

REFERENCES

Hormesis

Mattson M. P. (2008). Hormesis defined. Ageing research reviews, 7(1), 1–7. https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2248601

The Science of Saunas

Sauna Use and Building Resistance to Stress with Dr. Rhonda Patrick https://www.foundmyfitness.com/episodes/biohacker-summit-2016

Weight Loss

Dean W. (1981). Effect of Sweating. JAMA. 1981;246(6):623. https://jamanetwork.com/journals/jama/article-abstract/360118

McLeod K. https://infraredsauna.com/weightlossstudy.pdf

Immunity

Yoshimizu N. (2009). The Fourth Treatment for Medical Refugees: Thermotherapy in the New Century.

Detoxification

Rogers, M. (2001). Detoxify or Die.

Genuis, S.J., et al. (2016). Human elimination of organochlorine pesticides: blood, urine, and sweat study. BioMed Res Int. https://www.hindawi.com/journals/bmri/2016/1624643

Genuis, S.J., et al. (2011). Blood, urine, and sweat (BUS) study: monitoring and elimination of bioaccumulated toxic elements. Arch Environ Contam Toxicol. 2011; 61: 344–357 https://www.ncbi.nlm.nih.gov/ pubmed/21057782

Genuis, S. J., et al. (2012). Human excretion of bisphenol A: blood, urine, and sweat (BUS) study. Journal of environmental and public health, 2012, 185731. https://www.hindawi.com/journals/jeph/2012/185731

Rea, W.J. (2018). A large case-series of successful treatment of patients exposed to mold and mycotoxin. Clin Ther. 2018; 40: 889–893. https://www.ncbi.nlm.nih.gov/pubmed/29861191

Cancer

van der Zee J. (2002). Heating the patient: a promising approach? Annals of Oncology 2002; 13(8):1173– 1184 https://www.ncbi.nlm.nih.gov/pubmed/12181239

Tatsuo, I. et al. (2009). Non-thermal Effects of Far-Infrared Ray(FIR) on Human Hepatocellular Carcinoma Cells HepG2 and their Tumors. Journal of Cancer Science & Therapy. 01. 10.4172/1948-5956.1000012. https://www.omicsonline.org/nonthermal-effects-of-farinfrared-rayfir-on-human-hepatocellular-carcino-ma-cells-hepg-and-their-tumors-1948-5956.1000012.php

Cardiovascular Health

Dean W. (1981). Effect of Sweating. JAMA. 1981;246(6):623. https://jamanetwork.com/journals/jama/article-abstract/360118



Laukkanen, T., et al. (2015). Association Between Sauna Bathing and Fatal Cardiovascular and All-Cause Mortality Events. JAMA Internal Medicine 175, no. 4 (April 2015): 542. https://www.ncbi.nlm.nih.gov/pubmed/25705824

Masakazu I., et al. (2001). Repeated thermal therapy improves impaired vascular endothelial function in patients with coronary risk factors. J Am Coll Cardiol. 2001 Oct, 38 (4) 1083-1088. https://www.ncbi.nlm. nih.gov/pubmed/11583886

Zaccardi, F., et al. Sauna Bathing and Incident Hypertension: A Prospective Cohort Study. American Journal of Hypertension 30, no. 11 (June 2017): 1120–25. https://www.ncbi.nlm.nih.gov/pubmed/28633297

Ketelhut, S., et al. (2019). The blood pressure and heart rate during sauna bath correspond to cardiac responses during submaximal dynamic exercise. Complementary Therapies in Medicine. 44. 218-222. https://www.ncbi.nlm.nih.gov/pubmed/31126559

Tei, C., et al. (2016). Waon Therapy for Managing Chronic Heart Failure Results From a Multicenter Prospective Randomized WAON-CHF Study Circulation Journal 80, no. 4 (2016): 827–34. https://www.ncbi. nlm.nih.gov/pubmed/27001189

Setor K. K., et al. (2018). Sauna bathing reduces the risk of stroke in Finnish men and women. Neurology. May 2018, 90 (22) e1937-e1944; https://n.neurology.org/content/90/22/e1937

Inflammation & Pain

Internal Medicine (Tokyo) Aug 15, 2008 by Matsushita K, Masuda A, Tei C. The First Department of Internal Medicine, Kagoshima University Hospital, Kagoshima, Japan.

Lidija K., et al. (2003). Immunomodulatory Effects of Low-Intensity Near-Infrared Laser Irradiation on Contact Hypersensitivity Reaction. Photodermatol Photoimmunol Photomed 2003; 19: pp 203–212, Blackwell Munksgaard.

Laukkanen, J.A. et al. (20180. Sauna bathing and systemic inflammation. Eur J Epidemiol (2018) 33: 351. https://www.ncbi.nlm.nih.gov/pubmed/29209938

Matsumoto, S. et al. (2011). Effects of thermal therapy combining sauna therapy and underwater exercise in patients with fibromyalgia. Complementary therapies in clinical practice. 17. 162-6. https://www.ncbi.nlm.nih.gov/pubmed/21742283

Longevity

Laukkanen, T., et al. (2015). Association Between Sauna Bathing and Fatal Cardiovascular and All-Cause Mortality Events. JAMA Internal Medicine 175, no. 4 (April 2015): 542. https://www.ncbi.nlm.nih.gov/pubmed/25705824

Dementia & Memory Loss

Tanjaniina L., et al. (2017). Sauna bathing is inversely associated with dementia and Alzheimer's disease in middle-aged Finnish men, Age and Ageing, Volume 46, Issue 2, March 2017, Pages 245–249. https://academic.oup.com/ageing/article/46/2/245/2654230

Diabetes

Imamura, M., et al. (2001). Repeated thermal therapy improves impaired vascular endothelial function in patients with coronary risk factors. Journal of the American College of Cardiology 38, no. 4 (October 2001): 1083–88. https://www.ncbi.nlm.nih.gov/pubmed/11583886



Kokura, S.i, et al. (2007). Whole body hyperthermia improves obesity-induced insulin resistance in diabetic mice International Journal of Hyperthermia 23, no. 3 (January 2007): 259–65.

Beever, R. The effects of repeated thermal therapy on quality of life in patients with type II diabetes mellitus. The Journal of Alternative and Complementary Medicine. Jun 2010. https://www.ncbi.nlm.nih.gov/ pubmed/20569036

Physical Fitness

Scoon, Guy S.M., et al. Effect of post-exercise sauna bathing on the endurance performance of competitive male runners. Journal of Science and Medicine in Sport 10, no. 4 (August 2007): 259–62. https://www. ncbi.nlm.nih.gov/pubmed/16877041

Beauty

B.A. Russell, et al. (2005). 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. https://www.ncbi.nlm.nih.gov/pubmed/16414908

Lee, J. H., et al. (2006). Effects of infrared radiation on skin photo-aging and pigmentation. Yonsei medical journal, 47(4), 485–490. https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2687728

	Influence Sauna	Sunlighten	Clearlight/ Jacuzzi	Health Mate
FIR Source & Range	Spectrum Plus Incoloy + Spectrum Carbon; 7-14 micron / 9.4 micron max	Carbon 7-14 Micron; long wave far infrared only	Carbon Heater	Ceramic Rod
Combination Therapy	YES Incoloy (ceramic) + Carbon 360°	NO	NO	NO
MIR Source	Spectum Plus incoloy; 1.4-7 micron	Polyimide film, not proven to be effective	Dangerous quartz heaters. Food heat lamps	Ceramic Rod 1.4-7 micron
NIR Source	Cold light LED therapy 660nm. High wattage.	LED lights built into heaters Possible high failure rate	Dangerous quartz heaters. Food heat lamps	Cold Light LED therapy
Full Spectrum	All models	Only in more expensive Mpulse models	Upgrade charge. \$600 per heater	Only Enrich Models
Max Temperature	170°	140°	145°	170°
Radiation	Full sauna protection EMF ELF EMI RF	Low EMF carbon heaters. High ELF wiring, Wifi antenna in sauna	Low EMF carbon heaters. High EMF Quartz heaters	Low EMF
Upgraded Wiring (to lower ELF)	14awg twisted with proprietary grounding to lower ELF	NO	NO	NO
Manufacturing	45 Year old sauna factory	Furniture factory	Sauna factory	Sauna factory
*Certified by The Infrared Sauna Foundation	YES	NO	NO	NO
Antimicrobial Cedar	YES	YES, More Money	YES, More Money	YES

*Infrared Sauna Foundation is a non-profit organization specializing in consumer protection and awareness surrounding the dangers of purchasing an infrared sauna from the wrong manufacture, re-seller or affiliate.