



WRIST NEURECTOMY

Patient Information, Consent and Recovery Guide



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*This leaflet is designed to support, not replace, your conversation with Miss Edwards.
There is a list of questions you may find it useful to ask later in this leaflet.*

Written by Miss Alison Edwards, Consultant Hand Surgeon. Published: September 2026. Next review due: September 2028.

About the condition

Wrist neurectomy — also called partial wrist denervation — is an operation to relieve chronic wrist pain. Rather than treating the joint itself, it interrupts the nerves that carry pain signals away from it.

Two small nerves supply sensation to the wrist joint: the **posterior interosseous nerve (PIN)**, which runs down the back of the forearm, and the **anterior interosseous nerve (AIN)**, which runs down the front. By the time they reach the wrist, both are purely sensory. They do not move any muscles and they do not supply feeling to the skin of your hand. Dividing them therefore removes a proportion of the pain coming from the wrist joint without weakening the hand and without leaving any numb patch on the skin.

It is considered for long-standing wrist pain — typically from wrist arthritis, an old scaphoid fracture that has not united, Kienböck's disease, or persistent pain at the back of the wrist — particularly where a reconstructive operation is not possible or not wanted, or where you would rather try something smaller before committing to major surgery.

Diagnosis of the underlying cause is made from your history, examination and X-rays, sometimes with a scan or a wrist arthroscopy. What determines whether this operation is likely to help you, though, is the diagnostic block described below.

The diagnostic block — an important first step

Before offering neurectomy, Miss Edwards will usually perform a **diagnostic block**: local anaesthetic is injected around the AIN and PIN in the forearm, and you then test the wrist over the next few hours.

If your pain improves substantially, the nerves are carrying a meaningful part of it and the operation is likely to help. If the pain is unchanged, it is not, and surgery would not be worthwhile.

One caveat is worth knowing in advance. The block tends to give a better result than the operation does — people often report near-complete relief from the block, and rather less than that in the long run. It is a good test of *whether* to operate, but an optimistic guide to *how much* relief you will end up with.

Your treatment options

You have a genuine choice here, and it is important you understand all of the options, including doing nothing, before deciding.

Doing nothing is a reasonable choice. Wrist arthritis is not dangerous, and pain often fluctuates. The trade-off is continuing pain and the limits it places on what you do.

Non-surgical treatment — activity modification, a wrist splint, painkillers or anti-inflammatory medication, hand therapy, and steroid injection into the wrist — should generally be tried first.

Reconstructive or salvage surgery — such as partial or complete fusion of the wrist, or removal of the first row of carpal bones — treats the damaged joint directly. These are larger operations with longer recoveries, and fusion means permanently giving up some or all wrist movement.

Neurectomy is a small operation that treats the pain but leaves the joint untouched. Importantly, it **does not burn any bridges**: if it does not work, or stops working, the larger operations remain available, and in many people it delays the need for them.

The surgery — what it involves

A small incision is made on the back of the forearm, just above the wrist. The posterior interosseous nerve is identified where it lies on the interosseous membrane between the two forearm bones, and a short segment of it is removed. The anterior interosseous nerve lies on the other side of the same membrane and is reached through the same incision and divided in the same way. Miss Edwards divides **both nerves together**, rather than the PIN alone. The skin is then closed.

It is a **day case** procedure, carried out under general or regional anaesthetic, and takes around 45 minutes to an hour.

Benefits of surgery

- It is a **small operation** on the forearm, not on the wrist joint itself, with a short recovery
- **Grip strength and wrist movement are not sacrificed** — grip strength improved in around 45% of patients, presumably because the wrist was less painful to use (Weinstein and Berger, 2002), and range of motion was similar before and after surgery (Sgromolo et al., 2018)
- Around **80% of patients report less pain**, and around **85% are satisfied**, at an average of two and a half years afterwards; around 90% say they would have the operation again (Weinstein and Berger, 2002)
- No feeling is lost from the skin of the hand
- **It does not prevent later surgery** — fusion and other salvage operations remain possible, and neurectomy may substantially delay the need for them

What it will not do — being realistic

This is a pain operation, not a cure, and it is worth being clear about what that means:

- **The arthritis or damage in the wrist is untouched, and will carry on as it would have done.** The joint continues to change over time; you simply feel less of it.
- **Complete relief is unusual.** Most people keep some discomfort, at a level they find acceptable, rather than becoming pain-free.
- **Not everyone is helped.** Where the operation fails, it usually does so within the first year. Around 15% of patients needed a further procedure in the original published series (Weinstein and Berger, 2002), but larger reviews report higher rates — around 19–24% within the first two years (Kadhum et al., 2020; Smeraglia et al., 2020), and around 40% by five years (Tandrup et al., 2026).
- Poor wrist movement before the operation is associated with a less good result.

Risks and possible complications

Published series report few complications from this operation, but as with any surgery there are risks:

- **Infection** at the wound
- **Scar tenderness** on the back of the forearm
- **Incomplete relief, or relief that fades** with time
- **Numbness or a tender spot at the scar**, or a neuroma — a sensitive swelling at the cut end of a nerve
- **Altered position sense in the wrist** — because these nerves also carry information about joint position, there is a theoretical concern that the joint could deteriorate faster without its protective pain signals. This has been looked for and not found in the published follow-up studies, and patients have not reported problems with position sense, but it remains a theoretical consideration.
- **The underlying wrist problem continuing to progress**, and further surgery being needed in due course

Everyone's circumstances are different, and something that seems minor to one person may matter a great deal to another. Please tell Miss Edwards about anything on this list — or anything else — that particularly concerns you, so your discussion covers what matters most to you personally.

Your consent

Before you have surgery, Miss Edwards wants to be sure you have been able to make a properly informed decision, in line with GMC guidance on decision making and consent. This means:

- You have the right to be as involved as you want in decisions about your care, and to be given the time and support you need to understand your options.
- The alternatives — including splinting, injection, hand therapy, reconstructive or fusion surgery, and doing nothing — and their benefits and risks, should have been discussed with you.

- Miss Edwards will try to understand what matters to you personally, not just the clinical facts.
- You can ask questions at any point, and you are welcome to bring someone with you to appointments.
- **You can change your mind at any time** — including after signing a consent form — right up until the moment surgery begins, without needing to give a reason.
- Your discussion and decision will be recorded in your notes, and you will be asked to sign a consent form on the day of surgery.
- You have the right to seek a second opinion if you would like one.

Questions you may want to ask your surgeon

It's easy to forget questions in the moment, so you may find some of these useful:

- What did my diagnostic block show, and what does that suggest for me?
- How much pain relief should I realistically expect, and how long is it likely to last?
- What happens to my wrist in the longer term if the arthritis carries on?
- If this doesn't work, what would we do next?
- Would I be better going straight to a bigger operation?
- How long will I be off work, given what my job involves?

On the day of surgery

- The operation is a day case. The hospital will send you fasting instructions before the day — please follow these carefully.
- Take your usual medications as normal unless you've been told otherwise; do let Miss Edwards know in advance if you take blood-thinning medication.
- Remove rings and nail varnish (including false nails) from the operated hand before you arrive. You may be asked to change into a gown.
- Your arm will be cleaned with antiseptic and covered with a sterile drape before starting.
- You will have a dressing on the forearm afterwards.
- Miss Edwards recommends that you arrange for somebody to drive you home on the day.

Recovery and rehabilitation

Recovery is quicker than for wrist surgery, because nothing has been done to the joint itself — the wound is on the forearm and it is the wound, rather than the wrist, that dictates the early stages.

The first few days

Keep the dressing dry and your arm elevated to limit swelling. Move your fingers, wrist and elbow freely from the outset — there is no need to protect the wrist. Paracetamol and ibuprofen are usually enough for pain relief. It can take a little while for the effect on your wrist pain to settle and become clear, so don't judge the result in the first week.

1-2 weeks

Stitches are usually removed at around 10–14 days. You can drive as soon as you feel comfortable and can safely control the vehicle — for most people that is somewhere

between a few days and a week after surgery. Once the wound has healed, begin scar management: massage the scar with an unscented moisturiser, vitamin E oil or silicone gel — small circles over the scar, then strokes along and across it — for a few minutes, 2–3 times a day, and keep it out of the sun.

2–6 weeks

Build up your use of the wrist as comfort allows. Most people are back to desk-based work at 2–3 weeks, and to their usual activities by around four weeks. If the wrist had become stiff or weak from being painful and under-used, hand therapy helps you rebuild movement and strength, and Miss Edwards will arrange this if it would help.

Beyond 6 weeks

The full benefit becomes clear over the following months. Where the operation is going to fail it usually does so within the first year, so it is worth keeping in touch if the pain returns rather than assuming nothing more can be done — there are further options.

Manual work can be resumed as soon as comfort allows.

When to seek help

Contact the clinic promptly if you notice:

- Increasing redness, swelling, warmth, discharge or fever (signs of infection) — please contact us before anyone starts you on antibiotics
- Pain that is uncontrolled by the painkillers you've been given
- New numbness, tingling or weakness in the hand
- A very tender spot at the scar that is not settling
- The return of your original wrist pain after an initial improvement

Summary Table: Recovery Milestones

Time after surgery	What to expect
First few days	Dressing kept dry; arm elevated; fingers, wrist and elbow moving freely; no protection needed
1–2 weeks	Stitches out at 10–14 days; driving once comfortable and safe, usually a few days to a week; scar massage begins
2–6 weeks	Use built up as comfort allows; desk work at 2–3 weeks; usual activities by about 4 weeks
Beyond 6 weeks	Manual work as soon as comfort allows; full benefit clear over the following months; any failure usually shows within the first year

Contact details

Mendip Hand Clinic Practice Plus Group Hospital, Old Wells Road, Shepton Mallet, Somerset BA4 4LP

Bookings: 0330 818 8981

If you think anything in this leaflet is unclear or needs updating, please tell us using the contact details above. For further background on this condition, the British Society for Surgery of the Hand also publishes patient information at bssh.ac.uk/patients.

A final note

This leaflet is general information and does not replace individual advice. Your own risks, alternatives and expected recovery should be discussed personally with Miss Edwards, in line with GMC guidance on decision making and consent.

References

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