Chronic Wounds: A persistent situation

Nearly 6 million patients in America are affected by chronic wounds, costing the US healthcare system an estimated $20 billion annually. Every year more than one million people with diabetes will develop foot ulcers; 20–30% of those cases will eventually require amputation. Chief causes of a breakdown in the wound healing process include infection, tissue ischemia/hypoxia, inadequate local wound responsiveness and unrelieved pressure. Fortunately, the Methodist Wound Treatment Center offers treatment options that can heal chronic wounds, giving doctors, nurses and physical therapists a proven resource in affecting positive outcomes for their patients.

About the Methodist Wound Treatment Center

The Methodist Wound Treatment Center is an outpatient program that focuses on chronic and non-healing wounds. Using advanced treatment modalities and a case management model, we help patients improve the quality of their lives. In partnership with physicians, nurses and multiple medical disciplines, we provide invaluable care for patients.

Let the Methodist Wound Treatment Center heal your patients today

For more information about advanced wound care and Hyperbaric Oxygen Therapy, contact us today.

Hyperbaric Oxygen:
An adjunctive therapy for chronic non-healing wounds
Hyperbaric Oxygen Therapy: accelerating the healing process

Hyperbaric Oxygen Therapy (HBOT) is one of several advanced wound care modalities provided at the Methodist Wound Treatment Center. HBOT is used adjunctively with other procedures such as revascularization, or as a primary treatment when other options fail.

Hyperbaric Oxygenation

Breathing 100% oxygen under pressure causes the oxygen to diffuse into the blood plasma. This oxygen-rich plasma is able to travel past the restriction, diffusing up to 3 times further into the tissue. The pressurized environment helps to reduce swelling and discomfort, while providing the body with at least 10 times its normal supply of oxygen to help repair tissue damaged by an original occlusion or subsequent hypoxic condition.

The benefits of Hyperbaric Oxygen Therapy

HBOT allows a patient to breathe 100% oxygen 2-3 times greater than atmospheric pressure and is administered on a daily basis. The result is an increase of 10-15 times in plasma oxygen concentration. This increase translates to arterial oxygen values between 1500 and 2000 mmHg, which produces a four-fold increase in the diffusing distance of oxygen from functioning capillaries.

Additionally, by forcing more oxygen into the tissue, HBOT encourages the formation of new blood vessels. As these new blood vessels develop, the red blood cells start to flow, delivering even more oxygen to the affected area. This creates the optimal environment for the body’s natural healing processes to repair damaged tissue.

Approved Hyperbaric Oxygen Therapy indications

CMS (Medicare) lists the following indications as approved coverage for HBOT, in order of decreasing utilization:

- Diabetic Wounds of the Lower Extremities (DWLE)
- Soft Tissue Radionecrosis
- Compromised Flaps & Grafts
- Chronic Refractory Osteomyelitis
- Osteoradionecrosis
- Acute Peripheral Arterial Insufficiency
- Progressive Necrotizing Infections
- Crush Injuries
- Acute Traumatic Peripheral Ischemia
- Gas Gangrene
- Acute Carbon Monoxide Intoxication
- Decompression Illness/Sickness
- Gas Embolism
- Cyanide Poisoning
- Actinomycosis

Additional UHMS-approved indications:

- Thermal Burns
- Exceptional Blood Loss Anemia
- Intracranial Abscess

Hyperbaric Oxygenation produces a number of physiological benefits:

- Correction of tissue hypoxia
- Reduction of local edema
- Improvement of toxic effects of aerobic organisms
- Improved leukocyte killing ability
- Stimulation of fibroblast replication
- Support of collagen synthesis and angiogenesis
- Enhanced epithelial migration

During Hyperbaric Oxygen Therapy, patients relax in special chambers and therapy is monitored by expertly trained technicians that work in collaboration with onsite physicians.