An Approach to the Patient with Anxiety

Daniel Hicks, MD, Thomas Cummings Jr, MD,
Steven A. Epstein, MD*

KEYWORDS

• Anxiety disorders • Primary care • Panic disorder
• Generalized anxiety disorder • Anxiolytics

EPIDEMIOLOGY

According to the National Comorbidity Survey Replication (NCS-R), anxiety disorders are the most common psychiatric disorders in the general population; the 12-month and lifetime incidence are 19% and 31%, respectively. Among anxiety disorders, generalized anxiety disorder (GAD), panic disorder (PD), post-traumatic stress disorder (PTSD), social anxiety disorder (SAD), and specific phobia are the most prevalent. The NCS-R data also confirm that anxiety disorders are roughly twice as common in women as they are in men and that they frequently co-occur.[1,2]

The prevalence of anxiety disorders (GAD, PD, PTSD, and social phobia) in the primary care setting is similar to that in the general population.[3] Accordingly, approximately 48% of all visits for symptoms of anxiety are to primary care physicians (PCPs)[4]; frequently, anxiety occurs in those with chronic medical conditions, such as arthritis, heart disease, gastrointestinal [GI] disease, and hypertension.[5] Although specific phobias are the most common anxiety disorder, they rarely precipitate primary care visits.

Direct and indirect costs of anxiety disorders in the United States total $40 billion annually.[4] Kroenke and colleagues[3] confirmed that anxiety disorders in the primary care setting are associated with impaired function in social domains and work, poorer general health and higher pain levels, and more physician visits and disability days used. Anxiety may increase the risk of medical illnesses (eg, angina, arrhythmias, labile hypertension, irritable bowel syndrome [IBS]) and exacerbate them. Anxiety may also lead to coronary artery disease (CAD),[6] hypertension,[7] and cardiovascular morbidity.[7,8]

Currently, the *Diagnostic and Statistical Manual of Mental Disorders, Fifth Edition's* proposed revisions include a new disorder termed mixed anxiety depression,[9] a common diagnosis in countries outside the United States.

Department of Psychiatry, Georgetown University Hospital and School of Medicine, Street–2115 Wisconsin Avenue, Suite 200, Washington, DC 20007, USA
* Corresponding author.
E-mail address: epsteins@gunet.georgetown.edu

Med Clin N Am 94 (2010) 1127–1139
doi:10.1016/j.mcna.2010.08.008 **medical.theclinics.com**
0025-7125/10/$ – see front matter

PATHOPHYSIOLOGY

Abnormalities in the neural circuitry (within the amygdala, medial prefrontal cortex, insular cortex, and hippocampus) underlie fear, memory, and emotions; specifically, PD, PTSD, and social phobia are associated with a hyperresponsive amygdala and a hyporesponsive medial prefrontal cortex.[10]

On the neurochemical level, norepinephrine (NE), serotonin (5-HT), and γ-aminobutyric acid (GABA) are thought to play a significant role in anxiety disorders (eg, with under-activation of serotonergic function, complex dysregulation and overactivation of noradrenergic function). Further, decreased $GABA_A$ and $5\text{-}HT_{1A}$ receptor binding in the limbic system have been found in those with PD,[11,12] consistent with the data on pharmaceutical therapies that target 5-HT, NE, and GABA systems.

DIAGNOSIS AND CLASSIFICATION

Because of underreporting by patients and under-recognition by physicians, anxiety disorders often go unrecognized in the primary care setting.

The hallmarks of GAD are excessive worry, difficulty controlling the worry, and several physical (eg, fatigue, muscle tension) and psychological (eg, irritability, poor concentration) symptoms that have lasted at least 6 months; frequently, sufferers are chronically anxious and have been called "worriers."[13] Somatic symptoms and insomnia are typically reported to the internist.

PD is characterized by recurrent panic attacks (episodes of intense anxiety), significant physical distress (eg, palpitations, sweating, tremulousness, shortness of breath, chest pain, fear of choking, dizziness, and fear of dying or losing control), and anxiety about having another panic attack.[13]

At least one-third of individuals with chest pain and normal coronary arteries have PD.[14] Correlates of PD include absence of CAD, atypical quality of chest pain, female gender; younger age, and self-reported anxiety.[15]

Patients with benign palpitations are also prone to PD[16]; however, they should undergo a cardiac evaluation (eg, with ambulatory electrocardiographic monitoring) to rule-out arrhythmias. Although PD and mitral valve prolapse were linked for many years, data do not support a clear relationship.[17] Patients with PD commonly suffer from medical symptoms and conditions, eg, dizziness[18] and IBS.[19]

PTSD stems from exposure to a traumatic event (eg, a military experience, a physical or sexual assault, a motor vehicle accident, a natural disaster) that involved actual or threatened death or serious injury to oneself or others resulting in fear, helplessness, or horror. Symptoms of PTSD last longer than one month and are classified as re-experiencing (eg, distressing recollections of the trauma with illusions and hallucinations, intense physiologic responses when presented with exposure cues related to the traumatic event, nightmares), avoidance and numbing, and increased arousal (eg, hypervigilance, exaggerated startle response, insomnia, irritability, poor concentration).[13] PTSD symptoms are particularly common among survivors of acute trauma (eg, burns,[20] motor vehicle accidents).[21]

SAD is marked by a pronounced fear of social or performance situations; afflicted individuals fear that they will do something embarrassing, which causes distress, impaired function, and avoidance of certain situations.[13]

Obsessive-compulsive disorder (OCD) is defined by the presence of distressing, time-consuming, and impairing and intrusive obsessions (thoughts, images, or impulses) or compulsions (repetitive behaviors or mental acts performed in response to an obsession) intended to reduce distress or prevent a dreaded event. Patients with