



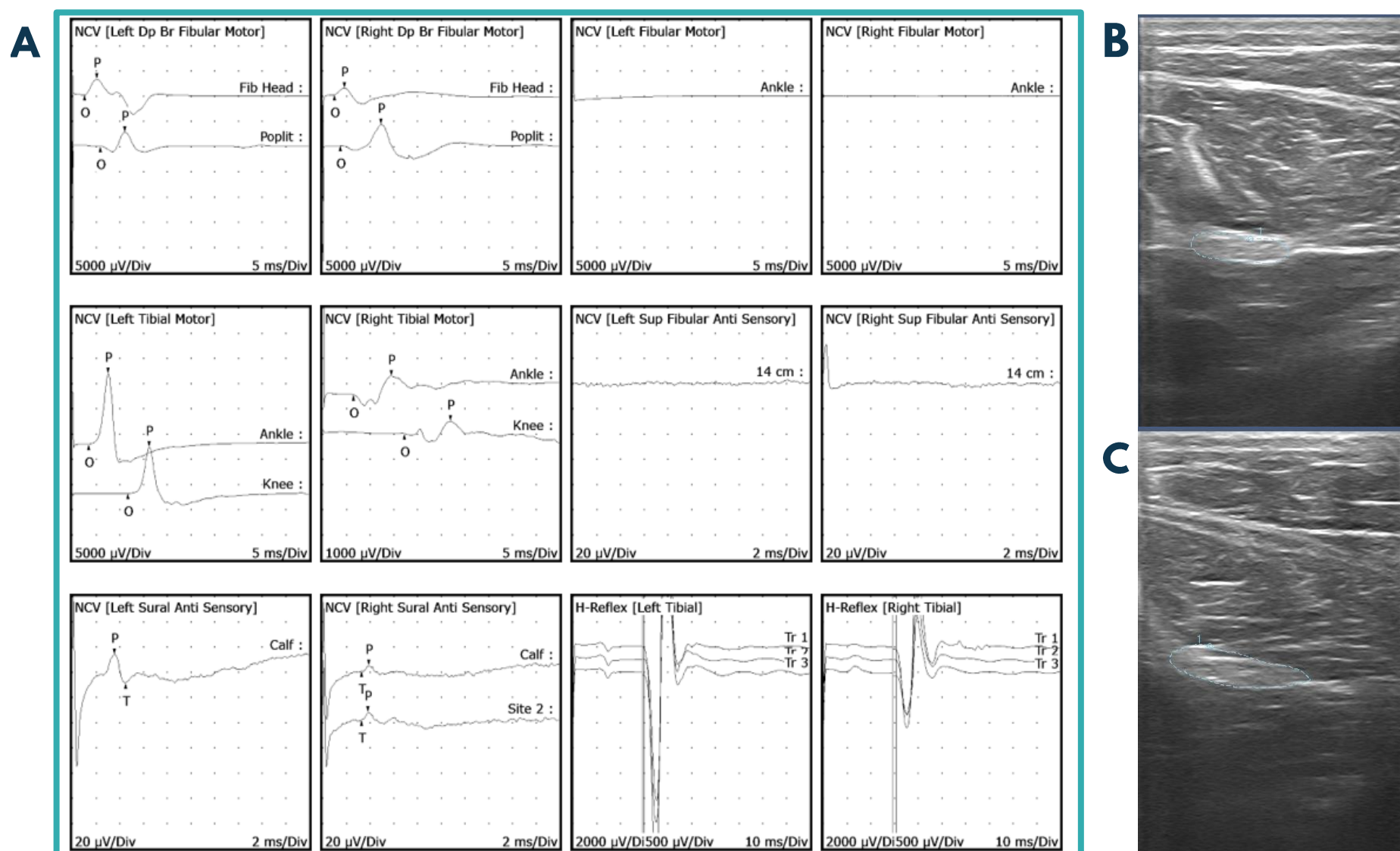
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ISCHEMIC AND BILATERAL SCIATIC NERVE INJURY

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PHYSICAL MEDICINE AND REHABILITATION

CASE DESCRIPTION

Unilateral sciatic nerve injury can occur secondary to ischemia, compression, or direct trauma. Bilateral involvement is rare. This is a young adult patient, who suffered a gunshot wound in 2018. The projectile entered the left flank and lodged in the right flank, causing intestinal and liver injuries. It required surgery and intensive care for 2 months. He also presented peritonitis and two weeks after admission, he presented inability (0/5) for bilateral dorsiflexion and plantiflexion. Myotendinous reflexes were normal.



A. Electrodiagnostic study control. B. Transversal view left sciatic nerve CSA 41 mm². C. Transversal view right sciatic nerve CSA 68 mm².

ELECTRODIAGNOSTIC

The electrodiagnostic study revealed a severe bilateral sciatic nerve injury and ruled out involvement of the plexus or nerve roots. The patient received physiotherapy and ankle-foot orthosis. Two years later, a control study showed a partial lesion of the bilateral sciatic nerve, with greater involvement of the peroneal component and a predominance on the right side.

ULTRASOUND

Additionally, a sonographic study showed an increase in the CSA of the sciatic nerve, the sural nerve and changes in the echotexture of the involved nerves and muscles.



DISCUSSIONS

The bilateral involvement of the sciatic nerve in this patient could be due to ischemia, due to hypotension as the first possibility, since no lesion of arterial or venous vessels was documented and lesion at the proximal level, in the plexus or nerve roots was ruled out. The prognosis of the sciatic nerve injury is variable, according to the mechanism of the trauma, the severity and whether or not there is disruption in the continuity of the nerve. In our case, the patient had an adequate recovery from the injury, clinically, with weakness in the extensor hallux and asymmetry in muscle volume, but with optimal performance in his gait pattern.

CONCLUSIONS

The electrodiagnostic and ultrasound study make it possible to show the location, extent and severity of the lesion, correlate with the symptoms and provide information on the prognosis.

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