



Iron Deficiency Anaemia in Chronic Kidney Disease

Introduction

Iron deficiency anaemia in patients with kidney failure can be treated with iron tablets or iron injections. Iron tablets will be provided by your GP as part of your normal prescription, the iron injections will be given at the hospital.

If you are on haemodialysis, these injections will be given to you through the dialysis machine. If you are not on dialysis, the iron injection will be given in the anaemia clinic as an outpatient appointment at Heartlands Hospital. If you are on Peritoneal Dialysis (PD) and require iron injections, these will be given in the PD department at Heartlands Hospital.

What is Iron Deficiency?

Iron deficiency happens when there is not enough iron left in the body to make healthy red blood cells with enough haemoglobin. Haemoglobin is the oxygen-carrying pigment. This means not enough oxygen is available to keep your tissues and organs healthy.

What causes Iron Deficiency Anaemia in Kidney failure?

Patients with kidney failure often have dietary restrictions or a loss of appetite. This can lead to a reduced intake of protein which in turn reduces the amount of iron available to make your red blood cells. The second most common reason is blood loss. This can be due to several reasons, including multiple blood tests. Haemodialysis patients can lose blood during dialysis. Certain medications such as aspirin or non-steroidal anti-inflammatory drugs can sometimes cause bleeding in the gut.

What are the symptoms of Iron deficiency Anaemia?

The signs and symptoms will depend on how iron deficient you are. The most common symptoms of anaemia are tiredness and fatigue. You may also become short of breath, feel cold, look pale and if you are very anaemic you can experience chest pain. You may also have brittle nails, swelling or soreness of the tongue and suffer from frequent infections. It is important to let the Doctor or Nurse know if you have any of these problems when you attend the dialysis unit or clinic.

How do I know if I have Iron Deficiency Anaemia?

The Doctors and Nurses will be able to explain your blood test results showing iron deficiency.

These include:

- The Full Blood Count – to check your red cell numbers and how much haemoglobin you have.
- Ferritin and other tests – to check your iron levels.

The anaemia nurses will review your blood results. If you are iron deficient, you will be prescribed a course of intravenous iron or iron tablets.

Information for Patients

What will you prescribe?

What we prescribe will depend upon the renal treatment you are having. If you are on haemodialysis you will be prescribed an iron injection which is given to you while you are on dialysis. If you are on peritoneal dialysis or attend the kidney clinic you may be prescribed iron tablets or a single dose iron injection/infusion. You will need to attend the out patient clinic or CAPD unit for this to be given to you.

How is the iron given?

Intravenous iron is given slowly through the dialysis lines for those on haemodialysis. For patients on peritoneal dialysis or for those not yet on dialysis, the treatment will be given through a cannula that sits in a vein in your arm or the back of your hand for the duration of the treatment. The treatment takes about 15 minutes but we will continue to monitor you for 30 minutes after it is completed.

Are there any side effects?

As with all medicines, intravenous iron may cause side effects. In our experience, side effects caused by intravenous iron are very unusual. The most common side effects are headache, dizziness, nausea, abdominal pain, constipation or diarrhoea, rash or injection site reaction. You may experience a metallic taste during administration of the iron.

Most of the other side effects are uncommon or rare and can include itchiness, hives (lumps in skin like mosquito bites), swelling of the hands and feet, serious allergic reactions or sudden shortness of breath. If you experience any of the above or if you notice any side effects not listed, please tell your doctor or the nurse looking after you.

When will I need iron and how do I get it?

Your renal Doctor or the Anaemia Nurse will let you know if you need this treatment. Ideally this will be discussed with you at your routine clinic visit. You will be provided with information about the drug and be given the opportunity to ask any questions you may have.

How often will I need the Iron?

You may need intravenous iron for as long as you have iron deficiency.

Alternative Treatments

The only alternative would be a blood transfusion, especially if your haemoglobin level started to fall. A transfusion can cause various problems; the Renal team only rarely advise a transfusion.

How do I know if it's working?

If you have an injection, you will be asked to have a blood test 4 weeks later.
If you are on haemodialysis you will have the blood test as part of your monthly bloods.
If you take iron tablets, your blood levels will be monitored when you come to clinic.

Further information / Contact:

If you would like further information you can contact the Anaemia Nurses direct on:

0121 424 3160: Anaemia Nurse Specialist

0121 424 1069: Anaemia Nurse

You can access The National Kidney Federation on the Internet www.kidney.org.uk

If you require this information in another format, such as a different language, large print, braille or audio version please ask a member of staff or email patientexperience@uhb.nhs.uk.