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Test and Performance Anxiety

Anxiety is a normal human emotion that can be detrimental in a school setting, but good communication and support can help minimize its negative impact.

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Student Services is produced in collaboration with the National Association of School Psychologists (NASP). Articles and related handouts can be downloaded from www.nasponline.org/resources/ principals. amantha's story: Fourteen-year-old Samantha went to the school nurse on a weekly basis, complaining of stomach aches and being nervous and worried about school. The nurse referred her to the school psychologist, who talked with her about the visits to the nurse's office. Samantha reported that when taking tests or having to speak in public, she became anxious and was not able to do well, although she thought that she knew the material. When describing her anxiety, she said, "My mind goes blank," "I get shaky," and "I get sweaty and red."

Upon further discussion, the school psychologist found that Samantha also felt anxious often when not at school and that her mother had high expectations for her schoolwork. The school psychologist talked to her mother, who indicated that she had high expectations of Samantha, but she also described her daughter as being anxious, fearful, and a "worrier" since she was a small child.

Anxiety in Adolescents

Cases like Samantha's are more common in school settings than most school professionals realize. In the majority of cases, test and performance anxiety is not recognized easily in schools, in large part because adolescents rarely refer themselves for emotional concerns. Not wanting to risk teasing or public attention, anxious adolescents suffer in silence and underperform on school-related tasks.

Anxiety is one of the most basic human emotions and occurs in every person at some time, most often when someone is apprehensive about uncertain outcomes of an event or set of circumstances. Anxiety can serve an adaptive function, however, and is also a marker for typical development. In the school setting, anxiety is experienced often by students when being evaluated, such as when taking a test or giving a public performance. Most adolescents cope with these situations well, but there is a subset of up to 30% of students who experience severe anxiety, a condition most often termed "test anxiety."

When test anxiety is severe, it can have significant negative effects on a student's ability to perform at an optimal level. Over time, test anxiety tends to generalize to many evaluative situations, contributing to more pervasive underachievement. Additional consequences of chronic test anxiety can include lowered self-esteem, reduced effort, and loss of motivation for school tasks. Other forms of anxiety that can be seen in the school include generalized anxiety, fears, phobias, social anxiety, and extreme social withdrawal.

Characteristics of Anxiety

The central characteristic of anxiety is worry, which has been defined by Vasey, Crnic, and Carter (1994) as "an anticipatory cognitive process involving repetitive thoughts related to possible threatening outcomes and their potential consequences" (p. 530). Although everyone worries occasionally, excessive and frequent worry can impair social, personal, and academic functioning. It can contribute to feelings of loss of control and perhaps depression, especially in girls.

When people become highly anxious, they tend to view more situations as potentially threatening than do most of their peers. They have an irrational fear that a catastrophe will occur and feel that they are unable to control outcomes. Often, there is

a rational basis for the anxiety, but it is greatly disproportionate to the circumstances.

Anxiety is manifested in three ways: cognitively, behaviorally, and physiologically. Often the symptoms are apparent in all three areas, such as worry, increased activity, and flushing of the skin. (See figure 1.) Many of the behaviors exhibited by anxious children and youth reflect attempts to control the anxiety and minimize its effects. The majority of adolescents who are anxious are not disruptive and are more likely to withdraw and avoid anxiety-producing situations. In extreme cases, they may be seen by teachers as unmotivated, lazy, or less capable than their peers. On the other extreme, some students with performance anxiety may act out, consciously or unconsciously, as a way of avoiding the risk of being embarrassed or failing. School personnel should be aware of students whose disruptive or negative behavior aligns with upcoming performance-based assignments.

CAUSES OF ANXIETY

The specific conditions and mechanisms that cause anxiety are not well understood, but there is evidence that vouth who are test-anxious tend to have high levels of general anxiety that are exacerbated during evaluations. There is considerable research evidence that some children have biological predispositions to high levels of general anxiety, making them more susceptible to the effects of being evaluated (Huberty, 2008). Repeated difficulties with test-taking or other performances tend to lower self-confidence, which in turn can create conditions for more frequent and intense experiences of anxiety. Also, excessive pressure or coercion likely

will worsen an adolescent's anxiety, further impairing performance, selfesteem, and motivation.

Types of Anxiety

There are two forms of anxiety that are pertinent to understanding the formation and maintenance of anxiety. "Trait anxiety" refers to anxiety that is chronic and pervasive across situations and is not triggered by specific events. Trait anxiety is the basis for a variety of anxiety disorders, including generalized anxiety and social phobia. "State anxiety" refers to anxiety that occurs in specific situations and usually has a clear trigger. Not all people who have high state anxiety have high trait anxiety, but those who have high trait anxiety are more likely to experience state anxiety (Spielberger, 1973).

While taking tests, state anxiety may occur, although the student may also have tendencies toward trait anxiety. Therefore, if a student shows high state anxiety, it is possible that he or she has high trait anxiety. It is important to identify adolescents with high trait anxiety, because it can be a sign of significant emotional problems and may be a precursor for the development of depression, especially in adolescent girls. In cases of severe anxiety, referral to a school psychologist for more extensive evaluation is recommended. In Samantha's case, the school psychologist concluded that she had high levels of trait anxiety, which worsened her test/state anxiety. High parental expectations likely also contributed to both her trait and state anxiety.

High-Stakes Testing

Over the last several years, graduation has come to depend on passing standardized tests. As a consequence, more



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students are likely to have anxiety when taking such tests and their ability to do their best will be impaired. Consequently, some students may fail sections of these exams despite knowing the material. Although there is little research to suggest that highstakes testing causes anxiety disorders in adolescents, it is likely that students with high trait or test anxiety are more vulnerable to underperforming. A key indicator that test anxiety may occur in students is when they do not do well, despite indications to the contrary (e.g., current achievement). School personnel should be alert to this possibility and follow up with students who unexpectedly fail parts of an examination to check for the possibility of trait or state anxiety. Moreover, students who struggle in school, particularly those with dis-

abilities, may find those examinations especially challenging, increasing their anxiety. Therefore, schools should consider screening all students who fail those examinations.

School-Based Interventions

If test anxiety is not complicated by other problems, such as anxiety disorders or depression, it is treatable in the school setting by properly trained mental health specialists (e.g., school psychologists) and teachers with the help of principals and parents. Each of the following groups has a role to play in identifying and supporting students.

PRINCIPALS

Principals can be instrumental in working with staff members to help students who have test anxiety or are at risk for developing it. Some suggestions include:

- Communicating that test anxiety is a real psychological issue and does not reflect laziness, lack of motivation, or lack of capability by the student
- Communicating to staff members and parents that test anxiety should be a priority for schools to address
- Providing inservice training about how to recognize and treat anxiety and to consider it to be a genuine and pervasive problem
- Leading efforts to identify specialists in the school to identify performance- and test-anxious students and provide support to them (Huberty, in press).

SCHOOL MENTAL HEALTH PRACTITIONERS

Mental health specialists, such as school psychologists, social workers, and counselors, can work singly and collaboratively to develop and implement interventions for students and to consult with teachers about how to identify and work with students in the classroom. There are several interventions that can be used in the school setting to help students prevent and control test and performance anxiety. These strategies include:

- Providing relaxation training
- Using test-anxiety hierarchies for assessments and public performances using variations of systematic desensitization
- Using pretask rehearsal
- Using practice tests
- Reviewing task content before examinations
- Modifying tasks, such as breaking them into smaller units

Primary Characteristics of Anxiety

Cognitive	Behavioral	Physiological
Concentration problems	Motor restlessness	Tics
Memory problems	Fidgets	Recurrent, localized pain
Attention problems	Task avoidance	Rapid heart rate
Oversensitivity	Rapid speech	Flushing of the skin
Difficulty solving	Erratic behavior	Perspiration
problems	Irritability	Headaches
Worry	Withdrawal	Muscle tension
Cognitive dysfunctions — Distortions	Perfectionism	Sleeping problems
- Deficiencies	Lack of participation	Nausea
Attributional style	Failure to complete tasks	Vomiting
problems	Seeking easy tasks	Enuresis

Source: Huberty, T. J. (in press). Performance and test anxiety. In L. Paige & A. Canter (Eds.), Helping children at home and at school III. Bethesda, MD: National Association of School Psychologists.

- Developing mnemonic devices to help recall
- Using cognitive-behavioral techniques to reduce characteristics often associated with test anxiety, such as "cognitive scripts" for students to use when taking tests or performing, self-monitoring techniques, positive self-talk, and self-relaxation
- Relaxing grading standards or procedures if it is possible to do so without lowering performance criteria
- Recognizing effort as well as performance
- Avoiding criticism, sarcasm, or punishment for performance problems
- Using alternative forms of assessment
- Modifying time constraints and instructions
- Emphasizing success, rather than failure (Huberty, in press).

Mental health specialists can also provide inservice training to school personnel and parents. This training can include information about:

- The characteristics of anxiety
- The types of cognitive problems experienced by performance-anxious students
- The task conditions that can affect the experience and expression of anxiety
- The nature, types, and causes of anxiety
- The tendency of test-anxious adolescents to have high trait anxiety and the need for some students to receive such interventions as social skills training
- A description of interventions that can be used (Huberty, in press).

Although anxiety and depression often are considered and treated as separate and distinct problems, they frequently occur together with an overlap of symptoms. Often adolescents meet the clinical criteria for both disorders simultaneously. The overlap has been reported to be as high as 50% in clinical samples. Further, if both disorders are present simultaneously, anxiety most likely preceded depression. Consequently, the school psychologist must be prepared to identify the presence of and provide intervention and prevention for both problems (Huberty, 2008).

PARENTS

Parents can be highly instrumental in working with their test-anxious adolescents. In some cases, parents may benefit from consulting with school personnel to help determine whether high expectations are contributing to the problem. If that is the case, the school psychologist or other mental health professional can help parents develop realistic expectations of their children. Parents can also help their students better prepare for examinations and performances by working with them at home.

TEACHERS

In addition to providing inservice training to school personnel and direct services to students, school psychologists and other mental health professionals can consult with teachers to help them identify and work with test-anxious students. Consultation can include:

- Providing education and information to the teacher about test anxiety
- Interviewing students, teachers, and parents

What Parents Can Do

- Be consistent in how you handle problems and administer discipline.
- Be patient and be prepared to listen.
- Avoid being overly critical, disparaging, impatient, or cynical.
- Maintain realistic, attainable goals and expectations for your child.
- Do not communicate that perfection is expected or is the only acceptable outcome.
- Maintain a consistent but flexible routine for homework, chores, activities, and so forth.
- Accept mistakes as a normal part of growing up and let your child know that no one is expected to do everything equally well.
- Praise and reinforce effort, even if the outcome is less than expected. Practice and rehearse upcoming events, such as a speech or other performance.
- Teach your child simple strategies to help with his or her anxiety, such as organizing materials and time, developing small "scripts" of what to do and say when anxiety increases, and learning how to relax under stressful conditions.
- Do not treat feelings, questions, and statements about feeling anxious as silly or unimportant.
- Often, reasoning is not effective in reducing anxiety, so do not criticize your child for being unable to respond to rational approaches.
- Seek outside help if the problem persists and continues to interfere with daily activities.

Source: Huberty, T. J. (in press).

Performance and test anxiety. In L. Paige & A. Canter (Eds.), Helping children at home and at school III. Bethesda,

MD: National Association of School Psychologists.

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- Assessing individual students to determine cognitive, behavioral, and physiological symptoms
- Training teachers, students, and parents in how to use rehearsal, relaxation, and other techniques at home and at school
- Helping teachers plan, implement, and evaluate interventions (Huberty, in press).

Leadership Commitment

Test and performance anxiety are common problems for adolescents in the school setting and can impair achievement in as many as one-third of students. Because adolescents may not be aware of the problems, do not know what to do, or do not refer themselves for help, school personnel

are key to identifying students who have text anxiety.

Effective intervention begins with school administrators, who can create an awareness of the problem and commit to providing resources and leadership for mental health specialists and teachers so that they can help students. Mental health specialists and teachers can be strong advocates who help anxious students improve school performance and reduce the risk of the development of other problems, particularly depression. Properly addressed, test and performance anxiety can be significantly reduced in the school setting.

Returning to Samantha

The school psychologist worked with Samantha directly, consulted with her teachers, and talked with her mother. Samantha learned how to relax, plan for examinations, rehearse public performances, and develop test-taking strategies. The psychologist worked with the teachers of the classes in which Samantha was most anxious to help them become aware of her anxiety. The teachers helped Samantha develop test-taking strategies, such as organizational skills, practice exercises, and study guides.

Finally, the psychologist talked with Samantha's mother to help her better understand Samantha's anxiety, how her expectations contributed to her daughter's problems, and how to help prepare Samantha at home to take tests and give oral presentations. Samantha's anxiety was reduced and she performed better, with a significant reduction in visits to the nurse's office. Although there was little effect on her trait anxiety, her state anxiety was reduced to help her improve her school performance. PL

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