

# Panic Disorder: The Importance of Phenomenology

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Over the last decade there has been a marked increase in primary care research on anxiety, spurred in part by the recognition of anxiety as one of the most common clinical problems that primary care physicians treat.<sup>1</sup> Thus, the 1980-81 National Ambulatory Medical Care Survey, which gathered information on approximately 90,000 patient visits to a nationally representative sample of private physicians from nine specialty groups, determined that anxiety and nervousness accounted for 11 percent of all visits to physicians.<sup>2</sup> Another recent study determined that 18 percent of the over 1,500 randomly selected primary care patients in 15 group practices were prescribed minor tranquilizers during a six-month period.<sup>3</sup> Moreover, more than 80 percent of the benzodiazepine prescriptions in the United States are written by primary care physicians.<sup>4</sup>

The importance of a severe subtype of anxiety, panic disorder, a study of which is reported by Katerndahl<sup>5</sup> in this issue of *The Journal*, is documented by its high prevalence both in the community and the primary care clinic. Panic disorder occurs in 1.6 to 2.9 percent of women and 0.4 to 1.7 percent of men in the community,<sup>6,7</sup> and patients with panic disorder are overrepresented within the medical care system. In a recent study by Katon and colleagues,<sup>8</sup> 6.5 percent of 195 randomly assessed primary care patients met *Diagnostic and Statistical Manual of Mental Disorders*, ed 3<sup>9</sup> (DSM-III) criteria for panic disorder alone, and another 6.5 percent met criteria for both major depression and panic disorder. When compared with a control group, patients with panic disorder tended to make significantly more visits to their physicians, often with one or more ill-defined somatic complaints.<sup>10</sup>

The study by Katerndahl reported in this issue attempts to describe the phenomenology (mode of experience and presentation) of the acute panic attack in 21 patients meeting the DSM-III criteria for panic disorder. Katerndahl found that early symptoms of a panic attack included

dyspnea, palpitations, chest pain, and hot or cold flashes; intermediate symptoms were shaking, choking, feelings of unreality, sweats, faintness, and dizziness; late symptoms included fear and paresthesias. These findings are supported by another recent study that reported fear or anxiety as the last symptom in the panic sequence.<sup>11</sup>

One implication of the autonomic symptoms of panic disorder preceding fear or anxiety is that many patients perceive their symptoms of nervousness and anxiety as appropriate responses to severe physiologic sensations. These patients are especially likely to present with concern about one or more of the autonomic symptoms associated with panic disorder, such as tachycardia, chest pain or tightness, dyspnea, and to answer physicians' queries about nervousness or anxiety with statements such as, "Anyone with the physical symptoms I'm having [chest pain, tachycardia, dyspnea, dizziness . . .] would be frightened."

During the study by Katon and co-workers<sup>8</sup> it was found that a positive response to the one screening question utilized in the structured psychiatric interview, "Have you ever had a spell or attack when all of a sudden you felt frightened, anxious, or very uneasy in situations when most people would not be afraid?" often did not accurately identify a substantial subset of panic patients. These patients were accurately identified by adding several somatic questions, the most sensitive of which was, "Do you ever have sudden episodes of rapid heart beats or palpitations?" Those patients accurately screened by the somatic screening questions perceived their anxiety as appropriate to the severity of their somatic symptoms. We found that the patients picked up by the somatic screening questions scored higher on all measures of anxiety, depression, and somatization than control patients without panic disorder.

The importance of studying the mode of experience and presentation of panic disorder is demonstrated by several recent reports. In a study of 55 primary care patients who met DSM-III criteria for panic disorder, over 80 percent presented initially to their physicians with pain complaints, notably chest pain, epigastric distress, or headaches.<sup>10</sup> Katerndahl's finding that during an attack, patients with panic disorder perceive their symptoms of dyspnea, palpitations, chest pain, and hot or cold flashes as early manifestations of an attack, and that they later develop fear, is also consistent with studies reporting that

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many patients presenting with cardiac symptoms (tachycardia, chest pain, and dyspnea), and who have negative cardiac testing (exercise tolerance test and angiography), are found to have panic disorder.<sup>12-14</sup> In a recent collaborative study with cardiologists, we compared patients with chest pain who had normal coronary arteries on angiography and who were given a psychiatric diagnosis after utilizing structural psychiatric interviews with a control group of patients with chest pain who had evidence of coronary artery disease on angiography.<sup>12</sup> Forty-three percent of the patients with chest pain and normal angiography had panic disorder, compared with 5 percent of control patients. These findings have been corroborated by two other studies in the United States and Great Britain.<sup>13,14</sup>

Recent biologic studies also support Katerndahl's description of the sequence of symptoms in the panic attack. Evidence points to the locus ceruleus as a noradrenergic "alarm" system of the brain that coordinates the sympathetic nervous system's response to perceived danger.<sup>15</sup> This biologic integrative system alerts the individual to stimuli of importance for survival.<sup>16</sup> Patients with panic disorder are believed to have an inherited vulnerability leading to hypersensitivity of this central nervous system alarm, which is usually provoked by a life-threatening situation that causes the fight-or-flight response. In patients with panic disorder, the alarm system is triggered with little or no provocation, leading to severe, frightening, autonomic sensations. Patients often describe this autonomic nervous system dysfunction by emphasizing that since their attacks began, stresses once frequently coped with quite well now lead to symptoms, and that such attacks also occur regardless of whether they are anxious or stressed by life circumstances. These patients often feel that their anxiety is secondary to the severe physiologic sensations.<sup>17</sup> Indeed, evidence suggests that generalized anxiety and avoidance behavior follows, rather than precedes, panic disorder. Once the patients' panic attacks have been treated successfully by tricyclic antidepressants, monoamine oxidase inhibitors, or high-potency benzodiazepines, their generalized anxiety and avoidance behaviors often decrease to baseline levels.<sup>17</sup>

Recent promising studies have also reported associations between panic disorder and other medical illnesses, including irritable bowel syndrome,<sup>18</sup> labile hypertension,<sup>10</sup> peptic ulcer disease,<sup>9</sup> and idiopathic cardiomyopathy.<sup>19</sup> Studies such as these and Katerndahl's point to the continued importance of studying the epidemiology

in primary care of common symptomatic complaints as well as the phenomenology of common illnesses such as panic disorder.

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