

LETTER TO THE EDITOR

THORACIC EPIDURAL ANALGESICS PROVIDE EXCELLENT CANCER PAIN RELIEF AT THE END OF LIFE

Dear Editor:

Most patients with pain from cancer find relief with standard opioid analgesics and adjuvant analgesics. For those patients refractory to standard analgesics, spinal (epidural and intrathecal) analgesics have a high success rate for pain relief.¹ While often thought of as equivalent in providing analgesia, epidural versus intrathecal placement of spinal analgesics may affect pain relief outcome and side-effect profile.² This letter describes a patient with terminal pancreatic cancer and severe abdominal pain who received inadequate pain relief with intrathecal analgesics, but had excellent pain relief in the last 16 weeks of life with epidural analgesics.

A 65-year-old woman was presented with abdominal pain radiating to the upper lumbar spine due to inoperable pancreatic cancer. Following an initial trial of oral opioid analgesics, but without adequate pain relief, the patient was given a trial of high lumbar intrathecal opioids. This intrathecal morphine provided only partial pain relief and was complicated by headache and nausea. The patient adamantly refused further intrathecal analgesics. Next, a neurolytic celiac plexus block was performed under fluoroscopy but resulted in only partial pain relief. Over the next 2 months, the patient received escalating doses of oral opioids without adequate pain relief. On presentation to our clinic, the patient had severe abdominal pain, was jaundiced, showed weight loss and fatigue, and had metastasis to the lung and liver. A tunneled thoracic (T8/9) epidural catheter was placed for infusion of epidural morphine and bupivacaine. This resulted in complete pain relief without any significant side effects. She was able to return home and enjoy the company of friends. She remained ambulatory until the final few days of life. The epidural analgesics provided excellent pain relief during the last 4 months of life. On examination of the patient at home 1 week prior to her

death, she was alert and oriented, cheerful, pain free, and sitting up in her chair with significant jaundice and moderate peripheral edema.

Refractory cancer pain may require multiple treatment attempts using different interventional techniques to achieve effective analgesia.³ Although intrathecal analgesics often provide excellent pain relief when placed close to the spinal level of nociception,⁴ the slow rate of infusion may not adequately cover the painful area. Our patient was resistant to intrathecal analgesics but showed excellent pain relief with epidural analgesics. The relatively fast rate of epidural analgesics infused at typical doses of 2-4 mL/h may contribute to the greater analgesic effect seen in our patient. A recent study on the distribution of intrathecal bupivacaine and intrathecal baclofen during slow intrathecal infusions in pigs found that the intrathecal analgesics showed a very slow and restricted spread of drug over the spinal cord.⁵ The faster rate of epidural infusion may allow better coverage of more spinal cord levels and improved pain relief. If intrathecal catheters are placed for cancer pain management, they should be placed as close as possible to the spinal level of nociception. Failure of intrathecal analgesics to provide cancer pain relief is not a contraindication to therapeutic trials of epidural analgesics.

Paul A. Sloan, MD

Department of Anesthesiology
University of Kentucky, Lexington, Kentucky

REFERENCES

1. Sloan PA: Neuraxial pain relief for intractable cancer pain. *Curr Pain Headache Rep.* 2007; 11: 283-289.
2. Sloan PA: The evolving role of interventional pain management in oncology. *J Support Oncol.* 2004; 2: 491-506.
3. Sloan PA, Hodes J, John W: Radiosurgical pituitary ablation for cancer pain. *J Palliat Care.* 1996; 12: 51-53.
4. Mercadante S, Intravaia G, Villari P, et al.: Intrathecal treatment in cancer patients unresponsive to multiple trials of systemic opioids. *Clin J Pain.* 2007; 23: 793-798.
5. Flack SH, Bernards CM: Cerebrospinal fluid and spinal cord distribution of hyperbaric bupivacaine and baclofen during slow intrathecal infusion in pigs. *Anesthesiology.* 2010; 112: 165-173.