What is my medicine?
Azathioprine is a drug that works by reducing the action of white blood cells, and so damps down the body’s immunological and inflammatory reactions. It is also known as an immunosuppressive drug, because it reduces the actions of the immune system. Mercaptopurine is a very similar drug. In fact azathioprine is broken down to form mercaptopurine after absorption from your gut. For the rest of this sheet, the comments refer to both these drugs in the same way, except for the dose, which is lower for mercaptopurine.

What is the medication for?
In inflammatory bowel disease (Crohn’s and ulcerative colitis), it is known that azathioprine and mercaptopurine reduce the inflammatory reactions in the bowel, (and in other parts of the body if they are also involved). They are given to patients where there are repeated flares of disease, or where the disease is not fully responding to steroid drugs, or recurring as the dose of steroid is withdrawn. In some patients with a lot of inflammation, they are started early on in treatment. The drugs work slowly, and take at least two or three months to take effect, so they are often started while patients are still on steroids. Trials have shown that this then makes it easier for patients to gradually come off their steroids (over the next few months).

We then often keep patients on the drugs for several years, if the disease comes under control, and as long as there are no side-effects.

How and when should I take azathioprine or Mercaptopurine?
You should normally take the tablets once a day in the morning. The drug is usually started in a small dose, and then normally is increased slowly to the final dose of approximately: - Azathioprine 2 mg per kilogram (e.g. 100 to 150mg per day for a standard weight adult) Mercaptopurine 1.5 mg per kilogram (e.g. 75 to 125mg per day for a standard weight adult).
Can I take other medication?
The only commonly prescribed drug that interferes with azathioprine or mercaptopurine is allopurinol – used for gout. You must discuss this with the prescribing doctor if you take allopurinol.

What side effects are there?
In the first few weeks, they can cause nausea, sickness, or vomiting. This usually depends on the dose used. If it does not resolve on dose reduction then the drug has to be stopped. More rarely it can cause skin rashes, headaches, joint pains, or abdominal pain. In very rare instances it can affect the liver. Most patients however have no trouble at all taking the drugs.

They can affect the bone marrow (where blood cells are made), and can cause a fall in white cells, platelets or haemoglobin. For this reason, a regular blood count is taken while you are on the drug. As long as the blood count is monitored, the drug is safe to use. If you develop unexpected or severe infections, you should report this to your doctor and have a blood count checked. Although these drugs have an excellent long-term safety record, any drug affecting the immune system has the potential to affect the body’s defence mechanisms against tumour development, if taken over a long period. How long you stay on the drug depends on the severity of your inflammatory bowel disease, and should be discussed with your clinic doctor.

Abnormal cervical smears have been reported in women taking azathioprine and mercaptopurine. It is important that you attend for your smear test at the appropriate time and inform your Consultant/IBD Nurse if there are any abnormalities found.

Are there any other precautions to take?
Patient receiving immunosuppressive therapy are at slightly increased risk of developing lymphomas and other malignancies, notably skin cancers – exposure to sunlight and UV light should be limited and you should wear protective clothing and use a sunscreen with a high protection factor.
If you wish to become pregnant, you should discuss this as early as possible with the clinic doctor. There are no reports of increased risk to the foetus, and many women have had successful pregnancies on these drugs, but many women would rather not take drugs during pregnancy if their disease is under control. The drugs do pass into breast milk. Folic acid should be taken during conception and throughout pregnancy.

It is also recommended that you have annual flu vaccinations and also vaccination against pneumococcal pneumonia.

Do I Need investigations before commencing Azathioprine/Mercaptopurine

Yes. You will need to have some up to date blood tests, and also pre-screening bloods for Hepatitis B, Hepatitis C, HIV, Varicella (Chicken pox) and Rubella (German measles). These are viral infections, and there is a need to check your immunity.

What monitoring will I have whilst on the drug?

You will have a full blood count checked every two weeks until the drug dose is stabilised. This will be done initially through the clinic at the hospital, and then may be transferred to being done at your GP surgery. Some patients need to have bloods done more frequently.

What if I have any other questions?

You should talk to your gastroenterologist, or call the IBD Nurses on (01633) 656055. More information is also available through the Crohns and Colitis UK (www.crohnsandcolitis.org.uk)

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