

# Barriers in the Use of Post Partum Intrauterine Contraceptive Device

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## Abstract

**Objective:** To assess the barriers in the use of post partum intrauterine contraceptive device.

**Study design:** Descriptive cross-sectional study.

**Place and duration:** The study was conducted at gynaecology and obstetrics unit 1, Holy Family Hospital, Rawalpindi from 16<sup>th</sup> October 2015 to 15<sup>th</sup> December 2015.

**Methodology:** A descriptive cross-sectional study was conducted on 252 married women who were admitted in postnatal ward of gynecology and obstetrics, unit I of Holy Family Hospital, Rawalpindi. Convenience sampling was done. Data was collected by filling a structured questionnaire after personal interview and they were asked about their age, socioeconomic status, no of children, educational status, husband's education and the reason of not using PPIUCD as contraceptive.

**Results:** This study interestingly generated the result that satisfaction with either condom or withdrawal method is the most frequent reason (39.2%) for not opting for PPIUCD followed by myths (21%), unwillingness (16.6%), lack of husband's consent (12%) and lastly health concern (10%)

**Conclusion:** The uptake of PPIUCD is primarily hindered by preference for condoms and withdrawal method, followed by myths. Proper counseling of the couple during antenatal visits and especially during post partum period can remove the myths and motivate the couple for accepting PPIUCD.

**Key words:** Barrier, post partum intrauterine contraceptive device, trans-cesarean, post-placental.

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## Introduction

In the developing world, unintended pregnancies and short inter pregnancy intervals have become a major public health problem with deleterious effects on both maternal and neonatal health.<sup>1,2</sup> WHO's latest statistics reveal that globally about 830 women die daily from preventable causes of pregnancy and child birth; 99% of these deaths occur in developing countries, 85% occur in sub-Saharan Africa and Asia while South Asia alone accounts for 24% of maternal deaths globally.<sup>3</sup>

The most effective solution to this problem is contraception as by increasing the usage of contraceptives in the developing countries about 54 million unintended pregnancies, 79000 maternal deaths and one million infant deaths can be prevented.<sup>4</sup>

The situation in Pakistan is not much different from the rest of the developing countries as is evident from the maternal mortality of 276/100,000 live births.<sup>5</sup> The problem doesn't end here. The low contraceptive

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prevalence rate of 35% and high unmet need for family planning of 20%<sup>6</sup> with a high TFR of 3.8 has made Pakistan the 6<sup>th</sup> and 4<sup>th</sup> most populous country in the world and Asia respectively.<sup>6</sup> Unfortunately, Pakistan has also got a high contraception discontinuation rate of 37% within 12 months of initiation<sup>7</sup> and very low usage rate of long acting reversible contraception. Among the modern methods, most commonly practiced are condoms and female sterilization (9%). Intrauterine contraceptive devices (IUCDs), injectables and pills have a very low usage in the range of 2-3% each.<sup>8</sup>

The above mentioned health indicators and statistics of the developing countries gave birth to the unique approach of integrating contraception into child birth that is, counsel a woman for contraception when she comes to a care facility for child birth and chose a contraceptive that can be prescribed immediately after birth as in developing countries like Pakistan, women hardly ever come to a health care facility for the sole purpose of contraception<sup>9</sup> Moreover, various studies and surveys have sculpted that a woman is most receptive to contraception in the post partum period.<sup>2,10,11</sup> Thus, post partum insertion of IUCD has been chosen for this purpose as it is effective, has no systemic side effects, does not interfere with breast feeding and can be inserted as early as 10 minutes after vaginal birth.<sup>9</sup>

PPIUCD has gained a lot of popularity in China, Egypt and Mexico but despite its efficacy and feasibility, its use in Pakistan is very low. This study aims at assessing the barriers that have limited the use of this highly beneficial approach in our country and thus help in inculcating this workable and applicable approach into maternal and child health. This will ultimately help us in holding the reins of our ever growing population and by doing so eventually decreasing our maternal mortality rate.

## Methodology

### Operational definitions:

1. PPIUCD: An IUCD that is inserted post placental after cesarean section or vaginal delivery was labelled as PPIUCD.
2. Myths: The beliefs like PPIUCD can cause death, cancer, can move freely in body, can reach the heart or will burn the blood were labeled as myths.
3. Health Concerns: The concerns like PPIUCD can cause excessive bleeding, menstrual irregularities or lower abdominal pain were labeled as health concerns.

**Inclusion Criterion:** All patients who were having two or more than two alive issues and did not give consent for PPIUCD were included in the study.

**Exclusion Criterion:** All patients with any contraindication to PPIUCD.

**Data Collection:** The patients were approached by visiting post natal ward of gynecology and obstetrics unit 1 of Holy Family Hospital, Rawalpindi and were included in the sample by using the technique of convenience sampling. Data was collected by conducting personal interviews and filling structured questionnaires. Verbal consent was taken from the patients before conducting the interview and confidentiality of the information was ensured.

The patients were asked about their age, socioeconomic status, no of children, educational status, husband's education and the reason of not opting for PPIUCD as contraceptive (for details see the attached annexure)

**Data Analysis:** Data was analyzed by using SPSS version 21.0. Descriptive statistics was used to calculate qualitative and quantitative variables.

Frequency and percentage was calculated for age of mother, educational status of mother, educational status of husband, socioeconomic status, residence, number of children and reason of not using PPIUCD while cross tabulation was done to find out relationship between reason of not using PPIUCD and different variables like age and educational status of mother.

## Results

In this study, 252 women were included of which 49.2% had age between 26-35 years and 57.1% were uneducated while 33% had done matriculation. Most of the husbands were also uneducated (52.8%). The rural and urban dividend was 63.9% and 36.1% respectively while 57.1% study participants had 2 or 3 children.

The most frequent reason for not opting for PPIUCD was satisfaction with either condom or withdrawal method (39.3%) followed by myths (21%) and unwillingness (16.7%), as shown in figure 1. It was further revealed that frequency of myths was directly related to the education of the mother as it was highest in uneducated mothers (40%) as is evident from figure 2. Moreover, preference for condom was related to age of mother. It was highest in mothers between 26-35 years (57%) of age while lowest in mothers between 36 to 45 years of age (4%) as depicted in figure 3.

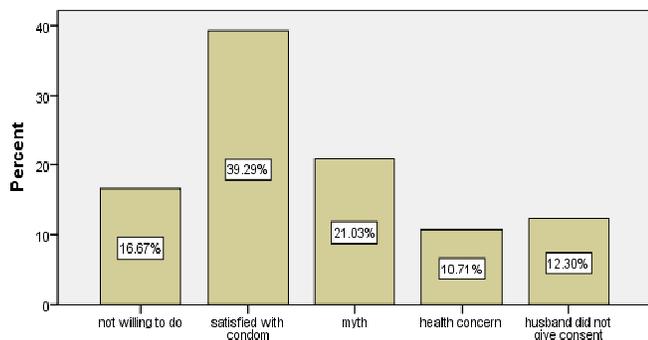


Figure1. The reasons of not using PPIUCD .

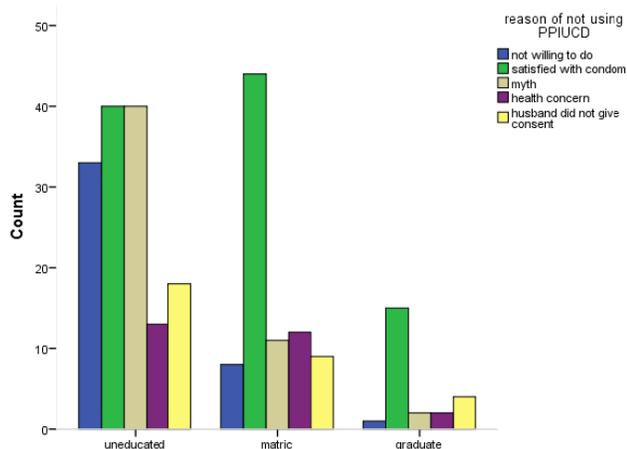


Figure2. Relationship between education of mother and reason of not using PPIUCD

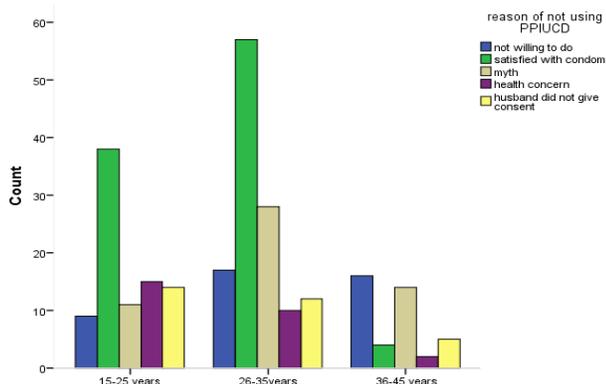


Figure3. Relationship between age of mother and reason of not using PPIUCD

## Discussion

The ghost of population growth in third world nations like Pakistan is plaguing humanity with maternal mortality at one end and burdening the already constrained resources at the other end. Post partum insertion of IUCD has been devised as a solution to this problem but its uptake rate is very low in Pakistan.

The current study which aimed at assessing the obstacles in the use of PPIUCD has interestingly generated the result that satisfaction with barrier (condom) or withdrawal method is the most frequent reason of not opting for PPIUCD (39.2%). Moreover, this reason is most common in women of age group 15-35 years. These results correlate with the results of PDHS 2012-13, according to which, the use of withdrawal has increased from 4% (in 2006-7) to 9% 2012-13 and condom is the contraceptive of choice in women under 35 years of age<sup>5</sup> These results also correspond with the results of a study conducted on army doctors of Rawalpindi which depicted that 45% doctors preferred condoms for contraception.<sup>12</sup> An Irish study has also claimed that condom is the most widely used method of contraception(39%).<sup>13</sup>

In our study, myths regarding PPIUCD appeared as the second hurdle which stopped 21% women from using it. A qualitative study done on district Rawalpindi also sculpted various types of myths regarding the use of intrauterine contraceptive devices<sup>14</sup> while a study conducted in Ethiopia also revealed that 67.2% women have myths and misconceptions regarding their use which is much higher than our study (21%). This difference can be due to cultural variations between two countries. Another qualitative Ethiopian study revealed a number of myths like difficulty in doing hard work and carrying heavy objects after implant insertion.<sup>15</sup>

Another study done on the provinces of Punjab and Sind disclosed that husband’s consent ( $p < 0.001$ ) and lack of proper counseling for intrauterine devices is strongly linked with the woman’s decision of not using contraceptives.<sup>16</sup> These results are also analogous with the results of our study which has pointed out unwillingness (16%) and lack of husband’s consent (12.3%) as the third and fourth most frequent hindrance to PPIUCD.

The cardinal limitation of this study is the narrow geographic area from which study participants were taken as this might limit the generalization of results to the whole population.

## Conclusion

The results of the study have sculpted that the preference for the use of condoms (which have a high failure rate) has limited the use of long acting contraceptives like PPIUCD. This coupled with myths and unwillingness has further decreased the uptake. Proper counseling of the couple regarding PPIUCD during antenatal visits can motivate the couple for

choosing a long acting contraceptive like PPIUCD (instead of condom) at one end and remove the myths and misconceptions at the other end. In addition to this, inculcation of PPIUCD into post partum care can yield blooming results as a woman is most receptive to any method of contraception in the post partum period, more so in the 4 to 6 weeks following birth.

## References

1. Hauck B, Costescu D. Barriers and Misperceptions Limiting Widespread Use of Intrauterine Contraception Among Canadian Women. *J Obstet Gynaecol Can.* 2015 Jul;37(7):606-616.
2. Pasha O, Goudar SS, Patel A, Garces A, Esamai F, Chomba E, Moore JL, Kodkany BS, Saleem S, Derman RJ, Liechty EA. Postpartum contraceptive use and unmet need for family planning in five low-income countries. *Reprod Health.* 2015 Jun 8;12(Suppl 2):S11.
3. World Health Organization. Maternal mortality [internet]. 2015 [cited 17 December 2015] Available from: <http://www.who.int/mediacentre/factsheets/fs348/en/>
4. Meskele M, Mekonnen W. Factors affecting women's intention to use long acting and permanent contraceptive methods in Wolaita Zone, Southern Ethiopia: A cross-sectional study. *BMC women's health.* 2014 Sep 12;14(1):109
5. Pakistan demographic health survey 2006-9. [http://www.nips.org.pk/PDHS\\_-\\_2006-07.htm](http://www.nips.org.pk/PDHS_-_2006-07.htm)
6. Internetworldstats.com. Ten Countries with the Highest Population in the World. 2015. <http://www.internetworldstats.com/stats8.htm>
7. Pakistan demographic health survey 2012-13. [http://www.nips.org.pk/abstract\\_files/Preliminary%20Report%20Final.pdf](http://www.nips.org.pk/abstract_files/Preliminary%20Report%20Final.pdf)
8. Azmat SK, Hameed W, Ali M, Ishaque M, Mustafa G, Khan OF, Abbas G, Munroe E. Comparing effectiveness of two client follow-up approaches in sustaining the use of Long Acting Reversible Contraceptives (LARC) among the underserved in rural Punjab, Pakistan: a study protocol and participants' profile. *Reprod Health.* 2015 Mar 18;12(1):9.
9. Arshad F, Ejaz L, Noreen H, Bano N, Syed S, Chaudhri R. Trans-Caesarean Insertion of Intrauterine Contraceptive Device. *J. Soc. Obstet. Gynaecol. Pak.* 2014;4(2):73-78.
10. Rahman MU, Khan IA, Haider MA. Frequency Of Contraceptive Practice Amongst Doctors Of Pakistan Armed Forces. *PAFMJ.* 2008 Jun;58(1). <http://www.pafmj.org/showdetails.php?id=188&t=o>
11. Ali RA. Acceptability and safety of postpartum intrauterine contraceptive device among parturients at Muhimbili National Hospital, Tanzania (doctoral dissertation, Muhimbili University)
12. Molloy GJ, Sweeney LA, Byrne M, Hughes CM, Ingham R, Morgan K, Murphy AW. Prescription contraception use: a cross-sectional population study of psychosocial determinants. *BMJ open.* 2015 Aug 1;5(8):e007794.
13. Khan A, Shaikh BT. An all time low utilization of intrauterine contraceptive device as a birth spacing method—a qualitative descriptive study in district Rawalpindi, Pakistan. *Reprod Health.* 2013 Feb 9;10(10):1-5.
14. Gebremariam A, Addissie A. Knowledge and Perception on Long Acting and Permanent Contraceptive Methods in Adigrat Town, Tigray, Northern Ethiopia: A Qualitative Study. *Int J Family Med.* 2014 Jul 21;2014.
15. Khan MS, Hashmani FN, Ahmed O, Khan M, Ahmed S, Syed S, Qazi F. Quantitatively evaluating the effect of social barriers: a case-control study of family members' opposition and women's intention to use contraception in Pakistan. *Emerging themes in epidemiology.* 2015 Jan 24;12(1):1-5.
16. Potter JE, Hopkins K, Aiken AR, Hubert C, Stevenson AJ, White K, Grossman D. Unmet demand for highly effective postpartum contraception in Texas. *Contraception.* 2014 Nov 30;90(5):488-95.