Does Economic Status of Women Affect Obstetric Morbidity?

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Introduction

A woman is the most beautiful creature of the God in earth. Her health is not only a state of physical well being but is an expression of the many roles she performs as mother, care giver and wage earner and their interaction with the social and economic as well as cultural circumstances which influence her daily life. In patriarchal system women's formal participation in decision making is weak, it also limits women in poor education and largely informal employment, so they become powerless to improve the circumstances in which they live. In these conditions, women are often not in position to attain and maintain health and well being. In spite of the physical strain that child bearing and caring for children places on women, they often put their children's and their family's needs before their own at the expense of their own health (Ghosh, 2005).

The safe motherhood conference in Nairobi (1987) focused attention on the high levels of maternal mortality in developing countries. Following this conference the WHO initiated the safe motherhood program to reduce maternal mortality in developing countries. In less developed countries more than half a million mothers die each year from maternal causes. These maternal causes may be due to the consequences of pregnancy and childbirth or the consequences of treatment received during pregnancy or childbirth. Reproductive morbidity refers to the diseases that affect the reproductive system, although not necessarily as consequence of reproduction. Reproductive morbidity can be classified into three categories: obstetric morbidity, contraceptive morbidity and gynecological morbidity. So, according to WHO, "maternal (Obstructed) morbidity" is defined as "the morbidity in a pregnant women from any cause related to or aggravated by the pregnancy or its management but not from accidental or incidental causes."

The International Conference of Population and Development (ICPD) stress the importance of women's health, and especially their reproductive health for overall development. The ICPD

reiterated the need for population based research on reproductive morbidity. Though the number of studies conducted in India on reproductive morbidity is very limited, the existing few studies have widened the scope of our knowledge on this increasing trend of the problem. The earlier study by Kumar shows that Reproductive morbidity in general, is an outcome of not just biological factors but of women's poverty, powerlessness and lack of control over resources as well. Malnutrition, infection, early and repeated childbearing and high fertility also play an important role in poor maternal health conditions in India (Kumar, 2004). Maternal morbidity ratio was 11 times higher than the maternal mortality ratio (Prual et al, 1998). A study conducted in Orissa shows that education, castes, place of residence, standard of living are highly associated with safe delivery as well as obstetric morbidity (Shaoo, 2002). Children ever born is inversely related with pregnancy complication i.e. those women had four and more children, reported less complication during pregnancy compared to women with one or two children (Gupta et al, 2008). Rates of severe obstetric complication increased from 1998-1999 to 2004-2005. For many of these complications, these increases were associated with the increasing rate of cesarean delivery (Kuklina et al,2009).

Although maternal age, parity, socioeconomic status education and nutritional status are basic risk factors for maternal health and healthcare behavior (Sharma et al, 2008). A study conducted among 930 women, living in 86 villages indicated that not the community social and health infrastructure but community impoverishment was associated with the likelihood of reporting the morbidity and seeking appropriate care (Sharma et al, 2009). The absence of antenatal care cannot be attributed to a shortage of medical facilities. It is more likely due to ignorance or illiteracy among women of a lower socioeconomic class, who are often most vulnerable to obstetric complications (*Nasrat et al, 1999*). People living in poor communities may also less likely to seek medical care because of their greater distance from health providers and lack of knowledge about best response to the illhealth (WHO, 2001).

Need for the study

From the foot steps of Cairo conference, there has been some concern on the general health and morbidity status of women in India but very little attention has been given to reproductive

morbidity of women. Existing literatures tell us very little about the several dimensions of reproductive (Obstratic) morbidity. But magnitude of the problems may be in the dark till now. National Family Health Survey- III reported that almost 62 percent women in India suffer from at least one obstetric health problem. On the other hand many women may report the morbidity but due to lack of social awareness and decision making power women are not visiting the heath facilities. Therefore most of the time diseases are not diagnosed at the right time which may cause women's health in a more vulnerable situation (Ghose, 2005). Given the common prevalence of the reproductive morbidity, it is very necessary to understand and identify the underlying correlates, which place women at perpetual risk of these infections. Therefore in this study attempts are made to throw some light on obstratic morbidity situation in India. So the present study focuses upon the levels of reproductive (Obstratic) morbidity and identifies the socio- demographic determinants of reproductive morbidity in different economic groups of India.

Data and Methodology

Data

The data from National Family Health Survey (NFHS-III) 2005-2006 has been used for the present study. The NFHS was a nationally representative sample survey of 99260 ever-married women, ages 15-49. It was conducted in 29 states. This study analyzes data of 38745 currently married women who had given birth in five year preceding the survey.

Method

NFHS-3 collected information on obstetric morbidity from women about the most recent birth in the five years preceding the survey, the mother was asked if at any time during the pregnancy she experienced any of the following pregnancy-related Problems: difficulty with vision during daylight, night blindness, convulsions (not from fever), swelling of the legs, body or face, excessive fatigue, or vaginal bleeding. Further ask if she had massive vaginal bleeding or very high fiver at any time during the two month after pregnancy. For the present study, the above mention problems are clubbed together as obstetrical morbidity.

Mean number of obstetric health problem among women under each economic class was calculated by social and demographic characteristics. To study the effect of socio-economic and demographic factors on obstetrics morbidity, logistic regression was carried out for all the class (Poor, middle and rich) separately in which dependent variable is obstetric morbidity. For the purpose of analysis the dependent is taken as dichotomous that is, women with problem and women with no problem.

Results and Discussion

Table 1: Percentage distribution of currently married women suffering from different type of obstetric health problems

Obstetric Morbidity	Percent
Pregnancy Related Problems	
Difficulty with daylight vision	6.3
Night blindness	8.8
Convulsions not from fever	10.3
Lag, body or face swelling	25.1
Excessive fatigue	47.8
Vaginal bleeding	4.4
Postpartum Problems	
Massive vaginal bleeding	12.4
Very high fever	13.5

The analysis indicated that in India, 62.7 percent of poor women, 59.8 percent of middle class women and 61.0 percent rich women had obstetric morbidity. The prevalence of different type of obstetric health problem is explained in Table 1. The different types of problem under obstetric morbidity in the analysis include pregnancy related and postpartum problem. Among pregnancy related problem almost 6 percent women had difficulty with vision during daylight, 9 percent had night blindness, 10 percent had convulsions (not from fever), 25 percent had swelling of the legs, body or face, 48 percent had excessive fatigue, 4 percent had vaginal bleeding, 12 percent

had massive vaginal bleeding and 14 percent of women had very high fiver during the postpartum period.

The mean number of problem under obstetric morbidity by different economics group shows that the mean number of obstetric morbidity is 1.43 for poor women, 1.21 for middle class women and 1.14 for rich women. In our analysis we are interested to know how mean number of obstetric problem is change over the socio-demographic characteristic among different economic group. Our study reveals that in poor class mean number of obstetric morbidity is highest for the age group 45-49, for middle class it is highest for age group 35-39 and for rich class it is highest for the age group 15-19. Children ever born is a important factor for the obstetric morbidity, mean number of obstetric morbidity is high for the women having six and above children for all class of women but the mean number of problem is highest for poor women. Education has negative effect on obstetric morbidity. For example mean number of obstetric morbidity is 1.44 in poor women and 1.15 in rich for women has no education and 1.19 in poor women and 1.07 in rich for women has high education. Mean number of obstetric morbidity is high for not working women but it is also high in poor class. Muslim women belonging to poor class had 1.62 mean number of obstetric morbidity whereas 1.46 for middle class Muslim women. In poor class mean number of obstetric morbidity is 1.45 in higher caste women, 1.44 in other backward class, 1.41 in schedule caste and 1.39 in schedule tribe, in middle class it is also high for the higher caste (1.25) women followed by schedule tribe (1.22) and in rich class this is highest for the schedule caste (1.16). Place of residence also has a significant effect on obstetric morbidity, mean number of obstetric morbidity is high for the rural women in all class but poor women are more suffering from obstetric morbidity. For example mean number of obstetric morbidity in rural area is 1.43 for poor women, 1.20 for middle class women and 1.16 for rich women. Women belonging to joint family have more number of obstetric problems than the women of nuclear family in both poor and rich class but it is same for the middle class. Mass media exposure has a negative effect on obstetric morbidity with the increase in mass media exposure mean number of obstetric morbidity is decline but it show he high value for poor class women.

Logistic regression for Obstetric Morbidity

A multiple logistic regression analysis was performed in order to estimate the effect of socio-economic and demographic factors on obstetric morbidity in different class. In poor class children ever born, education of women, work status, religion, caste, residence and mass media exposure has significant effect on obstetric morbidity, in middle class education, religion and caste has significant effect and in rich class obstetric morbidity has significantly affected by education, religion and place of residence. It shows that in poor class more factors are affected obstetric morbidity. Table 3 shows that educated women are more likely to have obstetric morbidity than the no educated women in all class. For instead primary educated women of poor and middle class are 25 percent and rich women has 14 percent more likely to have obstetric morbidity than illiterate women, whereas secondary educated women in poor class is 14 percent and rich class is 16 more likely to have obstetric morbidity than illiterate women. May be because of educated women are more aware about this type of problem and reporting more whereas illiterate women are not aware that this is a some type of problem they consider it as normal. Working women of poor class are 15 less likely to have obstetric morbidity then non working women. Odds of having obstetric morbidity are high in Muslim women then Hindu of all class; it is almost 36 percent and 32 percent high for poor and middle class women. In rich class it is high for other religion people then Hindu. Likelihood of having obstetric morbidity is 17 percent less in the higher caste women than Schedule caste women in middle class women. In urban areas problem of obstetric morbidity is less, may be because of more health facilities are available in urban area than the rural areas. Mass media show significant effect on obstetric morbidity in poor class women. Women of poor class with partial exposure are 13 percent more likely to have obstetric morbidity than women with no exposure.

Conclusions

Maternal mortality still high in developing countries is mainly due to the maternal causes, which is related to the life-giving event and most due to inadequate medical care at the time of childbirth (Reshmi, 2003). Women's lives can be saved and their sufferings can be reduced if health systems could address serious and life threatening complications of pregnancy and child

birth when they occur. One of the best ways to do this is to make sure that women received skilled care at delivery or "Safe delivery". The main objective of the present study was to examine the levels of Obstetric morbidity and to examine the socio-demographic factors associated with morbidity in different economic class.

It can be concluded from the forgoing analysis that in India, the prevalence of reproductive morbidity among women is high. The mean number of reproductive health problems varies by socio- economic and demographic characteristics of women. The mean number of problems related to obstetric morbidity is high among poor class women as compared to middle and rich class. In India, almost 62 percentages of women had experienced obstetric morbidity for the recent birth during the five years prior to the survey. Among pregnancy related problem highest percentage of women suffering from excessive fatigue followed by swelling of the legs, body or face and among postpartum problems 12 percent had massive vaginal bleeding and 14 percent of women had very high fiver.

Result of logistic regression analysis shows that, in poor class children ever born, education of women, work status, religion, caste, residence and mass media exposure has significant effect on obstetric morbidity, in middle class education, religion and caste has significant effect and in rich class obstetric morbidity has significantly affected by education, religion and place of residence.

Policy and Research implication

Policy should be made to create awareness regarding reproductive morbidity among people belonging to different social and economic milieu. Mass media particularly print and audio-visual can play a vital role in providing knowledge about the consequences of morbidity. More research should explore reasons for reproductive morbidity from the cultural perspectives and also other related health issues to provide better guidelines for planners, administrators and policy makers.

Limitations

It would have been useful to study the effect of socio-economic and demographic factors on treatment seeking behavior for obstetric morbidity. However, this was not carried out since NFHS-III does not provide data on treatment seeking behavior of those who are suffering from obstetric morbidity.

References

Ghosh S.,2005, " A Study of Self-Reported Morbidity among the Women of Reproductive Age Group and their Treatment Seeking Behaviour: An insight into the state of MadhyaPradesh and West Bengal" Seminar Paper, International Institute for Population Sciences, Mumbai.

Gupta S. K., Prasad R., 2008 "Reproductive Morbidity among Currently Married Women in EAG States: Evidence from the Reproductive and Child Health survey 2002-2004", M.Phil dissertation, International Institute for Population Sciences, Mumbai.

Kuklina E. V., Meikle, S. F., Jamieson D. J., Whiteman M. K.,Barfield W. D., Hillis S. D.and Posner S. F., 2009 "Severe Obstetric Morbidity in the United States: 1998-2005", Obstetrics & Gynecology, Vol. 113(2:1): 293-299.

Kumar B., 2004, "Reproductive Morbidity among Scheduled Tribe women in selected districts of Jharkhand", Seminar Paper, International Institute for Population Sciences, Mumbai.

Nasrat H.A., Youssef M.H.M., Marzoogi A. and. Talab F,1999"Near miss" obstetric morbidity in an inner city hospital in Saudi Arabia, Vol. 5 (4): 717-726.

Prual A, Huguet D, Garbin O and Rabé G, 1998, " Severe obstetric morbidity of the third trimester, delivery and early puerperium in Niamey (Niger)", African Journal of reproductive Health, Vol. 2(1):10-9.

Reshmi. R. S, 2003 "Reproductive Morbidity among Women in South India", Seminar Paper, International Institute for Population Sciences, Mumbai.

Sahoo H., 2004, "Safe delivery and Reproductive (Obstetric) morbidity in Orissa: Exploring their possible relationships based on DLHS-RCH, 2002" Seminar Paper, International Institute for Population Sciences, Mumbai.

Sharma S.K. & Panee Vong-Ek, 2009, "Contextual Influences on Obstetric Morbidity and Related Care Seeking Behaviour in Thailand", Journal of Health Psychology, Vol. 14(1): 108-123.

Sharma S.K. and Panee V., 2008, "Obstetric Morbidity Care in Thailand: Do Communities Matter?", Journal of Population and Social Studies, Vol. 16 (2): 95-120.

World Health Organization (1994), "Mother Baby Package: Implementing safe motherhood in countries: Maternal Health and Safe Motherhood Programme", Division of Family Health, Geneva.

World Health Organization, 1987, "Preventing the tragedy of maternal deaths: A report on the International safe motherhood conference", Nairobi, Kenya.

World Health Organization, 2001, "Macroeconomic and Health: investigation in health for economic development", Geneva: Commission Macroeconomic and Health.

Table 2: Obstetric problem among currently married women in India

Background Characteristics	Mean No. of Obstetric Morbidity			
	Poor	Middle	Rich	No.
Age				
15-19	1.46	1.23	1.25	2929
20-24	1.40	1.20	1.13	13026
25-29	1.40	1.17	1.16	12595
30-34	1.49	1.27	1.08	6538
35-39	1.41	1.31	1.17	2648
40-44	1.47	1.15	1.13	809
45-49	1.64	0.85	0.83	200
Children Ever Born				
1	1.43	1.21	1.18	10189
2-3	1.35	1.14	1.09	17796
4-5	1.48	1.31	1.18	6790
6+	1.55	1.39	1.39	3969
Education				
No education	1.44	1.22	1.15	18306
Primary	1.43	1.34	1.21	5431
Secondary	1.34	1.12	1.14	12682
Higher	1.19	1.31	1.07	2325
Work Status				
No	1.47	1.22	1.16	27230
Yes	1.35	1.18	1.06	11456
Religion				
Hindu	1.39	1.15	1.12	30611
Muslim	1.62	1.46	1.20	6324
others	1.52	1.19	1.23	1810
Cast				
Schedule Caste	1.41	1.11	1.16	7770
Schedule Tribe	1.39	1.22	1.09	3606
Other Backward Class	1.44	1.21	1.14	15548
Others	1.45	1.25	1.13	10619
Place of Residence				
Urban	1.33	1.14	1.08	10415
Rural	1.43	1.23	1.21	28330
Household Structure				
Nuclear	1.41	1.20	1.08	16652
Non nuclear	1.44	1.20	1.16	18657
Mass Media Exposure				
No Exposure	1.43	1.30	1.24	17355
Partial Exposure	1.41	1.15	1.13	19020
Full Exposure	1.33	1.11	1.07	2369
Total	**1.43**	**1.21**	**1.14**	**38745**

Table 2: Variation in obstetric morbidity: A logistic regression analysis

Explanatory Variables	Exp(B)		
	Poor	Middle	Rich
Age	0.995	1.001	0.999
Children Ever Born	1.026*	0.982	0.984
Education			
No education®			
Primary	1.257***	1.252***	1.148**
Secondary	1.145**	1.107	1.163***
Higher	1.14	1.07	1.150**
Work Status			
No®			
Yes	0.851***	0.943	0.983
Religion			
Hindu®			
Muslim	1.365***	1.328***	1.037
others	1.058	1.018	1.152**
Cast			
Schedule Caste®			
Schedule Tribe	0.897*	0.924	1.051
Other Backward Class	1.05	0.940	0.982
Others	1.04	0.837**	0.975
Place of Residence			
Rural®			
Urban	0.847***	0.952	0.909**
Household Structure			
Non nuclear®			
Nuclear	0.947	0.965	0.962
Mass Media Exposure			
No Exposure®			
Partial Exposure	1.137***	0.973	1.057
Full Exposure	0.793	1.094	0.903

Note: Dependent Variable: 0-No Obstetric Morbidity, 1- Obstetric Morbidity

*** $p<0.01$, ** $p<0.05$, * $p<0.1$

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