

# A Descriptive Study to Assess the Knowledge and Practice Regarding Menstrual Hygiene among Adolescent Girls of Selected Schools in Lucknow UP

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**Abstract:** "A descriptive study to assess the knowledge and practice regarding menstrual hygiene among adolescent girls of selected schools in Lucknow UP."

**Objectives:** To describe the socio demographic variables of adolescent girls, To assess the knowledge and practice levels of adolescent girls regarding menstrual hygiene among girls in selected schools, To correlate the knowledge and practice regarding menstrua; hygiene, To find out the association between knowledge and practice levels with their selected socio demographic variables of adolescent girls regarding menstrual hygiene among girls in selected school, To develop and distribute an information booklet regarding menstrual hygiene among girls.

**Design:** Descriptive research design

**Setting:** The study was conducted in St. Xavier's inter college, Lucknow

**Sample size:** The total sample size was 100 adolescent girls.

**Sampling technique:** Simple random sampling technique was used to select the sample.

**Methods:** Assessment was done by using self-structured questionnaires

**Findings:** From the findings of the study it can be concluded that were under age group of 15-18 years(64%), with regards to religion, the majority of samples belong to Hindu (82%). education majority of samples belong to 10<sup>th</sup> class (43%), majority of family income status per month is above 20,000 (36%), most of the sample belongs from nuclear family (50%), mothers education majority of sample belongs to 10<sup>th</sup> class (25%), most of the sample got menarche after 13 year (44%), majority of samples are staying at home (83%), the main source of information was family member (61%), most of the samples are bleeding during menstruation up to 4-5 day(60%), majority of samples are menstruating in 28-30 days (47%). The knowledge level of mean was assessed among adolescent students, mean was 18.26 standard deviation was 3.34 that shows that majority are having good knowledge. The Practice level of mean was assessed among adolescent students, mean was 12.53 standard deviation was 2.88 that shows that majority are having good Practice. Correlation shows that between knowledge and practice there is a weak positive correlation between knowledge and practice regarding menstrual hygiene but it is not significant at  $p < 0.05$  indicating that both tools do not correlate.

**Conclusion-** Based on the findings mean knowledge scores was higher than the practice regarding menstrual hygiene. As a result, health education program should be carried out for all adolescent girl and community member regarding importance of menstrual hygiene at all level of disseminated

**Keywords:** Knowledge, Practice, Menstrual Hygiene, Lucknow

## I. INTRODUCTION

"No adolescent ever wants to be understood, which is why they complain about being misunderstood all the time."

— Stephen Fry, Moab Is My Washpot

Adolescents belong to vital age group not only because they are the entrant population to parenthood but also because they are threshold between childhood and adulthood. As they attempt to cross this threshold, they face various

physiological, psychological, and developmental changes. The word “Adolescent” is derived from the Latin word “adolescere” which means to grow to maturity that indicates the defining features of adolescence.

Menstruation is the first indication of puberty. During puberty, the physical changes occur which transform the body of child into that of an adult, changes in body size, and changes in body proportions. A menstrual taboo is any social taboo concerned with menstruation. In some societies, it involves menstruation being perceived as unclean or embarrassing, extending even to the mention of menstruation both in public (in the media and advertising) and in private (among the friends, in the household, and with men). Many traditional religions consider menstruation ritually unclean.<sup>[2]</sup> Most of the girls receive their gynecological information from their mothers, religious books, older sister, or a peer. However, such information was generally given after menarche rather than before. Hence, there is a need to provide healthy family life education to the woman particularly the adolescent girls.

Adolescence is defined as life between 10 and 21 years of age. In females’ menstruation marks the beginning of adolescence. Menstruation is a physiological phenomenon which is unique to females in teenage. It is healthy, normal and mature process. Menstruation is still regarded as something unclean or dirty in Indian society. Most of the girls in India are at risk of getting genitourinary tract infections due to unhygienic practices during their menstruation and lack of adequate knowledge about menstrual hygiene. So, with view of this response, there is a need to assess the knowledge of adolescent girls with regard to menstrual hygiene which prevents the genitourinary tract infections.

Menstruation still a taboo subject to whisper and so, more difficult to discuss the hygiene, practices, perception and myth associated with it. The very ancient socio-cultural restrictions still play a major role in plenty of reproductive tract infections left undiagnosed. Thus, resulting in the potential loss of economy in terms of GDP, medical costs, and status of health.

Adolescent girls belong to vital age group, not only because they are the entrant population to motherhood but also because they are threshold between childhood and motherhood. The girls should be educated about significance of menstruation and development of secondary sexual characteristics, selection of sanitary menstrual absorbent and its proper disposal.

## II. NEED FOR THE STUDY

Menstrual hygiene and management is an issue that is insufficiently acknowledged and has not received adequate attention in the reproductive health and water, sanitation and hygiene (WASH) sectors in developing countries and its relationship with impact on achieving many Millennium Development Goals (MDGS) is rarely acknowledged. The large majority of survey respondents (92%) had known about menstruation before their menarche, particularly from their mothers (51%) or sisters (41%). However, the information provided was mainly about the use of cloth and the practice of rituals and restrictions constructed around the polluting effect of menstruation. Abdominal pain is the most common medical problem experienced by the survey respondents (85%). Menstrual stress is also common, particularly due to constant worry that others may know about their menstruation, about 89% of the survey respondents practice some form of restriction or exclusion, the commonest one being abstaining from religious activities (68%). The socio-cultural reasons are based on concepts of “pollution” surrounding menstruation. Survey showed that about half of the respondents ((53%) had been absent in school at least once due to menstruation. Many girls though physically present in the school, were unable to perform well due to poor concentration and attention resulting from the constant worry. Lack of privacy for cleaning and washing (41%) was the major reason identified by survey respondents for being adolescent during menstruation. This is usually because of lack of water or due to minor issues, such as missing door locks, even when the infrastructure of toilet is present.

Most of the survey respondents (66%) used reusable cloths to absorb menstrual flow during menstruation, the use being significantly higher among rural than urban school girls. Only around half of the respondents have toilet with adequate privacy at home (55%) and about two-fifth have at school (42%). On average the girls change the absorbent material between 2 to 3 times in a day and use one re-usable cloth for 3 cycles. Disposal of used cloths and napkins was a challenge in both urban and rural schools. Restrictions during menstruation that limit daily activities and routine are widely practiced. These manifest from beliefs that a woman during her menstruation is ritually dangerous, which can result in them spoiling food and plants, biological and social processes. Abnormal physical conditions, particularly dysmenorrhea and excessive bleeding as well as the mental stress during menstruation affects the daily lives and

routines of adolescent school girls to a varying degree, particularly the quality of presence at schools in terms of attention and concentration in curricular activities.

### **PROBLEM STATEMENT**

A descriptive study to assess the knowledge and practice regarding menstrual hygiene among adolescent girls of selected schools in Lucknow UP.

### **OBJECTIVES:**

- To describe the socio demographic variables of adolescent girls.
- To assess the knowledge and practice levels of adolescent girls regarding menstrual hygiene among girls in selected schools.
- To co-relate the knowledge and practice.
- To find out the association between knowledge and practice levels with their selected socio demographic variables of adolescent girls regarding menstrual hygiene among girls in selected school.
- To develop and distribute an information booklet regarding menstrual hygiene among girls.

### **HYPOTHESIS:**

Hypothesis is a statement of predicted relationship between two or more variables in a research study. The hypothesis will be tested at 0.05 level of significance.

- H1: There is significant association between knowledge scores of the adolescent girls regarding menstrual hygiene with demographic variables.
- H2: There is significant association between practice scores of the adolescent girls regarding menstrual hygiene with demographic variables.

### **III. METHODOLOGY**

- Research Approach- Quantitative approach
- Research design – Descriptive Research Design
- Research setting – Study was conducted at St. Xavier's Inter college, Lucknow the distance away from my college is 20.1km & total no. of students are >1600 .
- Population- adolescent girl.
- Target Population – adolescent girl of St. Xavier's Inter college, Lucknow.
- Accessible population – 8<sup>th</sup> standard to 12<sup>th</sup> standard of St. Xavier's Inter college, Lucknow.
- Sample SIZE – 100
- Sample technique – Non Probability Convenient Sampling technique.

### **Criteria of sample selection-**

Inclusion Criteria – The study includes Adolescent girls

- 1) Whose age group between 10-21 years and who are studying in St. Xavier's Inter college, Lucknow, UP.
- 2) Who are available at the time of data collection.
- 3) Adolescent girl who are willing to participate in the study.
- 4) Who can read and write Hindi and English language.

### **Exclusion Criteria – The study excludes**

- 1) Participants who are not willing to participate in the study.
- 2) Adolescent girls who are not studying in St. Xavier's inter college, Lucknow, UP.

**DESCRIPTION OF TOOL:**

**TOOL –I Socio-demographic data**

This tool was developed by investigators age, religion, educational status, monthly family income, type of family, mothers’ education, age of menarche, living status, source of information, bleeding days during menstruation, once in how many days do you have menstruation.

**TOOL -II A Semi Structured Questionnaire-**

The questionnaire were developed by investigators to collect the data from the samples to evaluate their knowledge regarding menstrual hygiene. It consist of total 30 questions & which includes the major four factors like knowledge on anatomy and physiology of reproductive organ, knowledge on menarche, knowledge on menstruation and menstrual cycle, knowledge on menstrual hygiene . and each correct response carries 1 marks & each wrong scores 0 marks , So the resulting score was interpreted as follows-:

Total score = 30

Good = (21-30)

Average = (11-20)

Poor = (1-10)

TOOL- III A practice checklist on practice regarding menstrual hygiene. here the scoring criteria for positive statement option YES gives 1 marks & for negative statement option NO gives 0 marks .

Total score for practice=20

Good practice score = (14-20)

Average score= (7-13)

Poor practice score= (1-6)

**IV. PLAN FOR DATA ANALYSIS**

The collected data was analyzed in the form of descriptive and inferential statistics. The analyzed data was presented by using tables & figures by using mean, percentage, standard deviation and Chi-Square test and Karl pearson coefficient are using for correlation between knowledge &Practice.

SECTION 1: distribution of demographic variables of adolescent girl regarding menstrual hygiene.

N=100

Sr.no.	DEMOGRAPHIC VARIABLE	FREQUENCY	PERCENTAGE
1	Age in years		
	a) 10-14 years	31	31%
	b) 15-18 years	64	64%
	c) 19-21 years	05	05%
2	Religion		
	a) Hindu	82	82%
	b) Muslim	07	07%
	c) Christian	07	07%
	d) others	04	04%
3	Educational status		
	a) 9 <sup>th</sup> class	41	41%
	b) 10 <sup>th</sup> class	43	43%
	c) 11 <sup>th</sup> class	06	06%
	d) 12 <sup>th</sup> class	10	10%
4	Family income per month		
	a) Below 10000/-	28	28%
	b) 10001 – 15000/-		

	c) 15001 - 20000/- d) Above 20000/-	20 16 36	20% 16% 36%
5	Type of family		
	a) Nuclear family b) Joint family c) Others	50 46 04	50% 46% 04%
6	Mothers education		
	a) 10 <sup>th</sup> class b) 12 <sup>th</sup> class c) Graduation d) Post graduation	25 28 31 16	25% 28% 31% 16%
7.	Age of menarche		
	a) 10 years b) 11 years c) 12 years d) after 13 years	8 13 35 44	8% 13% 35% 44%
8.	Where do you stay?		
	a) Home b) Hostel c) where else specify it.....	83 07 10	83% 07% 10%
9.	Source of information regarding menarche and menstrual hygiene?		
	Mass media Family members Health care personnel Friends and relatives	18 61 08 13	18% 61% 08% 13%
10.	How many days will you bleeding during menstruation?		
	1 - 3 days 4 - 5 days 6 - 7 days More than 8 days	11 60 23 6	11% 60% 23% 6%
11.	Once in how many days, do you have your menstruation?		
	a) < 28 days b) 28 - 30 days c) > 30 days	28 47 25	28% 47% 25%

The above table shows the majority of samples were under age group of 15-18 years (64%), with regards to religion, the majority of samples belong to Hindu (82%). Education majority of samples belong to 10<sup>th</sup> class (43%), majority of family income status per month is above 20,000 (36%), most of the sample belongs from nuclear family (50%), mothers education majority of sample belongs to 10<sup>th</sup> class (25%), most of the sample got menarche after 13 year (44%), majority of samples are staying at home (83%), the main source of information was family member (61%), most

of the samples are bleeding during menstruation up to 4-5 day(60%), majority of samples are menstruating in 28-30 days (47%).

Section 2: Level of Knowledge regarding Menstrual Hygiene among adolescent girl  
(n=100)

SR. NO	CONTENT	FREQUENCY	PERCENTAGE	MEAN	SD
1.	Good knowledge	67	67%	18.26	3.34
2.	Average knowledge	32	32%		
3.	Poor knowledge	1	1%		

The data presented in the above table shows that the majority of samples were having a good knowledge (67%), moderate knowledge (32%) and were having poor knowledge (1%).

Section 3: Level of Practice regarding Menstrual Hygiene among adolescent girl  
(n=100)

SR. NO	CONTENT	FREQUENCY	PERCENTAGE	MEAN	SD
1.	Good Practice	59	59%	12.53	2.88
2.	Average Practice	37	37%		
3.	Poor Practice	4	4%		

The data presented in the above table shows that the majority of samples were having a good practice (59%), moderate practice (37%) and were having poor practice (4%).

Section 4: Correlation between Knowledge and Practice regarding menstrual hygiene among adolescent girl  
(n=100)

SL. No.	Knowledge VS Practice	r Value	p Value
1.	Observational cohort	0.0411	0.684739

Table 4 represent a very weak positive correlation between knowledge and practice regarding menstrual hygiene but it is not significant at  $p < 0.05$  indicating that both tools do not correlate.

Section 5: Association between Knowledge of menstrual hygiene among adolescent girl with their Demographic variables  
(n=100)

SL.No.	Demographic variable	Level of knowledge			Chi -square	Remarks
		Poor	Average	Good		
1.	Age in years				$\chi^2=0.920$ df=4 p=9.49	*S
	a) 15-18 years	0	22	9		
	b)19-21 years	1	42	22		
	c)15-18 years	0	3	1		
2.	Religion					

	a) Hindu	1	55	26	$\chi^2=2.211$ df=6 p=12.59	*S
	b) Muslim	0	4	3		
	c) Christian	0	6	1		
	d) others	0	2	2		
3.	Educational status					
	a) 9 <sup>th</sup> class	0	27	14	$\chi^2=2.125$ df=6 p=	*S
	b) 10 <sup>th</sup> class	1	28	14		
	c) 11 <sup>th</sup> class	0	5	1		
	d) 12 <sup>th</sup> class	0	7	3		
4.	Family income per month					
	a) Below 10000/-	0	17	11	$\chi^2=6.171$ df=6 p=12.59	*S
	b) 10001 – 15000/-	0	17	3		
	c) 15001 - 20000/-	0	9	7		
	d) Above 20000/-	1	24	11		
5.	Type of family					
	a) Nuclear family	1	32	17	$\chi^2=1.309$ df=4 p=9.49	*S
	b) Joint family	0	32	14		
	c) Others	0	3	1		
6.	Mothers' education					
	a) 10 <sup>th</sup> class	0	17	8	$\chi^2=3.682$ df=6 p=12.59	*S
	b) 12 <sup>th</sup> class	1	20	7		
	c) Graduation	0	19	12		
	d) Post graduation	0	11	5		
7.	Age of menarche					
	a) 10 years	0	5	3	$\chi^2=1.994$ df=6 p=12.59	*S
	b) 11 years	0	9	4		
	c) 12 years	1	23	11		
	d) after 13 years	0	30	14		
8.	Where do you stay?					
	a) Home	1	57	25	$\chi^2=2.349$ df=4 p=9.49	*S
	b) Hostel	0	3	4		
	c) where else	0	7	3		
9.	Source of information regarding menarche and menstrual hygiene?					
	a) Mass media	0	12	6	$\chi^2=1.090$ df=6 p=12.59	*S
	b) Family members	1	41	19		
	c) Health care personnel	0	6	2		
	d) Friends and relatives	0	8	5		
10.	How many days will you bleeding during menstruation?					
	a) 1 - 3 days	0	8	2	$\chi^2=18.138$ df=6	*NS
	b) 4 - 5 days	0	40	20		



	c) 6 – 7 days	0	17	7	p=12.59	
	d) More than 8 days	1	2	3		
11.	Once in how many days, do you have your menstruation?					
	a) < 28 days	0	20	8	$\chi^2=1.983$ df=4 p=9.49	*S
	b) 28 – 30 days	1	29	17		
	c) > 30 days	0	18	7		

\*S=Significant \* NS= Not Significant

Table 5 reveal that there were a statistically significant association between knowledge of menstrual hygiene among adolescent girl with their demographic variables like age ,religion, educational status, monthly family income, type of family, mothers education, age of menarche, living status, source of information, bleeding days during menstruation, once in how many days , do you have menstruation of adolescent girl of selected at 0.05 level of significance .the demographic variables like how many days will you bleeding during menstruation shows that significant association between knowledge of menstrual hygiene with their days of bleeding during menstruation at 0.05 level of significant .

Table 6: Association between practice of menstrual hygiene among adolescent girl with their Demographic variables (n=100)

SL. No.	Demographic variable	Level of knowledge			Chi -square	Remarks
		Poor	Average	Good		
1.	Age in years					
	a) 15-18 years	1	16	14	$\chi^2=7.21$ df=04 p=9.49	*S
	b)19-21 years	2	40	23		
	c)15-18 years	1	3	0		
2.	Religion					
	a) Hindu	3	48	31	$\chi^2=3.026$ df=6 p=12.59	*S
	b) Muslim	0	5	2		
	c)Christian	1	4	2		
	d)others	0	2	2		
3.	Educational status					
	a)9 <sup>th</sup> class	1	23	17	$\chi^2=3.669$ df=6 p=12.59	*S
	b)10 <sup>th</sup> class	2	28	13		
	c)11 <sup>th</sup> class	0	4	2		
	d)12 <sup>th</sup> class	1	4	5		
4.	Family income per month					
	a) Below 10000/-	0	17	11	$\chi^2=8.847$ df=6 p=12.59	*S
	b)10001 – 15000/-	0	9	11		
	c)15001 - 20000/-	2	9	5		
	d)Above 20000/-	2	24	10		
5.	Type of family					
	a) Nuclear family	2	32	16	$\chi^2=1.360$ df=4 p=9.49	*S
	b) Joint family	2	25	19		
	c) Others	0	2	2		
6.	Mothers' education					
	a) 10 <sup>th</sup> class	1	23	17	$\chi^2=3.669$ df=6 p=12.59	*S
	b) 12 <sup>th</sup> class	2	28	13		
	c) Graduation	0	4	2		
	d) Post graduation	1	4	5		
7.	Age of menarche					
	a) 10 years	0	5	3	$\chi^2=7.963$	*S



	b) 11 years	0	8	5	df=6 p=12.59	
	c) 12 years	4	20	11		
	d) after 13 years	0	26	18		
8.	Where do you stay?					
	a) Home	3	53	27	χ <sup>2</sup> =6.400 df=4 p=9.49	*S
	b) Hostel	0	2	5		
	c) where else	1	4	5		
9.	Source of information regarding menarche and menstrual hygiene?					
	a) Mass media	1	10	7	χ <sup>2</sup> =5.767 df=6 p=12.59	*S
	b) Family members	2	38	21		
	c) Health care personnel	1	2	5		
	d) Friends and relatives	0	9	4		
10.	How many days will you bleeding during menstruation?					
	a) 1 - 3days	0	8	2	χ <sup>2</sup> =7.823 df=6 p=12.59	*S
	b) 4 - 5 days	2	35	23		
	c) 6 - 7 days	1	15	8		
	d) More than 8 days	1	1	4		
11.	Once in how many days, do you have your menstruation?					
	a) < 28 days	1	18	9	χ <sup>2</sup> =1.266 df=4 p=9.49	*S
	b) 28 - 30 days	2	25	20		
	c) > 30 days	1	16	8		

\*S=Significant

Table 6 reveal that there were a statistically significant association between practice of menstrual hygiene among adolescent girl with their demographic variables like age ,religion, educational status, monthly family income, type of family, mothers education, age of menarche, living status, source of information, bleeding days during menstruation, once in how many days , do you have menstruation of adolescent girl of selected at 0.05 level of significance .

## V. CONCLUSION

The study aimed- A descriptive study to assess the knowledge and practice regarding menstrual hygiene among adolescent girls of selected schools in Lucknow (UP)” the study was found that the level of knowledge and practice of adolescent girl towards menstrual hygiene is not appreciable. As a result, health education program should be carried out for all adolescent girl and community member regarding importance of menstrual hygiene at all level of disseminated.

## VI. RECOMMENDATION

The following recommendation is put forward as per the finding of the study-  
Similar study can be conducted on larger sample to generalize finding.  
A comparative study can be conducted with rural/urban setting.

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