The Impact of NRHM Child health Programme on the Neonatal Death in India

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Abstract

India contributes to one-fifth of global live births and more than a quarter of neonatal deaths. Nearly, 0.75 million neonates died in India in 2013, the highest for any country in the world. The current Neonatal Mortality Rate is 28 per 1000 live births. Given the infant and under-five child mortality rates of 40 and 49 per 1000 live births respectively, 70% of total infant deaths, and more than half of under-five deaths fall in the neonatal period. Indeed, with the early NMR of 22 per 1000 live births, deaths in the first week alone account for 45% of total under-five deaths.The rapid human development of the past decades is reflected in a steep fall in infant mortality. In 1960, 12% of babies worldwide died in their first year of life compared to only 3% in 2015.1 Over three-fifths of the infant deaths that still occur are neonatal deaths, meaning deaths in the first month of life. Although progress in reducing both neonatal and infant deaths has been rapid, it has also been uneven. Twenty-seven percent of neonatal deaths now occur in India. India has a large population, but its share of neonatal mortality is disproportionately large: it is home to 19% of worldwide births. To explain India's unique later-born NNM advantage, we

document these facts about maternal underweight for India, and show that they differ compared with the rest of the developing world.

Keywords: Neonatal, NRHM, NNM, NMR, Infant Mortality.

1.1 Introduction

National Rural Health Mission (NRHM) was launched in April 12, 2005 to address the health needs of the underserved rural population especially women, children and vulnerable sections of the society and to provide affordable, accessible and quality healthcare. NRHM focuses on decentralized health planning, service delivery, creating knowledge hubs within district hospitals, strengthening secondary level care at district hospitals, expanding outreach services, improving community processes and behavior change communication, human resources development, public health management, and health management information systems. NHM particularly focuses on equity: prioritizing the health of tribal populations, those in LWE and urban poor. A key outcome of NHM is to reduce Out of Pocket expenditures. Health outcomes, output and process indicators are monitored through large scale surveys conducted periodically with evaluations, use of HMIS data, and periodic reviews done. Decentralized Planning and Communalization also encompasses capacity building in terms of training and sensitization of ASHAs, Village Health and Sanitation Committee (VHSC) and Rogi Kalyan Samiti (RKS) members about their roles and responsibilities towards proper utilization of Grants and Funds in the best interest of the users. The financial management also entails evaluation of utilization of untied funds to VHSC, SC, PHC and CHC. communalization process necessitates involvement of Panchayats in governance of VHSCs, hospital development committees and district health societies. The process parameters for the success of the communalization process can be adjudged in terms of constitution of VHSCs, recruitment and functioning of ASHAs, constitution of registered Rogi Kalyan Samities at District Hospitals (DHs), Sub-Divisional Hospitals (SDHs), Community Health Centres (CHCs) and Primary Health Centres (PHCs). The detailed action plan to achieve the objectives comprised primarily of an increase in the public spending on health and family welfare from 0.9 percent to 2-3 percent of the Gross 41 Domestic Product (GDP) during 2005-12. Strengthening of policies and programs to revitalize the health systems through decentralized management at the local level and synergize health with social determinants of health viz. nutrition, sanitation, hygiene and safe drinking water. The Mission strategize decentralization in the administrative and management of the public health care delivery system

to effectively meet the health and family welfare needs of the people in diverse social, economic and cultural settings. The Mission also addresses the issue of empowerment of the community to own, manage and control the public health care delivery system.

The rapid human development of the past decades is reflected in a steep fall in infant mortality. In 1960, 12% of babies worldwide died in their first year of life compared to only 3% in 2015.1 Over three-fifths of the infant deaths that still occur are neonatal deaths, meaning deaths in the first month of life. Although progress in reducing both neonatal and infant deaths has been rapid, it has also been uneven. Twenty-seven percent of neonatal deaths now occur in India. India has a large population, but its share of neonatal mortality is disproportionately large: it is home to 19% of worldwide births. To explain India's unique later-born NNM advantage, we document these facts about maternal underweight for India, and show that they differ compared with the rest of the developing world. We use two strategies to show that the fraction of a cohort of mothers who are underweight declines as they age more steeply in India than elsewhere: first, by matching cohorts across repeated cross-sectional survey waves, and second, in a specialized longitudinal survey that tracked a sample of mothers in four developing countries .

1.2 Review of literature

Khan K et al. (2006) had 34 datasets (35197 maternal deaths) were included in the primary analysis, where wide regional variation in the causes of maternal deaths was recorded. Haemorrhage was the leading cause of death in Africa (point estimate 33·9%, range 13·3–43·6; eight datasets, 4508 deaths) and in Asia (30·8%, 5·9–48·5; 11, 16 089). The hypertension disorders (25·7%) and abortion (12%) were responsible for highest deaths in Latin America and the Caribbean in the region. Deaths caused by sepsis were higher in Africa, Asia, Latin America and the Caribbean (2·06) than in developed countries. Haemorrhage and hypertension were found as the leading causes of MD in developing countries.

Pillai G. (1993) in their study found that the immediate causes of maternal mortality include pregnancy and delivery and the management of complications such as haemorrhage, toxic and bacterial infections (sepsis), eclampsia, and obstructed labour. The poor health, nutrition, and socioeconomic status of women are the underlying causes of maternal death. Gender bias in the allocation of meagre food supplies results in the poor health and nutritional status of women, rendering a woman's pelvis too small, which causes obstructed labour and even death.

Socioeconomic status is linked to access the family planning and health services which affect mortality and reproductive health

Fazili F. et al (1999) found their research that per-natal mortality reflects the amount of pregnancy wastage due to fetal and neonatal deaths, and is considered a sensitive indicator of maternal and child health status in particular and community health status in general. Per-Natal Mortality Rate (PNMR) was significantly higher among illiterate mothers, in extremes of age, among those living in joint families, and those having incomplete antenatal care. PNMR was low among the higher socioeconomic classes. Maternal weight had a significant effect upon peri natal loss.

Abdullah H.B. et al (2008) found in their study that NGO facilitation of government programmes is a feasible strategy to improve equity of maternal and neonatal health programmes. Improvements in equity were most pronounced for household practices, and inequities were still apparent in health care utilization. The equity of programme coverage and antenatal and newborn care practices improved from baseline to end line in the intervention district while showing little change in the comparison district. Equity in health care utilization for mothers and new-borns also showed some improvements in the intervention district, but notable socio-economic differentials remained, with the poor demonstrating less ability to access health services.

Kaistha M et al. (2016) reported that reducing maternal and child mortality were among the most important goals of the NRHM with aim to increase institutional deliveries. NRHM identified the role of RMNCH councillors for advocacy and communication and social mobilization of disadvantaged people. FHW were trained as RMNCH district level councillors in Himachal Pradesh. The study to evaluate the effectiveness of structured teaching programme regarding postpartum family planning, reproductive, maternal, new-born and child health among FHW. The 5 days training imparted through didactic lectures were delivered by experienced public health professionals. Standardized training material developed by GOI was used. A total of 60 participants were enrolled but only 52 participated. The average age of the participants was 35 years ±5.7 years. The participants had an average 10 years of working experience. A majority 46% of these participants were working at PHC. Knowledge mean score of various thematic areas of participants increased from mean score of 21.9 to 25.4. It was observed that after training post-test knowledge score showed extremely significant.

1.3 Objective of the study

This research paper have following objective

- ➢ To explore the NHRM performance in India,
- ➢ To find out the impact of NRHM child health programme on the Neonatal death rate in India.
- ➢ To suggest proper guideline for the performance of various child helth programme in India,

1.4 Hypothesis of the studies

We will start from the following hypothesis

- ➢ $H_0=$ There is no significant difference between the child health programme of NRHM and the Neo-natal death in India.

1.5 Research Design

This study is based on the secondary data and in this study researcher collect the pre and post NRHM data of neonatal death means data before 2005 and data after 2005. The pre NRHM data is from 1993-2005 and post NRHM data is from 2005-2018.

1.4.1 Collection of data

The study is fully based on the secondary data which is collected from the WHO CSSO, NSSO, and Ministry of Health Govt. of India.

1.4.2 Research Methodology

The study find the relationship between the Child health programmes of NRHM and the Neonatal death in India, and analysis the performance of NRHM child healthprogramme.So we will use **Paired t test** to find out the Impact of the relationship or Impact of NRHM Child Health Programme on the Neonatal death in India, we are using Excel software to show this result.

1.5 Present Performance of NRHM child health programme in India.

India contributes to one-fifth of global live births and more than a quarter of neonatal deaths. Nearly, 0.75 million neonates died in India in 2013, the highest for any country in the world.The current Neonatal Mortality Rate is 28 per 1000 live births. Given the infant and under-five child mortality rates of 40 and 49 per 1000 live births respectively, 70% of total infant deaths, and

more than half of under-five deaths fall in the neonatal period. Indeed, with the early NMR of 22 per 1000 live births, deaths in the first week alone account for 45% of total under-five deaths.India is one of the world's largest and most populous countries, made up of more than 700 diverse districts. Variations in mortality in the country are known at the macro level, and now the India State-Level Disease Burden Initiative Child Mortality Collaboratorshave mapped neonatal and under-5 mortality rates from 2000 to 2017 for every district in India, going down to geospatial grids as small as 5 km × 5 km. In *The Lancet*, the study authors report that the under-5 mortality rate (U5MR) in India decreased from 83·1 deaths (95% uncertainty interval 76·7–90·1) in 2000 to 42·4 deaths (36·5–50·0) per 1000 livebirths in 2017, and the neonatal mortality rate (NMR) decreased from 38·0 deaths (34·2–41·6) to 23·5 deaths (20·1–27·8) per 1000 livebirths. U5MR varied 5·7 times between the various states and 10·5 times between the 723 districts in 2017, whereas NMR varied 4·5 times across the states and 8·0 times across the districts.
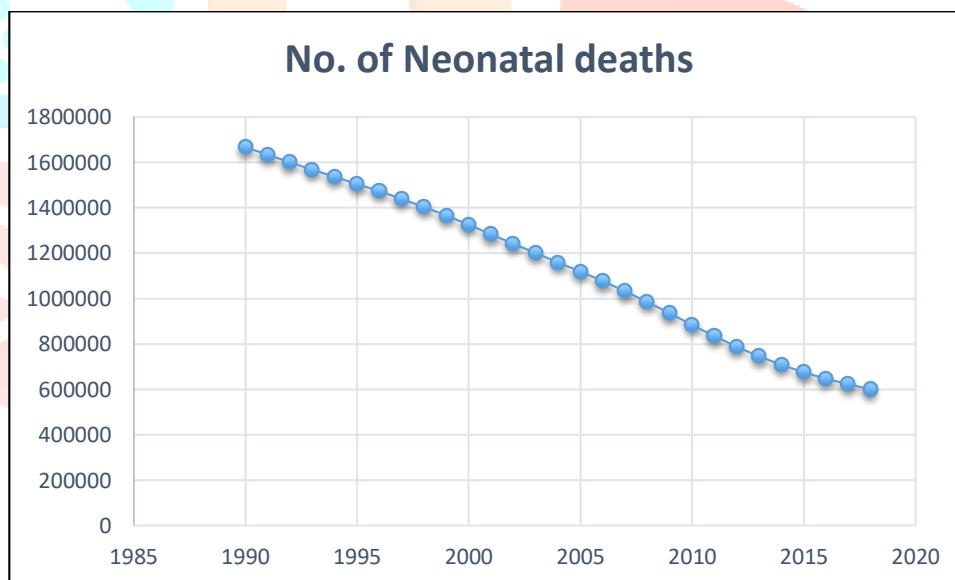
Figure: 1.1

Figure 1.1 clearly shows that the neonatal death in India continuously decreasing from 1990 to 2020.in 1990 where the neonatal death rate was morethan 1600000 in 2017 it is only 500000. Show this figure of decreasing or negative line is only possible due to proper heath facilities and NRHM child health programme which is started 2005 the rate of neonatal death rate start decreasing from 2005 very fast as compare to 1990 to 2005.

1.6 Analysis of Data

Table : 1.1

Result	No. of Neonatal deaths Pre-NRHM	No. of Neonatal deaths Post-NRHM
Mean	1354911	810429.3
Variance	2.16E+10	2.58E+10
Pearson Correlation	0.986057	
Df	12	
t Stat	67.57961	
P(T<=t) one-tail	0.0000	

Table no. 1.1 which analysis Paired t test between the Pre and Post NRHM neonatal deaths from 1993 to 2018the value of P (P< 0.05) the Calculated P value is 0.0000. the mean value of variable 1 is 1354911 and Variable 2 is 810429.3 which shows that there are positive changes taken place in post NRHM periods the neonatal average death decreases The correlation between the variables is 0.0986057 means 98 % variation is recorded in the variables i.e the variables is strongly positive correlated andt= 65.57961 revels that that is significant .This test is calculated at 5% degree of freedom.

1.7 Conclusion of the Study

In this paper the author analysed the role of NRHM Child Health Programme in controlling and decreasing the Neonatal death rate in India the Paired t test tool is used to find out the impact of NRHM child health programme on the neonatal death in India.The test has find that the null hypostasis i.e. H_0= There is no significant difference between the child health programme of NRHM and the Neo-natal death in India has been Rejected that the result is that is there is positive significant relationship between the NRHM child health programme and neo natal death in India.

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