

## Herbal Medicine in the Treatment of Polycystic Ovary Syndrome

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### Abstract

Polycystic Ovary Syndrome (PCOS) is a hormonal disorder that affects between 5 - 10% of women who are of reproductive age. The most common symptoms of PCOS are obesity/difficulty losing weight, acne, amenorrhea (absence of menstrual cycles), irregular menstrual cycles, hirsutism (increased growth of corporal hair), insulin resistance, and high cholesterol. One of the treatments for PCOS is the use of Metformin (which is a drug prescribed to type 2 diabetics) which can help treat the insulin resistance associated with PCOS. However many women who suffer from PCOS opt to use alternative medicine in conjunction with traditional medicine to improve their condition. There are some herbs that are very helpful in treating PCOS. In this review, we focus on the role of herbal medicine in the treatment of PCOS.

**Keywords:** Herbal Medicine, Alternative Medicine, Polycystic Ovary Syndrome



## Introduction

Five to ten percent of women of childbearing age have polycystic ovary syndrome, also known as PCOS. It can occur in girls as young as 11 years old. In approximately 75% of cases where young women have problems with menstruation due to late puberty, PCOS is often diagnosed. Irregular, infrequent or absent periods, or periods with heavy flow and unbearable pain, are all variations of the problem. Sometimes PCOS presents itself much later in life when a woman of childbearing age stops using contraceptive pills and finds herself having very long cycles or no cycles at all, and is unable to conceive [1].

## Symptoms of PCOS

Polycystic ovary syndrome is a complex syndrome that includes problems with a woman's menstrual cycle (length, intensity), her ability to have children, her hormone levels, and her appearance (excessive hair growth on the chin and cheeks, acne, weight gain, baldness).

Women with PCOS often have ovaries that contain many small cysts, of a size seldom exceeding 0.5 cm. The symptoms of PCOS can vary from woman to woman, with some women suffering more than others. Symptoms can include any of the following:

- Infertility due to lack of ovulation (PCOS is the most common cause of infertility); Anxiety; Depression
- Menstrual irregularities: irregular or absent menses;
- Heavy menstruation (especially if periods are late);

- Painful menstruation or pain during ovulation, bleeding in the middle of a cycle;
- Pelvic pain (distention, heaviness, stabbing pain);
- Physical changes (often occurring at a later stage but not always): increased hair growth on the face, chest, stomach, back, thumbs or toes, weight gain around the waist, an inability to lose weight despite physical exercise, acne, dandruff, thinning hair (looking like male baldness);
- Multiple cysts on the ovaries diagnosed by ultrasound [3-4]

## Conventional Treatment for PCOS

- **Birth control pills** – are sometimes recommended for women who don't want to get pregnant (this approach does not really treat PCOS; it merely masks the symptoms and may facilitate the need for fertility treatments if pregnancy later becomes a goal).
- **Diabetes medications** – The medicine metformin (Glucophage) is used to treat Type 2 diabetes. It has also been found to help with PCOS symptoms, though it isn't approved for this use.
- **Fertility medications** (clomifene-clomid, serophene, injections of Gonadotropins) for women trying to get pregnant. Lack of ovulation is usually the reason for fertility problems in women with PCOS (3-4).

## What causes PCOS?

PCOS is caused by hormonal imbalances. An imbalance in a number of different hormones can lead to symptoms of polycystic ovarian syndrome. Imbalances in the pituitary, ovaries, pancreatic and adrenal hormones have

all been linked to PCOS. Insulin resistance (a lack of responsiveness to insulin in the cells of your body) is an important factor in the development of PCOS. Hormone testing should be done to identify your personal imbalances [2]. PCOS also has a genetic component.

### **Herbal treatment**

The aim of herbal treatment is to enable the body to readjust the excess levels of hormones to more 'normal' levels so that the menstrual cycle can occur in a 'normal' manner. In my experience, this often occurs very successfully, although the further the body is from 'normal', the longer it may take, and the less the likelihood of success eg women with irregular periods achieve a 28-day cycle much faster and more successfully than women who are completely without periods [5-13].

### **Evening Primrose**

Evening primrose also treats hormonal imbalances that prevent women with PCOS from getting pregnant. The Baby Hopes website says that taking evening primrose oil, an extract of this herb, balances estrogen and progesterone levels in the body, which can prove helpful because women with PCOS tend to have higher estrogen levels. In addition, evening primrose oil contains fatty acids that not only contribute toward balanced hormones but also encourage your body to create a healthy environment for pregnancy by triggering cervical mucus production [14, 15].

### **Saw Palmetto**

Saw palmetto (*Serenoa repens*) is a very effective hormone balancer for PCOS. The

extracts made from this plant have been successfully used in regulating estrogen levels in the female body. The overproduction of this hormone is one of the symptoms most frequently associated with PCOS. In addition to restoring the normal balance of estrogen–testosterone in the blood, this herbal remedy also facilitates weight loss and increases libido [14, 15].

### **Maitake Mushroom**

PCOS is also associated with insulin resistance. The extract of this mushroom is known to be able to reduce this insulin resistance, helping to maintain blood sugar at a healthy level and having other beneficial effects, like restoring the healthy metabolism of glucose and lipids, and promoting healthy body weight as well [5, 14, 15].

### **White Peony**

Used in the form of tea, this plant is used for regulating the levels of another hormone essential for fertility, progesterone. Women suffering from PCOS usually have low progesterone levels, a problem successfully remedied if the patient consumes peony tea on a daily basis. Additional benefits of this supplement include the regulation of estrogen and prolactin secretion, also important for conception [5, 14, 15].

### **Dandelion Root**

Known as an excellent tonic for the liver, dandelion root extract reduces PCOS symptoms by helping the body eliminate the excess hormones accumulated in the liver. It also removes the toxins from the body, thus helping women suffering from menstrual

disorders and fertility problems [5, 14, 15].

### Cinnamon

Cinnamon is considered as a very effective home remedy for PCOS and its symptoms. It can help normalize the monthly menstrual cycle and can also curb sudden hunger pangs owing to its high fiber content. Widely used as a spice, cinnamon has numerous beneficial effects on the body, the increase of insulin sensitivity being the quality that makes it useful in the treatment of PCOS. It helps control blood sugar levels and facilitates weight loss as well [5, 14, 15].

### Soy Isoflavones

Women with PCOS often suffer from

infertility because of anovulation. Soy isoflavones have effects similar to Clomid, a prescription drug widely used for treating ovulation disorders successfully [5, 14, 15].

### Chasteberry

Chasteberry (*Vitex agnus-castus*) is another herb used for PCOS. Chasteberry inhibits prolactin synthesis and raises progesterone levels restoring balance to two important hormones involved in the menstrual cycle. Low progesterone levels are very common during puberty and are known to contribute to the formation of ovarian cysts [5, 14, 15].

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