

POLYCYSTIC OVARIAN SYNDROME (PCOS)

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OBJECTIVES

What is PCOS

Causes and Risk factors

Diagnostic Criteria

Lifestyle Modifications

Medical Management and Screening



WHAT IS PCOS

- Hormonal and metabolic disorder effecting women of reproductive age.
- 5.2% incident rate
 - 70% of women with PCOS are undiagnosed
 - 4-5 folds higher than UK.
- Increases risk of type II diabetes, cardiovascular disease, endometrial cancer and leading cause of infertility.

CAUSES OF PCOS

Genetic Factors:

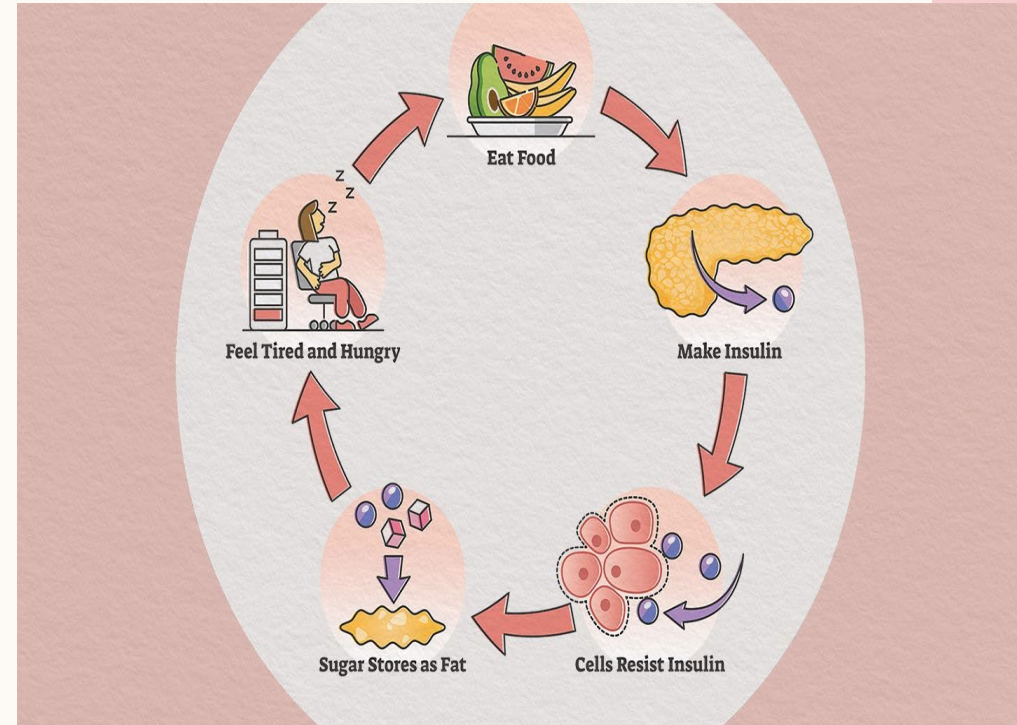
- PCOS tends to run in families, suggesting a genetic component.

Hormonal Imbalances:

- **Insulin Resistance:** Higher insulin levels in blood leads to excess androgen production
- **Excess Androgen:** Prevents ovulation causing irregular cycles and other physical symptoms

Inflammation:

- Low-grade inflammation is common in women with PCOS.



RISK FACTORS FOR PCOS

Family History:

- Mother or sister with PCOS increases risk

Obesity:

- Increase weight = hormonal imbalance and insulin resistance

Lifestyle Factors:

- Poor diet, sedentary lifestyle= increased symptoms

Environmental Factors:

- Not as well understood

Metabolic syndrome

- Routine labs- Lipids, A1C, hypertension screening

Diagnosis

- **Rotterdam Criteria:**

- **Hyperandrogenism:** Clinical signs (e.g., hirsutism, acne) or biochemical evidence (elevated levels of androgens in blood tests).
- **Ovulatory Dysfunction:** Irregular or absent menstrual periods.
 - **First Year Post-Menarche:** Irregular cycles are normal.
 - **1 to <3 Years Post-Menarche:** Cycles <21 or >45 days are considered irregular.
 - **>3 Years Post-Menarche to Perimenopause:** Cycles <21 or >35 days or <8 cycles per year are considered irregular.
 - **>1 Year Post-Menarche:** Any cycle >90 days is considered irregular.
 - **Primary Amenorrhea:** No menstruation by age 15 or >3 years post-thelarche (breast development).
- **Polycystic Ovaries:** Presence of 12 or more follicles in each ovary as seen on an ultrasound or increased ovarian volume.

LIFE STYLE MODIFICATIONS

- ❖ **Diet**
- ❖ **Exercise**
- ❖ **Psychosocial Counseling**
 - Increased risk of depression and anxiety
 - Increased psychosexual dysfunction
 - Eating disorders
- ❖ **Laser Hair Removal**
- ❖ **Sleep Apnea Screening**



MEDICAL MANAGEMENT

Hormonal Contraception

- Regulates cycles
- Protects the endometrium

Metformin

- Improves insulin sensitivity- lower blood insulin

GLP1

- Growing Research

Inositol

Anti-androgen medication

Antidepressant/ Antianxiety



MYTHS OR FACTS OF PCOS

FACT: Not all women with PCOS have cysts on their ovaries, and having cysts does not necessarily mean you

You Must Have Polycystic Ovaries to Have PCOS?

have PCOS.

FACT: PCOS is quite common, affecting about 1 in 10 women of reproductive age worldwide.

PCOS is a Rare Condition

FACT: While PCOS can cause infertility, many women with PCOS can still conceive naturally or with the help of fertility treatments.

You Can't Get Pregnant if You Have PCOS

FACT: The exact cause of PCOS is unknown, but it is believed to involve a combination of genetic and environmental factors.

PCOS is caused by something the patient has done.

FACT: There is no cure for PCOS, but losing weight can help manage symptoms and improve insulin sensitivity. However, weight loss alone will not eliminate PCOS.

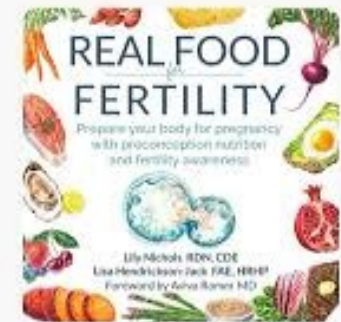
Losing Weight Will Cure PCOS

PATIENT RESOURCES

- AskPCOS app
- Real Foods for Fertility By: Lily Nichols RDN,CDE
- Aviva Roma MD podcast
- <https://www.pcosaa.org>



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QUESTIONS?

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