

# Utilization of maternal health care services with special emphasis on Janani Suraksha Yojana in a slum of Kolkata, West Bengal

## Abstract

**Introduction:** Maternal health issues continue to be a forefront of national and global health policies. Janani Suraksha Yojana (JSY) was launched under the umbrella of National Rural Health Mission to increase the number of institutional deliveries and decrease the maternal and neonatal mortality. **Objective:** The aim was to assess the utilization of maternal health care services including JSY among the mothers of under-five children in a slum at Baghbazar, Kolkata. **Materials and Methods:** A descriptive, cross-sectional study was conducted at Baghbazar slum, which is under the Urban Training Centre of R.G. Kar Medical College, Kolkata from 1<sup>st</sup> to 28<sup>th</sup> February, 2014. A total of 72 mothers of under-five children were interviewed using a predesigned, pretested and semi-structured schedule. **Results:** About 74% mothers were in the age group of 20-30 years and 56.8% mothers were from class IV socioeconomic status (Modified Prasad scale, 2013). Illiterate mothers were 4.2%. Three-fourth of the mothers heard about JSY. Around 47% mothers got cash benefit. Lack of eligibility document (42.1%) and ignorance (34.2%) were main causes of nonreceiving of the benefit. About 76% mothers had antenatal registration within the first trimester. About 99% were institutional deliveries. At least one postnatal check-up was received by 77% mothers. Only 33.3% mothers initiated breast feeding within 1 hr of delivery. Natural method (30.6%) and condom (30.6%) were main contraceptive methods accepted by them at the time of conducting study. **Conclusion:** Information, Education and Communication activities should be carried out to increase awareness regarding JSY utilization.

**Key words:** Antenatal, cash benefit, Janani Suraksha Yojana, slum

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### Access this article online

Website: [www.ijmedph.org](http://www.ijmedph.org)

DOI: 10.4103/2230-8598.161533

Quick response code:



## INTRODUCTION

Despite the long history of well-intentioned family welfare policies and some recent progress, maternal and child mortality in India remains high. Maternal mortality ratio (MMR) has fallen from 398 deaths/1,00,000 live births in 1997-1998 to 212 deaths/1,00,000 live births in 2007-2009 and 178 in 2010-2012.<sup>[1]</sup> Also, it has been reported that India and Nigeria account for a third of maternal deaths worldwide while India alone accounts for 22% of pregnancy related deaths worldwide.<sup>[2]</sup> India is behind the target of 109 deaths per live births to be achieved by 2015 under the United Nations-mandated Millennium Development Goals.<sup>[3]</sup> To accelerate this, Government of India launched an ambitious scheme called Janani Suraksha Yojana (JSY) on 12<sup>th</sup> April 2005 under the flagship of National Rural Health Mission to reduce MMR and neonatal mortality, by promoting institutional deliveries for which financial incentives are provided to mother.<sup>[4]</sup> It was a revamped version of the National Maternity Benefit Scheme.<sup>[5]</sup> Even though, JSY is a centrally sponsored scheme, its implementation differs across the states and union territories.<sup>[6]</sup> In West Bengal eligible mothers receive Rs. 900 (Rs. 600 from Government of India fund + Rs. 300 from the state fund) in the urban area.

The JSY programme encourages institutional delivery by providing cash assistance to women from below poverty line (BPL)/scheduled caste/scheduled tribe households aged 19 years or above and up to two live births in high performing states. Now, Government of West Bengal, Department of Health and Family Welfare has eliminated the conditionality associated with parity and minimum age of mother for institutional deliveries. Even though JSY scheme has been running for last 9 years, still

further review is needed on its various aspects. So far, many studies have been devoted towards assessment of JSY utilization but there are a few studies in slum area of West Bengal. With this background present study was conducted at Baghbazar slum, Kolkata.

## Objective

To assess the utilization of maternal health care services including JSY among the mothers of under-five children in a slum at Baghbazar, Kolkata.

## MATERIALS AND METHODS

The community-based cross-sectional study was conducted at Baghbazar slum, the urban field practice area of the department of community medicine, R.G. Kar Medical College from 1<sup>st</sup> February to 28<sup>th</sup> February 2014 after obtaining permission from Ethical Committee. All mothers having under-five children, who were residing in the urban slum during their antenatal period and who delivered during the course of the study, were included. Register from the urban training centre was used to identify mothers during enumeration. House to house visit was done to collect data. A total of 72 mothers were interviewed using a predesigned, pretested and semi structured schedule after obtaining their verbal consent. At least three visits were made to include all the women who could not be contacted in the first visit. Data were collected regarding sociodemographic profile, utilization of maternal health care services as well as JSY and reasons for not utilizing these services.

## Statistical analysis

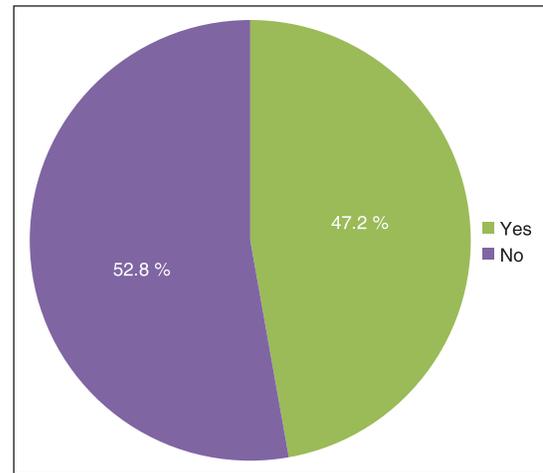
SPSS (Version 20, IBM Corporation, SPSS ver. 20) was used for analysis of the data. Data were expressed in the form of mean and proportion.

## RESULTS

Mean age of the study population was  $26.57 \pm 4.5$  years. Most of the mothers (73.6%) were in the age group of 20-30 years. About 57% of mothers belonged to socioeconomic class IV according to modified BG Prasad socioeconomic scale, 2013. Only one mother had caste certificate and four mothers had BPL card, 98.6% were Hindu, 68.1% belonged to joint family and the rest from the nuclear family. Most of the mothers (93.1%) were house wife. Illiterate mothers were only 4.2%.

Though 54 (75%) mothers heard about JSY during their gestational period but only 34 (47.2%) mothers got JSY benefit [Figure 1]. About half of the mothers who heard about JSY, got information from medical officer of urban training center of R.G. Kar Medical College and 28.5% of those study subjects did not know the benefits provided under JSY scheme.

Most of the mothers did not get the benefit due to lack of eligibility document (42.1%) followed by ignorance (34.2%) about the scheme [Table 1].



**Figure 1:** Distribution of the mothers according to availing Janani Suraksha Yojana benefit ( $n = 72$  [100%])

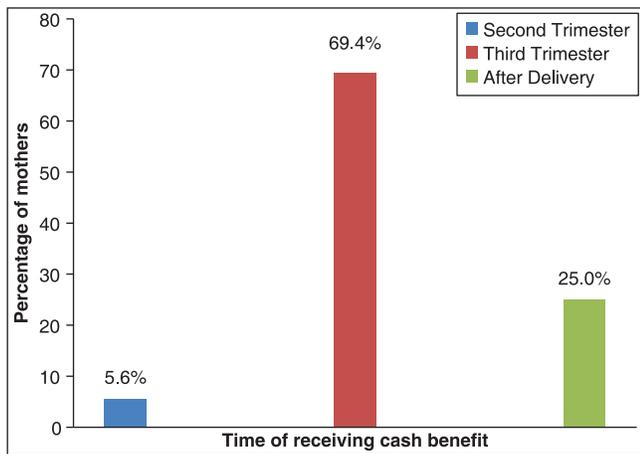
**Table 1: Reasons for not getting the benefit of JSY among the mothers ( $n=38$ )**

Reasons	Frequency (%)
No eligibility document	16 (42.1)
Ignorance	13 (34.2)
Negligence	2 (5.3)
Antenatal check-up in private hospital	7 (18.4)
Total	38 (100)

JSY = Janani Suraksha Yojana

In the urban area, mothers got Rs. 500 from the municipality after completion of recommended antenatal check-up and Rs. 400 from delivering institution after delivery previously. Since 1<sup>st</sup> July 2013, Government of West Bengal, Ministry of Health and Family Welfare decided to disburse payments under JSY scheme to eligible beneficiaries through scheduled banks. However, there was no mother who delivered after the above mentioned date. In this area, among the 34 mothers who got cash benefit, 47.1% mothers got cash from municipality and 52.9% from both municipality and institution of delivery. There was no mother who got cash from the institution, but not from the municipality.

Most of the mothers (69.4%) got cash benefit at the third trimester from municipality [Figure 2]. None of the mothers got cash from the institution during discharge or within 7 days after discharge. Among the mothers who got cash from the institution, 52.6% got cash after 1-month of delivery. The main reasons for not getting benefits from the institution were ignorance (52.9%) and family problems (35.3%). Of 34 mothers, 7 (20.6%) complained that they had to wait long time in getting money. All mothers received at least four antenatal check-up and two doses of tetanus toxoid (TT) injection. About 77% mothers had antenatal registration within 12 weeks of gestational period. About 87% mothers consumed 100 or more iron and folic acid tablets. Almost 90% mothers were advised regarding diet, 93.2% regarding institutional delivery, 44.6% regarding newborn care, 55.4% regarding family planning during their antenatal check-up. All the mothers were advised regarding breast feeding and immunization of baby. All deliveries were institutional except one home delivery. At least one



**Figure 2:** Distribution of mothers according to time of receiving cash benefit from municipality ( $n = 34$ )

postnatal check-up was received by 77% mothers and 84.2% of them received from government facility and rest from private facility. Only 24 (33.3%) mothers initiated breast feeding within 1 hr of delivery.

At the time of conduction of the study, it was found that most of the mothers accepted natural method (30.6%) and condom (30.6%) as contraceptive methods of choice. However, ligation was done in 18.1% mothers.

## DISCUSSION

In this study, 73.6% mothers were in the age group of 20-30 years, 4.2% were illiterate, all of the women received adequate TT doses and 98.6% delivered in the institution. In a study conducted by Ranganath *et al.* in slums of Bangalore, it was found that 86.3% were in the age group of 20-29 years, 21.5% were illiterate, 96.9% mothers had taken TT2/booster and 99.4% was institutional deliveries.<sup>[7]</sup>

All the women received at least four antenatal check-ups, 77% of them registered within 12 weeks of gestation for antenatal check-up in the present study. Whereas in a study conducted by Vikram *et al.* in slum area of trans Yamuna Delhi, it was found that 92% of the women had received minimum three antenatal visits in the last pregnancy with 70% of them having started their antenatal check-ups within the 3<sup>rd</sup> month of pregnancy.<sup>[8]</sup> However, in West Bengal as a whole total 46% of the pregnant women got themselves registered for antenatal check-up within first trimester as per Health Management Information System 2009-2010 and out of all those registered for antenatal check-up only 69% completed three check-up.<sup>[9]</sup>

The present study result revealed that 33.3% mothers initiated breast feeding within the first 1 hr of delivery. The National Family Health Survey-3 in West Bengal showed that only 23.7% of the newborn were being breastfed within the first 1 hr.<sup>[9]</sup>

In our study, 47.2% women got benefit of JSY and main reasons for not getting benefit were lack of eligibility document (42.1%), followed by ignorance (34.2%). Vishwanath *et al.* found that 32.78% women got the benefit of JSY and common reasons for not getting the benefit were

lack of information of JSY (37.19%) followed by difficulty in getting the documents in time (25.62%) in slum area of western Maharashtra.<sup>[10]</sup>

## CONCLUSION

Our findings showed a gap in the awareness and utilization of JSY scheme in the urban slum population. Although about three-fourth of the mothers heard about JSY, but only less than half of the mothers got JSY benefit mostly due to lack of eligibility document and ignorance. So, extensive Information, Education and Communication strategy are needed via various channels including print, electronic, traditional, personal communication, etc. Timely payment of cash assistance should be promoted. Inter-sectoral coordination is required for the provision of BPL certificate and caste certificate for eligible candidates so that they can avail benefits. Mothers should be informed regarding early registration of pregnancy and importance of postnatal check-up.

## ACKNOWLEDGMENT

We thank Prof. Dr. Saibendu Kumar Lahiri, Head of the Department, Community Medicine, R.G. Kar Medical College for his encouragement for conducting this study.

## REFERENCES

- Mazumdar S, Mills A, Powell-Jackson T. Financial Incentives in Health: New Evidence from India's Janani Suraksha Yojana; 2011. p. 20.
- Sharma P, Srivastava K, Vyas S, Kishore S, Semwal J. Is Janani Suraksha Yojana's (JSY) Awareness a reflection of healthy pregnancy outcome? Differences in rural areas and urban slums. *Natl J Community Med* 2012;3:187-92.
- UNDP. Improve Maternal Health. Available from: <http://www.in.undp.org/content/india/en/home/mdgoverview/overview/mdg5/>. [Last accessed on 2014 Dec 30].
- Lanjewar S, Chaudhary S, Kubde S, Bhatkule P. Evaluation of the Janani Suraksha Yojana (JSY) and Universal immunization programme (UIP) in two eastern Districts of Maharashtra. *Int J Sci Res* 2013;2:97-9.
- Sachdeva S, Malik J. Assessment of maternal and child health (MCH) practices with a focus on Janani Suraksh Yojana (JSY). *Glob J Med Public Health* 2012;1:1-9.
- Modugu HR, Kumar M, Kumar A, Millett C. State and socio-demographic group variation in out-of-pocket expenditure, borrowings and Janani Suraksha Yojana (JSY) programme use for birth deliveries in India. *BMC Public Health* 2012;12:1048.
- Ranganath TS, Poornima CA. Study on utilization of maternal services in urban slums of Bangalore. *Int J Basic Appl Med Sci* 2011;1:70-5.
- Vikram K, Sharma AK, Kannan AT. Beneficiary level factors influencing Janani Suraksha Yojana utilization in urban slum population of trans-Yamuna area of Delhi. *Indian J Med Res* 2013;138:340-6.
- Public Health in West Bengal — Current Status and Ongoing Interventions. Available from: [http://www.atiw.gov.in/index\\_htm\\_files/Public%20Health%20in%20West%20Bengal.pdf](http://www.atiw.gov.in/index_htm_files/Public%20Health%20in%20West%20Bengal.pdf). [Last accessed on 2014 Dec 30].
- Vishwanath WH, Jatti GM, Tannu U. Missed opportunities of Janani Suraksha Yojana Benefits among the beneficiaries in slum areas. *Natl J Community Med* 2011;2:140-2.

**How to cite this article:** Santra S, Lahiri S, Biswas A, Shrivastava P. Utilization of maternal health care services with special emphasis on Janani Suraksha Yojana in a slum of Kolkata, West Bengal. *Int J Med Public Health* 2015;5:225-7.

**Source of Support:** Nil, **Conflicts of Interest:** None declared.