

PCOS (Polycystic Ovary Syndrome)



Polycystic Ovary Syndrome (PCOS) is a common condition associated with subfertility. The symptoms that many women describe include irregular periods; increased hair growth; acne; obesity; and problems getting pregnant. Not all women with PCOS experience all these symptoms and problems may change over time. In many women these problems tend to worsen when they gain weight.

Normal ovaries

Ovaries are each about the size of an almond. From puberty, the ovaries begin releasing hormones and eggs. Every month a number of follicles, often as many as ten to twenty, begin to grow. One of these follicles will become the 'dominant' follicle and will subsequently release the egg at ovulation. The other follicles simply regress (die).

Polycystic ovaries

Polycystic ovaries are slightly enlarged and have a ring of small cysts lying just beneath the surface of each ovary. On an ultrasound scan there may be 10 or more, ranging in size from 2mm to 1cm. In PCOS the dominant follicle does not develop as readily, and many of the small follicles produce differing amounts of hormones. Blood tests often reveal changes, with higher levels of testosterone and LH, often in conjunction with a higher LH to FSH ratio, than women having normal cycles. These levels may vary considerably and are best assessed early in the menstrual cycle (if there is one). Often a change in blood glucose and insulin levels occurs.

Treatment of PCOS

The advice women receive regarding treatment depends upon the main problem they are experiencing.

Irregular Periods are common and can be treated successfully with the contraceptive pill. This treatment is obviously only useful for those women who do not wish to become pregnant. The Pill will produce a regular cycle as well as protecting against endometrial disturbances which otherwise result from the confusing hormonal signals the uterus is receiving. Those women who have trouble taking the Pill may benefit from taking synthetic hormones e.g. Provera for around 10 days of each month.

Skin Problems including hair growth and acne problems mainly relate to the high levels of testosterone. The treatment of these is generally to use an anti-androgen such as spironolactone or cyproterone acetate. Oral contraception, like Marvelon or Diane 35-ED, is also effective in milder cases.

Pregnancy can be difficult to achieve due to the erratic ovulation associated with PCOS. Weight loss has a very beneficial effect on balancing hormones and restoring regular periods in many obese women. In many cases the best treatment is simply exercise and a change of diet. As most of these women have 'insulin resistance' there is usually a good response to insulin sensitisers such as metformin, a drug often used in diabetes. Other ovulation inducing drugs such as Clomiphene are also often used. For those unresponsive to Clomiphene, injectable drugs (FSH) can be used but these require specialist facilities and close monitoring of the response to avoid severe side effects and multiple pregnancies. In very difficult situations IVF may be necessary.