Sleep 101: How and Why to Sleep Better

Developed by Dr. Brooke Stuart

Funding provided by Florida Blue Foundation and the Florida Medical Malpractice Joint Underwriting Association.

AI PAMI
Aging and Integrative Pain Assessment and Management Initiative

Florida Blue Foundation

About the Aging and Integrative Pain Assessment and Management Initiative (AI-PAMI)

AI-PAMI is a comprehensive project addressing non-opioid pain management in adults ages 50 and older living in Northeast Florida. The overall goal of AI-PAMI is the advancement of innovative pain education and patient care through the development of provider and patient workshops focused on integrative pain management.

Funding provided by Florida Blue Foundation and the Florida Medical Malpractice Joint Underwriting Association.

Visit https://pami.emergency.med.jax.ufl.edu/aging-with-pain-series/about-ai-pami/ to learn more.

Contact PAMI at pami@jax.ufl.edu or 904-244-4986.

Dr. Brooke Stuart

- Founder and CEO of Let Go & Grow®
- Author of LG&G Holistic Guide Book and Journal, Reminders Workbook and the Let's Grow With Zo children's book series
- Provides a combination of holistic counseling and functional medicine to tailor patient specific treatment plans

Introduction

Who Am I?

Holistic Doctor, Functional Medicine Practitioner, Acupuncture Physician,
Founder and CEO of Let Go & Grow®

What does my practice look like?

I create evidence based, holistic treatment plans for my patients, and the teams and organizations I work with, and then, I partner with them to meet their unique goals through building a strong and resilient foundation focused on healthy fundamentals such as mindset, diet and lifestyle medicine.

What will we be up to today?

In this workshop, we will discuss the practical tools and tactics that will help optimize your sleep and modulate your pain through mindset, diet, lifestyle, supplementation, specific exercises and everyday choices that you can make yourself and implement right away.

Overview

- Introduction
- The Importance & Health Benefits of A Good Night's Sleep
- How Pain Interrupts Sleep and Sleep Issues Perpetuate Pain
- How To Optimize Sleep Specifically
- Focusing in on Fundamentals
- Emotional Freedom Technique (EFT) Tapping Exercise
- The Heart Based Practice: A Simple 3 Minute Meditation
- Clinical Pearls & Resources

The Importance of Good Sleep

According to the National Institutes of Health, 7% to 19% of adults reportedly do not get enough sleep, 40% reportedly fall asleep during the day at least once a month, and 50 to 70 million Americans have chronic sleep disorders.

Sleep is not just about sleep- just like the behaviors and issues that can disturb and disrupt it are rarely about the form they take on. With this, we have the opportunity to explore the roots while embracing what we resist least.

Let yourself be- it's okay to wake up in the middle of the night and stay up- **remove judgment**- remove storylines and allow yourself to connect to, be present for, observe and hold compassion and lightness. Sleep issues of all kinds can be made simple through functional medicine where we can apply **mindset, diet, lifestyle, supplementation and holistic devices** to heal.

How Sleep and Pain Interact

According to the National Library of Medicine's *The Association of Sleep and Pain*, Sleep complaints are present in 67-88% of chronic pain disorders and at least 50% of individuals with insomnia—the most commonly diagnosed disorder of sleep impairment—suffer from chronic pain. **Across most medical interventions, the development of pain as a side effect coincides with the development of sleep disturbance, and vice-versa**. Further, both chronic pain and sleep disturbances share an array of physical and mental health comorbidities, such as obesity, type 2 diabetes, and depression.

"Chronic pain has been associated with sleep disturbances in a bidirectional manner, with pain disrupting sleep, and sleep deprivation or disturbance increasing pain."

-The American College of Chest Physicians

How Sleep and Pain Interact

Pain can make it difficult to fall asleep, stay sleep, or achieve restorative deep sleep. Sleep deprivation can also lower pain threshold and tolerance- making pain feel more intense than it might otherwise be- amplifying emotional responses to pain, leading to increased feelings of distress and discomfort.

Addressing both sleep disturbances and pain is important for comprehensive management. Approaches might include cognitive-behavioral therapy for insomnia (CBT-I), physical therapy, supplements, relaxation techniques, and lifestyle adjustments. It's important to note that the relationship between sleep and pain can be highly individualized. What works for one person may not work for another.

On The Sleep Cycle

The sleep cycle consists of several stages that repeat in a roughly predictable pattern throughout the night. These stages are categorized into two main types: **REM (Rapid Eye Movement) sleep** and **NREM (Non-Rapid Eye Movement) sleep**.

On average, an individual goes through four to six complete sleep cycles in a typical night's sleep. The order of the stages within each cycle may vary, but the general pattern of cycling through NREM and REM stages remains consistent. The exact duration and distribution of these stages can vary from person to person and across different life stages.

Inadequate or Poor-Quality Sleep...

Poor sleep or chronic sleep deprivation is associated with a variety of health conditions and diseases. Here are just some that can be linked to inadequate or poor-quality sleep:

- Cardiovascular Diseases (heart disease, heart attacks, hypertension, and stroke)
- Obesity and Weight Gain (appetite and metabolism)
- Type 2 Diabetes (glucose metabolism and insulin sensitivity)
- Mood Disorders (such as depression and anxiety)
- Immune System Suppression (body more susceptible to infections and illnesses)
- Neurological Disorders (such as alzheimer's and parkinson's)
- Cognitive Impairment (memory, concentration, decision-making)
- Gastrointestinal Issues (such as GERD and IBS)
- Chronic Pain (makes pain perception more intense)
- Hormonal Imbalance (problems with reproductive, growth, and stress hormones)

Benefits of a Healthy Night's Sleep

- **Cognitive Functioning:** Healthy sleep enhances cognitive function such as memory, problem-solving, creativity and decision-making. It helps consolidate information and experiences from the day, improving overall learning and mental clarity.
- **Mood Regulation:** Sleep plays a crucial part in regulating mood and emotional well-being. Sufficient sleep can help reduce the risk of mood disorders like depression and anxiety.
- **Heart Health:** A healthy sleep pattern is associated with a lower risk of cardiovascular problems. Good sleep helps regulate blood pressure, reduces inflammation, and contributes to a healthier heart.
- **Stress Reduction:** A good night's rest helps the body manage stress more effectively. Sleep allows the body to recover from daily stressors and prepares you to face challenges with a clearer mind.

Benefits of a Healthy Night's Sleep

- **Physical Performance:** Good sleep aids in muscle recovery, coordination, and overall physical performance. It helps with motor skills and hand-eye coordination
- **Hormonal Balance:** Sleep plays a role in maintaining hormonal balance- sleep deprivation can lead to hormone imbalance and the imbalance of these hormones can lead to even more sleep deprivation.
- **Reduced Risk of Accidents:** Not enough sleep impairs reaction time, attention and decision-making, increasing the risk of accidents while performing tasks that require focus.
- **Cellular Repair:** During deep sleep stages, the body engages in cellular repair processes, which contribute to overall health and well-being.
- **Inflammation Reduction:** Chronic sleep deprivation is linked to increased inflammation in the body, which is associated with various health problems.

On Genetics, Epigenetics & Owning Your Power to Heal

The 20th century was considered to be the golden age of genetics. We discovered the double-helix structure of DNA, the Polymerase Chain Reaction (PCR) amplification method, and even the sequencing of the complete human genome! While these advances greatly contributed to our understanding of genetics and genetic modification, they also created several, disempowering societal beliefs- such as, that our health is primarily controlled by our genes, leaving us bound to fate...

But according to a study done by the CDC:

> "One of the promises of the human genome project was that it could revolutionize our understanding of the underlying causes of disease and aid in the development of preventions and cures for more diseases. Unfortunately, **genetics has been found to account for only about 10% of diseases, and the remaining causes appear to be from environmental causes**. So to understand the causes and eventually the prevention of disease, environmental causes need to be studied."

Moving Into Health Creation
By Looking At The Whole Person

"Functional Medicine is a personalized, systems-oriented model that empowers patients and practitioners to achieve the highest expression of health by working in collaboration to address the underlying causes of disease." **-The Institute For Functional Medicine**

In my private practice, through a unique combination of functional medicine, we address **the whole person**, not just an isolated set of symptoms, as we listen to each patient's story, and get to the root of various issues by looking at the interaction between the patient, their genes, and the environment in which they live. In this way, **functional medicine supports the unique expression of vibrant health for each individual as it looks beyond the absence of disease and into health creation**.

Functional Medicine Is…

- **Holistic**
- **Personalized**
- **Patient Centered**
- **Participatory**
- **Root-Seeking**
- **Evidence Based**
- **Restorative**
- **Safe**
- **Proactive**

Writing A New Story: LG&G Philosophy and Process

Reconnect. Reset. Remember.

- Waking up to who, what and where you are
- Connection. Presence. Observation.
- The past is not predictive of the future- and we can set the future free, creating it through our choices now

Engagement in the Let Go & Grow Process

- Look at - learn from - let go of - grow through our experiences - evolution
- Empowering Yourself Along the Way: As you move through the process, make sure to be on your own team as a throughline, empowering yourself and shifting the dial of your choices to align with what you envision for yourself, your life and the world

Healing Mode: ON

- Distress, tension and inflammation can be seen as your system's way of communicating information. Here, we have the opportunity to learn a new language and begin a new conversation!

Focusing on the Fundamentals

These are the tried and true factors that if looked into and applied will have your back time and time again. This is all about learning to love and care for yourself by choosing the choices that support and give back to you.

Good sleep starts from the moment you wake up in the morning.

On Good Sleep

Good sleep is an investment in the self, an honoring of the human experience and your dynamic biology, by working with rather than against nature. Sleep is a fundamental that cannot go unaddressed- as it is **untapped potential** in the most evident form.

Sleep is never just about sleep- just like the behaviors and issues that can disturb and disrupt it are rarely about the form they take on. With this, we have the opportunity to explore the roots while with embrace what we resist least. **Every step forward is a step forward**, as better is actually better and leads to building the system up and growing the capacity to take on more through simple next steps brought to you by you as a courtesy of your growth and reclamation.

What Does Your Sleep Look Like?

- What is your energy level throughout the day?
  - What is it like in the morning when you first wake up?
  - What is it like around noon?
  - What is it like at night before bed?
- What time do you typically go to sleep?
- What time do you wake up in the morning?
- Do you have trouble falling asleep?
- Do you sleep deeply or lightly?
- Do you dream?
- Do you wake up to go to the bathroom at night? If so, how often?
- Do you notice certain practices or tools help you fall asleep?

Mindset Training

The more you address throughout the day, the less you will have to fall asleep with. This is a continuous process, so start where you are, work with what you have- but give yourself the freedom to actively engage, create, and release.

Often, when our minds are going a million miles an hour before bed, I recommend patients to place it down, write it down, say a prayer and-or set a powerful intention to address it in the moments that follow.

- Expansion and contraction: Noticing and asking the self, am I expanding or contracting?
- Recognizing that you are important and capable: Shifting from "I can't" to self-inquiry in the form of "what do I want? I can, and how?"
- Intention and commitment: Engaging change, focused on embodiment and meaning it [actually caring, giving, receiving, loving, etc.] versus believing it.

Diet & Hydration

- Eating anti inflammatory, nutrient dense, high quality whole foods that work for your body a removing the foods that do not
- Drinking at least half your body weight in fluid ounces in clean, filtered water

Some Strategies For Sleep (To Try On!)

- Adding in more carbohydrates to dinner and glycine-rich proteins to your diet can potentially help with sleep at night
- Drinking dark tart cherry juice before bed is proven to be really effective at helping with sleep because it contains melatonin
- Avoiding caffeine after 2pm (sometimes 10am, depending on how you detoxify caffeine)

Elimination Provocation Diet

A short-term protocol **[typically 2 – 6 weeks]** that eliminates specific foods that can be at the root cause of these health issues. These foods are then reintroduced one at a time to monitor the reactions your body has when consuming them again.

Reintroduce

Introduce one new food group into your diet at a time, with **2-3 servings** and monitor the impact over a **3-10 day period** until you reach a baseline. Moving forward, as we question semi-safe foods, remove for a **5 day period** and reintroduce to explore for the ideal amount/frequency

Lifestyle & Holistic Support

- Environment & Positioning: Make sure your sleep environment is conducive to rest. Keep your bedroom dark, quiet and at a comfortable temperature. Experiment with different sleep positions to find the one that minimizes pressure and discomfort on any pain-affected areas. Supportive pillows or cushions can be used to alleviate pain and provide better spinal alignment.
- Movement, Play, Sleep (7-9 hours), Relaxation: If you can, engage in regular, gentle physical activity during the day and establish a consistent sleep routine at night.
- Restorative Practices: Techniques such as deep breathing, progressive muscle relaxation, tapping and meditation can help reduce pain-related stress.
- Professional Assistance: Acupuncture, running key labs with a functional medicine practitioner or talking to a therapist may help with optimizing sleep.
- Healing tools and apps, including home devices like the Fisher Wallace Stimulator, HeartMath, journaling, meditation apps, etc. can be helpful in assisting with good sleep.

Lifestyle: What Is Your Nighttime Routine?

Good sleep starts with how you wake up in the morning, how you live your life and the intentionality and commitment to basic biological and personal needs at night that build a pre-sleep routine. As a starting place, consider…

- At least 10 minutes of sunlight in the morning and afternoon to set circadian rhythm
- Placing all technology at least 10 feet away before bed
- It's suggested that the optimal sleeping temperature in the bedroom for adults should be between 60 and 67° F to help facilitate the stability of REM sleep (Cleveland Clinic)
- Utilizing blackout curtains, a sleep mask, sound technology, sound machine, etc.
- Taking magnesium glycinate (200 to 1200 mg) before bed
- Building out fundamentals with an emphasis on regulating blood sugar and inflammatory response by paying attention to what soothes your system
    - Examples: chamomile or passionflower tea, epsom salt bath, hypnosis, journaling to clear your mind!

On Supplementation

In building a holistic foundation, supplements can play a role in setting the groundwork- making healthcare more accessible and placing it into your hands. Supplements can be prescribed with precision when we understand internal constellations and metrics.

Core Supplements multivitamin, probiotic, digestive enzyme, liver-GI detox, inositol, magnesium glycinate (200 - 1200 mg before bed)	**Food Based Supplements** electrolytes, collagen powder
Therapeutic Supplements theanine (200 to 400 mg) 5-HTP (50 to 100 mg) taurine (500mg)	**Symptomatic Supplements** rescue remedy, gluten-dairy digest, melatonin (0.5 to 1 mg)

Check out our online supplement dispensary here:
us.fullscript.com/welcome/drbrookestuart for specific recommendations!

3 Embodiment Exercises

Pendulation: This is the natural pulsation between states of expansion and contraction in the nervous system. It is based on the idea that gently and gradually moving between sensations of discomfort and comfort can help the body and mind find a more balanced state.

EFT: This stands for Emotional Freedom Technique, which is a form of energy psychology and a type of psychological acupressure. EFT involves tapping on specific acupuncture points on the body while focusing on a specific issue in order to promote emotional and physical healing.

HBP: The Heart Based Practice is a simple 3 minute meditation that sends an empowering signal to your system by placing both hands over your heart, feeling your heartbeat, while inhaling and exhaling.

Awareness of the pain, your healing ability, and an ideal state in all three

Pendulation Exercise

Pendulation is a key technique from Peter Levine's Somatic Experiencing (SE). SE is a therapeutic approach that is informed by our biology and our inborn ability to heal from trauma. Here are the steps:

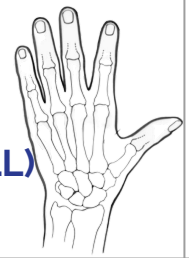
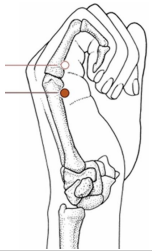
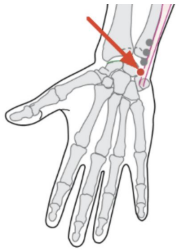
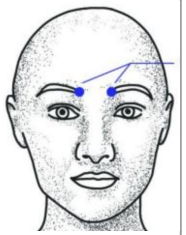
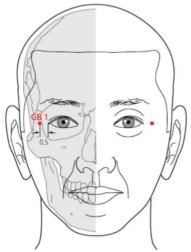
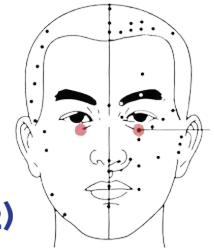
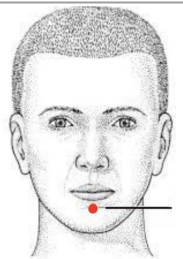
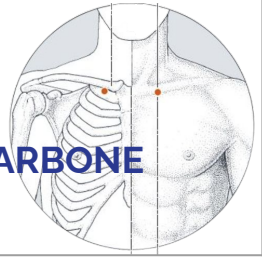
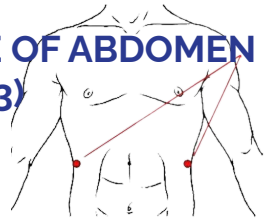
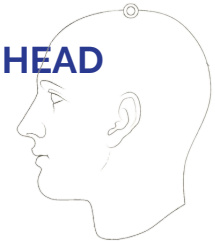
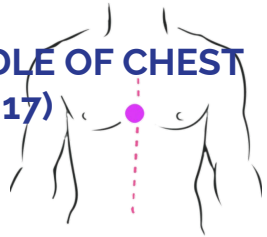
- When feeling pain/distress, start by noticing how you feel physically, somatically. Where do you feel the distress? What does it feel like? Let yourself fully experience this.
- Now scan your body and find a place that feels neutral or calm. Maybe there is a place that is free from pain or maybe there is a place where the feeling is just less intense. What does it feel like? Stay with that feeling for a moment and experience it.
- Continue with this process, shifting your attention between these two areas of your body- "pendulating". Move slowly, stay with the pain, and allow yourself to really experience it. Then shift your attention back to the part of your body where you don't feel pain. As you continue to pendulate, notice how the pain/distress shifts.

On EFT Tapping

The philosophy of Emotional Freedom Technique (EFT) tapping stems from the ancient Chinese practice of acupuncture, which proposes that certain points along specific pathways of our body can be stimulated to improve health and overall well-being.

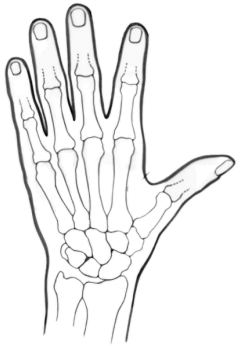
EFT tapping stimulates these acupoints by touch (taps) instead of the use of needles, making this method similar to acupressure, where an acupressure practitioner would use fingers to apply pressure to certain points. **EFT tapping is a simple, painless technique that can be used right away as a self-help method**. Tapping your fingertips on specific points can help reduce distress, help manage troubling thoughts, and can be used with emotional intent towards your own life experiences.

Tapping Exercise

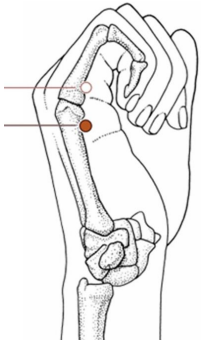
1 TIPS OF FINGERS (JING WELL) 	2 KARATE CHOP (SI-3) 	3 WRIST LINE (HT7, PC7, LU9) 	4 SIDE OF EYEBROW (UB2) 
5 SIDE OF EYE (GB1) 	6 RIGHT UNDER EYES (ST 1 & 2) 	7 UNDER THE NOSE (DU26) 	8 CHIN (REN24) 
9 COLLARBONE (KI27) 	10 SIDE OF ABDOMEN (LV13) 	11 TOP OF HEAD (DU20) 	12 MIDDLE OF CHEST (REN17) 

Tapping Exercise (Closing)

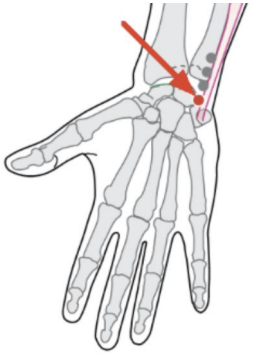
1
TIPS OF FINGERS (JING WELL)



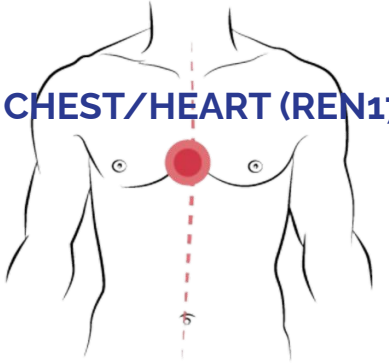
2
KARATE CHOP (SI-3)

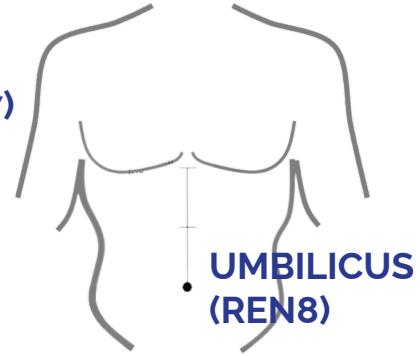


3
WRIST LINE (HT7, PC7, LU9)



4
HEART BASED PRACTICE
Place one hand on heart (REN17) and one hand on umbilicus (REN8)





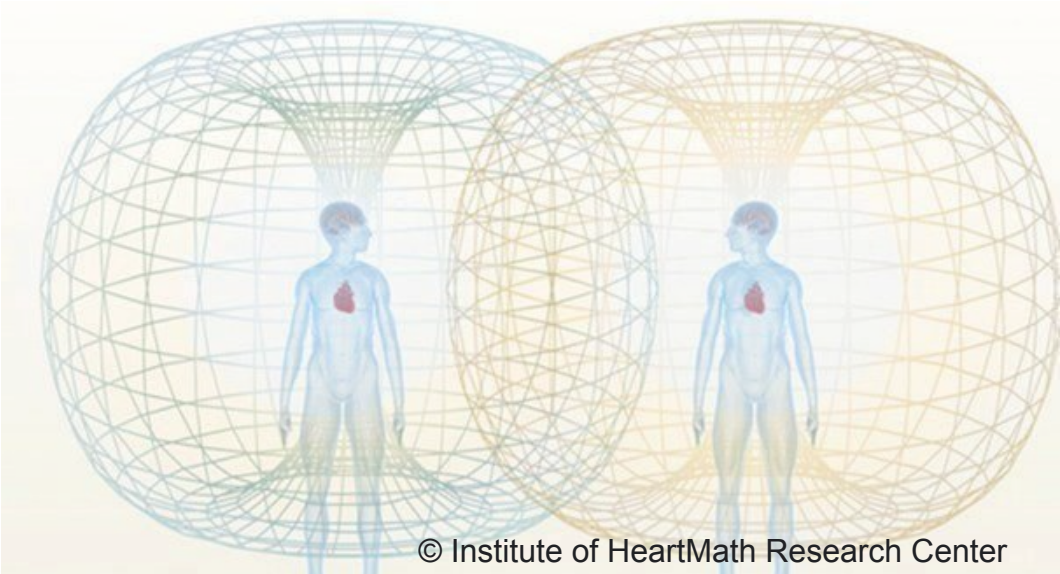
The History, Science and Importance of The Heart

- New research shows the human heart is much more than an efficient pump that sustains life
- The mobilizing part of the nervous system (**sympathetic**) energizes us for fight or flight, which is indicated by an increase in heart rate
- The calming part of the nervous system (**parasympathetic**) calms us down and slows the heart rate
- **Coherence** is the state when the heart, mind and emotions are in energetic alignment and cooperation
    - **A state of coherence can be accessed in less than two minutes!**

The Toroidal Field

Research at the **HeartMath Institute** has found that the heart's magnetic field is involved in energetic communication- a direct extension from your heart to **everyone** and **everything**.

- The heart is the most powerful source of electromagnetic energy in the human body- even greater (about 60 times in amplitude) than the activity generated by the brain
- We are all connected - once this connection is made, we can easily see how we matter and our choices count
- We can choose to live in alignment with ourselves and create a robust state of health & expansion



Mindfulness, Meditation and Change

The terms meditation and mindfulness, although often coupled or interchangeable in research, are different in that that mindfulness is a form of meditation but meditation is not a form of mindfulness.

- Mindfulness is unique in that it can be used any time, anywhere by simply, becoming aware while meditation is typically, more broad spectrum referring to many different types of self-reflective practices such as: heart focused, body scan, guided visualization, mantra and breath work and moving meditations - just to name a few.
- Both meditation and mindfulness have been studied extensively to shift the stress response and accelerate healing pathways having a positive impact on physiology and pathological disease through the promotion of presence, acceptance and resilience, making it easier to clear distortion, address fear, boost mood, regulate physiological functions, decrease inflammation and more. Meditation has also been noted to evoke states of expansion that improve quality of life such as happiness, creativity, deep appreciation for and connection with self and others.

On Meditation

World Within Worlds

Research shows that we can access more expansive experiences within ourselves coming into pronounced states of coherence, which often evoke theta and alpha brain states.

Meditation as Medicine

Meditation is, in essence, medicine, a practice where neuroplasticity and a myriad of other health benefits can come forth- studied to relieve pain, regulate digestion, boost mood, and decrease stress, anxiety and depression, and more by taking command of the nervous system.

Consider Reality

Set a Time

Choose a Practice

Choose a Place

Flexible with Structure

Remember Why You Started

The Heart Based Practice

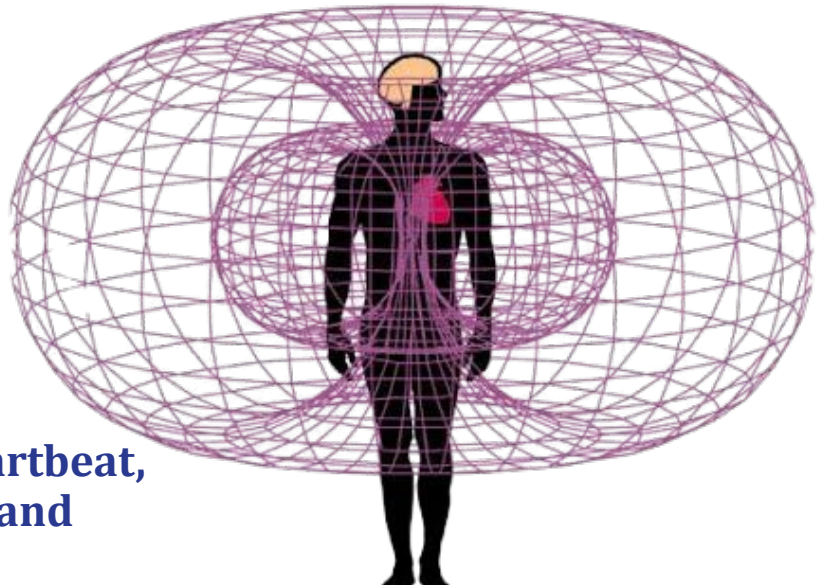
A simple 3 minute meditation

Choose to go within and reclaim your power by taking 3 min. to make a statement and send an empowering signal to your system by placing both hands over your heart, feeling your heartbeat, inhaling and exhaling with a 5 count through your heart and down your spine until you come into your own natural rhythm.

Reconnect.

Reset.

Remember.



This can act as a reminder to reconnect to your heartbeat, reset and return home to the present moment, and remember who, what and where you are.

3:01

Affirming Life, Envisioning Vitality

Through our health challenges, we may feel the wind leave our sails as we lose hope for a solution and unknowingly deepen into futile choices.

We may also find reverence and deepened appreciation for the gift of life, the choice is ours- and we can choose our perspective at any point in time.

If we close our eyes, reconnect and return to the present moment, we can envision health and the life affirming choices that can bring us there. Think clean water, nutrients, fresh air, sunlight, deep sleep and the internal experience of health and vitality that extends beyond the self.

Resources: Apps & Devices

Apps for Sleep, Meditation, Stress

- Calm
- Headspace
- Insight Timer
- Unplug
- Simple Habit
- 10% Happier

Therapeutic Devices

- Fisher Wallace Stimulator
- Red Light Therapy

Research & Websites

- HeartMath Institute [www.heartmath.org]

Clinical Pearls

- Reconnect. Reset. Remember. Let your heartbeat be your reminder.
- When you don’t know which way to go, go within. Start where you are, with what you have, and go from there.
- Focus on the fundamentals. Building a strong and resilient foundation can become a springboard for more.
- What you want, wants you too. There is a life you are here to live and power you are meant to have! All you have to do is turn the light on, and specifically in this case off.
- Good sleep is an investment in the self and the more you address throughout the day, the less you will have to fall asleep with.

Continual Support

We're here for you every step of the way!

For more information and resources, check:

drbrookestuart.com/mind-body-reset

To reach out, feel free to contact our team here at anytime:

contact@drbrookestuart.com

As an additional resource, feel free to schedule a Free Consultation or sign up for the Free Let Go & Grow Membership to receive instant access to our online community and holistic resources, including the heart based practice, our signature 3 min. meditation, and Wellness Workshop!

letgoandgrow.com/free-membership | drbrookestuart.com/free-consult

Social Media Handles: @drbrookestuart & @letgoandgrow