

QUESTIONS AND ANSWERS ABOUT MESOTHERAPY

WHAT IS MESOTHERAPY?

Mesotherapy is a safe, nonsurgical technique for spot weight reduction, and for eliminating cellulite from heavy thighs, abdomen, hips and buttocks. Mesotherapy has no downtime or lost wages. In ten weeks, targeted areas can be reduced up to six inches by melting fat under the skin.

Mesotherapy greatly improves cellulite and stubborn fat pads like the "love handles", "baby belly" and "saddlebags". Over the past 50 years, more than 15,000 physicians world-wide have used Mesotherapy for many uses including spot weight reduction, cellulite reduction, eyelid fat pad reduction, "double chin" and wrinkle elimination.

In Mesotherapy, very small doses of different medications are administered in specific areas, depending on the condition being treated. The medicines and plant extracts used for Mesotherapy by Dr. Pazuchowski are always obtained from local pharmaceutical companies in the United States. All pharmaceuticals used are FDA approved. However, the combination of these medicines for Mesotherapy are considered "off-label" purposes.

A similar situation occurred with Botulinum Toxin (BOTOX® Cosmetic). Although Botulinum Toxin was initially FDA approved only for controlling muscle spasms, the demand for its cosmetic properties prompted plastic surgeons and dermatologists used Botulinum Toxin "off label" safely and effectively for many years before it was FDA approved for cosmetic indications.

WHO CAN HAVE MESOTHERAPY?

Adults between the ages of 18 - 75 and in good health are candidates for Mesotherapy for weight loss, spot weight reduction, cellulite reduction, chin/neck and eyelid fat pad reduction.

WHO CANNOT HAVE MESOTHERAPY?

If you have any of the conditions listed below, you are not a candidate for aesthetic Mesotherapy:

- Pregnant or breast feeding
- Insulin dependent diabetes
- History of recent cancer
- History of blood clots
- On blood thinning medications
- On multiple heart medications
- History of severe heart disease
- History of heart arrhythmia
- History of stroke

HOW DOES MESOTHERAPY WORK?

The medications and nutritional supplements that are used in Mesotherapy work to melt the fat beneath the skin and shrink your fat cells by a variety of mechanisms. Here's a partial list of drugs used:

AMINOPHYLLINE

Aminophylline is FDA approved as an asthma medication. On the surface of each of your fat cells are Alpha and Beta receptors. Receptors that burn fat are known as Beta receptors, and those that cause fat storage are known as Alpha receptors. An easy way to remember this is that Beta = BURNING and Alpha = ADDING. Above the waist, the number of Alpha and Beta receptors occurs in an equal 1:1 ratio in both women and men. However, below the waist, women have approximately 6 to 8 Alpha receptors to every Beta. This is the reason why it is so incredibly difficult for women to lose weight in this area. Alpha receptors are stimulated by carbohydrates, fat ingestion, amino acids and alcohol. In Mesotherapy, Aminophylline allows your beta receptors to burn your fat more efficiently. To burn fat your Beta receptors must first create a chemical called cyclic AMP which allows a second step to occur. Without Mesotherapy, your Beta receptors cannot proceed to the second step because of a chemical called phosphodiesterase. Phosphodiesterase breaks down cyclic AMP and stops fat burning. Aminophylline inhibits phosphodiesterase, preventing it from interfering with the cyclic AMP and fat breakdown.

PHOSPHATIDYLCHOLINE

Phosphatidylcholine (PPC) or Lipostabil is an antioxidant that is derived from natural soy lecithin. It is FDA approved only as a nutritional supplement at this time. PPC alters the metabolism of fatty substances like cholesterol and triglycerides in the body. PPC has been used intravenously to break down fatty deposits (lipolysis) in patients with high cholesterol, fatty liver disease and heart vessels filled with fatty plaques. PPC is purported to penetrate the adipocyte (fat cell) through the double lipid layer (cell wall) where it acts as a detergent (emulsifying and tensoactive agent). This means that fat affected by PPC becomes water soluble. Fat soluble and water soluble substances are not compatible (a good example is oil and water). Therefore your fat cells that are altered by PPC must be eliminated. In a nutshell, PPC breaks down fat much like hot water and dish soap break down grease in a frying pan. The fat dissolves and is carried through the bloodstream and excreted by the kidneys and bowel. It is just common sense that if you are exercising and dieting properly, this process occurs much more rapidly and efficiently.

HYALURONIDASE

The FDA recently approved one form of hyaluronidase (Vitrase) as an injectable drug for use in combination with other injected drugs to increase their absorption and dispersion. Cellulite occurs when connective tissue bands that hold down the skin trap bulging bundles of fat and create the "dimpling" effect. Connective tissue contains a large amount of hyaluronic acid. Hyaluronidase is a natural enzyme that breaks down hyaluronic acid. Hyaluronidase used in Mesotherapy may help to break down the connective tissue bands that create the dimpled appearance of cellulite. Hyaluronidase also enhances the absorption and dispersion of PPC to enhance the breakdown of fat cells between the connective tissue bands.

L-CARNITINE

L-Carnitine is FDA approved as a nutritional supplement only. Synthesized by the liver and kidneys, L-Carnitine is required for fatty acids to be delivered into cells where the fat can be burned as a source of fuel. In Mesotherapy, L-Carnitine transports liberated fat into the little power centers of the cells (called mitochondria) so that the fat can be burned for energy. Quite simply, without optimal amounts of L-Carnitine, there is not optimal fat burning taking place in Mesotherapy. Diet and exercise along with L-Carnitine will maximize fat removal.

LIDOCAINE

This is an FDA approved anesthetic that is used in low doses in Mesotherapy to maximize your comfort by blocking pain almost instantly after injection.

WHAT SIDE EFFECTS CAN I EXPECT?

Mesotherapy performed in the USA has very few side effects. After your Mesotherapy you may resume your normal activities immediately. Unlike liposuction, Mesotherapy does not require restrictive garments. Mesotherapy usually causes slight bruising which resolves over one week. Swelling from Mesotherapy is mild and lasts only a day or two. Some patients notice a little itchiness for 2-3 hours after their Mesotherapy. This can be controlled with an anti-histamine like Claratin.

Loose fitting clothing and avoidance of vigorous exercise for 1 day after your Mesotherapy is advised. You may feel small lumps under your skin that are not painful or itchy after Mesotherapy. You may ignore them as they will simply go away.

In the medical literature there have been reports of skin infections associated with Mesotherapy performed outside the United States. These were due largely to non-sterile technique. In Brazil infections became a serious problem because the drug was not being administered by physicians. Hair stylists and other non-physicians were injecting phosphatidylcholine in salons and bathrooms.

WHAT IS THE COST OF MESOTHERAPY?

The cost of Mesotherapy depends upon the size and number of areas treated and the number of sessions required. Compared to liposuction, mesotherapy is very affordable. Liposuction costs between \$5,000 to \$10,000 per session. In addition, liposuction has the additional expense of lost wages as your recovery may prevent you from going to work for up to 2 weeks. Each Mesotherapy session costs anywhere from \$50 - \$300 depending on the area treated. Each area to be treated will require between one and five treatments.

LIPOSUCTION

vs

MESOTHERAPY

Surgical procedure		Non-invasive procedure
Scars from cannula insertion		Non-scarring
Removes fat cells		Removes fat FROM cells
Trauma creates fibrosis & scarring under the skin		Structure and function of your natural tissue preserved
Worsens cellulite		Smooths cellulite
Downtime (2 weeks)		No downtime
Lost wages during recovery		No lost wages
Restrictive garments for 2 weeks		Wear loose clothing afterwards
Weight gain back in abnormal places		Weight gain back in normal places
Significant bruising & pain		Minimal bruising & pain

Dr. Pazuchowski has been trained in Mesotherapy by The American Society of Aesthetics and Mesotherapy (ASAM). ASAM is a professional organization of doctors designed to educate, promote and share information on the latest non-surgical cosmetic procedures available to the American public.