

Complex Regional Pain Syndrome (CRPS) and desensitisation therapy

This leaflet explains more about desensitisation therapy to help with Complex Regional Pain Syndrome. If you have any further questions, please speak to your hand therapist.

What is pain?

We have nerve cells all over our body that can send information messages to the brain. It is the brain's job to interpret these messages. The feeling of pain is a normal response to anything your brain thinks is a danger. In CRPS this process continues even though healing has occurred and there is no longer a true threat to the hand/limb. It is often unpleasant and confusing.

The experience of pain is the result of a highly complex system that includes the spinal cord, nerves and the brain. Danger messages are processed in many different parts of the brain and these different parts of the brain are interlinked. Your emotions, experiences and environment also contribute to the pain experience.

What happens to my sensation in CRPS?

In CRPS the affected area of your body becomes highly sensitive. Often, a pain response can be caused by something that wouldn't normally cause pain. This is known as **allodynia**. The exact cause is unknown, but it is thought the nerves in the areas become overly sensitive and send 'danger' messages to the brain. Over time, the brain becomes very sensitive to these incoming messages and learns to react with severe pain to all touch and movement. Some patients find that just thinking about moving or touching the affected area can be painful.

What is desensitisation therapy?

Desensitisation therapy is a process by which we retrain the brain and the nerves in the affected body area to respond to sensations normally again. It is a way of trying to restore the normal nerve signals between the affected area and the brain so that the messages between the two do not cause pain.

Desensitisation therapy works by introducing various textures (silk, cotton wool, towels) or movements (tapping, stroking, firm pressure) to the affected area in a controlled and thoughtful way. The textures and movements are applied in order, from the most easily tolerated to the most difficult. The idea is that you can reduce feelings of pain by deliberately bombarding the sensitive nerve endings with different stimuli.

During desensitisation therapy, it is important that you are free from distractions so that you can concentrate on each texture or movement. You should apply the texture or movement to the unaffected side of your body first so that you can use your memory to recall what the sensation should feel like.

When undertaking desensitisation, you should follow these steps:

1. Start the application on the edge of the affected area and work inwards.
2. Look at the texture or movement during application. This will help to activate your memory of what the normal feeling should be.
3. Try to stay as relaxed as possible – tune in to what you know the sensation should feel like, rather than focusing on the pain. Slow, deep, relaxing breaths can be helpful.
4. As each texture or movement is tolerated, move onto the next one.
5. If your pain is unbearable, stop the activity and try again a bit later. Alternatively, speak to your hand therapist about how to modify the activity and enable participation.

You should aim to practise little and often. Try 2-3 minutes every hour or even up to 10 minutes 4-5 times per day. You can discuss the frequency with your hand therapist and find a method that works for you.

What else do I need to know?

Every daily activity where you try to use the affected area is an opportunity to reduce your sensitivity. For example, try to concentrate on the different textures and materials whilst dressing, thinking about what it should feel like. Alternatively, you can try massaging the affected area whilst bathing.

Contact us

If you have any questions or concerns about CRPS, please contact Hand Therapy on 020 8725 1038 (you may leave a message). For appointment enquiries, please phone the Central Booking Service on 020 8725 0007.

Your therapist is: _____

For more information leaflets on conditions, procedures, treatments and services offered at our hospitals, please visit www.stgeorges.nhs.uk

Additional services

Patient Advice and Liaison Service (PALS)

PALS can offer you on-the-spot advice and information when you have comments or concerns about our services or the care you have received. You can visit the PALS office between 9.30am and 4.30pm, Monday to Friday in the main corridor between Grosvenor and Lanesborough Wing (near the lift foyer).

Tel: 020 8725 2453 **Email:** pals@stgeorges.nhs.uk

NHS Choices

NHS Choices provides online information and guidance on all aspects of health and healthcare, to help you make decisions about your health.

Web: www.nhs.uk

NHS 111

You can call 111 when you need medical help fast but it's not a 999 emergency. NHS 111 is available 24 hours a day, 365 days a year. Calls are free from landlines and mobile phones.

Tel: 111

