



GYNAECOLOGICAL PROBLEMS OF ADOLESCENT GIRLS ATTENDING OUTPATIENT DEPARTMENT AT TERTIARY CARE CENTRE

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ABSTRACT

Background Adolescence facing various gynaecological problems between transitional stage of puberty to adulthood. These problems leads to physical, mental, psychological and social impact on their life. This study was conducted to see magnitude of gynaecological problems which need specific attention. **Methods and materials** Prospective and analytic study including 230 adolescent girls in the age group of 11-19 yrs attending gynecological Outpatient Department (OPD) at Government Medical College (GMC), and attached hospital Kota, Rajasthan from January 2019 to December 2019. Detailed history, general examinations and investigations were done to evaluate their health. **Results** Majority 72.17% of adolescent girls suffered from menstrual disorders. Most common menstrual disorders was puberty menorrhagia (40.96%). The major causes of menorrhagia, is Dysfunctional Uterine Bleeding .Vaginal atresia and imperforate hymen were causes of primary amenorrhoea. PCOD was commonest cause of secondary amenorrhoea amongst adolescents. **Conclusion** Menstrual abnormalities are the most common problems of adolescent girls. Specific attention on adolescent gynaecological problem is desirable.

KEYWORDS : Adolescent girl ,Menorrhagia, Gynaecological problem

INTRODUCTION

Adolescents constitute over 21.4 % of the population in India (1). Adolescents have the lowest mortality among the different age groups and have therefore received low priority. Adolescence is the time period between 10 and 19 years of age during which enormous physical and psychological change for young girls occur menstrual disturbances add further disruption during this difficult phase for adolescents and their families. Embarrassment about discussing menstruation, fear of disease, and ignorance about available services may lead to delayed presentation. Many adolescents with menstrual disturbances never present to doctor or gynecologist. Adolescent gynecology is a sub-specialized area of gynecology which has still not been explored optimally. In this study, an attempt has been made to review the gynecological problems of the adolescent population attending the OPD.

AIMS AND OBJECTIVES

1. To evaluate the different gynecological problems in adolescent girls attending the OPD.
2. To assess the etiologies of puberty menorrhagia

METHODS

The present study was a prospective analytic study conducted in the GMC, Kota. All adolescent girls (11–19 years) attending gynecological outpatient department (GOPD) from January 2019 to December 2019 were included in the study. Menstrual history and general examination were noted. Adolescent girls with puberty menorrhagia who required admission for management of anemia in the study period were included in the study. Detailed history was taken regard to demographic profile, marital status, menstrual history, history of bleeding disorders, requirement of blood, blood component transfusion, response to therapy, height, weight, and all investigations (including urine pregnancy test for exclusion of pregnancy, CBC, peripheral smear, blood grouping and typing, USG pelvis, thyroid profile, and coagulation profile) were done.

RESULTS

There were in total 230 adolescent girls attending Gynecology

OPD from January 2019 to December 2019, accounting for 3.55% of the total gynecological patients (6470) attending GOPD of GMC and hospital ,kota, Rajasthan , Maximum 34.78% adolescent girls attending Gynecological OPD had ages in the range of 17 to 19yrs (Table 1).Majority65.21% of adolescent girls were underweight with BMI <19 (Table: 2). Out of 230 girls 30 girls were married (13.04%), hence more prone to STDs and reproductive tract infection (Table 3).Majority 72.17% of adolescent girls suffered from menstrual disorders this was followed by leucorrhoea (15.21%), infections (10.86%), lump abdomen (1.7%) (Table 4).Sixty eight out of 166 (40.96%) adolescent girls with menstrual disorders had menorrhagia,50 out of 166 (30.12%) adolescent girls had dysmenorrhoea, 6 out of 166 (3.6%) adolescent girls had primary amenorrhoea,32 out of 166 (19.27%) adolescent girls had secondary amenorrhoea and 10 out of 166 (6.02%) adolescent girls had complaints of oligomenorrhoea.(Table 5).

On investigating the causes of menorrhagia, in 58 out of 68 girls (85.29%) suffered from Dysfunctional Uterine Bleeding. In 9 out of 68 adolescent girls (13.23%), hypothyroidism was seen. One of them suffered from any bleeding disorder (Table 6). On assessing the degree of anaemia amongst adolescent girls suffering from Menorrhagia, 10 out of 68 girls had Hb <6.5gm%, 19 girls had Hb in the range of 6.5-7.9gm% and 39 girls had Hb in the range of 8-9gm%; 15 out of 68 (22.05%) girls with menorrhagia required blood transfusion along with hormones and haematinics and remaining 53 out of 68 girls (77.94%) required only hormones and haematinics.

Among the 6 adolescent girls with primary amenorrhoea, 3 were had mullerian agenesis and 3 had imperforate hymen, 32/166 (19.27%) adolescent girls presented with secondary amenorrhoea from them 18 had polycystic ovarian disease, 12 had hypothyroidism and 2 suffered from TB abdomen; 15.21% adolescent girls presented with leucorrhoea. Among 25 adolescent girls presented with infections, pelvic inflammatory diseases was found exclusively in 3 married adolescent girls ,16 girls presented with UTI; also 5 have

Bartholin's cyst .One girl found to be VDRL positive (Table 8). From 4 patients with lump abdomen 2 patients with ovarian cyst and 2 with fibroid uterus.

Table:1 Age Group Of Adolescent Girls

Age(year)	Number	Percentage
11-13	25	10.86
13-15	50	21.73
15-17	75	32.60
17-19	80	34.78

Table:2 Body Mass Index

BMI	Number	Percentage
<19	150	65.21
19-25	48	20.86
25-30	22	09.56
>30	10	04.34

Table:3 Marital Status Of Adolescent Girls

Marital status	Number	Percentage
Unmarried	200	86.95
Married	30	13.04

Table: 4 Gynecological problems in adolescent girl

Problem	Number	Percentage
Menstrual problem	166	72.17%
Leucorrhoea	35	15.21%
Infection	25	10.86%
Lump abdomen	4	1.7%

Table: 5 Types Of Menstrual Problems (166)

Menstrual problem	number	Percentage
Menorrhagia	68	40.96
Dysmenorrhoea	50	30.12
Primary amenorrhoea	6	3.6
Secondary amenorrhoea	32	19.27
Oligomenorrhoea	10	6.02

Table 6 Causes of Menorrhagia (68)

DUB	58	85.29
Hypothyroidism	9	13.23
Coagulation disorders	1	1.4

Table 7 Etiology Of Primary Amenorrhoea (06)

Imperforated hymen	3	50
Mullerian agenesis	3	50

Table 8 Etiology Of Secondary Amenorrhoea (32)

PCOD	18	56.25
Hypothyroidism	12	37.5
Tb abdomen	2	6.25

Table 9 Types of infection among adolescent girls (25)

PID	3	12
UTI	16	64
Bartholin cyst	5	20
VDRL positive	1	4

DISCUSSION

Menarche is the hallmark event in the life of adolescent girls. It marks the transition from childhood to puberty. Most common gynecological problem in adolescent girls are the menstrual complaints, and it is the commonest reason for consultation with doctors.

The present study shows that menstrual disorders are the commonest gynecological problem of adolescent age group. In our study 72.17% girls had menstrual problems which is comparable to the study by Goswami Sebanti et al (2). Out of 166,40.96% had menorrhagia, 30.12% had dysmenorrhoea, 3.6% had primary amenorrhoea, 19.27% had secondary amenorrhoea and 6.02% adolescent girls had complaints of oligomenorrhoea. On investigating the causes of

menorrhagia 68 girls 85.29% no cause could be ascertained, i.e. they suffered from Dysfunctional Uterine Bleeding. In13.23%, hypothyroidism was seen as the cause of menorrhagia. One of them suffered from any bleeding disorder (Table 6). On assessing the degree of anaemia amongst adolescent girls suffering from Menorrhagia, 10/68 girls had Hb <6.5gm%, 19 girls had Hb in the range of 6.5-7.9gm% and 39 girls had Hb in the range of 8-9gm%; 15/68 (22.05%) girls with menorrhagia required blood transfusion along with hormones and haematinics and remaining 53/68 girls (77.94%) required only hormones and haematinics. Out of the 58 adolescent girls with dysfunctional uterine bleeding 25.86 % required hospitalization for correction of anemia and management of menorrhagia, which is comparable to the study by Khosla AH et al (3). Anovulatory DUB as the cause in 50–74 % of the patients requiring hospital admission has been reported in various studies (4,5). In our study 18 girls were diagnosed as PCOD. In the study by Goswami Sebanti et al. PCOD was the second-most common cause for menstrual dysfunction (2).Joshi et al. reported that 14 % of adolescent girls had PCOD (6). In this study 1(1.40%) adolescent girls had bleeding disorders. In some other studies, A Shanti Sri et al. showed that 8.6 % girls had thrombocytopenia(7). In study by Prasad et al.35 % of cases were found to be suffering from hemostatic diseases. They concluded that in the evaluation of puberty menorrhagia, we should rule out primary hemostatic disorders (8).

In this study 13.23% girls with puberty menorrhagia had hypothyroidism; this is comparable to the studies by A Shanti Sri et al., and Manaswini et al. (7,9).

In this study among the 68girls 14.70% had Hb <6.5gm%, 27.94% girls had Hb in the range of 6.5-7.9gm% and 57.35% girls had Hb in the range of 8-9gm% comparable to the study by A Shanti Sri et al. analyzed in her study and found that 12.5 % girls had Hb level <5 g%, 29.16 % girls had Hb level between 5 and 7 g%, 27.8 % girls had Hb level of 7–10 g%, and 31.25 % girls had Hb level >10 g (7).

In our study, all girls with DUB were treated medically. First-line treatment in mild cases was tranexamic acid, ethamsylate, and NSAIDS during the menstrual cycle. Hormonal treatment was given if not responding to non-hormonal treatment.Nita K Patel et al. in their comparative study showed that the use of norethisterone for the management of puberty menorrhagia was more effective and better tolerated compared with oral contraceptive pills (10).

In obese girls with PCOD (11-15), weight reduction may lead to resumption to ovulation. Cyclical progesterogen treatment for 10 days every 6 weeks will generally lead to withdrawal bleeding and prevent hyperplasia.The combined oral contraceptive pill is an alternative method of producing regular withdrawal bleed (16).

Anemia is a primary contributor to maternal mortality and is associated with progressive physical deterioration of girls aged 10–19 years. Prevention of anemia in adolescent girls is a matter of concern. Government of India has already taken the initiative through ARSH (adolescent-friendly reproductive and sexual health services). It also includes counseling about common concerns and problems related to menstruation, balanced nutritious diet. Iron–folic acid supplementation to all adolescents is given, considering the need of iron with the onset of menstruation

CONCLUSION

Menstrual problems are the commonest reason for gynecological OPD consultation among adolescent girls. Evaluation of bleeding problems in adolescents is justified.Menorrhagia needs to be evaluated thoroughly

earlier rather than later with the onset so that effective management can be started, and anemia with its consequences can be prevented. Childhood obesity, sedentary lifestyle, lack of exercises, and popularity of junk food in adolescence are responsible for the increasing PCOS incidence in adolescent girls and is challenge for gynecologists treating them.

Health education classes to create awareness regarding adolescent gynecological problems should be conducted regularly in school and colleges. Avoidance of junk food, healthy life style, yoga, etc. must be encouraged in adolescent girls. It must be a part of the school health program.

REFERENCES

- Hanson M, Gluckman P. Evolution: development and timing of puberty. *Trends Endocrinol Metab.* 2006;17(1):712.
- Goswami S, Dutta R, Sengupta S. A profile of adolescent girls with gynaecological problem. *J Obstet Gynaecol India.* 1990;55(4):353-355.
- Khosla AH, Devil L, Goel P, et al. Puberty menorrhagia requiring inpatient admission. *J Nepal Med.* 2010;49(178):112-116.
- Claessens EA, Cowell CA. Acute adolescent menorrhagia. *Am J Obstet Gynecol.* 1981;139:27-80.
- Falcone T, Des Jardins C, Bourque J, et al. Dysfunctional uterine bleeding in adolescents. *J Repro Med.* 1994;39:761-764.
- Joshi S, Chella H, Shrivastava D. Study of puberty menorrhagia in adolescent girls in rural set up. *J South Asian Feder Obstet Gynaec.* 2012;4(2):110-112.
- Shanti SA, Jehan A. Puberty menorrhagia: evaluation and management. *J Evol Med Dent Sci.* 2015;4(30):5198-5203.
- Kisan Prasad HL, Manjunatha HK, Ramaswamy AS, et al. Adolescent menorrhagia: study of the coagulation profile in a tertiary centre in south India. *J Clin Diagn Res.* 2015;5(8):1589-1592.
- Khuntia M, Behera P. Etiology and management of puberty menorrhagia in adolescent girls. *Int J Recent Trends Sci Technol.* 2015;14(2):406-409.
- Patel NK, Patel S, Damor R, et al. Comparison of the efficacy and safety of norethisterone vs combined oral contraceptive pills for the management of puberty menorrhagia. *Int J Basic Clin Pharmacol.* 2012;1(3):191-195.
- Szymanski LM, Kimberly B. Abnormal uterine bleeding. *The John Hopkins manual of gynecology and obstetrics.* 3. Philadelphia: Lippincote Williams and Wilkins; 2002. pp. 417-428.
- Williams LE, Creighton SM. Menstrual disorders in adolescents: review of current practice. *Harm Res Paediatr.* 2012;9(5):493-504.
- Backelijauw PF, Rose SR, Lawson M. Clinical management of menstruation in adolescent females with developmental delay. *The Endocrinologist.* 2004;14(2):87-92.
- Zahan UN, Shampy S, Jahan SA, et al. Incidence of puberty menorrhagia-A case study in Dhaka, Bangladesh. <http://jmscr.igmpublication.org/>.
- Efthimios Deligeoroglou MD. Menstrual disturbances in puberty. *Best Practice Res Clin Obstet Gynecol.* 2010;24(2):157-171.
- Laurie AP, Mitani MD, et al. Adolescent menstrual disorders. *Med Clin North Am.* 2000;84(4):851-868.
- Dangal G. Menstrual disorders in adolescent. *J Nepal Med Assoc.* 2004;43:152-63.
- Hickey M, Balen A. Menstrual disorders in adolescence: investigation and management. *Hum Reprod Update.* 2003;9(5):493-504.