as well as the NGO staff. According to the State level coordinator of the programme Mr. Jadhav,

"The scheme is designed and managed by the government and the NGO is a mere instrument for implementing the same. It is purely a government scheme and the NGO is just the facilitator. The scheme has been handed over to the NGOs as they have a better understanding of social problems within the community, and they don't operate for profits" (23rd December, State Health Society, Mumbai).

Besides providing the van and equipment, funding for the programme's operation and planning for the same, the government also performs the crucial role of monitoring and staff training. However, as reported by most staff of the van, training was organized by the NRHM only once, and that too for one day; moreover it was a mere eye-wash and hardly of any use. The NGOs role is limited to staff appointment, running the vehicle on a daily basis as per guidelines given to them by the government, and reporting. The trust's staff who are not very used to paper work, finds the reporting job tough and cumbersome. They also feel that the government does not take any responsibility of the programme and has entirely left its operations to the trust. They just play the role of a fault finder, and are totally oblivious to operational difficulties that the NGOs face in the field. According to Sister Pakuli, Staff Nurse, Dayanand Trust,

"*The government does not understand the practical difficulties that come in running a programme like this, as they never visit the field"* (24th November 2011, Talassari, Thane).

Hence, once in a while, government officials should also pay a visit to the field in order to understand the constraints of operationalizing a programme like this.

Even though most of the staff of the trust reported that good coordination exists between them and the government, they mentioned that they face a lot of problems as well. The biggest problem, as reported by most of the staff, is that they cannot function independently. The partnership is not on equal terms; while all the planning is done by the government, the trust is just expected to implement the same. Hence, most of the staff feels 'claustrophobic', as they do not have any say in the planning process, and they feel they should be involved in it. According to the Manager of the trust, Sister Mary,

"*It is difficult to cover three villages in a day, hence the NGO should be given the autonomy to decide the number of villages to be covered on a daily basis depending upon the field situation"* (11th November, 2011, Talassari, Thane district).

She also mentioned that they do not have the autonomy of taking decisions in the field, for example, even if the van needs repair they need to ask the government. Another problem that was reported by most of the trust staff was the hostile behaviour of the government staff, which includes the *Sarpanch*, ANM, AWW and ASHA at the village and PHC level. According to Ms. Jayshree the GNM of the van,
"*The government staff do not cooperate with them in awareness generation and in getting the ANC and PNC cases to the van*(26th November, 2011, Talassari, Thane district).

The documentation work was also found to be very tedious by most of the NGO staff, as they have to report each and every minute detail to the government, and if they fail to do so, they get a firing from the concerned authorities. The apathetic attitude of the government towards the trust is also reflected in the fact that many times, the trust staff members are called for Staff Meetings in Thane at a very short notice, without understanding the long distance of travel to Mumbai from Talassari and the planning required for the same (Sister Monica, Principal Nursing College, Dayanand Trust, 24th November 2011). It is mainly because of these problems that the NGO faces with the government, Sister Naina shared that,
"*There is no proper coordination between the government and the trust, and the government doesn't cooperate with us"* (17th November, 2011, Talassari, Thane district).

Equipment and Drugs

The Mobile Medical Unit of Thane district comprises two vehicles; one van, Tata LPT 712 (MH 12 PW 0762) which is referred to as Mobile Medical Van and one supporting vehicle, which is a Tata Sumo Victa (MH 04 AN 3321). The supporting vehicle is provided for the travel of MMU staff to the desired location, accompanying the van. This vehicle is also used for carrying and dispensing drugs. The ownership of Mobile Medical Unit (MMU) vehicles (both vehicles), with interior, furniture, fixtures, medical equipment rests with the State Health Society, Government of Maharashtra and the NGO (trust) is expected to operate as per guidelines and conditions incorporated in the contract document.

Exhibit 6.1: Mobile Medical Van being parked in Aayre village of Jawhar block, Thane district

Exhibit 6.2: Patients visiting the Mobile Medical Unit in Aayre Village of Jawhar block, Thane district

As per NRHM guidelines of the State Health Society, the main Mobile Medical Unit van should be provided with the following fittings and furniture; four foldable seats for the staff, hooks for an intravenous bottle, brackets for oxygen cylinder with adjustable straps, a detachable stretcher, medicine cabinets, instrument cabinet, automatic folding stretcher, small refrigerator/ice line refrigerator (ILR), two Basins, a water storage tank, generator, water pump, examination table, cot, chairs, storage for drugs, equipment, chemicals, etc., stool, waste collecting bins as per biomedical waste management specifications, laboratory table with basins and a fire extinguisher (State Health Society Maharashtra, 2011).

The van, in consideration of our research, is provided with most of the above mentioned fittings and accessories, except refrigerator and laboratory table, which would be provided by the government shortly, as reported by the interviewed government officials.

Equipment or instruments provided in the van, according to the trust and van staff includes an X-ray machine, Oxygen cylinder, weighing machines, separate for children and adults, Lab equipment, Digital meter, Laryngoscope, BP apparatus, Stethoscope, examination table, bed, nursing table, chairs, stool, AC and a generator. These are less than what should ideally be in the van as per NRHM guidelines. Table 6.1 lists the equipment that should be in the van as per NRHM guidelines along with those which have or have not been provided in the van, as per the October report of the trust.

In this table, one can see that even though the van is well equipped, some essentials like refrigerator, glucometer, suction apparatus with accessories, torch and spotlight have not been provided by the government yet. According to Sister Mary, Manager of the trust, lab equipment has not been provided in the van, as a result of which, blood tests cannot be conducted in the van itself; instead blood samples have to be brought to the trust for testing. The same was also reported by the technician and MO of the van. According to the trusts report of October 2011, none of the lab services could be provided as they were given a Haemogram without a manual and hence they do not know how to use it; also lab reagents were not there and so they were unable to perform any tests. Reasons for non-availability of the equipment, as explained by some government officials, was the cumbersome procedure of purchase involving procurement of quotations and release of tenders, etc. As explained by Mrs. Archana Deshmukh, Monitoring & Evaluation officer, DHS, Thane,

"The van has just started operating, eventually within a few months all these equipment would be made available" (2nd November 2011, District Health Society, Thane, Mumbai).

The NGO staff, on the other hand, reported corruption as the main reason for the non-availability of essential equipment within the van.

Table 6.1: Availability of Instruments within the MMU of Thane District

S. No.	Name of the Instrument	Quantity for one MMU	Available Equipment
			Yes/No
1.	Microscope with Light source (Binocular)	1	No
2.	Sterilizer 38 cms with electric drums	1	Yes
3.	Dressing Drum (11*9)	2	Yes
4.	Weighing Machine Adults Simple	1	Yes
5.	Weighing Machines Baby Simple	1	Yes
6.	Stethoscope	2	Yes
7.	B.P. Apparatus	1	Yes
8.	Haemoglobinometer (Manual & digital)	1	Yes
9.	Centrifuge Machine (Mini)	1	Yes
10.	Nabulization Machine	1	No
11.	a) Ambu bag Adult	1	No
	b) Ambu bag Paediatric	1	No
12.	Suction Apparatus with accessories	1	No
13.	Torch & Spot Light	1	No
14.	Glucometer	1	No
15.	Refrigerator (capacity 50 to 60 litre)	1	No
16.	Needle cutter (manually operated)	1	Yes
17.	Laboratory Table	1	No

Source: Status Report from August to Oct. 2012, Dayanand Trust.

According to NRHM guidelines, all essential drugs are required to be in place and always available in the MMU for dispensation free of cost (State Health Society Maharashtra, 2011). However, most of the staff of the MMU as well as the trust reported that sufficient amount of medicines have not been provided by the government. Note that the guideline lists 83 essential drugs which must be available in the van. The pharmacist of the van, Mr. Dhiraj Patil, provided a list of 35 medicines which were available on the van on November 24th, 2011, which was the day of his interview. These medicines are mentioned in Box 6.5.

The Monitoring and Evaluation officer of the programme, Mrs. Archana, while explaining the shortage of medicines mentioned that,

"*According to the NRHM guidelines, two medical kits comprising of all 83 medicines is provided to the unit by the State Health Society on a six-monthly basis. Besides, in the yearly budget, there is a provision of Rs.50,000 for the purchase of medicines. In case the trust is falling short of medicines, they can purchase the same from this amount, otherwise they can also take it from the nearest Primary Health Centre (PHC)"* (2nd November, 2011, DHS, Thane district).

The Manager of the trust, Sister Mary mentioned that the trust is purchasing a lot of essential drugs on their own as the same has not been provided in the kit given to them by the government at the start of the programme. However, she was sceptical about the fact that Rs. 50,000 per annum is too less an amount for buying the required amount of medicines as very less medicines are provided to them in the kit given by the government.

Box 6.5.: Essential drugs available on the van as on 24th November, 2011

Tab. Paracetamol, Tab. Cetrizine, Tab. Diclofenae sodium, Tab. Ibuprofen, Tab. Nimusulide, Tab. Metrogyl, Tab. Multivitamin, Tab. Folic acid, Tab. Asthaline-4 mg (Salbutamol Sulphate), Tab. Ciproflaxacin-250 mg, Tab. Norfloxacin-400 mg, Tab. Cotrimaxazole, Tab. Chloroquin phosphate-250 mg, Tab. Furazolidone-100mg, Tab. Ondasetron, Tab. G riseotulvin-125 mg (tabs), Cap. Cephalexin-500 mg, Cap. Amoxycillin-250 mg, Cap. ampicillin-250 mg, Syp. Paracetamol, Syp. Cough (Chlorpheriramine Maleate), Syp Normet (Simethicone, Norfloxacin & Metro), Syp Amox, Oint Mucanazole, Oint Diclo, Oint Cipladine (Povidone-Iodine), Syp. Albendazole, Gentamicine eye/ear drop, Syp. Calcium with Vit D3, Syp. Cotrimaxazole, Inj Diclo, Inj Paracetamol, Inj B-complex,Inj Gentra, Syringe with needle.

Implementation of the Programme

Services provided

As mentioned earlier, the list of villages and the number of villages to be covered per day is given by the District Health Society to the NGO. The NGO then prepares a daily schedule for running the van, which they hand to the District Health Society. The same is the case even for the MMU at Thane District, where the monthly plan for every quarter is prepared in advance and given to the DHS by the trust. In any given day, the Mobile unit targets covering two to three villages falling under the same route; there is also a provision of night halt at least once a week. The lady medical officer is responsible for the whole unit, especially during the night halt. The van's staff membersare expected to create awareness on preventive aspects of various diseases, as well as the programmes under NRHM during the night halt. The van starts

from Dayanand Hospital Vadavali, at 8.30 am and comes back anywhere between 7 to 9 pm, depending upon the distance of the village covered. The monthly plan for the vans visit for the month of December 2011 can be seen in Table 6.2

As one can see in this schedule, the number of villages to be covered in a day is decided according to their distance from the trust. When villages are located very far from the trust (say more than 90 kilometers), a lot of time is spent in travelling and then the van covers only two villages, otherwise three villages are covered. Weekly, the van alternates between Jawhar and Mokhada blocks. For example, if the van covers Mokhada in one week, it covers Jawhar in the other. In the night, the van is stationed at Jawhar Cottage Hospital, while the Sumo carrying the staff and medicines goes back to the trust premises at Talassari. Though the van targets to cover all 56 villages in a month, in reality, this is rarely achieved. According to Sister Monica, Principal, Nursing School, Dayanand Trust,
"*It is a very tough job to cover all the villages in a month, as the villages are located very far from each other. Many times we are not able to cover three villages, even though we target the same. Hence, the number of villages to be coveredshould be reduced*" (24th November 2011, Talassari, Thane).

The plan for each month is prepared on similar lines, and the same set of villages is taken. The only difference is that of the date. The van is functional for 20 days i.e. 5 days a week, Monday to Friday.Saturday is the day for vehicle maintenance and Sunday is a holiday. Details of the monthly schedule for the unit as per the MMU guideline can be seen in Table 6.3.

The unit is expected to provide primary level services in the assigned geographical area. This includes curative services, first aid, referral services, family planning services, ante-natal and post-natal care, immunizations (only for children who missed the routine immunization programmeme); management of epidemic outbreak, counselling on all matters particularly HIV/AIDS, implementation of National Health Programmes, health education activities, environmental sanitation and designated lab tests or sample collection for sending to testing labs (State Health Society, Maharashtra, 2011). Besides the provision of these services, the van focuses on RCH. Focus on other National Health Programmes like Malaria and TB is lacking, mainly because the main focus of NRHM is to reduce the IMR and MMR, which can be tackled only by focusing on RCH.According to Sister Pakuli,
"The above mentioned guidelines of the NRHM are exactly followed for providing services within the van. It focuses on providing health services to the marginalized, organizing women and catering to their needs" (24th November, 2011, Talassari, Thane).

Services provided by the van, as mentioned by some important stakeholders of the programme, include check-up through OPD, blood tests, delivery, ANC/PNC, IV, dressing, etc. (Sister Monica, Dr. Sunita Chowdhary, Ms. Jayshree, Mr. Wasim Sheikh). Sister Monica mentioned that,

"*Besides these services, we are also working on health awareness; our nursing students have started to accompany the van once in a while. They make door-to-door visits and create awareness on general health as well as the health programmes"* (24th November 2011, Talassari, Thane district).

When the van started operating, it offered only general check-ups and slowly other services have been added. Health awareness has been added recently. To further streamline the work being done by the nursing students and Sister Pakuli (an MSW working with the trust) on health awareness, the trust is in the process of getting one position of a Social Worker sanctioned by the government. It is important to note that this is a self-initiated activity of the trust, and is not within the mandate of NRHM. The GNM of the van also works closely with the ASHA, ANM and AWW of the village to identify the ANC and PNC cases as well as those of immunization drop outs to address them. The van is also helping in providing other health programmes which are not reaching these interior villages; for example, recently the van received kits for Sickle Cell Testing to increase the outreach of the Sickle Cell Disease Control programme, which is being implemented on a large scale in Thane district.

Table 6.2: Action Plan for the Mobile Medical Unit for the month of December, 2011

S. No.	Name of Block	Name of PHC	Date	Time	Name of village	Population	Distance (kms.)	Awareness (Halt)
1	Jawhar	Tallavali	1/12/2011	10.11am	Kare Vadpada, Madhachpada	260	110	
2	Jawhar	Jamser	2/12/2011	9.30 am	Malghar, Hatheri, Pimpalpada	340	70	
3	Jawhar	Sakarsheth	6/12/2011	09.05am	Kundpada, Ozar	260	90	Night Halt
4	Jawhar	Jawhar	7/12/2011	8.10 am	Singharpada, Kharonda	300	95	
5	Mokhada	Moranda	8/12/2011	10.00 am	Paserav, Kherachapada, Mordhachapada	325	60	
6	Mokhada	Moranda	9/12/2011	9.00am	Jambhulmatha, Ruichpada, Baladhyachpada	430	75	
7	Mokhada	Moranda	12/12/2011	8.15 am	Palaspada, Rautpada, Pudawa	238	35	Night halt
8	Mokhada	Aase	13/12/2011	9.00am	Assarveera, Dhodipada, Mukundpada, Vanganpada	440	46	
9	Mokhada	Aase	14/12/2011	9.35 am	Bhavadi, Karoli, Kundpada	370	60	
10	Mokhada	Vasada	15/12/2011	9.05 am	Dhamset, Behetwadi	430	40	
11	Mokhada	Vasada	16/12/2011	8.40 am	Suryamal, Kevnala, Bhavanivada, Savada	460	50	
12	Jawhar	Moranda	19/12/2011	9.00 am	Raytale, Dharanpada, Tokarkhand	409	85	Night Halt
13	Jawhar	Jawhar	20/12/2011	10.00 am	Nehade-Buvanganpada, Gavadpada	352	48	

14	Jawhar	Jawhar	21/12/2011	9.20 am	Adkadak, Hadekishannagar	375	40	
15	Jawhar	Jamshet	22/12/2011	9.15am	Gavataka, Khardi, Vandari	290	54	
16	Jawhar	Jawhar	23/12/2011		Aphtale, Gangapur, Aakhar	275	55	
17	Jawhar	Sakarsheth	27/12/2011		Jambhala, Dahul, Ruighar	490	80	Night Halt
18	Jawhar	Sakarsheth	28/12/2011	9.25am	Kirnira, Padvipada	440	90	
19	Jawhar	Jawhar	29/12/2011	9.20am	Dabhlon, Akhar	335	80	
20	Jawhar	Tallavali	30/12/2011	8.20am	Akara, Ambyachapada, Zappada	310	82	

Source: Prepared by Dayanand Trust and submitted to the District Health Society, Thane, December 2011.

Table 6.3: Monthly Schedule of the Van

Activities	Allotted Days	Remarks
Camp Programmeme / Field Visit	20 days	Weekly / Fortnightly programmeme schedule to be developed taking into consideration the local situation; could be decided in consultation with DHO.
Medicine stock and Repairs Maintenance of Vehicles	4 days	Every Saturday will be working for said activity.
Preparing Reports Monthly meeting	1 day 1 day	Monthly basis May be organized monthly at district level
Weekly Holidays	4 days	Avail weekly Sunday as holiday or fortnightly or at a stretch at the end of a month as per Camp schedule.
Deployment for any Emergencies		As and when required in consultation with District Health Officers.
Total	**30 days**	

Source: Operational Guidelines for NGO, National Rural Health Mission, State Health Society, 2011

Lab equipment is insufficient in the van and hence only basic tests are conducted in the same. For other tests, blood samples are carried to Dayanand Hospital. The advanced lab equipment is expected to be available soon, following which, full-fledged pathological services can be offered (Mrs. Archana Deshmukh, M & E Officer, DHS, Thane, 2nd November, 2011).

Overall, the government officials at various levels were proud of the services being offered by the van. This can be summarized by the words of Mr. Jadhav, IAS, Coordinator, MMU, State Health Society, NRHM,

"*Exceptmajor surgeries, complicated lab tests and treatment of the terminally ill, the van is providing all kinds of basic health services, as a result of which, it is able to provide urgent medical treatment to the needy patients"* (23rd January, 2011, State Health Society, Mumbai).

Mr. Jadhav also mentioned that creating awareness about the van and the services provided is a very important component of the programme. All staff members at the sub-centre as well as the PHC, which includes the ANM, MPW, ASHA and Anganwadi workers, are expected to spread awareness about the van and its date of visit to the villages. The time-table of the vans visit should also be displayed in the Panchayats. Mr. Arun, Programme Officer, MMU, State Health Society, substantiated this information by mentioning that calendars showing the schedule of vans visit have already been put in most villages.

An analysis of the monthly reports of the Mobile Medical Unit from the time of its initiation, that is since August 2011 until December 2011(which is the time when the data collection for this study was done), shows that the van is mostly engaged in providing curative services for minor illnesses, which includes fever, diarrheal disease and cough, in descending order. By December 2011, the MMU had examined approximately 8,140 cases, out of which, the maximum were those of fever (1,676). Incidences of diarrheal disease (800), cough (685) and other respiratory infection (521) were also high. The van did a check-up of around 600 pregnant women for ANC, some of whom were also given first and second doses of tetanus, while 105 women availed PNC (post-natal check-up) from the van. Besides, people also come to the van for skin infections and eye problems. The number of leprosy patients were few, numbering 30. Around 79 children came for the treatment of pneumonia. A lot of patients also came to the van for minor injuries and burns. These figures also give us a good overview of the health situations prevailing in the villages of the two blocks where the van operates.

The number of people examined in each camp varies daily. It also depends upon the population of the village. In bigger villages, as many as 60-70 patients come for check-up to the van while in smaller ones, as few as 20 people are examined (Sister Monica). According to Sister Naina,
"*Per day, the van covers around three villages and examines 80-100 patients; so in a month, the van examines around 1,600-2,000 patients on an average*" (17th November 2011, Talassari, Thane).

This statement was cross-checked with monthly reports of August-December 2011, which showed figures of 1,824 for the month of September, 1,593 for October, 1,716 for November and 1,807 for December. The October report of MMU shows that in just three months of its operation, the van had covered half of the village population. The severe cases which could not be handled by the van's staff, were referred to the nearest PHC or other higher institutions, Jawhar Cottage Hospital (SDH) or Civil Hospital Thane (DH) in this case.

Future Activities

According to Mr. Jadhav, State level Coordinator of the programme,
"*The scheme is likely to be expanded to more blocks in the districts from March 2012. Some more modernization and automation will take place in the unit*" (23rd January 2012, State Health Society, Mumbai).

Other plans for the scheme include covering another set of villages from next year to increase the outreach of the programme (Mrs. Archana Deshmukh, 2nd November 2011, DHS, Thane). The researcher,

however, feels that while new villages should be added to the programme, it should continue operations in the existing villages. This is mainly because each of these villages needs continuous help in terms of health services, primarily due to their interior location and lack of health services.

Awareness generation is a new activity of the programme which has been started recently. It is planned to further expand this activity by getting a post of Social worker sanctioned, especially to accompany the van on a daily basis and work towards awareness generation (Sister Mary, 17th November 2011, Talassari, Thane). However, there is a possibility that the government may not approve this request of the trust, as according to the MMU guidelines, the van staff themselves should be involved in awareness generation during night halts in the villages. Night halt is not made by the staff of the van as a result of which they do not have the time for awareness generation. Hence, the programme requires a Social worker for this work. As reported by Sister Mary, the Manager of the trust,
"The trust plans to strengthen the awareness generation work by tying up with Anganwadis and Balwadis in the villages" (17th November 2011, Talassari, Thane).

She also mentioned that more lab equipment would be provided by the government soon, and the unit would also be able to perform blood tests in the future.

Financial Details

The fund for the programme comes to the State Government from the Central Government. The State Government then releases it to the District Health Society, which then disburses the funds to the NGO for meeting the recurring cost of running the unit, while the capital cost of setting up the unit is retained. According to NRHM guidelines, the capital cost of the unit, which includes the vehicle and equipment, is around Rs. 31 lakhs, while the recurring cost for running the unit includes the maintenance of vehicles and equipment, purchase of medicines and other consumables, as well as the staff salary. These have been mentioned in details in Table 6.4, Table 6.5 and Table 6.6.

Table 6.4: Capital Cost for setting up a Mobile Medical Unit

S. No.	**Item**	**Cost**
1.	Vehicle for staff	Rs. 7 lakhs
2.	Van	Rs. 14 lakhs
3.	Equipment (generator, portable X Ray, portable Ultrasound m/c, portable ECG)	Rs. 9.75 lakhs
Total		Rs. 30.75 lakhs

Source: Guidelines for Operationalization of Mobile Medical Unit (in North-eastern states, Himachal Pradesh and J&K), Ministry of Health & Family Welfare, Govt. of India, 2007.

Table 6.5: Recurring cost of running the MMU in a year / Admissible payment to NGO per Annum

Sr. No.	Particulars	Amount in Rs.
1.	POL & Maintenance of Vehicles (2 Vehicles)	50,000
2.	Maintenance of Equipment	72,000
3.	Purchase of Consumables	12,000
4.	Purchase of Medicines(Excluding medical kit provided by SHS)	50,000
5.	Reporting, Stationary, and meeting expenses	36,000
6.	Overheads/Admin expenses/Account Keeping	1,50,000
	Total	**9,28,000**

Source: Memorandum of Understanding between District Health Society and Maharashtra Dayanand Society, 2011

Table 6.6: Admissible salaries to the NGO per annum

S. No.	Name of Staff	No. of persons	Salary of Staff (per month)	Salary of staff (Per Annum)
1.	Medical Officer	1	25,000/-	3,00,000/-
2.	Staff Nurse	1	10,000/-	1,20,000/-
3.	Laboratory Technician	1	8,000/-	96,000/-
4.	Pharmacist	1	8,000/-	96,000/-
5.	Driver for MMU vehicle	1	6,500/-	78,000/-
6.	Driver for Support Vehicle	1	6,500/-	78,000/-
	Total	**6**	**64,000/-**	**7,68,000/-**

Source: Memorandum of Understanding between District Health Society and Maharashtra Dayanand Society, 2011

Hence, upon combining the figures in Table 6.5. and 6.6, we can see that the total annual cost for running the unit is Rs, 16,96,000, which is approximately Rs. 17 lakhs. The same amount was also mentioned by Sister Mary John, Manager of Dayanand Trust, as being the yearly sanction of the trust. She also mentioned that out of the Rs. 17 lakhs sanctioned for the trust, they have received the first instalment of Rs. 8 lakhs towards staff salary and operating and maintaining the vehicles. An amount of Rs. 1.5 lakhs has been kept aside from this amount for staff salary. The remaining amount would be released after six months, once the Utilization certificate of the first six months has been submitted.

Sister Mary also informed that the trust was having difficulties in getting an MBBS doctor, as no one was willing to travel such distances every day, so they had to settle for a BUMS doctor. Even she is not too keen on continuing and threatens to leave every now and then. The monthly salary of the BUMS doctor is Rs.15,000, but in order to retain her, the trust is paying her Rs. 20,000. The trust is also managing to pay a stipend of Rs. 15,000 to the social worker who is working on creating awareness on health issues by organizing women and other marginalized groups within the villages. The trust is negotiating to incorporate this within the programme's budget (Sr. Mary John, Manager, Dayanand Trust, 17th November 2011, Talassari, Thane).

While all the sisters in the trust were aware about the budgetary provisions under the programme, amongst the van staff, it was only the Medical Officer who was aware about the programme's budget. According to the sisters in the trust, the fund is utilized on vehicle maintenance, staff salary, medicines and fuel. Amongst all expenses, the highest expenditure is on procurement of diesel for running the vehicle. As reported by Sister Monica, about Rs.10,000 is spent on diesel fuel every week. The purchase of medicines also consumes a heavy amount from the budget. The sisters also mentioned that the money spent on diesel and medicines greatly exceeds the amount sanctioned for the same in the budget, and this is putting a lot of pressure on the project (Sister Mary, Manager, 17th November, 2011 and Sister Monica, Principal Nursing School, 24th November, 2011). The same was also mentioned in the October, 2011 report submitted by the trust to the NGO, where Sister Mary has mentioned as a special remark under the financial summary report that,
"Medicine and Diesel amount exceeds beyond the budget sanctioned during the year" (Status report of MMU Thane, October 2011).

The sisters of the trust were not sure whether the funding of Rs.17 lakhs would be sufficient to run the programme for the entire year. The sisters were also sceptical as to whether they would receive the next instalment on time. It is ironic to see that while on one side the trust is unhappy with the sanctioned budget and feels that it is lacking, the State level Coordinator of the programme, Mr. Jadhav shared that,
"*There is a lot of fund for the programme and more NGOs should come up to start newer units" (23rd*January 2012, State Health Society, Mumbai).

Throwing light on the budgetary provision of the programme he mentioned that,
"Each unit gets Rs. 7,50,000 on a six-monthly basis and out of this amount, Rs. 50,000 is given in cash for medicine and emergencies while Rs. 2 lakh is for contingencies"(23rd January 2012, State Health Society, Mumbai).

Quality

The most important measure followed by the government to ensure the quality of the programme includes Monitoring and Evaluation, which is done at various levels.

Monitoring

For maintaining the quality of the programme, regular monitoring is very critical. According to the Memorandum of Understanding between the Dayanand Trust and DHS, Thane, the District RCH Officer under the supervision of DHO is responsible for monitoring the functioning of the unit in the district. Primary level of monitoring is done by the Monitoring and Evaluation officer, who collects the monthly reports from the NGO and sends the same to the DRCHO. Indicators like number of villages covered, number of patients examined (especially women and children) are tracked, ANC/PNC checks, referrals made to higher institutions, TB, leprosy cases detected, lab tests done, halts, time spent in each villages and account statements are looked into (Mr. Jadhav, State level Coordinator, MMU, 23rd January, 2011).

Monthly report is an important tool which is used for monitoring the programme and which compiles information on all the above mentioned indicators. Each staff member of the van prepares monthly report at his or her level, which is compiled by the Medical Officer of the van and the GNM. The same is handed over to Sister Pakuli, Coordinator of MMU. The report is also scrutinized by other senior sisters of the trust associated with the programme, which includes Sister Mary, Sister Monica and Sister Naina. Finally it is sent to the District Health Office, Thane, which then sends it to the State Health Society. The information in the reports is further cross-checked in monthly meetings of the staff, which are organized at the end of each month in the DHS, Thane. These meetings also act as a platform for the trust to share their concerns with the government staff. Meetings are also organized at the NRHM head office once in three months.

Besides government officials, the sisters of the trust as well as the nursing students also monitor the implementation of the programme by accompanying the van at different times (Sister Monica, 24th November 2011, Talassari, Thane).

Monitoring by state officials is only done over the phone and internet; no site visit is made and hence the state level officials are unaware of the practical difficulties that one faces in the field (Sister Pakuli, 24th November 2011, Talassari, Thane). This also gives a lot of scope to the staff of the van for manipulation, if they intend to. The van staff, if they desire so, might not visit three villages in a day or examine as many patients, but can report otherwise in the report prepared by them. When the same was discussed

with Mr. Arun, the Programme Officer working on the scheme at the State Health Society, he mentioned that to avoid such problems and for effective monitoring, the state is planning to install GPS system into the Mobile Van soon, so that the movement of the vehicle would be recorded at the concerned Taluka Health Officer and Anganwadi worker.

Moreover, instead of just being monitored by the District Health Office, the van would also be periodically monitored by other officials like *Sarpanch*, Anganwadi Worker, ANM at the village level, Medical Officer of the nearby PHC and Taluka Health Officer. Each of these officers would contribute in turns towards monitoring the scheme. This would reduce the burden on the District Health Office and would also ensure that the vans activities are scrutinized in almost all visits, hence reducing the scope for manipulation (Mr. Arun, Programme Officer, District Health Society, 23rd January, 2011, Mumbai). The Taluka Health Officers of both Jawhar and Mokhada blocks expressed disdain about the fact that they do not get any report from the trust, and are unaware of the van's movement in their areas, and felt that they should also be given a copy of the reports, in the same way they get for the Sickle Cell Disease Control Programme.

Besides monitoring, other steps taken to ensure quality of the programme according to NRHM's guidelines includes organization of monthly staff meetings, village visits, etc. (Sister Mary, Manager, Dayanand Trust, 17th November 2011). Maintenance of vehicles and provision of good quality medicines also helps in maintaining the quality of the programme. According to the driver of the van, Mr. Wasim Sheikh,
"The maintenance of the vehicle is very good as after every 20,000 kilometres servicing is done by taking the van to Vapi or Kalyan" (24th November, Talassari, Thane).

Training

Another important component essential for maintaining the quality of the programme is training of staff members, which is absolutely missing from the MMU scheme. The staff members of the van have just received one-day training after joining, as a result of which, they hardly have any knowledge about the scheme. This indirectly gets translated into lack of interest and motivation to work for the programme. The same was also observed by the researcher. Hence, organizing regular training for the van's staff will go a long way towards maintaining the quality of the programme.

Equity, Replicability and Sustainability

Equity

All staff members of the trust as well as the van were happy by the ***equitable*** nature of the programme and felt that the van is actually fulfilling the NRHM goals of providing health services to the neediest segment of the society. The van is traveling to remote, hilly and interior villages of Jawhar and Mokhada blocks, which are neither connected by roads, nor do they have any health care facility in the vicinity (Dr. Sunita, Ms. Jayshree, Mr. Wasim). Jawhar and Mokhada blocks are considered to be the most underprivileged region in Maharashtra, known for its poverty and malnutrition. The abject poverty of these villages was reflected in the fact that the monthly income of the patients coming for the van OPD in these villages was not more than Rs. 400-500 per month, which is a shocking figure and much below the poverty line. This was noticed by the researcher during exit interviews of the OPD patients as well as by studying client profiles of the last four months. According to Sister Monica,
"*Equity of the programme can be assessed from the large number of patients who are coming to the van for check-up. It can also be assessed from the fact that a lot of time is spent in each village for maximum coverage of people*" (Sister Pakuli, MSW, 24th November, 2011).

The pharmacist of the van, Mr. Dheeraj Patil gave a very good insight into this. According to him,
"*The services of the van are equally available to all the sections of the society without any discrimination. Measures like health camps and awareness rallies help a lot in this regard*" (24th November 2011, Talassari, Thane).

According to the Monitoring and Evaluation officer, Mrs. Archana Deshmukh,
"*To ensure the equity of the programme, ASHA, ANM, Anganwadi worker as well as the Gram Sevak spread information in the village prior to the van's visit* "(2nd November, 2011, District Health Society, Thane).

Interviews with villagers however, revealed that this is not happening in reality. The ASHA worker is overburdened with so many other responsibilities that she cannot find time for this work for which she does not even get any remuneration.

Replicability

As revealed by this study, the programme is proving to be successful in reaching out to the marginalized sections in the unserved and underserved areas of Thane district, and providing them health facilities. The same experience has been felt in other districts of Maharashtra as well as in other states (Mr. Jadhav, IAS, 23rd January 2011, Mumbai). It is because of this reason that the government of almost all states have started the Mobile Medical Unit in all their districts. Also, it is under the mandate of the NRHM to start one unit in all districts of the nation. Hence, the unit which was first initiated in Jammu and Kashmir and North-eastern states has now been ***replicated*** in the entire nation. An observation of the implementation of the programme in Thane District reveals that issues such as financing, supply of drugs and equipment, effective training and monitoring are critical and needs to be attended to for the successful replication of the programme elsewhere.

Sustainability

All staff members of the trust and van reported that the cost of implementing the programme is too high and cannot be run by the trust alone, hence the programme is not ***self-sustaining,*** and requires funding from external sources. The capital cost of setting the unit, which includes buying the vehicles and equipment as well as the recurring cost of running the vehicles, including the cost of diesel fuel is approximately Rs. 3,000 on a daily basis; cost of medicines as well as the staff salary is too high and almost impossible for the trust to manage alone. Sister Pakuli, Coordinator of MMU, on behalf of Dayanand trust mentioned that,
" *If the government stops funding the programme, we would have no choice but to close the programme, as we would not be able to meet the expenses of the same, but we can continue doing the awareness generation"* (24th November, 2011, Talassari, Thane district).

A similar view was also shared by Mrs. Archana Deshmukh, Monitoring and Evaluation Officer, Thane District, according to whom,
"The cost of the vehicle as well as running it to the remotest of villages on a daily basis is too high and is impossible to be met by the NGO alone. Hence, the programme would stop the moment the government stops funding" (2nd November 2011, District Health Society, Thane).

Experiences of Providers

Both the staff at the level of the trust as well as the van did not seem to be happy being associated with the programme, mainly because there seemed to be a lot of pressure put by the government on the trust

vis-à-vis implementation of the programme. The trust's staff found it difficult to manage the implementation of the programme along with their regular work at the trust, as it involved a lot of extra work such as coordinating with the van's staff, organizing monthly meetings, documentation and report compilation, all of which are very time consuming. According to Sister Monica,
"*Management of the Mobile Van is an addition to my primary work in the society. It requires a lot of accounting and paper work, which leads to neglect of my own personal work in the society"* (24th November, 2011, Talassari, Thane district).

The staff of the van also found it extremely demanding to travel such distances on a daily basis, which resulted in lack of interest and commitment towards their work. Their low motivation levels were also reflected in the fact that they were always in a hurry to rush back home, as observed whenever the researcher accompanied the van. According to Sister Mary,
"*The staff of the van would be happier to work in hospital settings, as they find it to be much more challenging. Working in the van is very strenuous; also it doesn't give them satisfaction as there is no newness in work*" (17th November, 2011, Talassari, Thane district).

The van's staff were unhappy with their salary, and felt that it was insufficient for such demanding work. The lack of medicines and equipment in the van was another source of distress, as it made service provisioning difficult and taxed them unnecessarily. Sister Mary, the Manager of the trust reported that,
"As a trust, we are not gaining much from the partnership especially in monetary terms, as till now we have to also spend money from our own pockets for the programme. Instead, the programme has created a lot of extra work for us and is consuming a lot of our time" (17th November, 2011, Talassari, Thane).

One of the sisters of the trust mentioned that they need to do a lot of paperwork for the programme, which adds to their workload. Moreover, they also have to face the rough behaviour of the government. The government is inconsiderate towards practical difficulties that the trust faces in the field and holds them singularly responsible for every small mistake. They also do not have any freedom or flexibility to operate. All of this makes them feel claustrophobic and affects their morale. The sisters also reported that they are continuing the programme mainly because it fits their larger goal of providing service to the needy. Also, the programme does help them in building credibility among people and brings them name, fame and respect from the community. Many people have come to know about their hospital through the van, and are coming there for treatment; so it does help in creating awareness about its existence. The partnership helps them in terms of establishing a working relationship with the government, which helps them in other endeavours undertaken by them (Sister Mary, Manger, 17th November, 2011 and Sister Monica, Principal Nursing School, 24th November, 2011).

On the whole, one can say that if the staff feels burdened by the work of MMU, it is natural that the quality of services offered by them would suffer.

Experience of Beneficiaries

To capture the experience of beneficiaries of the programme, a sample of four villages were chosen: two each from Jawhar and two from Mokhada blocks, which are the two blocks where the programme is operational. From Jawhar block, two villages, namely Aayre and Adkadak were visited by the researcher, accompanying the van on the days when it goes to these villages. Similarly from Mokhada block, Kalambgaon and Pasolidpada were covered. Focussed Group Discussions were conducted with the villagers residing in each block. Besides this, exit interviews were conducted with patients coming for check-up in the van. Key informant interviews were also conducted with the Anganwadi Worker, ASHA, school teachers, shopkeepers, and Sarpanch of the villages visited, depending upon their availability. The above mentioned interactions revealed some very interesting facts about the programme, which have been presented in the section below.

Awareness about the Van and its Services

Jawhar and Mokhada are the two most underprivileged pockets of Thane district, known for their poverty, deprivation and malnutrition. The villages where the van operates are the most remote and deprived. The nearest health facility is located about 10-15 kilometres away with roads in very poor condition and hardly any means of transport available. Most villagers belong to the Scheduled Tribes; the common tribes being Warli, Mahadeo Koli and Kokani. The main crop of these villages is Rice and sub crop is *Nachani*. The villagers, most of who are illiterate, mostly work as agricultural labourers and are barely able to earn more than Rs. 500-1,000 per month, as a family. Some of them have monthly incomes even less than Rs. 500 per month, which is below the Poverty Line. When families exist in such poor conditions, seeking health services for health problems is last in the list of priorities, especially when there is no health facility in the vicinity and reaching one means a lot of expense, time and hassle due to poor transport facilities. Only in very severe episodes of illness do the villagers go to the PHCs and Sub-centres, that too by invariably borrowing money from others. Under these circumstances, any health service offered by the Mobile Medical Unit at their doorstep is a blessing. This is the reason why all respondents of the study, which includes men and women groups covered in FGDs as well as key informants, were aware about the van and its services provided, that is health check-up and medicines for common cold, cough, fever and other kinds of illnesses. The villagers were also aware that the van provides special services for pregnant women and children and that the doctors in the van also provide

injections and dressing for injuries. Exit interviews with OPD patients revealed that their awareness levels were better in comparison to regular villagers, as they were also informed about services such as immunization, blood tests, IV and deliveries, which the FGD groups were unaware of.

Even though the van carries the logo of the National Rural Health Mission as well as the Dayanand Society, hardly anyone in the village seemed to know about who operates it. While some people said that the government runs it, some said it was the NGO, and the remaining did not have any clue. Only about five people in all four villages were able to say that the van is being run both by the government and the NGO. This shows that though everyone knows about the van, they are more interested in the services provided than who runs it. A second level of analysis revealed that the few who knew the correct facts were mostly the educated ones. This proves that education gets translated into awareness. It is important to note that even the key informants were not aware about who runs the van.

The maximum number of villagers covered in the FGD reported that they came to know about the van through the Anganwadi Worker, ANM and ASHA worker. Interaction within the community and friends were other sources of information. However, exit interviews of patients who had received services on that particular day revealed that almost all of them came to know about the van through on spot announcements made by it, when it comes to the villages. Few had also come after seeing the van passing by. Hence, it can be inferred that in villages, the Anganwadi worker, ANM and ASHA are creating awareness about the van and its services, but the villagers are mostly unaware about the days of the vans visit and assemble for the OPD check-up only after listening to the spot announcement. This reflects the poor work done by the ASHA and Anganwadi worker of the villages in creating awareness about the van's visits.

This observation was further corroborated by responses of the villagers who mentioned that even though they knew that the van visits their village, they were unaware about the exact day of its visit. While in Aayre village all villagers were unaware about the schedule of the vans visit, in the other three villages, there seemed to be an equal number of people who knew and who did not know about the schedule of the vans visit. The ones who reported of knowing the van's schedule did not know about it correctly, and mentioned that there is no exact time of the vans visit. Some also mentioned that they saw the van for the first time today and that it was the van's first visit to their village. Very few people knew that the van is scheduled to visit their village once a month, but even they did not know the exact date of its operation.

Similar responses were also received in the Exit Interviews of OPD patients, wherein almost half of the respondents did not know about the van's schedule. The other half who knew about the van, were

uninformed about the exact date of the visit with some stating that it comes once a month or that it comes on a Wednesday. Here again, quite a few respondents responded by saying that they were seeing the van for the first time. This is mainly because the van has just started its operations, and in most villages, it is truly coming for the first time. Also, the van staff reported that in the last visit, they were parked in a different location within the village and hence villagers residing in other parts of the village did not know about their earlier visit. The same response was also shared by one of the OPD patients.

Hence, even though the villagers knew that a Mobile van comes to their village, they did not know its schedule, and in fact, were quiet unhappy by this. This has been revealed from the responses of most of the respondents in the FGDs, according to whom,
"*If we know the schedule of the van's visit, we can keep ourselves free by not going to the farm. We can also call our relatives from nearby villages in case they have a health problem, and we can also not go to the PHC and Sub-centre which is very far off, and instead can wait for the van. This way we can draw maximum benefit from the van"*.

Some key informants revealed that in Pasolipada village, the van had earlier made two visits, and in Adkadak village it had made three, which is true as the van has started its operations since 16th August, 2011. The van staff mentioned that in Aayre and Kalambgaon villages, the van was into its third visit, as it had missed the previous months visit. Hence, the van is not able to always cover all the 54 villages assigned to it.

Services Availed and Satisfaction from the same

Most of the people covered in the FGDs as well as in key informant interviews, had availed services from the van. Most of them had been to the van once, some twice and some had also visited the van thrice. This does tally with the number of visits made in each village. The most common reason for them to seek the services of the van included: cold, cough, fever and various kinds of aches. Some had also been to the van for eye tests, skin infections and dressing for surgeries. Many people reported of having taken their children, who were suffering from diarrheal disease or fever, to the van. Some women also went to the van for ANC and PNC. This substantiates the figures observed in the monthly report of the NGO mentioned in the section on services provided.

Exit Interviews with patients who had visited the OPD on that particular day revealed that most of them had visited the van for common ailments like aches, skin infection, cold, cough, diarrhoea and fever. Many had also brought their children who were suffering from fever or lose motions. A lot of women had come for ANC. While most of them were visiting the van for the first time, a few were coming for the second or third time for follow-up or for a different ailment. Most of them had come on their own and were not accompanied by anyone.

Almost all respondents were happy by the services that they received at the van, mainly because they got free treatment which cured their illness. They were also happy about the fact that since there is no health facility in their village, the provision of basic health services by the van saved them from travelling to health facilities which are very far; this saved them from the hassle of travelling as well as their money. The villagers were also pleased by the behaviour of the staff in the van, who they said always talked to them politely and discussed their problems in great detail. According to Yashwant Dhakul Valvi, At post Kalambgaon, Tal. Mokhada,

"*The doctors in the van does quick check-up and provides medicines which provides instant relief, that too free of cost, that's why I am happy with the vans service."*

Similar responses were also received in exit interviews with OPD patients. The OPD patients who had visited the van for the second time were more than satisfied by the vans services as compared to the first time. The mere fact that they had come to the van again shows that they were happy with the services offered earlier. They were also happy with the services because they received medicines for free and cured their illness. They were also happy with the behaviour of the staff in the van and rated it to be good.

When asked to rate the services provided by the van, most villagers as well as OPD patients gave a 'Good' rating, while some gave a 'Very Good'. A significant number of people also rated it as 'Average', however, none of them rated it as 'Bad'. This reflects the reasonable level of satisfaction of the people with the services provided by the van.

While the majority responded of not having faced any problem in availing the services of the van, a minimum of one respondent in each FGD group reported of having faced some difficulty. The reasons mentioned by them can be seen in Box 6.6. Similarly, in the exit interviews, only one respondent responded of having faced a problem in availing the vans service, mainly due to the congested space in the van.

Box 6.6: Difficulties faced by Beneficiaries while availing the van's services

- *The BP instrument was not available in the van. (Hanmant Mhadu Gavit, At post. Asse, Tal. Mokhada)*
- *The vehicle was parked at the outskirts, so I had to travel a long distance to reach the van, which further deteriorated my condition, as I was suffering from fever and chills. Sick people can't walk so much, so the van should come right inside the village. (Anjali Anant Telwade, At Post. Aayre, Tal. Jawhar)*
- *I could not follow the speech of the doctor.(Kisan Shravan Ghare, At post Adkadak, Tal.*

As seen in Box 6.6, the problem of unavailability of instruments in the van was brought forth by the beneficiaries as well. This further substantiates the problem mentioned both by the staff of the trust as well as the van.

Comparative Analysis of MMU vis-à-vis other health services

Table 6.7. shows the presence of the nearest PHC and Sub-centre, and the distance from the same to the chosen villages of our study. One can observe from this table that the nearest PHC is quite far from each of these villages. Coupled with the lack of good transport facilities, this makes it extremely difficult for the villagers to travel to them. Many a times, they have to walk for almost three to four kilometres before they get any vehicle to go to the health centre. Also, going to the PHC means the loss of one working day and its wages. Thus, the Mobile Medical Unit, which facilitates provisioning of health services at their doorsteps, is preferred by most villagers, in spite of the fact that it had just started operations a few months ago.

As seen in Table 6.7, people from Adkadak and Aayre villages in Jawhar block prefer going to Jawhar Cottage Hospital instead of the nearest PHC at Shakur for any kind of ailment, as it is nearer than the PHC. Also, when they go to Jawhar, they can do a lot of other work like shopping, etc. In Kalambgaon and Pasolipada villages of Mokhada block, people go to the PHC at Asser for any kind of ailment. The sub-centre at Osarvira is not functional as there is no doctor. Mobile van has started coming to these villages only since the past two to three months and yet villages have liked it so much that they rate it better than their regular source of treatment, which they were using until the arrival of the vans. This is for the simple reason that it provides services at their doorstep, and saves them from the hassle of travelling to the PHCs or Sub-centre or Cottage Hospital, all of which are very far.

When the researcher asked groups of people to compare the services provided by the PHC with that of the MMU, most of them felt that the MMU provides better services as it is free of cost and at their doorsteps. The OPD patients interviewed in exit interviews also preferred the MMU to the PHC as the latter does not provide good and timely treatment; there is a long wait time at the PHC whereas the MMU provides prompt services. Other reasons for the villagers to prefer MMU over the PHC, as mentioned by OPD patients, included facts like MMU saves them from the hassle of travelling besides saving their money and time, saves a day’s wage and all problems which they incurred for travelling to the PHCs located at a distance.

Table 6.7: Nearest and most preferred health facility in the chosen villages of the Study

S. No.	Name of Block	Name of Village	Name of nearest PHC & Distance in kms.	Name of nearest Sub-centre & Distance in kms.	Preferred source	Reason for the same
1.	Jawhar	Adkadak	Sakur (10)	Garadwadi (6)	Jawhar Cottage	Its nearer than other facilities
2.		Aayre	Sakur (12)	Garadwadi (8)	Jawhar Cottage	Its nearer than other facilities
3.	Mokhada	Kalamgaon	Asse (14)	Osarvira (8)	Asse PHC	No doctor in SC
4.		Pasolipada	Asse (9)	Osarvira (3)	Asse PHC	No doctor in SC

For the few people who were happy with the PHC more than the MMU, the main reason was that it has all the equipment and provides services at the time of emergencies, while the van comes to the village just once a month. People were also very happy with the fact that the PHC's ambulance is available to them in emergency situations by a mere phone call, which according to them is very important. It is interesting to note that this kind of response was given mostly by people who had not received services from the MMU. The ones who had received services from the MMU were so overwhelmed by the fact that it provides services at their doorsteps, that they liked it much more than other health institutions. Even respondents of the exit interviews who had availed the services of the MMU on that particular day stated that the MMU is far better than the PHC for the above mentioned reasons.

Similar responses were received during the comparative analysis of the MMU and the Sub-centre. Most people felt that MMU provides better services than the Sub-Centre as the latter is very far and does not have any doctors, whereas the MMU provides good services, through doctors that too in their own village. The respondents were also happy with the behaviour of the doctors, who they felt guided them properly, while in the sub-centre, there is no one to guide them, making them feel lost. However, there were a few respondents who felt that the Sub-centre provides better services at times of emergency. Other reasons for the villagers as well as OPD patients to prefer the MMU to the sub-centre was same as those mentioned for the PHC, which are: MMU provides them fast service and careful examination, while saving their travel time, money, hassle and loss of wages. The villagers of Kalambgaon and Pasolipada

reported that no one goes to the sub-centre at Osarvira, as it is mostly closed due to non-availability of staff.

Outcome, Strengths and Success of the Programme

The good outcome of the programme in just two months of its operation was evident by the response of villagers at the field level, which has been described in detail in the section on the experiences of beneficiaries.

The providers of the programme were satisfied as the villagers were happy with the programme. Ever since the nursing students have started going with the van, they are happier, as even health awareness is being spread in villages visited by the van. According to Sister Monica, Principal, Nursing school,
"The goodoutcome of the programme can be ascertained from the fact that the villagers wait for us for treatment, and have stopped going to the PHCs which are located very far off, this has brought aqualitative change in their life style " (24th November, 2011, Talassari, Thane).

According to the GNM of the van Ms. Jayshree,
"*The good outcome of the programme can also be assessed from the fact that in the subsequent visit to a particular village, patients of the first visit do not come which indicates that they have been treated successfully"*(26th November, 2011, Talassari, Thane).

According to Sister Mary, Manager of the trust,
"*The programme is not only benefitting the people but is also useful for the trust as it helps them build rapport and relationship with people. It also helps in building credibility of the NGO within the community"* (17th November, 2011, Talassari, Thane).

Even though the providers of the programme were happy with its outcome, most of them felt that it is too early to comment upon its success, as the programme had just started its operations. According to Sister Monica, staff of the trust,
"*It is too early to assess the success of the programme, as we have just started running it, but people are getting help, the programme is reaching out to people and taking care of their needs. Nursing students are creating awareness even we have an MSW who accompanies the van for awareness generation. Health awareness is the best activity of the programme"* (24th November, 2011, Talassari, Thane).

Mr. Jadhav, the Coordinator of the programme at the State Level, mentioned that he is in the process of evaluating the performance of the scheme all over Maharashtra. Indicators like the number of patients examined (especially women and children), lab tests conducted, villages covered, halts and time spent are

being looked at. The findings, till now indicate, that two to three units from Vidharbha are doing very well, such as in Jalgaon and Kolhapur. Thane district is also doing moderately well. He mentioned that, *"Once this process is complete, only then would I be able to comment upon the success of the programme"* (23rd January, State Health Society, Mumbai).

When the researcher probed further and asked the providers to assess the success of the programme so far, most of them mentioned that the programme is moderately successfulas there are some problemsvis-à visthe commitment of the staff and lack of medicines (Sister Mary, Manager, Dayanand Society). The Medical Officer of the van, Dr. Sunita also felt the same, as according to her,
"The success of the programme is average, as lab tests have started recently; also the villages have been visited just once. The programme would definitely pick up in due course of time" (26th November 2011, Talassari, Thane).

While some stakeholders felt that it ismoderately successful, others felt that theprogramme is quiet successful since it is reaching out to themarginalized sections of society, residing in remote villages. According to Washim Sheikh, driver of thevan,
"*We are taking a lot of pains in going tothe interior villages everyday hence the programme is successful according to me*" (26th November 2011,Talassari, Thane).

The district level M & E Officer, Mrs. Archana Deshmukh, rated theprogramme to besuccessful, as thevan gets an overwhelming response in villages where a lot ofpatients come for check-ups on anOPD basis. ANC registration and immunization in the OPD is also quiet high.

The Taluka Health Officers of both Jawhar and Mokhada blocks could not comment much on the programme, mainly because they are not in the loop of monitoring it. Officials at the district level, which include the DHO, DPM and DRCHO, were quiet happy with the implementation of the programme in just a few months of its operations, which is a good indicator of the success of the programme. The District Programme Manager of Thane district, Ms. Reeta Gaikwad mentioned that,
"*The programme is doing real work in the field by reaching out to the people in remote villages and providing them health services"* (26th October 2011, DHS, Thane).

The biggest advantage or strength of the Mobile Medical Unit, as told to the researcher by the villagers, was that it saves their time and money, which they had to earlier spend on travelling to health facilities located very far away. One of the villagers at Kalambgaon village, Sakharam Chima Lahare shared that,

“*The van not only saves money and travelling time, but it also saves me from the hassle of going to Asse PHC which is located 14 kilometres away from my village, to reach which I have to walk at least for three kilometres before I get any means of transport.”*

The van is particularly useful for the poor who cannot pay for private facilities which are nearby or cannot spend on travelling to government facilities located far away. It is also very useful for the aged, for whom it is difficult to travel distances. Some other advantages of the van, as mentioned by the villagers include, availability of good doctors, treatment of a range of ailments, easy provision of free medicines and injections at their doorsteps, and a quick service with hardly any wait time.

Some respondents in the exit interviews shared that they feel lost at the PHC or the Sub-centre whereas in the MMU, they receive good advice at their doorsteps. They were also happy about the fact that the van can even take care of deliveries and serious patients. One of the respondents, Ramu Gadu Jhinjude from the village Pasolipada expressed that,
“*If the van comes regularly to ourvillage then all our health problemswould be solved.*”

Another respondent, Ramji Devji Kurha of Aayre village, shared that,
“*The van helps thepatients in our village get facility during times of emergency free of cost; it is good whenwe don’t have money.*”

A few respondents mentioned that the greatest strength of the van lies in the fact that it saves the patient as well as his attendant who accompanies him to the health facility, from losing out on one day’s wage, which they would have otherwise spent while traveling to the health facility. This combined with the money saved on transport provides a huge economic benefit to poor families. However, one respondent from Adkadak village mentioned that,
“*The van did not prove to be of any advantage to me, as my illness was not cured. It is good only for treating minor illnesses.”*

According to Sister Monica, Principal, Nursing School,
“*The greatest strength of the programme is that it is reaching out to the poor and needy, providing them good services, improving their health status and creating awareness among them on health issues, that too free of cost.”*

Other strengths of the programme, as mentioned by the staff of the NGO as well as the trust, include good funding from the government, supply of medicines and equipment from the government, and dedicated work of the NGO. According to Sister Pakuli,

"*The greatest strength of the programme is the fact that the government has taken a note of the interior parts, which gives some hope for the underprivileged people residing in remote villages"*.

The sisters of the trust considered partnership with NGOs to be both a strength as well as a weakness of the programme. On one hand, through partnership the trust is getting funds and equipment to serve the people in an effective fashion, which they would not have been able to do otherwise along with giving them name, fame and credibility within the communities they operate in. On the other hand, partnership with the government has its own sets of problems, which include, increased work load, too many rules and regulations to comply with, lack of freedom in planning and decision making, lot of paperwork, etc. At the end of it, all the staff felt that the partnership does more harm to them than good. According to Mr. Jadhav, State level coordinator of MMU,
"*Since the programme is being offered in a PPP mode, it is preventing the NGOs from performing their best, as they have a tendency of not taking ownership of the programme and passing it on to the government. Hence, the programme should move from PPP to purely professionally managed units, with minimum contribution from the government"* (23rd January, 2011, Mumbai).

Some of the advantages and disadvantages of Public-Private Partnerships, in general, as mentioned by some important stakeholders of the programme, can be seen in Box 6.7.

Box 6.7: Advantages and Disadvantages of PPP

Advantages:

- PPP is very good for NGOs for fund generation, and it is helping us do good work for the people. It helps in better implementation of the programme as it helps in reaching out to the poor, mainly because of the NGO involvement (Sister Monica).
- PPP enhances the outreach, quality and affordability of health programmes (Sister Mary).
- By partnering with the NGOs, government gets to know the field realities (Sister Pakuli).
- Partnership withNGO helps the government in reaching out to the people in areas where they cannot, as the NGO has very good networks within the community (Archana Deshmukh).

Disadvantages:

- PPP prevents the NGOs from taking ownership for a particular programme. Also, in a PPP, the private party is only interested in the infrastructure that they get from the government. In most cases it is land, while in the case of MMU it is the vehicle.

Weaknesses/Problems in Implementation

The following section mentions the problems experienced in implementation of the programme, as mentioned by providers and beneficiaries and as observed by the researcher during the course of her study.

One of the biggest problems, as mentioned by all the staff of the trust as well as the van, was the unavailability of drugs. Sufficient and timely medicines are not provided in the van and even those that are, normally are of inferior quality. Even though according to guidelines the government is supposed to provide a list of 83 medicines, only 35 were available on the van when the researcher interviewed the pharmacist in November, 2011. Annually, an amount of Rs. 50,000 is given to the NGO for buying medicines, but the staff of the trust reported that they are spending much more than this. One of the sisters of the trust reported that, recently the government gave them old stock of medicines, which they returned. The problem of shortage of medicines was also observed by some OPD patients, who mentioned the non-availability of good quality medicines as one of the weaknesses of the programme.

The same is the case with the equipment, which are inadequate and not provided as per the NRHM's guidelines. The van lacks IVs, lab equipment and paediatric equipment. Due to the lack of lab testing equipment, blood samples have to be collected and brought to the hospital for testing. According to the GNM of the unit, Ms. Jayshree,
"*Even basic equipment like BP & Stethoscope are not provided by the NRHM and the same has to be borrowed from Dayanand hospital. Medicines and materials for dressing is also not sufficient within the van, and we have to borrow the same from Jawhar Cottage Hospital, whose campus is utilized for parking of the van in the night*" (26th November,2011, Talassari, Thane).

All these create hindrance in the effective delivery of health services. The remote location of villages was also reported to be a major problem in the implementation of the programme by many stakeholders of the programme. According to Sister Pakuli,
"*Since the villages are located very far away, it is difficult to cover all of them in a month. Many times, even though we plan to cover three villages in a day, we are able to do only two. Hence, out of the 54 villages assigned to us to be covered in a month, four to five are left out*" (24th November 2011, Talassari, Thane).

It is also because of the distance and the long hours of travel that staff members of the van gets frustrated and want to quit their jobs. The large number of villages to be covered within a month and their remote

location does create a lot of pressure on the trust (Sister Monica, Principal, Nursing School, 24th November, 2011). One of the sisters of the trust, Sister Naina Pawar reported that,

"We don't want to continue running the programme, as the villages are located very far from each other" (17th November 2011, Talassari, Thane).

The sisters of the trust also seemed to be pressurized by paperwork and reporting that needs to be done for the programme. As reported by Sister Monica,

"Every minute thing needs to be reported, which is a big headache as we were never used to this. This also takes a lot of our time, and has increased our workload manifold" (24th November 2011, Talassari, Thane).

The sisters of the trust also reported a lack of commitment of the staff, which acts as a hindrance in the effective implementation of the scheme. As mentioned above, the main reason for the same is the difficult nature of the job, which involves daily travel to very remote locations, long working hours and low salary. This is also one of the reasons as to why the trust is facing problems in terms of getting an MBBS doctor. Sister Mary, the manager of the trust reported that they are requesting the government to consider the appointment of a male doctor in the programme, as they are more willing to take up such jobs where travelling is involved. But this may not be a viable solution to the problem, as women in the villages are most comfortable with a lady doctor, especially when it comes to gynaecological problems. A possible solution may be the appointment of two-three doctors, who may be sent with the van on a rotation basis, and for the rest of the days, they may be free to do their own private practice. When the problem and this solution was suggested to Mr. Jadhav, State Level Coordinator of MMU, he was not willing to listen to it and said,

"It is a lame excuse; we have lady doctors in all our other units and such problems do not exist anywhere else. There are instances of so many women travelling to very remote villages on a daily basis, that too by public transport. Here the situation is still better as they are going comfortably in a vehicle" (23rd January 2012, State Health Society, Mumbai).

The sisters of the trust however, were very unhappy by the lack of commitment of the staff, which according to them prevented the effective implementation of such a good programme on which the government is spending crores of money. As reported by Sister Mary, a senior sister and manager of the trust,

"*Even if we have sufficient funds to run the programme, but do not get motivated staff for the same, we would not run the programme"* (17th November 2011, Talassari, Thane).

The cost of implementing the programme is very high, as operating the vehicle to remote places on a daily basis is very expensive; hence, some staff of the van expressed that funding for the programme is insufficient and should be increased. Some staff also expressed that until now, the expenditure on the programme exceeded the allocated budget for the same, as a lot of money is being spent in buying medicines and diesel to run the vehicle on a daily basis, hence they are not sure as to whether they would be able to run the programme in the allocated annual budget of Rs.17 lakhs (Sister Mary, Manager, 17th Nov, 2011 and Sister Monica, Principal Nursing School, 24th Nov, 2011).

The trust feels constrained due to their lack of decision making power and 'say' in the planning process. The programme is entirely run by NRHM rules, and the trust does not have any 'participation' in terms of running the programme or planning activities for the same. This leads to a lack of sense of ownership towards the programme, and instead they consider it a burden. This also prevents them from giving their best to the programme. The short term nature of the contract also prevents them from making focused long term plans for the programme.

The lack of cooperation from the government staff in terms of running the programme was also considered as another impediment in its implementation at the field level. According to the GNM of the van, Ms. Jayshree,
"*The van's staff are not getting any support from the ANM, ASHA and AWW for awareness generation, hence not many ANC/PNC and immunization cases are coming to the van"* (26th November 2011, Talassari, Thane).

Ms. Jayshree also reported that many times, they just cannot locate the ANM, ASHA and AWW in the village. The difficult terrain and the poor quality of roads also make it difficult for the van to reach these villages. According to Mr. Washim Sheikh, the Driver of the van,
"The running of vehicles to the chosen villages is very difficult as the terrain is hilly, and there are no proper roads. Travel becomes all the more difficult in rainy season" (26th November 2011, Talassari, Thane).

One of the biggest disadvantage or weakness of the programmes, reflected by the FGDs of the villagers, includes lack of awareness amongst people regarding the day of the van's visit. To this, one of the respondents reported that,
"*Even though most people in the village know about the van, people in the interior part of the village do not know about the van at all. Also, none of us know the days on which the van would come to our village, and this prevents us from planning beforehand."*

According to Mr. Arun the Programme Officer of MMU, State Health Society,

"*In order to tackle this problem, the schedule of the van's visit to each village would be displayed in the office of the Sarpanch of that village"* (26th January 2011, State Health Society, Mumbai).

The facts that the van cannot provide services to the severely ill and that surgeries cannot be performed within the van were also reported as big disadvantages by most villagers. They also shared that they cannot depend upon the van in emergency situations. Some other disadvantages mentioned by the respondents are: all facilities and equipment are not available within the van, especially those relating to delivery, the van just comes once a month, which is inadequate and it should visit more frequently and lastly, the lack of prior information about the van's visiting schedule. Some respondents also feel that the van should have more staff. However, there were a few respondents who felt that the there are no disadvantages of running the van.

6.5. CONCLUSION AND SUGGESTIONS

Mobile Medical Unit is one of the most expensive as well as innovative schemes of NRHM, which if implemented properly, can greatly help in improving accessibility of health services in the most remote areas of the country. MMU at Thane district is no doubt working towards reaching out to the most underprivileged, disadvantaged and impoverished tribal communities in Jawhar and Mokhada blocks, situated far off from any functional health unit. In just a few months of operation, it has been able to reach out to a wide segment of population and touch their lives. The van is largely being appreciated for providing free medicines to people at their doorsteps, which saves them the hassle of travelling to far off health centres, in addition to saving their travelling time and money. However, there are a few issues related to the implementation of the van, which if taken care of would make the programme more successful. The section below collates suggestions made by providers as well as beneficiaries of the programme for its improvement. Some suggestions are also made by the researcher on the basis of her observations and analysis of the programme.

It is very tough for the same staff to travel to remote and interior places on a daily basis, hence, two sets of staff should be appointed for the programme, to travel with the van on an alternate basis. This is important to overcome the most critical problem in the implementation of the programme, which is lack of motivated staff, without which, the whole programme would fall apart. According to some staff of the trust, the salary of the van staff needs to be enhanced to sustain their interest in the programme, which involves very challenging work.It is surprising that even though the Sisters are advocating for a salary hike for the van staff, they are not asking for any kind of incentive for themselves. The sisters of the trust do not get any incentive for undertaking the additional task of running and managing the programme, except satisfaction of helping the needy. This shows that the notion of *Selfless Service* to the people still exists.

The NGO should not just act as an implementing body, but should also be involved in planning of activities; only then they would develop a sense of ownership towards the programme, thereby significantly improving their performance.

The number of villages chosen for running the vehicle should be reduced, as most of the trust and van staff feels that the number of villages to be covered in a month is too many and this puts a lot of pressure on the trust. According to Sister Monica,
"*The target to cover three villages per day is too much. The number of villages to be covered needs to be reduced and we should prepare the time table depending upon our feasibility*" (24th November 2011, Talassari, Thane).

Another plausible solution could be running two sets of vans, so that more villages can be covered simultaneously. The driver of the van, Mr. Washim Sheikh gave a similar suggestion for the improvement of the programme, saying,
"The programme should have provisions for more vans and more doctors, so that more villages can be covered" (26th November 2011, Talassari, Thane).

The van should be adequately supplied with good quality medicines and equipment as per the provisions of the MMU guidelines on a regular basis, so that the trust does not need to worry about buying or borrowing medicines from PHCs to serve the people. Even beneficiaries of the programme questioned in Exit Interviews realized that the van is not properly equipped with good quality medicines, and suggested the same be provided for improving the van's services.

The funds for the programme also need to be enhanced, as the sisters in the trust have reported that the daily cost of operating the van and purchasing medicines makes the programme very expensive to run, as a result of which, the amount spent on the programme from August till October 2011 was far more than the budget allocated for the same. A good suggestion vis-à-vis the funding was given by Mr. Jadhav, State level coordinator of the programme, according to whom,
"Funding should be in accordance to the quality of work done and not on a flat basis. The NGOs who are performing better, their funds should be enhanced so that they can cover more villages" (23rd January 2011, State Health Society, Mumbai).

Training is one of the weakest components of the programme; hence the government should pay more attention in enhancing the quality of training imparted to the MMU staff. Also, training should be intensive and rigorous, and be delivered in a way that it enhances the motivation of the staff working for the MMU. This will help in improving the quality of the programme to a great extent.

The villagers interviewed suggested that they should be aware in advance about the dates on which the van is visiting their village, so that they can plan their activities accordingly. They can also inform friends and relatives residing in nearby villages. They also felt that the Anganwadi worker as well as ASHA should inform them about the same. The *Sarpanch* of the village should also be given a schedule of dates of the van's visit. The state level officials of the programme reported that the schedules of the van's visit were being shared in advance, however in reality, the involvement of the *Sarpanch*, ASHA, ANM and AWW in the programme was found to be minimal. The programme needs to concentrate on awareness creation by enhancing the involvement of ASHA, ANM, AWW and *Sarpanch* in the programme. Some work has already been started by the social worker of the programme, who accompanies the van once sometimes and talks to the villagers and key people. The involvement of ASHA, ANM and AWW can be enhanced in the programme by giving them incentives for their work.

Another measure which can be extremely useful for awareness generation is night halt of the van, which is a part of the MMU guideline, but is not being followed by the unit in concern, mainly because the staff is in a hurry to return home. Night halt would not only save time and money, but the staff of the van can effectively work towards awareness generation. According to Mr. Jadhav, the state level coordinator of MMU,

"Very few units are practicing night halt, which is a must for awareness generation, and also to save time and money" (23rd January, 2011, State Health Society, Mumbai).

The outreach of the programme can be further enhanced if people from nearby villages also come for check-up in the van. For this, a large amount of mobilization work needs to be done by the ASHA and AWW before the van's scheduled visit. People's participation is also very critical in this regard. According to Sister Mary,

"People's participation is very important in this programme, since it is for their benefit.. Hence, they should cooperate by coming from nearby villages to the van" (17th November 2011, State Health Society, Mumbai).

The villagers came up with a lot of suggestions vis-à-vis the van's visit which should happen on a pre-decided fixed day and the same should be displayed on a notice board at a prominent place in the village, where it is available to everyone. While some people were happy with the monthly visit of the van, some felt that it should come once in 10-12 days, some others also felt that it should come every day. Exit Interviews with the OPD patients also revealed similar demands. Most of them felt that the van should make more visits, at least twice in a month. Some felt that the van should come more frequently in the rainy season, as transport is a big problem in the rains.

The villagers also had suggestions vis-à-vis the time of the van's visit. Some felt that it should come in the morning, while others felt that it should come at a time when everyone is free. Overall, the villagers were very happy with the van's services and wanted it to come regularly and more frequently. One respondent also suggested that the van should continue visiting the village, or else a sub-centre should be constructed in the village. This shows that the villagers themselves feel that if the primary level care was strengthened, they would not need the services of the van. Hence, the need of MMU arises in our country only because primary health care is inadequate and does not reach the most remote pockets. This argument is further strengthened through Kerala's example, where the state government did not feel the need of setting up Mobile Medical Units due to the presence of a robust primary health care system in the state.

Some other suggestions to improve the programme as per the villagers or beneficiaries of the programme included, provision of all kinds of services within the van like IV, lab tests and other emergency services, provision of good quality medicines, door-to-door visit for check-ups and awareness generation, increase in the number of staff in the van, etc.

Suggestions or visions to enhance the quality of the programme, as mentioned by Mr. Jadhav, the State Level Coordinator of the programme are mentioned in Box 6.8.

Box 6.8: Visions for the Mobile Medical Unit as per Mr. Jadhav, IAS, State Level Coordinator of MMU

- *Slowly, the NGO should completely take over the programme and the government's role should just be limited to funding. Right now, the government is funding and managing the scheme in terms of providing guidelines and monitoring. NGOs should be able to manage the scheme independently. There should be a healthy competition between NGOs of various districts to give the best MMU.*
- *Through telemedicine or video conferencing, some surgeries should be done in the van. Instead of van, small and highly sophisticated centers should be created within the village itself.*

Hence, in order to improve the quality of the programme, the above mentioned suggestions need to be considered by the programme providers across all levels. Since the programme is still at a very nascent stage, the researcher is sure that it would pick up in a couple of months' time, which is needed to sort out the few teething troubles of medicines, equipment and staff.

CHAPTER VII

The Service NGO (SNGO) Scheme

Involvement of Non-Governmental Organizations (NGOs) in delivering RCH services has been promoted in the Indian Health planning since the first five year plan. The third plan put a lot more emphasis on private sector collaboration in the family planning programme than the previous two plans. This was mainly to stabilize the nation's population, which at that point of time was perceived as the greatest threat to its development (Maurya, 2012).

The involvement of NGOs in the delivery of RCH services was further strengthened in the International Conference on Population and Development (ICPD) held in Cairo in 1994, to which India was also a signatory. A complete chapter of the ICPD document which was published by the United Nations post conference, talks about the significance of partnership with the non-governmental sector in RCH services. As mentioned in this document,

"*To address the challenges of population and development effectively, broad and effective partnership is essential between governments and non-governmental organizations (comprising not-for-profit groups and organizations at the local, national and international levels) to assist in the formulation, implementation, monitoring and evaluation of population and development objectives and activities*" (United Nations, 1994, p. 106).

The document promoted the involvement of NGOs in the population and development programmes due to the following reasons:

- NGOs have a comparative advantage over government agencies in terms of having more innovative, flexible and responsive programmes involving grass root participation, and outreach in areas which are poorly served and hard to reach through government channels.
- They are important voices of the people for addressing the pressing population, environmental, migration, economic and social developmental concerns.
- They have been involved actively in the provision of programme and project services in virtually every area of socio-economic development, which includes even family planning.
- They have the experience and capability of playing a significant role in terms of awareness generation on issues related to reproductive health (United Nations, 1994).

According to the ICPD document,

"*The involvement of non-governmental organizations should be seen as complementary to the responsibility of governments to provide full, safe and accessible reproductive health services, including family-planning and sexual health services*" (United Nations, 1994, p.107).

The document also talks about the role of the NGO in the provision of RCH services, which is mainly in terms of awareness generation, research, design, implementation, monitoring and evaluation of population and development activities. This has also been mentioned by Baru & Nundy (2006), according to whom, "*The ICPD document defines the NGOs role for addressing the needs of marginalized sections; creating awareness, monitoring and advocacy*" (p. 7).

Involvement of NGOs to achieve the RCH goals was further reinforced in the National Population Policy (NPP) of 2000. To achieve its goals of population stabilization, the NPP aims at increasing the access and coverage of a comprehensive package of reproductive and child health services through collaboration with the corporate sector, voluntary and non-government sectors. Elaborating upon the need of involving NGOs in the RCH programme, the NPP document mentions that,
"A national effort to reach out to households cannot be sustained by government alone. We need to put in place a partnership of non-government voluntary organizations, the private corporate sector, government and the community" (GOI, 2000, p. 9).

Even though the policy acknowledges the presence of a huge pool of private sector in the provision of health services, it also mentions the need for regulating the same by means like accreditation and partnership, mostly in the form of contracting. It also emphasizes upon the need of having a clear cut division of labour between the public and private health providers in partnership programmes. Further explaining this, the NPP document mentions that,
"Where government interventions or capacities are insufficient, and the participation of the private sector unviable, focused service delivery by NGOs may effectively complement government efforts" (GOI, 2000, p.9).

Hence partnership with the NGOs is listed as an important strategic theme of NPP, on account of its flexible procedures, rapport and credibility with local communities. The work of the NGO is essentially supplementary and complementary in nature to that of the government (GOI, 2003).

The National Rural Health Mission, 2005 took the involvement of NGOs in RCH a step forward. The role of NGOs was not limited to health education and awareness, but also included service delivery. The section on the role of NGOs in the mission document of NRHM clearly states that,
"*The NGOs would be involved in the Service delivery for identified population groups on select themes, of which RCH is one of the themes*" (NRHM, 2005).

A major thrust of the RCH programme during the Ninth five year plan (1997-2002), was to increase the involvement of NGOs through participation in innovative projects ('TOR for Mother NGOs,' 2012). The

involvement of NGOs in RCH delivery was inspired by countries like Bangladesh and Indonesia, which had experimented by involving NGOs in expanding the provision of Reproductive and Child Health Services. Based on the model that was being used in Bangladesh and Indonesia, the Indian government launched the *Indian Local Initiatives Programme* to implement the Reproductive and Child Health Programme. Under this programme, from 1999–2003, three Indian non-governmental organizations (NGOs) provided services for 784,000 people in four northern states. By using the three strategies of demand creation, increased access to services and local capacity building, the NGOs increased contraceptive-use rates by 78% on average, child immunizations by 67%, and ante-natal care by 78% among the populations served (Paxman et al., 2005). Hence, this programme proved that the involvement of NGOs could be extremely beneficial in terms of increasing the coverage of RCH services. This served as a basis for starting up the Mother NGO Scheme for delivering RCH services.

The Mother NGO Scheme was launched in 1997 under RCH-I to implement this strategy of involving NGOs in RCH through participation in an innovative project. The scheme was funded by the World Bank. The Service NGO scheme has been launched recently, in 2005, under RCH-II. Both these schemes together, known as the NGO scheme, have now been included in the State PIP for NRHM under RCH-II. Under RCH-II, the ownership of the programme has been decentralized to the State Government. The planning process now starts from the district level (NRHM report [n.d], 2012). The focus is on delivery of RCH services in unserved and underserved areas.[15]The guidelines for the scheme have also been revised under RCH-II.

7.1. THE MOTHER NGO (MNGO) AND FIELD NGO (FNGO) SCHEME

Under the MNGO scheme, the Department of Family Welfare identified and sanctioned grants to selected NGOs, called Mother NGOs, in allocated districts. These MNGOs, in turn, issued grants to smaller NGOs, called Field NGOs (FNGOs). The grants were to be used for promoting the goals/objectives as outlined in the Reproductive and Child Health (RCH) Programme of GOI. The role of the MNGO is to build the capacity of smaller NGOs (FNGOs) so that they can implement RCH projects efficiently. This is mainly in recognition of the fact that smaller grass root level NGOs have limited technical and managerial capacity, hence they need mentoring and support from larger NGOs, MNGOs in this case. MNGOs not only disburse funds to the FNGOs received from the State RCH Society, which is in turn is received from

[15]Unserved and underserved areas are those socio-economic backward areas, which do not have access to health care services from the existing government health infrastructure, especially urban slums, tribal, hilly and desert areas, including SC/ST habitations. In specific terms these areas are: where the post of MO, ANM & LHV have been vacant for more than 1 year, the PHC is not equipped with minimal infrastructure; performance on critical RCH indicators is poor.

the Government of India, but also manage, coordinate and monitor the implementation of RCH projects of FNGO. The MNGO on their own however do not implement projects except undertaking demonstration projects.

A decentralized approach is adopted in the management and implementation of the MNGO Scheme, wherein the state government and the district government implements the entire scheme, instead of the central government. The State RCH Society, as well as the District RCH Society takes full responsibility for implementing the MNGO scheme, starting from identification of NGOs to recommending NGO proposals for GOI approval. The detailed institutional framework for programme management and capacity building of the scheme is described in Box 7.1 and 7.2. The MNGOs are members of the District RCH Society through the signing of a formal Memorandum of Understanding. The project duration of three years is extendable to five years, which facilitates long term planning and implementation (GOI, 2003).

In Box 7.1., one can observe that several government agencies are involved in the implementation of the scheme at District, State and Central level. This creates a hierarchical structure and gives authority to several bodies in the selection of the NGOs. On the flip side, this would also breed corruption and pressure from various sources for the purpose of the NGO selection. NGOs were often reported to use their political clout for putting pressure on the above mentioned bodies for selection (Dr. Goda, Director, SNGO). Also, the role of one agency might clash with that of the other. Similarly, as seen in Box 7.2., several players are involved in capacity building although the same can be managed by a single agency. Hence, the researcher seriously feels that the number of players should be reduced, both at the level of the NGO selection as well as for capacity building of NGOs. This would not only save resources, but would also avoid confusion and the hierarchical structure that arises due to multiple players. This should be kept in consideration whenever the guidelines of the NGO scheme are revised in the future.

Box 7.1. : Institutional Framework for Programme Management of MNGO/SNGO Scheme

Role of **Government of India** is related to provision of policy guidelines, final approval of proposals, and technical support for capacity building of NGOs and fund release to the State RCH Society.

The NGO selection Committee is constituted at the State Level for the purpose of NGO selection, and is chaired by the Joint Secretary, Department of Family Welfare, GOI. The selection of MNGO is based on desk review reports and field appraisals of the eligible NGOs conducted by the RRCs. After selection of the MNGO/SNGO, the NGO selection committee will place the recommendation to the **GIAC** (**Grants-in- Aid Committee)** for approval.

The **Regional Director** receives all applications from MNGO/SNGO applicants and conducts pre-scrutiny review of these based on the checklist, provides the collated information on the NGO applications to the State RCH Society, and convenes the meeting of the State NGO Committee.

The programme management under the revised scheme is decentralized to the State and District Authorities. The State government forms **State RCH society**, which has the responsibility for the overall management of the scheme. The **State NGO committee** will be responsible for MNGO selection, recommendation of projects for GOI approval, fund disbursement, capacity building, monitoring and evaluation. The **District RCH society** is responsible for all the operational aspects of the programme management at the district level. The **District NGO committee** holds the responsibility for recommendation of MNGO composite proposals to State RCH Society, facilitating the signing of MOU with the MNGO and passes it on for fund release to the State RCH Society; in addition to undertaking review meetings and periodic monitoring in the field for assessing FNGO/MNGO performance.

The State NGO Coordinators (SNGOCs) are responsible for monitoring the programme implementation, facilitating timely submission of NGO reports to the state government, providing government feedback to NGOs, communicating government policies and programmes, and facilitating NGO dialogue with the district health system. Presently, SNGOCs are in position in the states of Haryana, Himachal Pradesh, Punjab, Uttar Pradesh, Gujarat, Uttaranchal, Karnataka, Tamil Nadu, Orissa and West Bengal. Other states have been asked to advertise for SNGOCs.

Source: GOI, 2003

Box 7.2 : Institutional Framework for NGO Capacity Building of the MNGO/SNGO Scheme

The Apex Resource Cell (ARC), Regional Resource Centers (RRC) and the Best Practice Centers (BPC), three institutional mechanisms are available to support this programme. The RRC pool has expanded from four to ten in 2004-05. NGOs with expertise and experience in RCH, and having national level stature are identified as RRCs. The process of identification of BPCs was completed by March 2006.

ARC is responsible for provision of technical input to NGO Division on all policy matters related to the implementation of the scheme, facilitation of overall coordination among the RRCs, and liaising with State Governments for facilitating RRC-state government interface.

The **RRCs** are playing the role of a catalyst, advocacy and networking with state governments, strengthen managerial and technical competencies of the MNGOs & SNGOs, support and oversee FNGO training, document and disseminate best practices, collect and disseminate RCH policies, laws, and programme from the respective states where they work, and maintain database on technical and human resources related to RCH.

Source: GOI, 2003

The scheme, which started operations in 2002, was modified after three years of implementation and revised guidelines of the same was prepared by the Ministry of Health and Family Welfare under NRHM in 2005. According to the PIP of RCH-II,

"The lessons learnt over the past three years have indicated that modifications need to be made in the scheme. These are in terms of decentralization, simplification of fund disbursal process, rationalization of jurisdiction, and interface with local government bodies. Additionally, it was found that involving the NGOs in service delivery and addressing gender issues cross cutting the RCH service areas would be required for Strengthening Systems and Partnerships in order to make the programme more effective" (GOI, 2005).

As per the revised guidelines of the NGO scheme, rationalization of jurisdiction is done with a view to enable NGOs to provide in-depth service in the project areas and to optimize resources (GOI, 2003). Earlier, one MNGO could function in five to eight districts, now they have been reduced to only one or two. Each MNGO can work with only three to four Field NGOs (FNGOs) from each district, and FNGOs should cover a population serving one or two sub-centres.

According to the draft report on the recommendation of Task Force on Public-Private Partnership for the 11th Plan, there are 102 MNGOs in 439 districts, 800 FNGOs, four Regional Resource Centres (RRCs) and one Apex Resource Cell (ARC) (GOI, 2006)**.** The number of MNGOs increased to215, working in 324 districts of the country in the year 2006 (Bhat et al, 2007). MNGO selection process has been completed in the states of West Bengal, and Orissa (GOI, 2006). Orissa is the only state where the MNGO scheme is fully operational. This results in effective decentralization, flexibility in decision-making, timely release of funds and adequate accountability systems. MNGOs in the country are likely to increase steadily to cover the entire country. MNGOs exist in most districts of Assam, Chhattisgarh, Delhi, Gujarat, Himachal Pradesh, Kerala, Maharashtra, and Uttaranchal. Similarly, RRCs have also increased from four to ten. The list of functional RRCs is mentioned in Box 7.3.

Box7.3: Functional RRCs in India

1. Child in Need Institute, Kolkata.
2. Family Planning Association of India, Mumbai
3. Gandhigram Institute of Rural Health and Family Welfare Trust, Dindigul, Tamil Nadu.
4. Voluntary Health Association of India, New Delhi.
5. Centre for Health, Education, Training and Nutrition Awareness, under Nehru Foundation for Development, Ahmedabad.
6. Mamta Health Institute for Mother & Child, New Delhi.
7. Population Foundation of India, New Delhi.
8. State Innovations in Family Planning Services Project Agency, Lucknow.
9. Assam Voluntary Health Association, Guwahati.
10. Hindustan Latex Family Planning Promotion Trust, Thiruvananthapuram.

Source: National Rural Health Mission (NRHM) Report. (n.d.)

FNGOs implement small projects in specific aspects of RCH service delivery supported by MNGOs. They implement projects covering a population of two sub-centres (10-15,000 population). In a district, there are four FNGOs supported by one MNGO. FNGOs are supported by MNGO for meeting their skill requirements, either directly or through linkages with district hospitals, private service providers, etc. They undertake RCH projects on specific aspects or issues like MCH, Family Planning, RTI/STI and Adolescent Reproductive Health supported by MNGOs. Besides this, they are also involved in advocacy and awareness generation. The selection of FNGOs is done by the MNGOs.

7.2. SERVICE (SNGO) SCHEME

NGOs with an established institutional base and delivery infrastructure are encouraged to complement the public health system in achieving the goals of the RCH programme. Any NGO, that is engaged in directly providing integrated services in an area co-terminus to that of a CHC/block PHC with 1,00,000 population (approximately 100 villages or more) is called a Service NGO.

Besides providing services offered by the FNGOs, the SNGO is also involved in providing a range of clinical services directly to the community. These include Maternal and Child Health services aimed at reducing IMR and MMR, management of diarrhoea, Family Planning services, Adolescent Reproductive Health, Prevention and Management of RTI, MTP Services, abortion and IUD Services and Safe Deliveries. The non-clinical services offered by FNGOs include Health Data Management, Dai Training, Violence against Women, Male Involvement and building credible referral linkages and network for providing outreach services.

SNGOs must have appropriate infrastructure (clinic, equipment, and ambulance), adequately skilled staff and appropriate network for referral services. They must establish a Satellite Centre in the underserved areas, provide services through mobile clinics and refer complicated cases to government facilities/ other private hospitals/NGO Hospital etc. SNGOs that require support for improving infrastructure related to the proposed services could be assisted based on appraisal (GOI, 2003).

The institutions supporting the SNGO scheme are same as that of the MNGO scheme; details of the same can be seen in Fig. 7.1.

In spite of differences in size, area of operation and types of services, the MNGOs, FNGOs and SNGOs share similarity of being operational in unserved and underserved areas. Besides, all three aim at addressing the unmet needs of RCH and support the government machinery for the same. They work by developing linkages with local governments, related government departments, and by establishing networks with technical and resource institutions. They also work towards addressing gender issues and enhance male involvement in improving the reproductive health status of women, adolescents and children. The MNGOs, FNGOs and SNGOs initiate their work by doing a baseline survey and then develop a proposal, the training for which is provided by the RRCs.

7.3. NGO SCHEME IN MAHARASHTRA

When the scheme was launched in 1997, four MNGOs were selected in Maharashtra. Later, a lot more were added, so much so that the number of MNGOs increased to 34 in 2006. This increase in the number of MNGOs happened post NRHM, due to the increased budgetary allocation for the programme under

NRHM (Table 7.1 shows the list of MNGOs and their FNGOs as on August 2006). As seen in this Table, MNGOs were started in almost all districts of the state, with the FNGOs providing RCH services to the most unserved and underserved areas of the district. Till June 2010, 27 of 34 MNGOs had completed their tenures and three more have recently finished (Govt. of Maharashtra, 2012). At present, there are only two functional MNGOs.

The state government plans to select a MNGO for Parbhani district, but the tenures of the previous MNGOs which have closed are not going to be renewed and instead, Service NGOs are being started in most districts by the State Government. At present, there are six functional service NGOs in six districts of the state namely Ahmednagar, Latur, Thane, Akola, Wardha and Pune. New SNGOs have been selected by the Government of Maharashtra for Sangli, Kolhapur, Ratnagiri, Pune, Osmanabad, Aurangabad, Gadchiroli and Jalgaon. They have submitted their proposal to the State Family Welfare Society, Pune (Mr. Subhash Khake, Training Coordinator, Regional Resource Centre, Family Planning Association of India, Mumbai, 23rd January, 2012). By the end of 2012, two more districts will have SNGOs, bringing the state's total to 14 functional SNGOs. The list of functional SNGOs and MNGOs in the state can be seen in Table 7.2. An analysis on the work of these NGOs reveals that all are currently working as SNGOs or MNGOs and are renowned NGOs with a reputation of working in the field of health. This is the reason for their qualification in spite of the stringent criterion, set by the government for selection, as described in Box 7.1.

7.4. NGO SCHEME IN THANE DISTRICT, MAHARASHTRA

Just like other districts, the involvement of NGOs in the RCH programme started with the establishment of MNGO in the district. *Vanvasi Kalyan Kendra*, an NGO located at Dahanu, was selected[16] as an MNGO by the State Family Welfare Society, Pune in collaboration with the District RCH Society, Thane in the year 2007. As seen in Table 7.1., this NGO monitored the projects of three smaller FNGOs namely *Pragati Pratishthan* in Jawhar, *Parivartan Mahila Sanstha*, Dombivali and *Manibhai Desai GrameenAdivasi Mahila Sangh*, Jawhar. All of these worked in the area of RCH focusing on maternal health, infant health, family planning, counselling and guidance for teenage girls ('*Vanvasi Kalyan Kendra*,' 2012). The NGOs tenure of three years for MNGO expired in 2010, post which the MNGO scheme stopped its operations in Thane district. As per the guidelines, the tenure could have been

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[16] Although there is no doubt that NGO selection happens through the process mentioned in the guidelines of the MOHFW, NGOs try to influence the selection process by using their clout and contacts with various local and state level officials responsible for their selection. They do this mainly for the sake of money involved in the programme and their association with the government.

increased by two more years, but it was not extended because of performance issues (Ms. Reeta Gaikwad, DPM, Thane district).

7.5. SNGO Scheme in Thane District

In Thane district, Dr. ML Dhawale trust is selected as a Service NGO by the Ministry of Health and Family Welfare, GOI. Details of MLDT can be seen in Box 7.5. This section describes the SNGO scheme being implemented by the trust. It not only describes the scheme and its activities in detail, but also looks at its nuances like evolution of the partnership, financial viability of the scheme and measures followed to maintain the quality, equity and replicability of the scheme. Information on these aspects of the programme has been captured by interviewing the providers of the programme and analysing the views of a range of beneficiaries residing in the villages. An attempt was also made to capture the experiences of these beneficiaries vis-à-vis each and every aspect of the SNGOs work. This has been done to assess the outcome of the scheme. Methodology used for the study of the scheme in Thane district has been described in Box 7.4.

Box 7.4: Methodology followed for the case study of SNGO scheme, Thane

Information presented in this chapter on the above mentioned aspects have been collected by interviewing all important stakeholders associated with the scheme, which include the staff of the SNGO comprising of the Director, Coordinator, and Medical Officer of the SNGO, ANM, MPWs, CHVs along with the doctors and sisters working in the Mobile Van of the SNGO. Since the SNGO functions in close coordination with the government health institutions in the area, hence the Taluka Medical Officer of the Vikramgad, Medical Officer of the Primary health center at Krunze, ANM of the sub-center at Bhopoli as well as the ASHA workers at the villages were also interviewed to collect their views on the SNGOs work. Interviews were also conducted with the officials at the State Health Society and the Regional Resource Centre, Pune.

MLDT has identified 94 villages in Vikramgad block as unserved and underserved, which has been duly approved by the DHO. These villages, falling under the jurisdiction of Krunze, Talwada, Malwada PHCs and Vikramgad CHC/RH has a population of 133168 (MLDT, 2008).

Box 7.5: About ML Dhawale Trust

Dr. M. L. Dhawale Memorial Trust, was established in **1987**, after the untimely demise of Dr. M. L. Dhawale, an M. D. who had turned Homoeopath. The Trust was established by his students and patients to fulfill his vision of service to humanity through the spread of Scientific and Standardized Homoeopathy. Over the years, the trust has been known not only for its excellent clinical services but also for its community service and knowledge dissemination in Homeopathy through teaching, research and other academic activities.

The trust runs a total of five hospitals at Palgarh, Bhopoli, Mumbai (2), and Karjan (dist. Vadodara) with total bed strength of 110, 15 urban clinics and 15 mobile tribal clinics. The first clinic was started at Palgarh in 1989. The clinic at Bhopoli came up at 2003. While the clinic at Palgarh specializes in clinical services, that in Bhopoli focuses on Community Services. Realizing the holistic nature of health, the center at Bhopoli not only works on health but also on education and livelihoods. MCH, Ayush, SNGO, Organic farming, Education, Warli Arts and self-help groups are some of the prime projects being run by the centre.

MLDT has been sanctioned seats for M.D. (Hom.) in six subjects. It takes 36 students per term so as to prepare them for their M.D. (Hom), apart from running its own Post-Graduate regular training courses. It conducts national and international continuing medical education programmes, symposia and runs orientation programmes for lay persons. It also runs six research programmes through its various hospitals.

Table 7.1: List of MNGOs/FNGOs in Maharashtra, as in 2006

S. No.	Name of MNGO	District Served	Name of SNGO
1.	Centre for Study of Social Change,	Mumbai Sub urban II	Not selected (unserved and underserved area is not given by Mumbai Municipal corporation.)
2.	Vanvasi Kalyan Kendra	Thane	1. Pragati Pratishthan, Jawhar 2. Parivartan Mahila Sanstha, Dombivali, 3. Manibhai Desai Grameen Adivasi Mahila Sangh, Jawhar.
3.	SOSVA Training and Promotion Institute (STAPI)	Raigad	1. Kalawati Adarsha Mahila Vikas Kendra, Karvenagar, Pune. 2. Mamta Grameen Vikas Rojgar Prashikshan Sanstha, Tal. Mangaon, Dist. Raigad. 3.Gram Vikas Arogya Seva Bhavi Sanstha, Karjat, Raigad
4.	SOSVA Training and Promotion Institute (STAPI)	Pune	1. Shiv Parvati Vikas Sanstha, Tal. Karjat, Dist. Ahmednagar. 2.Morya Samajik Prathishthan, Pune 3. Samaj Vikas Sanstha, Tal. Bhor, Dist. Pune 4. Janseva Foundation, Pune.
5.	Matru Mandir	Ratnagiri	1. Smt. Jankibai (Akka) Tendulkar Mahilashram, Lanja. 2.Kashtkari Mahila Sabha, Devrukh, Tal: Sangmeshwar 3. Women & Children Development Centre, Ratnagiri
6.	Foundation for Health Educational & Cultural Activities	Sindhudurg	MNGO Newly Selected -Aug 2006
7.	Sevadham Trust	Solapur	1.Kai. Rakhmabai Gaikwad Memo. Charitable Trust, Kadlas, Tal. Sangola. 2. Umed Trust, Tembhurni, Tal. Madha. 3.Solapur Jilha Samajik Karya Samiti, Solapur

			4.Snehalaya Prakalpa, Karamba, North Solapur 5.Indira Medical Charitable Trust, Mangalwedha, Solapur 6. Amarbhim Krida Mandal, Solapur.
8	Sevadham Trust	Kolhapur	1. National Rural Development society, Kolhapur. 2. Yuva Grameen Vikas Sanstha, Gargoti, Kolhapur. 3. Vasantdada Patil Health Foundation, Ajara, Kolhapur.
9.	Shramjivi Janata Sahayak Mandal	Satara	1.Kulkarni Charitable Trust & Sanshodhan Kendra, Karad, 2. Shramik Janata Vikas Sanstha, Tal: Tolamola, Javali, 3.Gram Parivartan Pratishan, Kargun, Khatao
10.	Yerala Project Society	Sangli	1. Save Foundation, Sangli 2. Prakash Shikshan Sanstha, Tasgaion 3. Mahanand Vikas Pratishtan, Kundal, Tal. Pulus
11.	Pravara Medical Trust	Aurangabad	1. Marathwada Grameen Vikas Sanstha, Karanagaon, Tal. Vaijapur, Dist. Aurangabad 2. Pooja Mahila Bahuudesiya Sanstha, Saliwada, Paithan, Dist. Aurangabad. 3. Sahitya Sanskar Prabodhini, Aurangabad.
12.	Pravara Medical Trust	Ahmednagar	1. National Institute of Sustainable Development, Snagamnagar. 2. Shri Amruta Eduacation Health & Social Institute, Sangamnagar. 3.Kopargaon Taluka Vidyarthi Sahyak Samiti, Kopargaon 4. Ratnadeep Medical Foundation & Research Centre, Ratnapur, Jamkhed. 5. Sanjiwani Medical Training Centre, A/p Mehekari, Tal. Nagar.
13.	Godavari Foundation	Jalgaon	1.Shri Ramdevji baba Gramin Shikshan Prasarak Mandal, Raver 2.Dilasa Bahuuddeshiya Sanstha, Jalgaon

			3.Suyog Mitra Mandal, Jalgaon 4. Bahuuddeshiya Jankalyan Prabodhini, Jalgaon.
14.	Godavari Foundation	Nasik	1. Mahatma Phule Arogyadayi Seva Sanstha, Trambak, Nasik. 2. Anand Welfare Centre, (SNS Foundation), Trambak, Nasik. 3. Sahara Social & Welfare Association, Dindori, Nasik. 4. Khatun Minority Women's Social Welfare &Educational Society, Malegaon, Nasik.
15.	Late Shriram Ahirrao Memorial Trust	Nandurbar	MNGO Newly Selected- Aug 2006
16.	Late Shriram Ahirrao Memorial Trust	Dhule	1.Shri Deopur Vidhyak Samiti, Dhule 2.Shri Chhatrapati Shivaji Vidya Prasarak Sanstha, Dhule 3.Suyog Bahuuddeshiya Shaikshanik & Samajik Sevabhavi Sanstha, Gondur.
17.	Karmavir Pratishthan	Jalna	1.Samarth Ramdas Swami Public Health education & Agri. Development Sanstha, Jalna 2.Mahtma Fhule Samajik Karya Sevabhavi Sanstha, Jalna 3.Sidharth Shaishanik Sanskrutik Mandal, Jalna
18.	Manavlok (Marathawada Navnirman Lokayat)	Beed	1. Manavseva Mandal, Parali. Ambajogai, Ujani, Dist. Beed. 2. Bhumika Vishwast Sanstha, Yelda. Parali, Moha, Dist. Beed 3. Saraswati Sevabhavi Sanstha, Bhatadgaon, Gevrai, Chaklamba, Dist. Beed.
19.	Hallo Medical Foundation	Osmanabad	1. Lokprabhodhan Vividh Kala Gundarshan Kalamanch, Arali Tal. Tuljapur dist. Osmanabad Ganaji Dhotarkar 2.Navjeevan Prerana Kendra, Dalimb Tal. Umarga, Dist. Osmanabad A.S.

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20.	Shree Ganesh Shikshan Prasarak Mandal	Latur	1.Manav Seva Mandal, Rajiv Gandhi Memorial Hospital, Shirur Taiband, Tal: Ahemadpur, Dist: Latur 2. Institute of Indoplant Medical and Hygiene Research Centre, Latur - Khore Galli, 3.Late Abdul Kadri Memorial Medical &Research Centre, Udgir
21.	Lokdeep Manav Vikas Sanstha, Parbhani.	Parbhani	MNGO Newly Selected - Aug 2006
22.	MGM Medical College and Hospital	Nanded	1.Kalavaibhav Shikshan Prasarak Mandal, Tal: Deglur, Dist: Naded, 2.Gauri Ganapati Sevabhavi Sanstha, HUDCO, New Nanded, Dist: Nanded, 3.Godavaribai Bajaj, Purna Road, Nanded,
23.	Ujwal Shikshan Prasarak Mandal	Hingoli	1.Nagnath Grameen Vikas Mahila Madal, Hingoli, Sarswati Nagar, Tal: Hingoli 2. Jagruti Mahila Mandal, Tal: Vasmat, Dist: Hingoli . 3.Lokdeep Manavvikas Sanstha, Hingoli
24.	Mahila Utkarsha Pratishthan	Washim	1.Jan Shikshan Sansthan, Near Main Post Office, Washim 2.Shiv Bhavani Vyaamshala, Javtha, Tal: Risod, Washim
25.	Vidarbha Vikas Mahila Bal Kalyan Shikshan Sanstha, Akola.	Akola	MNGO Newly Selected -Aug 2006
26.	Vivekanand Ashram	Buldhana	1. Vidarbha Mahila Welfare Society, Jalgaon Jamod. 2.Jay Bajrang Yuvak Krida & Sanskrutik Mandal, Adsul, Br. Sonala, Tal. Sangrampur 3. Savitribai Phule Mahila Mandal, Deulgaon, Sakarshi.

27.	Sai Prem Grameen Vikas Sanstha, Yavatmal	Yavatmal	1. Shri Swami Samarth Seva Samitee, Girija Nagar, Dhamangoan Road, Yavatmal, 2.Priyadarshani Mahila Mandal, Puspakunj society, Yavatmal, 3. Jivanjyoti Mahila Vikas Mandal, Dhanki Road, Near Gajanan saw mill, Umarkhed.
28.	Matru Seva Sangh	Nagpur	1.Sanjeenvan Socio Medical Foundation, Pushpkunj building, Ramdas peth, Nagpur 2.National Institute of Women, Child & Youth Development , Plot no. 14, Layout no.4,Jayprakashnagar, Nagpur 3. Nar-Ratna M.S. Dekate Smarak Manav Vikas Pratishthan Samarpan, Mangalwari Peth, Umred.
29.	Bharatiya Aushadhi Anusandhan Sanstha	Bhandara	1.Shalini Bahuudeshiya Shikshan Sanstha & Krida Prasarak Mandal, At-Lakhani, Post-TaqLakhani, Dist-Bhandara, 2.Sugat Shikshan Sanstha, At Post-Kothurna, Taq-Dist- Bhandara 3. Nalanda Bahuuddeshiya Sanstha, Tumsar, Bhandara.
30.	Shri Rajiv Yuvak Vikas Sanstha	Wardha	1.Utkarsh Jankalyan Shikshan Sansth, Vardha 2. All India Apang Kalyankari Sanstha, Vardha 3. Vishal Khobragade Saurti Pratishtan, Sevagram
31.	Bharatiya Adim Jati Sevak Sangh	Chandrapur	1. Harshal Grameen Vikas Sanstha, Civil Lines, Chandrapur, 2. Shri Sadguru Sainath Bahuudeshiya Sanstha, Shivaji Nagar, Chandrapur 3. Grameen va Shahari Vikas Sanstha, Gurudwara Rog, Tukum, Chandrapur,
32.	Indian Institute of Youth Welfare, Gadchiroli	Gadchiroli	MNGO Newly Selected- Aug 2006

33.	Apeksha Homeo Society	Amaravati	1. Antyodaya Vichar Kendra, Nandgoan, Savlikheda 2. People's Rural Education Movement (PREM), Chikhaldara 3. Social Action For Integration & Awareness(Sarita), Amaravati
34.	Shri Ganesh Gramin Vikas Shikshan Sanstha	Gondiya	1. Organization Social & Rural Implementation(OSRI)Nagar Layout, Murmad (Lakhani),Post & Tal: Lakhani, Dist: Bhandara, 2. DRUSTI Bahuuddeshiya Shikshan Sanstha,

Source: National Rural Health Mission Achievements and Role of NGOs. Retrieved from http://www.aarogya.com/health-resources/health-programmes/2443-national-rural-health-mission.html, March 2012

Table 7.2: List of functional SNGOs and MNGOs in Maharashtra

S. No.	District	Name of SNGO
1.	Pune	Lokmanya Medical Research Centre
2.	Wardha	Datta Meghe Institute of Medical Sciences University
3.	Akola	Ashrya Mahila Samudaya Vikas Sanstha
4.	Latur	Bal Vikas Mahila Mandal
5.	Ahmednagar	Ratnadeep Medical Foundation & Research Centre
6.	Thane	Thane
7.	Gadchiroli	Vikas Bhavan, Mahatma Gandhi Chowk, Talao Road, Gadchiroli - 442605
8.	Nandurbar	Late Shriram Ahirrao Memorial Trust SNGO for Nandurbar District

Source: Data from Regional Resource Centre, Family Planning Association of India, Mumbai

The 94 villages of Vikramgad block were selected as the project area for SNGO jointly by the SNGO, the DHO, and the district RCH officer, by referring to the District RCH reports (2008).The following criteria were used to decide the areas as un/under served:

- PHC services are underutilized by the people due to lack of awareness, misbeliefs, superstitions, etc.
- Public transport facilities are poor; hence it is difficult for the people to reach the PHC,CHC or trust hospitals. Moreover, people lose daily wages in addition to the expense of traveling and consultation. The average distance of villages is 60 kilometres from the district civil hospital and 25 kilometres from the Institute.
- Other problems identified in Vikramgad block are:
    - a) Service related burden on health workers like poor drug supply,
    - b) Service delivery related – Heavy work load on ANM, non-functional labour room at peripheral centres and difficulty in getting financial assistance through JSY.
    - c) Poor Health Services at PHC and CHC levels due to absence of senior experienced MO at PHCs and specialist doctors like Gynaecologist, Paediatrician, Anaesthetist, etc. at the CHC.
    - d) Less number of functional sub-centres.
    - e) The burden on the Medical officer and ANM of PHC is high since the allocated area under one PHC is very large (a population of 52 thousand).

f) The PHC is not properly equipped with instruments like BP apparatus, clinical thermometer, etc. and drugs.

g) Village level - Poor drug supply/ family planning materials at village level, lack of awareness at village level, poor community participation, absence of health check-up sessions at village level (MLDT, 2008).

From the above facts, one can see that the villages under Vikramgad block rightly fit into the definition of an unserved/underserved area. Another major problem in the block is the high rate of infant and maternal mortality, similar to the average of Thane district, which are 450 per 100,000. This is due to the fact that most deliveries take place at home, the ANC coverage in the area is low (40.83%) and the percentage of girls marrying before the age of 18 years is high (63.95%).[17] The difficult terrain and lack of proper means of transport deters most women from seeking institutional support for deliveries, even if they understand the importance of the same. The lack of staff available in health institutions makes matters worse. Since the health facilities are understaffed, the burden on the existing staff is more, due to which patients are not given their due attention. Another reason as to why people do not prefer health institutions for delivery, as reported by Dr. Goda, the project director of SNGO is the unhygienic conditions at the PHC. According to him,

"The houses of people are far cleaner than the health facilities" (20th December 2011, Thane).

As reported in the project proposal of SNGO, submitted by MLDT to the District Health Society Thane, the health and socio-economic indicators of Vikramgad block is poor due to inadequate staffing at different facilities, service related burden on health workers, inadequate health services at PHC and village level, absence of senior experienced Medical Officer (MO) at PHCs, absence of specialist doctors at CHC, lack of facilities at the sub-centres and lack of awareness at the village level (MLDT, 2008).

Evolution of the scheme

The process of selection of ML Dhawale trust as an SNGO started way back in 2003-04, following an advertisement by the State RCH Society in leading newspapers, inviting NGOs in Thane district to apply for the scheme. ML Dhawale trust applied for the project by submitting all required papers including their registration details, bank statement, etc. along with a letter of interest/concept paper. The government approved their application and selected the trust through a long and tedious process, which almost took

[17] Data is as per the findings of the Baseline survey conducted by ML Dhawale Trust in the block during December 2008 and January 2009

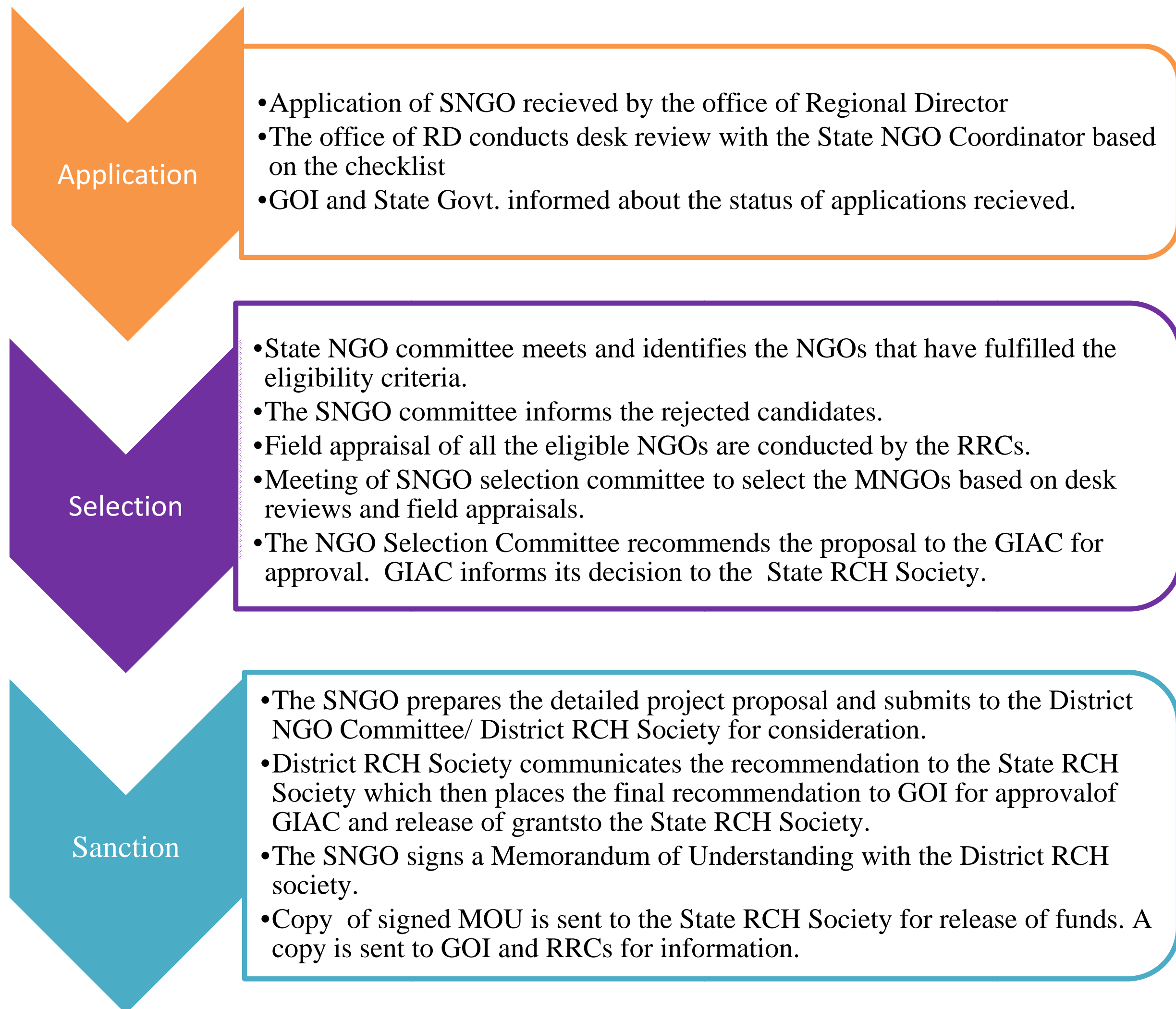
three years for completion (detailed process of SNGO selection can be seen in the flow chart described in Figure 7.2).

According to the staff and the Director of the SNGO, the trust got selected primarily due to its experience in the field of RCH, on account of running the Maternal and Child Health Project for the past 14 years. Also, the centre at Bhopoli is well equipped with staff (Doctors, MPW, CHV) and infrastructure (clinic/hospital, ambulance), as per the criteria mentioned in the revised guidelines of the scheme for the SNGO (Dr. Sayyed, Medical Officer, SNGO). According to Dr. Goda, the Director of SNGO,
"*The NGOs usually bribe the officials at the State Family Welfare Society to get the SNGO scheme. We got selected by chance just on the basis of our merit, mainly because there was a lot of pressure on the State RCH Society from the Central Government, who complained that the SNGOs are not delivering good results in spite of so much of money being pumped in to the project. Hence the Coordinator of the State RCH Society wanted to select an NGO which would do good work*" (20th December 2011, Thane).

Similar observations have also been made in previous studies done on the Mother NGO scheme. Bhat et al. (2007) in their study found that patronage and contacts worked in awarding of the contract to the MNGO. The study also found the existence of a number of allegations of vested interests within the government agencies in allocating and disbursing funds in case of the scheme. District officials in Bhat's study felt that NGOs were over budgeting, did not submit reports on time, lacked transparency and worked with unqualified or semi-qualified staffs (Maurya, 2012, p. 17).

After being selected for the SNGO scheme, the trust received the fund for conducting the Baseline Survey (BLS) in the chosen area in 2009. Before this, the Coordinator as well as the Medical Officer selected for the SNGO, received a four-day orientation training from the trust by the Regional Resource Centre, Mumbai, on the roles and responsibilities of an SNGO and also on how to conduct the Baseline Survey. This training was organized in May 2008. The Baseline Survey was conducted between December, 2008–January, 2009. Based on the findings of the Baseline Survey, the SNGO prepared a project proposal suggesting their activities and submitted it to the State RCH Society in 2010. Thereafter, the trust signed the Memorandum of Understanding with the District RCH Society in January 2011. Highlights of the MOU can be seen in Box 7.6. After this, they received their first instalment in February 2011 and permission to start the project was given on April 2011.

Fig 7.1: Step wise procedure involved in the SNGO selection



For the baseline survey, 17 villages were chosen, located five, 10 and 20 kilometres away from Krunze PHC, the nearest PHC to the clinic at Bhopoli. Every fourth household was selected, which covered a population of 22,000 (Mr. Naresh Dhanwa, Programme Coordinator, SNGO Scheme). The core issues identified by base line survey, focus group discussions, and interview with health professionals as well as through secondary data are:

- **Low Complete ANC Coverage - 40.83%** due to lack of awareness about ANC care, poor consumption of IFA Tablets and late registration of pregnant females.
- **High prevalence of Home deliveries** (71.88%) **vs. institutional deliveries** (28.13%)**.**
- **Unmet need for spacing** (62.34%) **and limiting** (15.14%) due to poor awareness and non-availability.
- **Low Complete Immunization Coverage** - (19.91%)

- 80% **complete vaccination** for less than six years of age.

Box 7.6.: Highlights of MOU between ML Dhawale Trust, Mumbai and District RCH Society, Thane

- Agreement between the two parties on 100 rupee stamp paper, signed on 25th January, 2011.
- Period: Three years starting from February 2011. However, the renewal of partnership would be on a yearly basis.
- Goal: To implement activities of RCH II service delivery in unserved and underserved areas of Maharashtra through service NGOs.
- Financial outlay: 45 lakhs for 36 months.
- Name of the district: Thane, name of the block: Vikramgad, Name of RH: Vikramgad, Name of PHC: three PHC and 24 sub-centres (Krunze, Talwada, Malwada), Number of villages covered: 94
- On the basis of the baseline survey conducted by MLDT, situational analysis and comparative analysis of the District Vital Statistics, MLDT proposes to work on the following core issues for targeted intervention.
  i) Complete ANC coverage
  ii) Institutional deliveries
  iii) Unmet need for spacing and limiting
  iv) Immunization
- Attempt to increase complete and qualitative ANC care from 40.83% to 90% in three years
- Attempt to increase the rate of institutional deliveries from 28.13 % to 100% in three years.
- Attempt to reduce the unmet need of spacing from 62.34% to 30% and limiting 15.14% to 7% in three years.
- Attempt to increase complete immunization coverage from 19.91% to 100% in three years.
- The manpower to be employed under this project will be utilized only for achieving the

Source: MOU between ML Dhawale Trust and District Health Society, Thane, 2011

Hence, the findings of the BLS further confirmed that the chosen block of Vikramgad is unserved and underserved. The authenticity of the baseline survey was checked by the DPM, Thane, Mrs. Reeta Gaikwad, who visited the trust and at random, taken a few BLS forms and checked whether the information in the form was correct by visiting the respondents' houses (Dr. Goda, Director, SNGO). Based on the core issues identified in the baseline survey, targets for achievements were set by the

SNGO, which were presented in a project proposal prepared by the, and submitted to the District RCH Society, Thane. According to this proposal, MLDT would focus on increasing Complete *ANC Coverage*, *Institutional deliveries* and meeting the unmet needs *for Family Planning* and *Immunization* by providing clinical and preventive services to 94 villages in the Vikramgad block.

Through the above mentioned interventions, the SNGO intends to increase complete and qualitative ANC care from 40.83% to 90% in three years. Similarly, it intends to increase the rate of institutional deliveries from 28.13% to 100%, to reduce the unmet need of spacing from 62.34 to 30% and limiting from 15.14% to 7% as well as to increase complete immunization coverage from 19.91% to 100% (MOU between MLDT & DRCH Society, 2011).

Goal of the scheme

The goal of the SNGO scheme is to achieve Population Stabilization, which is aligned to the goal of National Population Policy, 2000. The scheme intends to achieve this by complementing the public health system in fulfilling the goals of the Reproductive and Child Health programme. This can be achieved by directly providing clinical services in the community. For example, services for safe deliveries, neo-natal care, treatment of diarrhoea and ARI, abortion and IUD services, RTI/STI etc., addressing gaps in information of RCH services in the project area, building strong institutional capacity at the state, district/ field level, advocacy and awareness generation (GOI, 2003).

The programme's goal as mentioned in the project proposal of the SNGO scheme is to not only improve the Mother and Child Health in the community, but also to integrate socio-economic activities like poverty, water supply, hygiene and sanitation with the health programmes (MLDT, 2008).

The goal of the programme as mentioned in the MOU between the trust and DHS is to implement activities of RCH II service delivery in unserved and underserved areas chosen by the trust as well as the DHO. The objectives of the scheme, as mentioned in the MOU, are:

"To identify and establish the roles and responsibilities of SNGO as partner and delivery of RCH service in the un/underserved areas identified by the district, to provide RCH service delivery following RCH-NGO guidelines and district composite proposals and thereby ensure improved reproductive health status in the area based on the baseline survey conducted by the SNGO, to complement and supplement the government's efforts in RCH programmes by utilising and strengthening the existing government infrastructure, plan and programmes (MOU between SNGO & DHS, 2011)."

The goal of the programme, as mentioned by some key staff members of the SNGO include reduction of MMR and IMR through institutional delivery, ANC care, immunization and removal of malnutrition (Dr. Sayyed, M O, SNGO, Mr. Tulsiram, MPW supervisor). According to the coordinator of the scheme Mr. Naresh Dhanwa,

"*The goal of the scheme is to improve the ANC coverage from 40 to 100%, reduce home delivery and to improve immunization"* (12th December, 2011,Bhopoli, Vikramgad block, Thane district).

Activities & Implementation

In order to achieve the above mentioned goals, the SNGO operates through a team of grass root level workers, called the Community Health Volunteers (CHVs). There are 45 CHVs in 25 villages and for every two *pada*, there is one CHV. However, under the scheme, there is a provision of 21 health workers. Their work is supervised by two Multipurpose Workers and the work of this entire team is coordinated by one Multipurpose Worker Supervisor (Mr. Tulsiram, MPW supervisor, 19th December, 2011). The CHVs who are selected and trained by the SNGO are identified from within the villages by conducting village level meetings, who nominate an enterprising lady from the village for this work. Many times, the CHVs are the ones who are also chosen as an ASHA worker by the government, as the government fully trusts the selection process of the CHV by the SNGO. For easy mobility and coordination work, the two MPWs as well as the Supervisor are provided with a two wheeler.

The original staff composition of the SNGO as per the guidelines of the NGO scheme consists of one Medical Officer, one coordinator, one nurse and 21 health workers. For operational purposes, the trust has employed far more staff for SNGO work (Mr. Naresh Dhanwa). In fact, the entire staff of the trust is supporting the work of the SNGO in some way or the other. However, the ones mentioned in the guidelines are referred as the core staff of the SNGO. The roles and responsibilities of the core staff of the SNGO can be seen in Figure 7.2. It is important to note that while there is no post of Director of SNGO, MLD Trust has created the same. The head of the clinic at Bhopoli is designated as the Director of the SNGO and oversees the implementation of the entire scheme.

One of the greatest advantages for the implementation of the SNGO scheme in the area is the fact that it has been implementing the Mother and Child Health programme since 2002 in the Vikramgad taluka. Work on RCH was, however, going on in the taluka even before this, through the Mobile vans of the trust, dating back to even before the clinic at Bhopoli was established in 2003. Under the MCH programme, the trust has been running Mobile vans to the nearby 10 villages for providing ANC and PNC care and health awareness to villagers at their doorsteps. The network of CHVs is a part of this scheme. In 2008, the trust partnered with the government under NRHM and launched the AYUSH

programme. The number of villages increased to 25 under this programme. All these villages were falling under the Krunze PHC as the trust is located very near to this PHC and it is much easier for them to provide services to villages falling under the jurisdiction of this PHC. AYUSH programme had similar objectives as that of the SNGO, the only difference was that it used homeopathy as a means for treatment, as the AYUSH Programme under NRHM aims at integration of traditional methods of healing in the mainstream provision of health services. As mentioned by the Director of SNGO, Dr. Goda,
"*In 2010, the AYUSH funds exhausted and very soon we received the funds of the SNGO. Hence we clubbed AYUSH with SNGO as the two had similar objectives"* (20th December, 2011, Thane).

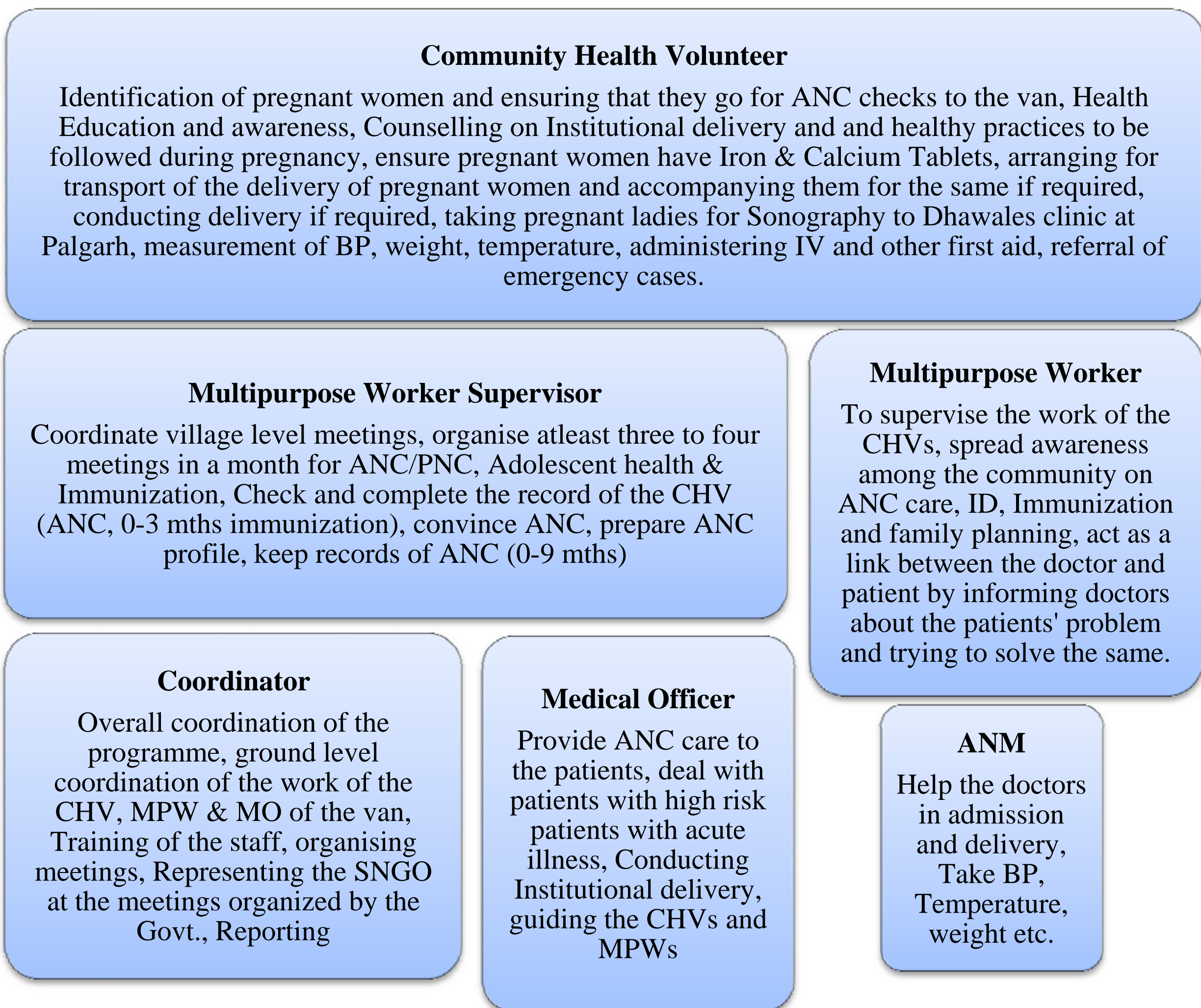
Under the currently running SNGO scheme, the van is operational within the 10 villages chosen for the MCH scheme, the difference being that it covers many more villages now. Even though the SNGO project is operational in all 94 villages of the Vikramgad block, active work is happening in 25 villages near the Bhopoli centre, falling under the jurisdiction of Krunze PHC. Out of these 25 villages, 21 villages are covered by van (two in number) visits. Each van covers two to three villages on a daily basis; hence, around six villages are covered daily. Around 25-50 patients are examined in each village, on average, mostly for ANC and PNC checks.

According to the MO of the van Dr. Yashodhar Wadekar,
"Maximum patients visit the van for ANC and PNC checks and very few come for general ailments. The common ailments for which many patients come to the van include fever, diarrhoea, cold, cough, worm infestation, respiratory infection, etc."(19th December 2011, Bhopoli, Vikramgad block, Thane).

The van does not go to the nearby four villages which are very close to the centre, as people can easily come to the centre for treatment (Mr. Naresh Dhanwa, Coordinator SNGO & Dr. Sayyed, MO, SNGO). In the rest of the 69 villages of the block falling under Talwada and Malwada PHCs, the SNGO works on health awareness, especially on RCH through self-help groups.

Each van is staffed withone Medical Officer, two or three student doctors, one nurse, one driver and one compounder (Mr. Tulsiram, MPW supervisor). Even though these staff have been in existence for theMCH project, they are now instrumental for the SNGO scheme in a big way. Hence one can say that there is an overlap of activities as well as staff between the MCH and the SNGO scheme.

Fig 7.2: Roles and Responsibilities of the SNGO staff at the grassroots and NGO level



According to the NGO guidelines set by the Ministry of Health & Family Welfare, the SNGO should set up Satellite Clinics in the area of operation, but in this case, the Mobile Van is acting as a Satellite Clinic and the satellite clinics in the real sense are not in existence in the villages.

Besides the NGO team, the other important stakeholders associated with the scheme at various levels can be seen in Figure 7.3.

According to the NGO Guidelines of the Ministry of Health and Family Welfare, the SNGO is expected to function by developing active linkages with each of the above mentioned officials at various departments. The SNGO at Vikramgad works in close coordination with the PHC as well as the sub-centres in the block. They complement each other's work, functioning with the common goal of improving RCH indicators in the area.

Figure 7.3: Important Officials at various levels associated with the SNGO

State Level	District level	Block Level
• Additional Director, State Family Welfare Bureau, Pune • Coordinator, Regional Resource Centre, Family Planning Association of India,Mumbai. • Mission Director, NRHM, Maharashtra	• District Health Officer • District Programme Manager • District RCH Officer • Chief Executive Officer, Zilla Parishad.	• Taluka Medical Officer • Chief Medical Officer of PHC • Chief Medical Officer of the CHC.

As mentioned by the MO of the PHC at Krunze, Mr. Prakash Damle Khandejad,
"The SNGO closely works with the PHC in the area of family planning, immunization & ANC; in fact the immunization and family planning camps in the area are jointly organized by both the PHC and SNGO. Help is received from MLDT in terms of manpower and ambulance" (15th December 2011, Bhopoli, Vikramgad, Thane).

Another big help which the government receives from the trust is in identification of ASHAs, as the government relies on MLDT to do the same. The CHV appointed by MLDT, is selected to work as ASHA by the government, who do not have to put any extra effort in selecting them (Mr. Prakash Damle Khandejad, MO, Krunze PHC). The ANM of the sub-centre at Bhopoli, Mrs. Anita Madhukar Dhotre had a similar opinion about SNGO. According to her,
"*The SNGO is really helping the government machinery in achieving the target of Institutional delivery and ANC care, as the facilities there are definitely better than the sub-centre. Moreover, it is definitely providing good ANC care as they are getting the sonography done at their centre at Palgarh; the provision for the same is not there with the government. Similarly, it is also doing C-section deliveries and are getting Rs. 1,500 under the JSY per delivery. Women going to the Bhopoli centre by hiring any private vehicle are getting reimbursed for the vehicle"* (19th December 2011, Bhopoli, Vikramgad, Thane).

The SNGO's staff also identifies children left out in the government's immunization programme, and helps them avail the same. Hence one can say that the SNGO is rightly fulfilling its role of complementing and supplementing the government health infrastructure as mentioned in the NGO guidelines.

The Taluka Medical Officer is involved in supervising and monitoring the work of the SNGO and sometimes visits the site of the SNGO work. The SNGO monthly reports are sent to the District RCH Society, Thane with a copy marked to the State Family Welfare Bureau. No direct reporting is done to the TMO, but he is kept in the loop.

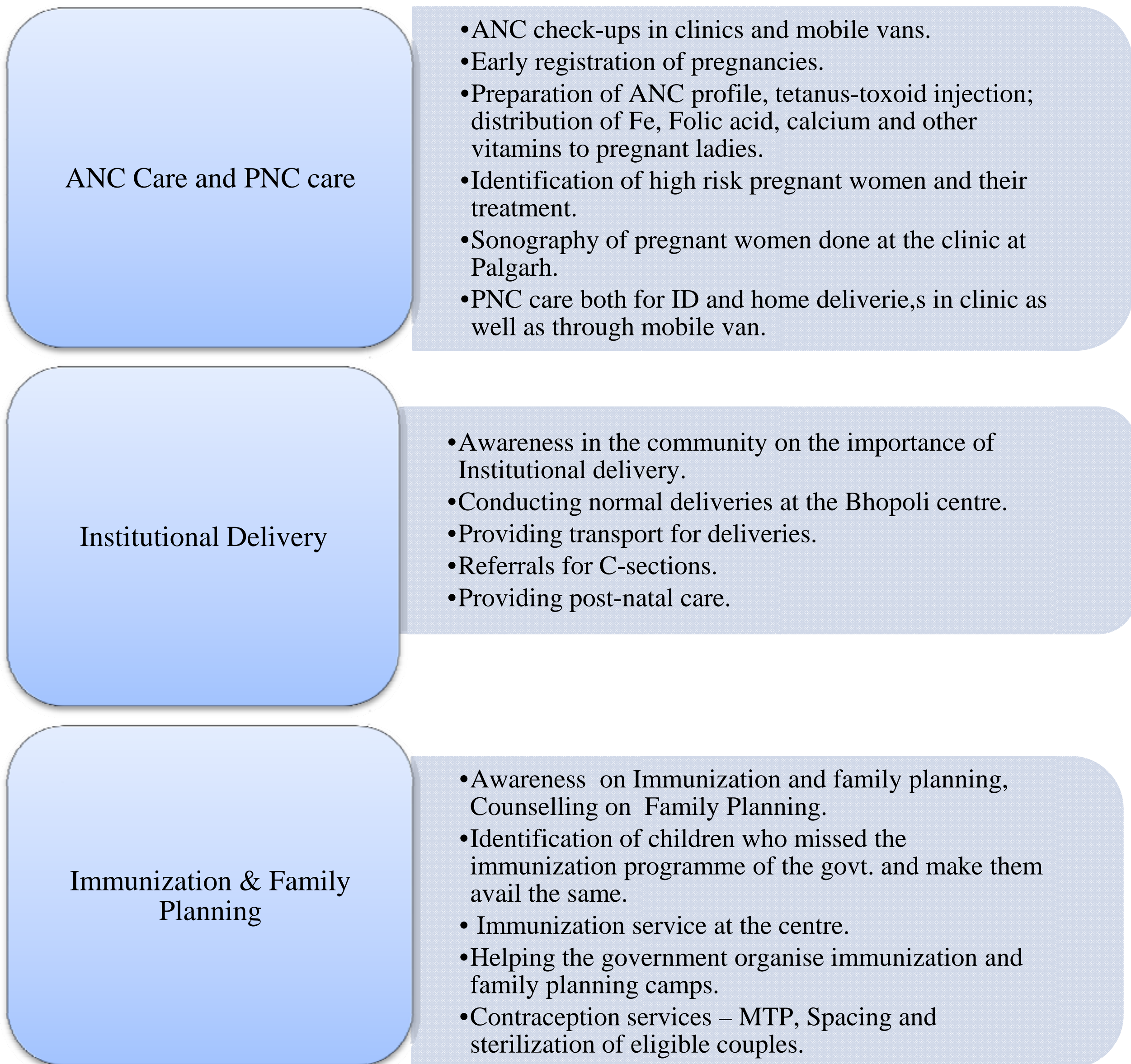
As mentioned in the MOU between the trust and the District RCH Society, Thane, the activities of the trust focuses around the four core issues of ANC care, Institutional delivery, Family Planning and Immunization. Details of these activities have been described in Figure 7.4. The main focus of the SNGO is on ANC and institutional delivery. The SNGO is not involved in any direct work in the area of family planning and immunization, and is only providing a supportive role to government institutions by helping them organize camps for the same. They are not even involved in the distribution of condoms and pills. Besides the activities depicted in the figure, other activities of the trust include providing emergency services in hospitals through specialists, awareness and treatment of RTI/ STI, taking care of the general health of adolescents and women in the reproductive age group, haemoglobin testing of adolescent girls, etc. Training of the Community Health workers is another very important activity entrusted to the SNGO (Dr. Goda, Director, SNGO).

Future Activities

In future, the SNGO plans to stop operating its van in nearby villages and instead route it to another set of villages. It also intends to focus on family planning and immunization by organizing family planning camps once in a month, and by targeting the left out and drop out cases of immunization in coordination with the Health workers and MPW (Mr. Naresh Dhanwa, Coordinator, SNGO). Another plan of the SNGO is to raise money from funding agencies. According to Dr. Sayyed Mohammed, MO, SNGO,
"*We don't have money to start any new activity under SNGO, we don't even have money for conducting C-Section deliveries, hence we plan to raise money from other funding agencies"* (12th December 2011, Bhopoli, Vikramgad, Thane).

Organisation of orientation and awareness camps in the villages is another activity which the SNGO intends to undertake in the future (Dr. Goda, Director, SNGO).

Fig 7.4: Main Activities of the SNGO, ML Dhawale Trust



Role of the Partners and Coordination between them

In this partnership programme, the government provides the funds and training to the NGO for supporting their work in the area of family planning by addressing RCH (Naresh Dhanwa, Coordinator, SNGO), while also monitoring and supervising their work (Dr. Sayyed). The NGOs role is to provide services as per the indicators provided by the government in the area of ANC care, Institutional Delivery, Family Planning and Immunization (Dr. Sayyed).

The other role of the NGO includes orientation of people, awareness generation, coordination with government for improving its services and training of the CHVs (Dr. Chandrasekhar Goda). According to Dr. Goda,

"The NGO is the main service provider of the scheme. It not only provides services to meet the targets set by the government, but also orients people and makes them aware about the government schemes and coordinates with the government for improving their services. By training CHVs we are trying to increase awareness at the grassroots level. Hence because of us, the government has got a very important partner at the grassroots level" (20th December 2011, Thane).

Financial Details

The scale of funding for the SNGO depends upon the nature of interventions proposed. The SNGOs can get an annual allotment of approximately Rs. 10–15 lakhs per CHC/block CHC area, towards recurring and non-recurring expenses. In case of SNGO (Thane), they receive an annual fund of Rs. 15 lakhs in two instalments. The first instalment of Rs. 7.5 lakh was released at the onset of the project and the second instalment was to be released after the utilization certificate of the first six months was submitted, but the same has not been received yet (Dr. Goda, Director, SNGO & Mr. Naresh Dhanwa, Coordinator SNGO).

The fund is received from Government of India by the State RCH society, which is then released to the District Health Society and they release it to the SNGOs. The expenditure of this fund is as per the budget prepared by SNGO in accordance to the guidelines specified by the Ministry of Health and Family Welfare. As per these guidelines, the funds will be made available to the SNGO according to the proposed interventions for baseline studies, conducting Community Needs Assessment, staff salaries and honorarium, conducting IEC activities, induction and in-service training for the staff, community orientation, development of mass media campaigns, various types of camps, MCH clinics, provisions purchase of FP supplies, essential drugs (according to list) to meet situations where government supplies are not available, purchase of clinical equipment, consumables required for the clinics/camps, setting up of depots, hiring of space for clinic/meetings, travel and DA for monitoring visits, referral transport, documentation, relevant records, registers and formats, follow up on referral cases, administrative and contingency (MLDT, 2008).

The areas where the fund for the project is utilized, as per the staff of the SNGO, includes cost of running the programme, ANC, medicines, honorarium for gynaecologists and other visiting doctors, emergency treatment and family planning (Dr. Sayyed, Medical Officer, SNGO). Other areas of fund utilization include purchase of medical instruments, staff salary, conducting capacity building workshops, service delivery, referral linkages, IEC, community participation, monitoring and conveyance for field visits.

From the first instalment, Rs.1.5 lakh was to be utilized on infrastructure (Mr. Naresh Dhanwa, Coordinator, SNGO). However, the Director of the SNGO reported that they have not been able to purchase equipment with this money yet because of the delay in government procedures. According to the budget, twenty percent of the total project cost needs to be utilized on administrative cost.

Staff members of the SNGO were not satisfied with the funds allocated to the scheme by the government. Even though they were happy with getting some additional money due to which they could expand their MCH activities, they felt that the amount of money received is insufficient to meet the needs of such an extensive programme. The Director of SNGO Dr. Goda shared that,
"The MCH project of the trust requires around 60 lakhs per annum, hence the SNGO budget of Rs. 15 lakhs per annum is too less" (20th December 2011, Thane).

Explaining this further he mentioned that,
"*In Bhopoli centre, per ANC care for the entire course of nine months, we spend roughly around Rs. 1,200-1,500, which includes the cost for registration, check-up, medicines, investigation and transport. The cost of delivery itself is Rs. 4,000and for C-section deliveries, the cost is much more as the cases have to be sent to our clinic at Palgarh. Similarly for sonography, all women have to be taken to Palgarh. Hence, if we have to cover the entire Vikramgad Taluka for MCH care, then the cost would be much higher than Rs. 15 lakhs per annum. Still we are trying to run the programme by raising funds from other sources"* (20th December 2011, Thane).

This information came across as a shock to the researcher, as what is universally considered as an intervention made by the SNGO in Thane district, is actually the work that is being done by funding through multiple donors. The government, through its SNGO scheme, only provides a part of this fund. Hence from the NGOs perspective, the programme is not at all *cost effective* as the expense for running the programme is far more than the allocated budget provided by the government under the SNGO scheme. In spite of this, the trust is continuing its work, as they are committed towards doing MCH work in the area. The government, however, is taking full advantage of the NGOs commitment, as a result of which they are able to project more work for the amount of money they are investing into the project. Another reason for the NGO to continue with the programme, in spite of it not being cost effective, is the name, fame and prestige that they get by being attached with the government. According to Dr. Goda,
"*The programme gives the NGO an authorization from the government, which gives it more authenticity within the community, as well as in the larger picture*" (20th December 2011, Thane).

The access to government machinery through the scheme helps the NGO build contacts with the government, which they believe would help them in getting government projects in the future. Besides, the government tag also attracts funds from foreign funding organisations, as they find NGOs with government linkage to be more reliable than others (Dr. Goda, Director SNGO). The SNGO staff members were also unhappy with the fact that the government delays the release of funds. The funds of the first instalment were released after two years of the baseline survey.

Hence, it can be concluded that the scheme is placing a lot of financial burden on the SNGO, as the money spent on the programme is far more than the money received by the government, as a result of which, the SNGO has to rely on alternate sources of funding for its activities.

Quality: Training and Monitoring

In order to ensure that the SNGO programme is able to maintain its quality, periodic training of the staff, monitoring, evaluation and supervision of the scheme is done, both by the government as well as the SNGO.

Training

Even though training of the staff is primarily the government's prerogative, the SNGO on its own also organizes an intensive training for its field level staff, which includes the Multipurpose Workers and Community Health Volunteers.

Regional Resource Centre (RRC), Family Planning Association of India, Mumbai is an apex body responsible for training and capacity building of SNGOs all over Maharashtra. To meet its responsibility, the RRC organizes regular training sessions for the SNGO staff. As has been mentioned in the earlier sections, the staff of the SNGO which includes the SNGO Coordinator and the Medical Officer have received two trainings by the Regional Resource Centre, Mumbai as soon as it was selected for the scheme in 2008. The first training was orientation training for five days on the roles and responsibilities of SNGO, and on how to conduct the Baseline survey. They also received a five-day training for proposal writing and in 2011, they attended a one day workshop on monitoring (Dr. Sayyed, MO & Mr. Naresh, Coordinator, SNGO).

The training of Community Health Workers is an important task assigned to the SNGO under the guidelines issued by the Ministry of Health & Family Welfare. The trust itself considers this as its very special programme. Dr. Sujata Goda, an MD in Homeopathy is responsible for this training. The researcher interviewed her in detail to learn about the nuances of this training. The CHVs who are identified from the villages in consultation with the villagers, have been receiving training from MLDT

since the past eight to ten years, much before the start of the SNGO scheme. The CHVs receive a training of six months stretched over a period of one year, mainly because of the fact that the villagers migrate to cities between May and September. The training of Multi-Purpose Workers is also organized along with the CHVs. The selection of the CHVs/ MPWs is done in May, but the training starts in September and continues till October. Post Diwali, they are given a month's break, after which classes start in November and continue until April. In May, they have to take an exam conducted by Yashwant Rao Chavan Open University (YCMOU), Nashik by the name of *Arogya Mitra*. Once they pass this exam, they are certified as Community Health Volunteers and Multi-Purpose Workers.

Since it is difficult for the women CHVs to leave their household and farm work and come for training to the centre every day, classes are organized twice a week. Hence, the programme is very sensitively designed, keeping in mind the living conditions of the women working as CHVs. Besides classroom teaching, the CHVs also receive clinical trainings, where they can observe doctors handling ANC cases. Similarly, they are posted with the van which visits villages for providing ANC care and help doctors in the van. The training covers a range of areas, from information on basic health and hygiene, preventive aspects of illness to how to measure Blood pressure, take temperature, administer IV and first aid and conduct a delivery. (Dr. Sujata Goda, CHV trainer, Mr. Tulsiram, MPW Supervisor, Mr. Gangaram Bhoye, MPW and various CHVs interviewed at the field).

Monitoring & Evaluation

Regular and effective monitoring is crucial in maintaining the quality of any partnership programme. In case of SNGO, both partners are involved in monitoring. While the government monitors the overall scheme, the NGO monitors the work and performance of its staff.

Monitoring of the SNGO is done by the District RCH Society through the DPM, DHO and the State RCH Society. These officials however, hardly make any on-site visits for monitoring, which is done solely on the basis of the reports submitted to them. According to Dr. Goda,
"The DPM, Thane district has just made one visit to the SNGO till now, and that too it was not for monitoring the scheme, but to cross check the authenticity of the Baseline survey conducted by the SNGO" (20th December 2011, Thane).

The State NGO coordinator is expected to make half yearly field monitoring visits to SNGOs. Other officials involved in the monitoring process include the Mission Director NRHM and the Taluka Medical Officer. Though reports are not submitted to the TMO, he is kept in the loop and is expected to supervise and monitor the work of the SNGO by making onsite visits randomly.

Monitoring is primarily done by assessing the progress made by the SNGO on the indicators identified through the Baseline survey. These indicators are enlisted in Box 7.7. The performance under each of these indicators is reported in the quarterly reports, which are submitted to the District RCH Society with a copy to the State RCH Society. The State RCH Society shares the six monthly reports with Regional Resource Centres and the GOI. RRC evaluates these reports mainly to identify areas needing technical inputs.

As mentioned in the MOU, the SNGO would focus more on providing complete ANC care, Institutional Delivery, reducing the unmet need of family planning and providing complete immunization coverage. Hence the performance on these four indicators is given more importance.

At the level of SNGO, the Coordinator, Mr. Naresh Dhanwa and the Medical Officer, Dr. Sayyed Mohammed, monitor the performance of the grass root level workers which include the CHVs and MPWs, on the basis of the monthly reports prepared by the latter. Meetings are organized with the Coordinator, Medical Officer and the MPW supervisor every fortnight, where the supervisor presents data from the field. Similarly, meetings are organized with the CHVs, once every month.

Besides, training and monitoring, regular meetings are organized with beneficiaries of the scheme to assess the impact of the scheme on them and to find out areas which need further improvement. This is a unique measure undertaken by the SNGO to maintain its quality (Dr. Sayyed Mohammed, Medical Officer, SNGO).The SNGO performance would be evaluated at the end of year one and year three by an external evaluating agency. The State RCH Society commissions the evaluation (GOI, 2003).

The SNGO is expected to have monthly meetings with the DHO where it makes a presentation of the work done in the month, and also share the problems it faces in the field. Similarly, in the half yearly review meetings organized by the State RCH Society, the SNGO makes a presentation on its six-monthly performance (project and financial), during the period based on the planned activity for the year. The District RCH Society is also represented in these meetings.

Box 7.7: BLS Indicators used for Quarterly reports

- Number of women receiving full ANC care which includes a minimum of three check-ups, two TT injections and 100 IFA Tablets (Complete ANC care).
- Place of delivery- Home/ Institution.
- Tracking of pregnancy – Number of ANC received, number of high risk cases detected, high risk cases treated, MTP, Postnatal visit.
- Birth Registrations.
- Number of eligible couples using modern method.
- Number of children completely protected against six preventable diseases, Primary Immunization (BCG, DPT3, Polio3, and Measles).
- Number of eligible couples reported symptoms of RTI and STI (Referred for Treatment).
- Number of eligible couples where both completed treatment.
- Number of girls marrying before attaining legal age of marriage.
- Number of married girls conceived during adolescence.
- Number of mothers who received benefit under JSY.
- Number of malnourished grade III & IV children detected & improved.
- Meetings with DHO/THO and Medical Officers - at least three meetings per month (Monthly and fortnightly meetings with DHO & MO, PHC respectively).
- Village and Sanitation Committee formed (Expected Villages with 1,500 and above population).
- Village and Sanitation Committee meeting held (Expected Villages with 1,500 and above population).
- Number of camps held - RCH /Other (Attended by NGO).
- Number of meetingsheld with beneficiaries.
- Grant Status.

Source: Format for Quarterly reports prepared by the SNGO (MLDT)

Equity, Sustainability & Replicability

Equity

The SNGO scheme is reaching out to the most interior and underprivileged sections of the society, which was the prime goal of it being implemented in partnership with grass root level NGOs. MLDT has immense respect in the community due to its long experience of working in the field of RCH in the area. Due to this, the SNGO scheme is highly accepted within the community that it serves. The government tag further helps in making the scheme more popular which definitely helps in reaching out to maximum people, thus making the programme more equitable. An instance that substantiates this, as mentioned by Dr. Goda, is that earlier there were some issues regarding the parking of the Mobile Van of the SNGO. The location where the van was parked belonged to the higher caste that debarred the people from lower caste to go there. The SNGO resolved this issue, through meetings with the *Sarpanch* of each village and decided upon a neutral location for the van parking, where people from all castes and creed could come. The trust's reputation of working in the community, clubbed with the government tag helped in identifying such locations in the villages. According to Dr. Goda,

"The scheme is reaching the most underprivileged section of the society as 80% of the villagers in these villages belong to the BPL families. Since it is a government programme, the accessibility of the scheme is not affected by the prevalent caste system. Everyone across caste groups are receiving the benefits of the scheme" (20th December 2011, Thane).

According to Mr. Naresh, the Coordinator of the scheme,
"*We are reaching almost all caste groups within the villages. However, we are covering more of Adivasis and Warlis; very few of our beneficiaries are Katkaris. This is mainly because their population is less in the block"* (19th December 2011, Thane).

Equity of the programme is ensured mainly by the fact that the scheme operates through mobile vans, which enables it to reach the most interior regions of the Vikramgad block. Another factor that helps in this regard isthe service provided by the MPWs and CHVs of the SNGO. The MPWs and CHVs, who are identified from within the villages, go to the interior *padas* of the villages and identify pregnant women and ensure that they receive ANC care. The researcher herself met many pregnant women in advanced stages of pregnancy that had not received any ANC care yet, and had been brought from very interior *padas* by the CHVs to the van. These women were grateful to the CHV for this help. The mobility of the MPWs is enhanced by providing them with motor cycles; the provision for the same is not there within the SNGO scheme, but the trust manages it through other funds.

Replicability

The scheme is a nationwide scheme being implemented in most states under RCH-II of NRHM. As mentioned earlier, in Maharashtra, 10 more SNGOs have submitted their proposals and would start their activities soon. Similarly in other states, many new SNGOs are coming up. Hence, one can say that it is a very successful scheme of the Central government, which is being replicated on a large scale across the country. However, issues like fund enhancement, setting reasonable targets for the NGO and effective monitoring need to be given a serious thought by the government before it is replicated elsewhere.

Sustainability

Sustainability of the scheme is not an issue for the SNGO, as the work that they are doing under this project is an extension of their earlier MCH project. As reported by the Director of SNGO, the money that they receive is not enough to run the existing MCH programme; it only provides a part of the fund. Hence, even if the government stops funding for the SNGO scheme, they would still continue their existing work in Reproductive and Child Health by generating funds from other sources. In fact, Dr. Goda was happy to state that in case the government stops funding the SNGO scheme, they would benefit by

being liberated of the monitoring, documentation and strict adherence to indicators. (Dr. Goda, Director, SNGO). Another alternative that was suggested by the Coordinator of the SNGO, Mr. Naresh Dhanwa was,

"To sustain the scheme in the absence of funds, we may start charging something to the community for the services, which is termed as Community Based Audit" (19th December 2011, Bhopoli, Vikramgad, Thane).

Experience of Providers

The trust works with the philosophy of nurturing talent within their employees, and helping them grow. There are many instances within the trust wherein employees have joined at a humble position and gradually risen up the ladder and now occupy important positions within the trust. A living example of this is Mr. Naresh Dhanwa, the Coordinator of SNGO scheme, who had joined the trust as a Driver-cum-Compounder of the Mobile Van, became an Accountant, was later elevated to a Health Supervisor and is now the Assistant Manager of the Bhopoli centre and the Coordinator of the SNGO scheme. The same is the case with the MPW Supervisor Mr. Tulsiram as well, who joined the organization as a CHV. This reveals that the trust gives immense opportunity to its workers for growth and is not hierarchical and rigid like government organizations. Also the staff members of the trust were seen to live together cordially. Most employees reported that they were happy being associated with it, mainly because of this aspect (Mr. Naresh, Dr. Sayyed, Mr. Tulsiram).

However, there were several other factors because of which they were unhappy within the organization, most pertaining to the trust's association with the SNGO scheme. The staff reported that the additional responsibility of the SNGO has increased their work burden manifold. Lower level staff members, who include the MPW and CHVs, feel that their salary is meagre for the kind of work that they have to do under SNGO. The higher level staff on the other hand, felt pressurized by the reporting work that they have to do, wherein every minute detail has to be documented. They also have a lot of pressure from the government for achieving targets, which seems impossible considering the large area of the SNGO and the small budget (Dr. Goda, Director and Mr. Naresh Dhanwa, Coordinator, SNGO). Hence, in order to meet the targets of the scheme, the NGO has to rely on alternate sources of funding. This no doubt is beneficial to the government, as they are able to get a lot of work done by the NGO, within a small budget. However, it is stressful for the SNGO and its staff. The only reason why the staff members of the trust were happy with the scheme was the fact that they were at least getting some money from the government for their RCH activities.

Experience of Beneficiaries

To assess the impact of the programme on beneficiaries, as well as to capture their experiences vis-à-vis the scheme, focused group discussions (FGDs) were conducted with married women in the age group of 20-35 years, having at least one child who is less than three years of age, in six villages in and around the Bhopoli centre where the SNGO is doing active work through the Mobile Van. The villages were chosen on the basis of their location. While three (Vilsheth, Tallavali and Sheel) were located near the Bhopoli centre, three (Uparale, Satkhor and Daharje) were located far away, at a distance of 10-15 kilometres from the centre. It is important to note that while the van provides services to the far off villages chosen for the study, it does not go to the villages located near the Bhopoli centre.

The villages in the Vikramgad block are known for their poverty and deprivation, which translates into poor health and illiteracy of the population. The low educational standards of the villagers can be estimated from the fact that almost 50% of women covered during the FGDs in these villages were uneducated, and as few as three women across all groups covered in the FGD were educated till the plus-two level. The rest had mostly received primary education, which was for namesake, as the quality of education imparted by primary schools in these villages is very poor. These schools are also called 'One Veranda Schools', wherein different classes are taught together in one veranda. An interesting correlation was found with age and education. While women between 20-30 years of age had received some education, women above 30 years of age were mostly uneducated. This shows that awareness about education has happened only recently among the younger generation.

The main source of livelihood for the villagers is seasonal farming, which is heavily dependent on the rains. During the non-farming season, they migrate to cities for daily wages. Rice is the main cash crop. The monthly family income of most women covered in the FGD hardly exceeded Rs.1,500, with most of them earning a sum or Rs. 500-1,000 per month. In fact, most respondents were unable to even tell their monthly income, as they hardly earned anything in cash. They ate whatever they cultivated as crops. This is a clear indicator of the poor socio-economic conditions of the villagers.

These villages are predominantly inhabited by the Scheduled Tribes comprising the Malhar Koli, Warli, Katkari and Kokana, in order of decreasing prevalence. Hence the majority of women covered in the FGD also belonged to the scheduled tribes; a chosen few belonged to the OBC and SC category. More than half the women were from the Warli caste. A significant number of FGDs conducted with women from the chosen villages centred on each indicator of the Baseline Survey, which included ANC care, Place of delivery, Post-Natal Care, Family Planning and Immunization. Discussions revolved around knowledge

as well as access of services related to these indicators, offered by the SNGO. This was done to understand the existing conditions in the villages vis-à-vis these indicators, and to assess whether there has been any change over a period of time due to the interventions of the SNGO and the MCH programme of ML Dhawale trust (commonly known as Dhawale hospital or *dawakhana* by the villagers) in the region. The villager's views about MLDT and their experiences from the same were also discussed in details. The following section tries to summarize the findings of these FGDs, which were conducted with groups of women across the six chosen villages.

Awareness and Views about M L Dhawale Trust

Almost all respondents of the study had heard about MLD Trust and were aware about services provided by them, which included ANC, PNC, delivery and general health services. While all of thempreferred Dhawale trust for ANC, PNC and deliveries, they did not prefer it for general health services. For general health services, the villagers preferred going either to the private clinic at Manor, the PHC or the Rural Hospital at Vikramgad. This is because the trust provides free services only in the area of ANC, PNC and delivery, while all other services are charged. Also, most people did not have faith in homeopathic medicines provided by the trust. They believe that their illnesses would not be cured by small, sweet medicines, all of which look the same. Also, in homeopathic treatment, the doctor asks a lot of questions, which was usually not liked by people. Another reason for women not preferring Dhawale trust for general illnesses is the fact that the doctors in the trust did not provide them with injections. This reflects the mind-set of the common people, wherein they feel that they can only be cured by injections.

Most women covered in the FGDs had availed the services of the trust, either for ANC, Delivery or PNC, and were satisfied with the same. This was mainly because the trust's van provided good services at their doorsteps, that too for free. Villagers residing near Dhawale centre, where the van did not go, also cited similar reasons for liking it. They were happy with the fact that workers of the trust (CHVs) are from their own villages, hence they can relate to them, maintain regular contact with them and receive guidance from them during times of emergency. Women were also aware of the roles of the CHV, which included informing them about the days when the van comes to their villages, taking them to visit the same, taking them to Dhawale's clinic for ANC check-ups (in the villages where the van does not go), taking women to the trust for delivery and arranging vehicle for the same, counselling them on the importance of Institutional delivery and ANC care, ensuring that pregnant ladies take iron and calcium tablets and monitoring their weight as well as the weight of the new-born babies.

Women also reported that the CHVs take them for sonography to Dhawale centre at Palgarh and that they also give information on immunization of their children and take them to the camps. Almost all respondents rated the work of the CHVs as good and very good. However, very few women were aware about the existence of Multi-Purpose Workers working on behalf of the trust. This is because the trust has several CHVs working in close association with the villagers, whereas there are just three MPWs for the entire block. It is important to note that the CHVs of the trust also work as ASHA workers in most cases and hence the roles of the two overlap. Also due to this the CHVs have to undertake a lot of work which is not under the purview of the SNGO.

Reproductive History of Beneficiaries

Most women in these villages are married at an early age of 15 – 16 or as soon as the menarche approached (MLDT [n.d]). Majority of the respondents of the FGD were married between the ages of 15-20 years, some were married at an earlier age and very few were married when they were older than 20 years of age. If they are married at such an early age, it is obvious that they would have more children. The elder women in the FGD groups had conceived as many as six times, or even more. There were a few cases where the women suffered a miscarriage. There were also a few cases wherein the child was born prematurely and died after a few months due to malnutrition. Malnutrition is reported to be one of the most common causes of infant deaths in Thane district. As reported by Mrs. Vaishali Santosh Samare of Vilsheth village,

"Child was delivered in seven months and died after three months due to malnutrition. I was hospitalised in Dhawale Hospital for 18 days and received free of cost treatment."

There were also cases where the woman had both a miscarriage and an infant death; for example, Mrs. Vaishali Ladku Samre reported that one of her children was aborted in the womb in the fifth month of pregnancy, while her second child was born after six months of pregnancy, but died in three hours due to malnourishment. The researcher also came across a few cases where the miscarriage happened due to the woman being undernourished. One of the main reasons for the undernourishment of these women is because they are given less food during pregnancy, so that their womb's size remains smaller to ensure that the delivery can be easily handled at home.

Family Planning Measures

Women covered in the FGDs were in the reproductive age group, having as less as one child, and as many as seven. Majority of them had between two and four children. They reported to continue bearing children until they had a male child, after which they wanted to get the sterilization operation done. Many young

women mentioned that even if they wanted to get sterilization done, their in-laws would not allow the same. Hence, one can infer that even though there is a change in the mind-set of the younger generation of women and they want to adopt measures for family planning, they are not able to do so because of the older generation, whose attitude has not changed much. The older women in the villages, on average, had as many as eight to ten children, which is a clear indication of the fact that they were not using any family planning method, and continues having children throughout the reproductive period. When the researcher visited these villages, she could see a group of children in each household. Exhibit 7.1. is an indication of the same.

Exhibit 7.1: Children of a particular family in Vilsheth Village- "This is not all; the rest were shy to come in front of the camera"

Across groups of women covered in the FGDs, the researcher could just come across three women who were using temporary methods of family planning, which included condoms and pills. Awareness regarding these was minimal amongst the women. However, she did come across quite a few (around 10) women, who had got the sterilization operation done at the government health institution to limit child birth. These were usually women with three or more children. The researcher also came across many women who wanted to get the operation done, but they could not as no more camps are being organized

by the government for these operations. Hence, there is an unmet need for permanent method of family planning. When the ANM of the sub centre as well as the MO of Krunze PHC were asked why the family planning camps were not being organized in the area, they mentioned that they have already met their targets for the same for the year. To conclude, one can say that some kind of awareness on family planning issues is happening among the women of the younger generation. Intervention made by the MCH programme of the trust, along with that of the government staff can be a reason for this change.

Place of Delivery
Currently Pregnant

Out of the sixty women covered in FGDs across the six villages of the block, 16 were currently pregnant. All of them intended to deliver at a health institution, since they were aware about the benefits of Institutional Delivery, had a bad experience with previous home delivery, had some complications in their pregnancy or simply because of the provision of good services provided by Dhawale trust, which was easily accessible to them for free. The availability of the trust's van to pick them up for deliveries, gave them another reason to opt for the same. The FGDs revealed that most of these women were well aware about Institutional delivery and its benefits, and the risks involved in home delivery. As reported by the women, most of this information was received from the workers of Dhawale Trust. Mrs. Sanjana Sanjay Baigha of Uparale village mentioned that,
"*Earlier we were not aware about the benefits of Institutional delivery, but now we are aware of the same because of Dhawale's van coming to our village*".

This is a clear indication of the fact that the trust is doing a good job in terms of awareness creation on Institutional Delivery. There was just one pregnant woman, Mrs. Manisha Raghunat Waja, across the groups, who had a different view. According to Mrs. Waja, she did not need to go to the institution for delivery, as she was perfectly fine and did not have any complications. Mrs. Waja's view represents the common perception of most women in these villages, especially those in the older generation, which is that Institution delivery is only for those who have some complications during their pregnancy. This view is, however, changing gradually. Efforts of Dhawale trust has surely contributed significantly in this regard.

Eldest and Youngest Child
Women with more than one child were asked to mention the place of delivery of their eldest andyoungest children. In both cases, more women had delivered at home than in the institution. One interesting fact that emerged was that while a large number of women delivered their youngest child at a health

institution, the number of women who delivered their eldest child at a health institution was much less. This is also an indication of the change in the mind-set of people towards institutional delivery over the years. When asked to explain the reason for the same, most women mentioned that during the delivery of their eldest child they were not aware about Institution Delivery, but at the time of delivery of their youngest child, they did understand the significance of Institutional Delivery, mainly because of the regular counselling done by the workers of Dhawale trust.

Majority of the women who went for home delivery for their youngest child did not opt for it, but were compelled due to practical difficulties which prevented them from going to the health institution. These included difficult terrain, interior location of their homes, lack of money for transport, lack of availability of any means of transport, odd hour of labour, etc. The most common reason which most women gave for not being able to go to the institution even when they wanted to, was the lack of availability of any means of transport as the delivery happened at an odd time. Excerpts of FGDs with women describing the reason as to why they went for home delivery for their youngest child have been mentioned in Box 7.8.

The reasons for women to deliver their youngest and eldest child at Health Institutions were very similar to those mentioned by pregnant ladies who were planning to go for institutional delivery. A majority of them mentioned that better services were being provided in the institution and hence they wanted to go for the same. As mentioned by Mrs. Rekha Ramesh Chavane of Satkhor village,

"If there is any complication during the delivery, it can be easily handled in a health institution, while at home nothing can be done."

Many women also reported of going to the institution for delivery due to some complications like cyst in the uterus, large size of the foetus, high blood pressure, etc. Other reasons included bad experience of previous home delivery and lack of satisfaction with deliveries conducted by Dais etc.

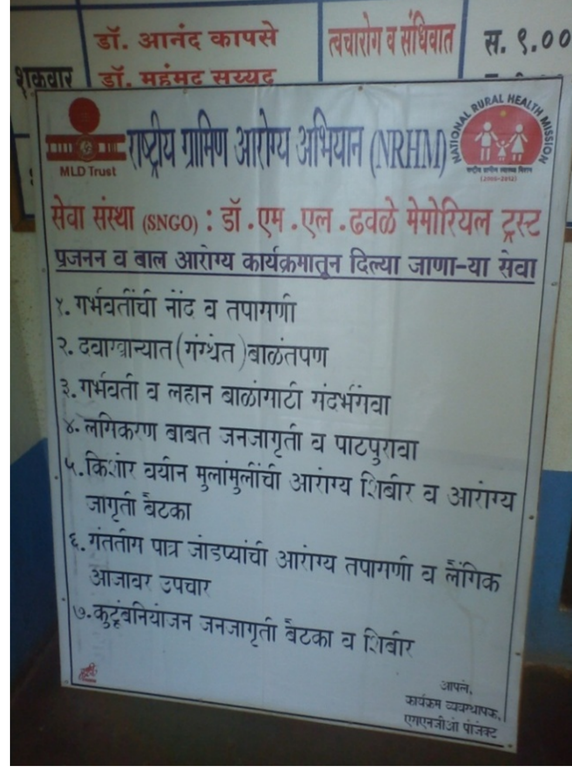


Exhibit 7.2: Poster displaying the activities of the Service NGO

Exhibit 7.3: Mobile Van of the Service NGO-Dr. M.L. Dhawale Trust

Exhibit 7.4: Respondents of the study/Beneficiary of Service NGO

While women did go to other institutions like the PHC, Rural Hospital at Manor and Vikramgad, or private clinics, still, the most preferred institution for delivery in the area is the Dhawale Trust, mainly because it is easily accessible, is near and provided free and good services through mobile van. Another reason for the popularity of the trust in the region is the fact that it provides transport facilities to take villagers to their centre at Bhopoli, via a mere phone call. This is a big solace for the villagers, as they know that in emergency situations, they would be taken care of by the trust.

Hence, one can conclude that it is only since the last two to three years that more women are going to the institutions for delivery. Before that, almost all deliveries happened at home. The most commonly cited reason for home delivery is the fact that deliveries happened at night when they did not have any means of transport to go to the hospital. The belief that Institutional Delivery is needed only at times of a difficult pregnancy was another major reason for deliveries happening at home. In case of first delivery, people preferred going to the hospital, but in case of fourth or fifth delivery, they were scared to go, fearing that sterilization operation would be conducted on them. This indicates that people are aware about the government's measures for population control, are scared of the consequences and are not ready to abide with it.

Box 7.8: Reasons for women to opt for home delivery for their youngest child

- *"I didn't get transport at 3am when the delivery happened, even though I wanted Institutional Delivery, the delivery happened at home".(Sanjana Sanjay Baihgha, Uparale)*
- *"The road was bad, while going to the hospital, delivery took place." (Daya Sanjay Choudhary, Satkhor)*
- *"Delivery happened on a Sunday, when the driver is not available in Dhawale Trust."(Darshana Sadanand Samare, Vilsheth)*
- *"I had called an auto to go to the health centre, in the meantime delivery happened at home".(Rina Dama Gaware, Talavali)*
- *"The delivery happened suddenly, didn't get time to go to health centre".(Tamma Laxman Jadhav, Talavali)*
- *"Didn't have the money to travel".(Durita Durvas Pawar, Daharje)*
- *"There was no transport to go to the health centre as it happened in the middle of the night"(Harshita Hemant Khutade, Satkhor)*
- *"I feel embarrassed to be checked by the doctor again and again"(Pratibha Pravin Malkari, Sheel)*

Awareness and receipt of the benefits of Janani Suraksha Yojana

Janani Suraksha Yojana is a scheme under National Rural Health Mission wherein BPL women receive monetary benefit of Rs. 1,100 in case they undergo an Institutional delivery. In case of home delivery, the benefit amount is Rs. 500. The scheme has been initiated to promote Institutional Deliveries and to give some monetary support to BPL families, where the birth of an infant means additional expenses for the family.

FGDs with women groups revealed that they knew the government provides some money to women for delivery, but most of them did not know the name of the scheme or the exact amount. The ANM of the sub-centre, who usually paid the beneficiaries, took advantage of this fact and did not provide the money meant for them under the scheme. Instead, they were handed over any amount ranging from Rs. 100 to the actual amount. Also, this money which is supposed to be given immediately after delivery is received after, as long as, one or two years of delivery. Several women even reported of not having received the benefits of the scheme at all. This reveals that the implementation of the scheme is not happening properly at the grassroots level, mainly because of corruption and lack of awareness among the beneficiaries of the scheme.

Ante-natal Care

Proper ante-natal care is crucial for the good health of both the mother and child (Duggal, 2005). Most women in Vikramgad block have started realizing this, mainly due to the interventions made by the trust. This is revealed from the fact that almost all pregnant women residing in the villages where the van goes sought ante-natal care from the same, while those residing in the villages where the van did not go went directly to Dhawale's clinic at Bhopoli for ANC check-ups. Few women also got themselves checked from the ANM of the sub-centre who visited their villages on a monthly basis. Hence, for the currently pregnant women covered in the FGDs, Dhawale trust was the most popular source for ANC care in the chosen villages of the study, because it is most convenient on account of its nearby location, free treatment and good service. Earlier, when the van of the trust did not come to these villages, most women reported that they did not go for the ANC check-ups unless they had some complications or they would just go for check-ups only in the last trimester. The most common source of ANC check-ups then was the nearest sub-centre, visit by the ANM or ASHA, the PHC or the Dhawale Clinic at Bhopoli, in order of decreasing preference.

While all pregnant women were seeking ANC Care, the number of women who had sought ANC for their youngest child was less and the number of women who sought ANC care for their eldest child was even lesser. This shows that the attitude of women in these villages towards ANC care has changed over a period of time. It is only recently that people have started realizing the importance of ante-natal care and seeking the same.

The mobile van of the trust has made the accessibility of antenatal care very easy for the villagers. During FGDs, women themselves mentioned that earlier they were not aware about ANC care and did not understand the benefits of the same in conditions when they were absolutely fit during pregnancy. But now, after a series of counselling done by the workers of Dhawale trust, they do understand the importance of ANC care. Also, since the van of the trust comes into their villages, they can get the check-ups done very easily. There were a few women who mentioned that during some complications or emergency situations they have to go to the sub-centre or PHC for check-ups, as the van only comes on fixed days in a week and that is the greatest disadvantage of the van. The second most preferred source for ANC care after the van is by the ANM of the sub-centre, who makes monthly visits to these villages and checks all pregnant ladies.

Since the van has started visiting the villages, pregnant women who hardly received any ANC care are now getting their check-up done on a weekly basis, which is higher than the number of ANC check-ups

received by an average urban woman. The nearby villages where the van does not go still preferred to go for check-ups to the trust as it is nearby, but the frequency of the check-up was much less when compared to women residing in villages where the van goes. This is obvious, because in the first case, the health facility is going to the people whereas in the second, people have to go to the health facility for check-ups. Along with this, physical factors like time, money, and availability of transport and an accompanying person, etc. also plays a very important role in the health seeking behaviour of an individual, the pregnant women seeking ANC care in this case.

Women who received ANC care for their youngest child did not receive it as frequently, and got themselves examined only twice or thrice, that too during the last two trimesters. This is mainly because at that time, the Dhawale Trusts van was not operational in terms of providing ANC care in these villages. The number of visits made by women during the delivery of the eldest child was even lesser.

Women who sought services from Dhawale trust received far more services than those who received ANC Care from any government institution. This included blood test for the ANC profile, measurement of blood pressure, weight examination, Iron, Calcium Tablets and Tetanus Toxoid injection. The best part is that they also got their sonography done, for which they were taken by Dhawale's workers to Dhawale's clinic at Palgarh. According to the sister of the sub-centre at Bhopoli, Mrs. Sunanda Jadhav, "*This is a great facility for women as the same facilities are not available in any of the government institutions in the region*" (19th December 2011, Bhopoli, Vikramgad block, Thane dist.).

On the other hand, women who received ANC care from other sources just received iron and calcium tablets and the tetanus injection. Hence, there is no doubt that the trust is providing best services in terms of ANC care in the region.

Post-Natal Care and Immunization

Awareness among women towards ***Post-natal care*** was found to be minimal. In case of home deliveries, women did not seek any check-up after the delivery, and would do so only in case they had some complications. Even in case of Institutional Delivery, women would not go to the hospital after the delivery, unless they faced problems vis-à-vis their health or the health of the child. Most women reported to the health institution after delivery mainly because their child was ill with fever or diarrhoea. The few women who went for PNC after delivery reported of having been told about breast feeding, health and hygiene of the child, as well as the child's immunization and weight check-up. Since most women underwent delivery at home and did not go for PNC checks, they had a high incidence of Reproductive Tract Illnesses, as reported by the CHVs of the trust.

The Expanded Programme on Immunization (EPI) was initiated in India in 1978 to immunize children against preventable killer diseases such as tuberculosis, polio, diphtheria, pertussis (whooping cough), tetanus and measles. This was modified as the Universal Immunization Programme in 1985-86 in order to achieve 100% immunization target (Duggal, 2005). The ***Immunization***programme in these villages is performing well, as all women in the FGDs reported of having their children immunized completely. These were primarily done in the monthly immunization camps organized in the Anganwadi by the sub-centres. Zero Polio, which is administered to the new-born immediately after birth, was not administered to the infants who were born at home. Awareness about immunization was found to be good among women as they knew that missing their child's immunization may lead to Polio. The ASHA and the ANM are playing an important role in spreading awareness about immunization along with the workers of Dhawale trust.

Hence, it can be concluded that due to interventions made by the trust, there has been a change in the mind-sets of people towards ANC and Institutional Delivery, which was clearly evident through interaction with women in FGDs across the six chosen villages. Since the last few years, there has been an increase in the number of women seeking ANC and Institutional Delivery. Women are also becoming aware about family planning, especially to limit the family size. Besides, they are even getting complete immunization done for their children.

Women were aware about health programmes like Pulse Polio, immunization, Janani Suraksha Yojana, Filaria, HIV/AIDs, but were ignorant about the fact that it is being offered under NRHM. They had heard about it from either ASHA, CHV, AWW or ANM. JSY and Pulse Polio were the programmes which were most popular among women.

Outcome/Success

The success of the programme can be ascertained from the fact that both the SNGO staff and the government health officials have a high opinion about the scheme. The DHO as well as the DPM of Thane district were happy with the available infrastructure at the trust, however, they could not comment much about the progress being made by the scheme, as it started operating since April, 2011. The Taluka Medical Officer of Vikramgad block, Dr. Ritesh Patel mentioned that,
"The interventions of Dhawale trust in the area of RCH since the past few years have led to a remarkable improvement in Institutional delivery. The IMR has reduced and the MMR has almost become nil in the areas in and around Krunze PHC where the trust is doing focused work" (31st December 2011, Thane).

Dr. Patel also mentioned that since the SNGO had recently started its operations, these changes are mainly because of the MCH project, which was run before the SNGO was launched in April 2011.

Dr. Prakash Damle Khandejad, the Medical Officer of Krunze PHC, mentioned that while it is difficult for him to comment upon the improvements in the RCH indicators brought about by the SNGO, he was convinced that the interventions of the SNGO and earlier Dhawale trust has brought a remarkable improvement in making people understand the importance of Institutional Delivery, as large numbers of people are coming to their PHC, which was not the case earlier. It has also been able to create awareness about homeopathy.

Mrs. Sunanda Jadhav, ANM of the Sub-Centre at Bhopoli which is just in front of Dhawale trust's premises in Bhopoli mentioned that,
"*SNGO has definitely made a remarkable difference in the lives of pregnant women in the area. They are providing free ANC/ PNC checks through mobile vans to women at their door steps. They provide free medicines as well as free Institutional Delivery, as a result of which many deliveries are happening in institutions. Because of their mobile vans and network of CHVs and MPWs, they are able to cover a lot of women, even those whom we miss. They get sonography of women done at Palgarh, which can't be done at government institutions, this itself is a big help to the government*" (19th December 2011, Bhopoli, Vikramgad block).

One of the best outcome of the programme is that it has changed the mind-set of people towards Institutional delivery. Earlier, people believed that for delivery one needs God and not a doctor, people mostly went to a*Bhagat,* who is a local practitioner, but this is changing gradually (Dr. Goda, Director SNGO). This is evident from the drastic increase in the number of Institutional Deliveries at Dhawale's centre at Bhopoli. According to Dr. Sayyed, the MO of SNGO,
"In 2007, only two deliveries were conducted at the Bhopoli centre, while in 2011, it rose to as high as 170" (12th December 2011, Bhopoli, Vikramgad Taluka, Thane district).

According to Mr. Tulsiram, MPW Supervisor of the scheme,
"*Earlier, we only had one delivery in the centre in a month, now we have around 15-20 deliveries per month"* (12th December 2011, Bhopoli, Vikramgad taluka, Thane dist.).

Also, earlier there was no concept of ANC, but now it is coming up as women are realizing the importance of ANC check-up and going for the same. According to the coordinator of SNGO, Mr. Naresh Dhanwa, this has happened not only by the efforts of the SNGO and its team, but is an outcome of the

combined efforts of both the government health workers and the SNGO team. These include the ANM, AWW, ASHA, CHV and MPW. According to Dr. Goda, Director of the SNGO,

"The good outcome of the programme can be assessed not only by an enhancement in the number of ANC registration and Institutional Deliveries, but also from the fact that the weight of new born children is increasing. This is happening because of good ANC. Earlier the average weight of a child would mostly be below two kilogram, but now it is between two-three kilograms. This itself ensures the survival and health of child, and if that is ensured, the villagers would be even comfortable to have two children" (20th December 2011, Thane).

The programme is also working towards creating awareness on services offered by the PHC; hence, there has been an increase in institutional delivery at the PHC as well.

Statements made by the staff of the trust were well substantiated by figures in reports prepared by the SNGO as well as the interaction with beneficiaries of the programme (mentioned in detail in the section on beneficiaries). Both clearly indicate remarkable progress in the area of ANC and Institutional delivery, which is the main focus of the SNGOs work. According to the Quarterly Report of the trust, from July to September 2011, ANC cases in the region has risen from 40.83% (BLS figure) to 85%, Institutional delivery has increased from 28% (BLS) to 65% and home deliveries have reduced from 85% (BLS) to 35%. The remarkable changes in these indicators could not have been brought with just a few months of the SNGOs intervention. The Baseline survey was done in November – December 2009. Hence, it is the interventions made by MCH, and later the AYUSH scheme of ML Dhawale trust that has led to such a remarkable improvement in these indicators. In the next three years, the SNGO aims at achieving 100% in these indicators.

Strengths/Advantages

The greatest strength of the programme, according to the researcher, is the fact that it has been working in the area of RCH for several years. SNGO is just a means of generating extra funds for the existing RCH programme of the trust. This no doubt proves beneficial for the SNGO scheme, as it is able to show remarkable results in just a few months of operations, whereas in reality, these outcomes have been possible due to years of concerted efforts of the trust in the area of RCH. The trust has been able to win the faith within the community due to its work over several years. This also proves to be extremely beneficial for the effective functioning of the SNGO scheme.

The greatest strength of the programme, as mentioned by most of the SNGO staff, is the presence of trained and highly dedicated staff at the grassroots level, including the Community Health Volunteers and the Multipurpose Workers. According to the Director of SNGO, Dr. Goda,
"*CHV is a unique concept of the trust. These are women identified from within the village through consultation with the villagers, and are involved in generating awareness on health issues especially related to RCH, helping women avail ANC care and safe deliveries. Since they are from within the village and know the local language, hence it is very easy for them to reach out to the community"* (20th December 2011, Thane).

The other staff members of the SNGO at Bhopoli are also very dedicated, which adds great strength to the programme.According to Mr. Naresh Dhanwa, the Coordinator of SNGO,
"*This is the only health institution where people get ready for delivery in the OT immediately after the patient calls, this is much before she even comes into the centre"* (19th December 2011, Bhopoli, Thane).

Another strength of the programme is that it operates through mobile van which helps in reaching out to maximum people residing in interior regions. According to Mrs. Anita Madhukar Dhotre, ANM, Mobile van,
"The provision of ANC care through mobile van which moves around the villages each day helps in reaching out to a large section of the society and is a strong point for the programme" (15th December 2011, Bhopoli, Thane).

The programme also draws its strength from linkages that it develops with the local government, which includes the Taluka Medical Officer and Medical Officer of the PHC. This helps the SNGO get additional manpower for its work (Dr. Sayyed Mohammed, MO, SNGO). Linkages with the Panchayat helps the SNGO work more effectively in the village as it is easier to reach out to the villagers through them. Moreover, identification of the CHV or the decision for a spot to park the SNGO van is better done in consultation with the *Sarpanch* of the village. According to Dr. Yashodhar Wadekar, MO of the van,
"*The Service NGO provides a convenient structure to offer health care to the people at a very inconvenient location (unserved and underserved area) which is one of the greatest strength of the programme"* (12th December 2011, Bhopoli, Vikramgad, Thane).

Due to the above mentioned strengths of the programme, it is advantageous to its beneficiaries mainly because it provides complete ANC care, that too at no cost to them. Services provided by the van in the area of ANC care is not provided by any other institution in the region. These include BP check-up, weight examination, stomach examination, blood test, sonography, tetanus toxoid injection, Iron and

Calcium Tablets, etc. Advice is also sought from specialist doctors placed at Palgarh for handling the ANC and delivery as and when needed. The mobile van visiting the villages provides free ANC care and other medications to the people at their doorsteps, and also treats acute ailments. This is a great boon to the villagers as it saves their travel time and money. Also, the van of the SNGO takes women to the hospital for delivery, which again is a great help to them (Gangaram Jeevan Bhoye, MPW and Anita Madhukar Dhotre, ANM, Mobile Van). Besides, the CHVs and MPWs also provide health awareness by holding regular meetings with beneficiaries, wherein knowledge about homeopathy is also imparted to them. They also identify the high risk cases by making regular visits to the homes of pregnant ladies, which otherwise could not have been detected (Dr. Yashodhar Wadekar, MO, Mobile Van). According to the ANM of the sub-centre Mrs. Sunanda Jadhav,

"*The SNGO is able to identify pregnant ladies for ANC care from very interior regions who are even missed by the government. Free Institutional Delivery and awareness generation about the same has raised the number of Institutional Deliveries in the region*" (19th December 2011, Bhopoli, Vikramgad, Thane).

For the NGO, the greatest advantage of the scheme is the additional money that it generates for their RCH work, especially for providing ANC care and Institutional deliveries. Besides, the programme also helps them get the government tag, which gives them name and fame. This also helps in enhancing the NGOs acceptance in the community, which in turn enables them to work effectively and thus win the community's faith (Dr. Sayyed, Medical Officer, SNGO).

Weaknesses/Problems in Implementation

One of the major weaknesses of the programme is the use of homeopathic medicine. Even though allopathic medicines are offered to pregnant ladies under the SNGO scheme, people are hesitant in going to the van or the trust for availing services, assuming that they would be provided with homeopathic medicine. This misconception is due to the fact that the MLDT is associated with the provision of homeopathic medicines for a long time in the area. According to Sunanda Jadhav, ANM of the sub centre at Bhopoli,

"Even though the SNGO is offering such good services, still it is facing some resistance from people due to homeopathic medicine offered by the trust. For homeopathic treatment, the doctor asks a lot of questions which mostly people don't like."

Besides, people do not have faith in the capability of homeopathic medicine to treat illness.

Another weakness of the programme, as observed by the researcher, which was also corroborated by most of the staff of the SNGO, is the mind-set of people, which is difficult to change. People have age old notions about pregnancy and delivery. For them, going to the hospital is not an option, since it is far and transport facilities are poor; hence they depend on locally available sources of treatment. Women in the community try their best to make the delivery conducive for home and do not eat Iron and Calcium tablets, as they feel that these would increase the size of the foetus which would make it difficult for the delivery to be handled at home by the midwife. It is because of this reason that they even eat less during pregnancy, which results in babies with low birth weight, which is the prime reason for Infant Mortality (Dr. Sujata Goda, MD, CHV trainer). Also people have a lot of misconceptions about hospital delivery, especially about epistomy. They feel that if they go to the hospitals, they would be forced to have a C-section (Dr. Sayyed, MO, SNGO). The workers at the grassroots, CHVs in this case, find it extremely difficult to break such myths about pregnancy and delivery, and convince people about the importance of Institutional delivery.

Similarly, on ANC care, they feel that if everything goes well during their pregnancy, they do not need to go for any check-up. They fail to understand the need for routine check-ups for a healthy pregnancy and delivery. Another reason for women to avoid hospital delivery, as reported by Dr. Sayyed, is that there is no one to take care of their homes and kids while they are away in the hospital for delivery. Also, they do not have anyone to stay with them in the hospital during the period of hospitalization. It is surprising to see the existence of such a scenario in the so called 'close-knit' village society.

Resistance from people is also seen in terms of willingness to listen to the health workers. Most grass root level workers complained that people are not willing listeners, and even when they do, they do not understand and have to be explained repeatedly. There have been several instances where people have undergone multiple counselling on the importance of Institutional Delivery, yet they have opted for Home Delivery (Mr. Gangaram & Mr. Kaluram, MPWs). Even though the CHV is from their own village, still many a times, women are not willing to pay heed, stating that they are absolutely happy with home delivery and do not need to know anything about ANC care or Institutional deliveries.

Another reason which acts as a big hindrance for implementation of the programme is the fact that the villagers migrate to the cities in the non-farming season. As a result of this practice, the ANC cases are away for almost six to seven months, and miss their check-ups. Many children also miss their immunization during this period (Mr. Kaluram, MPW). Many a time, the *Sarpanch* of the villages does not take active interest in the programme, whose support is absolutely essential for the smooth operation of the scheme (Mr. Tulsiram, MPW Supervisor).

Besides, the above mentioned weaknesses, which have more to do with people and their mind-sets, the SNGO also face a lot of problems in its implementation because of what they term as ‘government’s attitude’. None of the NGO staff are happy with the budget allocated under the SNGO, and feel that it is insufficient to run such a big programme. In spite of demands made by the SNGO in several forums to raise funds, the government has not responded in the affirmative. Moreover, the money is not released on time. According to Dr. Goda,

“*They have completed more than six months of operations, still the second instalment for the programme has not been released and they are not sure as to when it would be. In such circumstances, it is very difficult for the NGO to run the programme, as they don’t have much of corpus fund. People cannot be denied services as the money has stopped coming”* (20th December 2011, Thane).

The NGO also feels pressurized by the government’s expectations. The very fact that the government expects the SNGO to cover so many indicators on a large population of a 134,000 in Vikramgad, that too within the limited budget and even fewer staff, results in exerting a lot of pressure on the NGO. Also, according to the NGO guidelines, the SNGO has to cover 1 lakh population in the allocated budget, but the population of Vikramgad exceeds the same by 34,000. Thus, the NGO has to cater to an extra population of 34,000 within the same budget, which further increases the burden on them (Dr. Sayyed, MO, SNGO). Explaining this point, the coordinator of SNGO, Mr. Naresh mentioned that,

“*If a PHC with staff strength of 25-30 whose salaries go to 15-20 lakhs per month is expected to cover a population of 51,000, then how can the government expect SNGO to cover a population of 1 lakh within a budget of Rs. 15 lakhs per annum?”*(19th December 2011, Bhopoli, Thane).

Mr. Naresh mentioned that he made raised this issue in one of the meetings of the SNGO in the State RCH Society in Pune. The point was well taken by the Additional Director of the State RCH Society, who has now suggested the SNGO do focused work on two indicators of complete ANC care and Institutional delivery in the most underserved areas. This is the reason why the SNGO is targeting 25 villages in and around the Bhopoli centre falling under the radius of Krunze PHC. Still the SNGO feels pressurized due to the paucity of funds and staff, and is compelled to bank upon other programmes for funding and staffing. This is mainly because there is a lot of pressure from the government to meet the targets, failing which the project would be withdrawn from MLDT.

Besides the above mentioned problems, a major issue as stated by the SNGO, is the lack of autonomy and independence in functioning. The SNGO has to strictly adhere to the government’s guidelines and they cannot take decisions on the type of activities based on the situation in the field. They have to just work

towards achieving the targets set by the government. The SNGO is almost functioning as a PHC in the area, yet it does not have the functional autonomy of a PHC (Dr. Goda, Director, SNGO).

Staff members of MLDT also feel that SNGO is a big burden on them, as they have to do a lot of extra work ever since the programme was implemented. They find the 'report writing work' to be very tedious and time consuming.

The uneven and hilly terrain of the area also makes operations difficult. This, along with poor transport facilities, prevent women from coming to the clinic at Bhopoli on their own. They mostly rely on the van that visits the village or can be called during emergency, for delivery at the centre. Given the limited budget allocated by the government, the SNGO does not have much allowance for transport. Hence, they can only afford to run a single van for delivery.

7.6. CONCLUSION AND SUGGESTIONS

The effort of ML Dhawale Trust in the area of RCH over the past several years is proving to be a great boon to the SNGO scheme which started operations in April 2011. The trust has been operational in this area for a long time; hence the SNGO scheme is able to project remarkable results in terms of ANC and Institutional Deliveries. External entities who are not aware about the ground reality and history of the programmeme, construe that these exceptional results are achieved due to the SNGOs intervention in the past few months. The government being a partner in this programme is also getting credit for this work, without much of a role to play. The already established network of Community Health Volunteers, MPWs and the mobile van has made the operations of SNGO much easier. The performance of the SNGO on the indicators of ANC, Institutional delivery, Immunization and family planning can be assessed by the figures in the quarterly report as well as through interactions with the beneficiaries of the programme.

In spite of performing so well on all indicators specified by the government, the SNGO feels pressurized, as the partnership between the government and SNGO is not on equal terms. The government sets difficult targets for the SNGO and does not give them the flexibility to operate. To make matters worse, it provides them with limited pre-determined funds to manage a massive programme. In order to meet targets, the SNGO has to raise funds from other sources. Under such circumstances, the researcher is not sure as to how long the SNGO would be able to take the pressure and run the scheme, which on the face of it, is a very successful PPP project.

The section below tries to summarize suggestions for further improving the scheme that came across during interviews and FGDs with providers and beneficiaries of the programme, as well as from the researcher's own observations.

One of the suggestions to improve the scheme, as told to the researcher by most of the SNGO staff, was to increase the budget of the scheme, which according to them was far too less for a scheme as big in scale as that of the SNGO (Dr. Goda, Mr. Naresh, Dr. Sayyed). Besides this, the MPWs and the CHVs felt that their salary is too less for the work that they do and should be increased. The same suggestion was also given by Dr. Sayyed, Medical Officer of the van according to whom,
"The salaries of the ground level staff should be increased to enhance their motivation levels to work in the field" (12th December 2011, Bhopoli, Vikramgad, Thane).

Most of the NGO staff also suggested that the funds should be released by the government on time. (Dr. Goda, Mr. Naresh, Dr. Sayyed).

Additional staff needs to be appointed to take care of such a vast project. Similarly, the project infrastructure also needs to be enhanced. The Medical Officer appointed for the scheme should be an MBBS (Dr. Sayyed). More MPWs and CHVs need to be appointed (Dr. Yashodhar).

The work of the CHV in the field needs close monitoring and supervision. CHVs are given a BP instrument, thermometer, torch, weighing machine and stethoscope but they need more training to use these (Mr. Tulsiram, MPW supervisor). The doctors in the van can play a big role in this. During the van's visit in the village, CHVs should be encouraged to help the doctors and check the BP of the patients, measure their weight, temperature, etc. The doctors should supervise them and ascertain whether they are doing it correctly. This can act as an on-the-job training for the CHVs.

Even though the SNGO is doing well in raising awareness in the villages on ANC and Institutional delivery, there is still a lot that needs to be done in these areas, as many deliveries are still being carried out at home, almost to the tune of 80% (Dr. Yashodhar, Mr. Naresh). The information about the SNGO scheme should reach the villagers for which regular meetings may be organized with the community leaders of the villages. The MPWs and CHVs of the SNGO need to contact the Sarpanch, Social leaders, AWW, Police and other key people in the villages, so that a link is established between the village and SNGO (Mr. Naresh, Coordinator, SNGO).

The SNGO should be given the autonomy, similar to a PHC, as it is functioning as a PHC. All funds related to RCH should be given to the SNGO, who should also be given the autonomy of using it at their

own discretion. This would help them in resolving the extra financial burden that the scheme is putting on them. This suggestion was put forth by Dr. Goda, the Director of SNGO. Explaining his point further, he added that,

"*Money for schemes like Janani Suraksha Yojana and Janani Shishu Suraksha Karyakram should be given to the SNGO, as it is taking care of a major chunk of deliveries in that area. Instead money of all these schemes is going to the PHC, where hardly any delivery is happening. Only if this happens can people reap the real benefits of the RCH related schemes meant for them"* (20th December 2011, Thane).

The researcher feels that this is a good suggestion, but cannot be universally applied to all NGOs working in the area of RCH. To operationalize this suggestion, the government needs to develop a fool proof method of determining the credibility of NGOs.

Better coordination is needed between the government and the SNGO. The government officials need to pay field visits to ascertain ground realities and to assess the limitations under which the SNGO is operating. The government needs to play a more active role in the implementation of the project, rather than just take a back seat and dictate terms to the NGO, setting targets for them and putting pressure on them to meet the same. Monitoring by the government should be done by visits to the field, not merely by phone calls and reports sent across through emails.

Beneficiaries of the programme suggested that services offered by the trust can become better if it stops charging the user fee of Rs. 30 for the general health services. They also suggested that the trust should also consider offering allopathic medicines and injections.

As revealed by the FGDs, most women could not avail Institutional Delivery mainly because of the odd hours of delivery and unavailability of means of transport. Hence, either the SNGO or the PHC should arrange for more vehicles to transport women for delivery. An effective measure to combat this problem, which has also been suggested in the guidelines of the Ministry of Health & Family Welfare, would be, setting up satellite clinics in the villages itself where delivery can be conducted. This would help in reducing the cost of the programme, as the expenditure in running the two vans to the villages on a daily basis is high.

Since only one vehicle of the SNGO is available for bringing women from the villages for delivery, many a times, women are not able to get access to the van, as it is busy somewhere else. Hence, the number of vans meant to transport women for delivery should be increased.

FGDs with beneficiaries of the programme revealed that there is a huge unmet need for family planning in the area, especially limiting. In order to meet this need, the SNGO should work actively in the area of family planning as well. They should conduct sterilization camps to ensure the women would not have to wait for sterilization camps to be organized by the government. The SNGO should also take up awareness on temporary methods of family planning and distribution of condoms and pills, as people in the village are hardly aware of the same.

Many women in the villages are not able to avail the benefits of the JSY scheme. The ones who do are not availing the full amount, and they are getting it after a long delay. This problem may be tackled by Dr. Goda's suggestion of making the SNGO an autonomous organization responsible for disbursing the money of all schemes meant for RCH activities, just like any other organization. Even if that doesn't happen, the SNGOs should get involved in making sure that the benefits of such schemes reach the people. The workers of SNGO should help women avail these schemes.

The SNGO scheme has emerged as a good PPP programme, able to successfully achieve the targets set by the government, not only in terms of figures but in actual terms. This was evident by the researcher's interaction with the programme beneficiaries, who are well aware of the scheme, understand the importance of Institutional Delivery and ANC and are also availing the same. However, these have been possible only because of the dedicated work of the MLDT in the field of RCH over the past several years. The problems that prevail in other projects vis-à-vis the role of the government in terms of funds, monitoring and rigid targets, persist in this case as well. The researcher feels that if the above mentioned suggestions are implemented, which are mainly to do with inducing improvements in the government machinery, the SNGO scheme in Thane district will emerge as one of the most successful models of Public-Private Partnership under NRHM in the entire country.

CHAPTER VIII
Discussion and Conclusion

The present study on '*Public-Private Partnerships in Health Services in India: A Study of the National Rural Health Mission in Maharashtra*', is an enquiry into the structure, design and evolution of PPP projects under NRHM across states and across districts of Maharashtra, with a specific focus on Thane district. Maharashtra state has been chosen due to paucity of literature on PPP projects within the state, even though historically it has shown a very high presence of private sector across all levels of care. In order to get insights into the processes and dynamics of these partnerships, Case Study of Thane district was done. This district was purposively chosen on account of being a poor district, not only in socio-economic indicators, but also in infrastructure and other parameters. In addition, majority of the population within the district belongs to scheduled tribes with poor health indicators. For analysis of the major states and Maharashtra, we have relied upon secondary data, while for the case study of Thane district, a primary level enquiry was carried out.

This study looks at PPP projects under NRHM at three levels: first across states, second within districts in the state of Maharashtra and third within a specific district of the state that is Thane District.

PPP projects in Thane district falling under the umbrella of NRHM have been analysed in depth through detailed case study of three better performing PPP projects (as quoted by NRHM officials at the state and district level) in this district. These are the **Sickle Cell Disease Control Programme, Mobile Medical Unit** and the **Service NGO scheme**. All are being implemented under NRHM in partnership with NGOs or Private trust hospitals, but they differ in terms of service provisioning. The Sickle Cell Disease Control Programme is working primarily towards the control of a specific disease which is widely prevalent amongst the tribal population of Thane district. The Mobile Medical Unit provides general health services to the most remote villages where there is no health facility. The Service NGO scheme specifically works in improving the RCH indicators of reducing the IMR and MMR and increasing Institutional Delivery, which is the main objective of NRHM. All these PPP projects are being implemented in interior regions of the district mainly to cater to the main objective of NRHM, which is to take health services to the most unserved and underserved areas.

Information on the above mentioned projects was collected from a host of respondents associated with the programme at each level. It covers both providers as well as beneficiaries of the programme. Providers include officials associated with the programme at the state, district and block levels as well as the staff of the private service provider. Since each programme is unique in its implementation, separate methodology was used for selecting respondents for each programme.

Since SCDCP is being implemented in the entire state, two blocks of Shahpur and Jawhar were purposively chosen, on account of their proximity and distance respectively from Mumbai city, to get a an overall picture of the programme in the district. The other two projects of MMU and SNGO operate in small areas, which were easily covered for the purpose of this study.

8.1. MAJOR FINDINGS AND ANALYSIS

A. PPP projects across states

Across the country, PPP projects were observed in five high-focus states of Bihar, Orissa, Rajasthan, Assam and Madhya Pradesh and three non-high focus states of Kerala, Karnataka and Maharashtra. While the PPP projects in Maharashtra have been looked at in details, those in the other states have been looked at cursorily. Analysis of PPP projects in all these states reveals that post NRHM, a plethora of PPP projects have emerged in the arena of health. This has mainly happened due to enhanced funding made available under NRHM, the utilization of which is easy through initiation of PPP projects, which provides extra manpower to do focus work in a particular area. Another reason for the growth of PPP post NRHM is the fact that the NRHM adopts PPP as an essential strategy for achieving its goals.

While more PPPs have been initiated in the non-high focus states post NRHM, the same is not the case in the high focus states. It was also observed that while projects like Community Based Monitoring, Mobile Medical unit, Accreditation of private specialists for Institutional delivery under *Janani Suraksha Yojana*, Contracting of Primary Health Centres, Ambulance services through Emergency Medical Services and transport services for pregnant women are being implemented in almost all states following the same standard guidelines, the high focus states also show the presence of many innovative projects which are designed in accordance to the needs of the specific state.

Another difference observed between these two categories of states is that while PPP projects at the tertiary level are completely absent in the high focus states, quite a few of them occur in the non-high focus states. It is also observed that while the involvement of the 'non-profit' sector is seen most in providing primary level care, the 'for-profit' sector is involved in providing tertiary level care. One also observes that the most popular model seen for forging partnerships across states is the Contracting Model. In rare cases, Social Franchising and Cross-Subsidization was also seen.

B. PPP projects in Maharashtra State

Maharashtra state is rich in terms of the presence of PPP projects. One of the oldest and most popular models of PPP that exists within the state is the Vadu Rural Health Project that exists in Shirur Taluka of the state. Besides this, most other PPP projects under NRHM have been started recently. These include Community Based Monitoring, Emergency Medical and Referral Services, Health Advisory Call Centre,

Impact India Project, involvement of private specialist organization for providing specialist, *Janani Suraksha Yojana*, MNGO/SNGO Scheme, Mobile Medical Unit, Organization of Epilepsy Camps with the help of Epilepsy Foundation Mumbai, Organization of specialist medical and dental camps through medical colleges in Tribal Hospitals, Palliative Care project, PCPNDT and Sickle Cell Disease Control Programme. While most of these programmes are being run in other states as well, projects like Health Advisory Call Centre (HAAC), involvement of private specialist organization for providing specialist, Organization of Epilepsy Camps with the help of Epilepsy Foundation Mumbai and Impact India Foundation projects are specific to the state of Maharashtra. Most of these partnership projects are forged between two partners using the contracting model. In the yet to be launched project of Impact India with Pfizer India in Thane district, three parties are involved, where two are private and one is public. Also, while in all the projects money is given by the state, in this particular project Pfizer India is funding the up-gradation of the chosen sub-centres. The presence of a third party is also seen in the Emergency Medical Services, where the funding for ambulance is provided by a UK based multinational company.

There is an equal mix in terms of presence of partnerships with 'for-profit' private and 'non-profit' private sector. Out of the 13 PPP projects that exist within the state, seven are with the 'for-profit' sector and six are with the 'non-profit' sector. It is observed that while the 'non-profit' sector comprises NGOs and trust hospitals, a range of actors occur in the 'for- profit' sector which includes Multinational companies, Research Institutes, Teaching Hospitals, Pharmaceutical companies, private medical associations and institutions.

All PPP projects within the state occur at the primary and secondary level, and none exist at the tertiary level. Partnership programmes with the 'non-profit' sector mostly provide primary level care which includes awareness generation in this case; for example, Community Based Monitoring project, Impact India, PCPNDT and Sickle Cell Disease Control Programme. Partnership programmes with the 'for-profit' sector on the other hand are mostly involved in providing tertiary level of care.

Also, while partnership with the 'non-profit' sector is for programmes which are run on a continuous basis, partnership with the 'for-profit' sector is mostly for programmes which are organized on an ad-hoc basis, such as organization of epilepsy camps, medical and dental camps, etc. NGOs, due to their contacts in the field, are sought for programmes being run at the field level, whereas the private sector is preferred for their expertise in the field, whether medical or technical. Another important observation was that while a formal Memorandum of Understanding is signed with all 'non-profit' sector organizations with which partnership is entered into, the same is not the case with the 'for-profit' sector, where many times private doctors are just given an honorarium for their services. This substantiates the point mentioned earlier that partnership with the 'for-profit' sector is more on an ad-hoc manner when compared with the

‘non-profit’ sector. A difference in the attitude of the government towards the treatment of ‘for-profit’ and ‘non-profit’ sector is also seen. While the former is given freedom to operate its projects, the same is not the case with the ‘non-profit’ sector organizations, which are tied with strict rules and regulations for everything that they do.

In terms of distribution of these projects across districts, the 18 tribal districts are the favourite sites for implementation of most of these partnership programmes, mainly on account of these being backward districts with poor socio-economic indicators. These include Thane, Nashik, Nandurbar, Amravati, Gondiya, Gadchiroli, Bhandara, Nagpur, Chandrapur, Wardha, Yavatmal, Jalgaon, Nanded, Washim, Akola, Bhuldhana, Aurangabad and Raigad. Besides these, other backward districts like Beed, Parbhani, Yavatmal, Solapur and Kolhapur are some of the other favoured districts for the implementation of these projects. Projects like the Health Advisory Call Centre (HACC), Accreditation of private hospitals to JSY, Mobile Medical Unit, PCPNDT and Organisation of Specialist Medical and Dental Camps through Medical Colleges in Tribal Hospitals occur throughout the state.

C. Public-Private Partnership projects in Thane district

All PPP projects that exist in the state of Maharashtra are also operational in Thane district, except Involvement of private specialist organization for providing specialist. Besides, few projects like Community Health initiative and Pfizer India Project of Impact India Foundation for up-gradation of Parli and Bilgarh sub-centres and Palliative Care Project are specifically operational in Thane district. This can mainly be attributed to the fact that the district has a large presence of tribal population, which lives in extreme conditions of deprivation and thus draws the attention of NGOs and policy makers towards their health. Proximity to Mumbai and the presence of a large number of NGOs are some of the other reasons responsible for the growth of PPP projects in Thane district. The performance of NRHM, as reported by government officials is one of the best in the district, which can be another reason for the District Health Society, Thane to take up innovative projects in partnership with the private sector. In order to understand the PPP projects in Thane district, detailed case studies of the three most successful PPP projects, as identified by the officials at the district and state level, were undertaken. The findings of these detailed case studies have been summarized in Table 8.1.

Table 8.1: Findings of detailed Case Studies of the three chosen PPP projects in Thane district of Maharashtra				
S. No.	**Programmematic Aspects**	**Sickle Cell Disease Control Programme**	**Mobile Medical Unit**	**Service NGO**
1.	Partners	District Health Society, Thane Navoday Grameen Sanstha, Jawhar	District Health Society, Thane Maharashtra Dayanand Society, Talassari	District Health Society, Thane ML Dhawale Trust
2.	Goal	Prevention and control of Sickle Cell Disease in Thane district	To provide health services to the poor people in the unserved and underserved areas where there are no health facilities.	To achieve Population stabilization by complementing the public health system in achieving the goals of Reproductive and Child Health Programme.
3.	Area of operation	All 11 tribal blocks of the district.	64 villages in Jawhar and Mokhada blocks.	94 villages in Vikramgad block with active work in 25 villages where the mobile van of the SNGO runs.
4.	Process of NGO selection	Invited or negotiated partnership (Newspaper advertisement)	Invited or negotiated partnership (Newspaper advertisement)	Invited or negotiated partnership (Newspaper advertisement)
5.	Reason for selection	Long experience of working in the field of health, reputation of doing good and honest work, contact with the govt. due to the earlier govt. projects.	The trust fulfilled all the criteria for selection and most of all it had an elaborate hospital infrastructure with sound service background which none of the applicants had.	Fourteen years' experience of working in the area of Maternal and Child Health. Also the centre at Bhopoli is well equipped with staff and infrastructure as per the criteria of selection.
6.	Date of Memorandum of Understanding	8th September, 2009	25th July, 2011	25th January, 2011
7.	Duration of the Contract	Eleven months	Eleven months	Three years
8.	Role of the Govt.	Funding, Monitoring, Training, Testing, Diagnosis, Treatment	Provision of van and equipment, funding and planning the van's operation, training and monitoring.	Funding, training and monitoring.
9.	Role of the NGO	Awareness generation	Appointment of staff, running the vehicle on a daily basis as per the governments schedule and	To provide RCH services as per the indicators provided by the government in

			reporting.	the area of ANC care, Institutional Delivery, Family Planning and Immunization.
10.	Target (for 2011)	To test at least 35,192 people; which is 20% of the population and to spread awareness to the entire population at least twice.	To cover 64 villages in Jawhar and Mokhada blocks on a monthly basis.	In the next three years of its implementation, the SNGO targets to increase complete and qualitative ANC care from 40.83% to 90% and institutional deliveries from 28.13 % to 100% and to reduce the unmet need of spacing from 62.34% to 30% and limiting from 15.14% to 7% in 3 years.
11.	Activities	Awareness creation in the community regarding the disease, testing in PHC as well as the camps, counselling and treatment	Provision of Primary health services in the assigned area, which include curative services, first aid, referral services, family planning, antenatal and post natal care etc.	The activities of the SNGO are focused around the four core areas of ANC care, Institutional delivery, family planning and Immunization. ANC and Institutional delivery are however the main focus of SNGO activities.
12.	Future activities	The programme would focus more on ante-natal and neo-natal care and also registration of sickle cell sufferers and carriers to get benefits of the Antyodaya scheme meant for the BPL families.	To cover more blocks and villages within the existing blocks, the van would be better automated, social worker to be appointed at the trust especially for the work of awareness generation.	Stop van services in the nearby villages and instead run it in another set of villages, to focus on family planning and immunization by organizing family planning camps once in a month and by targeting the left out and drop out cases of immunization by coordination with the Health workers and MPW, to raise money from funding agencies and to organize more orientation and awareness camps in villages.
13.	Manpower	NGO team- NGO President, Programme coordinator, Network of volunteers at each PHC, Supervisor in each block.	NGO team- Programme coordinator and other staff of the trust who look after the management of the programme	NGO team- Director of SNGO, Coordinator, Medical Officer, ANM, MPW supervisor, MPW, Community

		Govt. team- Medical Officer, lab technician, ANM at the PHC; TMO, DHO, DPM, District level coordinator, staff at State Health Society looking after the programme, CEO ZP, Mission Director, NRHM, Maharashtra	Vans staff- Medical Officer, ANM, Pharmacist, Lab technician, Driver, Compounder Govt. team- TMO, DHO, DPM, Monitoring & Evaluation officer at district level, staff at State Health Society looking after the programme, CEO ZP, Mission Director, NRHM, Maharashtra	Health Volunteer Van staff- Medical Officer, two to three student doctors, one nurse, one driver and one compounder Govt. Team: MO of PHC, ANM of sub-centre, TMO, DHO, DPM, DRCHO,CEO ZP, Additional Director (State Family Welfare Bureau); Coordinator, Regional Resource Centre; Mission Director, NRHM, Maharashtra.
14.	Financial details	• The NGO receives an amount of Rs.40 lakhs annually in two instalments. • Funds are received by the District Health Society from the State Health Society, who then disburses it to the TMO, who then distributes it to the PHC. The NGOs directly receives the funds from DHS. • Funds are released on time. • Both the NGO as well as the govt. didn't find the programme to be cost effective. The NGO reported of spending much more on the programme than the fund received.	• The annual allocation for the NGO is Rs. 17 lakhs per month disbursed in two instalments. • Fund is received from the Central Government by the State Government who then disburses it to the District Health Society which then allocates the funds to the NGOs. • The programme has just taken off and the time for disbursal of second instalment hadn't come as yet. However, the staff members of the trust doubt that that they would receive it on time. • The trusts staff are sceptical about the cost efficiency of the programme and feel that the amount sanctioned for the programme would be too less for running the same.	• Receives an amount of Rs. 15 lakhs annually in two instalments. • Funds are received by the State RCH society from the central govt. which is then released to the DRCH society, from where it goes to the SNGO. • It is been a few months since the SNGO is due to receive its second instalment. • The NGO is spending far more amount on its RCH activities than what is allocated under the programme. Hence it is not cost effective.
15.	Quality: a. Training	Not much attention is given on training by the government. The NGO is going out of its way to organize trainings even for the PHC staff even though it is the	Training is a weak component of the programme. The van's staff members has just received one day of training.	The Regional Resource Centre located at Family Planning Association of India, Mumbai organizes time to time training for the SNGO staff. Besides, the SNGO

		government's responsibility.		itself organizes an intensive training for its field level staff which included the Multipurpose workers and community health volunteers.
	b. Monitoring	Monitoring is done at various levels by the District Health Society, State Health Society, Taluka Medical Officer as well as the MO of PHC and the Programme coordinator of NGO. The testing and awareness figures are the indicators used for monitoring. It is mostly done through reports and hardly any site visits are made.	DRCHO is the main person responsible for the monitoring of the programme from the DHO office. For the purpose of monitoring indicators like number of villages and patients covered, types of patients, ANC/PNC checks, referrals made to higher institutions, lab tests done, halts, time spent in each villages and account statement etc. are looked at through monthly reports. Site visits are made in rare cases.	Monitoring is done by the District RCH society and the State RCH Society by assessing the progress made in and around the core issues of intervention which includes the ANC care, Institutional delivery, Immunization & FP. Reports prepared by the SNGO are the only monitoring tool; no site visit is made.
16.	Equity	Equity of the programme is questionable as very few people in the interior villages were aware about the disease and the disease control programme. Awareness about the disease is much more among people residing in PHC villages. The reasons for this can be many, which include lack of sufficient and motivated staff, lack of travel facilities to go to the interior regions, rigid mind-set of people, etc. Also the awareness levels in Jawhar block were more than that in Shahpur block; the presence of NGO can be a reason for the same.	The programme has been designed mainly to ensure that it reaches out to maximum people in the most unserved and underserved areas of the district. Hence, Jawhar and Mokhada blocks which are known for its poverty and deprivation have been chosen for the van to provide its services. Therefore, the Programme can be considered as equitable, which the main reason for its operation.	The equitable nature of the programme can be assessed from the fact that almost all villagers covered in the FGD were aware about the trust and its activities and were accessing the same. Equity is ensured mainly by virtue of the Mobile Medical van which provides services in the interior villages. MLDTs reputation of doing good work in the community as well as the government tag helps the programme to reach out to maximum people.
17.	Replicability	Similar programmes to control the disease is being run in some states like Gujarat and Chhattisgarh and more may be started in other states as well. In case the programme is replicated elsewhere, the government should address issues like enhancing the funds, setting up more achievable targets	The programme is considered as a very successful PPP model under NRHM and has been replicated in almost all the Indian states. Issues like finance, supply of drugs and equipment, effective training and monitoring are critical and need to be taken care of in case the	The programme is being implemented in most of the States under RCH II on account of its success. Issues like enhancement of funds, setting up of reasonable targets for the NGO and more effective monitoring needs to be given a serious thought by the government before

		and getting more involved in the implementation of the programme, especially on aspects like monitoring and training.	programme is being replicated elsewhere.	it is replicated elsewhere.
18.	Sustainability	In order to continue testing at the PHC, the programme needs governments support and funds. Hence the programme is not self-sustaining; the NGO however mentioned that they would continue spreading awareness about the disease in the community even if the government stops its funds.	The programme is not self-sustaining as the cost of running it is too high and cannot be continued without government funds.	The scheme can sustain itself in the absence of government funds by generating funds from other sources. SNGO is a part of the larger MCH programme being run by ML Dhawale Trust.
19.	Outcome of the programme	The programme has been able to create some awareness about the disease and has identified sickle cell carriers and sufferers and offers them treatment.	Since the programme has just started and many services are yet to be provided in the van, it is too early to comment upon its outcome. However, providers as well as beneficiaries were happy with its operations so far.	The interventions of the trust have resulted in an increase in the institutional delivery in the area. There has also been a remarkable increase in the number of women seeking ANC care.
20.	Experience of the Providers	The NGO's staff feels pressurized by the targets set by the government. They also get frustrated by the lack of cooperation by the government staff wherein the PHC's staff members give much more importance to other national health programmes. The lack of decision making power, low funds and apathetic attitude of the government towards the NGO makes the staff feel stifled at times.	Both the staff at the level of the trust as well as the van did not seem to be happy being associated with the programme, mainly because a lot of pressure was put by the government vis-à-vis the implementation of the van (the target of covering 54 villages in a month is too much to be achieved). Also, the programme has enhanced their work load. The reporting work is very tedious. The staff of the van found it draining to travel to such far off locations on a daily basis. They were also not happy with their salaries.	The trust's staff members were happy being associated with it as they had joined the trust at very humble positions and have now risen up the ladder; however they do feel pressurized by the work of Service NGO as it has increased their workload manifold. They also felt pressurized by government to achieve the targets. Some of the lower level staff members were not happy with their salary.
21.	Experience of the beneficiaries	On the whole, awareness about the programme in the chosen villages was found low. Awareness level in Jawhar block	The villagers were not aware about the schedule of the vans visit, but on the whole, they were very happy about the fact that the van is coming	Most respondents of the study had heard about the trust and had accessed its services at some point or the other. They

		is more than in Shahpur. Hence the proximity to the private service provider has some impact on the implementation of the programme. Satisfaction level of beneficiaries with the programme is quite high since the programme provides good services and that too for free.	to their villages and providing health services at their doorsteps that too free of cost. This saves them from the hassle as well as the cost of travelling to the health facilities. They wanted the van to visit their villages more frequently and provide more services like IV, lab tests and other kind of emergency services.	were largely happy by the services provided by SNGO, especially in the area of RCH. However, they didn't prefer SNGO for general health services as they did not have much faith in the homeopathic medicine offered by the SNGO. Also they had to pay some money to access these services. The beneficiaries were particularly happy by the services provided by the van at their doorsteps, that too at no cost to them.
22.	Strengths of the programme	Involvement of local people in the form of volunteers is one of the greatest strength of the programme. The programme also derives its strength from Partnership with NGOs due to which it is able to reach out to maximum people in terms of identifying and curing the illness.	The greatest strength of the programme is reaching out to the poor and needy, providing them good services, improving their health status and creating an awareness among them on health issues and that too free of cost.	Presence of trained and highly dedicated staff at the grass roots from within the community including the Community Health Volunteers and Multipurpose workers. The MCH programme being run by the trust since a long time in the community has helped the programme project the achievement of big targets; hence it's a big strength for the scheme. The running of Mobile van in the interior villages and the linkages with the existing govt. institutions are some of the other strengths of the programme.
23.	Weaknesses	• Shortage of manpower • Lack of cooperation from the villagers for awareness generation. • Insufficient equipment like testing kits and refrigerator for blood sample storage. • Shortage of funds for the programme/lack of travel allowance • Pressure to achieve targets by the govt. • Low salary and lack of long term job	• Unavailability of drugs and equipment in the van. • It takes a lot of time to reach these villages due to their far off location, which exhausts the van staff. • Lack of motivated staff due to the difficult nature of job, long working hours and low salary. • Lack of sufficient funds to run the programme	• Use of homeopathic medicine prevents the programme from getting the desired acceptance. • People have age old notions about pregnancy and child birth, which are very difficult to change. • The villagers migrate to cities for almost a span of six months, which prevents them from receiving complete ANC care as well as

		security for the staff. • Lack of interest by the govt. • Unequal power relations between the two partners, which makes the NGO feel stifled at times.	• The NGO suffers from lack of autonomy in decision making. • Lack of cooperation from field level government staff in the implementation of the programme. • Lack of awareness among the villages regarding the date and time of the vans visit.	immunization. • Lack of sufficient funds for the programme. • Pressure of performance from the government. • Lack of autonomy and independence in functioning. •
24.	Suggestions to improve the programme	• More testing equipment be made available • Enhancement of fund and manpower • Increase the salary of the NGO staff to enhance their motivational levels. • Use of innovative strategies for awareness generation. • Involvement of government staff for awareness generation. • More focus to be given on training by the govt. • Onsite monitoring by the govt. • Enhance the government's involvement in the programme. • Vehicle to be given to the volunteers to facilitate the awareness generation process. At least a cycle would do.	• Funding for the programme is not sufficient and should be enhanced. • Staff to be sent on the van on a rotation basis, to relieve the pressure on the same set of staff. • The Trust to be involved in planning rather than just act as an implementing body. This would enhance the sense of ownership towards the programme. • The number of villages to be covered in a month is too many and should be reduced. or else more vans along with staff should be commissioned to scale up to the requirements • The van to be sufficiently equipped with medicines and equipment. • More focus to be given on training and onsite monitoring by the government to enhance the quality of the programme. • Van should visit the villages on a fixed date and the villagers should be made aware about the same.	• Enhance the budget for the programme • More staff to be appointed to run such a large scale programme. • The work of the CHV needs close monitoring and supervision. • Coordination to be developed between the government and SNGO. • The government staff to pay field visits to understand the field situations. • SNGO to arrange more vehicles to bring women to the health facilities in order to enhance institutional delivery. • The SNGO should also take up family planning work actively as the study revealed a huge unmet need for family planning in the area. • SNGO should also take up the cause of making the benefits of JSY reach the BPL women.

An analysis of the existing PPP projects under NRHM in Thane district shows that most of these projects have been initiated recently, are based on contracting model and are aimed at providing primary level care. Partnership is mostly with the 'non-profit' sector, which includes the NGOs or trust hospitals, to build inroads in the community and to increase the outreach of the programme. Partnerships with the 'for-profit' sector are few; the purpose for the same is mostly to seek technical support and medical expertise. Also, some of these projects are run on an ad-hoc basis, like organization of epilepsy camps or medical-dental camps, whereas partnership projects with the 'non-profit' sector are being run on a continuous basis.

Also it was observed that, while partnership with the 'non-profit' sector was always forged by signing of a MOU, the same was not the case with the 'for-profit' organization. This also communicates the fact that in case of partnership with the 'non-profit' organizations the government sets the terms and conditions, whereas in case of partnership with the 'for-profit' sector the private body sets the terms and conditions and the government follows the same. During interviews, the researcher could also notice a stark difference in the attitude of the government officials towards partnership with the 'non-profit' sector and 'for-profit' sector. While in the first case, the government felt that they are doing some kind of favour by entering into partnership with the 'non-profit' sector, in the latter the attitude was that the private sector is doing a great favour by entering into partnership with the government sector. The involvement of the non-profit sector in the PPP programmes was observed by Ms. Indavi Tulpule, who mentioned that,
"PPPs create opportunities for the private sector to earn more money. In earlier times (25-30 years ago) all private doctors would compulsorily provide honorary service in government hospitals as a part of their responsibility towards the community. Now all doctors do not do this; only a few who do not have a good practice come to the government hospital for practice. They use their premise, staff, infrastructure, goodwill and earn money. They are given as much money as desired by them, and there is no monitoring on their service quality, as they are at a higher level and are considered to do noble work by helping the government sector" (21st January, 2012, Murbad, Thane).

PPPs are widely being studied and debated by scholars across the globe who are trying to analyse whether it is an effective instrument for strengthening the public provisioning of health services and whether it is better than purely public or purely private provisioning of health services. This section tries to analyse the effectiveness of PPP as a tool in delivering good quality health care to the masses on the basis of the case studies of the three chosen PPP projects in Thane district of Maharashtra. Besides, it also tries to draw similarities and differences between these projects and analyses their effectiveness in being able to work synergistically with the government to provide the Public Health goals of equity, efficiency and quality.

Analysis of these three projects throw light upon a lot of critical issues vis-à-vis the implementation of these programmes, which if taken care, will not only help in improving these three programmes, but can also provide lessons for implementation for all existing PPPs under NRHM across the country. Discussions in this section have been broadly put under the heads in which these partnership programmes were studied:

***Goal of the Partnership*:**

All these partnership programmes operate on the basic premise of providing good quality health services to the underprivileged section of society residing in the unserved and underserved areas. They differ from each other in terms of the type of services provided. The researcher probed various stakeholders of the programme to assess the difference that exists between the goals of the public and private sectors, but could not observe any. This is mainly because these partnership programmes are mostly with the 'non-profit' sector which largely operates with the goal of serving society, and hence is similar to the Public Health Goals of equity, efficiency and quality.

However, studies on PPP mostly with the 'for-profit' sector reveals that there often exists a clash of goals/interests between the two partners. While the public sector focuses on welfare, the private sector works for profit. This clash of interests between the two partners does have repercussions on the comprehensiveness of the programme. As pointed out by Mc Pake & Banda (1998), though the private sector can complement the government's efforts and in some cases, even do it better, yet it cannot lead the health sector in a direction which is likely to maximize its contribution to the health of the population. Some critiques of PPP have a different opinion, they feel that the private sector can never complement and enhance the role of the government.

The private sector and the government sector are opponents in terms of health care provisioning, hence if the private sector complements and strengthens the government provisioning then it would lead to diversion of their clients, which would definitely affect their profit motive. However, findings of the present study contradicts this view, as in all these projects the private party is complementing and strengthening the role of the government and helping them to deliver good quality health care for the masses. Hence, this may be true for the 'for-profit' private sector but not for 'non-profit' private sector.

Though the government and private partner were found to share similar goals, the private partner was uncomfortable with targets set by the government, which according to them were unachievable. This problem was reported in all three programmes. In SCDCP, the targets for testing and awareness as set by the government is high, while in the case of MMU, the number of villages that the van is expected to

cover by the government is difficult to achieve, mainly due to the difficult terrain and far off locations of the villages. Similarly, in case of SNGO, the targets for ANC coverage, Institutional delivery, Family Planning and Immunization as set by the government are too high.

These targets, which are also clearly mentioned in the MOU, put a lot of pressure on the private partner, the failure of which may even amount to termination of the contract. Similarly, the extension of their tenure also depends upon the achievement of these targets. Hence the private partner is compelled to compromise upon the quality, and is often found to use unethical practices to meet these targets; for example, in the SCDCP, in order to meet the targets set for testing, tests are being conducted by NGO volunteers who are not technically qualified. Similarly, in case of MMU, the researcher observed that in one of the villages, the van actually examined fewer patients, but in the register, they reported seeing a lot more patients. She also observed one of the villagers handing over a list with some names of villagers to the driver of the van. The SNGO was not seen to adopt any foul measure to achieve targets as it is actually able to do the same, mainly on account of having worked in the area on similar issue since a long time. Besides, they utilize their own staff and infrastructure for the programme.

***Nature and Duration of the contract*:**

Almost all partnership projects studied for this thesis are based on Contracting Model, ‘Contracting-In’ in this case, where the government hires an outside agency on a temporary basis to provide services (GOI, 2006). Contracting model is the most common model for partnership across the globe. This was also observed by Baru & Nundy (2008) in her analysis of PPP projects across the Indian States, wherein she found out that most PPP programmes are either based on ‘Contracting-In’ or ‘Contracting-Out’ of services.

Most of the studied partnership programmes are for eleven months duration, except the SNGO scheme, which is for three years.[16] Contract duration of eleven months makes the private partner insecure and prevents them from getting fully involved in the programme. They even cannot make long term plans vis-à-vis the programme. Involvement of the private partner in the SNGO programme was seen much more than the other partnership projects, mainly because their tenure was for a longer duration. Besides, the vulnerability of the private partner gets enhanced from the fact that the power to extend or terminate the MOU solely lies with the government and they do not have any say in it. The same issue has also been mentioned by Baru & Nundy (2008) according to whom,

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[16] Almost all partnership projects in Thane district was for 11 months, except SNGO which is for three years, mainly because the SNGO are governed by separate guidelines prepared by the Ministry of Health and Family Welfare at the central level, while all the other projects are governed by the District Health Society by the directives given by the State Health Society.

“The duration of the MOU is for a short period of time and the power to extend it or terminate it lies solely with the government. This clearly shows that the power rests with the government, and creates a sense of insecurity in the minor partner” (p. 68).

The government expects the NGOs to fulfil all targets in a short duration of 11 months. It ignores the fact that delivering results within the community cannot happen instantly. It takes years of work and sustained effort to gain inroads within the community and to get their support to start any new activity. Also, as mentioned earlier, the pressure to perform as well as to achieve the targets is very high among the private partner, mainly to get their short tenure extended.

A different viewpoint was shared with regards to the duration of the contract by the DHO of Thane district, Dr. R.V. Kadam, according to whom the NGOs themselves are not interested in long term projects, hence the government is unable to hand over long duration projects to them, which acts a disadvantage for them.

Partner Selection:

The process of selection of the private partner was studied in great detail in each of the three PPP projects. The NGOs were selected through the process of invitation or negotiated partnerships, also termed as competitive negotiation, wherein the government invited proposals through advertisements in newspapers. Several criteria were set for the selection of the NGO. The NGOs experience of working in the field of health and their sound financial background were taken as essential requirements for selection. This form of partner selection based on the NGO’s capabilities is much better than competitive bidding, wherein the government selects the lowest bidder for obvious reasons and this eventually hits the quality of delivery and service. Venkatraman & Bjorkmann (2006) also felt the same on the basis of their analysis of 16 PPP projects across nine states of the country. According to them,
“In the tendering process, the government invariably chooses the lowest bid. While seemingly economical for the government in the short run, after some time the contractor would expect an upward revision of tariffs or incentives. In the absence of these, the contractor is unlikely to deliver services in the same level of quality or effectiveness as on the beginning of the contract” (p. 11).

Hence, these partnerships are definitely better, as the NGOs do not quote any price for the project; they are selected after a series of steps wherein a great deal of importance has been given to the NGOs reputation, experience, infrastructure availability, finances, etc. This is important for maintaining the quality of PPPs as a strong private partner is essential in delivering good services, since they are the ones involved in service delivery. The government is particular in selecting an NGO with a sound financial

background, so that the NGO is able to run the show even if there is a delay of fund provision from the government, which happens many a times. This view was also expressed by Mr. Vikas Kharge, MD NRHM, who mentioned that,

"Wrong selection of the private partner can prove to be detrimental for the partnership. If the private partner is not financially sound, then it will start bleeding. In the sense there would be a compromise on the quality for the sake of cost cutting and hence the performance would be affected" (26th January 2012, State Health Society, Mumbai).

The need for having a well-functioning and efficient private partner for the efficiency and effectiveness of any partnership programme has also been expressed by scholars working in the area of PPP. According to Maurya (2012),

"If private sector is as inefficient as the public sector then partnership will not bring any gains. In many developing countries private sector is very much unregulated, has unethical practices and is not found to be efficient. A poor performing, inefficient and exploitative private sector, under poorly designed and monitored PPPs will further become opportunistic and exploitative bleeding public sector resources"(p. 9)

This is the reason as to why Baru in her analytical paper on PPPs in NRHM has raised concerns about the availability and quality of private sector, more so because NRHM is operational in some of the poorest districts of the country, where the formal private sector is virtually absent (Baru, 2005).

This concern, regarding the availability of private partner, raised by Baru, was observed to be true in the studied PPP projects. Very few NGOS were found to fulfil the selection criteria mentioned in the government's advertisement. NGOs usually worked on a small scale and lacked the budget and financial infrastructure that the government required from the private partner. Hence, a very small pool of NGOs were found to qualify the selection criteria, which reduces the choice and also gives room for manipulation and corruption in the selection process. This was also brought forth by Baru & Nundy (2008) in her analytical paper on PPPs, according to whom,

"Given the small pool of potential partners, the process of partnership selection is often mediated through money and political patronage in the award of contracts. This is a major constraint in building effective partnership" (p. 67).

Corruption involved in the selection of the private partner was reported both by the government as well as the NGO partner. The director of SNGO, Dr. Goda, mentioned that,

"The NGOs usually bribe officials at the State Family Welfare Society to get the SNGO scheme. We got selected by chance just on the basis of our merit, mainly because there was a lot of pressure on the State

RCH Society from the Central Government, who expressed that the SNGOs are not delivering good results in spite of so much money being pumped into the project. Hence the coordinator of the State RCH Society wanted to select an NGO which would do good work" (20th December 2011, Thane).

Corruption in the process of NGO selection even puts off the government officials, as they get pressures from various quarters for selecting the NGO. This is the reason why the Sickle Cell Disease Control Programme has stopped partnering with NGOs in the newer districts where it is starting the programme, and instead they are trying to implement the programme by involving the ASHA workers and ANMs at the village level. The reason for this, as expressed by the Quality Control Officer of the Programme, Dr. Saranya is,
"A lot of politics happens in the NGO selection. NGOs try to use their clout for influencing the government for selection. The NGOs that are not selected do a lot of bad mouthing about the government as well as the NGO that is selected. Hence in the newer districts, we are doing away with the NGO involvement" (25th January, State Health Society, Mumbai).

However, most government officials were of the opinion that the process of NGO selection is quite transparent and stringent, as it passes through various stages. Similarly, all private partners of the chosen PPPs reported that they were selected primarily on account of their good work in the area and they did not use any political pressure, clout or money. However, the researcher doubts that this may not be the case.

Designing of the Contract

Some partnership programmes in Thane district were found to exist without any contract, like the Community Health Initiative of Impact India Programme and Organization of specialist medical and dental camps. A formal Memorandum of Understanding exists for all three chosen PPP projects. In case of SCDCP and MMU, the private partner was not involved in framing of the MOU. However in case of SNGO, the NGO partner was involved. The participation of the private partner in designing the partnership programme was found to be minimal in most partnership projects across the country. Baru & Nundy (2008) mentions an instance, where a NGO had drafted the agreement which was subsequently rejected by the government, instead the MOU was drafted by the government which did not take into account the concerns raised by the NGO for accountability, governance and sustainability.

A closer look at the MOU of these partnership projects brings forth the skewed power equation between the two partners, where the terms and conditions of the entire partnership is laid down by the government. Even if the NGOs are involved in framing of the MOU, their presence is namesake, since they have no say in designing of the Terms of Reference (TOR). In all these MOUs, the government is referred to as the 'first party', and the private partner is referred to as the 'second party'. This is another indication of

the skewed power equation between the two partners. Also, the power of termination of the contract solely lies in government's hand, which gives them absolute control over the programme.

It is also seen in the MOUs, that while the roles and responsibilities of the private partner are described in details, those of the public partner are not mentioned much except their role in funding and monitoring. The other roles of training and capacity building are not mentioned anywhere in the agreement. Also, while the non-compliance of the roles of the private partner means termination of the contract, the MOU does not suggest any action in case of non-compliance of the roles of the public partner. Also, the NGOs should at least be given one chance for improvement; the clause of termination of the contract due to non-compliance of a single term is very brutal. Similar observations were made by Baru & Nundy (2008), according to whom,

"None of these MOUs have worked out rules for noncompliance with the agreed outputs except for the termination of the contract by the government" (p.67).

Another interesting fact that is worth noting is that all these MOUs mention the government to have ownership for these programmes. This has been done mainly to make the government accountable for the programme and prevent them from taking a back seat in service provisioning, which is their prime responsibility. However, this should not be the case, because if the private partner does not have a sense of ownership for the programme that it is running, then it would never be motivated enough to give its 100% to it. This would have repercussions on the quality and efficiency of the programme in the long run.

Another fact mentioned in many MOUs is that in case there is a delay from the government in fund disbursal, then the NGO should be able to manage the running of the programme on their own and the amount would be reimbursed to them later. However, it has nowhere been mentioned that the government should justify the delay of funds and should make arrangements for the early disbursal of funds, or that measures would be taken against the government in the event of non-release of payments. The same point has also been made by Venktraman & Bjorkmann (2006), who say that,

"In the existing partnership agreements, there is no mention of the timely release of the payments or in the event of non-release of payments, the consequences thereof" (p. 10).

Hence the MOUs of these partnership programmes give a lot of power to the government and show a considerable presence of the government in initiating, defining and monitoring these partnerships (Venkatraman & Bjorkmann, 2006).

Role of the partners

In all the partnership programmes studied, the government's role can be broadly placed as that of the funder and the NGOs role is that of a service provider. In an ideal partnership programme, there should be a balance between the roles performed by the partners. However, in case of the partnership programmes studied for this thesis, it was seen that the NGO is performing many more roles than the government. In fact the government was seen to pass on all their responsibilities to the private partner. A good example of this is the SCDCP programme, wherein the government is expected to do much more than the NGO as the MOU spells out the government's role in providing funds for running the programme, training of the staff, testing, diagnosis and treatment, while the NGOs role is limited to awareness generation. However, in reality during the course of implementation of the programme, the government has withdrawn itself from all its roles and passed it on to the NGO. The NGO has ended up doing the testing, training, staff selection along with its original role of awareness generation. Hence the entire responsibility for running the programme has fallen on to the NGO, while the government has limited its role to that of a funder. This no doubt has put a lot of burden on the NGO. To make matters worse, the government is constantly setting targets which, according to the NGO partner, are unachievable.

The mere fact that the government is funding the programme gives them the power to control the entire programme and act as a watch dog. Since they fund the programme, they easily get away with not performing their other roles. There is no one to monitor their work, no one to question them. Hence some kind of a monitoring or regulatory body needs to be formulated for these partnership programmes. It was also observed that the government is not happy with their single role of funding and feels that the private party should also be involved in funding. The MD NRHM, Mr. Vikas Kharge, mentioned that,
"We cannot consider SCDCP as a PPP, as we are giving the entire fund and guidelines for the programme while the NGO is just implementing it. We could call it a partnership only if NGO is providing the funds as well. Hence, the NGO should also involve themselves in the funding process" (26th January 2012, State Health Society, Mumbai).

Also the researcher feels that splitting roles between the government and the NGO affects the comprehensiveness of the programme, which in turn has an effect on its effectiveness. There is a tendency to pass the responsibilities; nobody is actually willing to take the ownership of the programme. For example, if the programme fails, none of the partners are willing to take the ownership of the same, and thus do not make improvements for future implementation. According to the researcher, different roles should be shared equally by both partners to make the partnership programme successful. This is the only way of ensuring accountability between the two partners and ensures cohesive action for the successful implementation of the programme.

Coordination between the partners

Both the private as well as the public partner reported good coordination between the two. Further probing, however, revealed that this was not the case, as both partners had a lot of problems with each other. Most of the NGO staff of the chosen PPP projects complained of bad behaviour by the government staff, who were often rude and disrespectful towards them. They also reported that they are inconsiderate towards them and their issues. Many a times, they are called for meetings at a very short notice, which makes it difficult for them to execute other planned work, but they have no option but to attend the same.

The government staff on the other hand, had some other problems with the NGOs. As expressed by the DPM, Thane district, Ms. Reeta Gaikwad,

"The NGO staff always wants to take the entire credit of the work done. They have a tendency to project that they are doing all the work and the government is not doing anything. Hence, we try our best to implement all the projects on our own and not employ NGOs" (10th December, 2011, Thane).

According to Dr. Kadam, DHO, Thane district,

"The NGO should work in coordination with the government, which they do not do, they work independently many times" (10th December, 2011, Thane).

Hence, interactions with the private and public partners revealed that the two are rivals to each other, always complaining about and trying to find faults in each other. Partnerships like these, which are short of respect for each other, would not be able to sustain themselves in the long run. In order to be successful, the partnership programmes should follow the suggestion made by Annigeri et al. (2004) according to whom,

"To ensure that the PPPs are successful it is important to provide an environment that is both encouraging and enabling. The two partners should learn to look at each other as colleagues and not adversaries. This requires education about the attributes, qualifications and contributions of both the partners as well as an honest and sincere discussion about concerns with mutual agreement on their resolution" (p. 46).

Quality: Training & Monitoring

The maintenance of quality of these partnership projects are the responsibility of both the private as well as the public partner. The private partner can ensure this by maintaining the quality of services provided, while the public partner can ensure this through training and monitoring. The provision of good quality services is largely determined by training and monitoring by the government. However, interaction with

the stakeholders of the studied PPP programmes revealed that the government is not paying much attention to both these aspects, as a result of which the quality of services delivered, is suffering.

Training of the staff is critical in their performance. However, in all three partnership programmes, the government was found to have organized training only once and that too during the initiation of the programme. As reported by the staff (both Government and NGO) working in these programmes, this training was not of a good quality and led to no substantial value addition to their knowledge and skill base vis-à-vis the implementation of the programme. In SCDCP as well as the SNGO scheme, the NGO partner was found to organize the staff training on their own initiative, mainly to ensure the quality of the programme. However, in case of MMU, no such initiative was being taken by the private partner, which had a clear impact on the knowledge and levels of motivation of the staff. In fact the staff of the Mobile Medical Van can be rated as the lowest amongst all three PPP programmes in terms of their knowledge about the programme as well as motivation to perform, as a result of which the quality of services being offered by the programme is affected. The lack of motivation of the staff is so high in this programme that the private partner is planning to stop the programme, if they do not get motivated staff in the future. Hence, training was found to be the weakest component across all PPP programmes and the government is solely responsible for this.

The other important responsibility of the government is that of monitoring. Monitoring of the studied programme is usually done by the concerned official at the District Health Society as well as the State Health Society. Reporting is the most common tool used for this. The NGO partner prepares detailed reports on the basis of indicators given to them, and submits the same to the government officials on a monthly basis, mostly via e-mail. The government officials are also expected to make field visits to assess the situation themselves; however, as reported by the NGO staff, they hardly do so. The staff of the NGO also mentioned that because of this reason, the government remains oblivious to the problems that they face in the field. They also mentioned that if the government would know the ground realities, they would set realistic targets for them to achieve. Prakash and Singh (2006), in their study on the outsourcing of health care services in Rajasthan, had a similar observation. According to them,
"Monitoring of activities of the contractor is usually dependent on paper based reporting and site visits to some extent" (p. 6).

Maurya (2012) observed that,
"Monitoring to ensure the quality of care is mostly absent among all the studies on PPP right from the Mills (1998) analysis of contracting of ancillary hospital services to Bhat (2007), Venkatraman (2009) and the recent analysis of tertiary care by PHFI (2011)" (p. 27).

Hence, in the absence of proper training and monitoring, the quality of these programmes is questionable.

Equity, Replicability and Sustainability

Equity is one component of the programme where a big gap was seen in the version of the providers and beneficiaries of the studied PPP projects. While providers of all the programmes reported that they are able to reach out to the masses in the interior regions, the same was not reflected by the interaction with beneficiaries at the field level.

Case study of the three PPP projects in Thane district revealed that even though they are trying their best to provide good quality health services in the unserved and underserved areas, still they are not able to reach out to the maximum people. This is reflected by poor levels of awareness among the community regarding the programmes as well as its activities. The main reason for this is the fact that these programmes have been started recently, and awareness generation is an activity which requires several years of intervention. Besides, they do not have sufficient manpower and funds for awareness generation. The only programme that has been able to build inroads in the interior regions is the SNGO scheme, which is because it has a long history of working in the area of RCH in the given community. Hence, awareness levels created among the community regarding Institutional delivery, ANC and other aspects of RCH is not a result of a few months of intervention of the SNGO, but it is an outcome of years of concerted and dedicated work done by the trust in the community. Also, the SNGO is utilizing the funds and manpower meant for its other programmes for fulfilling the uphill task of awareness creation and service delivery. On the whole, it can be concluded that the PPP programmes are not able to reach out to all segments of the society, which is the prime goal of the design of these partnership projects. Hence equity is a source of concern in all these programmes.

In contrast, the outreach of other government programmes like HIV, Polio and JSY was found to be far better, as even people in the interior villages were aware about these programmes. Hence one can say that government programmes are reaching out far better to the people than the PPP projects. If this is the case, the question of why we need PPP projects at all is pertinent.

Each of the three PPP projects is being implemented all over the country. These projects are constantly being replicated in some or the other location, within and outside the state of Maharashtra. However, each region has its own specific need as well as different socio-economic environment, hence the same model of partnership should not be replicated everywhere. The socio-economic and geographical fabric of each region should be taken into account while replicating the partnership programmes. Also the lessons learnt

in the implementation of each of these programmes should be kept in mind before replicating it in a new area.

Sustainability of these projects depends upon the flow of funds. The NGOs would definitely find it difficult to run the programme without government funds. However, the staff of SCDCP mentioned that they would continue the awareness generation work, which can happen without government funds. Testing, on the other hand, can be done by the government staff at the PHCs, if they want to. Since the cost of running the MMU is very high, the staff of the private partner running the project mentioned that they would have no choice but to stop in the absence of government funds. However, the staff members of the private partner running the SNGO scheme were most confident about their ability to run the project, even in the absence of government funds. According to them, the SNGO is only contributing a part of their funds for running the MCH programme, which was in execution even before they started receiving funds from the SNGO. In future, even if they stop getting funds for SNGO from the government, they would still run the MCH programme by generating funds through other sources. The success of any project depends upon its sustainability; hence these programmes should be able to generate their own funds in the long run.

Financial Details

The private partner of all three PPP projects shared that the funds received from the government is far too less than what is needed to run the programme, and that they had to generate additional funds to run the programme. Hence, the programme leads to a drain in their resources, as a result of which the partnership programmes were not found to be '*Cost Effective'* from the point of view of the private partner. This is reflected in the statement made by Sister Mary John, Manager of the Dayanand Trust, the private partner running the SNGO scheme, according to whom,

"As a trust, we are not gaining much from the partnership, especially in monetary terms, as till now we have to also spend money from our own pockets for the programme. Instead, the programme has created a lot of extra work for us and is consuming a lot of our time" (17th November, 2011, Talassari, Thane).

Researchers on PPP mention that PPP projects are not cost effective, both for the NGO as well the government, as the cost of selecting the private partner, its capacity building and monitoring is very high. Besides, the government has to also pay the private bodies for services that they offer. Hence, the proponents of this theory advocate that it is much more economically viable for the government to run the project on their own by building their own capacities, rather than entering into partnership with private parties.

It is important to note that in spite of the fact that the project is not cost effective for all private partners of the studied PPP projects, they still wanted to continue running the programme because of the name and fame that they get by being associated with the government, which also helps them in gaining more acceptance and respect within the community. They also believe that the government tag would help them in getting projects from foreign funding organizations in the future. Some of the private parties felt that through this project, they have developed contacts with the government, which definitely helps them in getting their other work done. This corroborates to what has been mentioned by Coghill & Woodward (2005), according to whom PPP projects can benefit the private partner by helping them generate additional benefits and favours like tax-credit through their political connections. Along with all these benefits, the project also gives the private partner the satisfaction of doing good work for the society, which is the prime motive with which they operate. However, none of them seem to be a reason strong enough for making the NGOs work by spending money from their own pockets. There might be other reasons as well which the private partner might not have shared.

The inadequate funds provided by the government for these programmes, gets translated into lower salary for the staff and lack of equipment and drugs, which effects the functioning of the programme to a great extent. The problem of lack of supply of drugs and equipment was observed to be severe in case of MMU and SCDCP, who are relying purely on government funds for their programme. SNGO manages somehow as they have the entire infrastructure for running the programme, due to their MCH programme. Also, it does not have to purely rely upon the government funds as they receive funds from other sources as well for their MCH programme. Still as mentioned in the section below, even they faced the financial pinch due to inadequate funds being sanctioned by the government. The SNGO staff also complained that they have not been able to purchase equipment from the SNGO funds due to the tedious process of purchase, involving various steps of release of tenders, quotations, etc. Hence, the problem of the availability of the drugs and equipment is also because of the tedious procedure of tendering and purchase.

Another problem reported by the private partner vis-à-vis funds, is the fact that they do not receive the funds on time. In the exceptional case of SCDCP, both the NGO as well as the PHC staff mentioned receiving the funds on time. This was contrary to what was observed in all other PPP projects in Thane district, where a serious problem of fund delay was reported. A reason for this can be the fact that since SCDCP is a state level programme, the funds for the programme directly comes from the state government; however the other two programmes are run on a national level, and hence funds may not reach the State Government from the Central Government on time, which results in further delay in the money reaching the NGOs. Under such circumstances of fund delay, the private partner is expected to run

the programme from their own funds; in fact this is the reason why the government chooses NGOs with a good financial background for the partnerships. This clause is often mentioned in the contract document. Still the NGOs reported of facing problems in running the programme in case of fund delay.

In case of SNGO, the private party was due to receive the second instalment, but did not. The Director of the trust, Dr. Goda expressed that, they were having difficulty in running the project as the amount left in their corpus was little, yet they were duty bound to continue running the programme, as they cannot tell the beneficiaries that they would provide services after they receive funds from the government. Hence, one can observe that even a trust as big as MLDT was facing problems to operate in the absence of funds, implying that the smaller NGOs would have no option but to stop running the programme. This corroborates the findings of Venkatraman & Bjorkmann (2006), who also found out through their case studies on PPPs that even though the large NGOs are able to withstand delay in funds, the smaller ones find it extremely difficult, which even leads to closure of the project at times.

Similar observations on financial component of PPP project were also made by Annigeri et al. (2004), who mentioned that,
"Financing is a challenge both in quantity and management. Where the government does provide funding or re-imbursement to an implementing partner, those funds are often inadequate, delayed by 6-12 months, restricted by line items, and subject to audits that invite corruption. Most of the more interesting interventions reviewed relied on funding that was additive to the resources provided by the government, such as flat fee, donations, donor funding and corporate sponsorship" (p. 45).

Activities

Activities in most (SCDCP and MMU) of these projects were decided by the government and the private partner was merely implementing the same. However, this should not be the case since the private partners are experts in the field in which they are working and hence can best decide the activities in the field. This problem was found to be most severe in case of MMU, where the list of villages for running the van on a monthly basis was decided by the government and was found to be practically impossible by the private partner to be covered in a months' time given the difficult geographical terrain of the region. Only in case of SNGO, the private partner decided the activities to achieve the targets set by the government. This exception has been made mainly because of the SNGOs long standing work in the field of RCH.

Experience of Providers

Almost all private partners of the PPP projects studied felt that the project has overburdened them with a lot of work. The reporting and accounting that the government demanded seemed to be the most difficult task for them. Venkatraman & Bjorkmann (2006) in their study of PPP projects across the country made a similar observation. According to them,

"Bureaucracy requires a great deal of documentation and procedural details that the private sector, especially non- profit NGOs, are unable (or unwilling) to understand. Similarly, the NGOs may not be able to calculate the unit cost of their own services or to follow accounting system as detailed as the government agency would prefer" (p. 14).

Hence, some form of training mechanism needs to be devised for the NGOs by the government to train them on accounting and documentation work as per the government's requirements.

The private partner of all these projects felt constrained because they lacked the autonomy in terms of decision making at the field level. As shared by the private partner handling the Mobile Medical Unit, they needed to seek permission from the government if they had to take the van for a repair. This is an impediment as many times, situations arise in the field where one needs to take a quick decision. The private partner should be given the autonomy to take decisions in the field when it is absolutely required. Besides, the private parties were also uncomfortable with the fact that they were accountable to the government for each and every work.

Another problem that was reported by the staff of all private partners across PPP projects was about their salaries, which they felt was too less. They also stated that the short term nature of the contract of these projects makes them insecure about their job.

The government staff on the other hand, were happy with the PPP projects, as most of them felt that by forging partnerships with the private sector they get additional manpower for implementing their projects, which otherwise would not have been possible due to limited staff for multiple on-going projects. As expressed by the DHO of Thane District, Dr. R.V. Kadam,

"PPPs are good means for implementing health programmes, as they provide us with additional manpower to do focused work on a particular programme. Our staff are already overburdened and cannot devote itself to a programme the way the private partner would do" (10th December 2011, District Health Society Thane).

Coghill & Woodward (2005, p.82) have mentioned several other reasons for the government to be happy with the PPP projects, which can also be true in case of the studied PPP projects. These include the fact that PPPs give the government an opportunity to quickly announce new projects which help in building their reputation. Also as PPPs make service and infrastructure quickly available to the government, it helps in gaining electoral support.

If the projects are financed by the private sector, it is all the more advantageous to the government, as it helps them in getting the laurels of launching a new project without any financial outgo. PPPs also help government in gaining the approval of the business community. Also in case of any performance problems, the government can also get away by pointing fingers at the private partner, if they choose to do so.

Experience of Beneficiaries

The beneficiaries of all these partnership projects were satisfied by the services offered to them through these programmes and highly praised them. The only difference that was noted in case of SCDCP and MMU was that the researcher came across very few people in the village who had accessed these services, and hence had to talk to the OPD patients accessing the services to capture the views of the beneficiaries. However, in case of SNGO, every other person whom the researcher spoke to in the villages knew about the programme.

Strengths

The greatest strength of the above mentioned projects is that they are operating in the unserved and underserved areas, and are trying their best to reach out to people in remote areas. The involvement of local people from within the community for the implementation of the programmes, volunteers in case of SCDCP and CHVs in case of SNGO is another strong point of the programme. Even in case of MMU, the ASHAs and Anganwadi workers help in implementation of the programme by creating awareness within the community. Involvement of local people in the programme helps in getting better access within the community. It is ironic to note that in spite of these strengths, it is only the SNGO programme that has been successful in reaching out to people to some extent.

Weaknesses

Besides the issues discussed in the above section, some other weaknesses of the programme include the closed mind-set of people due to which they are not open to listening and accepting the programme. The change observed in the mind-set of the beneficiaries of SNGO is due to several years of work that the

private partner has already been doing in the area of RCH. Another major problem that comes in the way of implementation of these projects is the fact that the target group of all these projects are tribals, who are migratory in nature. In the agricultural season they remain in the villages, and in the non-agricultural season, they migrate to cities for work, missing out on the programme which thereby affects the continuity of the services received.

8.2. AVENUES FOR FURTHER RESEARCH

Even though PPPs in healthcare are widely being debated by scholars, empirical studies to actually understand the characteristics of these PPPs are few. Significant research needs to be done in the area to understand the nature, design, implementation and evolution of these partnership projects, along with understanding their implication on cost effectiveness, quality, equity and efficiency. Also, hardly any study has been done to understand these programmes, both from the providers as well as the beneficiaries' perspective and thus understand the gaps in provisioning. This study is one of the first in this regard. More studies in the area would help in understanding these PPP programmes from a holistic perspective, which would be far more authentic than just understanding the programme from the provider's perspective.

Implications of these programmes on equity, replicability and sustainability have not been covered by many studies. This study has covered it to an extent, but only cursorily, on the basis of interaction with the providers and beneficiaries and the researcher's own observations. A scale needs to be devised for measuring the equity, replicability and sustainability component of this programme in order to get an accurate picture of these components. Effectiveness of these programmes has also not been assessed in any of the studies. As mentioned by Baru (2009),
"*Some theoretical framework needs to be devised for understanding the efficacy and effectiveness for health services. This would help in evaluating the contribution of PPPs in improving access, availability and affordability of health services and could also help in evaluating as to what extent these arrangements are replicable and sustainable*" (p. 2).

Studies also need to focus upon a more in-depth analysis of cost efficiency than what has been done in this study.

Studies have been done on PPP projects that existed pre-NRHM. Post-NRHM, a plethora of PPP projects are mushrooming across states, owing to the fact that it is an important strategy under NRHM for achieving the public health goals of providing quality health care which is affordable and accessible to the majority. However, hardly any study has been done to evaluate the quality of these projects and their

effectiveness in achieving the above mentioned goals. Hence, in-depth studies need to be done to understand the PPP projects under NRHM. This would help in identifying the problems in its implementation and further help in improving the same and suggest policy changes. Also, the researcher has just restricted herself to one district of Maharashtra. A larger study focusing on three-four districts across a number of states would help in getting a better picture of the PPP projects under NRHM. Hence more studies on PPPs under NRHM need to be done to draw an interstate analysis.

8.3. VIEWS ON PPP

Box 8.1. lists the views of some important officials on Public-Private Partnerships in general.

8.4. SUMMARY

To sum up, the three partnership programmes studied for this thesis were not found to fulfil the main objective with which they were designed under NRHM, which is to enhance the equity, quality and efficiency of health services. The only programme which is doing well in terms of reaching out to the people (equity) is the SNGO scheme. The success of this scheme is due to a range of factors: first, the SNGO is lucky to have a fully functional MCH programme which is being run in the community since several years; hence the awareness level in the area of RCH which is seen in the community is a result of years of concerted effort of this programme. Second, the SNGO is even luckier to have several sources of funding for its MCH programme, which has now been converted to SNGO scheme, government funds just contribute to a part of the funding for their project. Hence, the quantum of work that the SNGO is able to execute is much more than what could be done merely by the government funds.

Similarly, this scheme uses a lot more staff than what is designated for the scheme by the government. Hence it is but natural that they would be able to project good results. Also, since the duration of the SNGO project is for three years, the private partner is better involved and committed to the programme. Another reason responsible for the SNGOs success is the fact that they are doing focused work in a very small area of Vikramgad Taluka. The scheme also differs from other projects due to the fact that this is the only partnership programme where the private partner is involved in the framing of MOU, at least literally. The reason for the difference in this scheme vis-à-vis the other schemes in operational aspects is mainly due to the fact that it is governed by a separate set of guidelines prepared by the Ministry of Health and Family Welfare, GOI, which is uniform for SNGOs across the country.

Box 8.1: Views of Some important officials on Public-Private Partnerships

- *Both the NGO as well as the government benefits from Public-Private Partnership. While the partnership helps the NGO receive funds for its activities, the government gets an important partner at the grassroots for providing service. The NGO has an advantage over the govt. in terms of working in the field, as they have networks with the community which makes their operation easy"* (Dr. Goda, Director, SNGO).
- *"PPP is beneficial to the govt. health system, as through PPP programmes we get additional manpower and resources to run our own programmes. For example, we get support from SNGO in terms of manpower and resources for running our Family Planning as well as Immunization camps. Similarly, in Sickle cell disease control programme, we have got a band of workers from the NGO to work on the eradication and control of the disease"* (Dr. Prakash Damle, Khandejad, Medical Officer of Krunze PHC).
- "*Through PPP people are benefitting a lot. The benefits which people can't receive through govt. schemes, they are getting through PPP"* (Gangaram Jeevan Bhoye, MPW).
- *"Through PPP, the state has got an excuse not to fulfill its responsibilities. The state should provide minimum guaranteed services; they don't do this and instead create partnerships which are not long term, have a lot of hassles and where nobody is accountable. If we call a private doctor to government health facility and if they don't do their work properly, then they are not responsible"* (Ms. Indavi Tulpule, Secretary, *Van Niketan*).
- *"The NGOs get credibility by getting involved in government project through PPPs. They get a chance to prove their work; they have only one project so they can give their best to the work"* (Reeta Gaikwad, DPM, Thane district).
- *"Through PPPs the government is able to do multi-tasking. We get a different perspective by involving the private sector. PPPs act as the arms of government and provides us with additional manpower"* (Dr. Mahesh Dinkar Nagre, TMO, Jawhar).
- *"All our PPP projects are quite successful. The NGO partners are good, through them we become aware of the local problems and they connect with the local community better, which helps in a better outreach of health services" (Dr. Pooja Singh, DRCHO, Thane).*

On the whole, a lot of lacunae were observed in the implementation of the three studied PPP projects. All suffered from shortage of funds and staff, and an overtly dominant attitude of the government where in it is not even performing the roles that it is meant to and is passing the same to the private partner. While the government is expected to perform the roles of funding, monitoring and training, it has happily assumed just the role of a funder and assumes that in itself, it is a responsibility big enough by virtue of which it can shirk away from the rest of its responsibilities and dominate the private partner. Thus, it is right when theorists say that PPPs have made the public sector lazy and inefficient and has given them a chance to absolve them from their responsibilities.

Hence as mentioned earlier, the government is only playing the role of a watch dog, always on the lookout to find faults with the private partner without actually understanding the problems that they face at the level of the field. They lay down strict guidelines for the private partner and set targets, which most of the time is unachievable, as a result of which the private partner feels pressurized. Hence, these partnership programmes are purely skewed in terms of power relation between the two partners, with the government playing the dominant role. It is the government who initiates and designs the programme, the private partner is merely acting on their orders. Baru & Nundy (2008) in her analytical paper on PPPs mentions that,
"*It is significant that the MOU is weighted, in terms of authority and power, towards the government. As a result, one could question the extent of equality between the two partners which is the defining parameter for PPPs. In the case of this NGO, one can classify government as the major and the NGO as the minor partner on the basis of devolution of power and authority between the two. Hence the government becomes the major partner since it defines the terms and conditions while the NGO becomes the minor partner owing to the fact that it has very little power to contest or negotiate the terms and conditions in the MOU"* (p. 67).

Even the NRHM document mentions that,
"The Public Sector should play a lead role in defining the framework and sustaining the partnership" (NRHM, 2005-12).

Hence it would be incorrect to call these programmes a partnership. In fact many authors like Richter (2003) and WHO (2001) have chosen to use the term 'public-private interactions' rather than PPPs (WHO 2001; Richter 2003). The choice of the term 'interaction' is deliberate, and is meant to emphasize that most of the public-private arrangements are, in fact, not partnerships at all, in the sense that there is neither an equality in relationship nor reciprocity in obligations.

Even the government officials associated with the studied partnership projects mentioned that it would be wrong to call these programmes partnership programmes as the government is giving the entire fund and guidelines to them and the private party is just implementing their programme. PPPs in the actual sense should seek more involvement from the private party in terms of monetary and infrastructural facilities (Dr. Vikas Kharge, MD, NRHM & Dr. Tayde, State Health Society, Maharashtra).

To conclude, PPPs in health care can be an effective tool for health care provisioning, if the partnerships are designed with proper planning wherein both partners share equal roles and responsibilities and work towards a common goal. A partnership programme where the government is playing the dominant role is not healthy for the effectiveness of the programme. However good a PPP programme may be, it cannot be a substitute for the government provisioning of health services. PPPs can be one option for health care provisioning, but cannot be the only option. It is high time that the government should focus on building its own capacities in terms of providing good quality health services which is accessible and affordable to all.

I would end this theses by the point made by the Union Health Minister, Mr. Ghulam Nabi Azad in the India Health Summit 2010, to which I agree, which is:
"*Partnership is not meant to be a substitution for lesser provisioning of government resources nor an abdication of Government responsibility but as a tool for augmenting the public health system*" (India Health Summit, 2010).

BIBLIOGRAPHY

Andrews, S., & Mohan, S. (2002). User Charges in Health Care: Some issues. *Economic and Political Weekly*, 34 (37), 3793-3795.

Annigeri, V.B., Prosser, L., Reynolds, J., Roy, R. (2004). An Assessment of Public Private Partnership Opportunities in India. Poptech.

Association for Health Welfare in the Nilgiris (ASHWINI) (2010). Manual on Sickle Cell Anemia Programmeme among Adivasis in Gudalur Valley. Retrieved from www.ashwini.org, accessed on February 2012.

Babu, B.V., Leela, B.L., Kusuma, Y.S. (2002) Sickle cell disease among tribes of Andhra Pradesh and Orissa, India. *Anthropol Anz*, 60,169-74.

Bajpai, N. et al. (2009). Improving Access, Service Delivery and Efficiency of the Public Health System in Rural India: Mid Term evaluation of NRHM. Center on Globalization and Sustainable Development, Columbia: The Earth Institute at Columbia University.

Banerjee, D. & Anderson, S. (1963). A Sociological study of awareness of symptoms among persons with Pulmonary Tuberculosis. *Bulletin of World Health Organization,* 29, 665-683.

Banerjee, D. (1982). Poverty Class and Health Culture in India. New Delhi: Prachi Prakashan.

Baru, R. & Nundy, M. (2006). Health PPPs in India: Stepping Stones for Improving Women's Reproductive Health Care?. Paper presented at UNU Conference on *Improving Women's Health in India*, 3-5 December 2006, Bonn, Germany.

Baru, R. & Nundy, M. (2008). Blurring of Boundaries: Public Private Partnerships in Health Services in India. *Economic and Political Weekly*, 43(4), 62-71.

Baru, R. (1993). Inter-regional Variations in Health Services in Andhra Pradesh. *Economic and Political Weekly,* 28(20), 963-967.

Baru, R. (2005). The National Rural Health Mission and Public Private Partnerships. *Journal of Health and Development*, 1(4), 19-22.

Baru, R. (2006). Privatization of Health Care in India: A Comparative Analysis of Orissa, Karnataka and Maharashtra States. CMDR Dharwad, IIPA Mumbai, UNDP & GOI.

Baru, R. (2009). PPPs as a strategy: Issues and Challenges- Some Reflections. Unpublished Presentation in *National Conference on Emerging Health Care Models: Engaging the Private Sector*, Organised by Cehat Mumbai, 25-26th September, 2009.

Bhat, R., Singh, A., Maheshwari, S., Saha, S. (2006). Maternal Health Financing- Issues and Option A Study on Chiranjeevi Yojana in Gujarat. Ahmedabad: Indian Institute of Management.

Bhat, R., Maheshwari, S.K., & Saha, S. (2007). Contracting-out of Reproductive and Child Health (RCH) Services through Mother NGO Scheme in India: Experiences and Implications. Ahmedabad: Indian Institute of Management.

Bhatia, H. M. & Rao, V. R. (eds.) (1986). Genetic Atlas of the Indian Tribes. Mumbai, India: Institute of Immunohaematology (ICMR)

Bhatia, M. & Mills, A. (1997). Contracting out dietary services by public hospitals in Mumbai. in Sara Bennet, Barbara Mc Pake and Anne Mills eds., *Private Health Providers in Developing countries,* London: Zed Books.

Bhatt, R. (2000). Issues in Health: Public Private Partnerships. *Economic and Political Weekly*, 35(53), 4706-4716.

Blaikie, N. (2000). Designing Social Research: The logic of anticipation. Polity Press.

Bruner, E.M. (1986). Ethnography as Narrative,' in V.W.Turner & E.M. Bruner (Eds.). *The Anthropology of experience*, Urbana: University of Illinois Press.

Budhkar, U. (1996). Health Services Development: The Case of Maharashtra. Unpublished M.Phil dissertation, Jawaharlal Nehru University, New Delhi.

Buse, K. & Walt, G. (2000a). Global public-private partnerships: Part 1—A new development in health? *Bulletin of the World Health Organization*, 78 (4), 549–561.

Castro, O. (1999). Management of Sickle Cell Disease Recent Advances and Controversies. *British Journal of Haemotology,* 107(1),2-11

Census. (2001).Retrieved from census www.censusindia.net, accessed on June 2012

Chaturvedi, S. & Randive, B. (2011). Public Private Partnerships for Emergency Obstetric Care : Lessons from Maharashtra. *Indian Journal of Community Medicine*, 36(1), 21-26.

Coghill, K., & Woodward, D. (2005). Political Issues of Public-private Partnerships. In *The Challenge of Public-Private Partnerships. Learning from International Experience,* Cheltenham/Northampton, 81–94.

Community Based Monitoring Programme. Retrieved from www.nrhm.maharashtra.gov.in, June 2012.

Creswell, J. (1994). Research Design: Qualitative and Quantitative approaches. London: Sage.

Dagur, V., Katherine, S., & Kimberly S. (2010). Paying for performance: The Janani Suraksha Programme in India. USAID.

Dayanand Trust (2011). Status Report of Mobile Unit Thane. August to October, submitted to District Health Society, Thane.

Deoshatwar, A. (2009). Vadu Rural Health Programme [VRHP] a unique setting: Lessons to be Learnt. Paper presented in *National Conference on Emerging health care models: Engaging the private health sector*, Organised by Cehat, Mumbai, 25-26 September, 2009.

Deosthali, P. et al. (2011). Poor Standards of care in small, private hospitals in Maharashtra, India: Implications for public- private partnerships for maternity care. *Reproductive Health Matters*, 19(37), 32–41.

Devika, J., Rajshree, A.K. (2008). Health Democracy and Sickle Cell Anaemia. *Economic and Political Weekly,* 43(45), 25-29.

Dilip, T.R. & Duggal, R. (2004). Unmet need for Public Health care services in Mumbai. *Asia-Pacific Population Journal,* 19 (2), 27-40.

Dindayal Mobile Medical Unit (MMU), Madhya Pradesh. Retrieved from http://healthmarketinnovations.org, accessed on 11th March, 2012.

Directorate of Census Operations in Maharashtra (2011). Thane District Population Census 2011. Mumbai, Maharashtra.

Duggal, R. et al. (2005). Health and Health Care in Maharashtra- A Status Report. Mumbai: Centre for Enquiry into Health & Allied Themes (Cehat).

e India. (2012). KIDROP (Karnataka Internet Assisted Diagnosis for Retinopathy of Prematurity) Narayana Nethralaya Postgraduate Institute of Ophthalmology. Retrieved from http://eindia.eletsonline.com, accessed on November 2013.

Emergency Medical & Referral Services. Retrieved from www.nrhm.maharashtra.gov.in, June 2012

Government of Assam. (2007). *Hospital on Wheels, Launching of Mobile Medical Units*. Assam: Department of Health and Family Welfare.

Government of India. (2005). *National Programme Implementation Plan RCH Phase II – Programme Document*. New Delhi: Ministry of Health and Family Welfare.

Government of India, & IIPS. (2009). *Concurrent Evaluation of National Rural Health Mission- Fact Sheet*. Mumbai: IIPS.

Government of India, & IIPS. (2009). *Concurrent Evaluation of National Rural Health Mission*. New Delhi: Ministry of Health & Family Welfare.

Government of India. (2000). *National Population Policy*. Retrieved from http://india.unfpa.org/drive/ National Population Policy 2000.pdf, accessed on June 2012.

Government of India. (2001). *Census of India*. New Delhi: Ministry of Home Affairs

Government of India. (2003). *Guidelines for Department of Family Welfare Supported NGO Schemes*. New Delhi: NGO Division, Department of Family Welfare, Ministry of Health & Family Welfare.

Government of India. (2004). *Report of the PPP sub group on Social Sector, Public Private Partnership*. New Delhi: Planning Commission.

Government of India (2005). *Health Information of India*. Central Bureau of Health Intelligence, Director General of Health Services, Ministry of Health and Family Welfare.

Government of India. (2006). *Draft Report on Recommendation of Task force on Public Private Partnership for the 11th plan*. New Delhi: Planning Commission of India.

Government of India. (2007). *Guidelines for the operationalisation of Mobile Medical Units in (North-eastern states, Himachal Pradesh and Jammu & Kashmir)*. New Delhi: Ministry of Health & Family Welfare.

Government of India. (2011). *Evaluation study of National Rural Health Mission in Seven States*. New Delhi: Programme Evaluation Organisation, Planning Commission of India.

Government of Kerala. (2011). *State PIP, 2011-12*. Kerala: State Health Family Welfare Society.

Government of Madhya Pradesh. (2007). *Innovative schemes and programme interventions- Under NRHM*. Bhopal: Department of Public Health and Family Welfare.

Government of Maharashtra. (2002). *Maharashtra Human Development Report.* Mumbai: Author

Government of Maharashtra. (2012). *NRHM Report-Chapter 4 A on Reproductive & Child Health*. Mumbai.

Government of Maharashtra. (1997). *Maharashtra Health System Development Project Proposal*. Mumbai.

Guidelines for operationalization of Mobile Medical Unit (In North eastern states, Himachal Pradesh and J&K). Retrieved from www.mohfw.nic.in, accessed on April 2012.

Gupta, M. (2009). Public Private Partnership (PPP) Initiatives in Bihar: Success and Failures. Paper presented in *National Conference on Emerging health care models: Engaging the private health sector*, Organised by Cehat, Mumbai, 25- 26 September, 2009

Gupta, R.B. (2006). Sickle Cell Disease Load in Madhya Pradesh. *RMRCT Update*, 3(1), Jabalpur: Regional Medical Research Centre for Tribals.

HCG Opens first Sickle Cell Clinic in Karnataka (2011, June 19). *Chronicle Pharmabiz*, pg. 10.

Health Indicators of Maharashtra. Retrieved from http://mohfw.nic.in/NRHM/State/ maharashtra.htm, accessed on July 2012.

Health information of India 2005. Retrieved from http://cbhidghs.nic.in/hia2005/content.asp, accessed on March 2012

Impact India Foundation. Retrieved from www.impactindia.gov.in, accessed on June 2012.

Janani Suraksha Yojana. Retrieved from www.nrhmmaharashtra.gov.in, accessed on June 2012

Jesani, A. et al. (1986). NGOs in Rural Health Care-Vol. I: An Overview. Mumbai: Foundation For Research in Community Health.

Kar, B.C., Satapathy, R.K., Kulozie, M., Sirr, S. & Serjeant, B.E. (1986). Sickle Cell Disease in Orissa State. *India.- Lancet*,1198- 1201.

Kate, S. L. & Lingojwar, D. P. (2002). Epidemiology of Sickle Cell Disorder in the State of Maharashra. *International Journal of Human Genetics*, 2 (3), 161-167.

Kate, S.L. (2000). Health Problems of tribal population groups from the State of Maharashtra. *Immunohaemotology Bulletin*, ICMR, October Issue.

Kumar, G. (2003). Promoting Public Private Partnership in Health Services. *Economic and Political Weekly*, 38 (29), 3041-3045.

Larbi, G. A. (1999). The New Public Management Approach and Crisis States. Discussion Paper No. 112, New York: United Nations Research Institute for Social Development.

Mahal, A., Srivastava, V., Sanan, D. (2000). Decentralisation and its impact on public service provision In the health and education sectors: The case of India. In: Dethier J (ed)., *Governance Decentralisation and Reform in China, India and Russia*, London:Kluwer Academic Publishers.

Majithia, P.A. (2011, May 8th). Gujarat leads in Genetic blood disorders. Retrieved from http://www.dnaindia.com,/india/report.

Maurya, D. (2012). Politics of Adoption of Public Private Partnership. Paper for Political Science Association Conference, Belfast, 3 - 5 April.

Mc Pake, B. & Banda, EN. (1998). Contracting Out of Health Services in Developing Countries. *Health Policy and Planning*, 9(1), 25-30.

McBride, J. & Ahmed R. (2004). Social Franchising as a strategy for expanding access to Reproductive Health Services: A case study of the Green Star Service Delivery Network in Pakistan. Commercial Marketing strategies project, September 2001

McEvoy, P., & Richards, D. (2006). A Critical Realist Rationale for using a Combination of Quantitative and Qualitative Methods. *Journal of Research in Nursing*,11, 66-78.

Memorandum of Understanding (MOU) signed between Navoday Grameen Sanstha & District Health Society (2009). Unpublished.

Memorandum of Understanding (MOU) signed between Dayanand Trust & District Health Society (2011). Unpublished.

Memorandum of Understanding (MOU) signed between MLDT & District RCH Society (2011). Unpublished.

Mills, Anne and Broomberg, J. (1998). Experiences of Contracting Health Services: An Overview of Literature. Working Paper 01, Health Economics and Financing Programmeme, London: LSHTM

ML Dhawale Trust (2008). Project Proposal of SNGO scheme RCH II. submitted to District Health Society, Thane.

ML Dhawale Trust (n.d). About MLDT (power point slides).unpublished

Modell, B. and Darlison, M., (2008). Global Epidemiology of Haemoglobin Disorders and derived Service Indicators. *Bulletin of the World Health Organization*, 86 (6), 417-428.

Mobile Medical Units for Indian Villages (2008). Retrieved from http://www. i government.in.htm, accessed on April 10th, 2012.

Mokashi,T.,Nair,A.,Prasad,B.M.,Chakraborty, G. & Sundarraman, T. (2011). Review of HMRI-104 services. New Delhi: National Health System Resource Centre.

Nandan, D. et al. (2009). A Study of Interface of ASHA with the Community and the Service Providers in Eastern Uttar Pradesh. New Delhi: NIHFW.

National Family Health Survey, round 3 (2005-06). Retrieved from http://www. gits4u.com/ health/nfhs3.htm, accessed on July 2012.

National Institute of Health and Family Welfare & UNFPA. (2009). An assessment of functioning of Mobile Health Units in Jharkhand- A Report. MGM Medical College, Jamshedpur.

National Health Systems Research Centre (NHSRC) (2011). Programme Evaluation of Janani Suraksha Yojana. New Delhi.

National Rural Health Mission (NRHM) Mission Document. (2005). Retrieved from http://mohfw.nic.in/NRHM/Documents/Mission_Document.pdf, accessed on May 2012.

National Rural Health Mission (NRHM) Report. (n.d.). *Partnership with Non-Governmental Organizations.* Chapter VIII. Retrieved from http://mohfw.nic.in/, accessed on July 2012.

National Rural Health Mission Achievements and Role of NGOs. Retrieved from http://www.aarogya.com/health-resources/health-programmes/2443-national-rural-health-mission.html, March 2012.

National Rural Health Mission (NRHM) (2012). 6th Common Review Report. Retrieved from mohfw.nic.in/NRHM/CRM/CRM_files/Sixth_CRM.htm, accessed on December 2012

National Sample Survey Organisation (NSSO) (1996), 'Survey on Health Care', NSS 52nd round, July 1995-June 1996, retrieved from mospi.nic.in, accessed on July 2012

National Sample Survey Organisation (NSSO) (2004), 'Morbidity, Health Care and the Condition of the Aged', NSS 60th round, January-June 2004, retrieved from mospi.nic.in, accessed on July 2012

Nishtar, S. (2004). Public – private 'partnerships' in health – a global call to action. *Health Research Policy and Systems*, 2 (5). Retrieved from http:// www.health-policy-systems.com/content /2/1/5 , accessed on May 2012.

One World. Net (2011). Sickle Cell Anaemia Control Programmee, Gujarat, documentation of best Practice. September 2011.

Oswald, C. (1999). Management of Sickle Cell Disease: Recent Advances and Controversies. *British Journal of Haematology*, 107, 2-11.

Patton, M.Q. (1990). Quantitative Evaluation and Research Methods. 2nd ed. Newbury Park, New Delhi: Sage.

Paxman, J. M. et al. (2005). The Indian Local Initiatives Programme: A model for expanding Reproductive and Child Health Services. *Studies in Family Planning*,36 (September), 203-220.

Prabhu, P. (1992). Tribal Deaths in Thane district the other side. *Economic and Political Weekly,* 27(47), 2527-2530.

Prakash, G., & Singh, A. (2006). Outsourcing of Healthcare Services in Rajasthan: An Exploratory Study. Proceedings of IMRC 2006, *Global Competitiveness for Outsourcing: Implications for Services & Manufacturing*, July 13-15, 2006, IIM Bangalore.

Pre Conception and Pre- Natal Diagonostic Techniques. Retrieved from www.nrhmmaharashtra.gov.in, accessed on July 2012.

Profile of the Maharashtra State (2007). Retrieved from http://mohfw.nic.in, accessed on July 2012.

Project to tackle Sickle Cell Anaemia (2004, August 17). *Central Chronicle.*

Public Private Partnership (PPP) Initiative in Health Sector in Orissa (n.d.). Retrieved from http://www.health.pdf.com, accessed on May 2012.

Public Private Partnership- Organisation of Specialist Medical and Dental Camps through Medical Colleges in Tribal Hospitals. Retrieved from www.nrhmmaharashtra.gov.in, accessed on June 2012

Public Private Partnership-Integration of Palliative Care in Health Services. Retrieved from www.nrhmmaharashtra.gov.in, accessed on July 2012

Qadeer, I. (2002). Draft National Health Policy 2001- Debt payment and Devaluating Elements of Public Health. *Economic and Political Weekly*, 37(1) (Jan. 5-11), 12-16.

Qadeer, I. and Reddy, S. (2006). Medical Care in the Shadow of Public Private Partnership. *Social Scientist,* 34(9/10) (Sep. - Oct), 4-20.

Rao, J.S. (2009). Public Private Partnership Initiatives by Assam under NRHM (power point slides). Retrieved from http://healthmarketinnovations.org/sites/healthmarketinnovations.org.

Rao, R.V. (1988). Genetics and epidemiology of *Sickle Cell Anaemia* in India. *ICMR Bulletin,* 18 (9) New Delhi: Indian Council of Medical Research.

Ravindran, S.T.K (2011). Public Private Partnership in Maternal Health Services in India. *Economic and Political Weekly*, 46 (48), 43-52.

Richter, J. (2003). ‘We the Peoples’ or ‘We the Corporations’? Critical Reflections on UN-Business ‘Partnerships’, Geneva: IBFAN/GIFA.

Rosen, J.E. (2000). Contracting for Reproductive Health Care: A Guide. World Bank, p.4.

Saha, S. (2005). Perception about Quality of Women's Reproductive Health Services in Solapur. CEHAT, Mumbai.

Sathi Cehat. (n.d.). *Community Based Monitoring of Health Services in Maharashtra, India.* Pune.

Serjeant, G.R., & Serjeant, B.E. (2001). Sickle Cell Disease. New York: Oxford University Press.

Shivadekar, S. (2012, February 23). Soon Maharashtra to get 972 hi tech Emergency Medical Services. *Tamil News Network.*

Shrivastav, S. (2011, May 19). Hope for Sickle Cell Sufferers as Lokayukta cracks the whip. *Times of India, Nagpur.*

Sickle Cell Anaemia. Retrieved from www.nrhmmaharashtra.gov.in, accessed on March 2012.

Sickle Cell Anaemia Control Programme. Retrieved from http://www.gujhealth.gov.in, accessed on March 7th 2012

State Health Society (n.d.). Mobile Medical Unit, Operational Guidelines for NGO. Mumbai: National Rural Health Mission, State Health Society, pp. 2, 3,4.

State Health Society. (2011). Report on Mobile Medical Unit. Mumbai.

State Institute of Health and Family Welfare (SIHFW) (2008). Public Private Partnership in Health. Jaipur, Rajasthan.

Sulzbach, S.,Bardsley, P.,Stephenson,R., Bekele, T., Ahmed.R and Bose, S.(2002). Franchising Reproductive Health Services. Paper presented at Population Association of America, Atlanta, May 2002.

Sundararaman, T.,Chakraborty,G.,Nair,A.,Mokashi,T. & Ved,R. (2012). Publicly Financed Emergency Response and Patient Transport Systems Under. New Delhi: National Health System Resource Centre.

Tekale, N.S. (2006). Health & Nutrition status of Warli tribal children in Thane district of Maharashtra. Proceedings of National Symposium on Tribal Health, 19th -20th October, 2006, Jabalpur. Retrieved from http://www.rmrct.org, accessed on March 2012.

Tele Medicine Project. Retrieved from www.nrhmmaharashtra.gov.in, accessed on July 2012.

Terms of reference for Mother NGOs, National and Medium sized NGOs, and small NGOs participating in Reproductive and Child Health Programme of the Ministry of Health & Family Welfare of India. Retrieved from http://siteresources.worldbank.org/INTPRH/Resources/ TORforMotherNGOs_ RCH_India.pdf.

The Case Study as a Research Method. (1997). Retrieved from http://www.gslis.utexas.edu, accessed on 10th March 2012.

Thirty six more districts to get Mobile Medical Units. (2011, September 30th). *Indian Express Lucknow*, Retrieved from http://www.indianexpress.com,accessed on March 2012.

Tribal Sub Plan Area. Maharashtra State Cooperative Tribal Development Cooperation. Retrieved from http://mahatdc.com/tribalinfo.htm, accessed on July 2012.

UNFPA. (2009). Concurrent Assessment of Janani Suraksha Yojana in Selected states. New Delhi: UNFPA, retrieved from http://www.nrhm-mis.nic.in, accessed on August 2012.

United Nations. (1994). Report of the International Conference on Population and Development. Plan of Action, Chapter XV, New York: United Nations Population Information Network, retrieved from http://www.un.org/popin/icpd2.htm, accessed on November 2012.

Venkatraman, A. & Bjorkmann, J.W. (2006). Public Private Partnership in the provision of Health care services to the poor. Research study supported by Indo Dutch Programme on Alternatives in Development (IDPAD).

Venkatraman, A. (2008). Public Private Partnerships in Health Service Delivery. Retrieved from http://nrhm-mis.nic. in, accessed on 12th August 2012.

Verma, S.K. (2009, July 8). All 38 Districts to have mobile medical units.,*The Times of India- Patna.*

Vanvasi Kalyan Kendra. Retrieved from http://www.vanavasikalyankendra.org/rch.php, accessed on 7th June, 2012.

World Bank (1993). World Development Report- Investing in Health, World Development Indicators. Oxford University Press.

World Health Organisation Report (2001), Retrieved from http://www.who.int/whr/2001/en/, accessed on November 2012.

World Bank Retrieved (2008). *Countries –India.* pp.10-31.

APPENDIX I

Table Showing Forms and Design of PPPs in Health in India

	Type	States	Type of Institution which give contracts	Services included under PPP	Design of PPP
I.	Contracting In and Out	Rajasthan, Jaipur	Tertiary teaching hospital	Drug store	Hospital provides physical space, electricity, water and computers for the drug store to the private operator.
				CT Scan/MRI services	Services given to a private agency. Agency is given a monthly rent and they have to provide 20 percent free services.
		Himachal Pradesh, Karnataka, Orissa, Punjab, Uttaranchal, Tripura and Maharashtra	Hospitals at secondary and tertiary level	Cleaning and maintenance of building, security, waste management, scavenging, laundry, dietary services etc.	Cleaning and maintenance of hospitals contracted to Sulabh International in some states, dietary services in Bombay Municipal hospitals and some government hospitals either contracted in or out of the hospital.
		Gujarat	National Disease Control Programmeme (State Malaria Control Society)	IEC services for Malaria Control	IEC budget from various pharmaceutical companies is pooled together on a common basis and the agencies hired by the private sector are allocated the money for development of IEC material through a special sanction.
		Tamil Nadu, Theni District	Non- governmental Organisation	Emergency Ambulance Services	This scheme is self-supporting through collection of user charges. The Government supports the scheme only by supplying vehicles. The NGO recruits drivers, trains staff, maintains vehicles, operates the programme and reports to the government. It bears the entire operating cost of the project including communications, equipment and medicine, and publicizing the service in the villages, particularly the telephone number of the ambulance

					service. However, the project is not self-sustaining as the revenue collection is lesser than anticipated.
		Widespread in 439 districts	NGOs	Basket of RCH services, capacity building of Field NGOs (FNGOs), conducting Community Needs Assessment (CNA), liaison, networking and coordination with State and District health services, PRIs and other NGOs; monitoring the performance and progress of FNGOs and documentation of best practices, advocacy and awareness generation. The SNGOs provide an integrated package of clinical and non-clinical services directly to the community	The MNGO (Mother NGO) and SNGO (Service NGO) Schemes are being implemented by NGOs for population stabilization and RCH. The MNGOs involve smaller NGOs called FNGOs (Field NGOs) in the allocated districts.
		Gujarat, Karnataka,	NGOs	Management of PHCs in rural areas/ urban health services	i) Govt. of Gujarat has provided grants to an NGO in Gujarat for managing one PHC and three CHCs. The NGO provides rural health, medical services and manages the public health institutions. The NGO can accept employees from the District Panchayat on deputation. It can also employ its own personnel by following the recruitment resolution of either the Government or the District Panchayat.

					ii) Management of Primary Health Centres in 2 districts was contracted out by the Government of Karnataka to an NGO in 1996, to serve the tribal community in hilly areas. 90% of the cost is borne by the Govt. and 10% by the trust. It has full responsibility for providing all personnel at the PHC and the Health Sub-centres within its jurisdiction; maintenance of all assets at the PHC. The agency ensures adequate stocks of essential drugs at all times and supplies them free of cost to patients.
	Contracting In and Out (continued)	Delhi	NGO	Management of urban health services	iii) In Delhi as contractual partners, an NGO and MCD each has fixed responsibilities and provides a share of resources as agreed in the partnership contract. The NGO is responsible for organizing and implementing services in the project area, while the MCD is responsible for monitoring the project. The MCD provides building, furniture, medicines and equipment, while the NGO provides maintenance of the building, water and electricity charges, management of staff and medicine.

		Andhra Pradesh	NGO	Urban Slum Health Project	The Urban Slum Health Care Project of the Andhra Pradesh Ministry of Health and Family Welfare contracts NGOs to manage health centres in the slums of Adilabad. The basic objectives of the project are to increase the availability and utilization of health and family welfare services, to build an effective referral system, to implement national health programmes, and to increase health awareness and better health-seeking behaviour among slum dwellers, thus reducing morbidity and mortality among women and children.
	Contracting In and Out (continued)	Gujarat (Chiranjeevi experiment in five selected districts)	Private providers	Emergency Obstetric Care, transport, Caesarean section, Forceps delivery, ultra sonography, anaesthesia, blood, IEC to popularise the scheme	Federation of Gynaecologists and obstetricians, empanelled private providers.
		Andhra Pradesh	Charitable Trust	Tuberculosis	The Trust Hospital acts as a coordinator, intermediary and supervisor between the government and private medical practitioners (PMPs). The PMPs refer patients suspected of having TB to the hospital or to any of the 30 specified neighbourhood DOTS centres operated by PMPs. The patients pay the fees to the PMPs.
		Rural Uttar Pradesh	Private sector	Sterilisation and IUD services, pre and post-operative medicines, follow up, transportation and reporting to District Society	Government reimburses and district societies implement the programmeme through the private institutions.

		Madhya Pradesh, Bhopal	Rogi Kalyan Samiti (RKS) or patient welfare committee formed as a society. Its members are from local PRIs, NGOs, local elected representatives and government officials.	RKS to manage a secondary level government hospital	RKS functions as an NGO and not a government agency. It may impose user charges and also raise funds additionally through donations, loans from financial institutions, grants from government as well as other donor agencies. The funds received are available to be spent by the Executive Committee constituted by the RKS/HMS. Private organizations could be contracted out for provision of the super specialty care at a rate fixed by the RKS. Through RKS, the hospital has also been able to provide free services to patients below the poverty line.
		Bihar	Secondary level hospital	Immunisation, manage HIV/AIDS, voluntary counselling, testing, DOTS, leprosy, RCH services	State, district hospital and charitable trust (part of London based organization).
II	Social Franchising	Bihar	Primary level (preventive and curative)	Janani scheme (mostly contraceptives and basic health services)	Mix of social franchising, marketing, outsourcing and external funding.
III	Social Marketing	Several States	NGOs	Promotion and sale of contraceptives with subsidies for the products.	SIFPSA, HLL, PSI, Hindustan Latex and Family Planning Promotion Trust.

Sources:

1. Annigeri et al, 2004;
2. Futures Group, 2005;
3. GOI, Draft report on recommendation of Task force on public-private partnership for the 11th plan, 2006.

(from Baru R and Nundy Madhurima, 'Health PPPs in India: Stepping Stones for Improving Women's Reproductive Health Care?', Paper Presented at a conference on Public-Private Partnerships within Ethical Framework of the UN Global Compact organized by UNU, Bonn for 3rd-5th December, 2006.)

APPENDIX II

A. **Tools used for the Case Study of Sickle Cell Disease Control Programme**

I. Interview Schedule for PHC staff/volunteer and Supervisor/NGO staff/District and State level officials (SCDCP)

Schedule Number: Date:

Name of Block:

Name of PHC: Name of Village:

I. PERSONAL DETAILS			
Q.NO.	**Question**	**Code**	**Response**
1.	Name:		
2.	Designation:		
3.	Address & Phone no.		
4.	Age:	1	Less than 30 years
		2	30-40 years
		3	40-50 years
		4	More than 50 years
5.	Gender:	1	Male
		2	Female
6.	Qualification:	1	Under graduate
		2	Graduate
		3	Post graduate
		4	MPhil/Ph.D.
		5	Others
7.	Years of experience:	1	Less than 5 years
		2	5-10 years
		3	10-15 years
		4	15-20 years
		5	More than 20 years
8.	Present posting at		
9.	Years of service in present location	1	Less than 5 years

		2 3 4 5	5-10 years 10-15 years 15-20 years More than 20 years
II. Sickle Cell Disease Control Programme **A. Design**			
10	Awareness about sickle cell anaemia disease on the basis of the following questions: (All correct answer-very good One incorrect-good Two incorrect-average Three incorrect-poor Three or more incorrect-very poor)	1 2 3 4 5	Very good Good Average Poor Very poor
i	How is the disease caused?		
ii.	What are the effects of the disease?		
iii	Who are the carriers and sufferers?		
iv.	What are the tests for detecting the disease?		
v.	What is the treatment?		
vi.	Any other information about the disease.		
11.	From where did you receive this information about the disease?	1 2 3	Training by NRHM Training by NGO Other sources
12.	Who are the two partners in the SCDCP programme?	1 2	Public Private
13. a.	What is the role of each of the partners:	1 2	

	Public	3	
b.	Private	1 2 3	
14.	Are you aware about the funding for the programme? (if no, skip to 19)	1 2	Yes No
15.	If yes, from where do you receive the funds for this programme?		
16.	Do you receive them on time?		
17.	What is the amount?		
18.	Where is it utilized?		
19.	How do you rate the coordination between the two partners of the programme?	1 2 3 4 5	Very good Good Average Bad Poor
20.	As a public/private partner do you face any problem from the other partner?	1 2	Yes No
21.	If yes, what are they?		
B. Evolution& Implementation			
22.	How was the programme initiated in your		

	block/village?		
23.	Name the PHCs in your block where the programme is being implemented.(for block level officials)	1 2 3 4	
24.	Which are the ones where testing was first started? (for block level officials)	1 2 3	
25.	What were the activities at the time of inception of the programme?	1 2 3 4	
26.	Are the activities same now?	1 2	Yes No
27.	If no what are the new activities that have been added?	1 2	
28.	How is the programme being implemented at your block/village?		
29.	Who are the main stake holders responsible for the implementation of this programme?	1 2 3	
30.	What is the role of each of them?	1 2 3	
31.	What is your role in the programme?		
32.	Are you satisfied by the way the programme is being implemented in your block/village?	1 2	Yes No
33.	If yes, why?		

34.	If no, why?		
35.	What are the problems that come in the successful implementation of the programme?		
III. OUTCOME, EQUITY, REPLICABILTY & SUSTAINIBILITY			
36.	What according to you is the impact of the programme on the beneficiaries?		
37.	How do you rate the success of the programme	1 2 3 4 5	Very good Good Average Poor Very Poor
38.	If the programme is successful, name two indicators that determine the success of the programme	1 2	
39.	If the programme is unsuccessful, name two indicators that determine the failure of the programme.	1 2	
40.	Are you aware of the targets set by NRHM for this programme? (If no, skip to 44)	1 2	Yes No
41.	If yes, what are they : a. for this year? • Testing • Awareness		

	b. for last year? • Testing • Awareness		
42.	Were the targets achieved last year?	1 2	Yes No
43.	Will you be able to achieve the targets this year?	1 2	Yes No
44.	What is the average number of patients who come to the OPD for testing?		
45.	What is the frequency of these tests at the PHC level?	1 2 3 4	Everyday Once in a week Twice a week Thrice a week
46.	Number of patients tested last month		
47.	Number of patients tested last year (collect the list of tested clients from the OPD-monthly & yearly data)		
48.	Average number of patients covered in awareness generation on a daily basis (collect the list of clients covered in awareness generation-monthly & yearly data)		
49.	Number of patients covered in IEC last year		
50.	Average number of patients counselled on a daily basis (collect the list of clients covered in awareness generation-monthly and yearly basis)		

51.	Number of patients counselled last year		
52.	Is the programme reaching to the poorest segment of the society?	1 2	Yes No
53.	Is the programme reaching to the interior villages?	1 2	Yes No
54.	What is done to ensure equity for the programme?		
55.	How do you rate the quality of services being offered by the programme: a. Testing	1 2 3 4 5	Very good Good Average Poor Very Poor
	b. Counselling	1 2 3 4 5	Very good Good Average Poor Very Poor
	c. IEC	1 2 3 4 5	Very good Good Average Poor Very Poor
	d. Treatment	1 2 3 4 5	Very good Good Average Poor Very Poor
56.	What is done to maintain the quality of the programme?		
57.	Is the programme being replicated elsewhere?	1 2	Yes No

58.	How can the programme become self-sustaining?		
59.	Who does the monitoring of the programme?		
60.	List the indicators that are used for monitoring the programme.	1 2 3	
IV. OVERALL ASSESMENT OF THE PROGRAMME			
61.	Name two strengths of the programme?	1 2	
62.	Name two weaknesses of the programme?	1 2	
63.	Give two suggestions to further improve the programme.	1 2	
V. VIEWS ON PPP			
64.	Are you aware of other PPP projects in your block/village?	1 2	Yes No
65.	If yes, what are they?	1 2 3	
66.	Which according to you is the best among them and why?		
67.	Mention three advantages of establishing public private partnership projects.	1 2 3	
68.	Mention three disadvantages of establishing public private partnership projects.		

II. Interview Schedule for Key Informants in the villages (SCDCP)

Schedule Number: Date:

Name of Block:

Name of nearest PHC: Name of Village:

I. SOCIO-DEMOGRAPHIC DETAILS

Q.NO.	Question	Code	Response
1.	Name:		
2.	Name of village:		
3.	Address & Phone no.		
4.	Age:	1 2 3 4	Less than 30 years 30-40 years 40-50 years More than 50 years
5.	Gender:	1 2	Male Female
6.	Caste:	1 2 3 4	General SC/ST OBC Others
7.	Educational Qualification:	1 2 3 4 5	Under graduate Graduate Post graduate MPhil/Ph.D. Others
8.	Occupation	1 2 3 4	Agriculture Govt. Job Pvt. Job Others
9.	Monthly income	1 2 3	Less than Rs. 1,000 Rs. 1,000-2,000 Rs. 2,000-3000

		4 5	Rs. 3,000-4,000 Rs. 4,000 & above
10.	Number of children	1 2 3 4	Less than 2 2-4 4-6 6 & above
11.	Are all of your children going to school?	1 2	Yes No
12.	If No, who is not going to school	1 2	Girl Boy
13.	Number of family members	1 2 3 4	2 2-4 4-6 6 & above
14.	Total family income	1 2 3 4 5	Less than Rs. 1,000 Rs. 1,000-2,000 Rs. 2,000-3000 Rs. 3,000-4,000 Rs. 4,000 & above
II. AWARENESS ABOUT THE DISEASE			
15.	Are you aware about the disease named Sickle cell anaemia? (If No, Skip to 18)	1 2	Yes No
16.	If yes, assess the level of awareness about the disease on the basis of the following questions: (All correct answer-very good One incorrect-good Two incorrect-average Three incorrect-poor Three or more incorrect-very poor)	1 2 3 4 5	Very good Good Average Poor Very Poor
a.	How is the disease caused?		

b.	What are the effects of the disease?		
c.	Who are the carriers and sufferers?		
d.	What are the tests for detecting the disease?		
e.	What is the treatment?		
f.	Any other information about the disease.		
17.	From where did you receive this information about the disease?	1 2 3 4 5 6 7	Through poster at health centre Sickle cell volunteers Sickle cell supervisor ASHA ANM Anganwadi worker Others
18.	Has anyone ever come to you to talk to you about this disease? (If No, skip to 23)	1 2	Yes No
19.	If yes, who came to you?	1 2 3 4 5 6	Sickle cell volunteers Sickle cell supervisor ASHA ANM Anganwadi worker Others
20.	Where was the talk held?		
21.	What information did they give you?		
22.	Have they given you some information booklet?	1 2	Yes No
23.	If yes, have you read the booklet?	1 2	Yes No
III. AWARENESS AND EXPERIENCE OF THE SICKLE CELL DISEASE CONTROL			

PROGRAMME			
24.	Are you aware about the Sickle cell disease control programme being run by the govt. in the PHCs? (If No, skip to 26)	1 2	Yes No
25.	If yes, what activities are done in this programme?	1 2 3 4 5 6	Counselling Testing IEC All the above Can't say None
26.	Have you ever got yourself tested for the presence of sickle cell? (If no, skip to 42)	1 2	Yes No
27.	If yes, where did u get the testing done?	1 2	PHC Village camp
a.	If 1, then which PHC?		
b.	If 2, then where was the camp held?		
28.	What was the result of the test?	1 2	Positive Negative
29.	If positive have you undergone the Electrophoresis test	1 2	Yes No
30.	If yes, what was the result of this test?	1 2	Positive Negative
31.	If positive have you been receiving any treatment?	1 2	Yes No
32.	If yes from where?		
33.	Have you got any of these colour cards?	1	White

		2 3	Yellow Red
34.	Do you know the significance of each of the colours		
a.	White	1 2 3	Negative Carrier Sufferer
b.	Red	1 2 3	Negative Carrier Sufferer
c.	Yellow	1 2 3	Negative Carrier Sufferer
35.	Are you satisfied by the services being provided under the Sickle cell disease control programme?		
36.	What component of the programme did you like most?	1 2 3 4	Testing Treatment Counselling IEC
37.	Did you face any problem while availing the services of SCDCP?	1 2	Yes No
38.	If yes, what are these problems?		
39.	What according to you can be done to improve the programme?		
40.	What are the strengths of the programme?		
41.	What are the weaknesses of the programme?		
42.	Are you planning to get yourself tested	1	Yes

	for sickle cell?	2	No
43.	If yes from where?	1 2	Nearest PHC Village camps
44.	If no, why?		
45.	Are you aware of Sickle cell carriers or sufferers in your village	1 2	Yes No
46.	If yes who are they?		
IV. AWARENESS ABOUT OTHER HEALTH PROGRAMMEMES			
47.	Which is the PHC nearest to your village?		
48.	What is the distance from your village?		
49.	Are you aware of other health related programmes falling under NRHM?	1 2	Yes No
50.	If yes, what are they?		
51.	What is the source of your information?		
52.	Have you availed any of these programmes?	1 2	Yes No
53.	If yes, mention the programmes		
54.	How was your experience with the programme?		
55.	Which according to you is the best health programme under NRHM?		

III. Exit Interview of OPD patients (SCDCP)

Schedule Number: Date:

Name of Block:

Name of PHC: Name of Village:

I. SOCIO- DEMOGRAPHIC DETAILS			
Q.NO.	**Question**	**Code**	**Response**
1.	Name:		
2.	Name of village		
3.	Address & Phone no.		
4.	Age:	1 2 3 4	Less than 30 years 30-40 years 40-50 years More than 50 years
5.	Gender:	1 2	Male Female
6.	Caste	1 2 3 4	General SC/ST OBC Others
7.	Educational Qualification:	1 2 3 4 5	Under graduate Graduate Post graduate MPhil/Ph.D. Others
8.	Occupation	1 2 3 4 5	Less than 5 years 5-10 years 10-15 years 15-20 years More than 20 years

9.	Monthly income	1 2 3 4 5	Less than Rs. 1,000 Rs. 1,000-2,000 Rs. 2,000-3000 Rs. 3,000-4,000 Rs. 4,000 & above
10.	Number of children	1 2 3 4	Less than 2 2-4 4-6 6 & above
11.	Are all of your children going to school?	1 2	Yes No
12.	If No, who is not going to school?	1 2	Girl Boy
13.	Number of family members	1 2 3 4	2 2-4 4-6 6 & above
14.	Total family income	1 2 3 4 5	Less than Rs. 1,000 Rs. 1,000-2,000 Rs. 2,000-3000 Rs. 3,000-4,000 Rs. 4,000 & above
II. SERVICES AVAILED			
15.	Why have you come here today?		
16.	How did you come to know about the sickle cell disease control programme?	1 2 3 4 5 6 7	Through poster at health centre/other IEC material Sickle cell volunteer Sickle cell supervisor ASHA ANM Aaganwadi worker Others

17.	Who brought you here for the testing?	1 2 3 4 5 6	Sickle cell volunteer Sickle cell supervisor ASHA ANM Anganwadi worker Others
18.	Do you know the name of the test that you underwent?	1 2	Yes No
19.	If yes, what is the name? (solubility test)	1 2	Correct name Incorrect name
20.	Who administered the test?	1 2 3 4 5 6	MO Lab technician ANM Volunteer Supervisor Others
21.	What was the result of the test?	1 2	Positive Negative
22.	Did you receive the colour cards?	1 2	Yes No
23.	Which colour card you got?	1 2 3	White Red Yellow
24.	Do you know the significance of each of the colours?		
a.	White	1 2 3	Negative Carrier Sufferer
b.	Red	1 2 3	Negative Carrier Sufferer
c.	Yellow	1 2 3	Negative Carrier Sufferer
25.	Did you receive any counselling before the test?	1 2	Yes No
26.	If yes, who did this counselling?	1 2 3	MO Lab technician ANM

		4 5 6	Volunteer Supervisor Others
27.	Did you receive any counselling after the test?	1 2	Yes No
28.	If yes, who did this counselling?	1 2 3 4 5 6	MO Lab technician ANM Volunteer Supervisor Others
III. FEEDBACK OF BENEFICIARIES			
29.	Are you satisfied by the services provided to you by the SCDCP programme?	1 2	Yes No
30.	If yes, why?		
31.	How do you rate the following facilities provided to you on a scale of 5:		
a.	Testing	1 2 3 4 5	Very good Good Average Poor Very Poor
b.	Counselling	1 2 3 4 5	Very good Good Average Poor Very Poor
c.	IEC	1 2 3 4 5	Very good Good Average Poor Very Poor

d.	Treatment	1 2 3 4 5	Very good Good Average Poor Very Poor
32.	Did u face any problem while availing the services of SCDCP?	1 2	Yes No
33.	If yes what are these problems.		
34.	What according to you can be done to improve the programme?		
35.	What are the strengths of the programme?		
36.	What are the weaknesses of the programme?		
IV. AWARENESS ABOUT THE DISEASE			
37.	Awareness about the disease (on the basis of the following answers) All correct answer-very good One incorrect-good Two incorrect-average Three incorrect-poor Three or more incorrect-very poor	1 2 3 4 5	Very good Good Average Poor Very Poor
i.	How is the disease caused?		
ii.	What are the effects of this disease?		
iii.	Who are the carriers and sufferers?		
iv.	What are the tests for detecting the disease?		
v.	What is the treatment?		

vi.	Any other information about the disease.		
38.	From where did you receive this information about this disease?		
39.	Has anyone ever come to you to talk to you about this disease? (If no, skip to 45)	1 2	Yes No
40.	If yes, who came to you?	1 2 3 4 5 6	Sickle cell volunteer Sickle cell supervisor ASHA ANM Anganwadi worker Others
41.	Where was the talk held?		
42.	What information did they give you?		
43.	Have they given you some information booklet?	1 2	Yes No
44.	Did you read that booklet?	1 2	Yes No
45.	Are you aware about carriers/sufferers in and around your village?	1 2	Yes No
46.	Where do they undergo the treatment		
V. AWARENESS ABOUT OTHER HEALTH PROGRAMMES UNDER NRHM			
47.	Are you aware of other health related programmes falling under NRHM?	1 2	Yes No
48.	What is the source of your information?		
49.	Have you availed of any of these programmes?	1 2	Yes No

50.	If yes, mention the programmes		
51.	Which according to you is the best health programme under NRHM?		

IV. FGD Guidelines for two groups: Beneficiaries (tested) and Non Beneficiaries (not tested) (10 each) (MMU)

1. Name of group members:
2. Age, Gender, Caste, Educational qualification, Occupation, Income, Number of children:
3. Nearest PHC (name and distance):
4. What do you know about the disease Sickle Cell Anaemia?
5. How is it caused?
6. What are the symptoms of the disease?
7. Who are the carriers and sufferers?
8. Why is it important to know about this disease?
9. How is the testing done?
10. What are the different kinds of test?
11. Why is it important to get yourself tested for the disease before marriage?
12. If you or your wife is carrying a baby will you get the foetus tested for the disease?
13. If the baby is a sufferer will you abort the foetus?
14. Have you heard of the government programme run to control this disease in your area?
15. What happens through this programme?
16. Source of Information.
17. Have you met the sickle cell volunteers/supervisors? What work do they do?
18. Have you got yourself tested for the disease?
19. If yes, where was the testing done?
20. Have you received any of the colour cards?
21. Do you know the significance of these?
22. If not, are you planning to get yourself tested in the future for sickle cell?
23. How has been your experience with the programme?
24. What according to you can be done to improve the programme?
25. What are the strengths of the programme?
26. What are the weaknesses of the programme?
27. Are you aware about the other health programmes under NRHM?
28. If yes, which according to you is the best?

B. Tools used for the Case Study of Mobile Medical Unit

I. Interview Schedule for Providers-NGO & Van Staff & Govt. officials (MMU)

Schedule Number: Date:

Name of Block:

Name of nearest PHC: Name of Village:

I. PERSONAL DETAILS			
Q.NO.	**Question**	**Code**	**Response**
1.	Name:		
2.	Designation:		
3.	Address & Phone no.		
4.	Age:	1 2 3 4	Less than 30 years 30-40 years 40-50 years More than 50 years
5.	Gender:	1 2	Male Female
6.	Qualification:	1 2 3 4 5	Under graduate Graduate Post graduate MPhil/Ph.D. Others
7.	Years of experience:	1 2 3 4 5	Less than 5 years 5-10 years 10-15 years 15-20 years More than 20 years
8.	Present posting at		
9.	Years of service in present location	1 2 3	Less than 5 years 5-10 years 10-15 years

		4 5	15-20 years More than 20 years
PPP PROJECT NAME - Mobile Medical Unit **II. DESIGN**			
10.	Which are the two partners in this partnership programme	1 2	Public Private
11.	What are the roles of each of the two partner		
(a)	Public	1 2 3 4	
(b)	Private	1 2 3 4	
12.	Who are the major stakeholders in this PPP project? (RKS, VHSC, CDMO, MO etc.)	1 2 3 4	
13.	What is the role of each of these stakeholders?	1 2 3 4	
14.	What is your role in the programme?		
15.	What problems do you face vis-a-vis your role in the programme?		
16.	How do you rate the coordination between the two partners of the programme?	1 2 3 4 5	Very good Good Average Bad Poor
17a.	As a public/private partner do you face any problem	1	Yes

	from the other partner?	2	No
b.	If yes, what are they?		
18.	Under which generic model of PPP does this partnership fall?	1 2 3 4	Contracting In Contracting Out Social Marketing Social Franchising
19a.	Where does the funding for the project come from?	1 2 3 4	Public Private Both Others
b.	What are the terms and conditions of payment		
20.	Do you receive the funds on time?	1 2	Yes No
21.	Where are the funds utilised?		
22.	Are the funds enough to run the programme?	1 2	Yes No
23.	Is there a formal MOU between the two partners (Refer MOU)	1 2	Yes No
24.	What are the terms and conditions of partnership		
25.	What is the duration of the partnership?	1 2 3 4	Less than 1 year 1-2 years 2-3 years 3 & above
26.	What parameters will determine the extension of partnership?		
III. AIMS & OBJECTIVES			
27.	What is the goal of this partnership programme?		
28.	What was the goal of the partnership programme at the point of inception?		

29.	Has it been modified with time?	1 2	Yes No
30.	If yes, describe.		
31.	Does the private and public partner share the same goal?	1 2	Yes No
32.	If no what are the goals of • Private Partner		
	• Public Partner		
IV. HISTORY & EVOLUTION			
33.	When the partnership was initiated (year)/When was the programme started?		
34.	What was the reason for starting the partnership?		
35.	What are the major landmarks in the development of partnership?	1 2 3 4	
36.	How was the private partner selected? (eg. Bidding, Negotiation)		
37.	What selection criterion was used for selecting the private partner?		
38.	How has the programme evolved with time?		
V. IMPLEMENTATION - LOCATION & ACTVITIES			
39.a.	List the blocks where the programme is operational in your district?	1 2	
b.	On what basis have these blocks been selected?		
40.a.	List the villages in the blocks where the programme is	1	

	operational.	2 3 4	
b.	On what basis have these villages been selected?		
41.	In which blocks/villages were the programme started initially?	1 2 3	
42.	Which blocks/villages were added later on and when?	1 2 3	
43.	What are the main activities (services provided) of the programme?	1 2 3 4	
44.	What activities were started initially?	1 2 3	
45.	Which are the ones that were added later on?	1 2 3	
46.	What are the forthcoming activities of the programme?	1 2 3	
47.	Which according to you is the most important activity of the programme?		
48. a.	Have you planned the monthly activity of the van?	1 2	Yes No
b.	If yes, what is it?	1 2 3 4	Camps------days Maintenance of vehicle , medicine stock & repairs---days Report preparation-------days Monthly meeting------days
c.	How has it been planned?		

49.	How many vehicles are there under this programme?	1 2 3 4	One Two Three More than three
50.	What are their types:	1 2	
51.a.	What is the schedule of the visit of the van?		
b.	How is it planned?		
52.	What is the staff composition of the van?	1 2 3 4 5	
53.	Who appoints the staff?		
54.	Who trains the staff?		
55.	List the equipment available with the van.		
56.	List the drugs that are available with the van.		
57.	Where are the severe cases which cannot be handled on the van referred?		
58.	What are the problems that come in the way of successful implementation of the programme?	1 2 3	
VI. EQUITY, QUALITY, REPLICABILITY & SUSTAINIBILITY			
59.	How many patients come for each camp? (approximately) (Daily basis)		
60.	How many patients are covered on a monthly basis?		
61.	Is the programme reaching to the underprivileged section (BPL, SC/ST/OBC) of the society?	1 2	Yes No
62.	Are the remote villages covered by the programme?	1	Yes

		2	No
63.	Name three indicators that help you assess the equity of the programme.	1 2 3	
64.	What does the organization do to ensure equity? (eg. Convincing people who do not want to use modern medicine, especially tribes)		
Data on Client profile to be collected from the PHC			
65.	What is done to ensure the quality of the programme?		
66.	Mention the indicators used to assess the quality of the programme.	1 2 3	
67.	What more can be done to improve the quality of the programme?		
68.	What are the future plans for the programme?		
69.a.	Is the programme being replicated elsewhere?	1 2	Yes No
b.	If yes, then in what way?		
70.a.	Is the programme self-sustaining?	1 2	Yes No
b.	If no, how can the programme be made self-sustaining?		
71.	Are the two partners accountable for their work?	1 2	Yes No
72.	If there is a problem in the implementation of the programme then which of the two partners are held responsible?	1 2 3 4	Public partner Private partner Both equally None
73.	Who monitors the work of each of the two partners?		
74.	What are the indicators that are used for monitoring the programme? (Eg. No. of camps, no. of patients, referrals, ANC & PNC checks, TB, leprosy cases,	1 2 3	

	Improved access to services)	4 5	
75. a.	When are the reports of the programme prepared:	1 2 3 4 5	Monthly Quarterly Six monthly Annually Others
b.	To whom are the reports of the programme submitted? (Collect copies of the report)		
VII. OUTCOME			
76. a.	How do you rate the success of the programme on a Scale of 5?	1 2 3 4 5	Exceptionally good Good Average Poor Very poor
b.	Explain		
77.	Has the programme been successful in achieving its goals?	1 2	Yes No
78.	Has the programme been able to improve the health of the masses?	1 2	Yes No
79.	What is the outcome of the programme?		
80.	Mention three strengths of the programme.	1 2 3	
81.	Mention three weaknesses of the programme.	1 2 3	
82.	Mention three suggestions to further improve the programme.	1 2 3	
83.	Any other comments about the programme?		

VIII. VIEWS ON PPPs IN HEALTH PROJECTS			
84.	Mention four advantages of establishing partnerships in health programme?	1 2 3 4	
85. a.	Does PPP help in better implementation of a health programme?	1 2	
b.	If yes, then in what way?		
86.	How does the PPP help in enhancing the effectiveness of a particular programme in terms of the following:	a. Outreach of the programme (equity) b. Quality c. Affordability	
87.	Is there any disadvantage in establishing partnerships in a health programme?	1 2	
88.	If yes, mention them.	1 2 3 4	

II. Interview Schedule for Key Informants in the villages (MMU)

Schedule Number: Date:
Name of Block:
Name of nearest PHC: Name of Village:

I. SOCIO- DEMOGRAPHIC DETAILS

Q.NO.	Question	Code	Response
1.	Name:		
2.	Name of village		
3.	Address & Phone no.		
4.	Age:	1 2 3 4	Less than 30 years 30-40 years 40-50 years More than 50 years
5.	Gender:	1 2	Male Female
6.	Caste:	1 2 3 4 5	General SC ST OBC Others
7.	Educational Qualification:	1 2 3 4 5 6	Uneducated 1-4 class 4-7 class 7 -10 class Plus 2 Graduation & above
8.	Occupation	1 2	Agricultural labourer Cultivator

		3 4 5 6 7	Wood cutter Wood seller Teacher Shop owner Others
9.	Monthly income	1 2 3 4 5	Less than Rs. 500 Rs. 500-1000 Rs. 1000-2000 Rs. 2000 & above Can't say (in the form of grains)
10.	Number of children	1 2 3 4	Less than 2 2-4 4-6 6 & above
11.	Are all of your children going to school?	1 2	Yes No
12.	Number of family members	1 2 3 4	2 2-4 4-6 6 & above
13.	Total family income	1 2 3 4 5	Less than Rs. 500 Rs. 500-1000 Rs. 1000-2000 Rs. 2000 & above Can't say (in the form of grains)
II. AWARENESS ABOUT THE VAN & SERVICES AVAILED			
14.	Have you ever heard of Mobile Medical Unit?	1 2	Yes No
15.	If yes, what is your source of	1	Through poster at health

	information?		centre/other IEC material
		2 3 4 5 6 7	ASHA ANM Anganwadi worker Announcement of van Relative Others
16.	Are you aware of the services provided by the van?	1 2	Yes No
17.	If yes, what are they?	1 2 3 4 5	
18.	Who runs the van?	1 2 3 4 5	Can't say Govt. NGO Both Others
19.	Are you aware of the days on which the van comes to your village?	1 2	Yes No
20.	If yes, mention.		
21.	Have you ever availed the services of the van?	1 2	Yes No
22.	If yes how many times have you availed the services before?	1 2 3 4	Once Twice Thrice More than three times
23.	What services did you avail?		

III. FEEDBACK OF BENEFICIARIES			
24.	Were you satisfied by the services offered by the van?	1 2	Yes No
25.	If yes, explain.		
26.	If no, explain.		
27.	How do you rate the services that you received by the van?	1 2 3 4 5	Very good Good Average Poor Very Poor
28.	How do you rate the behaviour of the staff in the van?	1 2 3 4 5	Very good Good Average Poor Very Poor
29.	Did you face any problem while availing the services of Mobile Medical Unit?	1 2	Yes No
30.	If yes, specify.		
31.	Which is the PHC nearest to your village?		
32.	What is the distance?		
33.	Have you ever availed any services there?	1 2	Yes No
34.	Which according to you provides better service?	1 2 3	PHC Mobile medical unit Can't say
35.	Give reasons		

36.	Which is the sub-centre nearest to your village?		
37.	What is the distance?		
38.	Have you ever availed any services there?	1 2	Yes No
39.	Which according to you provides better service?	1 2 3	Sub-centre Mobile medical unit Can't say
40.	Give reasons		
41.	Where do you usually go for treatment when you fall ill?	1 2 3 4 5	Govt. hospital Private doctor Homeopathic Ayurvedic Others
42.	Which according to you provides better services	1 2 3	Your regular source MMU Can't say
43.	What are the advantages of running a Mobile Medical Unit?		
44.	What are the disadvantages of running a Mobile Medical Unit?		
45.	What are the strengths of the programme?		
46.	What are the weaknesses of the programme?		
47.	What can be done to further improve the services provided by the MMU?		
IV. AWARENESS ABOUT OTHER HEALTH PROGRAMMES UNDER NRHM			
48.	Are you aware of other health related	1	Yes

	programmes falling under NRHM?	2	No
49.	What is the source of your information?		
50.	Have you availed of any of these programmes?	1 2	Yes No
51.	If yes, mention the programmes		
52.	Which according to you is the best health programme under NRHM?	1 2	

III. FGD Guidelines for the Villagers (MMU)

- Name of group members:
- Age, Gender, Caste, Educational qualification, Occupation, Income, Number of children:
- Nearest PHC (Name and distance):
- Nearest Sub-centre (Name and distance):

I. Awareness about MMU and Services Availed

1. Have you ever heard of Mobile Medical Unit?
2. If yes, what is your source of information?
3. Are you aware of the services provided by the van?
4. If yes what are they?
5. Who runs the van?
6. Are you aware of the days on which the van comes to your village?
7. If yes, mention.

II. Experience of the Beneficiaries

8. Have you ever availed the services of the van?
9. If yes how many times have you availed the services before?
10. What services did you avail?
11. Were you satisfied by the services offered by the van? If yes, explain. If no, explain.
12. How do you rate the services that you received by the van?
13. How do you rate the behaviour of the staff in the van?
14. Did you face any problem while availing the services of Mobile Medical Unit. If yes, specify.
15. Where do you usually go for treatment when you fall ill?
16. What according to you provides better services- your regular source or the MMU?
17. Have you ever availed the services provided by the PHC or sub centre?
18. Which according to you provides better service PHC/ Sub centre or MMU? Give reasons
19. What are the advantages of running a Mobile Medical Unit?
20. What are the disadvantages of running a Mobile Medical Unit?
21. What are the strengths of the programme?
22. What are the weaknesses of the programme?
23. What can be done to further improve the services provided by the MMU?
24. Are you aware of other health related programmes falling under NRHM?
25. What is the source of your information?

26. Which according to you is the best health programme under NRHM?

IV. Interview Schedule for OPD cases (MMU)

Schedule Number: Date:

Name of Block:

Name of nearest PHC: Name of Village:

I.SOCIO- DEMOGRAPHIC DETAILS

Q. NO.	Question	Code	Response
1.	Name:		
2.	Name of village		
3.	Address & Phone no.		
4.	Age:	1 2 3 4	Less than 30 years 30-40 years 40-50 years More than 50 years
5.	Gender:	1 2	Male Female
6.	Caste	1 2 3 4 5	General SC ST OBC Others
7.	Educational Qualification:	1 2 3 4 5 6	Uneducated 1-4 class 4-7 class 7 -10 class Plus 2 Graduation & above
8.	Occupation	1 2 3 4	Agricultural labourer Cultivator Wood cutter Wood seller

		5 6 7	Teacher Shop owner Others
9.	Monthly income	1 2 3 4 5	Less than Rs. 500 Rs. 500-1000 Rs. 1000-2000 Rs. 2000 & above Can't say (in the form of grains)
10.	Number of children	1 2 3 4	Less than 2 2-4 4-6 6 & above
11.	Are all of your children going to school?	1 2	Yes No
12.	Number of family members	1 2 3 4	2 2-4 4-6 6 & above
13.	Total family income	1 2 3 4 5	Less than Rs. 500 Rs. 500-1000 Rs. 1000-2000 Rs. 2000 & above Can't say (in the form of grains)
II. SERVICES AVAILED - PAST & PRESENT			
14.	Why have you come here today? (name of the ailment)		
15.	Have you come here for the first time?	1 2	Yes No
16.	If no, what is the number of this visit?	1 2	Second Third

		3	Fourth
17.	What was the reason for your last visit?		
18.	Were you satisfied by the services offered by the van then?	1 2	Yes No
19.	If yes, explain.		
20.	If no, explain.		
21.	Have you come here on your own?	1 2	Yes No
22.	If no, who brought you here?	1 2 3 4	ASHA ANM Anganwadi worker Others
23.	How did you come to know about the Mobile Medical Unit?	1 2 3 4 5 6 7	Through poster at health centre/other IEC material ASHA ANM Anganwadi worker Announcement of van Relatives Others
24.	Are you aware of the days on which the van comes to your village?	1 2	Yes No
25.	If yes, mention.		
26.	Are you aware of the services that are offered by the van?	1 2	Yes No
27.	If yes, what are they?	1 2	

		3 4	
28.	What services did u receive here today?		
III. FEEDBACK OF BENEFICIARIES			
29.	How do you rate the services that you received here?	1 2 3 4 5	Very good Good Average Poor Very Poor
30.	How do you rate the behaviour of the staff in the van?	1 2 3 4 5	Very good Good Average Poor Very Poor
31.	Did you face any problem while availing the services of Mobile Medical Unit?	1 2	Yes No
32.	If yes, specify.		
33.	Which is the PHC nearest to your village?		
34.	What is the distance?		
35.	Have you ever availed any services there?	1 2	Yes No
36.	Which according to you provides better service?	1 2 3	PHC Mobile medical unit Can't say
37.	Give reasons		

38.	Which is the sub-centre nearest to your village?		
39.	What is the distance?		
40.	Have you ever availed any services there?	1 2	Yes No
41.	Which according to you provides better service?	1 2 3	Sub-centre Mobile medical unit Can't say
42.	Give reasons		
43.	Where do you usually go for treatment when you fall ill?	1 2 3 4 5	Govt. clinic Private doctor Homeopathic Ayurvedic Others
44.	Which according to you provides better services?	1 2 3	Your regular source MMU Can't say
45.	What are the advantages of running a Mobile Medical Unit?		
46.	Is there any disadvantage of running the Mobile van?	1 2	Yes No
47.	If yes, what are they?		
48.	What are the strengths of the programme?		
49.	What are the weaknesses of the programme?		
50.	What can be done to further improve the services provided by the MMU?		
IV. AWARENESS ABOUT OTHER HEALTH PROGRAMMES UNDER NRHM			
51.	Are you aware of other health related	1	Yes

	programmes falling under NRHM?	2	No
52.	What is the source of your information?		
53.	Have you availed of any of these programmes?	1 2	Yes No
54.	If yes, mention the programmes.		
55.	Which according to you is the best health programme under NRHM?	1 2	

C. Tools used for the Case Study of SNGO

I. Interview guide for NGO staff (SNGO)

1. Name:
2. Age:
3. Designation:
4. Years of experience:
5. Years of service in present location:
6. Who are the two partners in the partnership programme?
7. What is the role of each of the partners?
8. a. What is the goal of the partnership programme?
   b. Does the private and public partner share the same goal?
   c. If No, how are the goals different?
9. How and when the partnership was initiated?
10. What was the reason for starting the programme?
11. What are the landmarks in the development of partnership?
12. How was the private partner selected?
13. What was the criterion for selection of the two partners?
14. What is your role in this partnership programme? Do you face any problems while fulfilling this role?
15. Where does the funding for this project come from?
16. What is the amount?
17. Under which heads it is utilised?
18. Is there a MOU?
19. Mention some highlights of the MOU.
20. What is the duration of the contract?
21. What are the terms and conditions of the partnership?
22. How is the programme implemented?
23. What are the regions where it is being implemented?
24. Is the programme being replicated elsewhere?
25. How were these regions selected and by whom?
26. What are the main activities of this programme?
27. Who are the important stakeholders in the implementation of this programme? What are their roles?
28. What are the forthcoming activities of the programme (future plans)?
29. What can be done to make the programme self-sustaining?
30. Is the programme reaching to the poorest segment of the society?
31. What is being done to ensure the equity of the programme?
32. Are the two partners accountable for their work?
33. Who monitors the programme?
34. What indicators are used for monitoring the programme?
35. What is done to ensure the quality of the programme?
36. What more can be done to improve the programme?
37. What are the problems that come in the way of successful implementation of the programme?
38. What is the outcome of the programme?
39. What are the strengths of the programme?
40. What are the weaknesses of the programme?
41. What is your view on PPP in health programmes?
42. What are the advantages?
43. What are the disadvantages?

II. Interview guide for Officials of MCH Van (SNGO)

1. Name:
2. Age:
3. Designation:
4. Years of experience:
5. Years of service in present location:
6. Salary:
7. What is it that you know about the SNGO scheme?
    a. When was it initiated?
    b. How was it initiated?
    c. Who are the two partners in the scheme?
    d. What is the role of each of the two partners?
    e. What is the goal of this partnership project?
    f. What are the activities that are being run in it?
    g. How is it being implemented?
    h. Who are the important stakeholders in this project?
    i. Are you aware about the funding for this project?
    j. If yes, what is the amount and where is it utilised?
    k. What is the duration of the contract?
    l. What are the regions where the programme is implemented?
    m. How were these regions selected?
8. Which villages does the van go?
9. What is the schedule of visit?
10. How was this schedule prepared?
11. What is the staff composition?
12. What are the equipment's available on the van?
13. What medicines are available?
14. How many patients come to the van on an average/per day/per village?
15. What are the common problems for which they come for?
16. What are the advantages of taking the van to the villages?
17. How is the SNGO scheme different from the earlier MCH scheme?
18. What is the outcome of the SNGO scheme?
19. What is your role in the programme?
20. Do you face any problems while performing this role?
21. How were you appointed for this project?
22. Did you receive any training?
23. If yes, for how many days?
24. What was the content of the training programme?
25. Who monitors the programme?
26. What indicators are used for monitoring the programme?
27. What is done to ensure the quality of the programme?
28. What more can be done to improve the programme?
29. What are the problems that come in the way of successful implementation of the programme? Who are the two partners in the partnership programme?
30. What are the strengths of the programme?
31. What are the weaknesses of the programme?
32. What is your view on PPP in health programmes?
33. What are the advantages and disadvantages of PPP?

III. Interview guide for Officials of PHC and Sub-centre (SNGO)

1. Name:
2. Age:
3. Designation:
4. Qualification:
5. Years of experience:
6. Years of service in present location:
7. Salary:
8. What are the programmes that are being run under NRHM in your PHC?
9. Which according to you is the best programme under NRHM?
10. Have you heard of the SNGO scheme of Dhawale trust?
11. If yes, what is being done under the scheme?
12. What is the impact of this scheme on the population falling under your PHC?
13. Are they doing better work in comparison to your own staff in providing ANC, PNC and thus reducing the maternal mortality?
14. Do you work in collaboration with Dhawale trust in bringing down the IMR and MMR and providing complete ANC/PNC and immunization coverage?
15. If yes, how?
16. What are the other PPP projects that are running in your region?
17. Details
18. Which according to you is the best?
19. What is your view on Public Private Partnership projects in health?
20. What are the advantages?
21. What are the disadvantages?

IV. FGD Guidelines for the villagers (SNGO)

1. Name of group members:
2. Age, Gender, Caste, Educational qualification, Occupation, Income, Number of children:
3. Marital Status and age of marriage of the group members:
4. Nearest PHC (name and distance):
5. Nearest Sub-centre (name and distance):
6. How many times have you conceived, Number of live births, Number of Still births
7. Reason for still birth(if any)
8. Number of women currently pregnant in the group and month of pregnancy
9. Average number of children amongst the women in the group
10. Age of the children

I. Family Planning

11. Number of women using family planning method
12. Reason for using the same
13. Type of method used
14. If sterilization, then where was it done and what was the cost implications?

II. Place of Delivery and JSY

15. Place of delivery :
    a. Currently pregnant
    b. Youngest child
    c. Eldest child
16. If home delivery, reason for the same
17. If Institutional delivery, reason for the same
18. Place of delivery for Institutional delivery
19. Are you aware of the benefits of JSY?
20. If yes specify the amount
21. Did you receive these benefits
22. If yes, what amount did you receive?
23. Who gave you this amount?
24. Specify the time when you received

III. Antenatal care

25. Are you receiving/did you receive any ANC. If yes, specify the source

26. How many ANC did you receive in:
    a. First trimester(1-3 months)
    b. Second trimester (4-6 months)
    c. Third Trimester (7-9 months)
27. Mention the facilities that you received during ANC (Blood test, Weight Measurement, Abdominal Check-up, BP check-up, Iron & folic acid and Calcium tablets, TT injection, Sonography, Others)

IV. Post Natal Care

28. Did you receive PNC? If yes, what was the source
29. For how many months after the delivery did you receive PNC?
30. How many PNC did you receive?
31. What services did you receive in PNC?

V. Immunization

32. Have you got all your children immunized
33. If no, mention the number of children unimmunized and their ages
34. If yes, mention the number of children immunized and their ages:
35. What are the vaccines that have been administered on your child?
36. What is the source of immunization?

VI. Awareness about MLDT

37. Where do you usually go when you fall sick?
38. Have you heard of ML Dhawale Memorial Trust?
39. If yes, what services do they offer in your region?
40. Does the Mobile van of Dhawale trust comes to your village?
41. What services do they offer?
42. Have you ever availed their services?
43. If yes, were you satisfied by their services?
44. What work is being done by their workers (CHV, MPW) in your village?
45. How do you rate their work?

VII. Awareness about other Health Programmes

46. Are you aware about other health programmes under NRHM?
47. If yes, what are they?
48. Which according to you is the best programme under NRHM?

D. Interview guide for officials at Taluka, District and State level

(THO/DHO/DPM/RCHO/State officials of NRHM)

1. Name:
2. Age:
3. Designation:
4. Years of experience:
5. Years of service in present location:
6. Are you aware of PPP projects in your state/district/taluka?
7. If yes, mention these projects?
8. Details of each project as per your knowledge.
    a. partners
    b. goal
    c. duration
    d. activities
    e. funding
    f. your role
    g. Evolution
    h. partnership selection
    i. performance
    j. Problems in implementation
    k. what can be done to make it better
9. Which projects are doing good and why?
10. Which projects are not doing good and why?
11. What are the advantages of establishing partnership with private bodies in Health programmes?
12. How does the PPP help in enhancing the effectiveness of a particular programme in terms of the following:
    a. Outreach
    b. Quality
    c. Affordability
13. What are the disadvantages of establishing partnerships with private bodies in Health programmes?
14. How is NRHM doing in your block/district/state?
15. What is your role in NRHM and do you face any problems in delivering your role. If yes, mention.
16. Which according to you is the best programme of NRHM and why?

E. Interview guide for officials of various PPP programmes

1. Name:
2. Age:
3. Designation:
4. Years of experience:
5. Years of service in present location:
6. Who are the two partners in the partnership programme?
7. What is the role of each of the partners?
8. a. What is the goal of the partnership programme?
   b. Does the private and public partner share the same goal?
   c. If No, how are the goals different?
9. How and when the partnership was initiated? What was the reason for starting the programme?
10. What are the landmarks in the development of partnership?
11. How was the private partner selected?
12. What was the criteria for selection of the two partners?
13. What is your role in this partnership programme? Do you face any problems while fulfilling this role?
14. Where does the funding for this project come from?
15. What is the amount?
16. Under which heads it is utilized?
17. Is there a MOU?
18. Mention some highlights of the MOU
19. What is the duration of the contract?
20. What are the terms and conditions of the partnership?
21. How is the programme implemented?
22. What are the regions where it is being implemented?
23. How were these regions selected?
24. Who selected them?
25. What are the main activities of this programme?
26. Who are the important stakeholders in the implementation of this programme?
27. What are their roles?
28. What are the forthcoming activities of the programme (future plans)?
29. Is the programme being replicated somewhere?
30. What can be done to make the programme self-sustaining?
31. Is the programme reaching to the poorest segment of the society?

32. What is being done to ensure the equity of the programme?
33. Are the two partners accountable for their work?
34. Who monitors the programme?
35. What indicators are used for monitoring the programme?
36. What is done to ensure the quality of the programme?
37. What more can be done to improve the programme?
38. What are the problems that come in the way of successful implementation of the programme?
39. What is the outcome of the programme?
40. What are the strengths and weaknesses of the programme?
41. Any other comments on the programme.
42. What is your view on PPP in health programmes?
43. What are the advantages?
44. What are the disadvantages?