

Part #1 - Light Therapy

Natural Energy Medicine

"All forms of matter are really light waves in motion." - Albert Einstein

(True Natural Light Therapy is a very complex and multifaceted health care system that is not easily explained or defined as these explanations are hidden in the field of quantum physics which is still beyond the full understanding of modern science. However, just because we cannot understand how it works does not mean that we cannot understand the way it works and how to use it. You may not know how to build a car but you can still drive one. In this series of articles we will try to explain all aspects of light therapy keeping facts as facts, theory as theory and my opinions as just my opinions based on my personal research.)

Light and the absence of light has profound and far-reaching effects on human physiology. As the sun's light patterns change with the seasons, the biological rhythms of the human body shift as well. This well-established necessity for light has led into this investigation and therapeutic use of light to treat a variety of conditions. Such treatments are generally described as "Light Therapy".

In the 1950's and 1960's, Chicago banker turned photobiologist, Dr. John Nash Ott pioneered an investigation into the benefit of full spectrum lighting on plants and animals. He found that most plants and animals need full spectrum light to thrive. He also determined that limiting the spectrum of light would cause plants and animals to reproduce only one gender and that offspring would not grow to full maturation. Science now suggests that it is the absence of specific wavelengths and possibly the imbalance of other wavelengths of light found in common artificial light that can cause specific illness in plants, animals and humans. This is similar to the way an absence of specific nutrients or imbalanced food in your diet would cause illness.

This is the correct description of Light Therapy. It was quite simple, Light Therapy was all about delivering natural sun or full spectrum light to a patient that was deprived of the proper amount and quality of light required to maintain general health.

This has nothing to do with the typical "Light Therapy" that is used today. In fact, the typical laser or light therapy today is not a substitute for natural sunlight or full spectrum artificial light. Regardless of the amount of today's "Light Therapy" you receive you still need to expose yourself to the sun or full spectrum lights (true light therapy) to maintain your health. This is because today's version of light therapy is not about delivering full spectrum or natural sun light but almost the opposite. It is about taking small specialized man made properties of light that have specific attributes and utilizing them to create specific reactions or responses in the body. There are many different properties of this light and each different property will create different reactions or responses in the body.

Therefore the term Light Therapy should not even be utilized for today's Low Level Laser Therapy (LLLT). Also you should never use just one broad spectrum term especially "light therapy" to describe all the different forms of therapy that utilize electromagnetic energy such as light. I use the words reactions or responses because there are two different things the body will do when stimulated. One is to react, which is always less than optimal, many times damaging, and occasionally lethal. However, when the body responds to something it is always correct and controlled. For example: the body has an allergic **reaction** but an immune **response**.

So even though "light therapy" has taken on many different forms over the past 60 years many people still use the same old term causing further confusion. Different forms of electromagnetic energy will create different stimulus' to the body. Each should have its own name but unfortunately that would make it far too logical and much too easy. Because let's face it, confusion equals profits in many industries.

Different forms of electromagnetic energy have different stimulus' on the body. There is a thermal mechanical stimulus such as when you heat tissue to the point of thermal ablation or a surgical laser that cuts or destroys tissue. These are the class IV lasers. Then there is a thermal stimulus that just heats tissue without destruction but still causes the body to react to this heating of tissue. Usually performed by class IIIb or class IV lasers. Then you have mechanical stimulus alone such as the therapy commonly referred to as Rife frequency therapy developed by Dr. Royal Rife. This stimulus is actually from EMFs not Electromagnetic. Next there are chemical stimulus' that usually requires utilizing different chemicals that the laser will react to within the tissue. Finally there is the response that most companies claim they create called photo biomodulation. This is usually confined to the class IIIa lasers. However, just because someone claims that their product produces photo biomodulation does not mean that they actually do or even know what that claim means. I am not saying that any of the above stimulus' are wrong because almost everything has its place, but the correct question is, what form of therapy do you want to provide?

Biomodulation is defined as changing the natural biochemical response of a cell or tissue within the normal range of its function, stimulating the cell's innate metabolism thereby allowing the cell to heal itself.

Photo biomodulation is the process of bio modulating tissue with a photon or activating or inhibiting cellular function by applying a specific photon that is transferred to a light receptor within the tissues (biological chromophore). This is a very powerful form of informational medicine and delivers not only an energy stimulus but information as well. Einstein stated many years prior to the discovery of the LASER that the internal cell to cell communication of the body was performed through coherent light. As science discovered how to manufacture LASER (coherent) light, Light Therapy went from general health support to specific correctional health care procedures. The process of photobiomodulation requires a very specific form of light, (coherent, polarized and collimated) a very specific wavelength (color) and a very specific power density (brightness). If all of these properties of light are not exactly correct the light may have a variety of effects on the body but photobiomodulation is not one of them. A form of light therapy that is specifically designed to produce photobiomodulation of all tissue would more accurately be described as informational medicine or the foundation component of Natural Energy Medicine. It is considered the foundation because it is the carrier or

delivers all other types of informational medicine that Natural Energy Medicine is composed of.

We invite you to enjoy all of the articles in this series as they will cover many aspects of the different forms of light therapy and Natural Energy Medicine. We will also cover the difference between visible light therapy versus infrared therapy, LED versus LASER.

We thank you for your interest in Natural Energy Medicine. Through this series of articles we will try to remove the confusion and contradictions that are so prevalent in this industry so that you will know exactly what your "Light Therapy" unit is and how it effects not only humans but all mammalian bodies. And if you have not begun utilizing electromagnetic energy (light) medicine in your practice, we want to help guide you through the process of selecting a unit so that you will end up with a therapy system that meets your personal therapy goals.

Throughout these articles I may oversimplify and use comparisons that are not totally correct. This is OK because these comparisons are not designed to totally explain the processes but to help give the reader a better overall idea about the process or how it works. Remember that no one really understands the total process of all forms of light therapy because that truth is hidden in the world of quantum physics. And that is way beyond the full understanding of any scientist today.

(In the following articles we will begin each one by listing specific terms that are utilized in that article and then follow each with the proper definitions to those terms from standard medical dictionaries and publications).

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