


Cit 2019 SUNY Purchase


HRV Biofeedback Technology

Training Students To Reverse Test Anxiety and Reduce Stress By Promoting Emotional Self-Regulation Through Heart Coherence Education




IF YOU HAVE AN APPLE Product, PLEASE INSTALL The HeartMath Inner Balance App

with
Dr. David P. Parisian - SUNY Oswego



The HeartMath System is Used by:

- Hospitals and Health Professionals
- Businesses
- Police, Fire, Corrections
- Schools, Universities, Nonprofits
- Professional Athletes/Olympic Teams
- Military, Special Forces

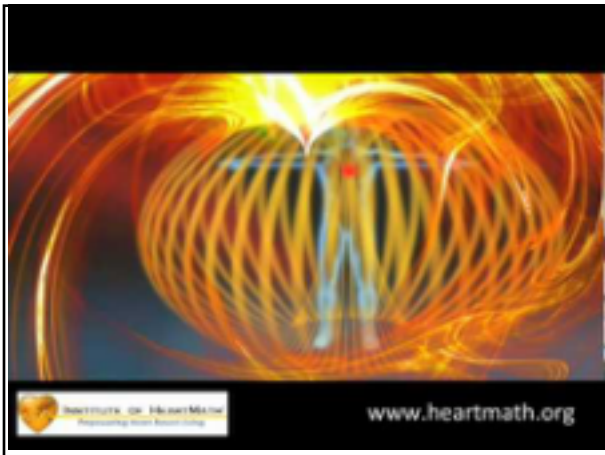


Published Research



- [The Effects of Emotions on Short-Term Power Spectrum Analysis of Heart Rate Variability](#) 1995
- Rollin McCarty; Mike Atkinson; William A. Tiller; Gen Rein; Alan D. Watkins
- American Journal of Cardiology 1996; 79(14): 189-193.





Resilience

The capacity to prepare for, recover from and adapt in the face of stress, challenge or adversity.

You can learn to build your resilience capacity and sustain your energy.

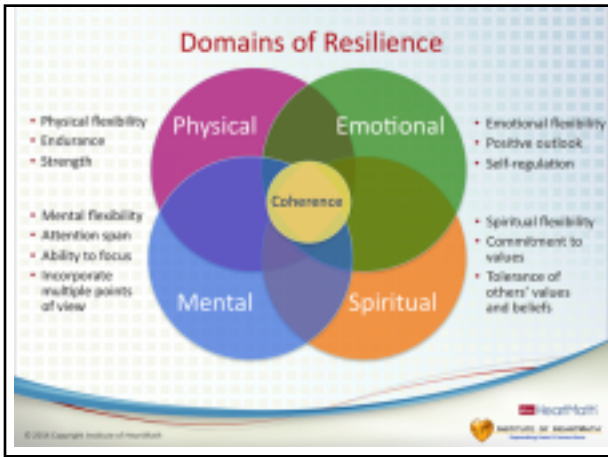
© 2014 Georgia Institute of HeartMath

Institute of HeartMath

Basically, we are "energy systems" that expend and renew energy.

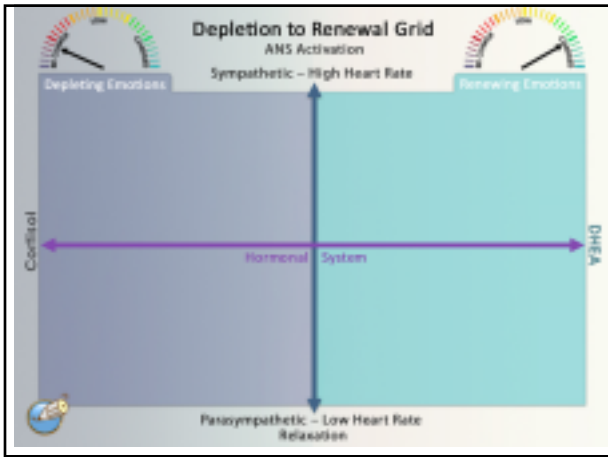
© 2014 Georgia Institute of HeartMath

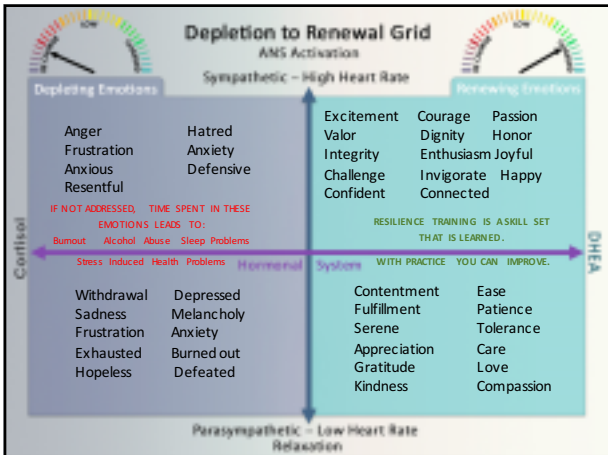
Institute of HeartMath












Energy Balance

Constant energy expenditures without the balance of adequate rest and recovery lead to burnout, errors, health challenges and diminished performance.

© 2013 Copyrighted by HealthTalk
HEALTHTALK
INSTITUTE OF INTEGRATIVE HEALTHCARE
UNIVERSITY OF MASSACHUSETTS
MEDICAL CENTER

The Physiology of Coherence and Optimal Functioning



© 2014 Copyright Institute of HeartMath

HeartMath
INSTITUTE OF HEARTMATH
Pioneering Heart Research

Coherence

An optimal state in which the heart, mind and emotions are aligned and in sync.

Physiologically, the immune, hormonal and nervous systems function in a state of energetic coordination.



© 2014 Copyright Institute of HeartMath

HeartMath
INSTITUTE OF HEARTMATH
Pioneering Heart Research

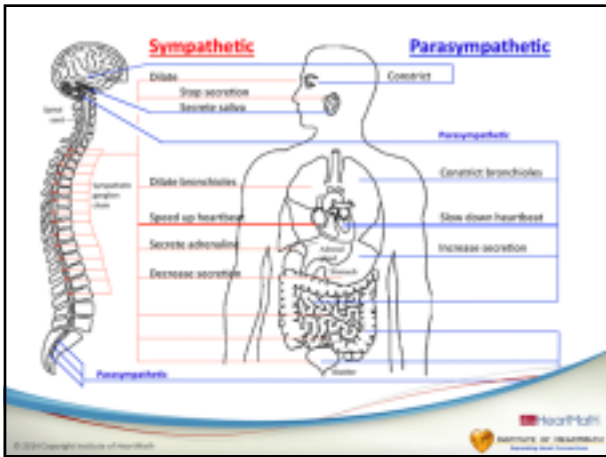
Heart-Brain Communication

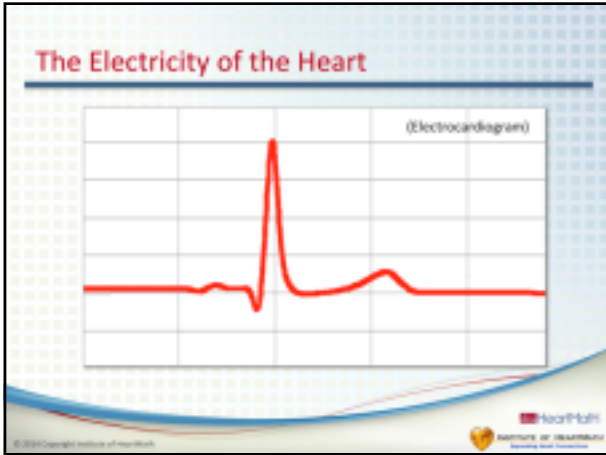
- The heart has its own complex nervous system: the "heart brain."
- The heart sends far more information to the brain than the brain sends to the heart.
- Signals from the heart especially affect the brain centers involved in strategic thinking, reaction times and self-regulation.

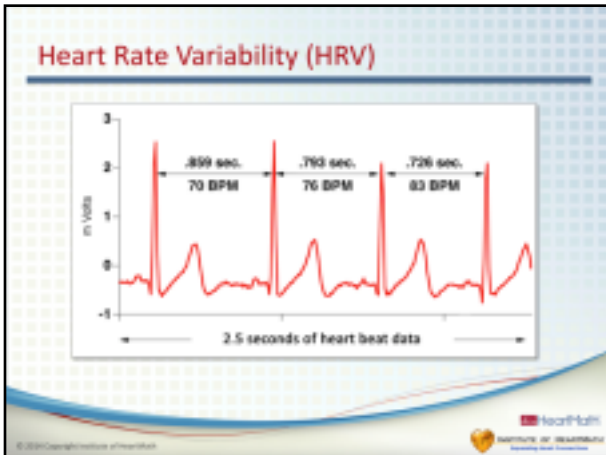


© 2014 Copyright Institute of HeartMath

HeartMath
INSTITUTE OF HEARTMATH
Pioneering Heart Research





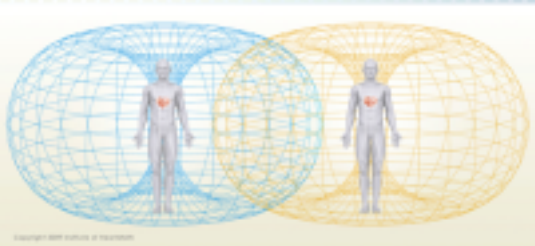


Heart Rate Variability Indicators

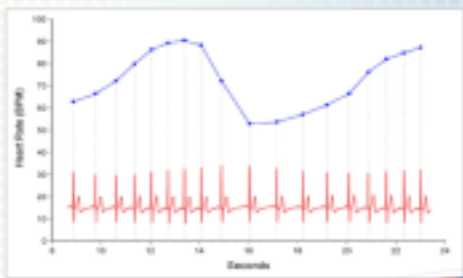
- We have the most HRV when we are young and it steadily declines as we age.
- Below-normal HRV for your age is a strong and independent predictor of future health problems, including all-cause mortality.
- HRV is an important indicator of psychological resiliency and ability to handle stress.
- Higher levels of HRV are associated with superior mental performance on tasks requiring executive functions.

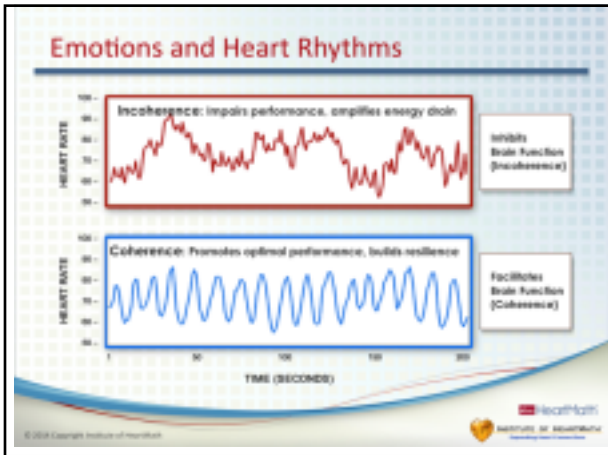


Our thoughts and emotions affect the heart's magnetic field, which energetically affects those in our environment whether or not we are conscious of it.

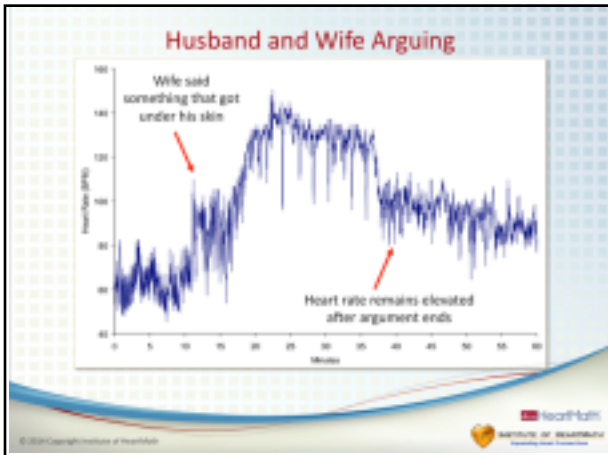


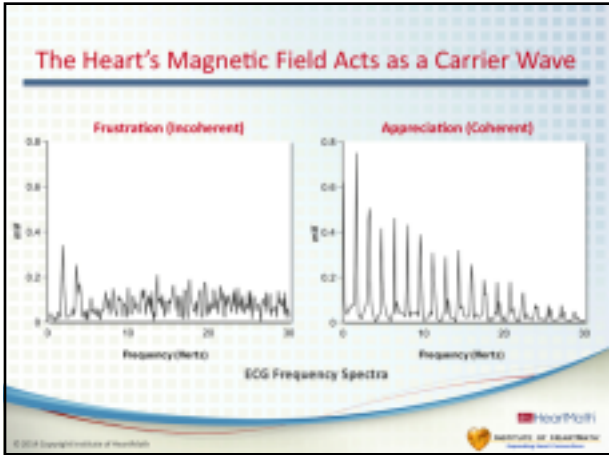
Heart Rhythm Patterns Emerge

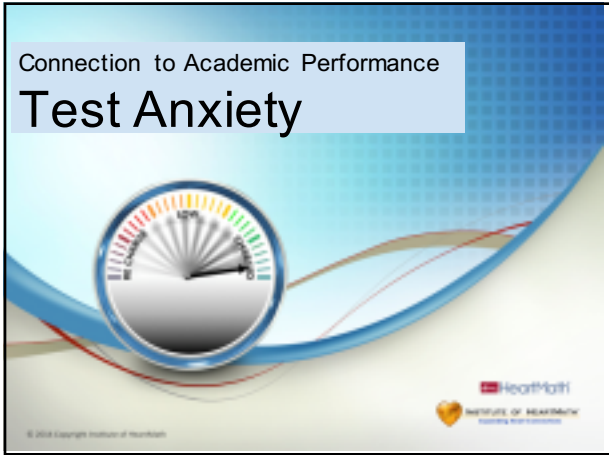






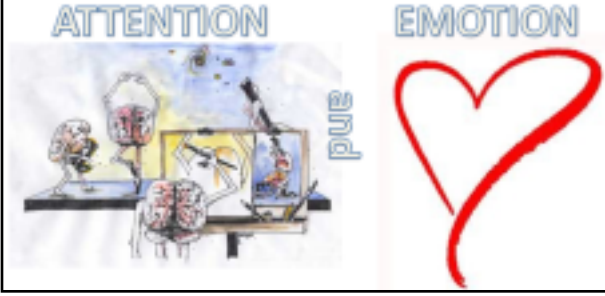




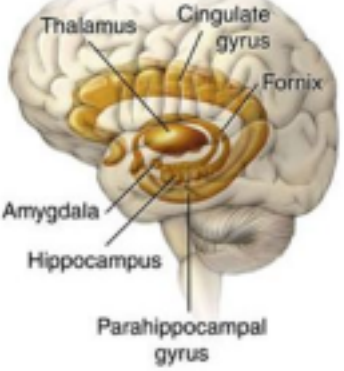


Mindset: Fixed vs. Growth

What Drives Human Patterning? (Learning)

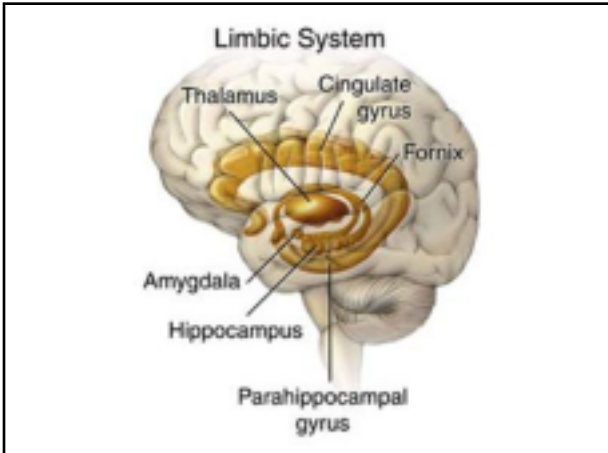


Limbic System









Emotion Self-Regulation, Psychophysiological Coherence, and Test Anxiety: Results from an Experiment Using Electrophysiological Measures
 Raymond Trevor Bradley • Rollin McCraty • Mike Atkinson • Dana Tomasino • Alane Daugherty • Lourdes Arguelles

What the students have said

Was the task useful for you... N=109

Questions	5 Very Useful	4	3	2	1 Not so much
The HeartMath Presentation and learning about test anxiety and the effects of breathing and physiology	69 = 63%	27 = 25%	10 = 9%	3 = 3%	0 = 0%
HeartMath: Learning to use the Inner Balance Sensor was advantageous.	67 = 61%	30 = 28%	9 = 8%	3 = 3%	0 = 0%
HeartMath: Learning about how to self-regulate my emotions was important	83 = 76%	18 = 17%	6 = 6%	2 = 2%	0 = 0%

The student responses were polled from the end of semester survey in the Fall 18 and Spring 19 semester of CSC103


What the students have said

"HeartMath helped me realize that I need to take better care of myself. In college, we are ALL stressed but there is still very little awareness about mental health. Yes we have the resources but there are still people are still not getting the help they need. HeartMath gave me a visual representation of how my semester was going and I knew I needed to change my behaviors towards self-regulating my emotions."




Emotions and Feelings that Create Coherence

- Courage, Honor, Dignity
- Confidence
- Appreciation, Gratitude
- Kindness
- Care, Love
- Compassion
- Tolerance, Patience
- Enthusiasm, Joy




Quick Coherence* Technique

Step 1:
Focus your attention in the area of the heart.
Imagine your breath is flowing in and out of your heart or chest area, breathing a little slower and deeper than usual.
Suggestion: inhale 5 seconds, exhale 5 seconds (or whatever rhythm is comfortable).




Quick Coherence Technique

Step 2:
Make a sincere attempt to experience a regenerative feeling such as appreciation or care for someone or something in your life.
Suggestion: Try to re-experience the feeling you have for someone you love, a pet, a special place, an accomplishment, etc., or focus on a feeling of calm or ease.



Quick Coherence® Quick Steps

1. Heart-Focused Breathing
2. Activate a positive or renewing feeling



© 2019 Copyright Institute of HeartMath

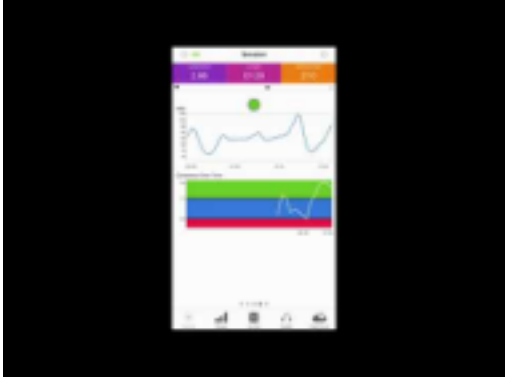
Inner Balance™ for iDevices

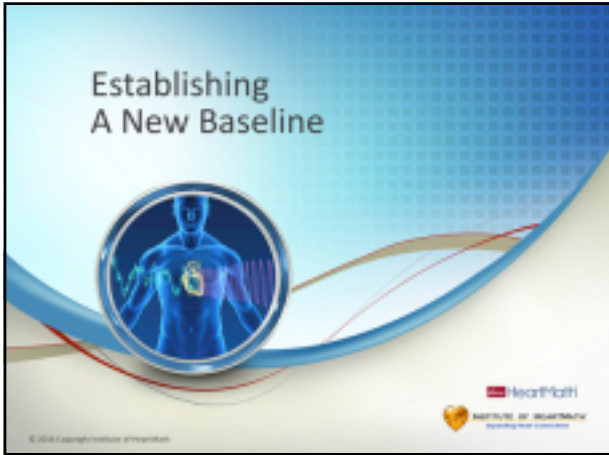


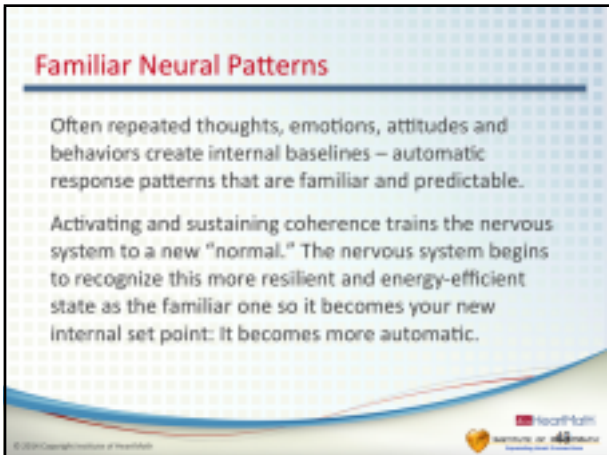
© 2019 Copyright Institute of HeartMath



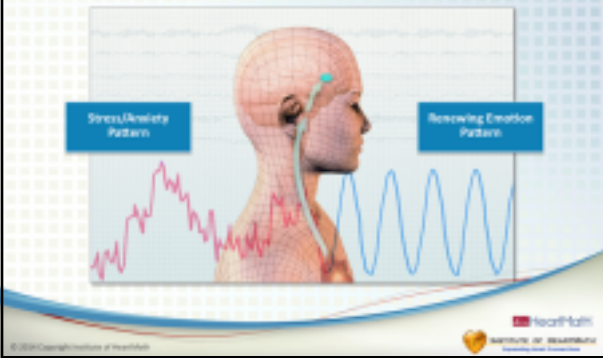
Tutorial



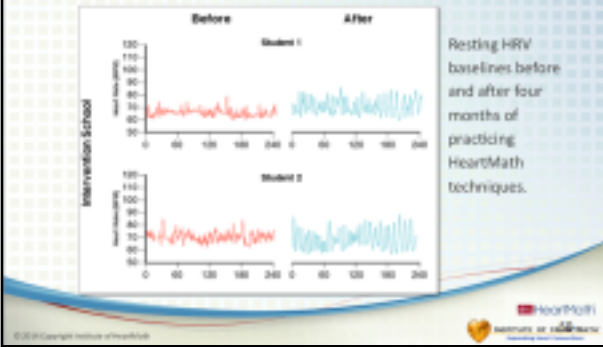




Establishing a Coherent Baseline



Research Showing Increased HRV and Baseline Shift



Closing

Questions, Thoughts, Ideas

Knowing can make the difference.

Summary by Dr. Rollin McCraty
<https://www.heartmath.org/science/>

*Thank you for allowing me to share !
With heartfelt appreciation and gratitude... dp:)*

Resources

David Parisian Ph.D.

david.parisian@oswego.edu

Recipient: 2018 HeartMath Institute Humanitarian Heart Award

HeartMath Certified Trainer, One to One Coach, Team/Group/Organization



HeartMath Institute

www.heartmath.org

<https://www.heartmath.org/education/college-and-university/college-de-stress-handbook/>



Videos Used in this Presentation

Science of the Heart https://www.youtube.com/watch?v=pp-r_f8-qz8

Atmospheres
<https://www.youtube.com/watch?v=8V5hdF7Uq0&list=PLRlWwOArYWyJuzRL0ZlDmycaigf1YpBcH>

Inner Balance App - About the Advanced Screens
<https://www.youtube.com/watch?v=8mtnlGZN1Ic>

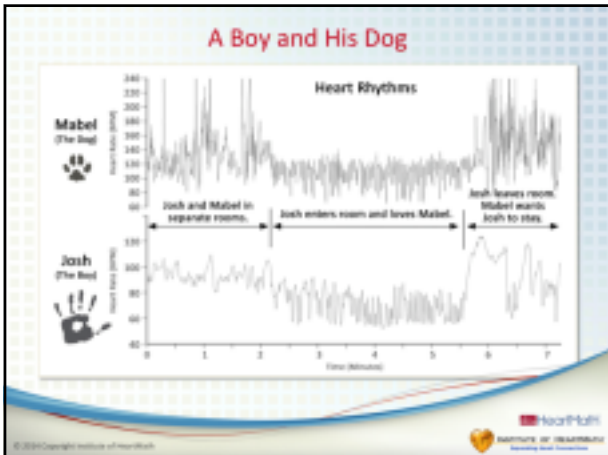
Closing Dr. Rollin McCraty Video <https://www.heartmath.org/science/>

References: Studies Applied to Post Secondary Ed.

<https://www.heartmath.org/research/research-library/>:

- [The Effectiveness of the Quick Coherence Technique Using Heart Rate Variability-Biofeedback Technology on the Recovery of Heart Coherence Among University Students](#)
[Educational Research](#) | Published: 2010
 Abdul Qahar Saemulki and Mohammad Nubli Wahabi
 ISSN: 0128-7880 © 2018 Universiti Putra Malaysia Press (1) Center for Modern Languages Human Sciences, Universiti Malaysia Pahang
 Lebuhraya Tun Razak 26200 Gambang, Kuantan, Pahang, Malaysia; (2) Faculty of Journalism, Al-Beruni University of Afghanistan, Afghanistan.
- [Biofeedback and Counseling for Stress and Anxiety Among College Students](#)
[Educational Research](#) | Published: 2012
 Ratanasitpong, P.; Sverduk, K.; Prince, J.; Hayashino, D.
 Journal of College Student Development, 2012, 53, 742-749
- [Biofeedback Intervention for Stress and Anxiety Among Nursing Students: A Randomized Controlled Trial](#)
[Educational Research](#) | Published: 2012
 Ratanasitpong, P.; Ratanasitpong, N.; Kathalee
 D. ISRN Nursing, 2012, Article ID 823972, doi:10.5923/j.12.823972.

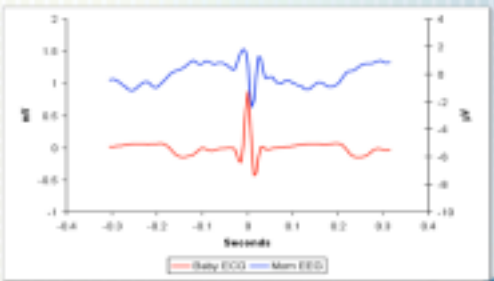




A Mother and Her Baby



Mother's Brainwaves Sync to Baby's Heartbeats



Benefits of a Coherent Field Environment