Treatment of PTSD

Trauma Informed Oregon (https://traumainformedoregon.org)

Trauma is an emotional state of profound or prolonged distress in response to an overwhelmingly terrifying or unstable experience. Some trauma heals slowly, which can influence life going forward. Trauma does not result in defects or deficiencies; rather they are markers of life experience one has survived.[1]

Traumatic experiences are events that threaten or violate one's safety, health, and integrity. They may be directly experienced or witnessed. They may be primarily physical (e.g., physical assault, sexual abuse, combat, birth trauma) or primarily emotional (e.g., verbal abuse), or a combination of both. Traumatic experience may be a single event or several experiences. Many people experience **complex trauma** which includes multiple traumatic experiences, typically from different types of traumas.[1]

Traumatic stress occurs when an individual's capacity to absorb, process, and progress through a traumatic experience is overwhelmed and the fear becomes stuck. Often it is associated with complex and confusing emotional reactions and behaviors. Traumatic stress looks and feels different for each person because it results from unique combination of traumatic experiences and individual factors, including an individual's genes, temperament, age and developmental stage, social factors, environment and culture.[1]

Traumatic stress reactions can include intensely reactive and sometimes unpredictable emotions, emotional numbness, hypervigilance, avoidance, intermittent regression to behaviors associated with a younger developmental stage, increased need for control, distrust, disengagement, impulsivity, irritability, disruption in sleep, distractibility, recurring memories, smells, or sounds from the event, nightmares, and forgetfulness.[1]

Trauma informed care is an approach aimed at ensuring environments and services throughout the continuum of care are welcoming and engaging for patients and staff. It recognizes that traumatic experiences terrify, overwhelm, and violate an individual. Trauma informed care is a commitment to prevent re-traumatization and, in whatever way possible, to restore a sense of safety, power, and self-worth.[1] Trauma informed care trainings and courses are available at Trauma Informed Oregon.

Key Features of PTSD	
Reexperiencing	Unwanted, distressing flashbacks of the trauma Nightmares related to the traumatic experience(s) Severe anxiety or emotional distress when something reminds them of the traumatic experience(s)
Avoidance	Effort to avoid people, places or things that trigger memories of the traumatic experience(s) Emotional numbness; detaching from others and losing interest in activities
Negative beliefs	Persistent negative and distressing beliefs about themselves or the world Unwarranted guilt or shame about themselves Difficulty remembering key aspects of the traumatic experience(s)
Hypervigilance	Heightened alertness and sensitivity to environment; easily startled or frightened Excessive fear of potential threats Irritability or outbursts of anger or aggressive behavior Sleep disturbances

Assessment

Proper assessment of trauma exposure and PTSD is best accomplished with validated tools. The U.S. Department of Veterans Affairs (VA) is the world's leading research and educational center on PTSD and traumatic stress. The VA homepage for PTSD is a helpful resource for providers caring for adults with PTSD; the National Child Traumatic Stress Network is a helpful resource for providers caring for children or adolescents. Other resources and trainings are shared below (see section titled *Trainings and Resources for Health Care Providers*).

General Assessment

- Clinical assessment of presenting complaints and co-occurring conditions;
    - The Primary Care PTSD Screen for DSM-5 (PC-PTSD-5) is a brief 5-item questionnaire that may identify people with probable PTSD. It is a helpful staring point to determine if further assessment to confirm diagnosis is warranted.
- Perform safety, lethal means, and environmental assessment;
    - Several resources from the Suicide Prevention Resource Center (SPRC), the National Child Traumatic Stress Network (NCTSN) and VA are available. A few examples:
        - Who needs lethal means counseling? (SPRC)
        - Lethal means counseling: recommendations for providers (SPRC)
        - Lethal means counseling: recommendations for providers (VA)
        - Ask Suicide-Screening Questions (ASQ) toolkit (NIH)
        - Words to use when talking about suicide (NCTSN)
- Screen for mental health disorders and substance use;
- Identify lifetime trauma history and duration of exposure;
    - Less than 10% of people with traumatic experience develop PTSD but individuals with more exposure to trauma are more likely to develop PTSD.[2]
- In cases of diagnostic uncertainty, use of validated structured clinical interviews for PTSD (i.e., CAPS-5)
    - The Clinician-Administered PTSD Scale for DSM-5 (CAPS-5) is a validated 30-item diagnostic tool based on DSM-5 criteria that can confirm a PTSD diagnosis (time = 45-60 min).
    - To detect changes in PTSD symptom severity over time, use the CAPS-5 or the self-reported PTSD Checklist for DSM-5 (PCL-5) (time = 5-10 min).

Complex PTSD

Emerging research on Complex PTSD (C-PTSD) shows that it may be a distinct disorder from PTSD and borderline personality disorder (BPD) and is more prevalent in individuals who have undergone chronic trauma (i.e., child abuse, domestic abuse).[3,4]

- In addition to the core fear-based symptoms common with PTSD, C-PTSD is characterized by:
  - severe emotional dysregulation (reactive anger or very low mood that is difficult to shift);
  - persistently negative self-perception; and
  - interpersonal problems (difficulty maintaining relationships, not feeling close to others).[3,4]
- C-PTSD is amendable to treatment, but patients will need consistent care from a trusted and expert provider.[5-7,8]
- Research on treatment for C-PTSD continues to show promise but is beyond the scope of this document.

Treatment

Engage in a shared decision-making process with each patient to weigh the potential benefits and risks of available treatment options. Do not delay treatment in patients with co-occurring mental health or substance use disorders, or in patients with severe symptoms.

Psychotherapy

Adults, Adolescents and Children

Individuals diagnosed with PTSD should be referred to a trained and trusted therapist for evidence-based psychotherapy.[7,9-13] The psychotherapy highlighted below significantly reduces PTSD symptoms and provides long-term improvement in daily function and quality of life regardless of age or type of trauma (high quality evidence).[9,11,12,14-20]

- Early psychotherapy in children and adolescents may reduce risk of developing PTSD (low quality evidence).[15] It is unclear if early intervention prevents PTSD in adults.[21]

Evidence-based Psychotherapy for Adults, Adolescents and Children [9,11,22,23]

- **Trauma-focused cognitive behavioral therapy**
- **Cognitive processing therapy**
- **Eye movement desensitization reprocessing**
- **Prolonged exposure therapy**

Trauma-specific psychotherapy usually consists of 10 to 12 weekly 60- to 90-minute sessions, with noticeable benefit after 4 to 8 sessions in most people.[2,9]

Pharmacotherapy

Medication is an option in adults who have residual symptoms after psychotherapy or who cannot access psychotherapy. Medication for PTSD is not typically recommended for children or adolescents.[7]

A medication should be tried for 8 to 12 weeks at a maximum tolerated therapeutic dose to allow adequate time for therapeutic effect.

KEY POINT: Avoid starting benzodiazepines, which are ineffective at preventing or treating PTSD symptoms, reduce the effectiveness of trauma-specific psychotherapy, and have high potential for abuse and patient harm.[24]

Adults

Medication alone may not yield sustained, long-term symptom improvement of PTSD in most patients, and it is important to remind patients that effectiveness is lost when medication is discontinued.[9,25]

- The antidepressants listed below are the medications with best evidence to support treatment of PTSD.[26]
- Antidepressants may worsen sleep disturbances in some people. If nightmares are a primary complaint, consider the alpha-1 antagonist **prazosin** (see Treatment Considerations with Co-occurring Disorders below).
- Psychedelics (e.g., psilocybin, LSD), ketamine and midomafetamine (MDMA) currently have insufficient evidence to recommend for treating PTSD.[7,9,25-27]

Medication	Dose	Evidence in Adults [9,10,25,26]
Paroxetine *Moderate quality evidence*	20-50 mg/day	• Improves PTSD symptoms, functional disability and greater loss of PTSD diagnosis; • May reduce co-occurring depressive symptoms but not anxiety symptoms.
Sertraline *Moderate quality evidence*	50-200 mg/day	• Reduces PTSD symptoms and improves functional disability; • May not reduce co-occurring anxiety or depression symptoms.
Venlafaxine ER *Moderate quality evidence*	75-300 mg/day	• Improves PTSD symptoms and greater loss of PTSD diagnosis; • May not reduce symptoms of hyperarousal.

Children and Adolescents

Medication is not typically recommended for children or adolescents with PTSD, and no evidence suggests it is more effective than trauma-specific psychotherapy.[7,14] The following medications have limited evidence of benefit for children or adolescents with PTSD.

Medication	Typical Dosing*	Evidence in Children and Adolescents
Guanfacine ER *Alpha-2 agonist* Clonidine** *Alpha-2 agonist*	1-4 mg/day 0.1-0.3 mg/day	• Evidence is limited to case reports or non-controlled, open-label studies.[28,29] • May improve impulsivity, emotional outbursts, oppositionality, mood lability, hyperarousal, generalized anxiety, insomnia and nightmares (insufficient to low-quality evidence).
Prazosin *Alpha-1 antagonist*	1-4 mg/day	• Evidence is limited to case reports evaluating nightmares, not PTSD symptoms.[30,31] • May reduce nightmares similarly to alpha-2 agonists, with response seen in 2-3 days (insufficient evidence).

* Daily dosing may be divided, dosed on a schedule or when needed. Typical dosing varies, depending on age, weight, efficacy and tolerability.
** The clonidine hydrochloride extended-release (ER) tablets, ER suspension, and immediate-release tablet formulations should not be used interchangeably. Do not substitute for other clonidine products on a mg-per-mg basis because of differing pharmacokinetic profiles.

Antidepressants have a boxed warning for increased risk of suicidality in children, adolescents and young adults.

- The only antidepressant that has been studied in children with PTSD is sertraline, but it did not demonstrate efficacy at improving PTSD symptoms.[32]

Treatment Augmentation

Treatment augmentation is appropriate for the treating co-occurring disorders (see Treatment Considerations with Co-occurring Disorders below).

Augmentation with an antipsychotic medication to treat PTSD is not generally recommended because it may not reduce PTSD symptoms;[9] however, it may be a reasonable in certain cases of hyperarousal or psychosis.[7]

Management of Co-occurring Disorders with PTSD

Co-occurring mental health disorders occur in more than half of persons with PTSD and commonly include anxiety, depression, insomnia, and substance use disorders.[2] The presence of a co-occurring mental health disorder or substance use disorder (SUD) should not delay PTSD treatment. Each disorder can be managed without adversely impacting the efficacy of PTSD treatment.[8] The MHCAG also has several resources and treatment recommendations. A few considerations are below:

Treatment Considerations with Co-occurring Disorders

Bipolar Disorder

The primary treatment option for patients with PTSD and co-occurring bipolar disorder is trauma-specific psychotherapy.

- Avoid treatment with antidepressants as they may increase the risk of manic or hypomanic episodes.[33]
- Though there is insufficient evidence on how to treat PTSD with co-occurring bipolar disorder, it may be reasonable to augment psychotherapy with prazosin, doxazosin, or clonidine in patients with sleep complaints (see below).

Borderline Personality Disorder

- Borderline personality disorder (BPD) alone does not require a traumatic stressor, but co-occurrence of BPD symptoms with PTSD is common in people with childhood sexual or physical abuse (see Complex PTSD above).[44-46]
- Key features of BPD include mood lability, unstable sense of self, volatile relationships with others, impulsivity and self-injurious behavior.[3]
- In patients with PTSD and BPD, dialectical behavioral therapy, combined with trauma-specific psychotherapy and components of compassion-focused therapy and acceptance and commitment therapy, may be more effective than psychotherapy alone (low to moderate quality evidence).[34-36]

Insomnia Disorder

Hypervigilance or hyperarousal can impact sleep onset, and nightmares or night terrors can impact sleep maintenance. Likewise, inadequate or non-restorative sleep can intensify PTSD symptoms.[37] Sleep disturbances should be routinely assessed in patients with PTSD and appropriately treated (See Treatment of Chronic Insomnia Disorder in Adults).

- Antidepressants recommended to treat PTSD symptoms may exacerbate sleep disturbances in some patients.
- Trauma-specific psychotherapy is safe and effective for treatment of PTSD in patients with insomnia disorder.[38]

Patients with PTSD and nightmares may benefit from nightmare-focused cognitive behavioral therapy.[39]

Patients with PTSD and nightmares can be treated with an alpha-1 antagonist like **prazosin**:

- Prazosin improves sleep awakenings and nightmares in adults with PTSD but has not consistently improved other core symptoms of PTSD (moderate quality evidence).[9,37,40,41] Nightmares may return when prazosin is discontinued.
- Set reasonable expectations with patients about the slow dose titration to therapeutic doses.
    - Initiate prazosin at a dose of 1-2 mg nightly and slowly titrate dose weekly based on response and tolerability. A large trial found success with prazosin using doses that *did not exceed* a midmorning dose of 5 mg and 15 mg at bedtime in adult males and a midmorning dose of 2 mg and 10 mg at bedtime in adult females).[41]
- Provide fall precaution education when first prescribing prazosin with provide regular fall risk reminders at each follow-up.
- An alternative to prazosin is **doxazosin**, which has a longer half-life so can be dosed once daily. Evidence for doxazosin for PTSD is promising but is limited to a small trial and a few case reports (low quality evidence).[42,43]

Patients with PTSD and difficulty with sleep onset can be treated with **clonidine** 0.1-0.2 mg nightly or trazodone. Guanfacine has not shown to improve sleep in adults with PTSD (low quality evidence).[26,36,44-46]

Substance Use Disorders

Do not exclude people with PTSD from treatment based solely on co-occurring substance use disorder (SUD).[7] Relief of PTSD symptoms results in an improvement of SUD symptoms.

- Concurrent psychotherapy for PTSD and SUD, or an integrated protocol that includes both treatments, can reduce PTSD severity and drug/alcohol use.[9,21,47]
- COPE is the treatment most studied and shown to be efficacious for co-occurring PTSD and SUD. COPE is an integrated protocol composed of Prolonged Exposure Therapy for PTSD and relapse preventions for SUD.[9,47]

Trainings and Resources for Health Care Providers

- The National Center for PTSD created the PTSD Repository to help providers and researchers understand what is known about PTSD treatment. It features information from hundreds of studies of PTSD treatments. https://ptsd-va.data.socrata.com/
- Through contracts with the Oregon Health Authority, the Oregon Pediatric Society (OPS) has developed and delivered in-person and online professional education about behavioral health and suicide prevention since 2013. In 2020, OPS developed Youth SAVE, a suicide screening, assessment, safety planning and intervention virtual training program for child and youth-serving healthcare professionals.
- Oregon CALM (OCALM) is an Oregon-adapted curriculum of the national CALM (Counseling on Access to Lethal Means) course. OCALM is an 8-hour training developed to assist health care providers in approaching Lethal Means Counseling with an informed, collaborative, and respectful attitude.
- Trauma Informed Oregon has information, training and resources about trauma and trauma informed care developed to address the needs of individuals, families, partners, and stakeholders. https://traumainformedoregon.org/

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