



RESEARCH ARTICLE

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## KNOWLEDGE AND PRACTICE REGARDING MENSTRUAL HYGIENE AMONG ADOLESCENT GIRLS

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### ABSTRACT

**Background:** Menstruation is the normal biological process and a key sign of reproductive health. Unfortunately, the taboo surrounding menstruation prevents women from articulating their needs. There is lack of awareness on the process of menstruation and hygienic management of the same. So the problems of poor menstrual hygiene persists in the society. **Methods:** A descriptive study was conducted regarding menstrual hygiene among adolescent girls of selected schools in Amritsar. A total of 60 adolescent girls of age group 13 to 17 yrs. were included. Data is collected through self structured questionnaire and checklist. Purposive sampling technique is used to collect data. **Result:** Results revealed out of 60 adolescent girls, 16.66% were having good knowledge, 51.6% were having average knowledge and 31.6% were having below average knowledge. In case of practice, 61.6% had good practice and 38.3% had poor practice regarding menstrual hygiene. **Conclusion:** It is concluded that the high percentage of adults have average knowledge about menstrual hygiene and show good hygienic practices.

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## INTRODUCTION

The word adolescence is derived from Latin word "adolescere" which means "to grow" or "to mature". WHO defines the adolescence as a period between 10 years to 19 years ([http://www.who.int/topics/adolescent\\_health/en](http://www.who.int/topics/adolescent_health/en)). Adolescence has been recognized as a special period which signifies the transition from girlhood to womanhood (Thakre, 2011). Adolescent girls are about 1/5<sup>th</sup> of the total female population in the world (Maria et al., 2016). Early adolescence is a time of physical, intellectual, emotional, and social development during which young people exhibit physical and sexual maturation under influence of hormones when the child experiences physical and sexual changes and confronts the questions like self concept and social relationship (Glutie, 2014). Menstruation is the cylindrical shedding of the inner lining of the uterus and endometrium under the control of hormones of the hypothalamic-pituitary axis. Menarche, or the onset of menstruation, is a landmark feature of female puberty and signals reproductive maturity. It is not an illness. It is a normal, healthy and mature process.

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The age of onset is from 9-16 years. Average blood loss is about 3 ounces per month. Menarche is a signal of sexual maturation occurs and women becomes capable to reproduce (Menstrual Hygiene, 2007). Around 3000 days of menstruation occurs in an average woman's lifetime which is an integral part of women, indeed of human existence (Patkar, 2014). Menarche is the milestone in a women's life as it denotes the start of reproductive capacity but there is a gross lack of information on menstrual preparedness and management among adolescent girls. A major significant qualitative event in a women's life in the commencement of the first menstrual period marking the attainment of a major functional state. Menstruation, and the menstrual cycle are characterized by variability in volume, pattern and regularity, which at the earlier stages of the development of the adolescent can create emotional discomfort, particularly to the poorly informed girls (Dasgupta, 2008). Menstruation is a normal biological process and a key sign of reproductive health, yet in many cultures it is treated as shameful or dirty. The continued silence and menstruation combined with limited access to information at home and in schools result in millions of women and girls having very little knowledge about what is happening to their bodies when they menstruate and how to deal with it (<http://wash-united.org/our-work/issues/menstrual-hygiene-management/article/our-work-issues-menstrual-hygiene-management>).

About 52% of the female population is of reproductive age and most of them menstruating every month. Most of them had no access to clean and safe sanitary products or to clean private space. Menstruation is supposed to be invisible and silent, and sometimes menstruating women and girls are supposed to be invisible and silent too. Millions of girls and women are subject to restriction in their daily lives as they are menstruating like not attending any religious functions or to cook food etc (<http://www.sswm.info/content/menstrual-hygiene-management>). Hygiene related practices of the women during menstruation are of considerable importance, as it has a health impact in terms of increased vulnerability to reproductive tract infections.

The interplay of socio-economic status and RTI are noticeable. Today millions of women are suffering from RTI and its complications due to lack of knowledge related to menstrual hygiene and unhygienic practices (Dasgupta, 2008). Better understanding of good menstrual hygiene is crucial for the education, health and dignity of the girls and women (Juyal, 2014). Prajapati (2015) conducted a cross sectional study in urban community of Gandhi Nagar on the 155 adolescent girls through structured questionnaire. This study showed that 39.8% known about menstruation before menarche, 48.9% reported mother as a source of information. 17% girls have correct knowledge, 26.1% used sanitary pads, 30% girls not using sanitary pads because of the cost (Prajapati, 2015).

**Statement problem:** A descriptive study to assess the knowledge and practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar, Punjab, 2019.

**Purpose of study:** To explore the knowledge and practice regarding menstrual hygiene among the adolescent girls.

### Objectives of the study

- To assess the knowledge regarding the menstrual hygiene among adolescent girls.
- To assess the practice regarding the menstrual hygiene among adolescent girls.
- To find out the association of knowledge regarding menstrual hygiene among adolescent girls with selected demographic variables.
- To find out the association of practice regarding menstrual hygiene among adolescent girls with selected socio demographic variables.
- To rule out the correlation between the knowledge and practice regarding menstrual hygiene among adolescent girls.

### Operational definitions

- **Knowledge:** In this study, knowledge refers to belief and facts regarding menstrual hygiene known to adolescent girls.
- **Practice:** In this study, practice refers to the actual use of beliefs, facts or ideas regarding menstrual hygiene among adolescent girls in their daily lives.
- **Menstrual hygiene:** In this study, it refers to the personal hygiene practices performed by adolescent girls during the menstruation.
- **Adolescent girls:** In this study, adolescent girls refers to girls of age group between 13-17 years.

### Assumptions

- The study assumes that adolescent girls have poor knowledge regarding the menstrual hygiene.
- The study assumes that adolescent girls have poor practice regarding menstrual hygiene.

### Delimitations

#### This study is delimited to

- Adolescent girls between 13-17 years of age group.
- Adolescent girls of standard 7-10.

### METHODOLOGY

The research methodology is the systematic, theoretical analysis of the methods applied to a field of study. It comprises the theoretical analysis of body of methods and principles associated with a branch of knowledge. It is a framework or guide used for the planning, implementation, and analysis of a study. It is a systematic plan of what is to be done, how it will be done, and how the data will be analysed (Sharma, ?).

**Research approach:** Quantitative research approach was used in this study.

**Research setting:** The study was conducted in Ram Ashram Public School, Majitha Road, Sehaj Avenue, Amritsar, Punjab and Khalsa Senior Secondary School, Amritsar. The adolescent girls of age group 13-17 years from 7<sup>th</sup> to 10<sup>th</sup> class was taken.

### Criteria for sample selection

- **Inclusion criteria:** 1. Adolescent girls in the age group 13-17 years.
- Adolescent girls who were willing to participate in the study.
- Adolescent girls who were studying in 7-10 standard.
- **Exclusion criteria:** 1. Adolescent girls who had not attained menarche.
- Adolescent girls who were absent at the time of study.

**Data collection procedure:** The data collection procedure was done during the month of July 2019, considering adolescent girls of selected schools as our sample. The purposive sampling technique was used for data collection.

- **Permission:** The formal permission for conduction of study was obtained from principals of selected schools of Amritsar.
- **Procedure:** The investigator by using purposive sampling method selected the adolescent girls. During this time, the researcher introduced her to selected group of participants and obtained their consent, assured to maintain confidentiality of the answers. The respondents were asked to respond to the questionnaire according to the instruction given in the tool.

**Ethical considerations:** Prior information and explanation given to participants. We explained the purpose of study to subjects and assured them that the response will be kept

confidential. The professional interpersonal relationship was maintained with the subjects.

#### Limitations:

- The study is limited to adolescent girls of 13- 17 years of selected schools of Amritsar.
- The study was confined to 60 adolescent girls.

**Analysis and interpretation:** This chapter deals with analysis and interpretation of data. Data is collected to assess the knowledge and practice regarding menstrual hygiene among 60 adolescent girls of selected schools of Amritsar, Punjab. Analysis is a process of organizing and synthesizing the data so as to answer the research questions and test hypothesis. <sup>12</sup> Statistical analysis was done according to the objectives laid for the study. Data was analyzed by calculating the scores in terms of percentage and demographic variables of study participants.

#### The data analysis was based on the following objectives of the study

- To assess the socio demographic variables of the adolescent girls.
- To assess the knowledge regarding the menstrual hygiene among adolescent girls.
- To assess the practice regarding the menstrual hygiene among adolescent girls.
- To find out the association of knowledge regarding menstrual hygiene among adolescent girls with selected demographic variables.
- To find out the association of practice regarding menstrual hygiene among adolescent girls with selected socio demographic variables.
- To rule out the correlation between the knowledge and practice regarding menstrual hygiene among adolescent girls.

The raw data was collected and entered in a master data sheet. Then it was analyzed and interpreted using descriptive and inferential statistics. The analyzed data were organized according to objectives and presented under the following major heading:

**Demographic characteristics:** Table 1 figure 1-8 reveals the frequency distribution of characteristics of the study subjects. A total 60 adolescent girls knowledge and practice was assessed regarding menstrual hygiene. Demographic variables are analyzed and presented in frequency and percentage distribution. Distribution of study subjects according to age shows that majority of adolescent girls 31 (51.6%) were in the age group 14-15 years followed by 19(31.6%) were included in age group 12-13 years and 10(16.6%) were in the age group of 16-17 years. As per the education level of mother, maximum of the women 17(26.6%) were educated upto secondary level, followed by 16(26.6%) were higher secondary, 13(21.6%) were included in group that can read or write only and 1(1.66%) can't read or write. As per family income, the maximum income of family is 22(36.6%), followed by equal number 17(28.3%) with income of 5000-10,000 and above 15000 and minimum income of 3(5%) is <5000. Regarding occupation of father, maximum 28(46.6%) are in private job, followed by 17 (28.3%) laborer and 11(18.3%) are government employee and 4(6.66%) are

unemployed. As per religion, majority of adolescent girls 29(48.3%) were Hindu, 27(45%) were Sikh, followed by 4(6.66%) Muslim and 0(0%) were Christian and others. According to number of adolescent girls were in 8<sup>th</sup> class with 44(73.3%), followed by 10<sup>th</sup> class with 8(13.3%), and 9<sup>th</sup> and 7<sup>th</sup> class with 4(6.66%). As per sample maximum no. of girls belonged to nuclear family i.e. 36(60%) and rest 24(40%) belonged to joint family.

As per source of information, majority of source of information about menstruation 32(53.3%) was family, followed by 18(30%) was peer group, 7(11.6%) health worker and 3(5%) was mass media.

#### Objective 1: To assess the knowledge regarding the menstrual hygiene among adolescent girls

**Table 1. Percentage and frequency Distribution of sample Characteristics N=60**

Demographic variables	(n)	(%)
AGE (in years)		
12-13 years	19	31.6
14-15 years	31	51.6
16-17 years	10	16.6
EDUCATIONAL STATUS OF MOTHER		
Can't read or write	1	1.66
Can read or write	13	21.6
Primary	13	21.6
Secondary	17	28.3
Higher secondary	19	26.6
FAMILY INCOME		
<5000	3	5
5000-10000	17	28.3
10,000-15,000	22	36.6
>15000	17	28.3
OCCUPATION OF FATHER		
Government job	11	18.3
Labourer	17	28.3
Unemployed	4	6.6
Private job	28	46.6
RELIGION		
Hindu	29	48.3
Muslim	4	6.66
Sikh	27	45
Christian	0	0
Others	0	0
CLASS		
7 <sup>th</sup>	4	6.66
8 <sup>th</sup>	44	73.3
9 <sup>th</sup>	4	6.66
10 <sup>th</sup>	8	13.3
TYPE OF FAMILY		
Joint	24	40
Nuclear	36	60
SOURCE OF INFORMATION ABOUT MENSTRUATION		
Family	32	53.3
Peer group	18	30
Mass media	7	5
Health worker	3	11.6

Table 2 Figure 9 showed that maximum girls 31(51.6%) were having average knowledge regarding menstrual hygiene followed by 19(31.6%) had poor knowledge, whereas 10(16.6%) had good knowledge. Hence, the result showed that majority of adolescent girls 31(51.6%) had LESS knowledge regarding menstrual hygiene. Table 3 figure 10 depict the maximum number of adolescent girls 37 (61.6%) had GOOD practice whereas 23(38.3%) had BAD practices regarding menstrual hygiene. Hence, findings reveal that high percentage 61.6% of adolescent girls had GOOD practices regarding menstrual hygiene. Table 4 showed that mean knowledge score is 7.6 and standard deviation is 8.16 and mean practice is

7.8 and standard deviation is 8.26. Coefficient of correlation is 0.37. Therefore, there is POSITIVE relationship between knowledge and practice.

## DISCUSSION

This chapter deals with the findings of the present study, "A descriptive study to assess the knowledge and practice regarding menstrual hygiene among the adolescent girls of selected schools of Amritsar, Punjab, 2019." In this chapter, an attempt has been made to discuss the findings of the study in accordance with the objective of the study. The present study was conducted in selected schools of urban areas of Amritsar. Total sample were 60 adolescent girls. Purposive sampling technique was used to collect the samples. Before collecting data, investigator gave brief introduction about self, purpose of study and instructions regarding filling the tool and gain confidence.

**Objective: 1. To assess the knowledge regarding menstrual hygiene among adolescent girls:** Data regarding knowledge revealed that 51.6% had average knowledge, 31.6% had below average knowledge. A study conducted by Mahajan Anjali, Kaushal Kanica in the year 2017 shows similar result which 29% had adequate knowledge 71% had inadequate knowledge about menstrual hygiene (Mahajan, 2017).

**Table 2. Frequency and percentage distribution of knowledge regarding menstrual hygiene among adolescent girls of selected schools of Amritsar. N=60**

Level of Knowledge	N	%
Good(12-16)	10	16.6
Average(6-11)	31	51.6
Poor(0-5)	19	31.6

Maximum score=28  
Minimum score=0

**Objective: 2. To assess the practice regarding menstrual hygiene among adolescent girls:** The analysis of data regarding level of practice revealed that 61.6% had good practice and 38.3% had bad practice. A study conducted by Mahajan Anjali, Kaushal Kanica in the year 2017 shows similar result which 69% as good practice (Mahajan, 2017).

**Table 3. Frequency and percentage distribution of practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar. N=60**

Level of Practice	N	%
Good (<)	37	61.6
Bad (>7)	23	38.3

**Objective: 3. To rule out the correlation between the knowledge and practice regarding menstrual hygiene among adolescent girls:** As per relationship between knowledge and practice (0.37) considered to be positive correlation. A study conducted by Evans Paul Kwame Ameade and Helene Akpene Garti on relationship between female university students' knowledge and their menstrual hygiene practices in northern Ghana. The results showed that Respondents knowledge on menstruation was average (57.3%) but their menstrual practices was good (80.2%). The study showed that there was a positive correlation between the knowledge and practice i.e. increasing knowledge has positive and significant effect on practice of good menstrual hygiene.<sup>14</sup>

**Table 4. Relationship of knowledge and practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar. N=60**

Variables	Mean	S.D	Coefficient of correlation
Knowledge	7.6	8.16	R = + 0.37
Practice	7.8	8.26	

## Conclusion and Recommendation

This chapter deals with the brief description of the study undertaken including the conclusion drawn from the major findings implications of the study and recommendations for future research practices.

### Major findings

- A total 60 adolescent girls knowledge and practice was assessed regarding menstrual hygiene. Demographic variables are analysed and presented in frequency and percentage distribution.
- Distribution of study subjects according to age shows that majority of adolescent girls 31 (51.6%) were in the age group 14-15 years followed by 19(31.6%) were included in age group 12-13 years and 10(16.6%) were in the age group of 16-17 years.
- As per the education level of mother, maximum of the women 17(26.6%) were educated upto secondary level, followed by 16(26.6%) were higher secondary, 13(21.6%) were included in group that can read or write only and 1(1.66%) can't read or write.
- As per family income, the maximum income of family is 22(36.6%), followed by equal number 17(28.3%) with income of 5000-10,000 and above 15000 and minimum income of 3(5%) is <5000.
- Regarding occupation of father, maximum 28(46.6%) are in private job, followed by 17 (28.3%) labourer and 11(18.3%) are government employee and 4(6.66%) are unemployed.
- As per religion, majority of adolescent girls 29(48.3%) were Hindu, 27(45%) were Sikh, followed by 4(6.66%) Muslim and 0(0%) were Christian and others.
- According to number of adolescent girls were in 8<sup>th</sup> class with 44(73.3%), followed by 10<sup>th</sup> class with 8(13.3%), and 9<sup>th</sup> and 7<sup>th</sup> class with 4(6.66%).
- As per sample maximum no. of girls belonged to nuclear family i.e. 36(60%) and rest 24(40%) belonged to joint family.
- As per source of information, majority of source of information about menstruation 32(53.3%) was family, followed by 18(30%) was peer group, 7(11.6%) health worker and 3(5%) was mass media.
- The maximum girls 31(51.6%) were having average knowledge regarding menstrual hygiene followed by 19(31.6%) had poor knowledge, whereas 10(16.6%) had good knowledge. Hence, the result showed that majority of adolescent girls 31(51.6%) had LESS knowledge regarding menstrual hygiene.
- The maximum number of adolescent girls 37 (61.6%) had GOOD practice whereas 23(38.3%) had BAD practices regarding menstrual hygiene. Hence, findings reveal that high percentage 61.6% of adolescent girls had GOOD practices regarding menstrual hygiene.
- The mean knowledge score is 7.6 and standard deviation is 8.16 and mean practice is 7.8 and standard deviation is

8.26. Coefficient of correlation is 0.37. Therefore, there is POSITIVE relationship between knowledge and practice.

- The association of knowledge with the age of adolescent girls of selected schools of Amritsar. Result showed that 57.89% had average knowledge and 5.29 % of girls had good knowledge in the age group 12-13 years. 54.83% girls had average knowledge and 16.12% had good knowledge in the age group 14-15 years whereas in the age group 16-17 years 40% had good knowledge and 20% girls had average knowledge. In order to explore association between knowledge and age of adolescent girls chi square was computed. Chi square of 7.29 at df 4 was statistically non significant at  $p < 0.05$  level.
- The association of knowledge regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with education of mother. The results showed that 100% of adolescent girls had below average knowledge whose mother can't read or write. 53.84% girls had average knowledge whose mother can read or write. The 61.53% girls had below average knowledge whose mothers had primary education whereas 15.38% had good knowledge. The 70.58% adolescent girls whose mothers had secondary education was having average knowledge whereas 56.25% had average knowledge whose mothers completed higher education and above. In order to explore association between knowledge and education of mother of adolescent girls chi square was computed. Chi square of 13.66 at df 8 was statistically non significant at  $p < 0.05$  level.
- The association of knowledge regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with Family income. The results showed that 66.66% of adolescent girls had below average knowledge whose family income is  $< 5000$ . 52.94% girls had below average knowledge whose family income is 5000-10,000 whereas only 23.52% had good knowledge. The 54.54% girls had average knowledge whose family income is 10,000- 15,000 whereas 72.22% had average knowledge with family income above 15,000. In order to explore association between knowledge and family income of adolescent girls chi square was computed. Chi square of 11.65 at df 6 was statistically non significant at  $p < 0.05$  level.
- The association of knowledge regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with occupation of father. The results showed that 45.45% of adolescent girls had below average knowledge whose father had government job. 47.06% girls had below average knowledge and 17.64% had good knowledge whose father's occupation was labourer. The 75% girls had average knowledge whose father was unemployed whereas 25% had below average knowledge. The 64.28% adolescent girls whose fathers had private job was having average knowledge. In order to explore association between knowledge and occupation of father of adolescent girls chi square was computed. Chi square of 6.91 at df 6 was statistically non significant at  $p < 0.05$  level.
- The association of knowledge regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with Religion. The results showed that 75.86% of adolescent girls who belongs to Hindu religion had average knowledge. 100% girls who had below average knowledge belongs to Sikh religion. The 40.75% girls had below average knowledge who belongs to Muslim Religion whereas only 25.92% had good knowledge. In order to explore association between knowledge and Religion of adolescent girls chi square was computed. Chi square of 19.4 at df 8 was statistically significant at  $p < 0.05$  level.
- The association of knowledge regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with their class. The results showed that 50% of adolescent girls had below average knowledge were of 7<sup>th</sup> class. 59.09% girls had average knowledge were of 8<sup>th</sup> class whereas only 9.09% had good knowledge. The 50% girls had below average knowledge were of 9<sup>th</sup> whereas 25% had good knowledge. The 50% adolescent girls was of 10<sup>th</sup> class has average knowledge whereas 12.25% had average knowledge. In order to explore association between knowledge and class of adolescent girls chi square was computed. Chi square of 10.89 at df 6 was statistically non significant at  $p < 0.05$  level.
- The association of knowledge regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with type of family. The results showed that 50% girls had average knowledge both in Joint and nuclear family whereas 20.83% girls had good knowledge in joint family and only 13.89% had good knowledge in Nuclear family. In order to explore association between knowledge and type of family of adolescent girls chi square was computed. Chi square of 0.7 at df 2 was statistically non significant at  $p < 0.05$  level.
- The association of knowledge regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with source of information regarding menstruation. The results showed that 60.60% of adolescent girls had average knowledge whose source of information is family whereas only 15.15% had good knowledge. 55.55% girls had below average knowledge whose source of information is peer group had below average knowledge. The 33.33% girls had below average, average and good knowledge with the source of information as mass media. The 100% adolescent girls had average knowledge with source of information as Health worker. In order to explore association between knowledge and source of information of menstruation of adolescent girls chi square was computed. Chi square of 14.37 at df 6 was statistically significant at  $p < 0.05$  level.
- The association of practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with age. The results showed that 38.9% of adolescent girls had bad practice were in the age group of 12-13years. 60% girls in the age group 14-15 years has good practice while only 40% in that age group has bad practice regarding menstrual hygiene. The only 20.83% girls in the age group 16-17 years has bad practice and 37.5% had good practice in same age group. In order to explore association between practice and age of adolescent girls chi square was computed. Chi square of 0.05 at df 2 was statistically non significant at  $p < 0.05$  level.
- The association of practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with education of mother. The results showed that 100% of adolescent girls had bad practice whose mothers can't read or write. 72.72% girls whose mothers can read or write has bad practice while only 27.27% has bad practice regarding menstrual hygiene. The 71.42% girls

has bad practice while only 28.57% has good practice whose mothers has primary education while the 58.82% girls whose mothers completed their secondary education had good practice. This percentage of adolescent slightly drops to 52.94% whose mothers completed higher education or above. In order to explore association between practice and education of mothers of adolescent girls chi square was computed. Chi square of 5.43 at df 4 was statistically non significant at  $p < 0.05$  level.

- The association of practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with income of family. The results showed that 100% of adolescent girls had bad practice whose family income is below 5000. 76.47% girls with family income between 5000 to 10,000 has bad practice while only 30.76% has good practice regarding menstrual hygiene. The only 47.61% girls has good practice and 52.38% had bad practice with family income between 10,000 to 15,000 whereas 52.63% has bad practice and 47.36 has good regarding the menstrual hygiene with family income above 15,000. In order to explore association between practice and family income of adolescent girls chi square was computed. Chi square of 4.14 at df 3 was statistically non significant  $p < 0.05$  level.
- The association of practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with occupation of father. The results showed that 63.63% of adolescent girls had bad practice and 36.36% has good practice whose fathers were Government employees. 68.75% girls whose fathers were labourer has bad practice while only 31.25% has good practice regarding menstrual hygiene. The 100% girls whose fathers were unemployed has bad practice whereas 46.42% had good practice and 53.57 has bad practice whose fathers has private job. In order to explore association between practice and occupation of father of adolescent girls chi square was computed. Chi square of 4.21 at df 3 was statistically non significant at  $p < 0.05$  level.
- The association of practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with Religion. The results showed that 50% of adolescent girls had bad practice and 50% has good practice belongs to Hindu religion. 66.67% girls belonged to Muslim Religion has bad practice while only 33.33% has good practice regarding menstrual hygiene. The 74.07% girls belongs to Sikh religion has bad practice whereas 25.92% had good practice. In order to explore association between practice and Religion of adolescent girls chi square was computed. Chi square of 11.79 at df 4 was statistically significant at  $p > 0.05$  level.
- The association of practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with Class. The results showed that 60% of adolescent girls had bad practice and 40% has good practice belongs to class 7<sup>th</sup>. 64.2% girls of 8<sup>th</sup> class has bad practice while only 35.71% has good practice regarding menstrual hygiene. The 57.1% girls of class 9<sup>th</sup> has bad practice whereas 42.8% had good practice. The 82.3% girls of 10<sup>th</sup> class has good practice and 17.6 has bad practice. In order to explore association between practice and Class of adolescent girls chi square was computed. Chi square of 9.07 at df 4 was statistically non significant at  $p < 0.05$  level.

- The association of practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar with Type of family. The results showed that 75% of adolescent girls had bad practice and 25% has good practice lives in joint family. 58.33% of adolescent girls has good practice and 41.66% has bad practice who lives in nuclear family. In order to explore association between practice and Type of family of adolescent girls chi square was computed. Chi square of 6.45 at df 1 was statistically significant at  $p > 0.05$  level.
- The association of source of information with the practice regarding menstrual hygiene among adolescent girls of selected schools of Amritsar. The results showed that 54% of adolescent girls had good knowledge has source of information as family while with source of information as peer group has 15.78% girls has good practice and 84.2% has bad practice. The 66.66% girls with source of information as mass media bad practice whereas with source of menstruation as Health worker has 28.5% good practice and 71.4% as bad practice. To explore the association of practice with source of information of menstruation the chi square is computed. Chi square of 7.93 at df 3 was statistically significant at  $p < 0.05$  level.

### Implications

#### Nursing Education

- The nurse should be equipped with up to date knowledge on menstruation so that they can be able to impart the appropriate knowledge.
- The nursing students must be encouraged to actively participate in education of adolescent girls regarding menstruation by appropriate adequate visual aids.
- There should be more emphasis on menarche, menstrual hygiene included in curriculum.

#### Nursing Services

- Nursing persons are in best position to impart knowledge regarding menstruation to adolescent girls in the selected schools communities, and hospital.
- The nurse educator needs to prepare self instructional materials such as learning package which can be placed in schools and all communities.
- The nurse educator need to prepare a charts related to menstruation which can be placed in schools and communities.
- Health education on menstrual hygiene can be conducted in schools yearly among adolescent girls in schools and communities.

#### Nursing Administration

- Nursing personnel working on various settings should be given in service education to update their knowledge and abilities in identifying learning needs of the adolescent girls with menstruation and plan for appropriate intervention.
- The administrators should emphasis and encouraged the nurses to conduct periodic menstrual hygiene practices.
- Nurse administrators should encourage the nursing students to prepare and utilize AV aids on menstruation.

## Nursing Research

- It is essential to identify the present level of knowledge regarding menstruation among adolescent girls to know what the required information is.
- Extensive research must be conducted in this area to identify more effective methods of educating the adolescent girls.
- This study brings about the fact that more studies need to be done at different settings which is culturally acceptable.
- Disseminate the findings of the study through conference, seminar and publishing in nursing journal, public mass media and promote the utilization of research findings in maintaining menstrual hygiene and preventing RTIs

## Recommendation

Based on the findings of the study recommendations for future study are

- The study can be done on large group of people.
- Further studies can be conducted to develop menstrual hygiene health education programme for adolescent girls in different schools in urban and in rural areas.
- A comparative study can be carried out to ascertain the knowledge and attitude regarding menstrual hygiene among adolescent girls in rural and urban areas.
- The structured teaching programme should be reviewed from time to time in order to incorporate the current trends in the field of menstrual hygiene.

## Conclusion

In present study to explore the knowledge and practice regarding the menstrual hygiene among adolescent girls and to increase awareness regarding maintaining hygiene during menstruation. Investigator shows keen interest to know regarding menstrual hygiene knowledge and practices which leads to inspection of study. A descriptive study was adopted to conduct the present study. The sample was 60 adolescent girls who were purposely selected from the selected schools of Amritsar. The data was collected through self report method. The descriptive statistics were used for data analysis. The analysis findings were depicting through the use of frequency distribution table and bar diagrams.

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