

Non-Alcoholic Fatty Liver Disease (NAFLD)

Patient Information Resource for
Primary Care



By Mark Cattermull and Nili Gupta
Produced in collaboration with
Consultant Biochemists Jane Oakey and
Kathryn Brownbill.

The liver is an organ in the right upper corner of your abdomen. It has lots of roles but the three main ones are:

1. Removing toxins, this can include alcohol or medications.
2. Producing things; like proteins to stop you bleeding, cholesterol to make hormones and bile to help you break down and digest fat.
3. Storage – the liver is the main store of glycogen, which is broken down into glucose – a fuel for our body. It also stores vitamins and minerals.

The liver is also very good at regenerating itself – so if it is damaged it can recover if it is looked after.

In NAFLD the liver gets clogged up with fat. It becomes enlarged and some of the cells can become inflamed and die. This can get worse if it is not well managed.

NAFLD means you are more at risk of cardiovascular disease; such as heart attack and stroke. It could also mean you are at risk of liver failure, and even cancer of the liver – both of which can be life threatening.

Most people have NAFLD without any symptoms, but some to look out for are:

- Pain in the upper right corner of your tummy
- Tiredness

If your GP has identified that you may be at risk of having/ or may have NAFLD, they may want to make sure with further blood tests and sometimes scans

There are a number of risks for developing NAFLD, some of which you can control. You can see your doctor to talk about getting on top of these. They include:

- Being overweight
- Type 2 diabetes
- High blood pressure
- High cholesterol
- Some medications

Some you cannot control but good to be aware of:

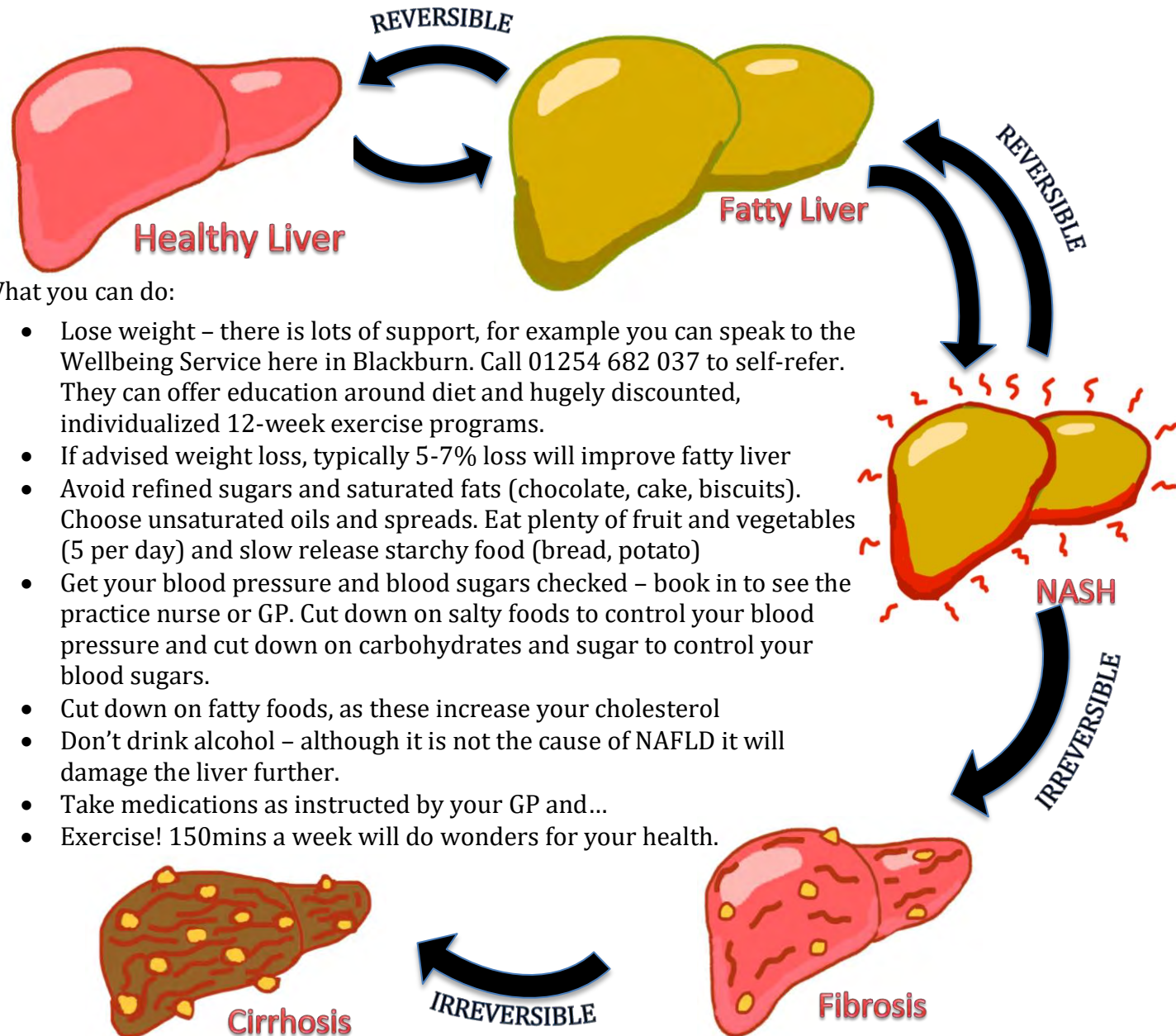
- Being male
- Aged 50 or over

NAFLD affects 1 in 5 adults and 4 in 5 obese adults in the UK.

NAFLD is divided into four stages (as shown on the right):

1. Fatty Liver – excessive buildup of fat in liver, should not cause harm unless it progresses.
2. Non-Alcoholic Steatohepatitis – this just means the fatty liver becomes inflamed.
3. Fibrosis – the liver starts to become scarred.
4. Cirrhosis – so much scarring that the liver stops functioning and may fail.

The importance of the staging is that the first two are reversible; fibrosis and cirrhosis are not! Making the recommended lifestyle changes and maintaining a healthy weight can reduce the fat in the liver, may improve the liver test results and may reduce the risk of progressive liver damage



What you can do:

- Lose weight – there is lots of support, for example you can speak to the Wellbeing Service here in Blackburn. Call 01254 682 037 to self-refer. They can offer education around diet and hugely discounted, individualized 12-week exercise programs.
- If advised weight loss, typically 5-7% loss will improve fatty liver
- Avoid refined sugars and saturated fats (chocolate, cake, biscuits). Choose unsaturated oils and spreads. Eat plenty of fruit and vegetables (5 per day) and slow release starchy food (bread, potato)
- Get your blood pressure and blood sugars checked – book in to see the practice nurse or GP. Cut down on salty foods to control your blood pressure and cut down on carbohydrates and sugar to control your blood sugars.
- Cut down on fatty foods, as these increase your cholesterol
- Don't drink alcohol – although it is not the cause of NAFLD it will damage the liver further.
- Take medications as instructed by your GP and...
- Exercise! 150mins a week will do wonders for your health.

Further reading available on the NHS Choices, Patient.info or British Liver Trust websites.

Simply type into your browser address bar: <https://www.nhs.uk/conditions/non-alcoholic-fatty-liver-disease/>, "<https://patient.info/health/alcohol-and-liver-disease/non-alcoholic-fatty-liver-disease/>" or "<https://www.britishlivertrust.org.uk/>".