

Electromyelography/Nerve Conduction Study (EMG)

Your doctor has ordered this test to help determine the cause of your pain. This test is specifically performed to identify if abnormal nerve function is present.

The Nerve Conduction Study tests how electric impulses travel along the nerve, helping to isolate the cause of abnormal nerve function. The signals are measured by applying small electric pulses to the nerve at one site, and recording the response at a different place along the nerve. The small electric pulses cause a mild tingling feeling. The nerve response is picked up by a recording instrument and is then measured by your doctor.

During the EMG (electromyography) portion of the test, the physician inserts a small needle into a muscle to record the electrical activity of the muscle. The electrical activity of the muscle is then fed into the recording instrument. The physician analyzes the activity by looking at a signal on a scope and listening to the sounds of the activity through a speaker. This helps the physician determine if there are abnormalities in the muscle or the nerve going to the muscle.

Is there any special preparation for this test?

Inform your physician if you:

- are using a transcutaneous electrical nerve stimulator (TENS) unit
- are taking blood thinners
- have hemophilia
- have a cardiac pacemaker

Do not apply lotion to the arms or legs on the day of the test.