## QUESTIONS TO ASK YOUR DOCTOR

- How do I know if I have postpartum depression?
- What type of treatment do you recommend for me?
- What symptoms or behaviors are important enough that I should seek immediate treatment?
- Can you recommend any support group for me and my family?

medication during pregnancy should always take place under careful medical supervision.

### Risks

If untreated, PPD can continue for months or years. The mother's mental and physical health can be adversely affected, which interferes with her ability to care for and connect with her baby. Therefore, the baby is also at risk for health problems. Research has shown that untreated PPD results in poor mother-baby bonding, negative parenting practices, difficulties breastfeeding, and marital problems; in addition, the cognitive and social development of the new baby and other children in the family is impaired. In untreated severe PPD cases, the mother may physically harm herself, her baby, and/or other family members.

Postpartum psychosis is quite rare, occurring with 0.1%–0.2% of births. The mothers most at risk of postpartum psychosis are those with a family history of bipolar disorder or with personal history of psychotic episodes.

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American College of Obstetricians and Gynecologists (ACOG), 409 12th Street SW, Washington, DC 20024-2188, (800) 673-8444, https://www.acog.org/.

National Institute of Mental Health, 6001 Executive Blvd., Room 8184, MSC 9663, Bethesda, MD 20892, (866) 615-6464, http://www.nimh.nih.gov.

Office on Women's Health, U.S. Department of Health and Human Services, 200 Independence Ave. SW, Washington, DC 20201, (800) 994-9662, http://www.womenshealth.gov.

Postpartum Support International, PO Box 60931, Santa Barbara, CA 93160, (805) 967-7636, (800) 944-4773, http://www.postpartum.net.

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# Post-traumatic stress disorder (PTSD)

## Definition

Post-traumatic stress disorder (PTSD) is a complex condition that may occur after individuals experience or witness a traumatic or stressful event, learn that a close family member or friend experienced one or died violently, or are repeatedly exposed to aversive details of traumatic events (e.g., a first responder). This condition was first defined as a distinctive disorder in 1980. Originally diagnosed in veterans of the Vietnam War, it is now recognized in civilian survivors of sexual or other criminal assaults; human trafficking; natural disasters; plane crashes, train collisions, severe motor vehicle


**A patient uses a simulator that helps in the treatment of PTSD.** *(Jason Kaye/Science Source)*

accidents, or industrial explosions; acts of terrorism; mass shootings; child abuse; certain traumatic medical events; torture; kidnapping; or war.

## Demographics

PTSD can develop in almost anyone in any age group exposed to a sufficiently catastrophic and traumatic event or series of events. The National Institute of Mental Health (NIMH) estimates that about 8 million adults in the United States have PTSD. One study found that 3.7% of a sample of teenage boys and 6.3% of adolescent girls had PTSD. It is estimated that people's risk of developing PTSD over the course of their life is between 8% and 10%. Women are more than twice as likely as men to have PTSD at some point in their lives. On average, 30% of soldiers who have been in a war zone develop PTSD. The highest rates of PTSD—30% to 50%—have been found to occur in survivors of rape, military combat and captivity, and politically or ethnically motivated imprisonment and genocide.

PTSD can also develop in first responders (e.g., paramedics, firefighters, police), therapists, journalists, volunteer rescue workers, and witnesses of a traumatic event or events. Research suggests that prevalence of PTSD in first responders is greater than the general population and ranges from 10% to 20% but may be as high as 40%.

## Description

Posttraumatic stress disorder is a complex mental health condition that develops in some individuals after experiencing or witnessing traumatic or stressful events. In general, it is normal to be upset, have sleeping difficulties, or have anxiety for a few weeks or even months after such an event. If these feelings persist and other symptoms emerge after a few months, PTSD is likely.

The experience of PTSD has sometimes been described as like being in a horror film that keeps replaying and cannot be turned off. It is common for people with PTSD to feel intense anxiety and helplessness and to relive the traumatic event in nightmares or in their waking hours. Sometimes the memory is triggered by a sound, smell, or image that reminds the sufferer of the traumatic event. These re-experiences of the event are called flashbacks. Individuals with PTSD are also likely to be jumpy and easily startled or to go numb emotionally

and lose interest in activities they used to enjoy. They may have problems with memory and with getting enough sleep. In some cases they may feel disconnected from the real world or have moments in which their own bodies seem unreal; these symptoms are indications of dissociation, a process in which the mind splits off certain memories or thoughts from conscious awareness. Individuals with PTSD may use alcohol or drugs to escape the flashbacks and other symptoms of the disorder and are thus more likely to have substance use disorders and other mental health issues.

### *Risk factors*

Factors that influence the likelihood of developing PTSD include:

- The nature, intensity, and duration of the traumatic experience. For example, someone who just barely escaped from the World Trade Center before the towers collapsed is at greater risk of PTSD than someone who saw the collapse from a distance or on television. PTSD is also more common after certain types of trauma, such as military combat and sexual assault.
- Previous history of abuse, trauma, or mental illness. People who were abused as children, who were separated from their parents at an early age, or who have a previous history of anxiety or depression are at increased risk of PTSD.
- Injury during the traumatic event. Physical injuries can exacerbate mental stress and make it more likely that the individual will develop PTSD.
- Genetic factors. Vulnerability to PTSD may be inherited.
- The availability of social support after the event. People who have fewer or weaker family and social connections are more likely to develop PTSD than those who have strong family and social support.

**HIGH-RISK POPULATIONS.** Some subpopulations in the United States are at greater risk of developing PTSD. The lifetime prevalence of PTSD among persons living in depressed urban areas or on Native American reservations is estimated at 23%. For victims of violent crimes, the estimated rate is 58%.

PTSD also appears to be more common in seniors than in younger people. Thirteen percent of the senior population reports they are affected by PTSD in comparison to 7%–10% of the entire population. Reports of elder abuse crimes have gone up by 200% since 1986. Also, the incidence of PTSD is known to be higher among Holocaust survivors, war veterans, and cancer or heart surgery survivors, which accounts for a significant percentage of older Americans. Of those seniors who are military veterans, there is an increasing number who are isolated and/or in poor health as a result of PTSD.

Children are also susceptible to PTSD and their risk is increased exponentially as their exposure to the event increases. Children experiencing abuse, the death of a parent, or those located in a community suffering a traumatic event can develop PTSD. Two years after the Oklahoma City bombing of 1995, 16% of children within a 100-mile radius of Oklahoma City with no direct exposure to the bombing had increased symptoms of PTSD. Weak parental response to the event, having a parent suffering from PTSD symptoms, and intensified exposure to the event via the media all increase the possibility of a child's developing PTSD symptoms. In addition, a developmentally inappropriate sexual experience for a child may be considered a traumatic event, even though it may not have involved violence or physical injury. The fifth edition of the *Diagnostic and Statistical Manual of Mental Disorders* (*DSM-5*) includes a new diagnostic category for PTSD in preschool children.

**MILITARY VETERANS.** Studies conducted between 2004 and 2006 with veteran participants from the wars in Iraq and in Afghanistan found a strong correlation between duration of combat exposure and PTSD. Veterans of combat in Iraq reported a higher rate of PTSD than those deployed to Afghanistan because of longer exposure to warfare.

Information about PTSD in veterans of the Vietnam era is derived from the National Vietnam Veterans Readjustment Survey (NVVRS), conducted between 1986 and 1988. The estimated lifetime prevalence of PTSD among American veterans of this war is 30.9% for men and 26.9% for women. An additional 22.5% of the men and 21.2% of the women have been diagnosed with partial PTSD at some point in their lives. The lifetime prevalence of PTSD among veterans of World War II and the Korean War is estimated at 20%.

**CROSS-CULTURAL ISSUES.** Further research needs to be done on the effects of ethnicity and culture on PTSD. Compared with U.S. non-Latino whites, higher rates of PTSD have been reported among U.S. Latinos, African Americans, and American Indians, and lower rates have been reported among Asian Americans, after adjustment for traumatic exposure and demographic variables. The *DSM-5* notes that the risk of onset and severity of PTSD may differ across cultural groups depending on the type of traumatic exposure (for example, cultures outside the United States subjected to genocide), ongoing sociocultural context (for example, being forced to live in post-conflict settings with perpetrators), and other cultural factors. Also, symptom expression may differ across cultures.

**PROTECTIVE OR RESILIENCE FACTORS.** As important as the question of who gets PTSD is the question of who does not get PTSD. Researchers have identified the following resilience factors, which seem to decrease the likelihood that traumatic exposure will lead to PTSD:

- actively seeking support from friends, family, or others following a traumatic incident
- engaging with a formal support group
- maintaining a positive view of personal actions during the course of or in response to the traumatic incident
- implementing a coping strategy
- feeling as if a lesson has been learned from the traumatic event
- not becoming paralyzed with terror; being able to respond and react effectively despite fear

## Causes and symptoms

The causes of PTSD are not completely understood. One major question that had not been answered as of 2018 is why some people involved in a major disaster develop PTSD and other survivors of the same event do not. For example, a survey of 988 adults living close to the World Trade Center conducted in November 2001 found that only 7% had been diagnosed with PTSD following the events of September 11, 2001; the other 93% were anxious and upset, but they did not develop PTSD. Research into this question is ongoing.

### *Causes*

When PTSD was first suggested as a diagnostic category for *DSM-III* in 1980, it was controversial precisely because of the central role of outside stressors as causes of the disorder. Psychiatry has generally emphasized the internal abnormalities of individuals as the source of mental disorders; prior to the 1970s, war veterans, rape victims, and other trauma survivors were often blamed for their symptoms and regarded as cowards, moral weaklings, or masochists. The high rate of psychiatric casualties among Vietnam veterans, however, led to studies conducted by the Veterans Administration. These studies helped to establish PTSD as a legitimate diagnostic entity with a complex set of causes.

**BIOCHEMICAL/PHYSIOLOGICAL CAUSES.** Some neurobiological research indicates that traumatic events cause lasting changes in the human nervous system, including abnormal levels of secretion of stress hormones. In addition, in people with PTSD, researchers have found changes in the amygdala and the hippocampus, the parts of the brain that form links between fear and memory. Experiments with ketamine, a drug that inactivates one of the neurotransmitters in the central nervous system, suggest that trauma works in a similar way to damage associative pathways in the brain. Positron emission tomography (PET) scans of PTSD patients suggest that trauma affects the parts of the brain that govern speech and language.

**SOCIOCULTURAL CAUSES.** Studies of specific populations of PTSD patients (combat veterans, survivors of rape or genocide, former political hostages or prisoners, etc.) have shed light on the social and cultural causes of PTSD. In general, societies that are highly authoritarian, glorify violence, or sexualize violence have high rates of PTSD even among civilians.

**OCCUPATIONAL FACTORS.** Persons whose work exposes them to traumatic events or who treat trauma survivors may develop PTSD. These occupations include specialists in emergency medicine, police officers, firefighters, search-and-rescue personnel, psychotherapists, and disaster investigators. The degree of risk for PTSD is related to three factors: the amount and intensity of exposure to the suffering of trauma victims, the worker's degree of empathy and sensitivity, and unresolved issues from the worker's personal history.

**PERSONAL VARIABLES.** Although the most important causal factor in PTSD is the traumatic event itself, individuals differ in the intensity of their cognitive and emotional responses to trauma; some individuals appear to be more vulnerable than others. In some cases, this greater vulnerability is related to temperament or natural disposition. In other cases, the person's vulnerability results from chronic illness, a physical disability, or previous traumatization, particularly abuse in childhood. Studies done by the U.S. Department of Veterans Affairs have found some evidence that race and ethnicity may also play a factor, with veterans belonging to ethnic minority groups at higher risk of experiencing PTSD after combat.

### *Symptoms*

Symptoms of PTSD vary depending on the individual and the nature of the traumatic event and may include the following:

- recurrent, intrusive, involuntary memories of the traumatic event
- recurrent distressing dreams related to the traumatic event
- dissociative reactions (flashbacks) in which the individual feels or acts as if the traumatic event is reoccurring
- intense or prolonged psychological distress with marked physiological responses upon exposure to things that remind the individual of the event
- avoidance of or efforts to avoid distressing memories, thoughts, or feelings and/or external reminders (people, places, situations, objects) of the traumatic event

## KEY TERMS

**Benzodiazepines**—A class of drugs that have a hypnotic and sedative action, used mainly as tranquilizers to control symptoms of anxiety.

**Cognitive-behavioral therapy**—A type of psychotherapy used to treat anxiety disorders, including PTSD, that emphasizes behavioral change as well as alteration of negative thought patterns.

**Cortisol**—A hormone produced by the adrenal glands near the kidneys in response to stress.

**Dissociation**—The splitting off of certain mental processes from conscious awareness. Many PTSD patients have dissociative symptoms.

**Flashback**—A temporary reliving of a traumatic event.

**Hyperarousal**—A state of increased emotional tension and anxiety, often including jitteriness and being easily startled.

**Hypervigilance**—A condition of abnormally intense watchfulness or wariness. Hypervigilance is one of the most common symptoms of PTSD.

**Prevalence**—The percentage of a population that is affected by a specific disease or condition at a given time.

**Selective serotonin reuptake inhibitors (SSRIs)**—A class of antidepressants that works by blocking the reabsorption of serotonin in the brain, raising the levels of serotonin.

**Trauma**—A severe injury or shock to a person's body or mind.

- negative thoughts and mood, such as inability to remember important aspects of the traumatic event; persistent negative beliefs about oneself, others, or the world; distorted sense of self-blame and negative emotional state; markedly diminished interest in significant activities; feelings of detachment from others; and inability to experience positive emotions
- hyperarousal and hypervigilance, including irritable outbursts with little provocation, reckless behavior, exaggerated startle response, and concentration and sleep problems

The above symptoms in children under age six years who have PTSD may manifest differently. For example, disturbing dreams may not have a clear link to the event, or flashbacks may take the form of play that reenacts the trauma.

Symptoms usually begin within the first three months after the traumatic event, although there may be a delay of months or even years before criteria for a diagnosis are met. The *DSM-IV* called this delayed onset. The *DSM-5* refers to this as delayed expression of symptoms.

## Diagnosis

The diagnosis of PTSD is based on the patient's history, including the timing of the traumatic event and the duration of the patient's symptoms.

### *Examination*

Consultation with a mental health professional for diagnosis and a plan of treatment is always advised. A two-pronged approach to evaluation is considered the best way to make a valid diagnosis because it can gauge under-reporting or over-reporting of symptoms. The two primary forms are structured interviews and self-report questionnaires. Spouses, partners, and other family members may also be interviewed. Because the evaluation may involve subtle reminders of the trauma in order to gauge a patient's reactions, individuals should ask for a full description of the evaluation process beforehand. Asking what results can be expected from the evaluation is also advised.

A number of structured interview forms facilitate the diagnosis of PTSD and include the following:

- Clinician Administered PTSD Scale (CAPS) developed by the National Center for PTSD
- Structured Clinical Interview for DSM (SCID)
- Anxiety Disorders Interview Schedule-Revised (ADIS)
- PTSD-Interview
- Structured Interview for PTSD (SI-PTSD)
- PTSD Symptom Scale Interview (PSS-I)

Self-reporting checklists provide scores to represent the level of stress experienced. Some of the most commonly used checklists are:

- The PTSD Checklist (PCL), which has one list for civilians and one for military personnel and veterans
- Impact of Event Scale-Revised (IES-R)
- Keane PTSD Scale of the MMPI-2
- Mississippi Scale for Combat Related PTSD and the Mississippi Scale for Civilians
- Post Traumatic Diagnostic Scale (PDS)
- Penn Inventory for Post-Traumatic Stress
- Los Angeles Symptom Checklist (LASC)

### *Tests*

There are no laboratory or imaging tests that can detect PTSD, although the doctor may order imaging studies of the brain to rule out head injuries or other physical causes of the patient's symptoms.

### *Diagnostic criteria*

With the publication of the *DSM-5*, some of the diagnostic criteria for PTSD changed. The most significant is the removal of the wording that the individual had to have responded to a traumatic event with "intense fear, hopelessness, or horror," as stated in the *DSM-IV*. Moreover, in the list of qualifying traumatic events, death of a close family member or friend by natural causes was removed; the *DSM-5* specifies that the nature of the death must have been violent or accidental.

According to the *DSM-5*, the following criteria must be present for a diagnosis of PTSD in adults, adolescents, and children older than six. First, the individual was exposed to death, was threatened with death, faced actual or threatened serious injury, or actual or threatened sexual violence by the following:

- had direct exposure
- witnessed the event
- learned that a close family member or friend experienced a trauma (if actual or threatened death, must have been violent or accidental)
- had indirect exposure to aversive details of traumatic events, usually in the course of professional duties (e.g., first responders, medical professionals)

Second, the traumatic event is persistently re-experienced in at least one of the following:

- unwanted disturbing memories
- flashbacks
- nightmares
- emotional distress after exposure to reminders of traumatic event
- physical reactions after exposure to reminders of traumatic event

Third, avoidance of trauma-related stimuli after the traumatic event by avoiding either trauma-related thoughts or feelings or trauma-related reminders such as people, places, situations, objects.

Fourth, negative thoughts or feelings that began or worsened after the traumatic event, expressed in at least two of the following ways:

- excessively negative thoughts and assumptions about oneself or of the world
- persistent negative emotional state
- exaggerated self-blame or blaming others for causing the trauma
- inability to remember key aspects of the traumatic event
- feelings of isolation
- persistent inability to experience positive emotions
- markedly diminished interest in significant activities (e.g., child's graduation, marital anniversary)

Fifth, trauma-related hyperarousal and reactivity that began or worsened after the event, expressed in at least two of the following ways:

- irritability or aggression
- risky or destructive behavior
- hypervigilance
- heightened startle reaction
- difficulty concentrating
- sleeping disturbances

The above symptoms must be present for more than one month and must create distress or functional impairment, such as at work or in social situations. And symptoms must not be caused by medications, substance use, or other illness.

The diagnosis of PTSD is more complicated when the individual also has a traumatic brain injury (TBI) or other psychological problems, such as a substance use disorder or personality disorder.

The *DSM-5* has a new category: Posttraumatic Stress Disorder for Children 6 Years and Younger. While many of the diagnostic criteria are similar to adults and older children, there are some differences:

- distressing and intrusive memories may not be readily apparent to parents or caregivers, and the child may express through play re-enactment of the traumatic event
- disturbing dreams may not directly reflect the traumatic event and be symbolized by something else (e.g., frightening make-believe monsters in dreams), and parents and caregivers may not be able to tell if the dreams are related.

Given the increasing number of children of all ages exposed to mass shootings in the United States and to terrorism and war in other countries, the addition of this new diagnostic category is important.

## Treatment

Various treatments are used for PTSD.

### *Traditional*

Treatment for PTSD usually involves a combination of medications and psychotherapy. If patients use alcohol or drugs excessively, they must be treated for the substance use before being treated for PTSD. If they are diagnosed with coexisting depression, treatment should focus on the PTSD because its course, biology, and treatment response are different from those associated with major depression. Patients with the disorder are usually treated as outpatients; they are not hospitalized unless they are threatening to commit suicide or harm other people.

Mainstream forms of psychotherapy used to treat patients who have already developed PTSD include:

- Cognitive-behavioral therapy. There are two treatment approaches to PTSD included under this heading: exposure therapy, which seeks to desensitize the patient to reminders of the trauma; and anxiety management training, which teaches the patient strategies for reducing anxiety. These strategies may include relaxation training, biofeedback, social skills training, distraction techniques, or cognitive restructuring.
- Psychodynamic psychotherapy. This approach helps the patient recover a sense of self and learn new coping strategies and ways to deal with intense emotions related to the trauma. Typically, it consists of three phases: establishing a sense of safety for the patient; exploring the trauma itself in depth; helping the patient re-establish connections with family, friends, the wider society, and other sources of meaning.
- Discussion groups or peer-counseling groups. These groups are usually formed for survivors of specific traumas, such as combat, rape/incest, and natural or transportation disasters. They help patients to recognize that other survivors of the shared experience have had the same emotions and reacted to the trauma in similar ways. They appear to be especially beneficial for patients with guilt issues about their behavior during the trauma (e.g., submitting to rape to save one's life or surviving the event when others did not).
- Family therapy. This form of treatment is recommended for PTSD patients whose family life has been affected by the PTSD symptoms.

### *Drugs*

In general, medications are used most often in patients with severe PTSD to treat the intrusive symptoms of the disorder as well as feelings of anxiety and depression. These drugs are usually given as one part of a treatment plan that also includes psychotherapy or group therapy. No single medication is considered a primary cure for PTSD. The selective serotonin reuptake inhibitors (SSRIs) appear to help the core symptoms when given in higher doses for five to eight weeks, and the tricyclic antidepressants (TCAs) or the monoamine oxidase inhibitors (MAOIs) are most useful in treating anxiety and depression.

Sleep problems can be lessened with brief treatment with an antianxiety drug, such as a benzodiazepine such as alprazolam (Xanax), but long-term usage can lead to disturbing side effects, including increased anger, drug tolerance, dependency, and abuse. Benzodiazepines are also not given to PTSD patients diagnosed with coexisting drug or alcohol abuse.

A high rate of cannabis (marijuana) use has been found in those with PTSD. Scientific studies have shown that the cannabinoids (chemicals in cannabis) may decrease PTSD symptoms, including sleep disturbances, nightmares, and hyperarousal. Research into the medical uses of cannabis is ongoing and vigorous, especially for PTSD. Individuals with PTSD who live in states that have legalized medical uses of cannabis may be able to get a prescription for medical use. Wider use of cannabis has been limited by the federal laws against its use.

### *Alternative*

There are many alternative and complementary medicine therapies that are being used and researched for helping those with PTSD. One or more of these can be practiced along with traditional treatments to help with stress management and relaxation.

Mindfulness meditation, also called relaxation training, includes breathing exercises and mind-body awareness training, intended to help the patient prevent hyperventilation and relieve the muscle tension associated with the fight-or-flight reaction of anxiety. Yoga, aikido, tai chi, and dance therapy help patients work with the physical as well as the emotional tensions that either promote anxiety or are created by the anxiety.

Animal-assisted therapy is used by some health-care professionals and organizations to help individuals with PTSD, especially children and military veterans with PTSD. Animal-assisted therapy involves one or more sessions weekly with a therapist trained in animal-assisted interventions and a trained therapy animal, most commonly dogs or horses. Dogs are also trained to be service animals and paired with individuals with PTSD to live with and assist them full time. Several nonprofit organizations acquire and train dogs to be PTSD service animals and match them with veterans with PTSD; the dogs are trained to identify PTSD symptoms, signal their owner, and either comfort or protect the owner when symptoms manifest. Research studies have shown that

animal-assisted therapy reduces depression, anxiety, nightmares, and other PTSD symptoms. In some cases, after acquiring and training with a PTSD service dog, veterans have reported being able to function in public for the first time.

Other alternative or complementary therapies are based on physiological and/or energetic understanding of how the trauma is imprinted in the body. These therapies affect a release of stored emotions and resolution of them by working with the body rather than merely talking through the experience. One example of such a therapy is somatic experiencing (SE), a short-term, biological, body-oriented approach to PTSD. This approach heals by emphasizing physiological and emotional responses, without re-traumatizing the person, without placing the person on medication and without the long hours of conventional therapy.

When used in conjunction with therapies that address the underlying cause of PTSD, relaxation therapies such as hydrotherapy, massage therapy, and aromatherapy are useful to some patients in easing PTSD symptoms. Essential oils of lavender, chamomile, neroli, sweet marjoram, and ylang-ylang are commonly recommended by aroma therapists for stress relief and anxiety reduction.

Some patients benefit from spiritual or religious counseling. Because traumatic experiences often affect patients' spiritual views and beliefs, counseling with a trusted religious or spiritual advisor may be part of a treatment plan. A growing number of pastoral counselors in the major Christian and Jewish bodies in North America have advanced credentials in trauma therapy. Native Americans are often helped to recover from PTSD by participating in traditional tribal rituals for cleansing memories of war and other traumatic events. These rituals may include sweat lodges, prayers and chants, or consultation with a shaman or tribal healer.

Other alternative and complementary therapies that continue to be researched and have shown some benefit for relieving symptoms of PTSD in initial research are:

- Eye Movement Desensitization and Reprocessing (EMDR), a technique in which the patient re-imagines the trauma while focusing visually on movements of the therapist's finger. Movements of the patient's eyes reprogram the brain and allow emotional healing, according to practitioners.
- Acupuncture and acupressure. Acupuncture uses needles inserted into various points along meridians in the body, whereas acupressure involves touching, tapping, or massage on and along the same meridians. Both are considered traditional Chinese medicine (TCM) practices.

## QUESTIONS TO ASK YOUR DOCTOR

- What are my chances of recovering completely from PTSD? How long do you think it might take?
- What medications would you recommend and why?
- What should I do when I have a flashback?
- Can you help me explain my symptoms to my family and friends?
- What are some alternative therapies for me to consider using?

- Emotional Freedom Techniques (EFT). EFT is similar to acupressure in that it uses the body's acupuncture meridians, but it emphasizes only repeated tapping on various points on the body. The tapping may be accompanied by repeated calming phrases.

### Health-care team roles

It is essential for all treatment team members to know their roles and execute them properly throughout the treatment and recovery phases of this disorder. Depending on whether outpatient or inpatient treatment is being provided, the team leaders may include psychiatrists, psychologists, nursing staff, behavior specialists, physical therapists, specialized yoga and meditation instructors, social workers, and other medical/behavioral staff. In some cases it may be appropriate to include the patient's religious or spiritual advisor as a member of the team.

### Prognosis

The prognosis of PTSD is difficult to determine because patients' personalities and the experiences they undergo vary widely. A majority of patients get better, including some who do not receive treatment. One study reported that the average length of PTSD symptoms in patients who get treatment is 32 months, compared to 64 months in patients who are not treated.

Factors that improve a patient's chances for full recovery include prompt treatment, early and ongoing support from family and friends, a high level of functioning before the frightening event, and an absence of alcohol or substance use.

About 30% of people with PTSD never recover completely, however. Individuals with PTSD are at a much higher risk of committing suicide. Suicidal ideation is four times more common in veterans with PTSD than in

veterans without the disorder. Suicidal thoughts and language are considered a psychiatric emergency, and those with PTSD and their concerned family members or friends should contact a suicide hotline or go to a hospital emergency department or psychiatric facility immediately.

## Prevention

PTSD is impossible to prevent completely because natural disasters and human acts of violence continue to occur and cannot typically be predicted. In addition, it is not possible to tell beforehand how any given individual will react to a specific type of trauma. Prompt treatment after a traumatic event may lower the survivor's risk of developing severe symptoms.

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U.S. Department of Veterans Affairs. "PTSD: National Center for PTSD." https://www.ptsd.va.gov/ (accessed May 28, 2018).

#### ORGANIZATIONS

American Academy of Experts in Traumatic Stress, 127 Echo Ave., Miller Place, NY 11764, (631) 543-2217, Fax: (631) 543-6977, info@aaets.org, http://www.aaets.org.

American Psychiatric Association, 800 Maine Ave. SW, Suite 900, Washington, DC 20024, (202) 559-3900, apa@psych.org, http://www.apa.org.

National Alliance on Mental Illness, 3803 N. Fairfax Dr., Ste. 100, Arlington, VA 22203, (703) 524-7600, (800) 950-6264, http://www.nami.org.

National Center for PTSD, U.S. Department of Veterans Affairs, 810 Vermont Ave. NW, Washington, DC 20420, (802) 296-6300, ptsd@va.gov, https://www.ptsd.va.gov/.

National Institute of Mental Health, 6001 Executive Blvd., Room 8184, MSC 9663, Bethesda, MD 20892, (866) 615-6464, http://www.nimh.nih.gov.

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# Premature ejaculation (PE)

## Definition

Premature ejaculation (PE) refers to the persistent or recurrent discharge of semen with minimal sexual stimulation before, on, or shortly after penetration; before the person wishes it; and earlier than he expects it.