

Intercostal Peripheral Nerve Stimulation for Chronic Post-Mastectomy and Post-Thoracotomy Neuralgia

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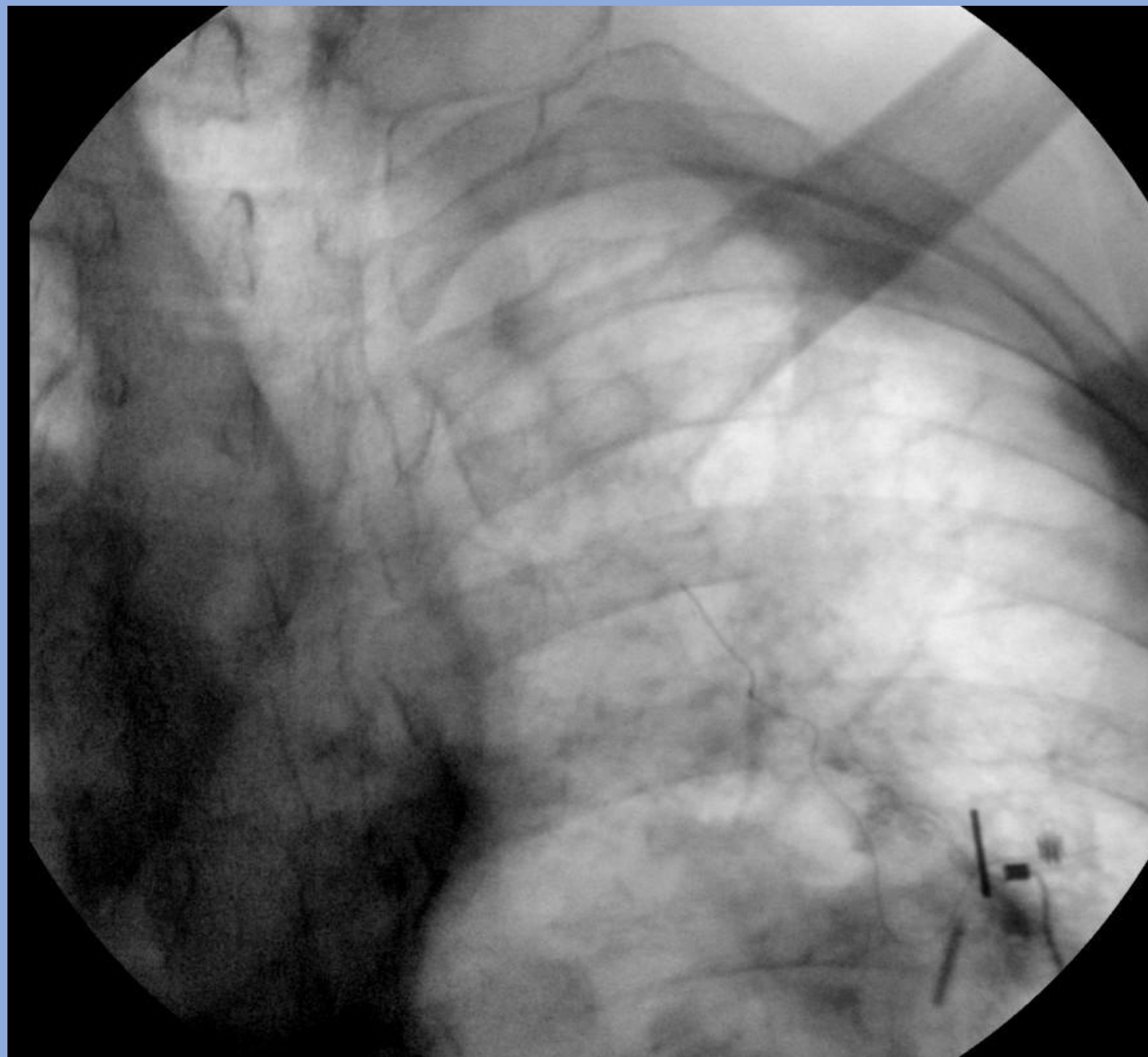
INTRO

- Chronic intercostal neuralgia = disabling pain after thoracic or breast surgery
- Often refractory to meds and nerve blocks
- PNS = emerging minimally invasive treatment

CASE

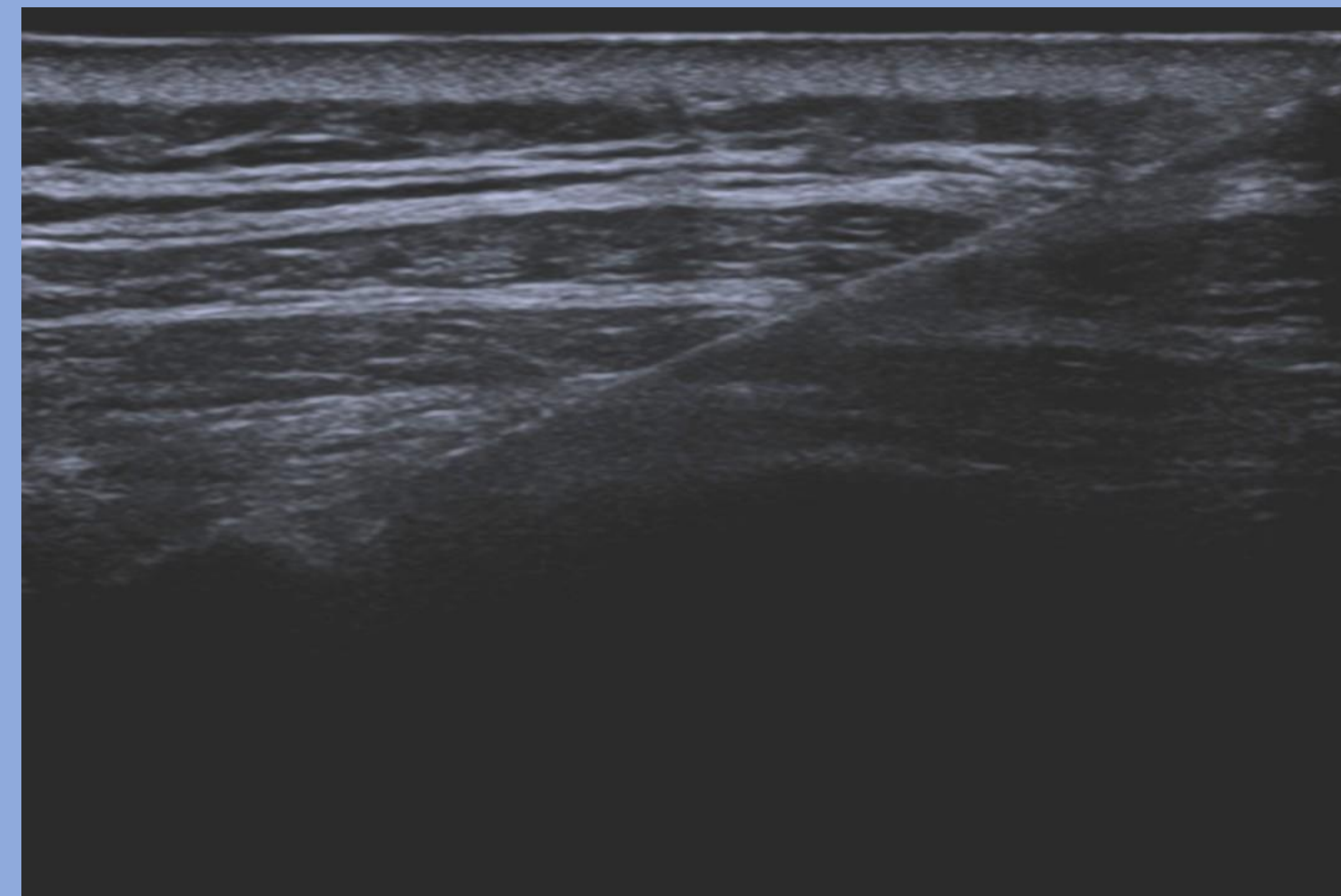
- 62-year-old woman s/p mastectomy & thoracotomy
- Persistent burning/stabbing pain (T4–T6 dermatomes)
- Failed: gabapentin, duloxetine, opioids,
- **Intercostal nerve blocks at T4–T5 provided 80–100% pain relief lasting up to 6 months, but became less durable over time**
- **Ultrasound-guided 60-day PNS** → lead at left T5 intercostal nerve

Temporary intercostal PNS reduced pain >80% and improved function in a medically complex post-surgical neuralgia case.



Fluoroscopic placement of 60-day PNS insertion

Lateral fluoroscopic view demonstrating percutaneous lead placement along the right 5th intercostal nerve for a temporary 60-day PNS.



Ultrasound –guided intercostal PNS insertion

In-plane ultrasound view showing needle trajectory within the intercostal plane during temporary PNS lead insertion targeting the right 5th intercostal nerve.

RESULTS

- Pain ↓ >80%
- Off opioids within 2 weeks
- Improved sleep and activity
- Relief continues to last at 5 months post lead removal

DISCUSSION

- Short-term intercostal PNS = safe, effective, low-risk option
- Useful for patients unsuitable for permanent implants
- May bridge gap between blocks and neuromodulation

CONCLUSION

- 60-day PNS provided meaningful, durable relief
- Supports growing role of temporary PNS in focal neuropathic pain

Scan to view
complete abstract

