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# Men's educational needs assessment in terms of their participation in prenatal, childbirth, and postnatal care

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## Abstract:

**BACKGROUND:** Despite the importance of men's role in prenatal care and its impact on the outcome of a high-risk pregnancy, in many countries, including Iran, men are not aware of their real needs. Since the first step in designing any health plan is to identify the needs of the target population and that no program can be effective without considering the actual needs of the target group, this study aimed to identify men's educational needs for participation in prenatal, childbirth, and postnatal care.

**MATERIALS AND METHODS:** In this descriptive cross-sectional study, 280 men were selected in Kashan city, Iran, in 2015. The sampling method was cluster sampling. The data collection tool was questionnaire designed based on Mortazavi and Simbar's studies that included demographic characteristics of the subjects (14 questions) and their educational needs in terms of the content of the training program, the training method, trainer, time, place of training, all of which were measured by Likert scale and completed by the interview. Data were analyzed by SPSS software version 16 using descriptive statistics.

**RESULTS:** The findings showed that the mean age of the men participating in the study was  $35.15 \pm 5.83$  years. Most men had high school education (45%). The three most important educational needs of men regarding participation in prenatal and postnatal care were maternal nutrition (87.5%), sexual health (86.8%), and warning signs during pregnancy (81.8%). Men preferred to receive information from a physician (93.2%), before pregnancy (91.8%) in healthcare centers (90%). Family was the most important source of information.

**CONCLUSION:** According to men's suggestions, suitable educational programs must be implemented by physicians in healthcare centers in classes of preparation for labor and childbirth or during prenatal care.

## Keywords:

Childbirth, educational needs, men, postpartum period, prenatal care

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## Introduction

Men comprise half of the active population of society, and as one of the main pillars of the family make decisions about spending on health and education, economic activities of the spouse, and family planning.<sup>[1,2]</sup> Therefore, men's participation in women's care is an important strategy to achieve the third millennium development goals, such as empowering women and

promoting maternal health.<sup>[1]</sup> The World Health Organization considers men's participation in safe motherhood programs, such as facilitating access and use of perinatal care, increasing awareness of perinatal care, and engaging in childbirth planning. Additionally, it is considered necessary to assess men's needs and identify appropriate strategies for their involvement.<sup>[3]</sup>

Findings of some studies indicated that most men had low awareness of reproductive

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health and its various aspects and they are willing to learn more about it.<sup>[4-6]</sup> Despite the importance of the role of men in providing efficient pregnancy healthcare and its impact on preventing high-risk pregnancy, in many parts of the world, in both developing and developed countries, men are less involved in their partner's healthcare during pregnancy,<sup>[7]</sup> and there have been limited interventions indirectly engaging men in care and healthcare decisions.<sup>[8]</sup>

Men's participation in women's health and fertility can promote the quality of marital relationships at home and in society and has positive health benefits for women and children.<sup>[9]</sup> Therefore, the role of the father and his influence on maternal and fetal health should be emphasized. Men are not seen in maternity services and do not have access to the information; they need to make informed decisions about protecting and improving the health of mothers.<sup>[3]</sup> In Simbar's study (2011) in Iran, men and women stated that men did not know how to help their spouses at perinatal period, and couples' education should be conducted during this period.<sup>[10]</sup> In most cases, men are sources of finance for the Iranian family. It is also necessary to learn about the signs of risk and nutrition needs for proper and timely decision making for reducing maternal and infant mortality.<sup>[10]</sup> Mullany's study (2009) in Nepal showed that training men about the importance of family health care could promote health behaviors, such as prenatal care, vaccination of children, mutual relationships, and wives support.<sup>[8]</sup> In Mortazavi's study, male participation facilitators included male enthusiasm, male education, increased male age, experience gained, and rank of birth,<sup>[11]</sup> and one of the obstacles mentioned in this study was men's inadequate knowledge. Based on the results, providing educational services to men and promoting their participation in the care of pregnant women can eliminate these obstacles completely by increasing their knowledge level. Most pregnant women considered reproductive health services are essential for men, and the majority of pregnant women suggested a training session for men during their pregnancy. The results of Mullany's study (2006) in Nepal also confirmed this issue.<sup>[11,12]</sup>

Men need to be informed about their role in the field of maternal health.<sup>[8]</sup> Obviously, training is indispensable to change and improve men's knowledge and beliefs, and it can lead to their proper functioning as both partners and fathers.<sup>[3]</sup> Training is a systematic, step-by-step programmed process<sup>[13]</sup> and determining the educational need is the starting point for any type of educational program. The development of educational programs is subordinated to measurement and identification of needs, and as well as needs assessment, by identifying other important needs, can provide a basis for determining the objectives and the appropriate framework to organize other important elements regarding the

priority needs.<sup>[6]</sup> Learners are one of the best sources for identifying educational needs.<sup>[14]</sup> Regarding the need to determine men's preferential strategies for health education, the researchers decided to conduct a study aiming at determining men's educational needs in relation to participation in prenatal, childbirth, and postpartum care to provide effective health plans for this population.

## Materials and Methods

The present descriptive cross-sectional study was conducted in 2015 on 280 men working in manufactories (Negin Glittering Carpet, Khatereh Knitting, Yaldaye Kavir Knitting, Cement Company, Saipa Company) of Kashan city, Iran. Given that most men in the city of Kashan work in factories and cannot attend health centers in the morning shifts (shifts in health centers), to access men, we chose their workplace for sampling. Samples were selected through cluster sampling to randomly select the manufactories (five manufactories) and men. Inclusion criteria were living with their wives and experiencing pregnancy, childbirth, and postpartum period of their wives in the past 3 or 4 years. Data were collected using a questionnaire designed based on Mortazavi and Simbar's studies. The questionnaire included demographic characteristics of subjects (14 questions) and their educational needs about the content of training program (maternal physical changes in pregnancy, mother and father's mental changes to adapt to new roles, sexual health and mother nutrition during pregnancy, warning signs, exercise in pregnancy, methods of reducing labor pain, birth methods, postpartum problems, lactation, infant bathing), the training method and media, trainer, time, place of training, all of which were measured by Likert scale. The questionnaire was confirmed by six faculty members of Kashan Nursing and Midwifery Department. The reliability of the questionnaire was confirmed by Cronbach's alpha 0.7. The questionnaires were completed through interview by occupational health professionals. The study subjects completed the informed consent form and they were told that they could leave the study any time they wanted. The data were analyzed by SPSS and descriptive statistics.

## Results

The findings demonstrated that the mean age of the men participating in the study was  $35.15 \pm 5.83$  years, and the mean age of their wives was  $30.86 \pm 5.61$  years. Majority of men had high school education (45%) and only 0.7% was illiterate; however, the wives also mostly had high school education (46.8%). In total, 37.7% of men lived with their wives for 6–10 years. About 24.3% of them lived for <5 years, and the rest of the men lived with their wives for >10 years.

According to the filled questionnaires, training priorities of the subjects included maternal nutrition during pregnancy (87.5%), sexual health during pregnancy (86.8%), risk signs of pregnancy (81.8%), and neonatal care (80%); additionally, the least important issue turned out to be knowing how to change diaper [Table 1]. In total, 90% of men participating in the study considered health centers appropriate for education. About 82.9% of men wanted to hold training sessions in the morning, 69.6% agreed with the evening, and 59.2% agreed with the holidays. In addition, 91.8% of the subjects insisted on pre-pregnancy training program, 87.2% asked for training during pregnancy, and 73.2% of subjects asked for postpartum training. Furthermore, 93.2% of were satisfied with being trained by a doctor, 86.1% agreed with being trained by the midwife, 74.6% asked to be trained by a nurse, and 69% with hygiene specialist. Moreover, 84.6% of the subjects were asked to be trained by woman and 56.8% had asked for a man to hold training sessions. About 75.3% of men were satisfied with face-to-face training in the presence of their wives, 73.6% with face-to-face training in the absence of their wives, 61.1% with the booklet, 60.4% with the use of CDs, 57.1% with group training, 52.5% with radio and television, 49.9% favored telephone education, and 43.9% agreed with online education [Table 2].

The source of support for pregnant women during this period, according to their husbands' opinion, was the family, husband, health personnel, friends, and colleagues. In total, 22 (7.9%) women also did not have any support sources during their pregnancy.

## Discussion

The results of this study showed that majority of the men had highly felt needs for information about pregnancy, childbirth, and postpartum period. The training content offered by men included issues such as feeding during

pregnancy, sexual health, and risk signs for pregnancy. Issues such as bathing the baby and changing the diaper were the least important ones. In Simbar's study, majority of the participants tended to receive efficient training on issues such as proper nursing care, care for signs of danger, and willingness to attend pregnancy visits, mostly in domains and fields where men were more involved. However, men were less inclined to receive training on issues such as bathing the newborn and changing the diaper.<sup>[15]</sup> In Iranian culture, men consider themselves more involved in more important decisions of life (paternal role), and they consider helping a spouse as a degrading mark of affection and a weak point for that specific individual. Adeniran's study (2015) showed that priority topics to educate men during pregnancy were the effect of pregnancy on woman, sexual activity, and need for women support during pregnancy.<sup>[16]</sup>

Mortazavi's study found that men's participation in giving their wives' health recommendations during pregnancy was low; the researchers concluded that the reason for this low participation was men's low level of knowledge in this respect.<sup>[11]</sup> According to the results of this study, and other similar studies, it can be suggested that training sessions be held for men in the field of prenatal care and signs of risk during this period and sexual activity during pregnancy to increase their participation in this period.

Majority of the subjects preferred to receive training in pregnancy, childbirth, and postpartum care as face to face with the presence of their wives in the morning or on holidays in health centers preferably by a female doctor. According to the results of Simbar's study, fathers preferred face-to-face training in the presence of mothers than other methods,<sup>[15]</sup> a fact which is consistent with the results of the present research. Face-to-face social interaction motivates learners<sup>[17]</sup> and enables them to discuss, share insights, and collaborate.<sup>[18]</sup>

**Table 1: Frequency distribution (percentages) of the responses of the men participating in the study for agreement about the content of the training**

Items	Too much	Much	Fairly high	Fairly low	Low	Very little
Physical changes during pregnancy	22.1	33.2	21.4	11.1	7.5	4.6
Mental changes in mother during pregnancy	23.2	31.1	20.4	15.0	7.1	3.2
Psychological changes to adapt to the new paternal role	26.4	28.2	22.9	10.7	7.5	4.3
Sexual health during pregnancy	36.4	33.6	16.8	7.5	2.9	2.9
Nutrition during pregnancy	35.7	33.6	18.2	6.1	4.3	2.1
Risk signs of pregnancy	34.3	30.0	17.5	10.0	3.9	4.3
Exercise during pregnancy and after childbirth	21.8	29.3	22.9	13.6	7.9	4.6
Pain reduction methods	21.8	27.5	25.4	13.6	5.4	6.4
Types of delivery (natural/Cesarean section)	22.5	24.6	26.1	13.2	7.5	6.1
Postpartum problems (bleeding, uterine and breast infection)	21.1	22.9	19.3	18.9	8.6	9.3
Breastfeeding and supplemental nutrition	25.7	28.9	20.7	13.9	6.1	3.9
Child care	31.4	26.8	21.8	9.3	6.1	4.6
Baby bathing	15.7	26.4	17.9	15.0	13.6	11.4
The replacement of the diaper	12.9	15.4	13.6	16.1	18.2	23.9

**Table 2: Frequency distribution (percentages) of the responses of men participating in the study to agreement on attributes of educational content**

Items	Too much	Much	Fairly high	Fairly low	Low	Very little
Training place						
Health center	56.4	16.1	17.5	5.7	1.1	3.2
Workplace	27.1	20.4	24.3	8.2	5.7	14.3
Office	17.1	23.6	231.8	12.1	3.2	12.1
Hospital	23.2	20.0	30.0	10.0	6.1	10.7
Training time						
Days of the week						
Morning	52.9	11.4	18.6	2.5	3.6	11.1
Evening	30.4	17.1	22.1	5.4	7.1	17.9
Holidays	28.9	12.1	18.2	3.6	5.0	32.1
Training time with regards to pregnancy						
Pre-pregnancy	57.9	21.8	12.1	3.6	2.5	2.1
Pregnancy	35.0	29.3	22.9	6.4	2.1	4.3
Postpartum period	28.2	23.2	21.8	11.1	6.1	9.6
Educator						
Midwife	33.6	34.3	18.2	4.3	2.9	6.8
Nurse	17.1	27.9	29.6	8.6	7.5	9.3
Health personnel	12.5	30.4	26.1	8.2	11.1	11.8
Doctor	67.9	12.1	13.2	2.9	1.1	2.9
Gender educator						
Male	36.8	12.9	7.1	4.7	20.4	99.6
Female	57.5	13.9	13.2	4.3	1.8	9.3
Training method						
Face to face alone	36.1	23.2	14.3	11.4	6.8	8.2
Face to face with wife	44.6	20.0	10.7	10.7	7.9	6.1
Group training	20.0	23.2	13.9	15.0	12.5	15.4
Telephone training	13.2	19.6	17.1	16.1	7.5	26.4
Internet learning	7.9	18.9	17.1	15.7	9.3	31.1
Using CD	22.9	18.2	19.3	15.0	8.6	16.1
Booklet	20.0	22.5	18.6	16.4	8.2	14.3
Radio and TV	17.5	16.4	18.6	18.2	14.6	14.6

According to the opinion of the men participating in the study, the best place to train was the home, the health center, and the hospital, respectively; evenings and holidays were turned out to be the best time for training. Simbar *et al.* concluded that men prioritized education in health centers by midwives<sup>[19]</sup>; however, education by the midwife was turned out to be the second priority in our study; the reason for this might be the increased presence of mothers in private clinics in Kashan and that men consider doctors more reliable sources of information. In Mullick's study, male participants also needed to be trained in open hours on weekdays and in the clinic.<sup>[20]</sup> Based on the findings of this study, the health center was a suitable place for training; however, a no-entry sign exists in the entrance to the obstetric room in health centers in Iran; according to the results, men are interested in taking care of their spouse and keep their being with spouse during training sessions on pregnancy. A study by Mullany in Nepal also confirms that educating pregnant women along with their husbands can help to improve the outcomes of pregnancy and childbirth and increase

postpartum follow-up referrals.<sup>[21]</sup> Most men prefer to be trained by women. In all public and private centers in Iran, maternity and postnatal services are provided by women (midwives, nurses, health personnel, and gynecologists); however, it is not conventional to expect men to ask for male trainers for their wives. However, training sessions could be categorized, and a female trainer can be employed where the session is conducted through face-to-face training, and a male trainer can be used when, in the presence of both partners, sexual health is being trained.

In our study, most women were supported by others during pregnancy. In this study, the main source of support was the wife's family. In some cases, the role of mothers leads to exclusion of young men, but in Singh's study in India, it was found that assistance provided by other family members could encourage the husband to help his wife.<sup>[22]</sup> In Carter's study in Guatemala, it was revealed that receiving care or advice from mother-in-law also increases the chances of receiving care by the husband.<sup>[9]</sup>

## Conclusion

Owing to men's lack of awareness about some sensitive pregnancy issues, appropriate educational interventions should be arranged for pregnancy-related issues. According to these study findings, men can receive training in health centers by doctors or midwives in prenatal care or during preparation for labor and childbirth classes. However, men tend to receive these tutorials in the presence of their wives. National policies for safe maternity care should be in accordance with the increase in the participation of men during pregnancy, childbirth, and afterward to increase the health of mothers and newborns, and to reduce the mortality and morbidity during pregnancy and postpartum periods.

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## Conflicts of interest

There are no conflicts of interest.

## References

1. United nation Population Fund (UNFPA), Interactive Center. Enhancing men's roles and responsibilities in family life. A New Role for Men, 2009. Available from: <http://www.unfpa.org/intercenter/role4men/enhancin.htm>. [cited 2009 Sep 5].
2. Greene M, Mehta M, Pulerwitz J, Wulf D, Banjole A, Susheela S. Involving men in reproductive health: contributions to development, New York: UN Millennium Project. Background paper to the report public choices, private decisions: sexual and reproductive health and the millennium development goals, Millennium Project: Washington, D.C. 2006
3. World Health Organization. Programming for male involvement in reproductive health. Report of the meeting of WHO regional advisers in reproductive health WHO/PAHO, Washington DC, USA 5-7 Sep 2001. World Health Organization, Geneva, 2002.
4. Simbar M, Tehrani F, Hashemi Z. Reproductive health knowledge, attitudes and practices of Iranian college students. *East Mediterr Health J* 2005;11:888-97.
5. Hadi NA, Azizi M. Evaluation of male reproductive health in Shiraz students high school. *HMJ* 2002;1:49-55.
6. Galanz C, Louis F, Reimer B. Health Behavior and Health Education. Shafei F, translator. Tehran: Khoshbin Publication; 2000.
7. Hatami H, Razavi M, Eftekhari Ardebili H, Majlesi F. Comprehensive Public Health Book. 3<sup>rd</sup> ed. Tehran, Iran: Arjmand Publications; 2013.
8. Mullany BC, Lakhey B, Shrestha D, Hindin MJ, Becker S. Impact of husbands participation in antenatal health education services on maternal health knowledge. *JNMA* 2009;48:28-34.
9. Carter M. Husbands and maternal health matters in rural Guatemala: Wives' reports on their spouses' involvement in pregnancy and birth. *Soc Sci Med* 2002;55:437-50.
10. Simbar M, Nahidi F, Ramezani-Tehrani F, Akbarzadeh A. Educational needs assessment for men's participation in perinatal care. *EMHJ* 2011;17:689-96.
11. Mortazavi F, Keramat A. The study of male involvement in prenatal care in Shahroud and Sabzevar, Iran. *Qom Univ Med Sci J* 2012;6:66-74.
12. Mullany BC. Barriers to and attitudes towards promoting husbands' involvement in maternal health in Katmandu, Nepal. *Social Science and Medicine* 2006;62:2798-809.
13. Bastable SB. Nurse an educator: Principles of teaching and learning for nursing practice. 2<sup>nd</sup> ed. London: Jones and Burtlett Publication; 2003.
14. Grant J. Learning needs assessment: Assessing the need. *BMJ* 2002;324:156-9.
15. Simbar M, Nahidi F, Ramezani Tehrani F, Ramezankhankhi A. Fathers educational needs for participation in perinatal care: A qualitative approach. *Hakim Health Sys Res* 2009;312-9.
16. Adeniran A, Aboyeji A, Fawole A, Balogun O, Adesina K, Adeniran P. Male Partner's role during pregnancy, labour and delivery: Expectations of pregnant women in Nigeria. *Int J Health Sci* 2015;9:305-13.
17. Russ-Eft D. A typology of training design and work environment factors affecting workplace learning and transfer. *Human Resour Dev Rev* 2002;1:45-65.
18. Scott SG. Factors impacting the selection of training-delivery systems and training methodology of Virginia training professionals (Unpublished dissertation). Virginia Polytechnic Institute and State University, Blacksburg; 2010.
19. Simbar M, Nahidi F, Ramezani Tehrani F, Ramezankhani A, Akbarzadeh A. Father's educational needs for participation in pregnancy care. *Payesh J* 2011;11:39-49.
20. Mullick S, Kunene B, Wanjiru M. Involving Men in Maternity Care: Health Service Delivery Issues, 2005. Available at: [http://www.popcouncil.org/pdfs/frontiers/journals/Agenda\\_Mullick05.pdf](http://www.popcouncil.org/pdfs/frontiers/journals/Agenda_Mullick05.pdf). [Accessed on 2006 Jan 15].
21. Mullany BC, Hindin MJ, Becker S. Can Women's autonomy impede male involvement in pregnancy health in Katmandu. *Nepal Soc Sci Med* 2005;61:1993-2006.
22. Singh D, Lample M, Earnest J. The involvement of men in maternal health care: Cross-sectional, pilot case studies from Maligita and Kibibi, Uganda. *Reprod Health* 2014;11:1-8.