

# Family Involvement in Functional Assessment and Positive Behavior Support

Glen Dunlap, J. Stephen Newton, Lise Fox,  
Nila Benito, and Bobbie Vaughn

Recent developments in the field of autism and related disabilities have included two prominent themes: (a) the emergence of functional assessment (FA) as a requisite step in behavioral support and (b) a growing acknowledgment that families represent the most essential resource for the social, intellectual, emotional, and behavioral development of their children. In the vast majority of cases, families are the most committed, enduring, and knowledgeable source of personal support available for their children. Therefore, families are considered vital contributors in the educational process and, increasingly, in the application of FA and assessment-based behavioral interventions. This article provides a discussion of family involvement in the process of FA and offers some key considerations pertinent to the appropriate and optimal incorporation of families in the FA and intervention process.

In the last few years, researchers, practitioners, and family members have increasingly focused attention on the use of functional assessment (FA) as the means to develop effective interventions for ameliorating problem behaviors (e.g., Carr et al., 1994; Neef & Iwata, 1994; Repp & Horner, 1999; Vaughn, Dunlap, Fox, Clarke, & Bucy, 1997). Interest in FA has heightened considerably since the advent of the 1997 amendments to the Individuals with Disabilities Education Act (IDEA). These amendments stipulate, among other requirements, that a "functional behavioral assessment" must be conducted prior to disciplinary actions that result in a student's being placed in an alternative educational setting (IDEA, 1997). Although the actual language within the amendments is vague, interpretations of the law clearly relate "functional behavioral assessment" to the em-

pirically validated, behavior-analytic tradition of using "functional assessments" as the basis of intervention plans (Sugai et al., 2000; Tilly et al., 1998).

*Functional assessment* (which is used in this article interchangeably with *functional behavioral assessment*) is defined as a process for developing an understanding of the interactions between a specified behavior and events in the environment. In particular, an FA identifies the consequences that represent the behavior's function, or purpose, and the contextual events and circumstances that are predictable antecedents of the behavior (Foster-Johnson & Dunlap, 1993; O'Neill, Vaughn, & Dunlap, 1998; Tilly et al., 1998). Many articles and books have described useful direct and indirect methods for conducting FA (e.g., O'Neill et al., 1997), and a substantial corpus of empirical research provides testimony to

the efficacy and feasibility of the FA approach (Carr et al., 1999; Repp & Horner, 1999). A crucial (but sometimes overlooked) point to remember whenever FA is employed is that the essential reason, and the full justification, for conducting a functional assessment is to develop an effective, assessment-based plan of intervention.

FA is central to the approach for addressing problem behaviors known as *positive behavior support*, which is referred to in IDEA as "positive behavior interventions and supports" (Sugai et al., 2000; Tilly et al., 1998). Positive behavior support (PBS) involves applying individualized approaches, based on behavioral principles and derived from functional assessments, to effect appropriate behaviors and reduce problem behaviors in a manner that produces durable improvements in a person's lifestyle (Horner et al., 1990; Koegel, Koegel, & Dunlap, 1996). Proponents of PBS advocate for a team-based approach (e.g., Bambara & Knoster, 1998; Hieneman & Dunlap, 1999) that includes input and participation from all individuals who are invested and involved in the life of the focus individual. Naturally, a team-based approach to FA and PBS mandates a large measure of family involvement.

We include PBS in the discussion because we believe that FA is inseparable from its sequela—the design and imple-

mentation of the behavior support plan that is based on its findings. Although the discussion here places the processes of FA and PBS in a broad and comprehensive context, we acknowledge that these processes can be, and often are, employed in situations that are confined to single behaviors in limited circumstances. For example, FA and PBS are commonly used to resolve an isolated behavior (such as head banging) that disrupts classroom operations in relatively few identified situations during school hours (such as when difficult work is assigned). The focus here, however, is on those circumstances where behavior problems are more pervasive—for example, when problem behaviors are present across environments and when, as a result, a child's functioning, development, and social participation are compromised in multiple settings. This orientation means that FAs must account for the full purview of a child's life and that behavior support plans must be designed for similarly comprehensive implementation. When a child has a significant communicative or cognitive disability, such as autism, this more comprehensive approach to assessment and intervention would seem to be particularly helpful. In these circumstances we believe it is especially urgent that careful attention be paid to the child's behavior in all settings, and thus family involvement must be viewed as particularly vital.

Throughout this article we refer to "family" involvement. In most cases, "family" is equivalent to "parent," and indeed we have chosen to use "parent" on occasion. However, many different relations (by birth, adoption, or foster arrangements) may function as family members and in parent roles. We use "family" and "parent" in the broadest contexts. Furthermore, there is often very good reason to have multiple family members involved in the processes of FA and PBS. The involvement of multiple family members (parents, grandparents, siblings, extended family) in assessment and intervention is highly desirable.

In the following sections we first review the rationale for family involvement and explain why full and meaningful fam-

ily involvement is necessary for optimal FA and effective behavior support plans. We then briefly review the empirical support for family involvement and the published works that demonstrate its advantages. We close with a discussion of key considerations in promoting and providing for family involvement in FA and PBS.

## Rationale for Family Involvement

The general rationale and importance of family involvement in children's educational and support programs has been articulated in many ways and in many places (e.g., Dunst, 1997; Field & Hoffman, 1999; Turnbull & Turnbull, 1996). Parent involvement has even been legislated. For example, parent involvement in the development of a child's Individualized Education Program has been a requirement of IDEA for some time, and the amendments in IDEA's 1997 reauthorization added strength and additional stipulations to the expectation of parent involvement in the education of children with disabilities. However, in addition to legislative and other regulatory intent, there are very compelling reasons to include the voices and perspectives of parents and other family members in the processes of FA and PBS.

The purpose of an FA is to develop an understanding of the relationship between a child's problem behavior and events in the environment. This involves gathering information through reports (e.g., interviews) and direct observation (e.g., systematic data collection) with the aim of obtaining enough data that clear patterns become evident. In addition, the FA and PBS processes require additional information that enters into the design of intervention plans. Such additional information is often collected as part of the FA (e.g., O'Neill et al., 1997) and includes issues such as a child's preferences, history of intervention programs, strengths, communication skills, medical concerns, and daily routines. The richer and more extensive the information available, the more likely it is that a valid, comprehensive understanding will

result and that an effective plan of behavioral support will ensue.

Families almost always possess a greater amount of information about a child than any other team member. Family members typically spend tremendous numbers of hours with the child, and they have the benefit of having observed and interacted with the child daily for many years. It is also typical that family members have gained special insights into many aspects of the child's behavior that are extremely relevant for an FA. For example, parents are often so aware of the antecedents to severe problem behavior that they frequently engineer various preventative measures within the course of their daily activities. This is not surprising, because it serves the family well to avoid or prevent severe disruptions. It is also true that this kind of information (e.g., about antecedents or "triggers" to problem behavior) can be extraordinarily helpful in conducting an FA. Furthermore, this is the kind of information that may be difficult for professionals to obtain without devoting very many hours of additional observation. In short, families usually have unique access to great amounts of valuable information that may be indispensable for an FA and, thus, the resulting PBS intervention.

In addition to being important sources of information, families also constitute the most influential contexts that most children ever experience. Children spend many hours in the surroundings of home and family, and this is the context in which they tend to acquire and practice most social, communicative, self-care, domestic, and behavioral adaptations. In fact, this is probably more true for children with disabilities than it is for children without disabilities, who may be exposed to higher levels of peer and societal influences. The influence of families provides a strong reason to have families included in the behavioral support process.

Because children with significant developmental disabilities usually need extended, more intensive caregiving, many families are also more invested in the behavioral support process. The significant problem behaviors of children with dis-

abilities create a great impact on families' functioning (Fox, Vaughn, Dunlap, & Bucy, 1997), and such families may therefore be deeply concerned with finding a feasible route to amelioration. Families also tend to want their children's schooling to go well, so even if there is little likelihood of (or need for) improvements in the home, families generally want to do what they can to see that school interventions are appropriate and successful.

Furthermore, along lines previously discussed, the development and application of comprehensive behavioral support requires an FA process that leads to interventions that efficiently produce sustained and generalized reductions in problem behavior (Horner & Carr, 1997). Interventions are comprehensive when they address all of the behaviors of the individual and are applied throughout the day in multiple environments. Thus, the development of comprehensive interventions can occur only if the family is involved to inform the process and participate in the implementation of interventions.

Finally, when behavior support plans are being developed for home or other family contexts, and when family members serve as the intervention agents, it is important to consider the extent to which the intervention strategies fit with the personal, cultural, structural, and familial values and contexts in which they are to be implemented (Albin, Lucyshyn, Horner, & Flannery, 1996). There is nobody equipped with the knowledge to make such determinations other than the family members.

In brief, there are ample reasons to involve families in the processes of FA and PBS. Families are the proprietors of essential knowledge about their children and the ecologies in which their children live, and families are affected directly (and often intensely) by behavioral support efforts. The more that families are involved in FA and PBS, the more likely it is that the results will reflect sensitivity to the families' lives and will have validity, efficacy, and benefit for the children, families, and all those involved in their support.

## Reports in the Literature

Until recently, there was very little research or published accounts addressing active family involvement in the processes of FA and PBS. An emerging research tradition, however, is beginning to include family members as partners in the enterprise of FA and PBS.

The paucity of research on family involvement in FA and PBS is understandable when one considers that FA has only recently been developed and sanctioned as a core element of behavior support practice (Repp & Horner, 1999). Similarly, it has only been a very short time since behavior support practitioners began to turn to a collaborative parent-professional partnership model and away from the traditional expert-driven model of service delivery (Carr, 1997; Hieman & Dunlap, 1999).

Still, the existing literature does claim a long tradition of family members being involved in learning how to use behavioral procedures to support their children (e.g., Becker, 1971; Bernal & North, 1978; Hall et al., 1972; Herbert & Baer, 1972). Likewise, in recent years it has become increasingly common for families to serve as informants and, after researchers have developed hypotheses, as data gatherers and intervention agents in direct observations of problem behavior in home and community contexts (e.g., Derby et al., 1997; Vaughn, Clarke, & Dunlap, 1997; Wacker, Cooper, Peck, Derby, & Berg, 1999).

A small number of research reports have described some additional involvement of families in other aspects of the behavioral support process. For example, Arndorfer, Miltenberger, Woster, Rortredt, and Gaffaney (1994) included parents in a study that examined the problem behaviors of five children. The purpose of the study was to compare the hypotheses produced by two FA methods (informant assessment and direct observation), and the study included additional testing of these hypotheses through experimental analyses. In four out of five cases, the parents and researchers independently arrived at the same hypothesis about the function of

the problem behavior, and parents succeeded in implementing the brief experimental analysis procedures in the context of routine activities in the family home. Thus, this study demonstrated that these families were successful at generating and testing hypotheses about the functions of the problem behaviors of their children.

Freya and Hepburn (1999) investigated two mothers and their children with autism in a study of parents' use of FA and PBS procedures. Specifically, they monitored the mothers' success in using an FA checklist, identifying functionally equivalent replacement behaviors, and then teaching the replacement behaviors to their children with problem behaviors. Both mothers were successful in demonstrating these skills, and their children showed decreases in problem behaviors and increases in the replacement behaviors.

In a different approach embracing the concept of parent-professional partnerships, Vaughn, Dunlap, et al. (1997) conducted a study that included a mother as a research team member and author. In this study, FAs and PBSs were used to improve the community functioning of the mother's 9-year-old son, who was affected by Cornelia DeLange syndrome, severe intellectual disabilities, chronic medical challenges, and longstanding disruptive and destructive behaviors. In a companion study, Fox, Vaughn, et al. (1997) described a qualitative analysis of the family's experiences during the 10-month support process. This latter report recorded periods of stress, anxiety, and joy, which could be helpful in facilitating parent involvement in the various phases of the support process.

Lucyshyn, Nixon, Glang, and Cooley (1996) and Lucyshyn, Albin, and Nixon (1997) have described a process that is similar in some respects to the partnerships of Vaughn, Fox, and their colleagues. They refer to their model as "comprehensive family support." It includes (a) a theory-guided understanding of child behavior problems and family ecology, (b) the design of multi-component, PBS plans, (c) "goodness-

of-fit” between the support plan and family ecology, (d) a focus on building successful family routines, and (e) the development of collaborative partnerships. In this collaborative approach the FA process is complemented by a “family ecology assessment,” which identifies family-centered interventions (such as planning for respite care or sharing child-care and housecleaning tasks) that can buttress the child-centered interventions. Family members are involved in all aspects of the behavior support process and provide feedback regarding the acceptability of the plan’s goals, procedures, and outcomes, as well as their qualitative impressions of the behavior support experience and results.

An increasing number of reports have described significant involvement of family members in FA and PBS processes (e.g., Boulware, Schwartz, & McBride, 1999). Fox and Dunlap described a family-centered model of early intervention for young children with autism that relies on the premise that parents will gain expertise and confidence in conducting FAs and developing assessment-based interventions for their children (Dunlap & Fox, 1996, 1999a; Fox, Benito, & Dunlap, in press; Fox, Dunlap, & Philbrick, 1997). The expectation is that these parents will possess the problem-solving and team membership skills to maintain active involvement (and leadership) throughout the many years of their children’s development.

### **Considerations for Encouraging Family Involvement**

The following sections describe some issues that are important to consider in promoting family involvement in FA and PBS. These considerations stem largely from our experiences in working with families, schools, and community support agencies and from a growing number of reports in the literature (e.g., Boone & Crais, 1999; Dunlap & Fox, 1999b; Fox, Vaughn, et al., 1997; Rainforth, York, & MacDonald, 1992; Turnbull & Turnbull, 1996). They are based

on the assumptions that family involvement is desirable and that it can be difficult to achieve. Therefore, the considerations may be viewed as general strategies that educators and other professionals should contemplate—and incorporate—as they engage in the FA and intervention process.

### **Recognize, Respect, and Accommodate Families’ Individuality**

Families are systems that are highly diverse and individualistic. Families differ along many dimensions, including the way they are composed; their size and cohesiveness; their resources; and the knowledge, experience, priorities, and preferences of their individual members. All families have strengths and all families have challenges. It is every bit as important to engage families on an individual basis as it is the family member with a disability.

When it comes to involvement in FA and behavioral support, families come equipped with different levels of understanding, motivation, and availability. Some families are avid participants, and others exhibit reluctance. Some families are assertive and active in all phases of the process, whereas others prefer far less involvement. Some families desire an ongoing presence; others forcefully eschew all invitations to participate.

Families’ different inclinations toward involvement may be based on an infinite number of factors, ranging from economic and cultural influences to different experiences with social service systems (e.g., Dumas & Wahler, 1983; Harry, 1992; Wahler, 1980). We believe the objective should be to encourage and provide for the fullest extent of involvement that a family can manage as a function of their own circumstances and priorities and that professionals should consistently respect these family decisions. It is also important to be sensitive to the kinds of supports and contexts that enable family involvement. These may involve meeting in nontraditional locations and at times that are convenient for the family and encouraging the participation

of multiple family members, friends, and advocates.

### **Create a Context for Family-Centered Participation**

Meaningful family involvement requires that the family’s identity, priorities, and vision be a foundation on which an intervention plan is established. A key to building such a foundation is to create a process for soliciting the family’s goals and view of the future. Person-centered planning techniques (Holburn, 1997; Kincaid, 1996), such as PATH (Pearpoint, O’Brien, & Forest, 1998), MAPS (Vandercook, York, & Forest, 1989), Group Action Planning (Turnbull & Turnbull, 1996), and Personal Futures Planning (Mount & Zwernik, 1988), create an excellent context in which to achieve this result.

Families are experts with regard to their children. Whereas professionals may move in and out of a child’s life, the family is the center and the constant for the child. In recognition of this, person-centered planning relies on the focus person and his or her family and friends to define goals and provide guidance to those who can help the person achieve desired lifestyle outcomes. This can be a liberating experience for individuals with disabilities and families whose only previous experience with the behavioral support process might have been as informants or as recipients of a behavior support plan whose content was limited to reducing problem behavior and, in some cases, increasing adaptive replacement behavior. In short, person-centered planning can create the context in which families can develop goals for a behavior support plan that has genuine significance for the child and family and thus serves to enhance the family’s investment in the process.

### **Take a Comprehensive Perspective**

As previously noted, the entire purpose of an FA is to develop and implement an effective program of behavior support. An important benefit of family involve-

ment is that this input can help ensure that the goals of the process are well considered—that they include outcomes that have lifestyle meaning for the child and, indirectly but just as significantly, for the family. To achieve such outcomes, FA and behavior support must be pursued from a broad, comprehensive perspective.

A comprehensive approach to FA requires that multiple environments be considered and that the process include consideration of ecological, physiological, and systemic variables that may influence the occurrence of problem behaviors. A narrow approach to FA that adheres to a limited contingency management model of consequences and immediate antecedents is inadequate for this purpose. For example, it is often the case that problem behaviors are evoked or exacerbated by internal discomfort or illness and by general unhappiness with the social, curricular, or structural elements of a setting. To achieve durable, meaningful behavior change, one must often examine explicitly the possibility of such setting influences and make pertinent adjustments to such variables as medical treatment and daily routines (e.g., Dadsen & Horner, 1993; Kennedy & Itkonen, 1993; Turnbull & Turnbull, 1996).

The identification of broad factors that affect responding in multiple environments cannot ordinarily be accomplished without family involvement. Likewise, intervention that produces meaningful benefits for children and families cannot usually be achieved without broad-based FA. Such a comprehensive perspective will facilitate family involvement.

### **Develop and Maintain a Team Partnership**

No one person can succeed at creating and maintaining the environmental conditions to support a child's positive behavior and minimize his or her problem behavior at home and in the school and community. Teams are a necessity. Ideally, the processes of planning, FA, and behavior support should accommodate the full complement of people who play

a significant role in the child's life, with the family occupying the central role. For example, in addition to the family and the child, the team for a school-age child might include the teacher, paraprofessional, a behavior specialist, related-services personnel (e.g., a speech pathologist), and a classmate. Teams such as this work when there is shared decision making; promotion of team competence and skill acquisition; sharing of control and information; patience; mutual respect; a willingness to say "I don't know"; and encouragement for everyone to share ownership in the process (Hieneman & Dunlap, 1999). The team approach optimizes the exchange of relevant information and resources and serves to provide invaluable social, emotional, and instrumental support for the family as well as the other members of the team.

Teams that work well in the initial assessment and intervention phases should be maintained, even when the need for attention to behavior support concerns is not immediately evident (and when the need to convene is very infrequent). This is true for several reasons. First, it is very rare for problem behaviors to be resolved permanently. Rather, problem behaviors typically recur as the child encounters new circumstances, new environments, and new developmental challenges and also as the support systems and personnel (e.g., teachers) change over time. In this respect, FA is viewed best as an ongoing endeavor, not as a single one-time-only event. Similarly, the behavior support plan is also viewed as a dynamic document that is adjusted and enhanced with ever changing lifestyle circumstances.

The best way to promote and preserve family involvement is to establish a team tradition where the family knows that responsive support is available on an ongoing basis to help think about and construct effective programs of intervention. This kind of approach can be exceptionally valuable in terms of the reciprocal assistance and mutual benefits that affect each team member and, most significantly, the child who is the focus of the team's efforts.

## **Summary**

Issues related to the involvement of families in FA and PBS are complex, and we recognize the risks of oversimplification. There is no question that substantial barriers can mitigate against the development of parent-professional partnerships and that, for many families, becoming involved at the level desired may be seen as an unattainable luxury. Still, it is important to appreciate that some amount of family involvement is expected, and even mandated, and that there are many reasons to seek as extensive and rich an involvement as can be developed. It is our thesis that significant involvement on the part of both families and professionals is vital to effective, comprehensive behavior support. It is our hope that developments in the coming years will make these ambitions an increasing part of our reality.

### **ABOUT THE AUTHORS**

*Glen Dunlap is director of the Division of Applied Research and Educational Support at the University of South Florida, where is also principal investigator of the Rehabilitation Research and Training Center on Positive Behavior Support. His primary interests are in research and program development in the areas of functional assessment, behavior support, early intervention, and family support.*

*J. Stephen Newton is a research associate with Educational and Community Supports, a research unit within the University of Oregon's College of Education. His research interests include outcome and quality improvement systems in residential services for adults with developmental disabilities.*

*Lise Fox is an associate professor in the Department of Child and Family Studies of the Louis de la Parte Florida Mental Health Institute at the University of South Florida. Her publications and research interests are in the areas of supporting children with disabilities and challenging behavior in developmentally appropriate environments, positive behavior support, and family support.*

*Nila Benito's primary focus is to help her sons with autism, Vincent and Joseph, be the best they can be. Nila works at the University of South Florida in the Division of Applied Research and Educational Support with the goal of promoting positive outcomes and a greater understanding of people with developmental disabili-*

ities and their families. Before working at USF, Nila worked as a reporter for the Tampa Tribune and as director of public relations for a children's hospital. Bobbie Vaughn is an assistant professor in research at the University of South Florida. Her current interests include research with families who have children with developmental disabilities and challenging behavior. Address: Glen Dunlap, Division of Applied Research and Educational Support, Department of Child and Family Studies, Louis de la Parte Florida Mental Health Institute, 13301 Bruce B. Downs Blvd., Tampa, FL 33612.

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