



Effects of Stress

When the body perceives fear, danger, threat, loss or failure, it begins making physiological adjustments that prepare us for crisis. This is called the "fight-flight" response. In these situations, our bodies prepare themselves to either confront (fight) or run (flight) from the stressful event. Our bodies do not distinguish between sources of stress. Our bodies just change to be optimally prepared for the perceived threat. This happens automatically. These changes are described below.

When we are under stress...

Body Functions That Speed Up

Heart Rate
Blood Pressure
Muscle Tension
Brain Waves
Respiration
Pupil Dilation
Sweat Glands

Body Functions That Slow Down

Immune System
Salivation
Digestive System
Blood Flow to Hands/Feet

Physical Symptoms...

headaches(tension/migraine)
diarrhea/constipation/ulcers
dry mouth
sleeplessness/insomnia
anxiety/nervousness
difficulty with concentration/focus
muscle cramping
cold hands and feet
shortness of breath
lowered resistance to colds/flu



Breathing, Relaxation and Meditation

The mind and body are designed to work in harmony with very little visible effort. At best, the mind and body work as one. When a person experiences stress, the mind begins to race which, unfortunately, increases anxiety. When the stress response occurs, over 1400 physiological changes are activated. When one of these physical changes occurs, the others follow. Learning to calm your body and clear your thoughts before and during a challenging task or activity helps you bring your mind and body into harmony. This can be accomplished through a simple series of breathing, relaxation and meditation exercises.

Breathing: *Take a series of 3 deep breaths, first emptying your lungs of air then inhaling slowly through your nose allowing the air to fill your stomach. Breathe out slowly through your mouth allowing the exhale to last twice as long as the inhale (e.g. inhale for 2 seconds and exhale for 4 seconds, then 3/6 and 4/8). Make sure that you are breathing with your diaphragm (stomach goes out when you inhale) rather than your chest.*

Relaxation: *Beginning at the top of your head, locate each muscle group in your body moving slowly from head to neck to torso to extremities. As you find each muscle, tense it for a period of 2 seconds as you inhale diaphragmatically, then allow it to completely relax for 4 seconds as you slowly exhale. Imagine the tension leaving your body as you gradually move through each muscle group with each breath until you have tensed and relaxed each muscle from head to toe.*

Meditation: *Choose a pleasant word or visual image that you can hear and see in your imagination. Think of this word or image every time you exhale for about 15 minutes each day. If you have an intrusive thought or feeling during your meditation, return to the repetition of your relaxing word or image. Use this word or image during your task or activity to return your mind and body to harmony.*



The Breakout Principle

Harvard University Mind/Body Institute

1. Hard Mental and Physical Struggle (*increases noradrenaline stress hormones*)

anger/frustration
excitement/anticipation
sadness/loss
anxiety/tension

2. Release/letting go (*pulling the breakout trigger counters stress hormones by releasing puffs of nitric oxide. Nitric oxide enhances memory, improves oxygen flow to the brain, bolsters the immune system and provides the biochemical foundation for relaxation.*)

walking away
repetitive movement
surrender
spiritual
musical/cultural
nature/water
housework/yardwork
self-care activity
altruism/pet care
brainstorming

3. Peak experience (*breakout*)

self-awareness: *solid inner platform*
creativity: *new insights*
productivity: *energy, stamina, endurance*
athleticism: *"in the zone" performance*
rejuvenation: *health protection against disease, expedite healing*
transcendence: *deeper spirituality*

4. Returning to a "new-normal" state (*improved performance*)

re-enter the world of struggle and stress
new insights and ideas produce new tools and resources
improved mind-body harmony enhances performance
hardship and adversity become opportunities for growth and change