

Preface

Anxiety



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Guest Editors

This issue of the *Child and Adolescent Psychiatric Clinics of North America* reviews recent research findings on pediatric anxiety disorders. This provides an important opportunity to reflect on progress in various areas of research on developmental psychopathology during the past 10 to 15 years. Both the major breakthroughs and the major questions in research on pediatric anxiety parallel many of the broader advances and uncertainties in other areas of psychiatry and psychology. Thus, a review of work in this area is prescient both for considerations specifically on anxiety and for broader issues affecting the mental well being of children and adolescents. Findings and central questions in five major areas of research are summarized in this issue, each pertaining to pediatric anxiety disorders. In the current summary, we briefly outline the nature of these five areas.

First, considerable advances have emerged in psychiatric epidemiology, as applied to various forms of developmental psychopathology. These advances have stimulated a series of large-scale studies that document the prevalence of pediatric mental disorders and their distributions across various sectors of the population. Based on these studies, pediatric anxiety disorders are recognized as the most common form of developmental psychopathology. The high prevalence

of pediatric anxiety disorders emphasizes the importance of work summarized in this issue. Nevertheless, this major finding has also led to many unanswered questions. In particular, prevalence estimates for pediatric anxiety disorders are highly sensitive to impairment thresholds, such that relatively minor alterations in algorithms for defining impairment in a structured assessment for anxiety lead to relatively marked changes in estimated prevalence. As in many other areas of psychiatric epidemiology, this finding has raised major questions concerning the nature of psychiatric diagnosis. Particularly pressing questions emerge concerning the degree to which psychiatric phenotypes, such as pediatric anxiety disorders, might be most appropriately characterized as continuously distributed traits, without clear boundaries separating health and disease, as opposed to categorical entities. These questions appear particularly pressing in research on anxiety, given the ubiquity of anxiety as a part of normal development and the effects on prevalence of minor alterations in diagnostic algorithms.

Second, longitudinal and family genetic research has revealed strong relationships between pediatric anxiety disorders and various forms of adult psychopathology. Thus, longitudinal studies demonstrate within-subject relationships across development, in that pediatric anxiety disorders confer a high risk for both adult anxiety and mood disorders. Similarly, family studies demonstrate across-subject relationships within families, in that both anxiety and depression in parents confers a high risk for pediatric anxiety disorders in offspring. Given the high prevalence of pediatric anxiety disorders, data linking pediatric anxiety disorders with adult psychopathology lends further emphasis to the importance of advancing understandings of pathophysiology and treatment. Nevertheless, major questions also remain in studies linking pediatric anxiety to adult psychopathology. In particular, while strong relationships do exist, early anxiety is by no means a fait accompli, in that the majority of children and adolescents with anxiety disorders will not suffer from a mood or anxiety disorder when assessed as adults. These findings raise major questions regarding factors that distinguish among children and adolescents with transient as opposed to more persistent forms of psychopathology that begin as pediatric anxiety disorders.

Third, this issue reviews data on multiple forms of anxiety currently classified as distinct conditions in the *Diagnostic and Statistical Manual of Mental Disorders* (DSM-IV). This includes separation anxiety disorder, social anxiety disorder, generalized anxiety disorder, phobias, obsessive-compulsive disorder, and a series of other related conditions. As reviewed in this issue, these conditions show certain shared features in that each represents a developmental condition characterized by high levels of fear and apprehension concerning various stimuli or situations. On the other hand, these conditions also can be distinguished from one another in that unique symptom profiles and associated features can also clearly be differentiated among the various pediatric anxiety disorders. The degree to which current categorizations in the DSM-IV genuinely achieve the goal of “carving nature at its joints” in capturing categories of syndromes that relate to genuine differences in pathophysiology remains unclear.

Fourth, efforts to validate current anxiety disorder diagnoses, and determine the accuracy of current classifications, will benefit from recent breakthroughs in neuroscience. Relative to other complex behaviors, research on the neural circuitry of fear and anxiety has progressed relatively far during the past two decades. Studies in rodents and non-human primates have delineated the neural circuitry that has evolved to facilitate the mammalian response to various forms of danger. Central to these responses are the key defining features of the anxiety disorders, including hypervigilance, avoidance, and defensive physiologic responses. Neuroscientific understandings have also led to some appreciation of specificity in response to divergent forms of danger. Thus, the neural circuitry mediating learned fears can be differentiated from that mediating innate fears. Similarly, circuitry engaged by toxins that pose a threat to safety when ingested can be differentiated from circuitry engaged by stimuli that threaten mammals by other routes. Advances in neuroimaging have set the stage for studies that will determine the degree to which these distinctions can be used to inform classification in pediatric anxiety. Thus, it may be that distinct forms of anxiety involve distinct forms of circuitry dysfunction. If confirmed, this finding might lead to a modification of psychiatric nosology based on understandings of brain function.

Finally, the past decade has also witnessed considerable advances in treatment. As a rule, advances during recent years have emerged largely by applying to children and adolescent treatments with a long history of use in adult anxiety disorders. Specifically, a series of studies have used cognitive behavioral therapy (CBT) in various forms of pediatric anxiety disorders. These studies have demonstrated clear benefits of this treatment over various control conditions, although the precise aspect of CBT that is most beneficial remains incompletely understood. Similarly, large-scale medication trials have been executed during the past decade. Although major questions have emerged concerning safety, large-scale randomized controlled trials leave little doubt that selective serotonin reuptake inhibitors (SSRIs) represent efficacious treatments for many forms of pediatric anxiety disorders. Despite these advances, major questions remain. For example, it is unclear which treatments are best suited for which patients with most anxiety disorders, given the dearth of head-to-head comparison randomized controlled trials using SSRIs and CBT. Similarly, while efficacy has been clearly established for SSRIs and CBT, these treatments remain far from panaceas. Even in ideal settings, many children and adolescents will exhibit only a modest symptomatic response to these treatments. Considerably more work is needed in the development of therapeutic modalities.

In closing, it is clear that major progress has been made in research on pediatric anxiety disorders. This progress has delineated many of the major questions that have yet to be answered, providing important guidelines for future research approaches. Perhaps most importantly, research in pediatric anxiety disorders has defined key issues confronting studies in many other areas of developmental psychopathology. As a result, the material in this issue might

provide key insights relevant to pediatric anxiety disorders as well as other forms of psychopathology.

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