

MEDCO FORUM[®]

PRESENTING INNOVATIVE PRODUCTS & SERVICES TO HEALTHCARE PROFESSIONALS

Medco Forum Presents:
Misonix BoneScalpel™ Becoming a Preferred Surgical Tool
Ultrasonic Osteotome Precisely Cuts Bone With Minimal Trauma To Soft Tissue

Combining very fine, precise cutting with a soft tissue sparing capability, the ultrasonic BoneScalpel™ (Misonix, Inc., Farmingdale, N.Y.) lends itself to bone dissections in spinal applications, in particular for decompression procedures such as laminectomy, when the underlying dura is at risk. Its longitudinal blade motion enables precision osteotomies free of gyroscopic effects and facilitates cutting techniques for en-bloc bone dissection and in close proximity to delicate soft tissues. A patented liquid pathway directs the irrigation fluid to the blade-tissue interface, compensating for thermal effects, and facilitating safe, clean and non-necrotic bone dissection.



Precise enough it can cut a window in a raw egg yet leave the membrane intact, the Misonix BoneScalpel has been hailed by surgeons as one of the most important advancements in spine surgery during the last few years and is predicted to become a preferred surgical tool for the next decade and beyond.

Dr. Edgar N. Weaver, Jr., of Weaver Neurosurgical Spine, P.C., who has more than 30 years of experience in the surgical and non-surgical care of spinal disorders: "I used the BoneScalpel as a trial all through January 2012, and now I use it almost exclusively for removing bone. I do not use the drill anymore. The BoneScalpel has more precision and more control, and it is a real improvement in terms of removing bone around delicate structures."

Dr. Nicholas Qandah, neurosurgeon at Carilion Clinic: *"In my experience with deformity and tumor surgery, I have found significant advantages using the BoneScalpel for corpectomies. Previously, I have had to use a mallet to strike the osteotome into the bone, an aggressive move, but with the BoneScalpel's ultrasonic oscillation, I make similar cuts and remove bone in fragments, with less trauma or risk to the patient."*

Dr. Nicholas Theodore of Barrow Neurosurgical Associates, Ltd., who received a highly prestigious NIH RO-1 grant, less than 10 percent of which are funded nationally, to study spinal injuries and novel approaches to spinal surgery, and who has been using the BoneScalpel for more than a year: *"The BoneScalpel is a powerful addition to our armamentarium of bone removal devices. The instrument allows us to make very precise cuts adjacent to critical structures, such as the spinal cord."*


Dr. Isador H Lieberman, orthopedic surgeon at the Scoliosis & Spine Tumor Center, Texas Back Institute and Texas Health Presbyterian Hospital: *"The BoneScalpel is a safe and effective bone cutting device that can be used to facilitate osteotomies in a variety of spine surgeries. This device may obviate the need for and risk of high speed burrs and oscillating saws during spine surgery. It's a very versatile and safe device, with multiple applications to carve and craft bone."*

Rapid, Safe, Precise, and Hemostatic Osteotomies

According to Dr. Theodore, *"One nice aspect of the BoneScalpel is that as it cuts, it has a hemostatic effect. I am impressed by the fact that when we are doing a cervical, lumbar or thoracic surgery and are taking bone away, the blood loss is much less than it would be without the instrument."*

"I recently used the BoneScalpel to remove a metastatic lesion of the thoracic spine," reports Dr. Qandah. "There is little room for error in the thoracic spine in terms of drilling, but the BoneScalpel replaces the drill. In this case, the bone was eaten away by the tumor itself, but I was able to thin down the bone without putting any pressure on the spinal cord, and without much debris or bleeding."

Dr. Lieberman notes that, *"Using the BoneScalpel, I am now able to complete bilateral facetectomies from T2/3 to T11/12 in less than 15 minutes,"* and Dr. Weaver agrees that *"The BoneScalpel makes it considerably faster to remove the lamina and saves*



maybe 40 percent of the time to do a total laminectomy. I use the blade for complete laminectomies and switch mostly to the shaver around nerve roots.”

For more information about the Misonix BoneScalpel™ please call Misonix Customer Service at 1-800-694-9612, email sales@misonix.com, or visit our website at www.misonix.com.