International Journal of Health Sciences and Research
www.ijhsr.org ISSN: 2249-9571

Original Research Article

Knowledge on Uterine Prolapse among Reproductive Age Group Women in Nepal

Rojina Bhurtel[1], Reena Mandal[2], Sirjana Shah[3]

[1]MSc. Nursing in Medical Surgical Nursing, sub-speciality Critical Care Nursing, Lecturer, Manmohan Memorial Institute of Health Sciences, Soalteemode Kathmandu, Nepal
[2]MN in Adult Health Nursing, Lecturer, Manmohan Memorial Institute of Health Sciences, Soalteemode Kathmandu, Nepal
[3]Bachelor of Nursing (BN), Nursing Incharge in Charikot Hospital, Dolakha, Nepal

Corresponding Author: Rojina Bhurtel

ABSTRACT

Background: Uterine prolapse is a most common gynecological health problem contributing to maternal morbidity and mortality among women of reproductive age in developing countries. Uterine prolapsed is a condition in which the muscles and supporting ligaments holding the uterus in place gets too weak to keep the uterus in position. The severity of uterine prolapse is determined according its degree, first degree when the uterine cervix protrudes into the lower third of the vagina, second degree when the cervix protrudes past the vaginal opening and the third degree when the entire uterus protrudes past the vaginal opening. Uterine prolapse is the most common but often hidden and untreated gynecological morbidities.
Methods: A descriptive cross-sectional study was carried out amongst 150 reproductive age group women attending gynecological OPD in Manmohan Memorial Teaching Hospital Soalteemode, Kathmandu, Nepal. The sample was selected by non probability purposive sampling technique. Semi structured knowledge questionnaire was used to collect data using interview technique. Data was analyzed via SPSS software version 16 by using descriptive and inferential statistics.
Results: The finding showed that 46% had adequate knowledge, while 54% of the respondents had inadequate knowledge about uterine prolapsed. There was significant association between ethnic group, educational status, family income, antenatal and postnatal visit where as no significant association between age, occupation , type of family, marital status, age of marriage, number of children, age at first childbirth and place of delivery.
Conclusion: The study concluded that more than half of the respondents had inadequate knowledge about uterine prolapse. There was significant association between ethnic group, educational status, family income, antenatal and postnatal visit. Therefore the government and non government organizations effort on health awareness programme are essential to maximize the knowledge of uterine prolapse.

Key words: Knowledge, Uterine prolapsed, Reproductive age

INTRODUCTION

Uterine prolapsed is a condition in which the muscles and supporting ligaments holding the uterus in place gets too weak to keep the uterus in position. [1] "AangJharne" is the typical Nepali name of uterine prolapse. [2] Uterine prolapse is main contributor to reproductive health problems that influence women's quality of life. [3] The causes of uterine prolapse are inaccessibility to quality maternal health care (Skilled Birth Attendant and Emergency Obstetric Care), poverty, gender discrimination related to health (Reproductive health/maternal care), nutrition (life cycle), workload during postnatal period and domestic violence. In particular, no additional food during

pregnancy and postnatal period, heavy work load during pregnancy and inadequate post natal care contribute to uterine prolapse. Prolonged labor, birth of big babies, unsafe abortions, sexual intercourse immediately after delivery, hypertension and diabetes are supposed to be causal factors of uterine prolapse. [1] Other factors such as low levels of estrogen in post menopausal women, obesity, smoking and constipation also contribute to the development of uterine prolapsed. [4]

Uterine prolapse is one of the most common causes of reproductive morbidity which influence the women quality of life. Even though prolapse is not considered a life threatening condition, but it affect the women physically, psychologically, sexually and lead to occupational and social limitations, it also increase the risk of reproductive and urinary tract infection. [2]

Uterine prolapse not only affects older women but is also very common among younger women. [5] Although women suffering from uterine prolapse experience many symptoms, but the most specific symptoms for the condition are the feeling of something bulging out of the vagina, sensation of heaviness in the pelvis, vaginal bleeding, increased vaginal discharge, dysparaunia, low backache, urine incontinence, and constipation. It is obvious that uterine prolapse not only results in physical pain, unbearable distress and extended infection but also has social implication which affects the women quality of life. [2]

Complications resulting from prolapse of the uterus in pregnancy vary from minor cervical infection to spontaneous abortion, and include preterm labor and maternal and fetal mortality as well as acute urinary retention and urinary tract infection. [6] Uterine prolapse can be treated by the use of ring pessaries, combination of ring pessaries with pelvic floor exercises and surgical treatment. Preventing uterine prolapse requires awareness raising regarding the preventive measures such as, maintaining healthy life style, taking adequate rest during postnatal period, performing Kegel exercise, maintaining ideal body weight, avoiding constipation, encouraging antenatal care and stop smoking and behavior changes at the individual, family, and community levels. [2]

Globally, 30% of all women who have delivered a child are affected. For every maternal death, an estimated 6 to 15 women face debilitating morbidity. The incidence in other countries is – 17% in Australia and U.S., 8.5% in France and 27% in Turkey. Global prevalence is quoted as 2-20 % under the age of 25 years. In Nepal, 9-35% of Nepali women are suffering from uterine prolapse, and at least 200,000 are in need of immediate surgical treatment. Prolapse surgery is the 2nd in the operation list. 45% of uterine prolapse cases appear after first delivery. There is one in four women complained of uterine prolapse, and one in four were diagnosed with uterine prolapse. Over one fifth of women are reported the onset of prolapse before the age of 20 years. [7] Studies from different administrative regions of Nepal show that in Siraha and Saptari districts of Terai region has found high prevalence of uterine prolapse among reproductive age women to be 30% and 42% respectively. According to National Alliance for Pelvic Organ Prolapse Management- Nepal, uterine prolapse prevalence rate were found to be higher among regions, caste and ethnic groups where women and girls are exposed to higher level of gender based discriminations. [8]

In Egypt more than half of the studied women 56.5% didn't hear about uterine prolapse, 95% studied women exhibit poor knowledge regarding uterine prolapse. [2] In South Western medical centre USA 44% of the respondents had knowledge of uterine prolapse. The majority do not believe the uterus is important for body image or sexuality. [9] A study conducted in Nepal regarding knowledge gap in women, it was found that 53% of women had never heard about uterine prolapse and uterine prolapse knowledge

was satisfactory in 37% of those who had ever heard about uterine prolapse. [10]

A study done in Surkhet district, Nepal 77.27% are unaware about uterine prolapsed. [11] Uterine prolapse is major public health issue in Nepal with little attention given to the problem. It is clear that women lack knowledge about uterine prolapse. [8] A study conducted in Lalitpur, Nepal on knowledge on risk factors of uterine prolapse among reproductive age women, reveals that 46.5% respondents have adequate knowledge and 53.5% respondents have inadequate regarding risk factors of Uterine prolapse. [8] Uterine prolapse is major public health issue in Nepal with little attention given to the problem. It is clear that women lack knowledge about uterine prolapse. [8]

Uterine prolapse has been unsatisfactorily addressed and is a sensitive topic among women, families, and communities in Nepal. Most women hide uterine prolapse problems due to embarrassment, leading to personal problems (eg, domestic violence), lack of family support, ineffective treatment, and high cost for travel, food, and lodging. [10] In Nepal , research on knowledge of uterine prolapse is still limited , from the conclusion of the previous studies and investigation that there is still a knowledge gap about uterine prolapse among women of reproductive age group women. [3,10,12,8] Thus, it is very important to study the knowledge on uterine prolapse.

Objectives:

1. To assess the knowledge on uterine prolapse among reproductive age group women in Manmohan Memorial Medical College and Teaching Hospital.
2. To identify association between the level of knowledge on uterine prolapse with socio demographic variables.

MATERIALS AND METHODS

A descriptive cross-sectional study design was adopted for the study to assess the knowledge on uterine prolapse among reproductive age group women. The study was conducted at Manmohan Memorial Medical College and Teaching Hospital Kathmandu, Nepal. The Study population was Reproductive age group (15-49 years) women attending Gynecological OPD in MMTH. The Non probability purposive sampling Sampling Technique was used. The sample size was 150. Before conducting the research, formal approval was taken from Institutional Review Committee (IRC, MMIHS). Formal permission was taken for the data collection from Manmohan Memorial Medical College and Teaching Hospital. The researcher explained the purpose of the study to the participants and written consent was taken before data collection. Validity of the tool was maintained by consulting with the subject expert, research guide or advisor before data collection. Reliability of the research instrument was done with 10% of the sample in Manmohan Memorial Community Hospital and modification of the instrument was applied as per the suggestion from pretest. Data was collected by using semi structured knowledge questionnaire through face to face interview schedule within allocated time i.e. September 2 to September 18, 2018 and it took 10-15 minutes for each respondent. The semi structured knowledge questionnaires were divided into two parts i.e., Socio demographic information of respondents and questions related to knowledge on uterine prolapse. Each question has 2 or 4 alternative responses. A score value of 1 is allocated to each correct response and 0 is allocated for wrong response. A total score ranges from 0-18. The level of knowledge scores was categorized according to the value of mean score i.e., 50.5. We used ≥ 50.5 as adequate knowledge and <50.5 as inadequate knowledge. Confidentiality was maintained. The data were analyzed by using SPSS version 16 where descriptive statistics (frequency, percentage, mean and standard deviation) and inferential statistics (chi square test) was used.

RESULTS

Table 1 Socio-demographic characteristics of respondents n= 150

Variables	Frequency (n)	Percentage (%)
Age		
15-30	83	55.3
31-49	67	44.7
Ethnic group		
Brahamin	34	22.7
Chhetri	43	28.7
Janajati	56	37.3
Dalit	17	11.3
Educational status		
Illiterate	21	14.0
Primary	20	13.3
Secondary	30	20.0
Higher secondary	79	52.7
Occupation		
Housewife	90	60.0
Laborer	5	3.3
Business	30	20.0
Others	25	16.7
Type of family		
Nuclear	109	72.7
Joint	41	27.3
Average family income		
Below 10000	3	2.0
10001-20000	11	7.3
20001-30000	59	39.4
More than 30000	77	51.3
Marital status		
Married	136	90.6
Unmarried	14	9.4
Age of marriage (n=136)		
≤20	40	29.4
≥21	96	70.6
No of children (n=136)		
None	25	18.4
One	44	32.4
Two	52	38.24
Three or more than three	15	11.03
Age at first childbirth (n=111)		
≤20	20	18.0
≥21	91	82.0

Table 1 shows that more than half of the respondents (55.3%) were age 11-30 and (37.3%) participants were janajati. Educational status among the most of respondents (52.7%) was secondary level and 60% of the participants were housewife. Majority of respondents (72.7%) belonged to nuclear family. Regarding income (51.3%) of the respondents had more than 30000. Most of the respondents (90.6%) were married in which (70.6%) were married after twenty years. Among married majority of them (38.2%) had two children. Among married (82.0%) respondents age at first childbirth was after 20 years.

Table 1.1 Socio-demographic characteristics of respondents n=111

Variables	Frequency(n)	Percentage(%)
Age at first childbirth		
≤20	20	18.0
≥21	91	82.0

Table 1.1 shows that among married (82.0%) respondents age at first childbirth was after twenty years.

Table 2 Access to health care n=111

Variables	Frequency (n)	Percentage (%)
Antenatal and postnatal visit		
Only antenatal	89	80.1
Both	14	12.7
None	8	7.2
Place of delivery		
Home	8	7.2
Hospital	103	92.8

Table 2 shows that majority of respondents (80.1%) only visit antenatal care and (92.8%) birth took at hospital.

Table 3 Knowledge on uterine prolapse of respondents n=150

Variables	Frequency(n)	Percentage(%)
Heard about uterine prolapsed		
Yes	150	100.0
Meaning uterine prolapse		
Something falling out of vagina	97	64.6
Extra growth of tissue into the vagina	36	24.0
Swelling of vagina	4	2.7
Erosion of vagina	13	8.7
Uterine prolapse a communicable disease		
Yes	9	6.0
No	134	89.3
Do not know	7	4.7

*- Multiple Response Question (MRQ)

Table 3 shows that 100%respondentshad heard about uterine prolapse.Among them majority of respondents (64.6%) replied uterine prolapse as something falling out of vagina, (89.3%)

replied uterine prolapse was not a communicable disease. and (81.3%) replied causes of uterine prolapse was carrying heavy loads.

Table 3.1Knowledge on uterine prolapse of respondents n=150

Variables	Frequency(n)	Percentage (%)
Causes of uterine prolapse *		
Multiple pregnancies	109	72.6
Delivered by untrained personnel	32	21.3
Carrying heavy loads	122	81.3
Lack of nutritious diet in postnatal period	6	4.0
Sign and symptoms of uterine prolapse *		
White vaginal discharge	96	64.0
Feeling of something coming out per vagina	65	43.3
Involuntary pass of urine during coughing, sneezing, laughing	25	16.6
Difficulty in walking	30	20.0
Uterine prolapse preventable or not		
Yes	145	96.6
No	5	3.4
If yes then preventive measures of uterine prolapse *		
Non lifting heavy loads during postnatal period	120	80.0
Avoiding multiple pregnancy	102	68.0
Preventing perineal infections	23	15.33
Women with uterine prolapse go for treatment		
Hospital	150	100.0
Choice for treatment of uterine prolapse		
Medicine	66	44.0
Ayurvedic / herbal	3	2.0
Ring pessaries / surgery	79	52.6
No treatment	2	1.4
Complication of uterine prolapsed		
Infection	18	12.0
Piles	1	0.6
Cancer	96	64.0
Do not know	35	23.4

*- Multiple Response Question (MRQ)

Table 3.1shows that majority of respondents (81.3%) replied causes of uterine prolapse was carrying heavy loads,(64.0%) replied sign and symptoms of uterine prolapse was white vaginal discharge, (96.6%) replied uterine prolapsewas preventable and out of (96.6%) majority of participants (80.0%) replied prevention of uterine prolapse was non lifting heavy loads during postnatal period.100% respondents goes hospital for treatment of uterine prolapse and majority of rrespondents (52.67%) replied treatment of uterine prolapse was ring pessaries and surgery, (64%) replied complication of uterine prolapse was cancer.

Table 4 shows that majority of respondents (54.6%) had heard about uterine prolapse from friends.

Table 4. Source of informationof uterine prolapse n=150

Variables	Frequency(n)	Percentage(%)
Source of information *		
Friends	82	54.6
Relatives	24	16.0
Health personnel	19	12.6
Media	73	48.6

*- Multiple Response Question (MRQ)

Table 5. Knowledge score of uterine prolapse n=150

Variables	Frequency	Percentage
Inadequate	81	54
Adequate	69	46
Mean knowledge score± SD= 50.5±1.3		

Table 5 shows that less than half (46%) had adequate knowledge and more than half (54%) had inadequate knowledge about uterine prolapse. The mean knowledge score with standard deviation was 50.5±1.3.

Table 6: Association of the level of knowledge score with socio-demographic variables n=150

Socio-demographic Variables		Knowledge	Level	
		Adequate n(%)	Inadequate n(%)	p-value
Age	15-30	40(48.2)	43(51.8)	0.54
	31-49	29(43.3)	38(56.7)	
Ethnic group	Brahamin	23(67.6)	11(32.4)	0.03*
	Chhetri	17(39.5)	26(60.5)	
	Janajati	21(37.5)	35(62.5)	
	Dalit	8(47.1)	9(52.9)	
Educational	Illiterate	2(9.5)	19(90.5)	#0.001*
Status	Primary	2(10.0)	18(90.0)	
	Secondary	15(50.0)	15(50.0)	
	Higher secondary	50(63.3)	29(36.7)	
Occupation	Housewife	37(41.1)	53(58.9)	#0.45
	Laborer	2(40.0)	3(60.0)	
	Business	16(53.3)	14(46.7)	
	Others	14(56.0)	11(44.0)	
Type of family	Nuclear	54(49.5)	55(50.5)	0.16
	Joint	15(36.6)	26(63.4)	
Average	below 10000	2(66.7)	1(33.3)	#0.024*
family Income	10001-20000	3(27.3)	8(72.7)	
	20001-30000	20(39.9)	39(66.1)	
	above 30001	44(57.1)	33(42.9)	
Marital status	Married	64(47.1)	72(52.9)	0.41
	Unmarried	5(35.7)	9(64.3)	
If married age	≤20	15(37.5)	25(62.5)	0.14
of marriage n=136	≥21	49(51.0)	47(49.0)	

Key: * significant (P value : <0.05), and # = Fisher's exact test

Table 6 shows that there is significant association of knowledge with ethnic group (0.03), educational status (0.001), average family income(0.024)where as no significant association was seen between age (0.54) and occupation (0.45), type of family(0.16), marital status(0.41),age of marriage (0.14).

Table 6.1Association of the level of knowledge scores with socio-demographic variables

Socio-demographic Variables		Knowledge Level		
		Inadequate n(%)	Adequate n(%)	p-value
No of children	None	15(60.0)	10(40.0)	0.45
	One	20(45.5)	24(54.5)	
n=136	Two	27(51.9)	25(48.1)	
	Three or more than three	10(66.7)	5(33.3)	
Age at first	≤20	14(70.0)	6(30.0)	0.06
Childbirth n=111	≥21	43(47.3)	48(52.7)	

Key: * significant (P value : <0.05), and # = Fisher exact test

Table 6.1 shows that there is no significant association is seen between number of children (0.45) and age at first childbirth (0.06).

DISCUSSION

The present study shows that 46% had adequate knowledge and 54% had inadequate knowledge of uterine prolapse. Similarly the study conducted in Bhaktapur, Nepal shows that 55% had comprehensive knowledge of uterine prolapse. [12] As contradict to cross sectional study conducted in Nepal shows that fifty-three percent of participants had never heard about uterine prolapse, and uterine prolapse knowledge level was satisfactory in 37% of those who had ever heard about uterine prolapse. [10] This may be due to community based study, large sample size i.e. 4693, study population was only married women of reproductive age, multi stage random sampling technique.

In this study all (100%) respondents had heard about uterine prolapse as contradict to cross sectional study conducted in Nepal reveal that 53% had never heard about uterine prolapse. [10] This may be due to community based study, large

sample size i.e. 4693, study population was only married women of reproductive age, multi stage random sampling technique.

In this study majority of respondents 81.3% response carrying heavy loads as causes of uterine prolapse. As compareto the study conducted in Bhaktapur, Nepal shows 92.1% respondents understood that carrying heavy loads can increase the probability of uterine prolapse(12). This may be due to community based study, large sample size i.e. 3124, simple random sampling technique.

In regard to preventive measures of uterine prolapse, the majority of respondents 96.6% said that uterine prolapse is preventable. Out of 96.6% majority 80% answered non lifting heavy loads during postnatal period as preventive measures of uterine prolapse. As contradict to descriptive study conducted in Egypt shows that 10% of the respondents answered correct answer about preventive measures of uterine prolapse. [2] This is probably due to different setting; different sample- 200 married women, convenient sampling technique.

In this study more than half of respondents 52.6% answered ring pessaries and surgery as the method of treatment of uterine prolapse. As compare to study conducted in Bhaktapur, Nepal shows 49.7% answered ring pessaries and 59.5% answered vaginal hysterectomy as the method of treatment of uterine prolapse. [12] This may be due to community based study, large sample size i.e. 3124, simple random sampling technique.

In terms of source of information of uterine prolapsed majority of respondents 54.6% had heard from friends as similar study conducted in 25 districts of Nepal reveal that 47.2% had heard from friends and relatives. [10]

The present study findings reveal that there was statistically significant association between ethnic group, educational status, family income where as no significant association was seen between age, occupation, type of family, marital status, age of marriage, number of children and age at first childbirth. As contradict to cross sectional study conducted in Lalitpur, Nepal reflects that knowledge on risk factors of uterus prolapse is significantly associated with the age of respondent, age at marriage of respondents, education status of respondents and age at first child birth of respondent. [8] This may be due to community based study, different sampling technique i.e. simple random sampling.

CONCLUSION

The study concluded that 54% of the respondents had inadequate knowledge and 46% of the respondents had adequate knowledge about uterine prolapsed. There was significant association between ethnic group, educational status, family income, antenatal and postnatal visit. Uterine prolapsed related health awareness programs should be targeted in all women's of ethnic groups, age groups, and education status nationwide, including both urban and rural communities and Screening test program for uterine prolapsed can be organized by government.

REFERENCES

1. Thapa B, Rana G, Gurung S. Contributing factors of utero-vaginal prolapse among women attending in Bharatpur hospital. Journal of Chitwan Medical College. 2014;4(3):38-42.
2. Elsayed FM, Ahmed MH, Gaheen M. Knowledge and Practices of women regarding Risk Factors of Uterine Prolapse. IOSR Journal of Nursing and Health Science (IOSR-JNHS). 2016;5(6):60-7.
3. Shrestha B, Onta S, Choulagai B, Poudyal A, Pahari DP, Uprety A, et al. Women's experiences and health care-seeking practices in relation to uterine prolapse in a hill district of Nepal. BMC women's health. 2014;14(1):20.
4. Akmel M, Segni H. Pelvic organ prolapse in Jimma University specialized hospital, Southwest Ethiopia. Ethiopian journal of health sciences. 2012;22(2).
5. Radl CM, Rajwar R, Aro AR. Uterine prolapse prevention in Eastern Nepal: the perspectives of women and health care

professionals. International journal of women's health. 2012;4:373.
6. Tsikouras P, Dafopoulos A, Vrachnis N, Iliodromiti Z, Bouchlariotou S, Pinidis P, et al. Uterine prolapse in pregnancy: risk factors, complications and management. The Journal of Maternal-Fetal & Neonatal Medicine. 2014;27(3):297-302.
7. Khatri R. Situation of uterine proplapse in Salyan, Mugu and Bajhang Districts of Nepal: a clinic based study. Health Prospect. 2011;10:10-3.
8. Singh DR, Lama S, Maharjan S. Knowledge on risk factors of uterine prolapse among reproductive age group women of Bajrabarahi Municipality of Lalitpur, Nepal. facilities. 2016;6:7.
9. Good MM, Korbly N, Kassis NC, Richardson ML, Book NM, Yip S, et al. Prolapse-related knowledge and attitudes toward the uterus in women with pelvic organ prolapse symptoms. American journal of obstetrics and gynecology. 2013;209(5): 481. e1-. e6.
10. Shrestha B, Devkota B, Khadka BB, Choulagai B, Pahari DP, Onta S, et al. Knowledge on uterine prolapse among married women of reproductive age in Nepal. International journal of women's health. 2014;6:771.
11. Sharma A, Zhang JP. Risk Factors and Symptoms of Uterine Prolapse: Reality of Nepali Women. Asian Women. 2014;30(1): 81-95.
12. Shrestha B, Choulagai B, Onta S, Shrestha KB, Petzold M, Krettek A. Knowledge, prevalence and treatment practices of uterine prolapse among women of reproductive age in the Jhaukhel-Duwakot Health Demographic Surveillance Site, Bhaktapur, Nepal. Journal of Kathmandu medical college. 2014;3(4):136-43.

How to cite this article: Bhurtel R, Mandal R, Shah S. Knowledge on uterine prolapse among reproductive age group women in Nepal. Int J Health Sci Res. 2019; 9(11):45-52.

******