Understanding Stress: Signs, Symptoms, Causes, and Effects

We all face different challenges and obstacles, and sometimes the pressure is hard to handle. When we feel overwhelmed, under the gun, or unsure how to meet the demands placed on us, we experience stress. In small doses, stress can be a good thing. It can give you the push you need, motivating you to do your best and to stay focused and alert. Stress is what keeps you on your toes during a presentation at work or drives you to study for your midterm when you'd rather be watching TV. But when the going gets too tough and life's demands exceed your ability to cope, stress becomes a threat to both your physical and emotional well-being.

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- What is stress?
- Signs and symptoms of stress
- Causes of stress
- Risk factors for stress
- Effects of chronic stress
- Severe stress and trauma
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What is stress?

Stress is a psychological and physiological response to events that upset our personal balance in some way. When faced with a threat, whether to our physical safety or emotional equilibrium, the body's defenses kick into high gear in a rapid, automatic process known as the "fight-or-flight" response. We all know what this stress response feels like: heart pounding in the chest, muscles tensing up, breath coming faster, every sense on red alert.

The biological stress response is meant to protect and support us. It's what helped our stone age ancestors survive the life-or-death situations they commonly faced. But in the modern world, most of the stress we feel is in response to psychological rather than physical threats.

Related Articles
- How to manage, reduce, and cope with stress
- Relaxation techniques for stress relief
- How to recognize and prevent burnout

The Body’s Stress Response

The "fight-or-flight" stress response involves a cascade of biological changes that prepare us for emergency action. When danger is sensed,
Caring for a chronically-ill child or getting audited by the IRS qualify as stressful situations, but neither calls for either fight or flight. Unfortunately, our bodies don’t make this distinction. Whether we’re stressed over a looming deadline, an argument with a friend, or a mountain of bills, the warning bells ring. And just like a caveman confronting a sabertooth tiger, we go into automatic overdrive.

If you have a lot of responsibilities and worries, you may be running on stress a good portion of the time—launching into emergency mode with every traffic jam, phone call from the in-laws, or segment of the evening news. But the problem with the stress response is that the more it’s activated, the harder it is to shut off. Instead of leveling off once the crisis has passed, your stress hormones, heart rate, and blood pressure remain elevated.

Furthermore, extended or repeated activation of the stress response takes a heavy toll on the body. Prolonged exposure to stress increases your risk of everything from heart disease, obesity, and infection to anxiety, depression, and memory problems. Because of the widespread damage it can cause, it’s essential to learn how to deal with stress in a more positive way and reduce its impact on your daily life.

### Signs and symptoms of stress

To get a handle on stress, you first need to learn how to recognize it in yourself. Stress affects the mind, body, and behavior in many ways—all directly tied to the physiological changes of the fight-or-flight response. The specific signs and symptoms of stress vary widely from person to person. Some people primarily experience physical symptoms, such as low back pain, stomach problems, and skin outbreaks. In others, the stress pattern centers around emotional symptoms, such as crying jags or hypersensitivity. For still others, changes in the way they think or behave predominates.

The following table lists some of the common warning signs and symptoms of stress. Use it to identify the symptoms you typically experience when you’re under stress. If you know your red flags, you can take early steps to deal with the stressful situation before it—or your emotions—spiral out of control.

<table>
<thead>
<tr>
<th>Cognitive Symptoms</th>
<th>Emotional Symptoms</th>
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<tbody>
<tr>
<td>Memory problems</td>
<td>Moodiness</td>
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<tr>
<td>Indecisiveness</td>
<td>Agitation</td>
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<td>Inability to concentrate</td>
<td>Restlessness</td>
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<td>Trouble thinking clearly</td>
<td>Short temper</td>
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<tr>
<td>Poor judgment</td>
<td>Irritability, impatience</td>
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<tr>
<td>Seeing only the negative</td>
<td>Inability to relax</td>
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<tr>
<td>Anxious or racing thoughts</td>
<td>Feeling tense and “on edge”</td>
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<tr>
<td>Constant worrying</td>
<td>Feeling overwhelmed</td>
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<tr>
<td>Loss of objectivity</td>
<td>Sense of loneliness and isolation</td>
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<tr>
<td>Fearful anticipation</td>
<td>Depression or general unhappiness</td>
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<table>
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<th>Physical Symptoms</th>
<th>Behavioral Symptoms</th>
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<tbody>
<tr>
<td>Headaches or backaches</td>
<td>Eating more or less</td>
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A small part of the brain called the hypothalamus sets off a chemical alarm. The sympathetic nervous system responds by releasing a flood of stress hormones, including adrenaline, norepinephrine, and cortisol. These stress hormones race through the bloodstream, readying us to either flee the scene or battle it out.

Heart rate and blood flow to the large muscles increase so we can run faster and fight harder. Blood vessels under the skin constrict to prevent blood loss in case of injury, pupils dilate so we can see better, and our blood sugar ramps up, giving us an energy boost and speeding up reaction time. At the same time, body processes not essential to immediate survival are suppressed. The digestive and reproductive systems slow down, growth hormones are switched off, and the immune response is inhibited.
Keep in mind that the signs and symptoms of stress can also be caused by other psychological and medical problems. If you're experiencing any of the warning signs of stress, it's important to see a doctor for a full evaluation. Your doctor can help you determine whether or not your symptoms are stress-related.

Causes of stress

The potential causes of stress are numerous and highly individual. What you consider stressful depends on many factors, including your personality, general outlook on life, problem-solving abilities, and social support system. Something that's stressful to you may not faze someone else, or they may even enjoy it. For example, your morning commute may make you anxious and tense because you worry that traffic will make you late. Others, however, may find the trip relaxing because they allow more than enough time and enjoy listening to music while they drive.

The pressures and demands that cause stress are known as stressors. We usually think of stressors as being negative, such as an exhausting work schedule or a rocky relationship. However, anything that forces us to adjust can be a stressor. This includes positive events such as getting married or receiving a promotion. Regardless of whether an event is good or bad, if the adjustment it requires strains our coping skills and adaptive resources, the end result is stress.

Major life changes

Major life events are stressors. Whether it be a divorce, a child leaving home, a planned pregnancy, a move to a new town, career change, graduating from college, or a diagnosis of cancer, the faster or more dramatic the change, the greater the strain. Furthermore, the more major life changes you're dealing with at any one time, the more stress you'll feel.

Daily hassles and demands

While major life changes are stressful, they are also relative rarities. After all, it's not every day that you file for divorce or have a baby. However, you may battle traffic, argue with your family members, or worry about your finances on a daily basis. Because these small upsets occur so regularly, they end up affecting us the most.

Daily causes of stress include:

- **Environmental stressors** – Your physical surroundings can set off the stress response. Examples of environmental stressors include an unsafe neighborhood, pollution, noise (sirens keeping you up at night, a barking dog next door), and uncomfortable living conditions. For people living in crime-ridden areas or war-torn regions, the stress may be unrelenting.

- **Family and relationship stressors** – Problems with friends, romantic partners, and family members are common daily stressors. Marital disagreements, dysfunctional relationships, rebellious teens, or caring for a...
chronically-ill family member or a child with special needs can all send stress levels skyrocketing.

- **Work stressors** – In our career-driven society, work can be an ever-present source of stress. Work stress is caused by things such as job dissatisfaction, an exhausting workload, insufficient pay, office politics, and conflicts with your boss or co-workers.

- **Social stressors** – Your social situation can cause stress. For example, poverty, financial pressures, racial and sexual discrimination or harassment, unemployment, isolation, and a lack of social support all take a toll on daily quality of life.

**Internal Causes of Stress**

Not all stress is caused by external pressures and demands. Your stress can also be self-generated. Internal causes of stress include:

- Uncertainty or worries
- Pessimistic attitude
- Self-criticism
- Unrealistic expectations or beliefs
- Perfectionism
- Low self-esteem
- Excessive or unexpressed anger
- Lack of assertiveness

**Risk factors for stress**

The presence of a stressor doesn’t automatically result in disabling stress symptoms. The degree to which any stressful situation or event impacts your daily functioning depends partly on the nature of the stressor itself and partly on your own personal and external resources.

### Stress: How vulnerable are you?

<table>
<thead>
<tr>
<th>The nature of the stressor</th>
<th>Stressors that involve central aspects of your life (your marriage, your job) or are chronic issues (a physical handicap, living from paycheck to paycheck) are more likely to cause severe distress.</th>
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</thead>
<tbody>
<tr>
<td>A crisis experience</td>
<td>Sudden, intense crisis situations (being raped, robbed at gunpoint, or attacked by a dog) are understandably overwhelming. Without immediate intervention and treatment, debilitating stress symptoms are common.</td>
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<tr>
<td>Multiple stressors or life changes</td>
<td>Stressors are cumulative, so the more life changes or daily hassles you're dealing with at any one time, the more intense the symptoms of stress.</td>
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<tr>
<td>Your perception of the stressor</td>
<td>The same stressor can have very different effects on different people. For example, public speaking stresses many out, but others thrive on it. Additionally, if you’re able to see some benefit to the situation—the silver lining or a hard lesson learned—the stressor is easier to swallow.</td>
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<tr>
<td>Your knowledge and preparation</td>
<td>The more you know about a stressful situation, including how long it will last and what to expect, the better able you’ll be to face it. For example, if you go into surgery with a realistic picture of what to expect post-op, a painful recovery will be less traumatic than if you were expecting to bounce back immediately.</td>
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<tr>
<td>Your stress tolerance</td>
<td>Some people roll with the punches, while others crumble at the slightest obstacle or frustration. The more confidence you have in yourself and your ability to persevere, the better able you’ll be to take a stressful situation in stride.</td>
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</table>
Effects of chronic stress

Chronic stress wears you down day after day and year after year, with no visible escape. Under sustained or severe stress, even the most well-adjusted person loses the ability to adapt. When stress overwhelms our coping resources, our bodies or minds suffer.

Health effects

Recent research suggests that anywhere from 60 to 90 percent of illness is stress-related. The physical wear and tear of stress includes damage to the cardiovascular system and immune system suppression. Stress compromises your ability to fight off disease and infection, throws your digestive system off balance, makes it difficult to conceive a baby, and can even stunt growth in children.

Stress and Your Health

Many medical conditions are caused or exacerbated by stress, including:

- Chronic pain
- Migraines
- Ulcers
- Heartburn
- High blood pressure
- Heart disease
- Diabetes
- Asthma
- PMS
- Obesity
- Infertility
- Autoimmune diseases
- Irritable bowel syndrome
- Skin problems

Emotional effects

Chronic stress grinds away at your mental health, causing emotional damage in addition to physical ailments. Long-term stress can even rewire the brain, leaving you more vulnerable to everyday pressures and less able to cope. Over time, stress can lead to mental health problems such as:

- anxiety
- depression
- eating disorders, and
- substance abuse.

Severe stress and trauma

Severe stress reactions can result from sudden, catastrophic events or traumatic experiences such as a natural disaster, sexual assault, life-threatening accident, or participation in combat. After the initial shock and emotional fallout, many trauma victims gradually begin to recover from its effects. But for some people, the stress symptoms don’t go away, the body doesn’t regain its equilibrium, and life doesn’t return to normal. This severe and persisting reaction to trauma is known as post-traumatic stress disorder (PTSD).

Common symptoms of PTSD include:

- Flashbacks, intrusive thoughts, or nightmares about the trauma
- Avoidance of places and things associated with the trauma
- Hypervigilance for signs of danger
- Chronic irritability and tension

http://www.helpguide.org/mental/stress_signs.htm
- Depression.

PTSD is a serious disorder that requires professional intervention.

For more information on traumatic experiences and how to recover, see Emotional and Psychological Trauma and Posttraumatic Stress Disorder (PTSD).

Managing stress and its symptoms

While unchecked stress is undeniably damaging, there are many things you can do to control it and reduce its effects.

Coping with stress

Following a few simple stress management tips can help you minimize stressors in your life, deal with your stress symptoms in a healthy way, and buffer yourself from its negative effects.

Read Coping with stress

Relaxation techniques for stress relief

Not all stress can be avoided, but when it hits, relaxation techniques such as meditation, deep breathing, and yoga can provide relief.

Read Relaxation techniques for stress relief

To Learn More: Related Helpguide Articles

- Preventing Burnout: Signs, Symptoms, and Strategies
- Dealing with Job Stress: Reducing and Managing Stress at Work
- Defusing Stress: Find Quick Stress Relief that Works Best for You
- Dealing with Relationships Stress: How To Stay Calm and Communicate Better

Related links for stress signs, symptoms, causes, and effects

Stress signs and symptoms

- What is stress? – Describes the factors that cause stress, signs and symptoms of a problem, and the difference between acute and chronic stress. (University of Maryland Medical Center)
- Understanding and Dealing with Stress – This course, prepared by a West Virginia-based organization that works with disabled people, presents a wealth of information on stress and its signs and symptoms. (Mountain State Centers for Independent Living)
- The Different Kinds of Stress – Thorough description of acute, episodic acute, and chronic stress, along with the causes and signs of stress. (APA Help Center)

Causes of stress

- Stress management for team members – Contains information on causes of stress that go beyond the usual work and interpersonal factors. (Team Technology)

Effects of stress on health

- Stress: It's Worse Than You Think – Detailed article on the physiological basis for stress, the signs and symptoms, and the
devastating effects it can have on people of all ages. (Psychology Today)

Stress System Malfunction Could Lead to Serious, Life Threatening Disease – Explanations of the stress response and how stress causes ill effects in the human body and brain. (National Institutes of Health)

Stress: Unhealthy response to the pressures of life – Description of how stress causes symptoms and changes in different systems in the body. (Mayo Clinic)

Stress – Discussion of stress signs, symptoms and long-term effects, with a focus on cardiovascular health. (Mount Sinai School of Medicine)

Stress in kids and teens

Childhood Stress – Clearly lays out what causes stress in children and how parents sometimes contribute to the problem. (KidsHealth)

Teen Stress – Article geared for teenagers describes the causes, symptoms, and effects of stress in young adults. Includes tips for keeping it under control. (TeenHealth)

Ellen Jaffe–Gill, Melinda Smith, M.A., Heather Larson, and Jeanne Segal, Ph.D. contributed to this article. Last modified on: 12/13/2007