

# You Breathe Continuously Your Wound Should Too

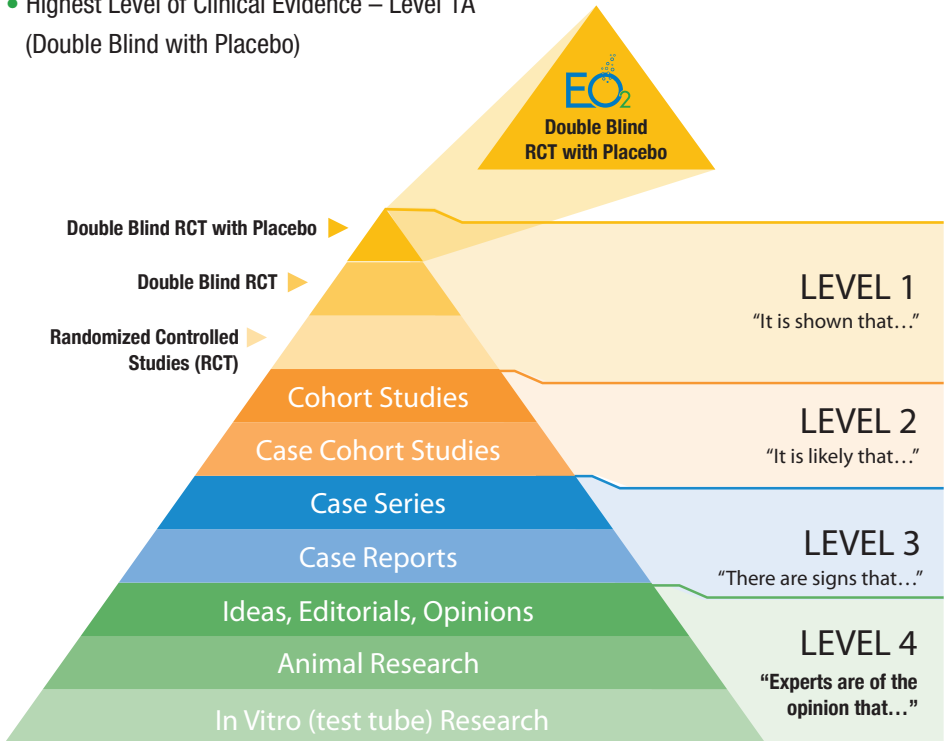
*Full Closure Oxygen Therapy*



We provide advanced wound care solutions  
using Continuous Diffusion of Oxygen (CDO) Therapy

## Proven Clinical Results – Unique Study Design

- Fully blinded with Sham device (Placebo) as control arm
- Eliminated Placebo Effect – Patients and Clinicians did not know treatment arm
- Highest Level of Clinical Evidence – Level 1A (Double Blind with Placebo)



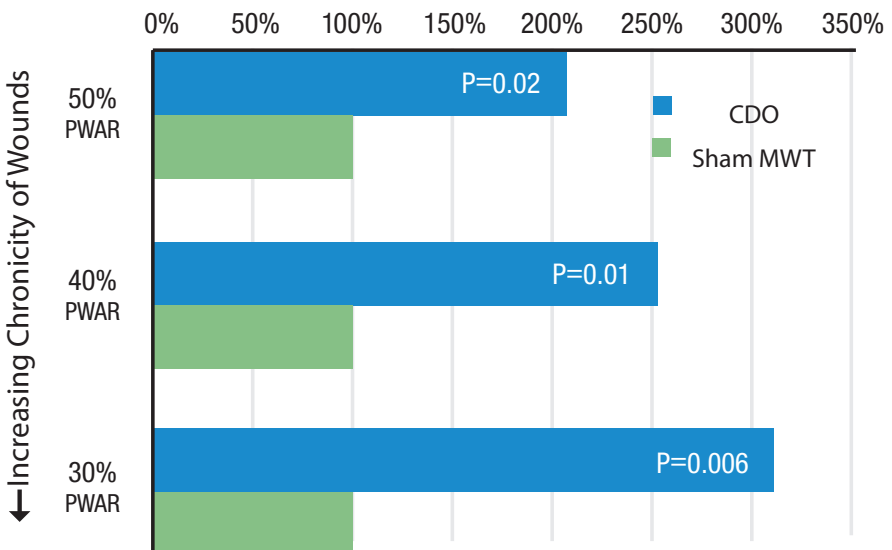
Sources: • Centre for Evidence Based Medicine, [cebm.net](http://cebm.net)  
 • Journal of Pharmacology (2013, 4:2, pp 88-169) • Center for Evidence Based Management, [cebma.org](http://cebma.org)

## Statistically Significant Outcomes in 12 Weeks

- CDO leads to significantly higher rates of closure (2x to 3x)
- CDO works better in more chronic wounds (lower PWAR\*)
- CDO resulted in significantly faster time to closure ( $P < 0.001$ )

Relative efficacy of CDO improves the more the therapy may be needed (more chronic and larger wounds)

Closure Rate, CDO vs. Placebo MWT







For more details and references, refer to the full publication in the Journal of Diabetes Science and Technology: Niederauer MQ, Michalek JE, Armstrong DG. A Prospective, Randomized, Double-Blind Multicenter Study Comparing Continuous Diffusion of Oxygen Therapy to Sham Therapy in the Treatment of Diabetic Foot Ulcers. JDST 2017. DOI: [10.11903rg2/1209.6118717/16935252794681](https://doi.org/10.11903rg2/1209.6118717/16935252794681)

\*PWAR = Percentage Wound Area Reduction<sup>34,35</sup>



## What is Continuous Diffusion of Oxygen (CDO)?

CDO uses pure, humidified oxygen to continuously treat a wound. This allows for sustained delivery of oxygen to the tissue, full patient mobility during treatment, and application of the therapy in virtually any setting.

-  Continuously treats a wound with oxygen (O<sub>2</sub>)
-  Generates pure, humidified O<sub>2</sub> from air
-  O<sub>2</sub> diffuses directly into wound, similar to breathing
-  Silent, wearable and discreet

## How CDO Works in Wound Healing

Oxygen has been shown to be an essential component in multiple mechanisms of action required for wound healing, and increasing the amount of oxygen to levels higher than normal has been shown to result in increased, and often proportional, levels of activity.

### Increases Cell Metabolism & Energy<sup>8-10</sup>

- Continuous Pure Oxygen boosts vitality to support increased demand during healing

### Enhances Bodies Own Anti-Bacterial Capacity<sup>8-10,17,18</sup>

- Create Reactive Oxygen Species (i.e. Hydrogen Peroxide)

### Greater Wound Perfusion<sup>9,10,16</sup>

- Rate of angiogenesis proportional to oxygen concentration

### Better Strength and Appearance<sup>8,10,13-15</sup>

- Higher tensile strength (reduced recurrence)
- Better collagen organization (reduced scarring)

### Faster Cell Growth & Re-epithelialization<sup>10-12,27</sup>

- Increased collagen deposition (faster repair)
- Up to 70% faster endothelial gap closure rate

Day 0 of CDO



Day 93 of CDO  
99% Closed



## Surgical Wound

### PATIENT:

48 Year old male suffering from non-healing surgical wound

### MEDICAL HISTORY:

Diabetes, vascular issues, PVD, not a candidate for vascular interventions or HBO treatment

### WOUND HISTORY:

Patient was scheduled for BKA, but showed enough improvement to cancel surgery after one week of CDO treatment

### TREATMENT:

3 TransCu O<sub>2</sub><sup>®</sup> units set at 10 ml/hr paired with OxySpur<sup>®</sup> dressing, along with other standard MWT care

### OUTCOME:

Wound reached 99% closure with CDO therapy in 93 days



23,28-31

## Pain Reduction

Promotes Compliance



## Wearable 24/7

Completely silent and discrete



24,34

## Cost Effective

Lower cost as stand-alone or adjunctive solution



## Naturally Antibacterial

8-10,17,18

Promotes body's own immune response



## Full Wound Healing

11,22,24,26,27

Complete re-epithelialization wound closure

Scan blue QR Code for number references.



Day 0 of CDO



Day 55 of CDO - Closed



## Diabetic Foot Ulcer

### PATIENT:

50 year old caucasian female suffering from a pressure ulcer

### MEDICAL HISTORY:

Diabetes, diabetic retinopathy & peripheral neuropathy

### WOUND HISTORY:

The wound has been open for 90 days, ulcer has progressively gotten larger, deeper, more malodorous, fibrotic, and necrotic

### PREVIOUS THERAPIES:

Multiple debridements, local wound care with various wound care products, and an attempt at primary closure

### TREATMENT:

TransCu O<sub>2</sub><sup>®</sup> unit set at 3 ml/hr

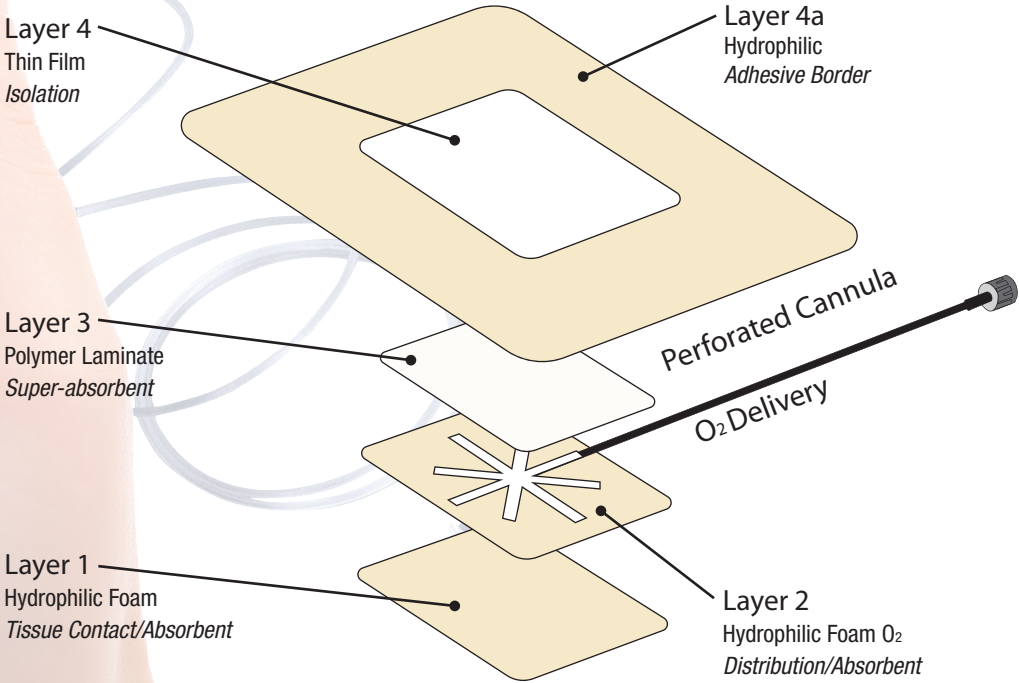
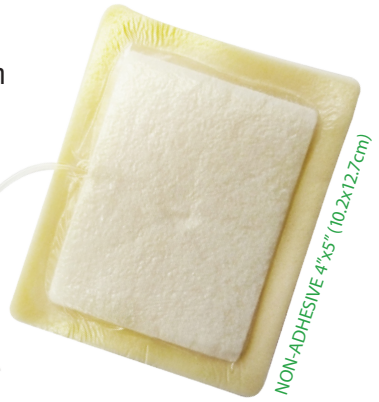
### OUTCOME:

Wound reached full closure with CDO therapy in 55 days

Full case studies can be found at [eo2.com](http://eo2.com)

## The EO<sub>2</sub> Solution

The EO<sub>2</sub> System employs a TransCu O<sub>2</sub>® device which uses fuel cell technology to continuously generate pure, humidified oxygen at adjustable flow rates from 3-15 ml/hr and deliver it directly to the wound bed environment within the OxySpur® dressing. The OxySpur® Oxygen Diffusion Dressing is an all-in-one dressing for medium to high exuding wounds. It's design ensures even distribution of oxygen over the entire wound.



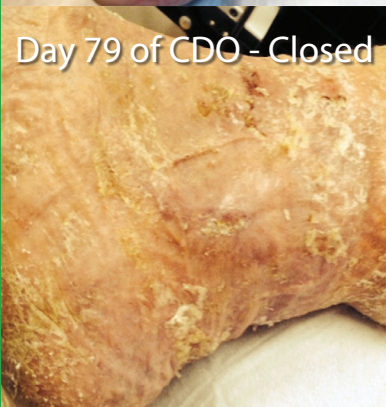
**OxySpur** }

ADHESIVE	2"x2" (5.1x5.1cm)	4"x5" (10.2x12.7cm)
NON-ADHESIVE	2"x2" (5.1x5.1cm)	4"x5" (10.2x12.7cm)

Day 0 of CDO



Day 79 of CDO - Closed



## Venous Leg Ulcer

### PATIENT:

53 year old female suffering from a large, painful venous leg ulcer

### MEDICAL HISTORY:

Venous insufficiency, obesity

### WOUND HISTORY:

Patient suffered from bilateral ulcers for over 5 months

### PREVIOUS THERAPIES:

Four-layer compression, cadexomer matrix dressing, collagenase and silver nitrate

### TREATMENT:

TransCu O<sub>2</sub>® unit set at 10 ml/hr paired with OxySpur® dressing covered with four-layer compression

### OUTCOME:

Wound reached full closure with CDO therapy in 79 days over hypergranulation. Patient's pain was reduced quickly (within 3 days) and pain medication was no longer needed

(Case published in Podiatry Today, Nov 2014)<sup>23</sup>



Keep Your Patients Moving



**800.825.2979**

eo2.com • info@eo2.com

690087 rev0317

