Introduction

This is a book for teachers, administrators, related service personnel, parents, and other individuals who have the responsibility of teaching children and youth with autism. It is especially intended for educators and other individuals who need immediate guidance about how to plan, organize, implement, and monitor an educational program. Teaching students with autism is arguably one of the most difficult teaching assignments because such students typically are unmotivated to cooperate and learn, may be lacking skills in several developmental areas, and may be manifesting an array of challenging behaviors. To complicate matters, long-term outcomes for individuals with autism relate to the intensity and quality of the educational programs provided. Thus, school personnel find themselves under great pressure to provide the best possible instruction to these students.

Unfortunately, in the field of autism there is much debate concerning what constitutes the best educational strategies. We are convinced that those strategies based in applied behavior analysis (ABA) result most reliably in positive learning outcomes for most students with autism, particularly young children and individuals with low cognitive functioning. ABA encompasses many methodologies, as will be shown in this book, and relies on consistent assessment, persistent and frequent instruction, and data-based evaluation. We also recognize that other approaches not specifically based in ABA include techniques, such as visually cued instruction, that effectively meet the needs of students with autism, so we discussed them as well.

Rather than targeting all students with autism, we designed this book for adults who work with students who have autism and also have significant cognitive delays. We also developed the book with the public schools in mind. However, many of the strategies recommended in this book can be used in other educational situations and may be adapted for individuals with Asperger syndrome or high-functioning autism (HFA). Furthermore, we attempted to construct this book and write it in such a way that any adult with some type of teaching responsibility will be able to apply the major teaching approaches easily and successfully.

We drew upon empirical research and what are currently considered best practices for the education of students with autism. It appears that teachers of students with autism are more likely to be effective if they:

- understand the nature of the syndrome of autism, including characteristic deficits and excesses, and the relationship of these characteristics to educational programming;
- are able to use highly specialized instructional techniques to instruct a wide range of skills and knowledge;
- are able to assess challenging behavior, develop effective interventions to reduce such behavior, and teach new, functional replacement behaviors;
- are able to systematically and objectively monitor students' progress and use these data to make instructional decisions and adjust programs;
- are aware of which practices have a substantial evidence base concerning effectiveness for students with autism and, conversely, which interventions are unproven or controversial and thus should not be a part of a child's educational program;
- are able to effectively organize, supervise, and coordinate teams of individuals (multiple teachers, paraprofessionals, therapists, trainers) who provide services to students; and

- are able to be a partner to parents and others in order to augment the educational outcomes for all their students.

We understand that too often, teachers are unprepared or underprepared for the considerable challenges of effectively instructing one or more students with autism. There are many reasons for this, including poor preservice preparation. As a result, many teachers and other school personnel must quickly learn these specialized techniques "on the job." If that is the case, this book will help. Our intention was not to provide an in-depth study of autism or educational approaches to autism but, rather, to offer immediate, practical assistance to teachers and other professionals to enable them to plan for instruction, organize their classroom, manage behavior, coordinate the teaching team, and monitor progress. To that end, the book's text is succinct and is accompanied by many examples, forms, and sample materials.

We organized this book in a way that roughly corresponds with what teachers need to know to plan and implement instruction. In addition, we designed particular features to provide teachers with the tools they need to do so. Chapter 1 is a brief overview of autism, its characteristics, major theories explaining autism, and implications for educational programming. Chapter 2 describes fundamental concepts of ABA and offers examples of educational applications for students with autism. Chapter 3 explains discrete trial teaching (DTT), a well-documented teaching method rooted in ABA, and the teaching method of choice for instruction in most new skills. Chapter 4 extends preferred teaching strategies to naturalistic, or milieu, teaching, another strategy based in ABA that is primarily aimed at the maintenance and generalization of functional skills. This strategy is used in natural environments where specific skills are most needed. Discrete trial teaching and naturalistic/milieu teaching together form the basis of a very strong educational program. Chapter 4 also explains how to use group instruction to teach students with autism, an important consideration given the vast number of skills these students need to learn and the limited personnel and time resources of most classrooms. Because children and youth with autism do best when the environment is clear and predictable, Chapter 5 describes how to achieve clarity and predictability by providing structure in the form of procedures and routines, schedules, and visual supports.

Teaching students with autism requires the involvement of many adults with teaching responsibilities, whom we call *teaching adults,* and includes teachers, paraprofessionals, and related service personnel, among others. Furthermore, because program intensity and consistency is important for students with autism, coordination and collaboration among all teaching adults is necessary for success and may require a great deal of teacher time. Chapter 6 provides recommendations for collaborating, coordinating, and communicating with members of the teaching team and other adults who will have an impact on students' learning. Chapter 7 describes strategies for the all-important task of curriculum development (e.g., determining what skills each student needs to learn). This is a critical element of educational programming for children with autism, and one that too often is left to chance or approached in a haphazard, unsystematic way. Closely related to curriculum development is progress monitoring. Determining if a student has learned what was taught requires thoughtful planning and implementation. Chapter 8 presents an explanation of progress data collection strategies and a variety of forms for monitoring students' progress on target objectives. Reproducible forms are provided in the chapter appendix for your use.

Chapter 9 contains a comprehensive discussion of and recommendations for teaching language and communication skills, including language and communication characteristics of children with autism, essential components of language, how to choose a communication system, and instructional strategies for each element of language. Chapter 10 describes strategies for teaching social skills and improving

students' social interactions. Because socialization is most effectively addressed using typically developing peers, we also discuss inclusion and how to address socialization goals in inclusion settings in this chapter.

In Chapter 11, we turn our attention to managing the challenging behaviors that are often characteristic of children and youth with autism. We describe how to use functional behavior assessment (FBA) to assess challenging behavior and to identify patterns associated with, and functions served by, those behaviors. We show how this information can be used to develop effective interventions for reducing challenging behaviors and increasing alternative appropriate, functional behaviors. Reproducible copies of the FBA forms we discuss in this chapter are provided in the chapter appendix.

In Chapter 12, we explain strategies for reducing challenging behaviors through antecedent interventions and consequence interventions. Consequence interventions include a hierarchy of behavior reduction strategies. Because challenging behaviors are often targeted on Individualized Education Programs (IEPs) or behavior intervention plans (BIPs), progress in reducing/eliminating these behaviors should be documented. In Chapter 13, we provide sample forms for monitoring behaviors targeted for reduction and explanations regarding how to use each form. Chapter 14 presents specific strategies for reducing the challenging behaviors associated with autism, including noncompliance, aggression, self-stimulatory behavior, and self-injurious behavior.

Chapter 15 provides information relevant to working with families. Families need to be partners with teachers in managing their child's education program. To facilitate this partnership, teachers need to have (a) some understanding of the demands of parenting a child with autism and (b) strategies for communicating and collaborating with family members. Recently, autism has received much attention in the media, without much quality control as to supporting evidence for various proposed programs. For this reason, teachers and other educators must be informed consumers: They need to be able to distinguish legitimate interventions and treatments from questionable ones and should be able to respond appropriately when they are asked to use a program or technique that is not supported by evidence. In Chapter 16 we present an overview of popular autism intervention programs. For each program, we provide an explanation of the program and its theoretical underpinnings, and summarize the research supporting and/or refuting the program.

The appendices present additional material to help teachers design and implement educational programs. Appendix A provides a list of resources for further information about autism and about teaching students with autism. Appendix B consists of handouts of information from each chapter that may be used to train other adults in how to use the techniques we recommend in this book. Appendix C is a list of commercially available curricula for teaching functional skills, including self-care skills, social skills, basic academic skills, and communication skills. Appendix D presents a description of a "typical day" at school for students with autism. Readers will recognize the strategies presented throughout the book as they are applied in the context of a busy classroom. Finally, we provide a glossary of terms used throughout the book for your reference.

Our book is designed to be immediately useful for teachers, that is, as a "quick-start" guide for assessing, teaching, and documenting progress. Special features of the book that readers will find helpful include the following:

- At-a-Glance: concise lists, brief descriptions, examples, or other material to illustrate concepts and skills described in the text
- Focus Here: in-depth coverage of concepts introduced in the text, including detailed instructions or guidelines for using various techniques presented in the

text, explanations of concepts, and descriptions of programs or other material that provide readers with more specific information about the skills and concepts discussed

- Figures: many examples of the forms used for teaching students with autism, including the areas of assessment and progress monitoring

- Resources: lists of materials, programs, support services, organizations, and other information that teachers and other adults who are responsible for educational planning for students with autism will find helpful

This is a book that we wish had been available to us when we first taught students with autism. The book addresses many of the questions that we encounter in our work with teachers, administrators, and parents. Although it does not address everything that experienced teachers and other professionals will eventually want to know about autism and best educational practices, it will provide sufficient guidance for a teacher to use research-based strategies to begin developing effective educational programs for students with autism. Good luck, and enjoy this unique teaching experience!