

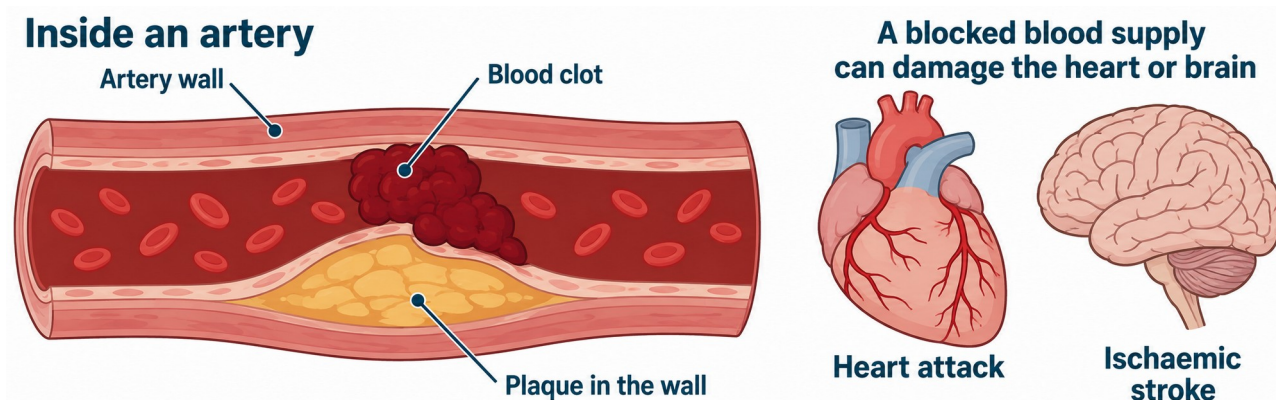
Cholesterol

Understand your results and decide what to do next

Understanding what cholesterol levels mean for your health can be difficult. This leaflet explains your results and the steps you can take. Food changes and, when appropriate, medicine can reduce your chance of a heart attack or stroke.

Why cholesterol matters

Your body needs cholesterol to make cells and hormones. Your liver makes most of it. Too much harmful cholesterol can collect within artery walls as plaque. This can narrow the channel carrying blood. If a plaque breaks open, a blood clot can block the blood supply to the heart or brain.



Plaque builds within the artery wall. A clot can form if its surface breaks. A blocked blood supply can cause a heart attack or an ischaemic stroke (a stroke caused by a clot). Simplified illustration, not a scan.

High cholesterol usually causes no symptoms, so feeling well does not mean your cholesterol level is normal. Plaque can build up in artery walls over many years without warning signs. For some people, the first sign of a problem is a heart attack or stroke. A blood test can detect high cholesterol before problems develop.

Making sense of the names on your result

- **Non-HDL and LDL:** harmful cholesterol when too high. LDL is part of non-HDL. These help judge treatment response.
- **HDL:** carries cholesterol back to the liver. Often called “good”, but high HDL does not cancel out high non-HDL.
- **Total and ratio:** total is HDL plus non-HDL. The total-to-HDL ratio helps assess risk; the total alone cannot decide treatment.
- **Triglycerides:** another blood fat. A very high result needs its own assessment.

Cholesterol is measured in mmol/L. For generally healthy adults, total below 5 and non-HDL below 4 are guides. Your treatment target may be lower: see page 4. A laboratory “normal” flag is not your personal target.

Why has this happened to me

Genes, age, food choices, some medicines and conditions such as an underactive thyroid can affect cholesterol. It is not simply a sign of eating badly. Tell us about close relatives with very high cholesterol or heart disease at a young age: inherited high cholesterol can need different treatment and family checks.

Your cholesterol result and your heart risk

The same cholesterol level can mean different things for different people. Before heart or circulation disease develops, a 10-year cardiovascular risk score combines cholesterol with factors such as age, blood pressure, smoking, ethnicity, family history and health conditions. A score of 10% means about 10 in 100 similar people may develop heart or circulation disease over 10 years. It is an estimate, not a prediction for you, and does not capture every risk factor or your whole lifetime risk.

When might medicine help

- **At 10% or more:** we usually offer a statin alongside lifestyle advice. You can discuss the benefit, possible harms and your preferences.
- **Below 10%:** lifestyle changes help. A statin may still be appropriate if risk is underestimated or you prefer treatment after discussion.
- **Already have heart or circulation disease:** treatment is based on that history, not the score. Kidney disease, type 1 diabetes and inherited high cholesterol can also need a different assessment.

What difference could a statin make

This example starts with a 10% risk. Over 10 years, about 10 in 100 people would develop heart disease or have a stroke without a statin, compared with about 6 taking one. About 4 avoid an event. Your benefit depends on your starting risk and response.



Each group has 100 people. Filled dots mean an event; empty dots mean no event (90 without a statin, 94 with one). Over 10 years. Based on the NICE statin decision aid, not your personal forecast.

Taking a statin when you feel well

Statins reduce cholesterol made by the liver. Atorvastatin is often used. They protect future health, so you may not feel different when taking them. Treatment is usually long term: a lower result often means it is working. Stopping usually allows cholesterol to rise again. Most people tolerate statins well. Some get muscle aches or stomach upset; statins can slightly increase the chance of type 2 diabetes. New symptoms are not always caused by the medicine. Tell us about problems: we can assess them and consider another dose, statin or treatment. See page 4 for symptoms needing prompt help.

Food changes that make the biggest difference

Aim to replace saturated fat with unsaturated fat, rather than cut out all fat. For most people this matters more than avoiding eggs or prawns. Add fibre too: some types help reduce how much cholesterol is absorbed.

Instead of often choosing	Try more often
Butter, ghee, lard or coconut oil	 Olive or rapeseed oil, or spreads made from them
Sausages, fatty meat or meat pies	 Beans, lentils, tofu or fish
Cream, full-fat milk or large cheese portions	 Lower-fat milk or yoghurt; smaller cheese portions
White bread or low-fibre cereal	 Wholegrain bread, oats or other high-fibre cereal
Biscuits, crisps or pastries most days	 Fruit or a small handful of unsalted nuts

Make the advice work in your kitchen

- **At breakfast:** try porridge or a higher-fibre cereal. At lunch or dinner: add beans, chickpeas or lentils to a soup, curry or stew.
- **Build fibre gradually:** include oats, barley, pulses, wholegrains, fruit and vegetables; aim towards 30 g a day. Frozen vegetables and tinned beans can be practical lower-cost options.
- **Change how you cook:** grill, bake or boil more often, and use modest amounts of unsaturated oil. Keep portions comfortable rather than banning favourite foods.

Read “saturates” on food labels and compare similar products per 100 g. For foods, 1.5 g or less is low; over 5 g is high. Drinks have different cut-offs. A “reduced fat” label does not necessarily mean low in saturated fat.

Look after the whole heart

- **Move more:** build towards 150 minutes of moderate activity a week, plus strengthening activity on 2 days if able. Short walks, gardening and adapted or seated exercise can help you get started.
- **Stop smoking:** ask CHG or a pharmacist about support and treatment. Set a quit date and plan help with cravings.
- **Alcohol:** if you drink, keep to no more than 14 units a week, spread over at least 3 days with drink-free days. Smaller measures make cutting down easier.
- **Weight, blood pressure and wellbeing:** small sustainable changes help. Ask for support if stress, low mood, cost or mobility makes this difficult. Taking medicine is not a failure of willpower.

Start with one change you feel able to keep doing this week. Make it specific, such as adding beans to two evening meals. Build from there. Lifestyle changes still matter when you take medicine.

Your next steps with CHG

If we offer treatment through our Accurx messaging service, use the reply option to say you would like to start, have questions or prefer not to start now. You can ask to speak with a doctor, nurse or pharmacist. A prescriber checks the plan before issuing treatment.

If you already have a nurse appointment for a long-term condition or NHS Health Check, you can discuss this there; follow any earlier action in our message. If choosing lifestyle changes first, agree a review date. You can revisit your decision.

Know which treatment target applies

Why you take treatment	Usual target
Preventing a first event	More than 40% reduction in non-HDL from before treatment
Established heart or circulation disease	Non-HDL 2.6 mmol/L or less, or LDL 2.0 mmol/L or less

Established disease includes a heart attack or stroke caused by a clot. For example, if your non-HDL cholesterol is 5.0 mmol/L before treatment, we would usually aim to get it below 3.0 mmol/L to help prevent a first heart attack or stroke. Ask which target is yours.

Check progress and adjust the plan

We check bloods before treatment, then usually cholesterol and liver tests 2–3 months after starting or changing it. A liver test is also due at 12 months. You usually need not fast unless asked. Have a medicine review each year; the team will tell you when further cholesterol tests are due.

If above target, we check missed doses, side effects and other causes. We may increase or change the statin, or add ezetimibe, which reduces cholesterol absorbed from the gut. Some people need other medicines or injections. Do not change the dose yourself.

Make a daily routine and plan repeat supplies, including holidays. Atorvastatin can be taken at any time, ideally at the same time daily. Follow your medicine leaflet; check new medicines, supplements and grapefruit with a pharmacist.

When to get advice

Contact a clinician promptly for unexplained muscle pain, tenderness or weakness. Seek urgent help today from CHG or NHS 111 for severe muscle symptoms, red/brown pee, yellow skin or eyes, or severe tummy pain.

Call 999 for chest pain that does not go away, sudden face drooping, arm weakness or speech problems, severe breathing difficulty or throat swelling. Do not wait for an Accurx reply.

Plan with your prescriber before trying for a baby: stop statins 3 months beforehand. Ask for advice if breastfeeding. If pregnant or possibly pregnant while taking a statin, stop it and contact your prescriber promptly.

Contact CHG: reply through the option in our Accurx message, or use 'Contact us' at cirencesterhealthgroup.co.uk. **Reception:** 01285 653122. Ask if you need another format, help to reply, or a clear follow-up plan.

Longer read: [BHF Understanding high cholesterol](https://bhf.org.uk/cholesterol) (also find it at bhf.org.uk/cholesterol).

Medicine details: [NHS statins](#). BHF cardiac nurses: 0808 802 1234, weekdays 9am–5pm (not bank holidays). Audio and other languages: bhf.org.uk/infoforall.