

The Inner Resources Room is a tranquil environment where not only Notre Dame students but also faculty and staff can participate in a variety of self-guided relaxation and performance-enhancing activities. To reserve the room at 305 Saint Liam Hall, stop by to sign up for a half-hour or hour session. On the day of your appointment, bring your Notre Dame ID to give to the University Counseling Center receptionist. **Here is a partial list of available stress management activities:**

Light Therapy

Notre Dame students, faculty, and staff adjusting to the cloudiness of South Bend may experience lower moods and productivity during the fall and winter months. For some, light therapy can help. A meta-analysis of the research has shown that light therapy is not only beneficial for seasonal affective disorder, but also for the treatment for chronic non-seasonal depression (Golden, 2005). Light therapy involves daily, scheduled exposure to intense levels of artificial light and is used to regulate seasonal mood swings, improve sleeping patterns, and enhance feelings of well-being. The recommended dose of light therapy (10,000 lux) for 20 to 30 minutes compares to the



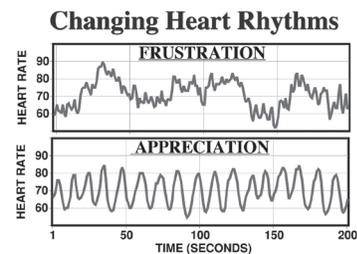
Light Therapy graphic courtesy of Uplift Technologies, Inc.

level of light exposure an individual would receive by taking a walk outside on a sunny spring day. You can read, listen to music, or work on a computer while participating in light therapy. If you find that using our Light Box daily for two weeks is effective, you can then invest in your own personal light to continue to use at home. Individuals with symptoms of depression, bipolar disorder, currently on prescription medications, a history of eye conditions, or currently under a physician's care should consult with a physician prior to beginning light therapy.

The Inner Resources Room is a joint gift from the Senior Class of 2004 and the Saint Liam Hall Renovation Project, made possible by donor William K. Warren Sr.

Heart Rate Variability / Heart Rhythm Coherence Biofeedback Training

Research conducted by the Institute of HeartMath on heart rhythm patterns has found that during the experience of negative emotions such as anger, frustration, or anxiety, heart rate variability becomes more erratic or disordered, indicating less synchronization between the parasympathetic and sympathetic branches of the autonomic nervous system. This is illustrated by the random, jerky form in the top section of the above graphic. In contrast, as seen in the bottom section, sincere positive states like appreciation, love, or compassion, are associated with coherent patterns in heart rhythms, reflecting greater synchronization. Heart rhythm feedback training helps people to learn to self-generate states of sustained positive emotions and increased physiological coherence, thereby reducing stress and improving health, emotional well being, and performance. We have four computer programs that provide biofeedback of heart rate variability/coherence: HeartMath's emWave PC (formerly Freeze-Framer), Journey to Wild Divine's Passage, Wisdom Quest, and Healing Rhythms. These instructional yet entertaining biofeedback programs use a fingertip or earlobe sensor to measure heart rhythm coherence, which is then fed back to the user with on-screen games designed to reinforce emotion-regulating skills. HeartMath's heart rhythm coherence training and positive emotion-focused techniques have been applied to the treatment of stress and anxiety, Post Traumatic Stress Disorder, Attention Deficit Hyperactivity Disorder, depression, and fatigue; to improve academic, work, and sports performance; and to facilitate improvements in medical conditions associated with or exacerbated by chronic stress (McCraty, 2002).



Changing Heart Rhythms graphic courtesy of the Institute of HeartMath



Skin Conductivity Level Biofeedback Training

Skin Conductivity Level biofeedback training (also called Galvanic Skin Response) provides a measure of skin conductivity of the fingers or palms. The activity of the sweat glands in response to increased sympathetic activation results in an increase in the level of conductance. Changes in skin conductivity can thus be used as a measure of an individual's physiological stress pattern and overall general arousal. Three of our biofeedback computer games (Journey to Wild Divine's Passage, Wisdom Quest, and Healing Rhythms) use finger sensors that measure skin conductivity level (SCL) as well as heart rate variability (HRV). As you learn to self-regulate SCL and HRV, you are able to progress to increasingly sophisticated tasks in the game, allowing you to view intricate scenes and progress to higher levels of mastery.

Respiration Biofeedback Training

An easy and readily accessible method used to relax and reduce stress levels is through respiration or breath training. When we are stressed, our breathing tends to be shallow, rapid, and high in the chest. When we are relaxed, our breaths are naturally deep, slow, and low in the abdomen. The portable biofeedback instrument RESPeRATE uses a sensor on a belt around one's abdomen and a combination of music and soothing instructions over headphones to teach you to pace your breathing from the normal range of 14 to 19 breaths per minute to the "therapeutic zone" of under 10 breaths per minute. You then begin to reap the benefits of focusing on the experience of being profoundly relaxed. An added benefit is that within a few minutes the muscles surrounding the small blood vessels dilate, allowing blood to flow more freely, resulting in lower blood pressure. Your breathing returns to normal after each 15-minute daily session, but the beneficial impact on your blood pressure and overall stress level accumulates in as little as four to six weeks.



Respiration Biofeedback Training graphic courtesy of InterCure, Inc.

Thermal Biofeedback Training

When stressed, our bodies produce adrenaline, which diverts blood from the surface of the skin to the core of the body, causing a drop in the temperature of the surface of the skin. This effect is most noticeable in the hands and feet. Thus, one's hands become cooler during episodes of stress, and warmer as the danger passes and the body becomes more relaxed. Whereas we are usually not aware of how we can gain access to the power of our parasympathetic nervous system to relax, we can learn to self-regulate through thermal biofeedback. A digital thermometer, with its temperature sensor attached to your fingertip, displays minute changes of temperature, allowing you to learn to control the body's relaxation response. As your hands become warmer, your breathing, heart rate, and mind begin to slow, and your muscles release tension. Hand-warming biofeedback has been shown to have beneficial effects for those who suffer from stress, migraine headaches, high blood pressure, insomnia, pain, digestive disorders, and other stress-related or stress-exacerbated disorders.



Source of photo: Conscious Living Foundation, used with permission

Negative Ion Therapy

Do you know that good feeling you've experienced near a waterfall, at the beach, or in the mountains? Those are places where thousands of negative ions occur and can create an effect on human biochemistry. The density level of ions in the air we breathe acts on our capacity to absorb and utilize oxygen. Negative ions in the bloodstream accelerate the delivery of oxygen to our cells and tissues, whereas positive ions slow down the delivery of oxygen. The body chemical serotonin, linked with mood and stress, is also influenced by ion levels. Too many positive ions in our indoor and technology-driven society alter the levels, which can cause stress. The effect of negative ion depletion varies from person to person and can have an effect on migraines, asthma, and depression. High-density negative air ionization has been shown to improve moods for people with seasonal affective disorder as well as non-seasonal chronic depression (Goel, et. al, 2005). Our Inner Resources Room has a high-density negative ion generator that emits 200 trillion negative ions/sec/cm³ for your benefit. To increase its benefits, create a closed circuit by attaching the wrist strap, which duplicates the conditions used in Columbia University's clinical trials.



Source of Photo: SphereOne, Inc, used with permission.