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HEALTH CENTRE LTD

Your Journey Starts Here 🌱

# THE BENEFITS OF USING AN INFRA-RED SAUNA

## HANDOUT

### Wendy Mouldey

Health and Wellness Practitioner  
Certified Life Coach  
Certified Advanced Health Coach  
Functional Health Coach  
Lymphascial Practitioner

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# WELCOME TO YOUR SUNLIGHTEN SAUNA



## 10 Reasons to use a Sunlighten Sauna

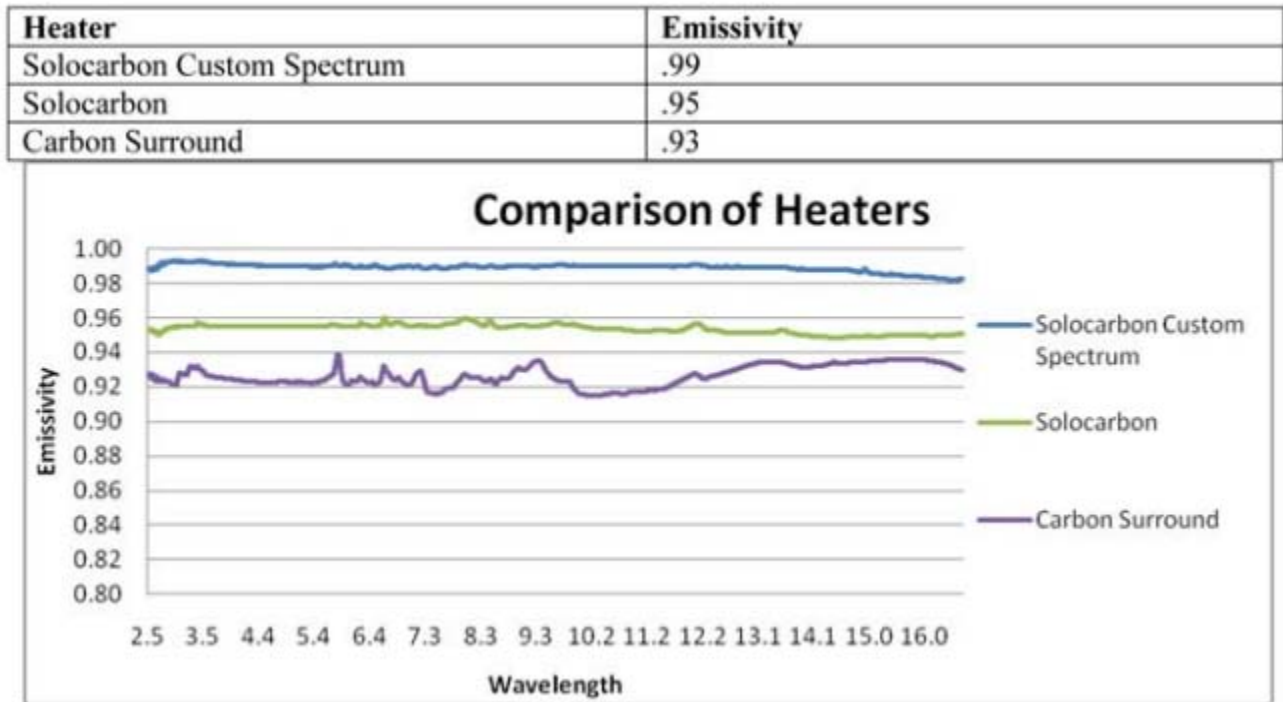
**Empower Your Wellness with the most effective infrared therapy available.**

### 1. Patented, Medical-grade Solocarbon® Heaters

Dedicated to offering the most effective wellness solutions available, our patented Solocarbon® heating technology is the foundation for our sauna. It is the only far infrared heater on the market clinically shown to raise core temperature, lower blood pressure and aid in weight loss.

Patent [US8737827B2](#)

Sunlighten have taken infrared therapy to the next level with Solocarbon 3-in-1® . This patented technology has three separate heating elements to provide near, mid and far infrared at optimal wavelengths based on 56 clinical studies. Others may claim to provide full spectrum infrared, but their heaters simply don't have the technical capability to deliver in the therapeutic range. Solocarbon 3-in-1 can evolve with changing health needs over time.



## 2. Highest Quality & Quantity of Infrared

Emissivity is the ability of an object to emit or absorb energy. A perfect black body has an emissivity of 1, emitting 100% of infrared energy. An object with an emissivity of 0.6 will absorb 60% and reflect 40% of the energy. For infrared therapy to be successful, sauna heaters must have a high emissivity level to deliver a high concentration of infrared waves. As your body absorbs high levels of infrared, it begins to heal at the cellular level. Without high emissivity, a sauna may produce heat, but it won't provide healing infrared. Sunlighten Solocarbon are proven through third-party testing to be 95-99% emissive.

## 3. Ultra-Low EMF Technology

Not only are Solocarbon heaters the most effective on the market, they are also the safest. Sunlighten proprietary heater design produces virtually no EMF. With their exclusive manufacturing process, they can cancel out EMF to levels practically undetectable. Solocarbon heaters have gone through comprehensive third-party testing to ensure safe levels of EMF.

### See EMF testing data

Spot Reading Location	Bx Component in mG, RMS	By Component in mG, RMS	Bz Component in mG, RMS	Calculated Br Resultant, mG RMS
Location #1	0.03 mG	0.00 mG	0.03 mG	0.04 mG
Location #2	0.00 mG	0.00 mG	0.00 mG	0.00 mG
Location #3	0.01 mG	0.00 mG	0.00 mG	0.01 mG
Location #4	0.02 mG	0.00 mG	0.05 mG	0.06 mG
Location #5	0.03 mG	0.00 mG	0.02 mG	0.04 mG
Peak Field in mG	0.03 mG	0.00 mG	0.05 mG	0.06 mG

Table #1 – 12 Hz – 50 kHz Magnetic Flux Density Levels recorded as Spot Readings



#### **4. Safe, Non-toxic Materials**

All elements of Sunlighten saunas are made with safe, non-toxic materials. Not only are our Solocarbon heaters proven 95-99% efficient, they contain a proprietary blend of FDA-approved materials and are heat-sealed to withstand temperatures above and beyond the operating temperature to ensure no unhealthy gases are released during heating. Plus, extensive third-party testing has been conducted to ensure all of our materials are safe and non-toxic.

#### **5. Beautiful, Durable & Eco-Certified Craftsmanship**

With 100% quality-controlled manufacturing, you will not find another sauna as beautiful or as strong. The wood is 33% thicker than the industry standard and is commercial grade for extra durability. The Signature II weighs nearly 500 pounds – that is over 40% stronger than others on the market! Sunlighten participates in socially and environmentally responsible wood sourcing. Their saunas are made from PEFC-certified and FSC-certified woods – available in Western Canadian cedar, hypoallergenic basswood and fragrance-free eucalyptus. They are the only company that offers hypoallergenic Basswood – the only wood not listed on the toxic wood chart and has had no adverse reactions ever reported.



## 6. Patented Magne-Seal Assembly

Only Sunlighten offers a patented magnetic locking system, eliminating the need for unsightly clips to hold the sauna together. Why is this beneficial? This process makes assembly a cinch, prolongs cabinetry life, provides heat protection and increases durability.

## 7. Acoustic Resonance Therapy

Available in the wooden sauna, Acoustic Resonance Therapy (A.R.T.) creates an environment for the body to experience the benefits of sound and vibrational healing in an integrative way. Feeling the music, we hear brings our body into harmony physically, mentally and emotionally through stimulating our feeling sense. Combining infrared therapy and A.R.T. provides a natural healing environment that can benefit everyone.







## **8. Safety Certifications**

As the direct manufacturer, Sunlighten adheres to the upmost safety standards. Our electrical certification ensures that your sauna has been tested to meet safety and performance standards. Many consumers do not even think about or look to see if a product displays a safety agency mark. Without a safety agency listing, there is no proof that a product passes electrical safety standards.

## **9. #1 Doctor & Consumer Recommended Brand**

Only Sunlighten saunas are medical-grade, clinically backed and proven 95-99% effective. This is why Sunlighten is used and recommended by more health experts and consumers over any other sauna brand.

*Amy Myers, MD*

Dr. Amy Myers is a pioneer in Functional Medicine and New York Times best-selling author. Through her revolutionary dietary-based program, The Myers Way®, she has empowered thousands to prevent and even reverse the signs and symptoms of a multitude of autoimmune conditions and chronic diseases. Along supporter of Sunlighten, Dr. Myers has personally used her Sunlighten sauna in her home in Austin, Texas, to balance her life and live healthfully.



*Dave Asprey*

Founder of Bulletproof and New York Times best-selling author, Dave Asprey, is on the cutting-edge of taking control of and improving one's biochemistry. Dave believes in the power of re-engineering your mind and body, so they work in unison. Sunlighten has joined him on this mission to empower others and move everyone towards healthier living.



*JJ Virgin*

"I've long been a fan of infrared saunas. Recently I took that love to the next level and splurged on one for my home. I didn't make that decision lightly. After careful research and speaking with trusted colleagues, I opted for a Sunlighten sauna, the only brand clinically shown to raise core temperature so you"



## **10. Trust in a Company that Cares**

In business since 1999, Sunlighten are committed to innovating wellness products and services that empower you to improve your quality of life. As the company of choice for businesses, consumers, and trusted experts, Sunlighten welcomes users to their growing global community. They want to make a difference. That's what drives them.

Through extensive market research, they learned exactly what customers want in an infrared sauna. This insight became the foundation for the creation of several lines of saunas that are not only beautiful & effective, but extraordinarily comfortable. They continue to advance the industry as they meet the ever-changing needs of their clients with affordable, best-in-class products.

## Learn More About Sunlighten's Technology

### Patented Solocarbon Far Infrared

Sunlighten Solocarbon far infrared heating panels are the most effective far infrared sauna heaters on the market today. Scientific research shows that far infrared is most therapeutic in high concentrations. Solocarbon panels are proven 95% emissive, meaning that 95% of the energy being produced is in the therapeutic range to increase core body temperature for a deep, detoxifying sweat. This is the active ingredient that has been clinically shown to lower blood pressure, aid in weight loss, and support detoxification.

Patent [US8737827B2](#)

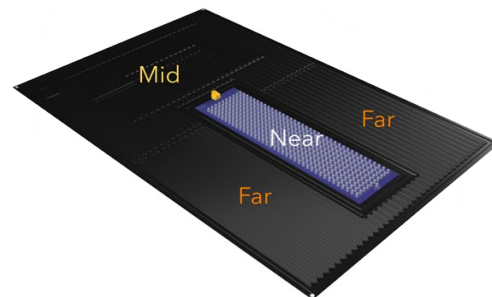
### 1st & Only: Solocarbon 3-in-1 Infrared

Solocarbon full spectrum infrared heaters are the only sauna heaters on the market that produce near, mid, and far infrared wavelengths. Specific conditions are required to generate each wavelength, so the 3-in-1 heaters include three distinct heating mechanisms. Other manufacturers may claim to provide full spectrum infrared, but their heaters simply don't have the technical capability to deliver on that promise.

Patent [US8737827B2](#)

### Patented 3-in-1 Technology Delivers the Full Infrared Spectrum

The Solocarbon 3-in-1 is the only sauna heater on the market that can provide all three infrared wavelengths in one place.



The infrared spectrum consists of near (NIR), mid (MIR), and far (FIR) waves, each with distinct characteristics and frequency ranges. It's impossible to deliver these three peak wavelengths at one time from a single source. That's why Sunlighten developed a unique technology that combines three heating elements in one sauna heater. All heaters must be covered as a standard safety hazard precaution. Sunlighten provides non-toxic and highly emissive carbonized bamboo as a protective cover on our Solocarbon® heating technology, having our customer's ultimate comfort & safety in mind!

## Unique Design Combines Three Heaters in One

Solocarbon 3-in-1 heaters combine three distinct components within a single heating panel to provide near, mid, and far infrared at their peak wavelengths.

Sunlighten's patented Solocarbon heater coating produces high quality FIR heat – 99% effective in the 3-in-1 heater design! The materials used in their heater coating are FDA approved which ensures that it is non-toxic. It is also a more efficient heat source and consumes less energy.

A separate layer of Kapton® polyimide, a lightweight material used in space applications, can be heated independently to much higher temperatures in order to produce MIR wavelengths. And their patented LED technology produces consistent NIR wavelengths without extreme heat or light.

Heat sensors keep all wavelengths at a consistent output based on clinical research. The Solocarbon 3-in-1 heater provides controllable heating zones for the utmost personalization, comfort, and results.

Patent [US8737827B2](#)

Patent [US8588593B2](#)

## What is the Difference Between Near and Far Infrared?

To begin with, infrared heat is the invisible part of the sun's spectrum, which has the ability to gently and comfortably penetrate human tissue to produce a host of health benefits like boosting your immune system. Naturally occurring from the sun, it is the basis for all Sunlighten™ saunas. Infrared light also comes in several forms. Each form offers unique wellness perks that together provide a holistic approach to better mind and body. Learn about how near infrared differs from far infrared, and how each benefit you.

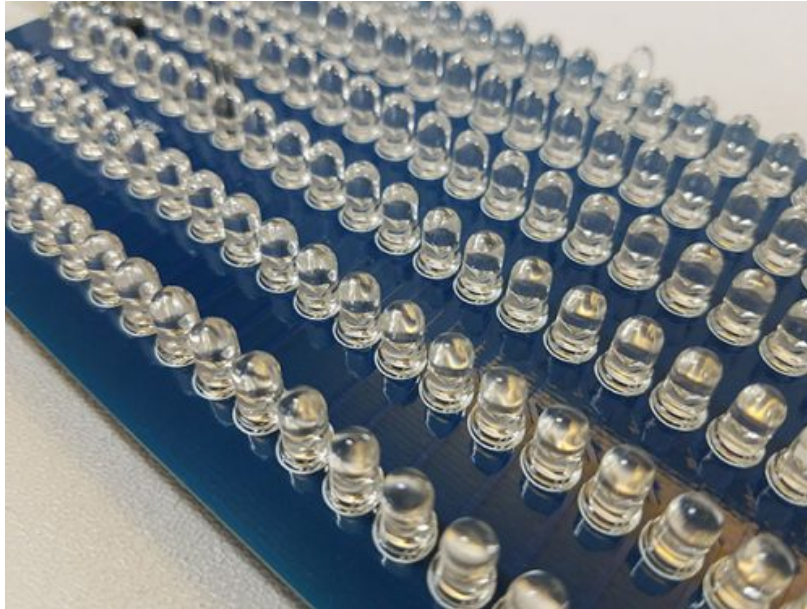
### Near Infrared

Near infrared technology used in Sunlighten Infrared Saunas is similar to the infrared used in cosmetic and healing devices. The LED technology they use allows their heaters to produce consistent near infrared without extreme heat or light, making it a safe option for near infrared use. Near infrared waves have a shorter frequency range and penetrate the epidermis layer of the skin. This is how near-infrared is able to impact your body at the cellular level, encouraging tissue growth, speeding up muscle recovery and strengthening your immune system.

### Far Infrared

Because far infrared sauna therapy heats the body directly rather than simply warming the air, it raises the core body temperature and produces a deep, detoxifying sweat at the cellular level, where most toxins reside. Your sweat then pushes out the toxins, cleansing your body and rejuvenating your skin. Far infrared also aids in blood pressure reduction and weight loss, along with a wide range of other health benefits

## The Infrared Spectrum



### Near Infrared

Near infrared (NIR) is the shortest infrared wavelength and penetrates the skin's surface more effectively than the other two. Scientific research shows that when delivered at the vital wavelength of 880nm without extreme heat or light, NIR promotes skin renewal, cell health, wound healing, and tissue growth.

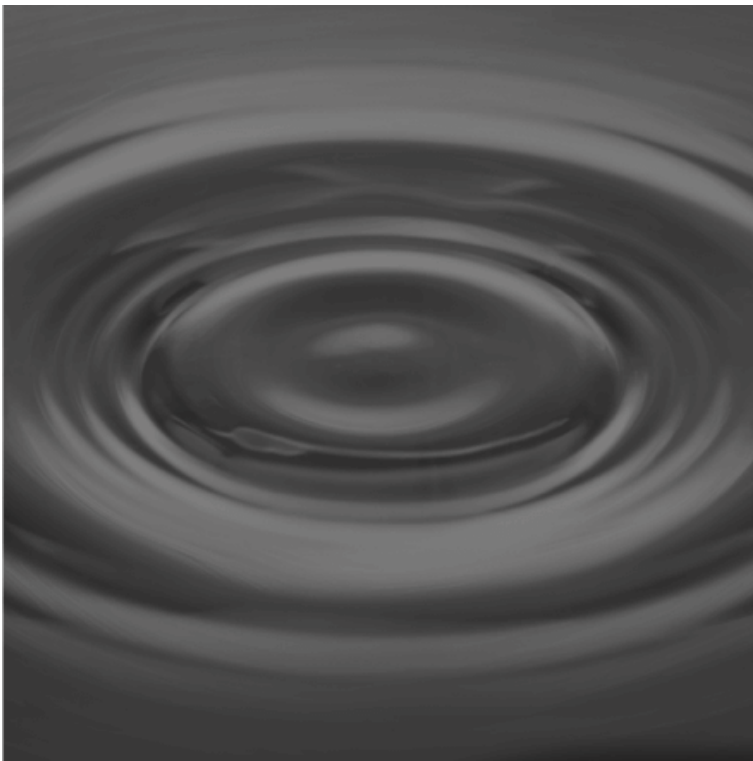
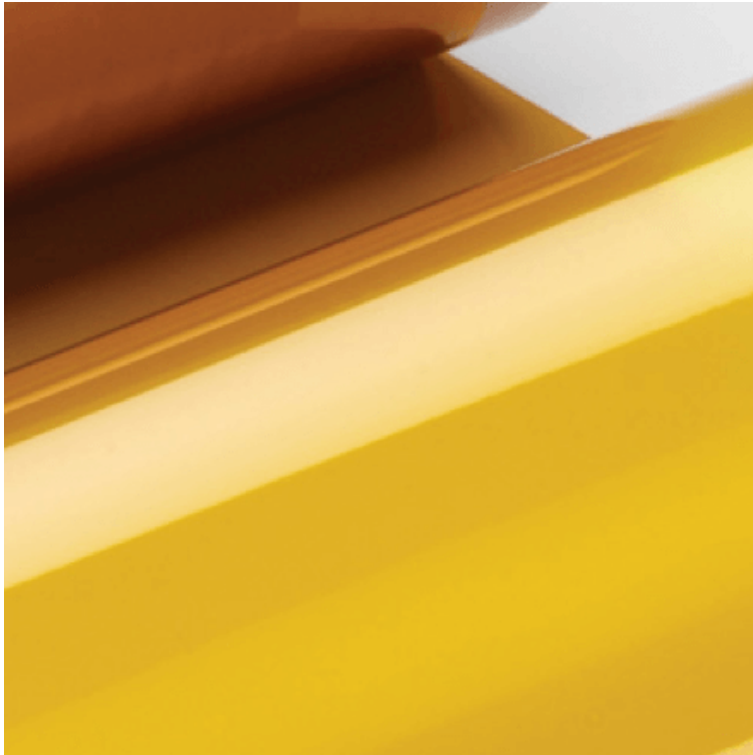
NIR heaters consisting of high-wattage halogen bulbs at extremely high temperatures are not comfortable or beneficial. In order to make NIR heat safe for saunas, Sunlighten used NASA research to develop a patented LED array that provides NIR at a singular wavelength with minimal variability and virtually undetectable heat and light.

LEDs are effective because they can trigger a natural photo-biochemical reaction (similar to how plants use chlorophyll to convert sunlight into plant tissue). Research from Dr. Harry Whelan, it takes a specific joule of NIR energy to deliver the wavelength needed to penetrate human tissue.

### Mid Infrared

Mid infrared (MIR) is a longer wavelength that can penetrate deeper into the body's soft tissue where inflammation occurs. MIR helps expand blood vessels and increases circulation, so more oxygen can reach injured areas of the body. This reduces pain and speeds the healing process.

To produce MIR, sauna heaters must be able to maintain a surface temperature of 250°C. Though many sauna companies claim to provide full spectrum, the polypropylene material used in their heaters actually melts at the high temperature required for MIR. We worked with engineers and scientists to overcome this obstacle by using a higher quality product – DuPont's Kapton® polyimide film—a high tech material made to tolerate the high heat required to produce MIR. Plus, since their full spectrum heaters are made up of three distinct heating elements, the MIR layer can be heated independently to a higher temperature than the FIR layer.



## Far Infrared

The longest wavelength, far infrared (FIR), reaches deepest into the body, where toxins are stored. By raising your core body temperature, FIR stimulates the sweat glands, resulting in a deep, detoxifying sweat that leaves you feeling revitalized. Plus, since sweating increases heart rate, cardiac output, and metabolic rate, you're also burning calories.

Sunlighten already achieved the most effective far infrared heater with their highly emissive Solocarbon heater coating. They've applied that same coating to their polyimide panel and discovered this application makes it 99% emissive! This is why Solocarbon panels are the only far infrared heaters clinically shown to raise core body temperature nearly 3° for the most detoxifying sweat, lower systolic and diastolic blood pressure and aid in weight loss.

## Ongoing Innovation for Your Healthy Lifestyle

Sunlighten was built on innovation. Their patented Solocarbon far infrared heater technology revolutionized the sauna industry in 2002. In 2010, they rewrote the rules again when they launched their Solocarbon 3-in-1 infrared sauna. It's still the only sauna technology that delivers near, mid, and far infrared heat at the precise levels needed to provide specific results, based on 56 research studies. They've taken sauna therapy to the next level with NASA-inspired, near infrared LEDs, and pre-set wellness programs for detoxification, cardio, pain relief, relaxation, weight loss, and anti-aging.

Though they were once called Sunlight Saunas, today they're Sunlighten, a wellness company committed to building the world's best saunas and to developing a diverse range of wellness products that will empower you to live a more vital, healthy life for years to come.

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1. Harry T. Whelan, Ellen V. Buchmann, Noel T. Whelan, Scott G. Turner, Vita Cevenini, Helen Stinson, Ron Ignatius, Todd Martin, Joan Cwiklinski, Glenn A. Meyer, Brian Hodgson Lisa Gould, Mary Kane, Gina Chen , James Caviness. NASA Light Emitting Diode Medical Applications From Deep Space to Deep Sea. CP552, Space Technology and Applications International Forum-2001, edited by M. S. El-Genk. Copyright 2001 American Institute of Physics 1-56396-980-7/01.
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## Health Benefits of Using a Sauna

### 10. Health Benefits of Infrared Sauna Detox

Sweating is good for you. Sweating is one of the body's safest and most natural ways to heal and maintain good health. And that's why every Sunlighten detox sauna is specifically designed to promote a deep, healthy and natural detoxifying sweat.

"Detoxification is important because it strengthens the body's immune system and helps the body's biochemical processes function efficiently so that we are better able to digest the nutrients in our foods. Detoxification has also been shown to be helpful with colitis, chronic fatigue, fibromyalgia, auto-immune disease, immune deficiency states, autism, ADD and ADHD." – Dr. Rachel West

### 11. Sauna detox helps you sweat the small stuff.

Did you know that the practice of using sauna detox has been widely embraced as a healthy treatment in alternative medicine? As the world moves toward more natural and self-directed treatments, sauna detoxification is getting more and more attention.

Why? Well, the leading principle of sauna detoxification states that the build-up of toxic substances can lead to a host of common illnesses. Ridding the body of these toxins through a natural sauna detox may help relieve symptoms, prevent future illness and increase overall health and vitality.

### 12. Detoxification isn't new. Just better.

Researchers have long told us how the body sweats out toxic substances, including heavy metals. As long as you maintain proper hydration, the more you safely sweat, the more toxins you'll expel from your body. And what is one of the safest and most effective methods for inducing a detoxifying sweat? A sauna, of course. In sauna detox, your body sweats out numerous toxins through pores. But not all sweats are the same; and neither are all saunas.

It is believed that Sunlighten saunas are seven times more effective than a traditional sauna. It is commonly thought that sweat from traditional saunas is 95 to 97% water with salt making up a part of the rest. Dr. Dietrich Klinghardt combining the use of far infrared saunas with the chelating agent DMPS in a heavy metal detox protocol. Far infrared saunas are believed to be more effective in moving toxins through the skin than traditional saunas because in a far infrared sauna only 80 to 85% of the sweat is water with the non-water portion being cholesterol, fat-soluble toxins, toxic heavy metals, sulfuric acid, sodium, ammonia and uric acid.<sup>1</sup>

Sunlighten saunas are highly effective for detoxification because of their highly-efficient and patented Solocarbon far infrared heating technology – the only technology proven to raise core body temperature by two-to-three degrees. Rather than simply heating the ambient air to draw out toxins, our sauna detox will heat your core to expel them.

As a result, regular usage of a Sunlighten sauna detox will provide a truly deep, productive sweat where toxins reside, at the cellular level.

### 13. Core Body Temperature Study

This data shows the results of one person's body temperatures checked every minute for 30 minutes while using a Sunlight Sauna Solo sauna. Notice the highlighted column that displays core temperature. A rise in core temperature is vital to achieve the deepest detoxifying sweat. As you can see, the subject's core temperature increased almost 3 degrees in a 30-minute session in the Solo and remained elevated for another 30 minutes after the session.

#### SOLO TEST RESULTS – REFERENCE TO PROTOCOL

		Date	05/18/2001		
		Time	16:15		
		Test Number	6		
		Test / Room Temperature	72.14		
		Test / Room Humidity	79 %		
<b>Test Subject Statistics</b>					
Name		Male / Female	Age	Weight	Height
Subject 1		M	26	145.72 Lbs	68.89 In
<b>Test Subject Static Readings / Prior To Tests</b>					
Core Body - Anal		Blood Pressure		Pulse	SpO <sub>2</sub>
Temperature	Systolic – Top No.	Diastolic - Bottom No.		Rate	Percent
97.70	130	83		73	97
<b>Test Subject Static Readings - Skin Surface Temperature / Prior to Tests</b>					
Forehead	Chest Left Side	Chest Right Side	Right Arm	Left Ankle	
91.22	86.36	88.16	89.24	90.14	

#### VERIFIED TESTS BY CATEGORY – SOLO TURNED ON – TEST SUBJECT INSIDE

SOLO Temperature Setting Circle Setting Used For Tests		No. 1 110 Deg. F					No. 5 130 Deg. F		No. 9 150 Deg. F	
Time	Temperature Degrees F						Blood Pressure		Pulse	SpO <sub>2</sub>
Minute	Head	Chest Left	Chest Right	Right Arm	Left Ankle	Core Temp	Systolic Top	Diastolic Bottom	Rate	Percent
1	91.22	92.12	91.94	89.96	93.02	97.70	117	63	74	98
2	91.22	92.66	93.20	90.68	94.28	97.70	106	78	70	98
3	91.22	93.20	94.28	91.04	95.00	97.88	114	61	73	98
4	91.22	93.20	95.18	91.58	95.72	97.88	114	62	77	98
5	91.22	93.56	96.08	91.76	96.26	98.24	114	60	66	98
6	91.40	94.10	96.98	92.48	97.16	98.24	112	61	67	97
7	91.22	94.28	97.70	92.66	97.34	98.24	112	60	63	98
8	91.40	93.74	98.24	92.66	97.52	98.24	115	59	62	98
9	91.22	93.74	98.78	92.84	98.24	98.42	115	61	62	97
10	91.22	93.74	98.96	93.02	98.42	98.42	116	60	63	98
11	91.40	95.00	99.32	93.38	98.78	98.60	124	80	70	98
12	91.40	95.72	99.50	93.38	98.78	98.96	112	58	63	98
13	91.40	95.72	99.32	93.38	99.50	98.96	115	57	73	97
14	91.58	94.82	98.42	93.02	99.14	98.78	115	55	69	98
15	91.40	95.54	98.06	92.12	99.32	98.78	115	60	75	98
16	90.86	95.54	97.70	91.22	98.78	99.32	115	59	76	99
17	90.50	96.08	98.06	91.04	98.60	99.14	116	57	78	96
18	90.86	95.90	97.70	91.40	98.60	99.14	114	59	78	98
19	90.86	96.26	97.88	91.76	98.60	99.50	123	56	78	99
20	91.04	96.80	98.06	91.76	98.78	99.50	117	79	78	99
21	90.32	96.62	98.06	91.76	98.60	99.86	115	58	85	98
22	89.96	96.26	98.06	91.58	98.96	99.68	117	56	87	99
23	90.14	95.90	97.70	91.58	98.96	99.50	115	55	85	98
24	89.96	95.72	97.70	91.40	99.14	99.68	117	56	83	98
25	90.14	95.90	97.88	91.76	99.14	99.68	117	56	81	97
26	89.06	95.54	97.70	91.04	98.78	99.86	116	56	80	99
27	89.24	96.26	98.24	91.40	98.78	100.04	117	56	83	98
28	89.60	98.42	98.78	92.12	99.14	100.04	112	58	83	98
29	89.24	100.04	99.14	91.76	98.96	100.22	117	60	87	98
30	89.60	100.58	99.14	90.86	98.96	100.32	114	58	82	98

SEE NEXT PAGE FOR COOL DOWN SESSION / RELATED READINGS BY CATEGORY

TEST NO. Subject 1 – Test 6

**VERIFIED TESTS BY CATEGORY – SOLO TURNED OFF – SUBJECT STILL INSIDE**

**COOL DOWN SESSION**

Test Results / Timed Measurements										
Time	Temperature Degrees F						Blood Pressure		Pulse	SpO <sub>2</sub>
Minute	Head	Chest Left	Chest Right	Right Arm	Leg Ankle	Core Temp	Systolic Top	Diastolic Bottom	Rate	Percent
31	88.16	100.40	99.50	90.14	99.14	100.22	139	90	88	98
32	88.16	99.32	98.96	87.98	98.78	100.22	116	60	85	98
33	89.42	97.70	98.60	90.86	98.42	100.04	112	59	80	99
34	89.60	97.52	97.88	90.86	97.70	100.22	115	62	79	99
35	89.06	97.52	97.52	90.32	97.34	100.40	111	56	77	98
36	88.34	97.34	97.52	89.60	97.16	100.40	117	56	81	98
37	87.80	97.16	97.52	89.06	97.16	100.04	116	56	77	98
38	87.98	97.16	97.34	89.24	96.98	100.04	115	60	82	98
39	87.44	96.62	97.34	87.62	96.62	99.86	115	59	81	98
40	88.34	96.44	96.98	87.62	96.80	100.22	112	56	79	98
41	87.98	96.26	97.16	87.62	96.44	100.04	117	56	77	97
42	87.44	95.90	96.80	87.62	96.08	99.68	117	55	81	97
43	87.44	95.90	96.44	89.96	96.08	99.68	115	55	82	97
44	87.62	96.26	96.62	91.22	95.72	99.86	113	79	75	98
45	87.26	95.18	95.90	91.76	95.36	99.68	117	75	85	98
46	86.36	95.72	95.72	89.60	95.18	99.68	115	56	76	97
47	86.36	95.72	95.54	88.16	95.18	99.50	111	55	74	97
48	85.26	95.72	95.18	89.42	95.54	99.32	112	57	85	97
49	85.82	95.54	94.64	86.36	95.36	99.32	113	58	75	96
50	86.18	95.54	94.46	90.14	95.18	99.50	111	55	77	98
51	84.92	95.72	93.92	88.88	95.00	99.14	115	56	72	99
52	84.92	95.18	93.56	89.42	95.00	98.96	113	57	72	98
53	84.56	95.00	93.74	89.60	94.64	98.78	116	57	75	98
54	85.46	93.38	93.56	91.40	94.64	98.96	117	62	70	97
55	85.10	94.28	93.56	92.84	94.46	98.78	113	61	70	97
56	84.92	94.28	93.38	93.74	94.46	98.60	114	62	70	98
57	85.64	94.28	93.20	93.92	94.64	98.42	112	73	78	98
58	85.28	94.64	93.20	94.82	94.46	98.24	115	58	73	97
59	84.56	94.10	93.02	94.10	94.28	97.88	118	60	76	98
60	85.10	93.92	92.84	94.46	93.92	97.88	115	62	70	98

Test Performed By Golden Telecommunications Company., Ltd Date 05/18/2001

Approved By Mr. MS Wu Date 05/19/2001

Remarks:  
Left and Right arm outside Solo during the test.

Conversion from Metric  
by Keith V. Ward / Telco Intercontinental Corporation.

## 4 Steps to Sauna Detox

Now you know the health benefits of sauna detoxification, but do you know how to use an infrared sauna to properly detox? While every body is different, Sunlighten have created a helpful guide to detoxification using specific Sunlighten Solocarbon far infrared sauna technology.

### Step 1: Hydrate

Each day you are planning to use your Sunlighten Sauna, make sure your water intake increases. While the far infrared sauna detoxification isn't harsh, you are still sweating – some much more than others. The sweat produced in a far infrared sauna is 80 – 85% water, so it is important that before, during, and after your sauna detox session, you drink plenty of water to rehydrate.

## **Step 2: Set Time Limits**

The amount of time spent in a sauna detox session may vary depending upon your tolerance and daily activity level. To get your body accustomed to infrared therapy, start with 10-15 minute sessions every other day. Gradually increase towards 40 minute daily sessions in the optimal temperature range. Listen to your body. Be aware of excessive detoxifying. If you begin to feel symptoms such as nausea, fatigue, or flu-like symptoms during your sauna session, discontinue use.

## **Step 3: Find a Comfortable Temperature**

Preheat sauna and begin session when your sauna reaches 100°F. The optimal sauna experience occurs between 100° and 130°F. There is a detoxification program that combines far and mid infrared, starting at a high intensity to increase core temperature then reduces to a low, comfortable intensity level.

## **Step 4: Rinse Off**

**After each sauna detoxification session, dry off with a towel. It is best to let your body cool off naturally while still burning calories. Finish it off with a cool glass of water and you are ready to take on the day.**

## **References:**

*Detoxification Through the Skin by Mark Sircus Ac., OMD March 6th, 2005*

## Boost Your Immune System Naturally

Stay healthy with the natural preventive properties of Sunlighten's patented heating technology, which aids in cell health, muscle recovery and overall immunity defense. Sunlighten infrared therapy stimulates the circulatory system, causing the heart to beat more vigorously and blood vessels to dilate, which help cleanse the circulatory system and more fully oxygenate the body's cells. Better blood circulation means more toxins flow from the cellular level to the skin's surface to improve cell health, aid in muscle recovery and strengthen the immune system.

### Near Infrared for Immunity & Cell Health

Sunlighten's research-backed near infrared heating technology can strengthen the immune system. In fact, a NASA study showed this same near infrared therapy, delivered by LEDs deep into body tissue, can quadruple cell health and tissue growth<sup>1</sup>.

Several studies have shown that LEDs (like those found in the Sunlighten saunas) stimulate white blood cell production and collagen growth by increasing energy at the cellular level.

A study done at the Medical College of Wisconsin demonstrated that LED-produced near infrared (NIR) helps promote cell health and regeneration<sup>2</sup>. The LEDs in our Solocarbon 3-in-1<sup>®</sup> heaters produce infrared in this same range.



A study from The American Society for Biochemistry and Molecular Biology concluded that LED near infrared (NIR) restores enzyme activity and reduces cell death by half<sup>2</sup>.

*"Regardless of the extent of the injury, someone who regularly uses this type of sauna will recover faster...It doesn't add additional stress to the body or the injury. It actually works with the body to heal."* -Dr. Jeffrey Spencer – University of Southern California

According to The Doctor's Prescription for Health Living, Sunlighten's infrared heat is one of the best treatments for sprains, strains, muscle spasms, and other injuries associated with sports because it works by penetrating joints, muscles and tissues, speeding oxygen flow and increasing circulation.

### **Sunlighten Saunas Are Shown to Stabilize Blood Pressure**

Only Sunlighten saunas have been clinically determined to provide one of the best, natural ways to lower blood pressure. In a 2005 clinical study by the University of Missouri Kansas City, Sunlighten's Solocarbon far infrared heaters were shown to lower blood pressure through a program of 30 minute infrared sauna session 3 times per week. The study concluded that Sunlighten infrared sauna therapy dilated blood vessels and reduced the volume of their inner lining, thus increasing circulation to promote healthy blood pressure.<sup>1</sup>

Only Sunlighten saunas are backed by clinical research that shows a reduction in systolic and diastolic blood pressure. Both are key factors in maintaining a healthy heart.

As part of a blood pressure therapy program, regular use of a Sunlighten infrared sauna is good for your heart! In the U.S. alone, one in three adults suffers from heart disease, stroke or some other form of cardiovascular disease in their lifetime. High blood pressure increases your risk of getting heart disease, kidney disease or serious stroke.

## **A STUDY OF THE HEALTH BENEFITS OF FAR INFRARED SAUNA THERAPY**

Conducted by the University of Missouri, Kansas City  
Becky Edwards, M.D., Heather Kort D.O. Faculty Staff  
Advisor: Dr. John Foxworth, PharmD  
Purpose

### **RESULTS**

The far infrared sauna did lower both systolic and diastolic blood pressure. The diastolic blood pressure in the far infrared group was statistically significant with a p value of .001. In the far infrared group the systolic blood pressure decreased from an average of 130.5 before the study to 124 at the completion of the study.

### **REPEATED THERMAL THERAPY IMPROVES IMPAIRED VASCULAR ENDOTHELIAL FUNCTION IN PATIENTS WITH CORONARY RISK FACTORS**

Takasaki, Yutaka Otsuji, Shinichi Minagoe, Yoshifumi Toyama and Chuwa Tei Masakazu Imamura, Sadatoshi Biro, Takashi Kihara, Shiro Yoshifuku, Kunitsugu

### **CONCLUSION**

Repeated sauna treatment improves impaired vascular endothelial function in the setting of coronary risk factors, suggesting a therapeutic role for sauna treatment in patients with risk factors for atherosclerosis. (J Am Coll Cardiol 2001;38:1083– 8) © 2001 by the American College of Cardiology  
Sunlighten empowering wellness

**A Study of the Health Benefits of Far Infrared Sauna Therapy Conducted by the University of Missouri, Kansas City, Becky Edwards, M.D., Heather Kort D.O Faculty Staff Advisor: Dr. John Foxworth, Pharm D  
Overview by Sunlight Saunas**

**Purpose**

Evaluate the effects of far infrared sauna therapy on blood pressure. Change in blood pressure will be the primary outcome measure.

**Materials and Methods**

- Subjects were randomly assigned to receive sauna sessions in either the far infrared sauna or a control sauna that emitted heat, however not far infrared heat. The saunas looked identical. The subjects had 30-minute sauna session 3 days a week for 6 weeks at Sunlight Saunas Corporate Headquarters in Lenexa, Kansas. Study conducted June and July 2005.

- Subjects: Included generally healthy subjects between the ages of 21-65 years.

- Exclusion criteria were as follows:

  - Anyone on nitrates or prior heart attack or coronary artery disease.

  - Pregnancy (urine pregnancy test will be performed on any woman with child-bearing potential)

  - Lupus

  - MS

  - Hemophilia

  - Sickle cell disease

  - Weight > 220 pounds

  - Breast Implants

  - Changes in medication in the last month or during our study

  - Already using saunas

- A power analysis was performed to determine the number of subjects necessary to detect a statistically significant change in the primary outcome measure, mean blood pressure; alpha = 0.05 power=0.80.

- Descriptive statistics were used to summarize study measures. Student's tests were used to compare the groups with regard to mean change in BP, pulse, weight, waist circumference, total cholesterol, LDL and urinary concentrations of mercury.

- At all sauna sessions a registered nurse measured and record the subject's blood pressure, pulse, weight, and waist circumference. The subject rated their pain on a standard pain scale. At the first and last sauna session the nurse drew blood for a fasting lipid profile. Also, the subjects provided a 12-hour urine collection at the first and last visit for analysis of mercury, lead, and cadmium.

## Results

- Blood pressure: The far infrared sauna did lower both systolic and diastolic blood pressure. The diastolic blood pressure in the far infrared group was statistically significant with a p value of .001. In the far infrared group the systolic blood pressure decreased from an average of 130.5 before the study to 124 at the completion of the study.

Additionally, a Japanese study published in the October 2008 issue of The Journal of Cardiology examined the clinical effectiveness and safety of infrared blood pressure therapy, as compared to standard therapies for patients with chronic heart failure. The report concluded that far-infrared sauna therapy is both safe and effective at improving clinical symptoms and cardiac function as well as decreasing cardiac size in chronic heart failure patients. Repeated infrared sauna treatments improved impaired blood vessel functions in patients with high blood pressure, diabetes and high cholesterol. This suggests a preventive role for infrared sauna use for arteriosclerosis. [2](#)

## Tips to Lowering Blood Pressure in an Infrared Sauna

When using an infrared sauna to lower blood pressure, there are a few tips and tricks to make the most of each session. While everybody is different, Sunlighten have created a helpful guide using Sunlighten Solocarbon far infrared sauna technology.

### Step 1: Hydrate

Each day you are planning to use your Sunlighten Sauna, make sure your water intake increases. While their far infrared sauna detoxification isn't harsh, you are still sweating – some much more than others. The sweat produced in a far infrared sauna is 80 – 85% water, so it is important that before, during, and after your sauna detox session, you drink plenty of water to rehydrate.

### Step 2: Set Time Limits

While infrared saunas are not harsh experiences like traditional saunas, it's best to begin with short sessions until your body has time to adjust. Start with a few minutes at a time, then slowly work up to longer sessions. The optimal time to work towards is 40 minutes.

### Step 3: Find the Right Setting

You have the option of adjusting the type and intensity of infrared heat. There are seven wellness pre-sets, once specifically for cardiovascular therapy. This setting uses a blend of near, mid, and far infrared that begins at high intensity to get your heart rate up, then lowers to sustain that rate.

### Step 4: Supplement Mineral Loss

No matter what your infrared sauna session entails, you are working up a healthy sweat. Within this sweat are some minerals your body needs to be its healthiest. With frequent use of infrared saunas comes the need to up your mineral intake with supplements. Speak with your doctor or nutritionist to ensure proper type and dosage of supplements.



## References:

1. Becky Edwards, M.D., Heather Kort D.O, Faculty Staff Advisor: Dr. John Foxworth, PharmD. A Study of the Health Benefits of Far Infrared Sauna Therapy – Conducted by the University of Missouri, Kansas City, 2005.
2. Dr. Masakazu Imamura, MD, et al. Repeated Thermal Therapy Improves Impaired Vascular Endothelial Function in Patients With Coronary Risk Factors. Vol. 38, No. 4, 2001. Journal of American College of Cardiology: pp 1083-1088.

## How to Improve Circulation When You Take a Sauna

One sure way to improve circulation in your Sunlighten infrared sauna is to sit back and relax! Just by taking an infrared sauna, you are already improving circulation. Want to help your body even more? Use these helpful tips to naturally increase blood circulation while taking a sauna.

### 1. Stretch While in the Sauna

During your Sunlighten Sauna session, perform stretches or a Pilates routine in order to make the most of your increased blood circulation. According to one study, this could give you better flexibility, particularly in the hips, hamstrings and lower back.

### 2. Take a Sauna after Working Out

Not only will fatigued muscles and a tired body appreciate the relaxation of a sauna session after a workout, but the improved blood circulation you experience in a sauna will help ease the aches and pains, loosen the tight spots and increase the rate at which your muscles heal.

### 3. Use Pure Sweat Cream

The Sunlighten Pure Sweat Cream triples the amount of sweating, therefore increasing blood circulation while also enhancing vasodilatation, effectively lowering your blood pressure.

### 4. Take Advantage of the Ergonomic Bench

The Sunlighten Sauna offers a chiropractic-consulting bench design that reduces stress on the body and allows for natural improved blood circulation while taking a sauna. So when you are not working out, just sit back and let the chair do the work. Our Signature sauna benches are also 10 percent deeper than the standard for the ultimate comfort and are removable to create room for stretching.

## Sauna Stretch Summary

- Participants (n = 12) completed a protocol of rest for 20 minutes and stretching for 10 minutes as follows:
  - In a typical training room environment – 70 degrees, 50% humidity
  - In a full spectrum infrared sauna using mid and far infrared wavelengths
    - Each participant completed both stretching protocols in random order with 48 hours separating the sessions.
  
- **Stretches:**
  - Single leg hamstrings stretch seated holding each for 20 seconds 10 reps each leg.
  - Single leg hamstring stretches standing and holding each for 20 seconds 10 reps each leg.
  - Seated double leg hamstring and low back stretch holding each for 20 seconds 10 reps

## Changes in acute low-back and hamstring flexibility/ROM:

### Typical environment:

Right Leg/Hamstring – Change	= +.64 inches
Left Leg/Hamstring – Change	= +.74 inches
Seated Low back/Hamstrings – Change	= +1.0 inch(es)

### Infrared environment:

Right Leg/Hamstring – Change	= +1.95 inches
Left Leg/Hamstring – Change	= +1.45 inches
Seated Lowback/Hamstrings – Change	= +2.15 inches

### Results:

The study showed doing the same stretching routine while in the sauna versus in a conventional environment yields superior acute changes in flexibility. Both situations enhance range of motion but doing the stretch routine while exposed to the sauna elicits higher/greater/more pronounced changes in acute flexibility in the hip/hamstrings and low back. Benefits to the increased range of motion include joint mobility, less friction in the joints, enabling of joint function to diminish stiffness and joint relaxation.

### References

1. Dr. Masakazu Imamura, MD, et al. *Repeated Thermal Therapy Improves Impaired Vascular Endothelial Function in Patients With Coronary Risk Factors. Vol. 38, No. 4, 2001. Journal of American College of Cardiology: pp 1083-1088.*

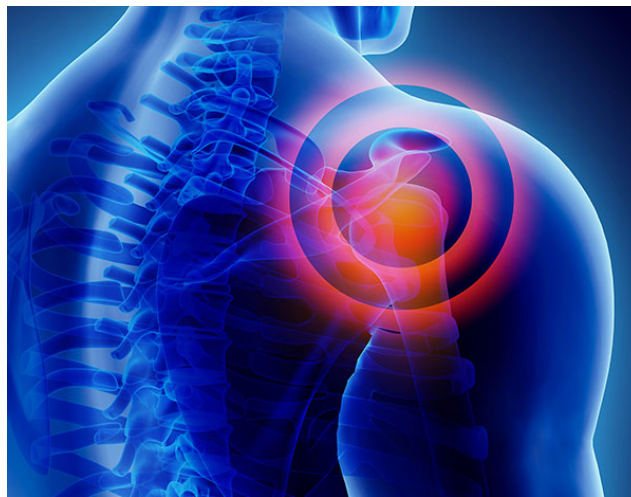
## Infrared Sauna Therapy for Natural Pain Relief

*One of the most compelling reasons to purchase a Sunlighten sauna is the natural pain relief associated with infrared sauna therapy.*

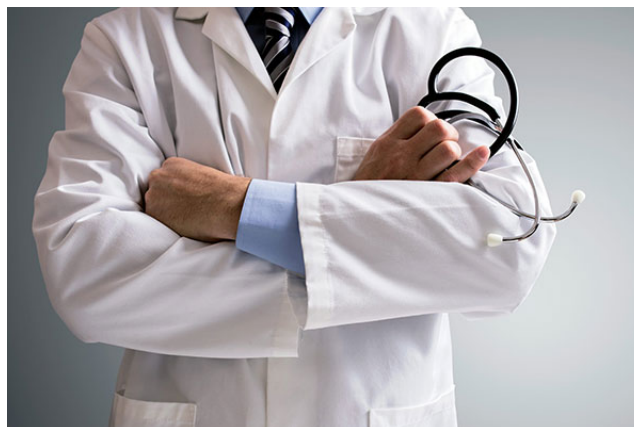
Sunlighten infrared sauna owners love to talk about the pain relief properties of their sauna sessions. You too can toss the pain pills and step into one of our healing infrared sanctuaries to relieve tension and relax muscles. Sunlighten infrared sauna heat works by penetrating joints, muscles and tissues, increasing circulation and speeding oxygen flow. By reducing soreness on nerve endings, our infrared heat reduces muscle spasms and helps the body heal itself naturally.

For years, doctors have recommended Sunlighten saunas because of proven relief from sports injury, chronic fatigue syndrome, fibromyalgia, arthritis and other chronic pain conditions.

*Infrared wavelengths penetrate the body to create heat, which creates profound therapeutic benefits. They increase blood flow to the muscles, delivering more concentrated oxygen, which creates more energy to heal. – Dr. Jeffrey Spencer – University of Southern California*



### Studies on Sauna Pain Relief



A 2013 study conducted at the Auburn University at Montgomery compared stretching in a Sunlighten Sauna compared to a typical training room environment. Participants completed a series of hamstring stretches in random order with 48 hours separating the sessions. Results showed that acute flexibility increased up to 3x in the Sauna than without! Benefits to the increased range of motion include joint mobility, less friction in the joints, enabling of joint function to diminish stiffness and joint relaxation.

A recent Japanese study published in the journal, Internal Medicine, showed that chronic pain patients experienced a significant reduction in pain levels (nearly 70%) after the first session of infrared sauna therapy. Pain scores also decreased significantly and remained low throughout the observation period. Researchers concluded that infrared heat therapy is effective for chronic pain treatment.<sup>1</sup>

Additionally, in a NASA study done by Dr. Whelan with near-infrared heat, determined that LED technology allows for deep penetration of tissue and increased cell growth from the inside.<sup>2</sup> Sunlighten – with its patented Solocarbon 3-in-1<sup>®</sup> heating technology – is the only sauna on the market that offers LED-based near infrared heat at this proven level.

Finally, a 2003 study conducted by the Department of Dermatology and Institute of Medical Research showed that use of near-infrared heat therapy helped the production of white blood cells to alleviate inflammation and reduce swelling, two key factors in easing bodily pain.<sup>3</sup> Again, only Sunlighten's heating technology is scientifically proven to deliver these types and levels of therapeutic near-infrared wavelengths.

### **Find Your Personal Pain Relief**

Infrared saunas have resulted in effective in pain management therapy for many different ailments. Here are just some of the conditions in which infrared sauna therapy has been successfully used for pain relief.

**Peripheral Arterial Disease (PAD)** Those who suffer from PAD can experience severe leg pain caused by reduced blood flow and oxygen to the lower legs, which can get worse with walking. But Japanese researchers found that infrared sauna sessions of just 15 minutes a day significantly lowered pain, and patients were able to walk twice as far without pain.<sup>4</sup>

**Rheumatoid Arthritis and Ankylosing Spondylitis** Those who suffer from autoimmune conditions such as rheumatoid arthritis and ankylosing spondylitis often struggle with pain management that comes with hefty side effects. But with sauna therapy, pain relief can be found without negative outcomes. A study has shown that while in the sauna, all patients with these conditions felt significantly better, and at the end of the study, those with rheumatoid arthritis showed improvements in pain and fatigue while not in the sauna.<sup>4</sup>

**Fibromyalgia** Fibromyalgia causes pain throughout the entire body, with particular areas of sensitivity. Studies have shown that not only does infrared sauna use help with natural pain relief during treatment, but even months after ending sauna treatment the pain was still significantly lower.<sup>4</sup>

**Emotional Pain** Physical pain is often given much more credit in our society than pain caused by emotion. But medical doctors have begun to understand the real physiological impact of psychological issues. Infrared sauna therapy works for the pain that can't be seen, too. In the same study of chronic

pain patients, researchers also found that patients had a statistically lower anger level compared to those not in the sauna group. <sup>4</sup>

**Take control of your pain with the natural healing of infrared saunas for pain relief.**

**References:**

1. *Internal Medicine (Tokyo) Aug 15, 2008* by Matsushita K, Masuda A, Tei C. The First Department of Internal Medicine, Kagoshima University Hospital, Kagoshima, Japan.
2. Whelan et al; *The NASA Light-Emitting Diode Medical Program- Progress in Space Flight and Terrestrial Applications. CP504, Space Technology and Applications International Forum-2000*, edited by M. S. El-Genk. Copyright 2000 American Institute of Physics I-56396-9 19-X/00.
3. Lidija Kandolf-Sekulovic, Milena Kataranovski, Milos D. Pavlovic. *Immunomodulatory Effects of Low-Intensity Near-Infrared Laser Irradiation on Contact Hypersensitivity Reaction. Photodermatol Photoimmunol Photomed* 2003; 19: pp 203–212, Blackwell Munksgaard.
4. UHN Staff. "New Hope for Chronic Pain Sufferers: Infrared Sauna Therapy Shows Impressive Pain-Reducing Results." *University Health News*, [www.universityhealthnews.com/daily/pain/new-hope-for-chronic-pain-sufferers-infrared-sauna-therapy-shows-impressive-pain-reducing-results](http://www.universityhealthnews.com/daily/pain/new-hope-for-chronic-pain-sufferers-infrared-sauna-therapy-shows-impressive-pain-reducing-results). Accessed 7 January 2017.

## Infrared Sauna Relaxation and Stress Relief

*Sunlighten saunas have been designed with the utmost in comfort for greater relaxation and stress – reduction. Relaxation is more important to health than most people realize. Stress impacts not just the mind but the body, as well.*

Studies show that high levels of stress have great impact on the brain. From memory problems to anxiety to learning difficulties, the effects of stress on the mind are immense. Neuroscientists have shown that chronic stress can even cause differences in grey and white matter in the brain, as well as the size and connectivity of the amygdala. High levels of stress can even impact the number of neurons found in the brain.

Relax and reduce mental stress with Sunlighten™. Their infrared therapy soothes your mind by enveloping your body in relaxing warmth. Their saunas are designed for maximum comfort, allowing you to not only loosen your body, but loosen your mind. Practicing mindful meditation while in a sauna therapy session can also help with mental stress reduction. Alone time is maximized with a sauna therapy session, giving you an opportunity to reflect and move on from the stressors of the day.



### Stress on the Body

The American Institute of Stress estimates that 75 to 90% of all visits to primary care physicians are for stress-related problems. Long-term stress is the cause of countless physiological effects on the body, including increased blood pressure, weight gain and weakening of the immune system.

According to New York Times best-selling author and fitness expert Jorge Cruise – as well as many other health professionals – the more stressed you are, the more cortisol your body produces. Cortisol is a “fight or flight” hormone made in the adrenal glands that raises heart rate and blood pressure and leads to the deposit of excess calories in the midsection.

There’s a simple way to reduce stress! Scientific evidence shows that infrared sauna therapy helps the body maintain healthy levels of cortisol. While cortisol levels stay the same or rise slightly during a sauna therapy session, they drop immediately afterward. In fact, Sunlighten saunas have been clinically shown to reduce both systolic and diastolic blood pressure with regular use.

## **Relax and Reduce Stress with Sunlighten**

Through the use of cutting-edge Solocarbon® heating technology, Sunlighten saunas deliver the most therapeutic infrared sauna heat per square inch (up to 99% efficient), so that you can be enveloped in soothing warmth to help you relieve stress, ease your muscles and fully relax. And with the inclusion of our exclusive SO Sound acoustic vibrational therapy, you won't be able to find a more effective combination infrared sauna heat and musical massage to induce deep relaxation and tension relief.

Sunlighten saunas are guaranteed to help you relax in natural comfort with an invigorating deep tissue sweat that will have you feeling fully refreshed after every sauna session.



## Skin Purification and Rejuvenation

*As part of a sauna skin therapy program, Sunlighten infrared saunas help restore skin to a youthful appearance.*

Forego expensive cosmetic treatments that may have limited effects or questionable long-term safety. Instead, rejuvenate your skin while also receiving all of the other health benefits associated with Sunlighten's leading infrared sauna therapy.

A study published in The Journal of Cosmetic and Laser Therapy showed significant improvements in skin appearance after just 12 weeks of sauna skin therapy using near-infrared technology. Participants experienced a reduction in wrinkles and crow's feet, as well as improved overall skin tone, including softness, smoothness, elasticity, clarity and firmness.<sup>4</sup> Sunlighten's Solocarbon 3-in-1<sup>®</sup> is the only infrared sauna heater on the market with LED near-infrared light therapy! In fact, it comes with an anti-aging program that is designed from this study!

### The Complete Picture of Sauna Skin Benefits

3-in-1 infrared sauna skin therapy offers a well-rounded approach to skin care with near infrared LED technology. Discover everything infrared saunas can do to rejuvenate and purify your skin and help keep it looking healthy and happy.

#### Acne

Infrared saunas may not only improve the appearance of acne scarring, but they may actually help reduce acne in the first place. Typical acne is caused by a build-up of oil on the skin, and if you produce a lot of oil, that can lead to constant breakouts. Infrared saunas cause you to sweat from infrared heat – not actual heat – which can help clean out those clogged pores. When a sauna session is complete, a quick face wash ensures the unclogged pores do not clog up again.

#### Skin Detoxification

Infrared saunas are clinically proven to reach deeper levels into your skin, effectively removing toxins such as heavy metals. Our Solocarbon technology heats your body to the core, pulling out toxins that can clog your pores and lead to a host of health issues beyond just within your skin.

#### Tone and Texture

In a study done in 2006, doctors looked at the impact of infrared on collagen and elastin in our skin, two of the most important ingredients to healthy skin. They found that both collagen and elastin increased after exposure to infrared, and all patients included in the study reported enhanced skin texture, less roughness, and improvement in colour.

## The Infrared Sauna Skin Therapy Regimen

**Sauna skin therapy works! Our customers have spoken.**

**Sauna skin therapy is essential to well-toned, healthy, great-looking skin.**

“As so many people reported, my Sunlighten sauna has changed the character of my skin. It is much more supple without having to add moisturizers. After just two sessions a girlfriend asked me what I been doing because my face looked so much smoother and younger (I have a lot of acne scarring, and it seems to have softened the appearance). Delighted and will continue to use!

*Alyne H*

*Satisfied Customer*

“I have been using my Sunlighten sauna almost every day and I absolutely love it. I've noticed that my complexion is getting better. I've struggled with break-outs for as long as I can remember. Since using the sauna my face is looking so much better. It has a healthy glow and the fine lines on my face seem to be lessened too. My husband has started using it frequently and now my teenage son. His complexion looks great; makes me wish we had a sauna when I was a teen!

*Eva B*

*Satisfied Customer*

“As so many people reported, my Sunlighten sauna has changed the character of my skin. It is much suppler without having to add moisturizers. After just two sessions a girlfriend asked me what I been doing because my face looked so much smoother and younger (I have a lot of acne scarring, and it seems to have softened the appearance). Delighted and will continue to use!

### References:

B.A. Russell, N. Kellett & L.R. Reilly. [Study to Determine the Efficacy of Combination LED Light Therapy \(633nm and 830 nm\) in Facial Skin Rejuvenation](#). Journal of Cosmetic and Laser Therapy, 2005; 7: pp 196-200.

## Infrared Sauna Weight Loss

### Looking to lose weight?

Sunlighten can help. Their saunas help you lose weight by detoxifying the body and burning calories while you relax in total comfort.

### The secret is out on sauna weight loss.

Maintaining a healthy weight is important to your overall quality of life. That's no secret. In fact, a 10-year study published by The New England Journal of Medicine discovered that the circumference of your waist alone is a critical factor for assessing the risk of premature death. In other words, by maintaining a healthy weight, you may be able to live a longer, healthier life.

### Infrared Heat Technology

That's where we come in with the Sunlighten brand of weight training: sauna weight loss. Using infrared heat technology to burn calories, their saunas – and only Sunlighten saunas – are clinically shown to aid weight loss. In a 2009 study, their infrared saunas were shown to help lower weight and waist circumference in just a three-month period. The common theme among subjects in the study was that far infrared sauna use was similar to moderate exercise but “much more relaxing”. Therefore, Sunlighten saunas can be an effective lifestyle advantage for those who cannot participate in traditional exercise programs due to medical conditions such as osteoarthritis, cardiovascular or respiratory problems.<sup>1</sup> In addition, according to information published in the Journal of the American Medical Association, infrared sauna weight loss sessions were shown to burn up to 600 calories.<sup>2</sup> During a sauna weight loss session, core temperatures increase. The body has to work hard to cool itself, causing a healthy sweat. Using an infrared sauna increases heart rate, cardiac output and metabolic rate, burning more calories, leading to more weight loss. And blood flow rises, increasing from 5-7 quarts up to 13 quarts a minute.<sup>3</sup> Plus, regular use of a Sunlighten sauna may provide many of the same benefits as regular exercise, such as cardiovascular conditioning. That's right, using Sunlighten for infrared weight loss therapy is like giving yourself a passive cardio workout – wherever and whenever you need it!

### Frequently Asked Questions About Sauna Weight Loss

#### **Q: How do saunas help me lose weight?**

A: Sunlighten saunas have been proven to aid in weight loss by heating your core temperature to induce sweating. Increases in blood flow and heart rate are a result, which, much like moderate exercise, has shown to help you lose weight. Saunas also help you lose weight by easing aches and pains associated with weight training, helping you get back into the gym the next day.

#### **Q: How much weight can I lose in a sauna?**

A: There's a lot that goes into weight loss, including your current weight, and eating and exercise habits. Just as there's no one diet for every person, there's no one number of pounds lost using an infrared sauna. Sessions have been shown to burn as much as 600 calories, which may be similar to an hour-long jogging session on a treadmill.

**Q: How do I use a sauna to lose weight?**

A: The most popular way to lose weight in an infrared sauna is to sit back and enjoy your session! But there are many more ways to enhance your session and subsequent weight loss. Like performing hot yoga while in your Sunlighten sauna. This could not only improve weight loss but offers a host of other health benefits like flexibility and better sleep. If hot yoga sounds too strenuous, consider adding mild stretching to your sauna session. This low-impact workout is not only relaxing, but it helps raise your core temperature a bit more – effectively aiding in weight loss while in the sauna. For the best weight loss results, use the 3-in-1 weight loss program that uses a combination of far and mid infrared at a high intensity to stimulate the cardiovascular system.

**Q: What is the difference in steam sauna and infrared sauna for weight loss?**

A: A traditional sauna uses wet or dry heat to warm the air around you, which induces sweating. This can aid in weight loss, but it has shown that the weight loss is mainly due to loss of water – or heavy sweating. An infrared sauna heats your body from the inside out, which allows you to stay in the sauna longer and increases your heart rate. Infrared sauna use results in more calories burned in a shorter period of time. Furthermore, Solocarbon infrared heat allows for most of the far infrared wavelength to be near 9.4 microns, which is the level at which the human body absorbs infrared energy. This is also the frequency at which a water molecule resonates or vibrates. This vibration causes a release of cellular toxins. This optimal micron output also allows for deeper penetration of far infrared heat, which improves weight loss efforts.

**References:**

1. Dr. Richard Beever BSc, MD, CCFP. Do Far-Infrared Saunas have Measurable Health Benefits? A Sequential Longitudinal Interrupted Time Series Design Study. 2009. Dr. Richard Beever BSc, MD, CCFP. Do Far-Infrared Saunas have Cardiovascular Benefits in People with Type 2 Diabetes? Canadian Journal of Diabetes 2010; 34 (2) :113 – 118.
2. Journal of the American Medical Association, August 1981.
3. Dr. Masakazu Imamura, MD, et al. Repeated Thermal Therapy Improves Impaired Vascular Endothelial Function in Patients with Coronary Risk Factors. Vol. 38, No. 4, 2001. Journal of American College of Cardiology: pp 1083-1088. Dr. Richard Beever BSc, MD, CCFP. Do Far-Infrared Saunas have Measurable Health Benefits? A Sequential Longitudinal Interrupted Time Series Design Study. 2009. Dr. Richard Beever BSc, MD, CCFP. Do Far-Infrared Saunas have Cardiovascular Benefits in People with Type 2 Diabetes? Canadian Journal of Diabetes 2010; 34 (2) :113 – 118.

## Near Infrared Wound Healing

*Our advanced Solocarbon Custom Spectrum heating technology has the unique ability to heal wounds faster and minimize scarring through the use of near infrared LEDs. No other sauna can do this.*

Skin plays such a vital role in the protection of our bodies from the external environment. When broken, it is important repair it quickly to prevent infection or further problems. Saunas have not been able to provide the benefit of wound healing...until now.



Sunlighten's Solocarbon 3-in-1 Infrared Spectrum Sauna is the only heater on the market capable of producing near infrared (NIR) light using LED technology. This is the same technology used in scientific research that concluded NIR therapy greatly enhances the wound healing process.



Studies conducted by NASA concluded that NIR LED light significantly promotes faster cell regeneration, wound healing and human tissue growth. Human cell growth increased by 155%-171% in some cases and wound size decreased by 36%.<sup>1</sup>

### References:

[Whelan et al; Effect of NASA Light Emitting Diode Irradiation and Wound Healing.](#) Journal of Clinical Laser Medicine & Surgery, Volume 19, Number 6, 2001, Mary Ann Liebert, Inc, pp. 305-314.

## Possible Contraindications Of Using the Infra-Red Sauna

Infrared saunas operate with the same efficacy in your Health Centre as in a medical facility. Like all professional equipment, you may put yourself at risk if you do not fully understand how to use the sauna. Infrared sauna use as creating a cure for or treating any disease is neither implied nor should be inferred. Drinking an electrolyte-replacing water or a sports drink is strongly recommended before and after use.

### Important Safeguards

- Never sleep inside the sauna while it is on
- Do not use harsh cleaning agents on the interior of the sauna
- Do not stack or store objects on top of or inside the sauna
- Do not use during an electrical storm, as there is a remote risk of shock
- Altering or tampering with any electrical connections on the power supply is dangerous and will void the warranty
- Do not attempt a repair without consulting Sunlighten first. Unauthorized repair attempts will void the warranty

### Medical Conditions

If any of the below apply to you, consult your physician prior to sauna use:

- **Cardiovascular Issues, Obesity or Diabetes** – Individuals suffering from obesity or with a medical history of heart disease, low or high blood pressure, circulatory problems or diabetes should consult a physician prior to use. Heat stress increases cardiac output and blood flow in an effort to transfer internal body heat to the outside environment via the skin (perspiration) and respiratory system. This takes place primarily due to major changes in the heart rate, which has the potential to increase by thirty (30) beats per minute for each degree increase in core body temperature.
- **Medications** – Individuals who are using prescription drugs should seek the advice of their personal physician since some medications may induce drowsiness, while others may affect heart rate, blood pressure and circulation. Diuretics, barbiturates and beta-blockers may impair the body's natural heat loss mechanisms. Anticholinergics such as amitriptyline may inhibit sweating and can predispose individuals to heat rash or to a lesser extent, heat stroke. Some over-the-counter drugs, such as antihistamines, may also cause the body to be more prone to heat stroke.
- **Alcohol & Drug Abuse** – Contrary to popular belief, it is not advisable to attempt to “sweat out” a hangover. Alcohol intoxication decreases a person's judgment; therefore, he/she may not realize when the body has a negative reaction to high heat. Alcohol also increases the heart rate, which may be further increased by heat stress. The use of alcohol, drugs or medications prior to a sauna session may lead to unconsciousness.

- **Elderly** – The ability to maintain core body temperature decreases with age. This is primarily due to circulatory conditions and decreased sweat gland function. The body must be able to activate its natural cooling processes in order to maintain core body temperature. If elderly, operate at a lower temperature and for no more than 15 minutes at a time.
- **Children** – The core body temperature of children rises much faster than adults. This occurs due to a higher metabolic rate per body mass, limited circulatory adaptation to increased cardiac demands and the inability to regulate body temperature by sweating. When using with a child, operate at a lower temperature and for no more than 15 minutes at a time.
- **Chronic Conditions / Diseases Associated With Reduced Ability To Sweat Or Perspire** – Multiple Sclerosis, Central Nervous System Tumours and Diabetes with Neuropathy are conditions that are associated with impaired sweating. Consult a physician.
- **Haemophiliacs / Individuals Prone To Bleeding** – The use of infrared saunas should be avoided by anyone who is predisposed to bleeding.
- **Fever & Insensitivity to Heat** – Individuals with insensitivity to heat or who have a fever should not use the sauna until the fever subsides.
- **Pregnancy** – Pregnant women should consult a physician before using an infrared sauna.
- **Menstruation** – Heating of the low back area of women during the menstrual period may temporarily increase menstrual flow. This should not preclude sauna use.
- **Joint Injury** – Recent (acute) joint injury should not be heated for the first 48 hours or until the swollen symptoms subside. Joints that are chronically hot and swollen may respond poorly to vigorous heating of any kind.
- **Implants** – Metal pins, rods, artificial joints or any other surgical implants generally reflect infrared waves and thus are not heated by this system. Nevertheless, you should consult your physician prior to using.
- **Pacemakers / Defibrillators** – The magnets used to assemble our saunas can interrupt the pacing and inhibit the output of pacemakers. Please discuss with your doctor the possible risks this may cause.

**In the rare event that you experience pain or discomfort, immediately discontinue sauna use and advise your Fitness Plus Centre Receptionist immediately.**

