

Newborn Care Practices Regarding Thermal Protection Among Slum Dwellers in Rachna Town, Lahore, Punjab

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The period after birth is often marked by cultural practices. Some of these hinder health and survival of newborn, like bathing the baby immediately after birth. Understanding their beliefs and practices is an important part of ensuring effective timely care. This paper describes newborn care practices in urban slum "Rachna Town".

Method: A quantitative baseline survey was conducted in Rachna Town among women who delivered with in last year (n = 168) 3 in depth semi structured focal group discussions well also carried out to in depth understand these Practices.

Results: Majority of women delivered at home (98%). 37.2% women gave bath to baby immediately, 77.8% within 6 hours, while 18.3% within 7 – 24 hours and 4.2% after 24 hours. Only 18.8% babies were wrapped immediately before placenta was delivered while 71.5% of them were wrapped after delivery of placenta.

Conclusion: Poor new born practices are seen in Rachna town, an urban Slum of Lahore. Interventional program should be started in these slums in the heart of Punjab.

Back ground

The period following birth is often marked by cultural practices in Asia, Some cultural practices hinder the health and survival of the newborn, like bathing the baby immediately after birth. Understanding these beliefs and practices in an important part of ensuring effective and timely care. First day after delivery is the time of highest risk for both mother and baby. 50% of neonatal mortality occurs in the first three days of life.² Neonatal mortality rate in Pakistan is 70/1000 alive births which in one of the highest in the world.⁴ Nearly 2.8 million newborns die in first week after birth globally which is 67% of total infant deaths.⁹

Urbanization is occurring at a rapid pace which has significant implication for maternal and child health. The urban population increased from 13% in 1900 to 49% in 2005 globally. The majority of growth is in low income countries, by 2050, it is estimated that it will be 93%. Majority of global urbanization will occur in Asia and Africa.⁹ This fast paced growth is associated with establishment of urban slums where poor living conditions and less health care facilities are prevalent. Though health services are readily available in most urban areas, health indicators are generally worse in slum areas.⁹

The newborn is most sensitive to hypothermia during the stabilization period in the first 6 – 12 hours after birth. Because newborns have poor thermal insulation and small body mass to produce and conceive heat. They are also unable to change body posture in response to thermal stress.² Hypothermia can easily occur if a new born is left wet and unprotected from cold, while waiting for the placenta to be delivered. Recommended practices are to dry and wrap the newborn before the placenta is delivered. During the process of delivery of placenta newborn should be kept on a warm surface out of any draught. First bath should be given after 6 to 24 hrs, or when the temp is stable.

Newborn should be given to the mother as soon as possible. Early skin-to-skin contact in the initial hours after birth not only provides warmth to the baby and prevents hypothermia but also enables early breastfeeding and prevents hypoglycemia.

There are few studies on health practices in urban slums, especially in regard to newborn thermal care protection. The objective of this paper is to describe newborn thermal protection practices in urban slum of Lahore. As part of new born care practices so that intervention program can be started in an effort to improve new born survival and achieve MDGS.

Methods

It was a cross sectional survey from 31st December, 2009 to 31st January 2010.

Both qualitative and quantitative methods were used for evaluation of thermal care practices in slum area. A baseline survey was conducted in Rachna Town respondents included women with alive birth in the year prior to the survey. A structured questionnaire was used to collect data by child care workers of department of community pediatrics. All women who fulfilled the criteria in that area were included in the study.

The structured questionnaire was filled at the spot while address of house hold, name of the head of the family and name of mother was noted for qualitative survey. To further explore newborn care practices, 3 in depth semi structured interviews were conducted in Rachna Town. The group discussion included not only women with one baby but also there mother in laws and if possible mothers, two. Three interviewers interviewed the informant using a flexible interview guideline. Interview was tape recorded. Tape recorded interviews were transcribed and coded in Urdu;

codes were applied manually to the transcripts. No software was used for analysis.

Results

Rachana Town is a city slum of Lahore located near Shahdara with total population of 6,000 people. There are nearly 480 house holders Door to door survey was done to identify respondents, i.e. ladies who had an alive birth in the last one year.

There were 168 such mother in the whole town. Background characteristics of respondents in baseline survey are presented in Table 1.

Table 1: Back ground characteristics of *Rachna Town*.

Characteristic	n	%
Total Population	6000	
Total Household	480	
Total sample	168	
Govt. Water Supply	00	
Sewerage system	00	
Pakki Gali	00	
Sui gas connection	00	
Electricity	00	
Religion		
Islam	5760	96%
Christianity	40	04%
Health Care Facilities with in 2 km radius		
Doctor	00	
Nurse	00	
Dispenser	00	
LHW, LHV	00	
Hakim	01	
Dai	01	
Quack	01	

As you can see from the table that there is neither Govt. Water supply no sewerage systems in that area. Sui gas in also not available. Through in the city there are many hospitals, but within 2 km radius of the slum, no health facility was available except for a quack and a Dai. Most of the deliveries were done at home (98%) by some relative (88%).

As shown in Fig. 1 nearly 63 (37.2%) on newborns were bathed immediately after birth. While 68 (40.5%) were given bath within 6 hrs of delivery. 31 (18.3%) of babies were bathed within 7 – 24 hrs of delivery and 7 (4.2%) were given bath after 24 hrs of delivery.

It is shown in Fig. 2 that out of 168 newborns 32 (18.8%) were wrapped immediately while 136 (82.2%) were wrapped after delivery of placenta.

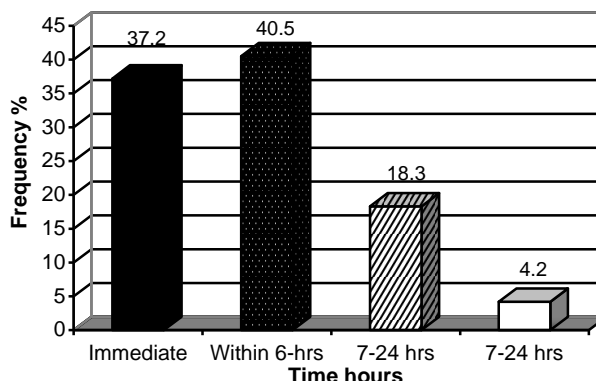


Fig. 1: First bath of baby after birth n = 168.

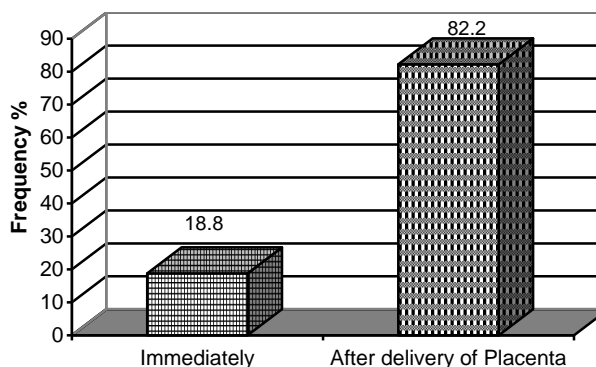


Fig. 2: Wrapping the baby after birth n = 168.

- Half of the mothers (51.7%) reported placing the baby on the cot before the placenta was delivered. In 26.5% cases the child was placed next to the mother.
- Approximately 12% reported placing the newborn on the floor, thereby increasing the risk of hypothermia.
- Only in 4.0% cases the newborn was placed on the mother’s abdomen, which is a recommended newborn care practice.
- Only 23.5% babies were dried immediately/before the placenta was delivered. Almost 68.9% of the newborns were dried within one hour after the placenta was delivered.
- A similar trend was seen in case of wrapping the baby. Only 18.8% of the babies were wrapped immediately/ before the placenta was delivered, whereas 82.2% of them were wrapped within one hour after the placenta was delivered.
- Almost 77.8% of the newborns were bathed within six hours of birth, 37.2% were bathed immediately after birth and another 40.5% within six hours of birth. In only 22.5% cases bathing was delayed to after six hours.

Qualitative Result

In the baseline survey, 86 % of women reported bathing the baby within the first day after birth. This finding was supported by the in-depth interviews.

Most, women reported bathing the baby soon after delivery, with most babies bathed just after the cutting of the umbilical cord. Delivery fluids and blood are regarded as polluted (napak) and hence the baby is not perceived to be clean or pure until it is bathed.

“After delivery and cutting the cord the baby was wiped off with a piece of cloth and kept on the bed. Then water was put in a bowl and the baby was bathed with soap. The baby was put in the bowl and slowly water was poured on its body. (Woman from Rachna Town)”.

“No one can take the baby on the lap because the baby has delivery blood on its body. If one touches the baby, one will become napak. Seniors can't take the baby on their lap because they can't pray. So the baby is bathed just after birth” (Woman from Rachna Town).

We found strong evidence of vigorous efforts to remove the vernix during the first bath and afterwards. The vernix was generally perceived as “filthy” a product from the mother's womb that needed to be removed as soon as possible after births.

“Those {vernix} are the filthy things the baby gets from the mother's womb. It looks ugly if that {vernix} is not removed, the skin looks dry”. Said Woman from Rachna Town”.

The first bath was given with slightly warm water, and many women reported including dettol and/or soap. Mothers perceived dettol as having more antiseptic power than normal bath soaps. Some women reported including other materials in the bath water such as raw turmeric and grass. There are some women who think the baby get cold during the bathing. They don't understand how to bathe {a newborn baby} properly. “I bathe my baby in a way so that it does not get cold. The water is warm and I add savlon or mustard oil to the water. Said Woman from Rachna Town”.

The risk of cold was the main factor in determining the time of the bath.

Discussion

The survey revealed poor knowledge and practices of essential newborn care which are immediate drying and wrapping, delayed bathing. Lack of use of these recommended practices during the postnatal period predisposes the newborn to hypothermia and infection. Adherence to practices relevant to thermal protection for the newborn was poor.

The time immediately following delivery is a vulnerable period for both the woman and her baby. Appropriate management of the delivery of the placenta (or third stage of labour) is essential to prevent postpartum hemorrhage, the leading cause of maternal mortality globally. At the same time the baby needs to be kept warm and dry to prevent hypothermia and infection, two of the major causes of neonatal mortality. In south Asia, it is believed that the

mother and her baby are polluted. The fear of cold is also prevalent in South Asia. Women and families go to great measures to keep the baby (and mother) warm in the days after delivery. This fear of cold can be best manipulated for delaying bath of the baby till thermogenesis is stable i.e. 6-12 hrs.

Results of this study coincide with similar studies in other countries of Asia. A survey done in Karachi, Pakistan by Fikrce F.F in 2000 August showed that 82.1% of babies were bathed immediately. While these rate was 77.8% in Uttar Pradesh in India as reported by urban health resource centre survey in Meerut, India.⁶ A similar study done in Bangladesh reported it to be 86%.²

High prevalence of harmful practices with regard to newborn care as revealed by the findings reflects upon the deep rooted culturally influenced harmful practices which ultimately put the survival of the newborn at risk. In this context suggested operational interventions are.

Counseling through group meetings as well as on an individual basis highlighting correct practices. Key target groups should include mothers, key decision makers in the family and elderly women in the community.

Local radio stations / cable services can communicate messages on the relevance and benefits of good practices such as thermal protection for the newborn.

There is need to enhance competence of slum dais (local birth attendants) and unqualified private care providers: The study showed that 89.5% of the home deliveries in the slums were conducted by relatives. It also highlighted that majority of the newborns received post natal check up and treatment from unqualified practitioners. Care seeking from untrained dais and unqualified practitioners can have serious implications on the health of newborn. Therefore, there is an urgent need to complement the efforts to encourage deliveries by TBAs with training and competence enhancement of slum dais and local practitioners to provide essential newborn care.

Capacity building of the existing health and paramedical staff in essential newborn care practices including cord care, thermal protection and detection of danger signs and timely treatment of the newborn should be a regular event.

Last but not least there should be capacity building of slum-based health volunteers: Slum based health volunteers are crucial agents for influencing these communities.

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