

# **Stress Management: Part 1 – Stress and Health**

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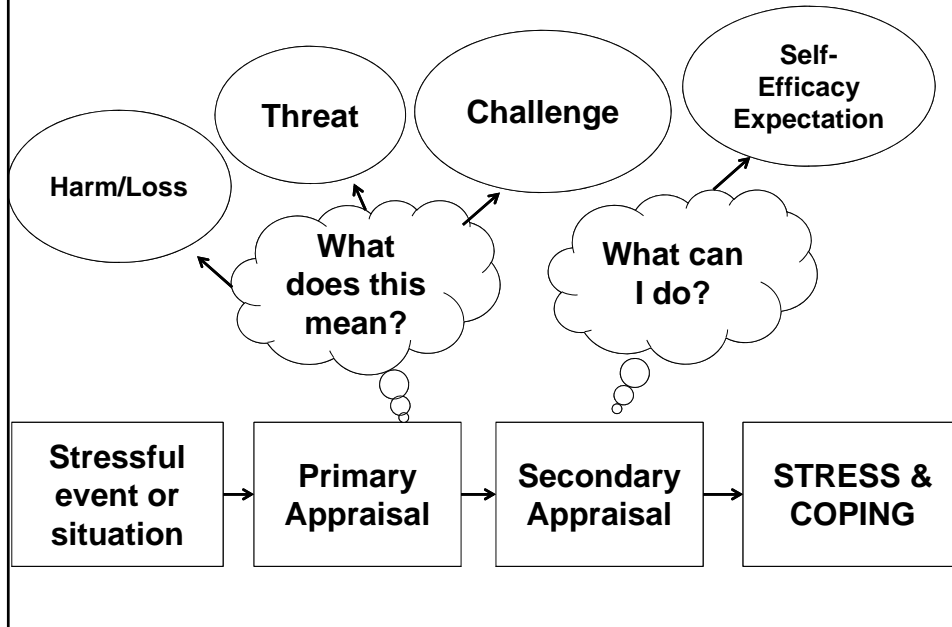
## **What is stress?**

**“Stress arises when individuals perceive that they cannot adequately cope with the demands being made on them or with threats to their well-being.”**



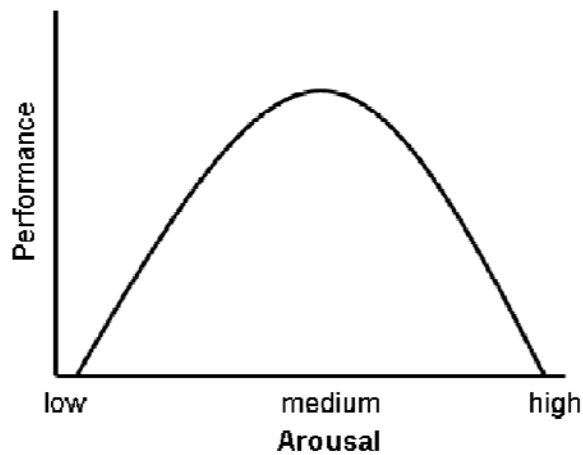
**Lazarus, R.S. (1966).**

# The Stress Process



# Is all stress bad?

## The Yerkes-Dodson Law



Author: Vaughan

## **Common Life Stressors**

- **Death**
- **Divorce**
- **Loss of a job**
- **Starting a new job**
- **Finances**
- **Getting married**
- **Moving**
- **Chronic illness or injury**
- **Interpersonal conflict**
- **Taking care of an elderly or sick family member**



## **Work-Related Stressors**

- **Being unhappy in your job**
- **Having a heavy workload or too much responsibility**
- **Working long hours**
- **Unclear expectations or no say in decision-making**
- **Working in dangerous conditions**
- **Insecurity about advancement or risk of termination**
- **Having to give speeches in front of colleagues**
- **Facing discrimination or harassment**

## Impact of Stress

- **60-80% of outpatient visits may be related to stress (Rosch, 1991; Avey, Matheny, Robbins, & Jacobson, 2003)**
- **Linked to all leading physical causes of death - heart disease, cancer, stroke (Cohen, Janicki-Deverts, & Miller, 2007)**
- **Associated with development of most major mental health problems – depression, PTSD, pathologic aging (Marin et al., 2011)**

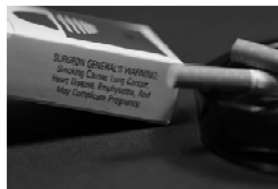
## Impact of Stress

- **Affects fetal development & outcomes (Kinsella & Monk, 2009)**



CDC/ Jim Gathany

- **Predicts negative health behaviors and relapses – smoking, alcohol abuse, illicit substance use, sleeplessness (Kassel, Paronis, Stroud, 2003; Herman, 2012; Ellis, et al., 2012)**



CDC/ Debora Cartagena

## **Primary Care: Stress Management Counseling**

- **National study suggests that only 3% office visits included stress management counseling by primary care physicians**

(Nerurkar, 2012; *JAMA – Internal Medicine*)

- **42% report receiving no instruction regarding stress and health outcomes in medical education**
- **76% lacked confidence in their ability to counsel patients about stress**
- **49% indicated a lack of referral sources**

(Avey, Matheny, Robbins, & Jacobson, 2003)

## **Do as I say...Not as I do...**

- **57% of outpatient medical clinic providers (physicians, residents, NP's, and PA's) report "rarely" or "never" practicing stress reduction techniques themselves**
- **Those who do practice use the following:**
  - exercise (70%)
  - meditation (32%)
  - imagery (26%)
  - deep breathing (21%)
  - mindfulness(16%)
  - PMR (16%)

(Avey, Matheny, Robbins, & Jacobson, 2003)

# **Stress Management: Part 1 – Stress and Health**

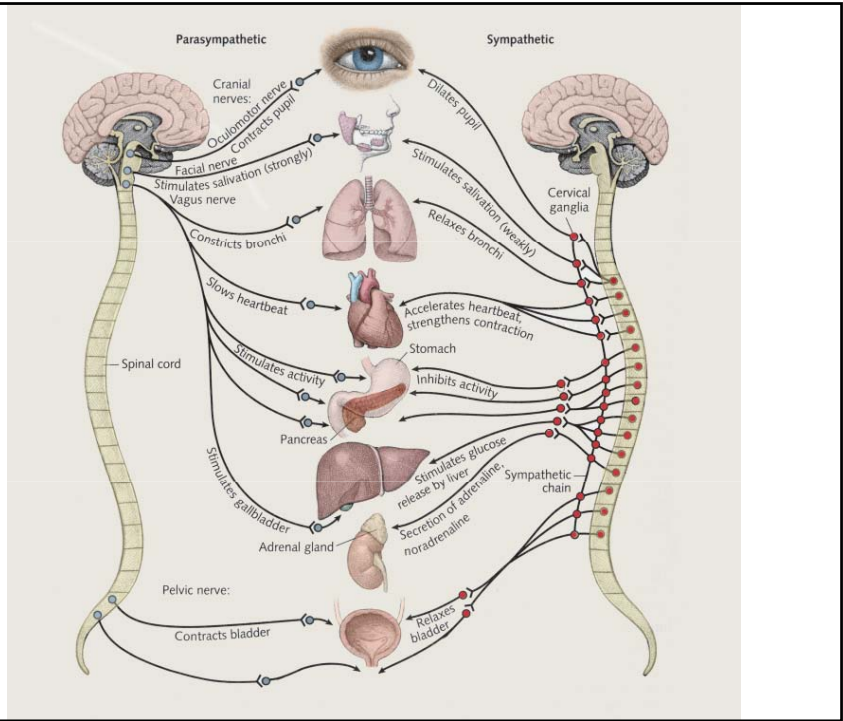
**Sharla Wells-Di Gregorio, PhD**  
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**Director, Psychosocial Oncology Fellowship Program**  
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## **How does stress get under the skin?**

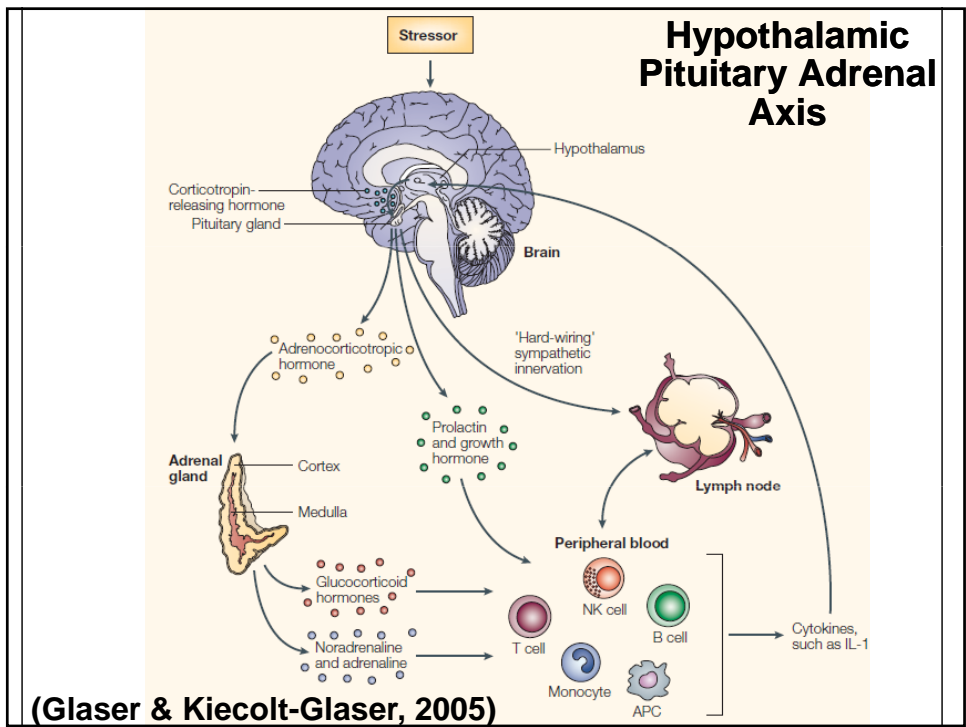
- **Fight or Flight responses: SAM activation**
- **HPA activation**
- **Allostatic load**



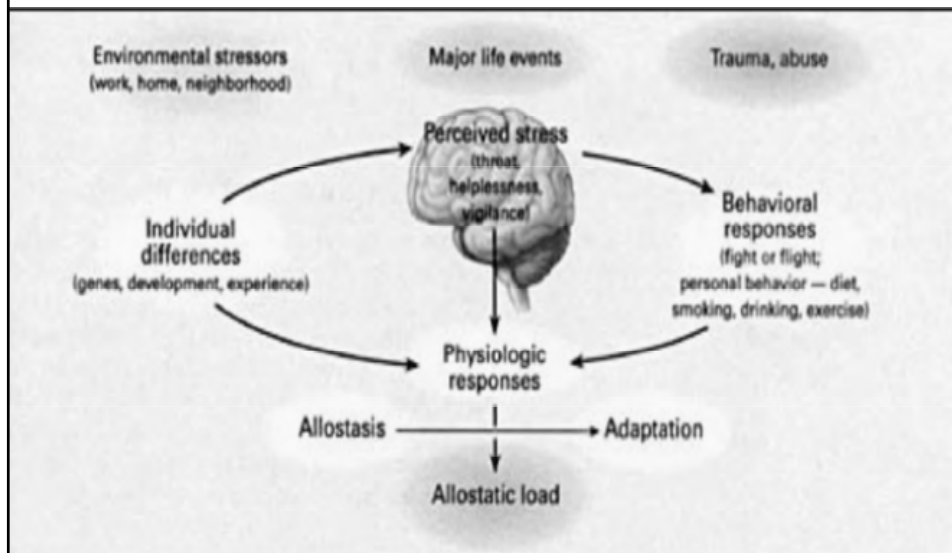
# Fight or Flight



# Hypothalamic Pituitary Adrenal Axis

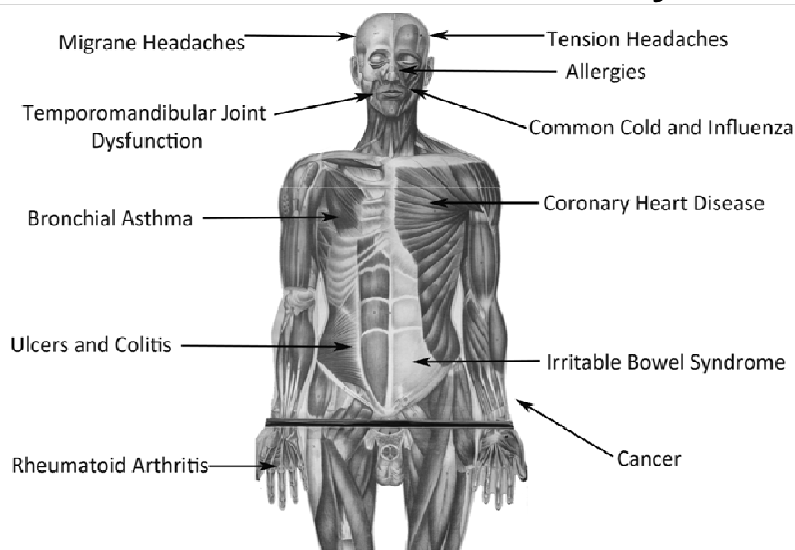


# Allostatic Load



(Juster, McEwen & Lupien, 2010)

## Diseases and Illnesses Caused by Stress



Seaward, B. (1999). *Managing Stress : Principles and Strategies for Health and Wellbeing*. Boston, Mass: Jones and Bartlett.

Original image in the public domain - Author: Bouglé, Julien



## Benefits of Stress Reduction

- Better concentration/focus
- More stable moods
- Improved communication/relationships
- Better physical health
- Increased sense of control of time and activity



CDC/Amanda Mills

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# Stress Management: Part 2 – Interventions

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## Strategies that DO NOT work

- “Try to be more positive.”
- “Everything will be okay.”
- “Just stop worrying.”  
(i.e., Don’t worry, be happy.)
- Thought stopping (Wegner, 1994)
- Avoidance & numbing
  - Alcohol or drug use
  - Distraction & procrastination
- Anxiolytics
- 77% of the chronically anxious can improve with cognitive (thought) and behavioral (action) strategies



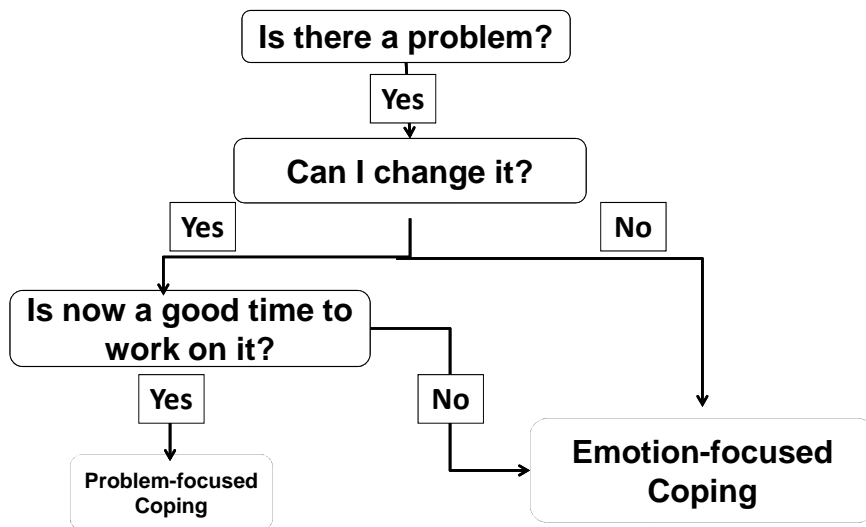
CDC/Debora Cartagena

# Cognitive Behavioral Therapy (CBT)

- Structured, brief and time-limited therapy
- Focused on current behavior
- Empirically-supported to treat a range of clinical problems, including:
  - Anxiety disorders and insomnia
  - Depression
  - Eating disorders
  - Chronic pain

Butler, Chapman, Forman & Beck, 2006

## Problem vs. Emotion-Focused Coping



Problem-focused Coping	Emotion-focused Coping
<ul style="list-style-type: none"> <li>• <b>Problem-solving</b></li> <li>• <b>Getting organized</b></li> <li>• <b>Time-management</b></li> <li>• <b>Assertive communication to manage interpersonal stressors</b></li> <li>• <b>Obtaining instrumental social support</b></li> </ul>	<ul style="list-style-type: none"> <li>• <b>Distraction with pleasurable activities</b></li> <li>• <b>Talking with a friend</b></li> <li>• <b>Diaphragmatic breathing</b></li> <li>• <b>Relaxation</b></li> <li>• <b>Mindfulness</b></li> <li>• <b>Obtaining emotional support</b></li> </ul>

## Problem-Solving

<b>Step 1</b>	• Define the problem.
<b>Step 2</b>	• Brainstorm solutions.
<b>Step 3</b>	• Weigh alternatives.
<b>Step 4</b>	• Select best alternative.
<b>Step 5</b>	• Implement strategy.
<b>Step 6</b>	• Monitor progress.
<b>Step 7</b>	• Go to Step 1 if needed.

**Handout:**  
<http://www.cci.health.wa.gov.au/resources/docs/Info-Problem%20Solving.pdf>

## Time Management

- 168 hours in a week: Keep a time diary (Vanderkam, 2010)
  - *How do you spend your time?*
  - *What things do you do that you are good at?*
  - *What things do others do better than you?*
  - *When do you tend to waste time?*
  - *What brings you meaning in life?*
  - *Is your time focused on what you value most (and are best at)?*
    - Learn to say “no” and delegate



## Other Tips for Managing Time

- Clarify and set “SMART” goals.

<b>S</b>	• Specific
<b>M</b>	• Measurable
<b>A</b>	• Achievable
<b>R</b>	• Relevant
<b>T</b>	• Time-based

- Monitor progress
- Celebrate successes and examine failures

## Managing Email & Smartphone Stress

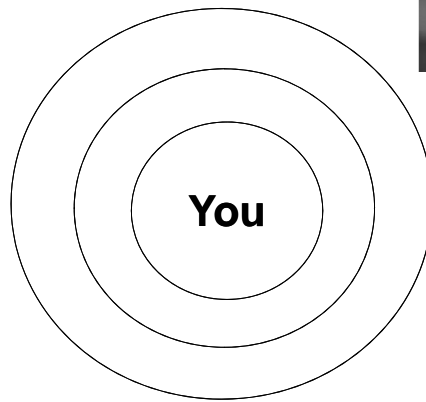
- Check email only at scheduled times
  - Start your day with the most stressful task
  - Save email checking for later in the day
  - Turn off audible alerts
- Have separate work and personal accounts
  - Remove yourself from listservs
- Block time to not answer your phone
  - Especially before bed!

## Seek Social Support

- Who?
  - Family, friends, neighbors, clergy, professionals
- How close?



Author: Rhoda Baer



## Monitor Expectations

- Listens to your problems & cares about your feelings

Emotional Support

- Helps get things done (e.g., mow the lawn, babysitting, chores)

Practical Support

Information Support

Companionship Support

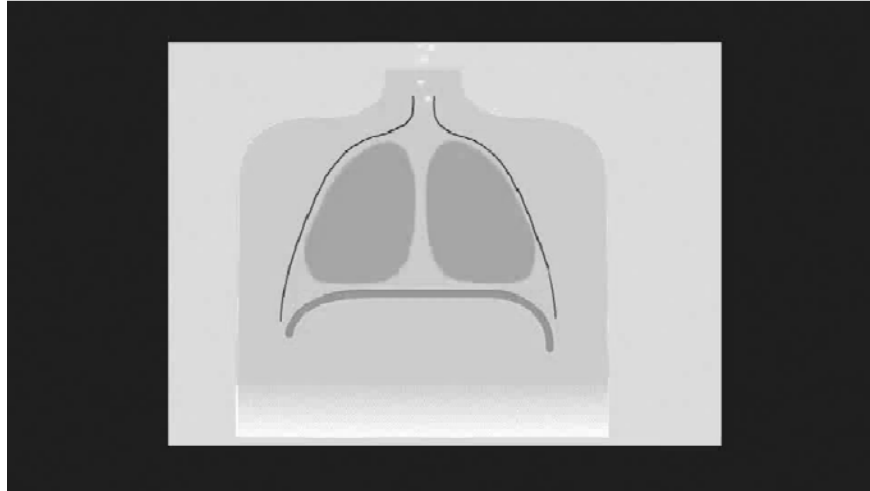
- Gives advice or information

- Does things together with you for fun

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## Diaphragmatic Breathing



CC0 1.0 Universal Public Domain Dedication

Author: John Pierce

## Teach Diaphragmatic Breathing

- **Get into a comfortable position; eyes closed**
- **Place one hand on your chest, one hand on your abdomen**
- **Breathe in 1-2-3-4-5; breathing out 1-2-3-4-5**
- **Practice for 5 to 10 minutes**



## **Progressive Muscle Relaxation**

- **Systematic tensing & relaxing of muscle groups (usually 14 or less)**
- **Produces relaxation response via:**
  - **↑ awareness of muscle tension**
  - **Monitoring & ↓ muscle tension**
- **Taught by trained clinician**
  - **Practiced at home in 10-15 minutes daily**

## **Benefits of PMR**

- **Decreased pain**
- **Improved sleep**
- **Increased energy/decreased fatigue**
- **Decreased perceived stress & anxiety**
- **Improved relaxation**
- **Decreased physiologic indices of stress**
  - **Lower heart rate & salivary cortisol**

**McCallie & Blum, 2006; Parlow & Jones, 2002**

## Mindfulness

- **Being fully aware in the present moment, non-judgmentally**
  - **Opposite of auto-pilot or multi-tasking**
  - **Allows us to be aware of actions and emotions**
  - **Increases our ability to prioritize, focus, and make life choices that are consistent with our values**
- **Associated with decreased stress and improved mental & physical health**

Brown & Ryan, 2003; Grossman, Niemann, Schidt & Walach, 2004; Hoffman, Sawyer, Witt, & Oh, 2010; Klatt, Buckworth & Malarkey, 2008

## Practicing Mindfulness

- **Mindfulness Meditation**
  - **Mindfulness of breath**
- **Body Scan**
- **Yoga**
- **Mindfulness-Based Stress Reduction**  
(Kabat-Zinn, 2003)
- ***“Wherever you Go, There you Are: Mindfulness Meditation in Everyday Life”*** by Jon Kabat-Zinn
- ***Mind the Moment (free online course)***  
[www.harvardpilgrim.org/mindfulness](http://www.harvardpilgrim.org/mindfulness)

# Not Enough Time?

**Ask: “What is most stressful in your life right now?”  
AND  
Educate the patient about the importance/benefits of stress  
management  
THEN**

1. Hire a psychologist to work as part of your multidisciplinary team

2. Refer patients to a counselor for Cognitive Behavioral Therapy via:

- Employee Assistance Programs
- Ohio Psychological Association: [www.ohpsych.org/referral/](http://www.ohpsych.org/referral/)
- The internet: [www.therapists.psychologytoday.com](http://www.therapists.psychologytoday.com)
- Community Mental Health Centers: [mha.ohio.gov/](http://mha.ohio.gov/)

3. Recommend classes in relaxation, mindfulness, or meditation:

- At Ohio State -  
[http://medicalcenter.osu.edu/patientcare/healthcare\\_services/integrative\\_medicine/clinical-services/Pages/Mind-Body-Therapies.aspx](http://medicalcenter.osu.edu/patientcare/healthcare_services/integrative_medicine/clinical-services/Pages/Mind-Body-Therapies.aspx)
- At local YMCAs and health centers

4. Recommend an online stress management workshop:

- [http://hillsborough.ifas.ufl.edu/family\\_life/stress\\_management.shtml](http://hillsborough.ifas.ufl.edu/family_life/stress_management.shtml)

**Do as I say....AND as I do...**

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