

## Neglected causes of post-traumatic stress disorder

*Patients with psychosis, other delusional states, or autism are also at risk*

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Post-traumatic stress disorder (PTSD) has been defined by successive editions of the American Psychiatric Association's Diagnostic and Statistical Manual of Mental Disorders (most recently DSM-5). The diagnosis requires an objectively traumatic event that involves exposure to "death, threatened death, actual or threatened serious injury, or actual or threatened sexual violence." This focus on objective event characteristics maintains PTSD as a response to extreme rather than everyday stress, but it overlooks mounting evidence that subjective responses to traumatic events predict PTSD just as or more strongly.<sup>1</sup> Groups of patients who are at risk of developing PTSD might be overlooked because the triggering event is subjectively rather than objectively traumatic. We describe three such groups here, but there are undoubtedly others.

Traumatic events, both objective and subjective, are common in the lives of patients with psychosis. Experiences, such as being forcibly sedated or admitted to hospital during an acute episode, can be terrifying to someone who cannot understand fully what is happening or appreciate the motives of those involved. Hallucinations and delusions can also be extremely frightening and can be experienced in the same way as an actual threat of serious physical injury. People with the delusion that others are trying to kill them, for example, might experience PTSD symptoms such as intrusive memories, flashbacks, and nightmares related to episodes when they thought that they were about to be attacked. That the experience of psychosis itself can be traumatic has been known for at least 30 years,<sup>2</sup> and in recognition of this an informal category of "psychosis related PTSD" has been proposed by researchers.<sup>3,4</sup>

Similar considerations apply to people treated in intensive care units, who experience high rates of post-traumatic symptoms after discharge.<sup>5</sup> Although these symptoms occur in the context of a genuine threat to life, their content is frequently unrelated to the objective threat but rather to delusions and hallucinations induced by prescribed drugs.

In detailed interviews, patients have reported delusions such as being poisoned, assaulted, tortured, kidnapped, threatened with death, or put on trial. Elements of hospital care such as injections, blood tests, and endotracheal tubes have merged with hallucinatory content to form terrifying delusional narratives.<sup>6</sup> As with psychosis, post-traumatic symptoms arising from these experiences would not traditionally lead to a diagnosis of PTSD because the DSM criteria assume that affected individuals have the mental capacity to evaluate events objectively.

Finally, people with autism spectrum disorder (ASD), a neurodevelopmental condition associated with atypical processing of the social and sensory world, often show intense threat responses to apparently harmless situations, such as changes in routine, social situations, or sensory stimuli. ASD may be associated with unique experiences and perceptions of trauma.<sup>7-9</sup>

Reduced emotional coping skills place people with ASD at high risk of mood and anxiety disorders after exposure to stressors such as social misperceptions, prevention of repetitive or stereotyped behaviours, and aversive sensory experiences.<sup>10</sup> Among people with ASD, in appears these atypical stressors may be associated with PTSD symptomatology as often as objectively traumatic events (Rumball, 2018). If so, rates of PTSD currently reported among children and adolescents with ASD (0-5.9%, mean 2.85%) are an underestimate.<sup>11</sup>

Effective treatment of these neglected groups requires the same trauma-focussed therapies that are recommended for PTSD after objectively traumatic events.<sup>11 12</sup> Where DSM-5 is used, failure to diagnose PTSD because of the nature of the triggering event might result in the denial of treatment. We therefore recommend adding an “altered perception” subtype to existing PTSD criteria in a future version of the DSM. This would preserve PTSD as a response to extreme stress while recognising that, for those with atypical perceptual or cognitive processing (whether temporary or life long), intense fear or horror might be provoked by events not traditionally considered traumatic.

Such a subtype would not apply where a neurotypical individual simply reported an exaggerated perception of threat, for example someone with a phobia of spiders who felt extreme fear on seeing a small spider.

In contrast to DSM-5, the World Health Organization’s international classification of diseases (ICD-11) will allow clinicians to make a diagnosis of PTSD based on their assessment of whether an event involves “exposure to an extremely threatening or horrific event or series of events,”<sup>13</sup> thus allowing flexibility over whether the threat is subjective or objective. Whichever system is in use, clinicians must be alert to the possibility of PTSD in

patients with psychosis, other delusional states, or ASD who have experienced subjectively terrifying events. They should not be dissuaded from referring symptomatic patients for treatment simply because current diagnostic rules neglect these patients' altered perceptual experiences.

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