

Premenstrual syndrome (PMS)

Premenstrual syndrome, or PMS, refers to the range of physical and emotional symptoms that many women experience in the lead up to a period (menstruation). Symptoms resolve once the woman's period begins and there is usually at least one symptom-free week before the symptoms return.

It is thought that most menstruating women have premenstrual symptoms, ranging from relatively mild (in 75 per cent of women) to severe (in 20 to 30 per cent of women). For eight per cent of women with severe symptoms, PMS is associated with reduced quality of life.

PMS is a complex condition that includes physical and emotional symptoms. The latest research points to changes in brain chemicals (neurotransmitters) in the time after ovulation and before menstruation. Life stressors and a genetic link may also play a role. Although the cause isn't conclusively known, PMS can be managed with medication and other strategies.

Symptoms of PMS

PMS differs from one woman to the next. The wide range of PMS symptoms can include:

- abdominal bloating, fluid retention
- acne
- anxiety, confusion
- clumsiness
- depression and lowered mood, which may include suicidal thoughts
- difficulties in concentration, memory lapses
- digestive upsets, including constipation and diarrhoea
- drop in self-esteem and confidence
- drop in sexual desire, or (occasionally) an increase
- feelings of loneliness and paranoia
- food cravings
- headache and migraine
- hot flushes or sweats
- increased appetite
- increased sensitivity to sounds, light and touch
- irritability, including angry outbursts
- mood swings, weepiness
- sleep changes, including insomnia or excessive sleepiness
- swollen and tender breasts.

PMS and the menstrual cycle

The menstrual cycle is controlled by a combination of hormones from the ovaries and parts of the brain. A woman's ovaries contain many eggs (ova). Every cycle, one egg matures and is released – this is called ovulation.

After ovulation, oestrogen and progesterone hormones are released in the premenstrual phase of the cycle to stimulate the lining of the uterus to prepare for pregnancy. If a pregnancy doesn't occur, the hormones decline, the period begins and the lining is shed.

PMS ceases at menopause.

Causes of PMS

Incorrect theories about the causes of PMS have included an oestrogen excess, progestogen deficiency, vitamin B6 deficiency, abnormal glucose metabolism and electrolyte imbalances. There are new studies providing a better understanding of why PMS occurs, but the causes of it are still unknown. If you want to find out more about this, you should consult your doctor.

Risk factors for PMS include weight, stress and smoking. Women with a BMI higher than 30 are three times more likely to have PMS than those with a normal weight. Smokers are twice as likely to have severe PMS symptoms.

Premenstrual dysphoric disorder (PMDD)

Between two and five per cent of menstruating women suffer from seriously debilitating PMS, which is sometimes known as premenstrual dysphoric disorder (PMDD). The symptoms may have a serious impact on a woman's mental health state and can be so severe that an affected woman is unable to carry out her normal activities.

Diagnosis of PMS

There are no specific diagnostic tests for PMS, as hormone levels are usually within the normal range. Diagnosis relies on an examination of the woman's medical history and description of the symptoms.

In most cases, you can identify if you have PMS by keeping a symptoms diary. Include the details of your menstrual cycle – for example, the first and last days of your menstrual period – and any ovulation symptoms. Keep this diary for at least two menstrual cycles. If the symptoms don't resolve at menstruation, other causes may be suspected and would need to be investigated.

If you are not sure whether you are suffering from PMS, or need help understanding your symptoms, you should visit your doctor.

PMS management

While there is no cure for PMS, the symptoms can be successfully managed with lifestyle changes, dietary modifications, supplements, hormone treatments and other medications. You may have to experiment to find the balance of treatments that works best for you.

It's a good idea to continue your PMS diary and record any symptoms while you try out these therapies and treatments. Be sure to consult with your doctor or healthcare professional during this trial period.

Lifestyle changes and PMS

Recommended lifestyle changes include:

- Exercise regularly, at least three times a week – try to exercise daily as the increased endorphins will help.
- Don't smoke.
- Cut back on caffeine and alcohol in the two weeks before menstruation.
- Make sure you get enough sleep.
- Manage your stress in whatever way works for you – for example, counselling, tai chi or meditation, walking or gardening.

Dietary changes for PMS

Women experiencing PMS symptoms may crave high-fat and high-sugar foods like chocolate, biscuits and ice cream, and may consequently increase their food intake significantly.

You can manage your weight and help reduce your PMS symptoms by making a few dietary changes. You might like to try:

- eating smaller meals more often – for example, have six 'mini-meals' instead of three main meals
- reducing your intake of salty foods
- including more fresh fruits and vegetables, and wholegrain foods in your daily diet

- boosting your dairy food intake, but switching to reduced fat or non-fat versions
- not keeping high-fat and high-sugar foods in the house
- making sure you always have tasty and healthy snack alternatives on hand
- recording your food choices in your PMS diary – charting your food intake may help you become more aware of high-fat and high-sugar snacking.

Supplements for PMS

Check with your doctor before taking any type of supplement, including herbal supplements, and make sure that you follow instructions on dosage. Complementary therapies should be viewed as a medicine and should be treated with the same respect. Therapies that can help reduce PMS symptoms include calcium and vitex castus agnus.

Other dietary and vitamin supplements, such as evening primrose oil, ginkgo biloba extract, black cohosh, dandelion and essential fatty acids, have not been shown to have any effect on symptoms of PMS.

Medication and hormone treatments for PMS

A range of medications and hormone treatments are available to help you manage your symptoms. There are different types available.

Treatments that have been proven to relieve symptoms include:

- SSRIs (selective serotonin reuptake inhibitors) fluoxetine, sertraline, paroxetine and escitalopiam – these medications are mood stabilisers and antidepressants, which can improve PMS symptoms significantly. They may be prescribed just in the menstrual phase and be as effectively as taken continuously.
- alprazolam – considered a second-line treatment for PMS. Due to its addictive potential, it is used only in the last two weeks of the menstrual cycle
- agents that suppress ovulation – including GnRH analogues and danazol
- oral contraceptive pill containing drospirenone and ethinyl oestradiol – sold in Australia as Yaz.

Treatments that might improve symptoms include:

- other oral contraceptive pills
- spironolactone, which has not been shown to be consistently of any advantage, but may help if there is fluid retention.

Treatments that have not been proven to relieve symptoms include progesterone and progestin (such as intrauterine devices (IUD), intrauterine devices (Implanon) and Depo-Provera (injection)). These have not been found to be any better than a placebo (dummy pill) for relieving PMS symptoms.

Complementary medicine and PMS

Many women feel they benefit from a variety of natural therapies, such as cognitive behavioural therapy, which can use relaxation techniques to help relieve symptoms, and complementary therapies such as vitex castus agnus.

If you would like to use complementary therapies, it is important to seek advice from a qualified professional and to let your doctor know about any herbal or complementary therapies you are using. Many of these treatments can have side effects, so make sure you are well informed about them before you and your doctor decide on your treatment.

Where to get help

- Your doctor
- Women's health clinic
- Family Planning Victoria Tel. 1800 013 952 or (03) 9257 0100
- Women's Health Information Centre (WHIC) Tel. (03) 8345 3045 or 1800 442 007

Things to remember

- Premenstrual syndrome (PMS) refers to the range of physical and emotional symptoms that some women experience in the lead up to menstruation.
- Symptoms usually stop during or at the beginning of the menstrual period. There is at least one symptom-free week before symptoms start returning.
- Keep a detailed diary for at least two menstrual cycles to work out if your symptoms are caused by PMS.

This page has been produced in consultation with, and approved by:

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