



A STUDY OF CLINICAL PROFILE IN FEMALES PRESENTING WITH POLYCYSTIC OVARIES ON ULTRASOUND

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ABSTRACT

Introduction: - Polycystic ovary syndrome (PCOS) in adolescents is a common endocrine disorder characterized by menstrual irregularities, excess androgens (causing symptoms like hirsutism and acne), and potentially polycystic ovaries⁽¹⁾. early diagnosis and management of PCOS are crucial to mitigate long-term health risks. **Aims And Objectives:** To study the clinical profile in females presenting with polycystic ovaries on ultrasound. **Materials And Methods:** The present study was carried out in the department of obstetrics and gynecology at Kamineni institute of medical sciences, Narketpally from April 2023 to may 2025. **Results:-** 3 age groups that are young adolescents who are unmarried, married women with primary infertility, and married women with secondary infertility, all of them presenting with polycystic ovaries on ultrasound was taken into consideration. It was observed that these individual groups concerns were different in spite of having PCO morphology on ultrasound and their concerns were addressed as per the individual. Compliance to treatment in the adolescent age group was 12 out of 20, in the Primary infertility group was 7 out of 12 and the Secondary infertility group was 7 out of 10. Response to treatment or clinical improvement was noted in 8/20 in the first group, 7/12 in the second group and 4/7 in the third group.

KEYWORDS : polycystic ovaries, adolescents, primary infertility, secondary infertility

INTRODUCTION:

Polycystic ovary syndrome (PCOS) in adolescents is a common endocrine disorder characterized by menstrual irregularities, excess androgens (causing symptoms like hirsutism and acne), and potentially polycystic ovaries⁽¹⁾. Diagnosing PCOS in adolescents can be challenging due to overlapping symptoms with normal puberty⁽²⁾. However, early diagnosis and management of PCOS are crucial to mitigate long-term health risks. It is the most common endocrine disorder among females of reproductive age worldwide⁽³⁾.

Delayed diagnosis can contribute to complications, making timely lifestyle interventions crucial for symptom management and improving quality of life⁽⁴⁾. Moreover, as a chronic metabolic disorder, PCOS requires a detailed and individualized approach to management, focusing on both reproductive and metabolic health⁽⁵⁾.

Polycystic ovaries on ultrasound is taken as a criteria on which three different age groups were taken as subjects and their clinical profile was reviewed. This course explores the clinical course in these subjects, that includes Adolescents with PCO (polycystic ovaries), women in the reproductive age group with primary infertility with PCO and women in the reproductive age group with secondary infertility with PCO. All the above mentioned groups had polycystic ovaries in ultrasonography.

AIMS AND OBJECTIVES :

To study the clinical profile in females presenting with polycystic ovaries on ultrasound.

Inclusion Criteria :

- 1) Young women, unmarried with complaints of irregular cycles with polycystic ovaries on ultrasound.
- 2) Married women in their late 20's and early 30's with Primary Infertility with polycystic ovaries on ultrasound
- 3) Women who have completed their family with polycystic ovaries on ultrasound

Exclusion Criteria:

- 1) Women Not Willing To Participate In The Study

MATERIALS AND METHODS:

The present study was carried out in the department of obstetrics and gynecology at Kamineni institute of medical

sciences, Narketpally from April 2023 to may 2025. This is a prospective study which includes 3 age groups that are young adolescents who are unmarried, married women with primary infertility, and married women with secondary infertility, all of them presenting with polycystic ovaries on ultrasound. Total sample size was 42, they were evaluated on both outpatient and inpatient basis and their clinical profile was evaluated as to how these category of women presented to us with respect to symptoms and response to treatment.

RESULTS:

Table 1. Clinical Profile In Patients With PCO

Age group	Number of subjects (n=42)	Percentage(%)
Adolescent with PCO	20	47.6%
Primary infertility with PCO	12	28.5%
Secondary infertility with PCO	10	23.8%

Table 2. Clinical Profile In Adolescents With PCO

Clinical Profile	Number of subjects (2=20)	Percentage
Menstrual irregularities	8	40%
Acne	6	30%
Hirsutism	3	15%
Alopecia	3	15%
Obesity	6	40%
No symptoms /Incidental findings	4	20%
Compliance to treatment	12	16%
Clinical improvement	8	40%

Table 3. Clinical Profile In Reproductive Age Group With Primary Infertility With PCO

Clinical Profile	Number of subjects (n=12)	Percentage
Menstrual irregularities	7	58%
Acne	6	50%
Hirsutism	5	41%
alopecia	5	20%
Obesity	7	58%
No symptoms /incidental finding	5	20%
Compliance to treatment	7	58%
Clinical improvement	5	20%

Table 4. Clinical Profile In Reproductive Age With Secondary Infertility With PCO

Clinical Profile	Number Of Subjects (n=10)	Percentage
Menstrual Irregularities	6	60%
ACNE	3	30%
Hirsutism	3	30%
Alopecia	4	40%
Obesity	5	50%
No symptoms/Incidental Finding	3	30%
Compliance to treatment	7	70%
Clinical Improvement	4	40%

DISCUSSION:

This study was conducted over a period of approximately three years at a tertiary care center. In the first group that includes the adolescents, most of their concerns were Irregular cycles and Acne, but this cannot be solely attributed to PCO morphology of ovaries and can be due to immature HPO axis also. Other clinical presentations included Acne, Hirsutism, Alopecia, Obesity and incidental finding of Polycystic ovaries on Ultrasound. In the second group, all of them presented to us with Primary infertility with Polycystic ovaries on Ultrasound with clinical presentation of Menstrual irregularities, Obesity, Acne, Hirsutism, Alopecia and obesity. Some of the patients presented with more than one clinical manifestation like Primary infertility with Obesity and Alopecia with PCO. In the third group that included subjects with Secondary infertility, most of them presented clinically with menstrual irregularities followed by Obesity. The other clinical presentations were Alopecia, Hirsutism and Acne.

It was observed that these individual groups concerns were different in spite of having PCO morphology on ultrasound and their concerns were addressed as per the individual. Compliance to treatment in the adolescent age group was 12 out of 20, in the Primary infertility group was 7 out of 12 and the Secondary infertility group was 7 out of 10. Response to treatment or clinical improvement was noted in 8/20 in the first group, 7/12 in the second group and 4/7 in the third group.

CONCLUSIONS

It is concluded from this study that PCOS plays a major role in Menstrual irregularities in many Adolescent and Reproductive age group females compounded by obesity and presents with varied clinical profile. So, it is important to spread awareness and increase knowledge among the general population especially in adolescent age group to increase its timely diagnosis and management to prevent complications.

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