

Pre-eclampsia:

what you need to know



Royal College of
Obstetricians and
Gynaecologists

Setting standards to improve women's health

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What is pre-eclampsia?

Pre-eclampsia means 'before eclampsia'. It is a condition that only occurs in pregnancy. In some cases, pre-eclampsia may progress to a serious condition known as eclampsia.

Pre-eclampsia is a combination of:

- raised blood pressure (hypertension)
- protein in your urine on testing (proteinuria).

Swelling of the ankles is common in pregnancy and is usually nothing to worry about, but it can be a feature of pre-eclampsia.

Mild pre-eclampsia does not have any symptoms. It is usually picked up at your routine antenatal appointments.

The exact cause of pre-eclampsia is not understood.

More serious symptoms may develop as pre-eclampsia progresses. Around one in 200 (0.5%) women develops severe pre-eclampsia. The symptoms tend to occur later on in pregnancy but can occur for the first time after birth.

The symptoms of severe pre-eclampsia include:

- headaches
- blurred or altered vision
- feeling very unwell
- abdominal pain
- nausea or vomiting
- confusion
- shortness of breath.

These symptoms are serious and you should seek medical help immediately. If in doubt, contact the delivery unit at your local hospital.

How does pre-eclampsia affect my baby?

Pre-eclampsia affects the development of the placenta and can affect the baby's growth in the womb. There may also be a reduced amount of water (amniotic fluid) around the baby in the womb.

If the placenta is severely affected, the baby can become distressed or even die. Monitoring aims to pick up those babies who are most at risk.

Who is at risk of getting pre-eclampsia?

It is hard to predict who will develop pre-eclampsia in pregnancy. You are at greater risk if:

- this is your first pregnancy
- this is your first pregnancy with a new partner
- you are aged 40 or over
- your mother or sister had pre-eclampsia during pregnancy
- you had pre-eclampsia in a previous pregnancy
- you have a body mass index (BMI) of 35 or more (you weigh 90 kg or more)
- you are expecting more than one baby
- you have a medical problem such as high blood pressure, kidney problems and/or diabetes.
- you are pregnant from egg (oocyte) donation.

How is pre-eclampsia monitored?

With mild pre-eclampsia you will have more regular antenatal checks.

If the pre-eclampsia is getting worse or is severe, you may be monitored in the hospital. This is in case you need treatment and/or the baby needs to be delivered.

Tests include:

- Regular blood pressure checks. If the pre-eclampsia is severe, this may be as often as every 15 minutes but more commonly is every 4 hours.
- Urine test. If the pre-eclampsia is severe, you will have a catheter in your bladder to measure how much urine your kidneys are making.
- Blood tests to check your blood count, clotting, liver and kidney function.

- Ultrasound scans to measure the baby's growth and wellbeing.
- When you are in labour the baby's heart rate will be monitored continuously.

What is the treatment for severe pre-eclampsia?

If you develop severe pre-eclampsia, you will be cared for by an experienced midwife, senior obstetrician and anaesthetist.

Treatment includes bed rest and medicines (either tablets or a drip) to lower and control your blood pressure and to prevent complications such as convulsions or fits. Convulsions are an unusual complication but, if they occur, the condition is termed eclampsia. These medicines will not harm the baby.

The only way to prevent severe pre-eclampsia from developing into eclampsia (convulsions) is to deliver the baby in a planned and prompt way. Each pregnancy is unique and the exact timing will depend upon your own particular situation. This should be discussed with you.

There may be enough time to start (induce) labour. In some cases, delivery will need to be by caesarean section.

What is eclampsia?

Eclampsia is a life-threatening condition. The main problem is fits (seizures/convulsions). These are like epileptic fits.

Eclampsia occurs in one in 2000 pregnancies (0.05%).

Other complications include:

- kidney failure
- liver failure
- lung failure
- a combination of the above (this is known as HELLP syndrome). This is a combined liver and blood clotting disorder.
 - ◆ [H] stands for 'haemolysis' (breaking down of the red blood cells)
 - ◆ [EL] stands for 'elevated liver enzymes' in the blood (meaning damage to the liver)
 - ◆ [LP] stands for 'low blood levels of platelets' (platelets are specialised cells which are necessary for blood clotting).

When is the best time for the baby to be born?

Your baby may need to be delivered early (prematurely) if the symptoms are getting worse and affecting you and/or your baby. A course of two steroid injections can help mature the baby's lungs and reduce the chance of breathing difficulties if the baby is premature.

If the pre-eclampsia is less severe, you may be monitored to check that you can safely continue the pregnancy until labour starts naturally or is induced.

What happens after the birth?

You will continue to be monitored closely. Up to half of the women who develop eclampsia do so after the delivery. You may need to stay in hospital for several days. You may need to continue taking medicine to lower your blood pressure.

If your blood pressure is still high six weeks after the birth, or there is still protein in your urine on testing, you may be referred to a specialist.

If you have had severe pre-eclampsia or eclampsia, you may have a postnatal appointment with your obstetrician to discuss the condition and what happened. Your obstetrician will assess if there are any risk factors and preventative treatment before another pregnancy.

It is important to attend for routine antenatal appointments in all future pregnancies, where these checks are done.

A useful organisation

Action on Pre-Eclampsia (APEC)

84-88 Pinner Road

Harrow, Middlesex HA1 4HZ

Helpline: 0208 427 4217 (Mon-Fri: 10am to 1pm)

Email: enquiries@apec.org.uk

Website: www.apec.org.uk

Sources and acknowledgements

This information is based on the Royal College of Obstetricians and Gynaecologists (RCOG) guideline on *The Management of Severe Pre-eclampsia/Eclampsia* (which was published in March 2006 and is due to be reviewed in January 2009). You can find it online at:

www.rcog.org.uk/resources/Public/pdf/management_pre_eclampsia_mar06.pdf

(Page 3 paragraph 3 line 6 '*A level of 30 mg/nmol appears to be equivalent to 0.3 g/24 hours.*' has been amended to '*A level of 0.03 g/mmol appears to be equivalent to 0.3 g/24 hours.*')

Clinical guidelines are intended to improve care for patients. They are drawn up by teams of medical professionals and consumer representatives who look at the best research evidence available and make recommendations based on this evidence.

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A final note

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