

**To Love and Look After:  
Exploring the Pathways Linking  
Family Relationship Quality to Maternal Health in India**

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**Abstract**

Domestic violence, which is one aspect of family relationship quality, is now well established as an important determinant of maternal health. However, the effects on health of other, more positive aspects of relationship quality, like love, remain neglected. Thus, this study uses qualitative data to explore the mechanisms linking family relationship quality, particularly positive aspects, to maternal health in a rural Indian context. The exploration suggests that family relationship quality may benefit maternal health in a variety of ways. Mechanisms include improving women's subjective well-being, increasing nutritional intake, facilitating communication about health matters, and encouraging the use of health care and attention inside and outside the home. Loving family relationships can also act as a barrier to hospital delivery however. More broadly, high quality relationships appear to motivate family members to do their best for women, but their best may not always be beneficial.

## **To Love and Look After: Exploring the Pathways Linking Family Relationship Quality to Maternal Health in India**

Sixteen years ago, Heise and colleagues (1994) pointed to domestic violence as a neglected public health issue. Today there is now a burgeoning literature on domestic violence that explores its prevalence, risk factors, and harmful impact on health (e.g. Garcia-Moreno et al., 2006; Ellsberg et al., 2008; Jeyaseelan et al., 2007; Ahmed et al., 2006; Hadi, 2000). This focus on domestic violence highlights a critical dimension of family relationship quality and demonstrates how it adversely impacts women's lives and health. Other dimensions of family relationship quality, especially positive aspects like love, are still neglected in non-Western contexts however.

Women's voices suggest that love and other positive aspects of relationship quality are an important part of their lives. For example, in her study of domestic servants in India, Ray (2003) encountered a domestic worker named Lakshmi. Lakshmi felt that the most important factor affecting her well-being was not her hard work as a servant, but her marriage. Lakshmi described how she was unhappy because her husband did not love and appreciate her. When Ray asked what Lakshmi wanted in the future, she responded "Just some love. One can't live without love. Just like a plant or a tree, one withers and dies" (Ray 2008: 108). Similarly, in her study of Bangladeshi garment workers, Kabeer (2000) encountered Shefali who had supported herself after separating from her husband by engaging in casual sex work, domestic work, and mill work. Despite her severe economic hardship, Shefali too viewed the greatest problem in her life as the lack of love:

“This love is all I want. If you have some love, then nothing can hurt you. This is my greatest sorrow, not lack of food, nor clothes, nothing like that. It would just please me that everyone should love me... People find happiness one way or the other, either with their parents or with their husband and children. But I did not get this happiness from anywhere” (Kabeer, 2000: 158).

There are further suggestions in the ethnographic literature that such love and other aspects of family relationship quality may affect maternal health. Based on their ethnographic work in Pakistan, Mumtaz and Salway (2007) suggest that the quality of family relations, particular between women and their husbands and women and their mothers-in-law determine women’s antenatal care use. For example, they describe a case of maternal mortality that villagers blamed on the woman’s mother-in-law refusing to seek out health care for her daughter-in-law. Similarly, in Carter’s (2002) study in Guatemala, several women described how the love and support provided by their husbands during pregnancy and delivery was very important to them.

Unfortunately, the work on domestic violence is not able to capture the effects of positive dimensions of relationship quality on maternal health. Measures of domestic violence conceive of relationships as varying in quality from violent to non-violent. However, violence is not well-correlated with love and other positive dimensions of relationship quality (Hoelter et al., 2004; Johnson et al., 1986; Amato and Booth, 1995). In other words, explicitly looking at positive aspects of relationship quality is not a matter of changing the framing by focusing on the positive, rather than the negative. Domestic violence and positive aspects of relationship quality, like love, are substantively different dimensions of relationship quality – *not* experiencing violence is not the same as having a loving, high quality relationship.

The potential importance of love and other positive aspects of family relationship quality to women's health in non-Western contexts is further supported by the literature that explores marital quality and health in Western countries. This literature finds that marital quality is associated with better health and well-being (Ross et al., 1990). For example, those with greater marital quality also have less physical illness (Wickrama et al., 1997), greater psychological well-being (Waite et al., 2009), and better self-rated health (Umberson et al., 2006). Other studies focused on marital status, rather than directly on marital quality, also finds that the strength and presence of a romantic relationship can improve maternal health, including greater emotional well-being during pregnancy, timely and adequate use of antenatal care, and reduction of smoking and drinking during pregnancy (Albrecht et al., 1994; Kimbro, 2008; MacDonald et al., 1992; Kiernan and Pickett, 2006). Since these studies focus on Western countries, however, they do not illuminate how different cultural contexts and low income settings might shape the connections between marital quality and health. With their focus on marital quality in nuclear households, they also largely ignore family relationships outside the marital couple.

This paper, thus, examines how love and other positive aspects of family relationship quality are connected to maternal health in a rural, low income setting in India. Given the lack of research in this area, this paper is exploratory in nature. It draws on people's perceptions and experiences in one setting to identify mechanisms that may link family relationship quality to maternal health in a non-Western context. These qualitative data are not drawn on to complement existing survey findings – which are largely nonexistent – but to build an explanation of the connection between family relationship quality and maternal health in this setting (Knodel, 1997).

## **Methods**

### **Study Design and Data Collection**

This study is part of a larger project that addressed the meaning of family relationship quality and its connections to women's agency and maternal and child health (Author 2009). Data collection for this larger project was undertaken from September 2007 through May 2008 in the village of Pariwarbasti, which is in Darjeeling District, West Bengal. (Pariwarbasti and all names of respondents that appear below are pseudonyms.) Fieldwork consisted of three main activities: 1) an ethnographic introduction to the village and broader context, 2) a series of semi-structured interviews and observation of family life with a sample of 22 village households, and 3) observation of health care and informal interviews with health care providers. The health care providers included traditional and religious healers, staff at the local government run health center, and staff at the closest government hospital.

Much of the results presented here are drawn from the semi-structured interviews with the sample of 22 village households. Sample selection began by visiting every household in the study area (n=232) and identifying all available target households (n=31). Target households comprised households that had a birth in the past year or included a pregnant woman at the time of the household listing in November 2007. The 22 sample households were selected from the list of 31 available target households based on observed variation in family structure and potential variation in family relationship quality. Half of the households were joint households where the woman who had the birth – referred to as the focus woman from here on – resided with her in-laws, while the other half were non-joint households where the focus woman resided

either with members of her natal family or in a nuclear family with her own husband and children.

Semi-structured interviews and informal conversations were used to collect data on people's views and experiences on family life and health in an open ended manner. All interviews and interactions were carried out by the author alone in Nepali, the local language, and all formal interviews were recorded. Focus woman (n=22) were formally interviewed three times and, if available, their co-resident husbands (n=14), and co-resident mothers or mothers-in-law (n=10) were interviewed once. Multiple members of the household were interviewed to gain perspective on different family member's views and experiences. Interviews were supplemented with observation of family life, which allowed for direct observation of interactions among family members and helped build rapport with respondents. Detailed information on the data collection, village context, and characteristics of the sample households are provided in Author (2009).

### **Data Analysis and Analytical Framework**

Data analysis consisted of two main approaches. First, potential mechanisms were identified by looking for common themes in how respondents' words explicitly linked aspects of family relationship quality to maternal health. Second, a set of matrices were used as a tool to look for patterns in the connections between maternal health and family relationship quality across family members and households. One matrix provided a summary of information collected from the focus woman, a second referred to husbands, and a third to mothers(-in-law). Each matrix summarized topics in the data found across the different interviews and fieldnotes, for example, the type of antenatal care a woman received, what she ate during pregnancy, and

what her relationship with her husband is like. While identifying mechanisms linking relationship quality and health, three related approaches were used: 1) inductively looking for any connection between relationship quality and maternal health; 2) reflecting on whether and how relationship quality may affect proximate determinants of maternal health; and 3) considering whether and how relationship quality may affect other socioeconomic determinants of health. I looked for cases where relationship quality was beneficial to maternal health, but also for those in which relationship quality was harmful or questionable.

In exploring how relationship quality is connected to maternal health, I drew on McCarthy and Maine's (1992) framework of the determinants of maternal mortality and morbidity. In their framework, social and economic factors – which include relationship quality – are distant determinants of maternal health. These distant determinants affect health only indirectly through intermediate determinants. Intermediate determinants are grouped into four types: 1) health status, 2) reproductive status, 3) access to health services, and 4) health care behavior. The second and third types of intermediate determinants are not addressed here. Access to health services refers to the provision and availability of health services, which is not affected by relationship quality. Reproductive status refers to factors like women's age at birth and the length of the birth interval, which are largely determinants of women becoming pregnant to begin with. Exploring the links between relationship quality and fertility is a large and conceptually distinct endeavor, which is not attempted here. This analysis assumes that any pregnancy is a given and, thus, does I do not address reproductive status. Below, I present the mechanisms according to the type of intermediate determinant that it works through, which include health status and health care behavior. It should also be noted that since the links

between maternal health and domestic violence are already well-established, I do not address domestic violence.

Finally, before proceeding to the results, it is important to clarify what is meant by relationship quality. As noted above, the larger project that this study is a part of also set out to define family relationship quality based on respondents' views of what characterizes good relationships for 1) wives and husbands, 2) daughters-in-law and mothers-in-law, and 3) married daughters and natal families. For example, respondents were asked open ended questions, such as what is a good marriage like and how should a husband and wife feel for each other. This paper draws on the aspects of family relationship identified in that larger project. Aspects of relationship quality can be briefly summarized as love, understanding, peace, and good communication. Further information on these aspects of relationship quality is provided below within the appropriate sections. A comprehensive discussion of the meaning of family relationship quality for these family dyads also appears in Author (2009).

## **Results**

### **Health Status**

#### **Minimizing Tension and Maximizing Happiness**

One important aspect of maternal health is women's subjective well-being and stress level (Khashan et al., 2009). Relationship quality appears to be a key determinant of women's subjective well-being and stress. Women spoke explicitly of how good relationships with family members make their lives happy and how, conversely, poor quality relationships leads to stress. For example, Vandita describes how good relationship quality among her family members

ensures that they live a happy, peaceful life: “Each and every family member gets along well with each other. So obviously there is happiness in the family... We have no tensions. We are happy and at peace.” Conversely, the English word “tension” was often invoked to refer to family members not getting along and the resulting stress and unhappiness that it caused.

This happiness and lack of stress could also be felt in home environments, which are characterized by love, understanding, and good communication that respondents described as the hallmarks of good relationships. For example, such a positive environment is demonstrated by Kamala’s household, which was characterized by a happy, easy-going feeling among members. When I visited Kamala’s house the family members were always clustered tightly together in their courtyard, chatting and watching over the two young children. It was a comfortable atmosphere where family members and visitors seemed equally at ease. Cooking, washing dishes, weaving of mats, feeding children, and just sitting and passing the time went by in a stream of steady, happy chatter.

By contrast, Purvi’s household provides an example of a tense, stress-inducing household. Purvi does not get along with either her husband or mother-in-law. She regrets her marriage, barely speaks to her mother-in-law, and her husband invariably supports his mother over Purvi. Purvi often spoke about the ever present tension in her home. This tension could be felt on my visits as well. When I went to Purvi’s house, the family members were spread out as far away from each other as they could be. Purvi’s mother-in-law and husband were usually each in a different room lying quietly on the beds in separate rooms, while Purvi sat quietly in another room watching her children. The sense of silent tension was palpable in Purvi’s house and contrasted strongly with the happy chattiness of Kamala’s household.

**Nutrition: Expressing Love with Food**

Maternal nutrition is another important aspect of women's health status (Ladipo, 2000). Giving family members food is one of the main ways to express love, thus relationship quality may improve women's nutritional status. When describing whether or not they had a good relationship with someone, respondents would often spontaneously remark on whether that person did or did not give them food. Women with higher quality relationships receive fruit, meat, and other special foods as a mark of affection from family members, especially during the prenatal and postpartum periods. Receiving fruit, in particular, from family members is a sign of affection. Some fruits are grown in the village and are freely available in season. Much of the time though fruit, which is expensive by local standards, must be purchased. Fruit is not a regular part of people's diets – many people said it is too expensive and others said it is not people's habit to eat fruit. Eating fruit is widely believed to be good for women's health during pregnancy and the postpartum period though. So while most women do not eat fruit normally, they did eat it during pregnancy when someone purchased it and gave it to them.

Women with especially good relationships appeared to receive both more fruit and a greater variety of fruit and other foods during pregnancy and the post-partum period. Husbands and other family members with especially close and loving relationships with women appeared to go out of their way to regularly provide a variety of fruit. For example, as Mohini describes, “[I ate] a lot [of fruit]. I ate at least three pieces in a day. I ate a lot. The oldest brother[-in-law] got it from the market. He brought lots [of fruit] because he was showing his love. He got it with love.”

By contrast, women who had especially poor relationships were denied fruit, as well as staple foods. For example, Bina was denied fruit, meat, and adequate staple foods during her pregnancy by a mother-in-law who disliked her. In Bina's words, "my mother-in-law used to say, 'I do not like this girl, leave her' and she would not give me proper food to eat. She would only give proper food to her [own] sons and daughters." Her husband, whom Bina also did not get along with very well, said nothing to support Bina to ensure that she was given food.

## **Health Care Behavior**

### **Communication about Pertinent Health Information**

Good communication is another dimension of relationship quality. People with good relationships confide in each other and listen to each other, while those with particularly bad relationships avoid speaking at all or have tense exchanges and fights. The importance of a close relationship is especially important in sensitive matters. When it comes to sensitive matters the desire to confide only in those one is close to and comfortable with is especially strong. The intimate details of pregnancy and childbirth are often sensitive matters, especially for women who are experiencing their first pregnancies. Ranjita, for example, described how she only likes to share intimate health information with her husband with whom she has a very loving and close relationship. At the beginning of her pregnancy, when Ranjita missed her period and was experiencing nausea she confided in her husband, but no one else. As she explains she confides "only with my husband, only with him because we get along very well. Whenever I feel unwell, I can confidently share with my husband and he looks after me."

While good relationships make it easier for women to confide in family members and ask for help when they need it, good relationships also facilitate family members asking women

about their health and comfort or passing health information on to women. A positive example of this comes from Mayuri's case. Mayuri and her husband communicate primarily by phone because her husband works near Calcutta and only is at home a few days a month. Her husband phones her regularly, but while she was pregnant her husband called her every day to monitor her health. Her husband also took a long vacation at the time of her birth so he could spend the postpartum period with her and their new baby.

Such exchange of information can, in turn, affect whether women receive care, as well as the quality of care that they receive. Women sometimes feel too shy to speak to health providers about their health. In these cases, their husbands or other relatives who accompanied them to the appointment speak to the providers for their wives. In such cases, the husband's knowledge of the wife's intimate health details are crucial for the provider receiving accurate information and being able to give appropriate treatment. For example, Ranjita describes how she was glad her husband accompanied her to her antenatal care check-up with a doctor, "It was good. If I had been alone it would have been awkward. There are so many things we have to tell the doctor and I cannot do it all by myself. If my husband is there he will do the talking."

Communication of health information is not always beneficial however. Communication can only be beneficial in so far as the information communicated is accurate. If people share incorrect information the result can be neutral or even harmful for maternal health. For example, Laxmi did not take iron and folic acid supplements because her aunt told her that the supplements would make the baby large, which in turn would result in a difficult birth for Laxmi. While her aunt had Laxmi's best interests at heart, she encouraged Laxmi to engage in a behavior that was potentially harmful.

### **Facilitating Use of Health Care Outside the Home**

Another potential pathway is the link between relationship quality and the use of health care. As will be described below, family members who have better relationships with focus women appear more likely to encourage and facilitate women using antenatal and delivery care and pay for the costs of health care. However, good relationship quality can also work to encourage women to deliver at home as well.

There is also one type of maternal health care that appears to have no connection with relationship quality in Pariwarbasti, largely because there is no variation in it. In Pariwarbasti, as in much of rural India, there is no belief in the concept of routine postnatal care or belief that such visits should be sought out. Women only receive postnatal care if they deliver in the hospital or if a local health center worker visits them at home. Thus, there is no connection between relationship quality and postnatal care, apart from its connection to hospital deliveries, because there is no demand for postnatal care.

### ***Encouraging Antenatal Care Use***

In India, the Reproductive and Child Health Programme calls for women to receive at least three antenatal care check-ups during pregnancy, starting in the first trimester (Ministry of Health and Family Welfare [India], 2008). Women in Pariwarbasti go for antenatal care at the local government health center or visit private doctors in a nearby town. Everyone in Pariwarbasti had at least one antenatal care visit, but there is variation in where they go for antenatal care, when they go, and how many times. Approximately a third of the focus women had antenatal care only at the health center and the rest of the women had at least one doctor's visit in addition to visiting the health center. The majority of women do complete the

recommended three antenatal care visits and, at the extreme end, two women had antenatal visits nearly every month.

Given the universality of having at least one antenatal visit in Pariwarbasti, there is no connection between family relationship quality and receiving at least some antenatal care. There did appear to be a connection between family relationship quality and receiving antenatal care from a doctor, as well as the timing of the first antenatal care visit though. First, there is a pattern of women experiencing pregnancy symptoms being encouraged by loved ones to visit a doctor to see if they are okay and check if they are pregnant. For example, upon missing her period, Saloni was urged by her husband, whom she is very close to, to visit a doctor to see if she was pregnant. Despite moving twice during the pregnancy, her husband continued to inquire after the very best gynecologists in each area and accompany Saloni to each antenatal care visit to make sure all was well throughout her pregnancy.

Second, loving family members appear more likely to take extra steps to make it easier for women to use antenatal care. For example, in the early part of her pregnancy Parvati lived with her husband, whom she is quite close to, and her in-laws, whom she does not get along with in a village that is a very long and difficult walk to Kalimpong. While her in-laws did not encourage her to get antenatal care, Parvati's husband insisted that she see a doctor in Kalimpong and, when he could not accompany her, arranged for his sister to accompany Parvati. Later, when they moved to Pariwarbasti, Parvati's husband suggested that she visit the local health center and accompanied her on visits there.

### ***Encouraging (and Discouraging) Hospital Deliveries***

The majority of maternal deaths can only be substantially reduced through one intervention – essential obstetric care (Maine and Rosenfeld, 1999). At the time of delivery if a serious complication, such as hemorrhaging, infection, or obstructed labor, arises only the timely use of obstetric care can prevent the complication from resulting in mortality or disability. Thus, delivering in a place where such care is available is a key determinant of maternal health. Among the focus births, one third took place at home and two thirds took place at the government hospital in the nearby town. There are also private hospitals in the town where women can deliver, but the fees at these private hospitals are beyond the means of those living in Pariwarbasti. For home births there are neither skilled nor traditional birth attendants to assist with deliveries in Pariwarbasti. So, all women who give birth at home are attended only by family members and neighbors.

The influence of well-known determinants of hospital delivery, such as parity, the woman's health at the time, and the family's wealth, was apparent. I also found indications that good relationship quality may increase the likelihood of having a hospital delivery when family members believe in the benefits of a hospital delivery. Just as with antenatal care, many of those family members who have particularly close and loving relationships with women encouraged them to give birth at the hospital so that they would be taken care of if anything happened to them during the delivery. For example, after discussing whether she should give birth at home or the hospital, Kamala and her family decided she should deliver at the hospital to ensure her good health:

“[I delivered the baby] at the hospital because we felt I could not have the baby in the house. I thought I might die. I talked about it with everyone and then I went with my father-in-law. He took me to the hospital.”

Encouragement to deliver at the hospital by family members can also veer into force. In two cases, concerned family members overruled women's desires to give birth at home in favor of the hospital. Like Kamala, many of the women are afraid to deliver at home because they or the baby might die or experience other complications that couldn't be dealt with at home. Some women though are also afraid of the hospital and, as discussed below, there are other reasons women want to deliver at home. In these two cases though, both women wanted to deliver at home because they were scared of procedures at the hospital. Parvati, who feared injections, was overruled by her loving husband and aunt who told her it would be better for her at the hospital. Similarly, Megna was forced to go to the hospital by a concerned father-in-law whom she too had a more distant, but loving relationship with. As Megna describes, "[Father-in-law] said let's go to the hospital. I did not want to go, but I went. I thought they would cut me apart."

The strong concern for women's well-being that came with especially loving relationships also appeared as a motivator to actively make arrangements to ensure that women arrived at the hospital in a timely manner. For example, Unma noted how the love and concern she felt for her daughter prompted her to have her daughter and son-in-law return to live with her so she could take care of her daughter during the delivery, which she made sure happened at the hospital:

“[My daughter and son-in-law] came here [from Delhi] because my daughter was pregnant with my oldest grandson. I loved them a lot so I was concerned about how they would handle it by themselves in a big city like Delhi. So, as the time of delivery got closer, I asked them to come. I said that I would take care of her. So the baby was born. I was afraid for her to have the baby in the house. So I rushed her to the hospital at 10:00 at night.”

Arriving at the hospital in a timely manner is important because it can take a substantial amount of time to locate a car and driver and then drive to the hospital from the village. Those that live

in homes far from the road have the additional challenge of getting to the road first. So, despite Pariwarbasti's advantageous geographic position, I was told of two cases of women from the village dying on the way to the hospital in recent years.

While love and concern appears to be a motivator for hospital deliveries in some cases, it also works in the opposite direction. Strong affection and wanting to be close to family members also acts as a barrier to hospital deliveries. The government hospital does not allow family members to be present during a birth. Moreover, after the birth, women can only have visitors during limited hours. Some women did not mind being alone at the birth, but others wanted to be with their loved ones during the birth. Three of the seven women who delivered at home said that they chose not to deliver at the hospital, at least in part, because they did not want to be alone or wanted to be with a specific family member that they were close with. In all three cases, these women were asked or encouraged by family members to go to the hospital, but they chose not to. For example, as Manisha describes,

“[Mother-in-law] asked if I wanted to go to the hospital and I said I wanted to stay back at home. ... At the hospital I would be alone.”

Loving concern for women's welfare can also motivate family members to encourage women to deliver at home if they believe delivering in the home is better than the hospital. One mother-in-law, for example, was particularly concerned that her daughters-in-law would suffer if they gave birth at the hospital. Such concern is not misplaced. While many women did not have strong opinions about their hospital experience or were happy to be cared for by nurses and doctors, some found the experience difficult. The quality of family relationships can also play a role in the difficulty of their experience. As noted above, while some women didn't mind being alone at the birth, others wanted their loved ones to be with them. For example, Saloni, who

believed strongly in the virtues of giving birth at the hospital, spoke movingly of the pain of being deprived of her husband's presence at the birth:

“My husband was not allowed inside [at the birth]. ... You feel bad when your husband is not around. I felt very bad. I was kind of helpless because there was no one to help me. ... I begged the doctor to let [my sister-in-law] stay because there would be no one to inform my husband if my condition worsened.”

Conversely, poor relationship quality can also act as an impetus to give birth at the hospital when women want to escape relatives they have poor relationships with at the time of the birth. At the beginning of her marriage, Indu lived with her in-laws whom did not get along with. Indu's mother-in-law was very strict, often limited her food, and verbally insulted her. Indu did not want to be around her in-laws at the birth because she thought they would not take proper care of her because they did not like her. So, she made sure to deliver at the hospital by herself. As Indu describes, “I went myself to the hospital and got admitted. My mother-in-law, father-in-law, and brother-in-laws were at home. I felt uneasy and I thought, even if I tell them, they won't look after me. That's why I went myself.”

### **Funding the Costs of Health Care**

Some of the health care described here comes at substantial cost to families. Many maternal health care services are provided free of charge by the Indian government. However, all private services must be paid for and there are also fees and indirect costs that come along with using government services. Not surprisingly, women from wealthier families are more likely to use private doctors for antenatal care and purchase supplies from pharmacies. It also appears that relationship quality plays a role though. Family members that had particularly good relationships with women seem to make a special effort to pay for health care costs. They appear more willing to allocate the scarce resources they had to women's health care and make a special

effort to get additional funds through saving, borrowing, or selling assets. Families with greater relationship quality may also be better off financially since they consume less alcohol. Alcohol consumption is a cause and consequence of family fighting and tensions, as well as a financial drain.

The apparent tendency of family members to invest more resources in women when they have better relationships with them can again be seen in the contrast between Kamala and Purvi's cases. In Purvi's household, her mother-in-law's pension is the only regular source of income since Purvi's husband contracted tuberculosis and is no longer able to work. As noted above, Purvi does not get along with her mother-in-law and barely speaks to her. Purvi's mother-in-law also controls her pension, the only steady source of income for the household. Purvi notes that their poor state of relations prevents her from getting money from her mother-in-law to buy medicine or treatment for herself or her children when they are sick:

“If I ask [my mother-in-law] she may do something. She will scold me. Sometimes the baby is sick. At that time, I keep quiet and take the baby to the hospital if I have the money, or if I don't, then nothing! .... Mother-in-law, what can I say. She is like that. ... What does she do for me? Nothing.”

By contrast, Kamala also comes from a poor household, but her in-laws and husband, whom she has very good relations with, made a special effort to pay for her delivery expenses. As Kamala's husband describes,

“Medicines are given during the time after the birth. ... I used to work in the bazaar before and had saved some money. I used to work for seven to eight hundred rupees. I saved two hundred to three hundred rupees and I had goats in the house. ... Father, mother, and I - the three of us – discussed and we decided we had to sell the goats. We needed money. We sold them and that is how we got the money for medicine.”

Outside the household, other family members and others who have especially good relationships with women are also motivated to help pay for these costs. Saloni's case provides

a clear example of this pattern. Before Saloni's delivery, her mother-in-law required surgery for kidney stones, which took all of the family's money. So Saloni's sister, whom she is especially close with, paid all of the delivery expenses, bought fruits and medicines, and even bought a heater to keep a room warm for the baby since the baby was born in January. By comparison, Saloni's other siblings, whom she does not get along with and is not on speaking terms with, did not make any contributions.

### **Providing Care in the Home**

The quality of relationships among family members may also influence the type and quality of care that women receive from family members in the home. First, close and loving relationships appear to motivate family members to give women more time and space to recover from illness and childbirth. Saloni's postpartum period provides a positive example of this pattern. The solicitous care that Saloni received after her delivery was striking. As noted above, Saloni has very strong relationships with her husband and one of her sisters. She also gets along well with her sister-in-law, but does not get along with her mother-in-law. Saloni gave birth in January so it was very cold. Her husband kept a fire going in a large mustard oil can nearby Saloni. He was constantly adding wood and adjusting the position of the can so that Saloni would receive the most heat with the least smoke. He also was continually fetching medicines and tea for Saloni, while inquiring about how she was doing. Saloni had hemorrhoids at the time of the birth and she told me that her husband had bought medicines for the hemorrhoids and was carefully applying them for her. Saloni's sister and sister-in-law were also assisting Saloni and the baby by helping Saloni bathe, breastfeed, and entertain the neighbors who came to visit the new baby.

By contrast, family members who do not care much for the woman are not motivated to provide the same space and time to recover from illness and childbirth. While Saloni's husband and sister were very solicitous of her during her postpartum period, this was not the case for her mother-in-law, Salila, whom she did not get along with. Salila, largely avoided Saloni after the birth. Whenever she came close to Saloni – for example to fetch something from the courtyard where Saloni was sitting – the conversation would turn quiet and there was a palpable tension in the air. Later, when I interviewed Salila she complained that the attention given to Saloni at that time was excessive and unnecessary.

Ironically, Salila, who felt her own daughter-in-law had received too much care, provides a further example of uncaring family members not providing women space to recover. Salila did not have a good relationship with her first husband and his family. According to Salila, this lack of affection from her husband meant that he didn't take care of her when she was sick:

“The boy [husband] didn't look after me. He didn't want to marry me, but he was forced to marry me. So that's why the boy didn't look after me. He didn't do anything. When I was sick everyone scolded me and I felt bad. I thought I can't even be sick here. I am sick, but I cannot sit and sleep. ... I had a fever and my hair hurt and also my stomach. I couldn't work, but when I tried to sleep everyone scolded me.”

There are also many other actions that people take to make women more comfortable and healthy in the home that appears to be motivated, at least in part, by affection for women.

Providing hot oil massages is an example of one such action. Hot oil massages are customarily given during childbirth and the postpartum period to comfort women and ease the pains of labor. These massages were only given among family members who get along to at least some extent and appeared to be given the most frequently among those who are exceptionally close. For example, Mayuri received them from her sister-in-law, mother-in-law, and husband, all of whom

she gets along with. Purvi, who does not get along well with any of her family members had no hot oil massages. Family members also go out of their way to help women by seeking out traditional healers for care, making traditional medicines, and seeking out information on medicines and care. Another way that loved ones assist women when they are ill and around the time of pregnancy is by making sure they spend time with natal family members that they have close relationships with. Dipesh, for example, was worried about his wife's nausea during the start of her pregnancy. So, he took her to her natal family to stay for several weeks so she would be more comfortable.

## **Discussion and Conclusion**

This exploration of mechanisms suggests that love and other positive aspects of relationship quality motivate family members to do their best to secure the health of women in a variety of ways. Husbands, in-laws, and others consciously look after the women they care for by giving special foods, ensuring that they receive health care, paying for health needs, and providing space and time to recover from childbirth and illness. Affectionate relationships may also enhance the well-being of women by providing happier, low stress home environments where communication between members is easy and open.

This exploration of mechanisms further points to the moderating role of health beliefs. Family members and women themselves do their best according to what they believe will be beneficial. Loving family members concern for women's well-being prompted most family members to encourage women to deliver at the hospital, but in some cases it prompted them to encourage women to deliver at home. In both situations, family members were trying to secure women's well-being, the key difference was whether they believed the hospital or the home was

the best place to do that. The moderating role of health beliefs and knowledge does not apply to all of the pathways, however. The benefits of living a lower stress, happier life due to better quality family relationships and more comfortable home environment should persist regardless of people's beliefs.

The moderating role of people's health beliefs and knowledge further suggests that, for the most part, relationship quality will benefit women's health only to the extent that these beliefs and knowledge are accurate. In other words, to the extent that behaviors intended to secure women's well-being really does help them. Many behaviors intended to benefit women may be neutral or even harmful. For example, as noted above, Laxmi's aunt telling her not to take iron folic acid supplements was a genuine attempt to help Laxmi have an easier delivery, but it put Laxmi and her child at risk. People also often turn to local faith healers, which may or may not be beneficial depending on the situation. By the same token, some aspects of the formal health care system also appeared at best neutral and at worst harmful for at least the family finances. For example, those who paid for antenatal care visits with doctors were told to come once a month, yet national and international standards suggest that more than three or four antenatal care visits is not necessary (Ministry of Health and Family Welfare [India], 2008; Abou-Zahr and Wardlaw, 2003).

Finally, in conclusion, it should be reiterated that this is an inductive exploration of the shape that the links between relationship quality and maternal health take in this particular setting. These mechanisms may or may not turn out to be accurate at a population level or may be relevant to some settings, but not others. Thus, I hope that this exploration demonstrates the relevance of family relationship quality to maternal health in this setting and convincingly points

to the need to carry out future research that can test these mechanisms and further examine these links in India and elsewhere. Testing these mechanisms requires collecting survey data that includes indicators of family relationship quality, as well as beliefs about health care. In keeping with the focus on domestic violence, large scale surveys increasingly include questions on domestic violence. However, there are very few surveys that include any questions on love and other positive aspects of family relationship quality in non-Western countries. For example, the third round of the Indian National Family Health Survey has broken ground by including a new family relations module (IIPS and Macro International 2007). This family relations module contains nearly thirty items on abusive and violent behaviors in the family, but no items that measure love, understanding, communication dynamics, or other positive aspects of family relationships. This study points to the need to gather data on the full range of family relationship quality.

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