Department of Dermatology

Methotrexate for the treatment of psoriasis and eczema in children

Information for parents and carers
Why does my child need methotrexate?

Children and young people are sometimes given methotrexate to treat psoriasis and eczema. Methotrexate is also used to treat other conditions (not just skin conditions) and has been used as a treatment in children’s dermatology for many years with good results. Your child will be closely monitored whilst taking methotrexate, as it can cause side effects which may mean the medication needs to be stopped or the dose changed.

Methotrexate is a drug used outside of its normal licence (for chemotherapy at higher doses) for children under 16 years of age with inflammatory disease. For more information, please ask for our leaflet on unlicensed and off-label medicines.

This leaflet contains some information which will help you to understand the reasons why your child needs to take methotrexate. It will also give you information about the extra precautions that they need to take. The information in this leaflet should be read together with any manufacturer’s information leaflet that comes with your child’s medicine.

What is methotrexate?

Methotrexate belongs to a series of drugs known as immunosuppressants. The aim of methotrexate is to reduce the activity of your child’s immune system, as this can make psoriasis and eczema a problem. Immunosuppressants work by lowering their body’s immune response. However, this means that their body will not fight off “foreign” substances, such as antigens (which cause disease), as well as it should.
When does my child need to take the methotrexate?

Methotrexate is always taken once a week, as a single dose on the same day each week. Your child’s doctor will tell you when they need to take their methotrexate. They will also be given 5mg of a vitamin called folic acid (if your child is over 2 years), to be taken the day after they take their weekly methotrexate. Folic acid can help protect your child’s body from the methotrexate side effects. Please read the manufacturer’s information leaflet for more information on folic acid.

How can methotrexate be given?

• **Tablets or liquid.** Only **2.5mg** tablets are used. Please check the label on the packaging carefully, to make sure you have the correct dose. Try not to touch the tablets, as you may pass the medication on to other people who should not take it and are not being monitored. The medication must be stored at room temperature and safely out of the reach of children.

• **Injection.** This is a subcutaneous injection (an injection just under the skin). You or your child (depending on their age) can be taught how to do this at home. Your pharmacist will tell you how to store the syringes. They must be kept safely out of the reach of children.

What dose will be given?

Your child will be treated with a low dose for psoriasis or eczema. You may meet other people who have been given methotrexate to treat cancer, but this is in much higher doses. Your child is being treated for an inflammatory condition, not cancer, and so their dose will be much lower. Your child’s doctor will prescribe the appropriate dose, based on your child’s body size and how bad their psoriasis or eczema is. They may adjust the dose, depending on their response to the treatment.
How long does it take to work?

Methotrexate does not work immediately. It may take 3-6 weeks or more before you notice any difference to your child’s skin. Your child’s doctor will gradually increase the weekly dose until they find the best level for treatment.

Routine blood monitoring

Regular blood tests are an important part of methotrexate therapy. Your child will have a blood test before they start treatment. The reasons for the blood tests are:

• to make sure that they do not have any side effects from the drug
• to monitor for possible blood abnormalities or side effects
• to allow the doctor to decide if their dose or medication needs to be changed.

Your child’s blood will also be tested to help monitor their response to treatment. Methotrexate can affect the cells in the blood and how their liver and kidneys work. This will be monitored as part of your child’s regular blood checks. Their doctor or nurse specialist will tell you how often their bloods need to be checked. This will vary depending on the test results and their response to treatment.
How might my child feel whilst they are taking methotrexate?

Side effects and risks
As with any medication, there are some side effects from taking methotrexate. However, many children have no side effects at all. If your child experiences anything that you feel may be a side effect of the methotrexate, please let their doctor know. You should not stop the methotrexate treatment unless you have been told to do so.

A few children feel sick after taking the medicine. This is usually less of a problem if the dose is given at bedtime. There are some medicines which can help stop the feeling of sickness. You can talk to your child’s doctor about this.

Less common side effects can be:
- diarrhoea
- stomach pains
- mouth ulcers
- pain when doing a ‘wee’
- rashes or skin irritation around the injection site – if this develops please contact your child’s doctor or GP as soon as possible.
- bone marrow suppression. Blood cells are made in the bone marrow; methotrexate can affect how many blood cells are made. The blood tests help us to monitor this.
- liver problems. However, we look closely for these side effects with regular blood checks.
- lung inflammation (pneumonitis). If your child develops a cough that won’t go away or becomes breathless, contact their GP or out of hours service immediately.
- your child may pick up infections more easily. If they develop an infection, sore throat, fever, chills or aches, contact your child’s GP for advice.

If your child becomes very unwell or you are very worried about them, please contact or visit your nearest emergency department.
Your child may need to use a high factor sunscreen as their skin may burn more easily in the sun, even if it is not warm.

Your child may experience some side effects before they feel any benefits from the methotrexate. Do not stop giving them the medicine, but please discuss any worries with their nurse specialist or doctor.

You must tell your child’s dermatology team immediately if they develop any of the following symptoms after taking methotrexate:

- signs of an infection, including fever, chills or sore throat
- unexplained skin rash, sore skin or skin ulcers
- yellowing of the skin or itching
- bleeding gums, black sticky ‘poos’, or unexplained bleeding or bruising
- chest pain, difficulty breathing or a persistent cough
- sore mouth or mouth ulcers
- severe and continuing diarrhoea, vomiting or stomach pains
- vaginal inflammation or ulcers.

If your child develops any new symptoms after starting to take methotrexate, please tell their GP or dermatology doctor.
Can my child take other medicines at the same time as methotrexate?

Your child must not take the following medicines, unless their doctor is aware that they are taking methotrexate. They can interfere with how well the methotrexate works or can increase the side effects:

- trimethoprim (antibiotic)
- co-trimoxazole (Septrin) (antibiotic)
- phenytoin (Epanutin) (anti-convulsant)
- anti-malarial drugs
- penicillins, including amoxycillin (antibiotic)
- tetracycline (antibiotic)
- chloramphenicol (antibiotic)
- theophylline (used to treat asthma).

Please note: this is not a complete list. Before giving your child any medicines you can buy from the chemist or other shops, you should check with your dermatology nurse specialist, dermatology doctor or the pharmacist to make sure that they are safe to take with methotrexate.

Paracetamol can be taken with methotrexate. Ibuprofen (e.g. Nurofen, Brufen) can be taken with methotrexate, but only if you have been advised it is safe for your child to do so by their dermatology doctor. If you are at all unsure, it is best to ask for advice.

Alcohol

It is advisable to avoid drinking alcohol as it can change the blood results, which will be picked up on the routine blood monitoring. We understand that this may not apply to young children, but older children or teenagers may need to be advised.
Vaccinations

Some vaccinations or immunisations are not safe for your child and their family to have while they are on methotrexate, or for 6 months after finishing treatment. Your child should not have any live vaccinations, such as MMR, whilst they are taking methotrexate and for 6 months after they have stopped treatment with methotrexate. Family members who live with you should not have some of the live vaccines either.

This is because methotrexate will suppress your child’s immune response to certain infections and live vaccines, putting them at risk of infection. The live vaccines which are safe for other family members to have are the MMR vaccine, because it is not excreted once the vaccination is given, and the BCG vaccine. Always check with your doctor before your child or your family have any immunisations.

What do I do if I am in contact with someone who has chickenpox or shingles?

All children and young people must have a blood test to see if they are immune to chickenpox before starting to take methotrexate. Your dermatology doctor will decide if your child and their brothers or sisters need the chickenpox vaccine before they start taking methotrexate.

If, whilst taking methotrexate, your child is in contact with someone who has chickenpox or shingles, or if they develop chickenpox or shingles themselves, contact their dermatology doctor or nurse specialist immediately. If they are unavailable, contact their GP. Your child may need to come into hospital for an injection of a drug called varicella-zoster immunoglobulin (VZIG), which helps to fight the chicken pox infection.
What if my child comes into contact with someone who has measles?

Measles tends to be a rare illness in the UK today. Most rashes are not measles. If you think that your child has been in close contact with someone who develops a rash which could be measles, please contact your child’s GP for advice. Your child may need to have an antibody injection to give them protection against measles.

Sexual health

If your son or daughter is old enough and in a relationship where they may be sexually active, please make them aware that they must use safe reliable contraception when taking methotrexate, and for 6 months after finishing treatment. Methotrexate can affect both male sperm and female eggs. It can also cause abnormalities to an unborn child.

Please discuss contraception with your child, if they are of an age where it is appropriate. If your son or daughter thinks there is a possibility that they or their partner may be pregnant, please contact their dermatology nurse specialist or GP immediately.
Who needs to know what medication my child is taking?

You should make sure that the following healthcare professionals know what medication your child is taking:

- GP (your child’s GP is normally informed by clinic letter, but please check)
- health visitor
- school nurse
- pharmacist
- dentist
- emergency Department (A&E)
- any other doctor or nurse.

It is important to let your child’s school nurse/health visitor know in writing that they are taking methotrexate and must not have any live vaccines. Your nurse specialist can inform the school nurse of this. If your child changes schools, please let their new school know that they are taking methotrexate. This will help them to keep your child’s health records up to date and alerts them to any special precautions which may be needed to keep them safe.
What do I need to know if my child is going on holiday?

Make sure that your child has enough medication to take with them. You can speak to their dermatologist or nurse specialist if you need a prescription earlier than normal. If vaccinations have been recommended, you can check with their dermatologist or nurse specialist if it is safe for your child to have them. If your holiday insurers need a letter to confirm your child’s health details or medication, you can discuss this with their GP or nurse specialist.

Please talk to your child’s doctor or nurse specialist if you have any worries or concerns.

Other resources

There is more information available on the website of the Oxford Paediatric and Adolescent Rheumatology Centre (OxPARC); www.ouh.nhs.uk/oxparc/information/treatments/medicines/a-z/methotrexate.aspx

How to contact us

Dermatology consultant
Tel: 01865 228 224
(9.00am to 5.00pm, Monday to Friday)
If you have a specific requirement, need an interpreter, a document in Easy Read, another language, large print, Braille or audio version, please call **01865 221 473** or email **PALS@ouh.nhs.uk**