Intradiskal Electrothermal Therapy (IDET)

Intradiskal electrothermal therapy (IDET) is a novel, minimally invasive procedure designed to relieve back pain caused by degeneration to the discs in the lower back. Discs are tiny cushions between each vertebra in the spine. As one ages, these discs may develop cracks or breaks in the outer disc wall. Blood vessels and pain fibers grow into the area in an attempt to repair the damage. These small pain fibers may be the sources of chronic back pain.

IDET allows the physician to apply heat with a special catheter to the damaged disc wall. The heat produces contraction of the collagen in the disc wall. This will seal the cracks in the outer disc wall and allow the collagen to remodel its structure.

Your physician will do a careful history and physical examination and may order diagnostic tests to determine whether this procedure is suitable for you. The exact location of the problem must be determined in advance. Usually, an MRI of the lumbar spine and a discography (injection of dye into the disc) are necessary to precisely locate the source of the pain.

What happens during the IDET procedure?

You should not eat on the day of your procedure but may take small sips of water for up to 6 hours before your appointment. You may use your usual pain medications as needed unless otherwise instructed. You are not allowed to take aspirin for 7 days and anti-inflammatories for 3 days before the procedure. You cannot undergo this procedure if you are pregnant.

You will be positioned with your face down on a special table. A needle is placed in the disc using X-ray guidance. A catheter with a heating coil is placed through the needle into the affected area in your disc. Your physician may ask you to describe your symptoms during the procedure. You may feel pain similar to the pain you normally have, which indicates that the heat is being applied to the correct area.

The tip of the heating coil seals the fissure in the disc wall and ablates the small nerve endings that carry pain signals from the site. A small bandage or Band-Aid is applied over the needle insertion site after the needle is removed.

It usually takes about 45 to 60 minutes to complete the procedure for a single disc; more if multiple levels are treated. The patient is usually able to leave the hospital about 2 hours after the completion of the procedure.

What should I expect after IDET?

Some patients report an increase in pain for a few weeks after the procedure, with gradual relief usually occurring over 3 to 6 months. You may use your usual pain medication as necessary.

For up to 3 months following the procedure, you usually have to avoid lifting, twisting, and bending or sitting up for extended periods. You will need to wear a

back support for 6 weeks following surgery to protect your spine and allow the area to heal. Patients typically resume driving after about 1 week.

If you have a sedentary job, you will probably be able to return to work in about 1 to 2 weeks.

You will be given specific exercises to perform at home and will meet with a physical therapist to develop an individualized exercise program to strengthen your back and improve your overall fitness.

Several studies have demonstrated good pain relief in about 70–80% of properly selected patients.

What are the risks associated with IDET?

Risks include infection and nerve damage, but adverse effects from this procedure are rare. You may call (404) 778-7000 if you have any questions.