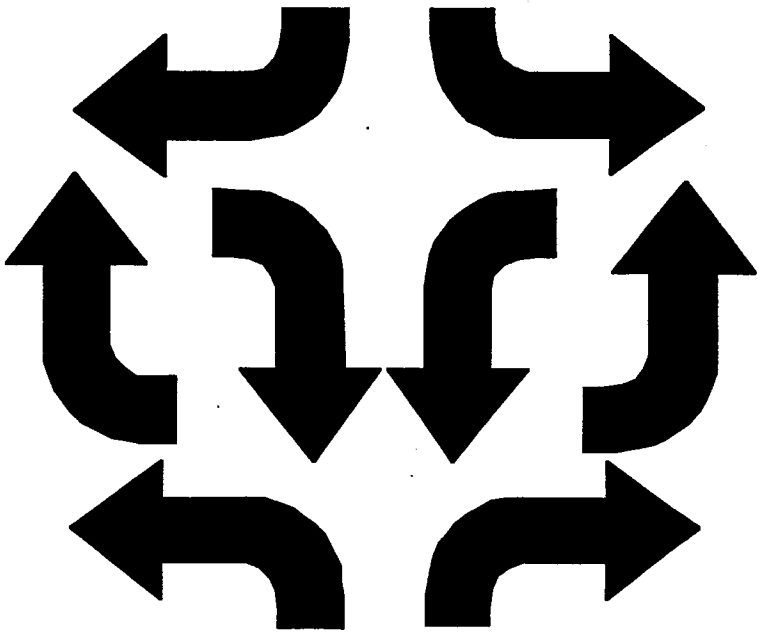
Functional Assessment



What It Is And How To Do It

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Overview of Functional Assessment

Assessment has typically been conducted for one of two major purposes. The first purpose is either to determine whether a student is eligible for special education services under the Individuals with Disabilities Act (IDEA). The second purpose is for intervention. We would think that assessment for intervention would yield information applicable for developing interventions—as the purpose implies. However, traditional assessment techniques such as standardized tests of intelligence and achievement, behavior ratings, assessment of peer relations, and physical and psycho- physiological measures have few implications for intervention

The term functional assessment can be misleading. It could imply that traditional approaches for assessing behavior problems are nonfunctional. To say that an approach is more, or less, functional than another is a difficult distinction to make. The degree to which obtained information help use determine the purpose a behavior serves is what makes one approach more functional than another. Interestingly, the dictionary definition of the word function is "involving functions rather than a physiological or structural causes." This definition ignores the role of physiological factors in favor of purposeful relations between environmental variables and a student's behavior. Simply stated, functional assessment involves engaging in activities to (a) identify environmental factors that affect the performance of a behavior and the desired outcome that behavior serves and (b) identify a replacement behavior that is an appropriate way for students to obtain a desired goal..

A student's performance of behavior depends on the antecedents (people and events) that cue or prompt it and the consequences that maintain it. The behavior is maintained if it accomplishes a desired goal for the student. Desired goals (i.e., functions) can usually be categorized as positive reinforcement (attention, access to objects/activities) or negative reinforcement (escape or avoid something aversive). Manipulating antecedents and consequences change the conditions under which the behavior is performed. These manipulations may result in intervention suggestions for a behavioral support plan. However, no behavioral support plan is complete unless is includes teaching a student a replacement behavior and reinforcing him when it is performed. In this way, the student will have in his repertoire an appropriate way to obtain a desired goal.

Basic Assumptions of Functional Assessment

There are three basic and interrelated assumptions about behavior that are foundational to understanding functional assessment. First, context affects how a

behavior is displayed and interpreted. Second, all behavior is purposeful and serves a function for a student. Third, replacement behaviors allow students to appropriately obtain a desired outcome. All three assumptions deserve elaboration because they are foundational for understanding and using functional assessment.

Behavior is Affected by Context

Behavior does not occur in a random or unorganized fashion. Students' behaviors attain meaning from the context—situation or circumstances—that exists in a particular environment. Therefore, a major aspect of functional assessment involves analyzing antecedents and consequences. Antecedents refer to the circumstances that exist in the environment before a behavior is exhibited and prompt its performance. Consequences refer to a change in the environment shortly after a behavior is displayed. Consequences function to either maintain, increase, decrease, or eliminate a behavior.

Behavior is Purposeful

All behavior is purposeful and serves a function for a student. The term behavioral intent describes the relation between the behavior a student exhibits and the outcome he desires. When a student acts, even with behaviors considered to be inappropriate, he does so to achieve a result. The desired result, or outcome, can be viewed as the intent or function of the behavior. In turn, the intent of the behavior will affect the form (i.e., appearance) the behavior takes to achieve a desired outcome. The function a behavior serves may be appropriate while the form a behavior takes to be inappropriate. For example, a student who makes animal noises may be doing so to obtain attention from peers or escape a task he perceived to be aversive. There is nothing inherently wrong with a student wanting attention from peers or escaping something perceived to be aversive. However, there are appropriate behaviors, times, and situations in which to obtain these outcomes.

Teach Replacement Behaviors

Behavioral support plans (the byproduct of functional assessment) will be incomplete if they do not include replacements behaviors that students can be taught and reinforced for displaying. Simply manipulating antecedents and consequences in insufficient and will not help the student perform appropriate behaviors in different settings and situations. For example, a student may make animal noises to get the attention of peers sitting around him. We can modify the environment by moving the student away from those peers. This manipulation may effectively reduce or eliminate the student making animal noises. But what happens when the student wants to get the attention of peers in the cafeteria or on the playground? Making animal noises in these situations may alienate him from, rather than involving him with, peers. However,

teaching an appropriate way to gain peer attention (e.g., tell a funny story or talk about sports) may be used under a variety of situations in which we do not have direct control.

Inappropriate behavior does not always need to be decreased if we can identify replacement behaviors. For example, a student may get out of his seat as a way to get the teacher's attention and help. However, simply teaching and reinforcing the student for raising his hand may accomplish the same outcome as getting out of the seat. Consequently, the inappropriate behavior may no longer be performed.

Types of Hypotheses

Generating hypotheses are essential for conducting functional assessment. They represent the vehicle for selecting appropriate replacement behaviors and implementing appropriate interventions to reinforce their occurrence and modifying antecedents and consequences. There are three types of hypotheses that may be generated for functional assessment: functional, contextual, and curricular.

Functional Hypotheses

A major emphasis of functional assessment is generating hypotheses related to the function, or intent, a behavior serves. For example, a hypothesis that "Jane tantrums in order to get the teacher's attention" focuses on the desired outcome or purpose of behavior. Functional hypotheses tend to lead to interventions that address replacement strategy training—teaching an appropriate behavior that serves the same purpose. Therefore, we would teach Jane an appropriate way for getting the teacher's attention (e.g., raise her hand, ask for help, walk up to the teacher).

Contextual Hypotheses

Contextual hypotheses are frequently generated from examining the antecedents and consequences surrounding the performance of an inappropriate behavior. One of the most basic, and still one of the best, ways to generate contextual hypotheses is through the use of an A-B-C analysis. To conduct an A-B-C analysis, a piece of paper is turned horizontally to make three columns labeled with the words antecedents, behavior, and consequences. Observations are then numbered and recorded according to whether they were antecedents, behavior, or consequences such as those appearing in Figure 1. Recall that Kevin's inappropriate behaviors were maintained by the attention he received from Sally and the teacher.

Curricular Hypotheses

Curricular hypotheses focus on identifying the types of curricular, task, and instructional demands that may prompt the occurrence of inappropriate behavior. These factors are then modified to increase the occurrence of appropriate behavior. Curricular variables such as student preference, choice making, length of task, type of task, and task difficulty can substantially influence the occurrence of undesirable behavior.

Stages of Functional Assessment

Functional assessment begins when we have identified a student whose behavior is interfering with his and/or peers' academic and social progress. We may have only a vague idea of the behavior of concern. For example, we may say that the student is "disruptive," "off-task," "uncooperative," "hyperactive," or "not achieving." Sometimes we may initially use more objective terms to describe the behavior. In either case, the first step is to interview knowledgeable adults, peers, and the student (if possible) about the circumstances under which the behavior occurs. We will then collect behavioral observations of the student in the settings and situations identified as areas of concern from the interviews. The purpose of these behavioral observations is to confirm and find discrepancies (if any exist) from interview information and to begin to refine the definition of the behavior of concern. The third step is to collect additional behavioral observations using a scatter plot technique. The scatter plot technique helps us pinpoint specific days, times, and activities in which the challenging behavior is most likely to occur. The next step is to conduct an A-B-C analysis in order to isolate the immediate antecedents and consequences surrounding the behavior. By using the functional assessment hypothesis generation protocol, we define the behavior precisely in objective terms and generate hypotheses to test. Testing hypotheses (also called functional analysis) is accomplished by observing, recording, and graphing the target behavior before and after making curricular or contextual modifications or teaching a replacement behavior. This information is used to write a behavioral support plan described in the next major section of this chapter.

Stage I: Hypothesis Development

To begin the process of developing hypotheses, it is necessary to engage in four activities: (a) pinpoint a behavior of concern, (b) interview adults, peers, and the student of concern (when applicable) to determine environmental factors that affect behavior, (c) directly observe the target behavior in the natural setting, and (d) refine the definition of the behavior and generate hypotheses. While engaging in these activities, it is important to remember that hypothesis testing simply represents a best guess. As such,

we may want to generate several hypotheses. Furthermore, we should not become discouraged if our first hypothesis does not work out. The very nature of functional assessment lends itself to disproving hypotheses as much as proving them. Finally, disproving a hypothesis provides information useful in developing the next hypothesis to test.

Defining a Target Behavior

It is necessary for teachers involved in functional assessment to precisely define a behavior so that its occurrences and nonoccurrences can be reliably noted. An operational definition of a behavior should include its topography (appearance), frequency (number), duration (length), and intensity (severity). Defining a behavior as "strikes peers on the back with open hand for 2 seconds five times a day" is preferable to saying "hits other peers a lot." Classroom teachers who work most closely with a student may be able to provide the greatest specificity to as behavioral definition. When multiple persons are involved in a functional assessment, properly defining a behavior provides all involved parties with a set criterion to judge the importance of a behavior and ensure that everyone is observing the same thing. It may be necessary to modify the definition of the target behavior after collecting information from interviewing and behavioral observations.

Interviewing

Interviewing adults and students (where applicable) is an initial step to understanding the conditions under which a student's behavior occurs. The use of interviewing presupposes that conducting functional assessment will be a collaborative process between two or more school personnel. The more people that can be interviewed, the greater the likelihood that no important information will be omitted. At least two school personnel involved with the student and the student's parents be interviewed. The purpose of interviewing multiple people is to determine if certain behaviors occur in some, but not other, contexts and conditions. In addition, it is helpful if both male and female teachers can be interviewed because students' behaviors sometimes vary depending on the gender of the adult.

An interview should focus on two core questions: (a) Under what conditions or circumstances is the behavior most likely to occur? and (b) Under what conditions or circumstances does the behavior rarely or never occur? Figure 2 provides a sample interview form. The information acquired through interviewing is still fairly global and often appears in nonbehavioral terms. For example, one teacher may say a student is off task during most of the independent seatwork activity while another teacher may say the student is inattentive during lectures. "Off task" and "inattentive" are not specific behaviors. Nevertheless, this information gives a contextual starting point to later refine

the definition of the behavior and formulate a hypothesis that can be tested using direct observation methods.

Behavioral Observations

Although important information may be obtained from interviewing others, it is important to corroborate these results, identify discrepancies, and determine specific controlling environmental variables through the use of direct observations of behavior. Three types of behavioral observation techniques are described: behavioral observation chart, scatter plot, and A-B-C analysis. These three techniques are used in the order presented as a way to obtain increasingly detailed information about the conditions under which the behavior of concern is performed.

The behavior observation chart appearing in Figure 3 is used to confirm information acquired through interviewing and also identify any discrepancies. To use this technique, we list the various materials, tasks, and activities that a student is involved in during various times of the day along the vertical axis. Two columns appear along the horizontal axis: (a) appropriate student behaviors and (b) inappropriate student behaviors. We then write, under each column, the types of appropriate and inappropriate behaviors observed for each activity/task listed on the vertical axis. We can now compare this information to that obtained through teacher interviewing. In Figure 3, two appropriate behaviors (ask question and finish work) and two inappropriate behaviors (talks out and out of seat) were targeted. From the data appearing in this figure, the student engaged in inappropriate behaviors during individual-type lessons/assignments and transition. The student behaved appropriately during group-type lessons and activities. Consequently, the student may not possess the skills to work independently and misbehaves as a way to escape the task or lesson. This hypothesis would require further observation before testing it in Phase II of functional assessment. An alternative use of the behavioral observation chart is to list two to three specific appropriate and inappropriate behaviors obtained from interviewing. We then make tally marks every time one of those behaviors occurs during the task/activity appearing on the vertical axis.

We should now have an emerging picture of the behavior of concern and the situations under which it occurs. The original behavior of concern may now be more precisely defined and observed using the scatter plot method appearing in Figure 4. The days for several weeks are listed on the horizontal axis. This process results in a grid in which instances (or noninstances) of a behavior can be charted over a period of weeks, thereby making it possible to identify certain patterns. For example, an examination of the scatter plot in Figure 4 reveals that math period seemed to be a particularly important antecedent for the occurrence of problem behavior. This determination is made by making tally marks for the number of times the behavior occurs in a box that intersects an activity and day. The behavior of concern also appeared to occur more

often on Mondays. Conversely, recess/story time and preparing for home had no episodes of inappropriate behavior. These activities may be used as reinforcers to maintain appropriate behavior at other times.

The final behavioral observations we make during the hypothesis generation phase of functional assessment is to conduct an A-B-C analysis to yet still more precisely pinpoint specific antecedents and consequences affecting the performance of the behavior of concern (see Figure 1). For example, information obtained from the scatter plot indicated that math period was an important antecedent for the behavior. Therefore, we would conduct a fine-grained A-B-C analysis during math period. It would also be important to conduct an A-B-C analysis on Mondays and another day of the week because the behavior of concern occurred more on Mondays than on other days of the week. We may find out that task demands on Mondays differ from those during other days. Once several A-B-C analyses have been conducted, we can now generate hypotheses to be tested.

Generating Hypotheses

The culmination of data collected from interviews and direct observations are testable hypotheses. In many instances, generating testable hypotheses requires collaborative efforts between consultants and classroom teachers.

The protocol that appears in Figure 5 is designed to address all of the steps in the hypothesis development stage of functional assessment so that teachers can arrive at a plan for contextual and curricular manipulations and replacement behavior training with little or no consultation from professionals. Combining elements of other checklists and interview and observation forms, the protocol directs a teacher through the process of operationally defining a behavior, identifying setting events and function (intent) associated with the occurrence of the behavior, and conducting a systematic observation of the behavior. The use of the protocol culminates in the development of a hypotheses statement and the formulation of a functional analysis plan.

Stage II: Hypothesis Testing

The second stage of functional assessment, often referred to as functional analysis, consists of testing hypotheses by systematically manipulating contextual and curricular variables and teaching a replacement behavior while observing these effects on the target behavior. An example using two manipulations—curricular and replacement behavior training—to illustrate the functional analysis (hypothesis testing) phase of functional assessment.

We may hypothesize that the function (intent) of a student's tantruming is escape from a difficult task. We would observe the occurrences of tantruming for several sessions and then institute a curricular manipulation while continuing to observe the occurrences of tantruming. The curricular manipulation may be to substitute the difficult task with an easy high-interest task while holding other behavioral and environmental variables constant. If tantruming decreased, then the hypothesis that tantrum served an escape function has been confirmed. The logic is simple: If a student tantrums to escape a difficult task (e.g., sent to time-out, the hallway, or principal's office) then she would have no reason to tantrum to escape an easy high-interest task. The difficult task can be reintroduced to further corroborate this hypothesis: If tantruming increases, then the difficult task most likely is a relevant and controlling variable.

We can also test whether tantruming serves the function of escape by teaching the student a replacement behavior. We could present the student with three possible replacement behaviors to use when the task gets to difficult: (a) raise hand to ask for help, (b) raise hand to ask for a break, or (c) raise hand to ask for an easier task. The student could initially select the replacement behavior she would like to try and we would reinforce her for using it. If tantruming decreased, then the hypothesis that it served an escape function would be demonstrated through this replacement behavior training manipulation. The logic is straightforward: The student should have no reason to continuing tantruming to escape the difficult task because she was given, and reinforced for using, a more appropriate behavior that served the function of escape.

These two manipulations described previously demonstrated the general approach for testing a hypothesis. However, there are four specific steps that should be followed:

1. The target behavior must be operationally defined.
2. A recording technique must be selected for observing and counting the target behavior.
3. The target behavior must be observed before and after manipulating variables (e.g., curricular, contextual, or functional).
4. The results of behavioral observations are placed on a graph to provide a visual representation of the effects of the manipulations.

These steps are described using the example of "tantruming" described above.

Throughout the hypothesis generation phase of functional assessment, the definition of the target behavior is refined as more information is obtained. However, by the time the protocol appearing in Figure 5 is completed, the target behavior should be precisely defined using objective (rather than subjective) terms. It is the first step in testing our hypothesis. In our example, "tantruming" is defined as "stomping a foot on the ground while slamming a book on a desk or table top."

The second step to testing our hypothesis is to first observe the behavior over several days or sessions before we implement the manipulation. We must select a recording technique with which to observe the target behavior. Recording techniques exist to record how many times the behavior occurs (frequency), how long the behavior occurs (duration), or both). We will record the number of times tantruming occurs (frequency) because it is fairly easy to tally the number of times the student stomps her foot and slams books. We want to collect at least five separate observations of the target behavior before we implement the manipulation. The reason is because we will plot the number for each observation on a graph and connecting them with a line. Plotting five or more numbers will allow us to visually inspect the trend in the graphed behavioral observations.

The third step is to implement the manipulation while continuing to observe and record the occurrence of the target behavior—in our example, the number of times the student tantrums when completing a task. We want to observe the behavior at least five times while the manipulation is in effect for the same reason as stated previously: to visually inspect the plotted frequency trend in the graphed numbers.

The fourth step is to graph the numbers from our behavioral observations before and during manipulation. It is easiest to plot the numbers of the behavioral observations on the graph after each observation rather than waiting until the end of the manipulation period so that we can determine how well the manipulation is working. Our graph will have a vertical and horizontal axis. We label the left side of the vertical axis "Number of Tantrums" and label below the horizontal axis either "days" or "sessions." If we observe the behavior only once a day, then the word "days" would appear whereas if we observed the target behavior more than one time a day, the length of the observation followed by the word "sessions" would be written. We would write the letter "A" and the word "baseline" at the top of the graph corresponding to our plotted numbers prior to instituting a manipulation. A vertical line is drawn after the last baseline observation number is plotted to indicate that we are now changing the conditions under which the target behavior is observed. The second phase (to the right of the vertical phase change line) is marked with the letter "B" followed underneath with the word "manipulation."

Writing Behavioral Support Plans

Behavioral support plans are formulated based on information collected from functional assessment. They represent our strategy for keeping the inappropriate behavior from resurfacing. It provides recommendations other teachers and school personnel that interact with the student can follow. Good behavioral support plans include six components:

1. **Behavior Support Plans Describe Our Behavior**. A good behavior support plan defines in very specific detail the changes expected in the behavior of relevant teachers, paraeducators, and other school personnel (family members too when applicable).
2. **Behavior Support Plans are Built from Functional Assessment Results**. Functional assessment information should allow us to identify specific changes in a classroom that will change patterns of the problem behavior.
3. **Behavior Support Plans Should Be Technically Sound**. Plans should use the principles appearing in Chapter 4 and are technically sound if they make the problem behaviors irrelevant and ineffective.
4. **Make Problem Behavior Irrelevant**. We should identify those situations (antecedents) that set the occasion for problem behaviors and organize the environment to reduce the likelihood that these conditions are encountered. For example, a student that screams as a way of getting attention in an otherwise boring environment could become irrelevant if a more active and interesting schedule of daily events was developed.
5. **Make Problem Behaviors Ineffective**. Behavior support plans should make problem behaviors ineffective ways of obtaining reinforcers. For example, by moving a student that screams to get peer attention away from peers or teaching the student to get peer attention appropriately (e.g., share a favorite story or movie with peers) makes the inappropriate behavior ineffective.
6. **Behavior Support Plans Should Include a Replacement Behavior**. The key consideration for behavior support plans to be effective is identifying replacement behaviors, describing how they will be taught, and developing a intervention for reinforcing the student for performing them.

With these six considerations in your mind, we are ready to write a behavioral support plan. Behavior support plans should contain the following information: (a) summary of the findings, (b) general approach, (c) areas of concern, and (d) monitoring and evaluation.

Summary of the Findings

Behavior support plans typically begin with a summary of the findings from both hypothesis generation and hypothesis testing phases of the functional assessment. It is important to restate the final operational definition of the target behavior that was the subject of the manipulation(s) so that everyone reading the behavior support plan who were not familiar with the initial functional assessment have a clear understanding of the nature of the problem.

The second piece of information that should be stated in the initial section of the behavior support plan is a summary of the manipulations conducted. This information will let readers know what manipulations were the most effective. In many cases, behavioral support plans are a logical extension of manipulations conducted during functional analysis. Consequently, this information is often translated into accommodations and/or interventions for the student.

General Approach

The general approach section of the behavior support plan is a description of the intervention procedures. The overall goal is to identify a set of procedures that make problem behaviors irrelevant, inefficient, and ineffective. In most cases, this section of the plan will include at least four subsections: (a) setting event strategies, (b) instructional interventions, (c) consequent interventions, and (d) future replacement behaviors. The section should clearly define what school personnel will do to reduce the problem behaviors.

Setting events refer to those antecedents that cue or prompt the occurrence of the inappropriate target behavior. We want to describe the types of antecedent modifications that are recommended to decrease future occurrences of the target behavior. Examples of possible setting event manipulations include (but are not limited to) shuffling the student's schedule, changing class size and seating arrangement, using more or fewer desks or study carrels, and use of partitions. More specific instructional antecedents are described in the next paragraph. We should provide a rationale for the strategies selected.

Instructional interventions focus on changing some aspect of the instruction the student receives. Many behavior problems arise because a student either lacks the prerequisite skills to perform the task or finds the task boring or irrelevant. Therefore, potential interventions could include imbedding the task in a relevant context. For example, instead of teaching multiplication of decimals in isolation, it could be presented within the context of a student computing his favorite baseball players batting averages. The use of criterion-referenced testing may be used to assess a student's instructional level. This assessment is important when assigning students independent paper-and-pencil independent seatwork activities. In order to work independently, students should be at least 85% to 95% accurate at a task with teacher guidance. Instructional interventions may also focus on how instruction is presented. For example, the student in a previous example who had tantrums to escape a difficult lesson may perform better in a cooperative learning group or while receiving peer tutoring because others can give her ongoing feedback.

Consequent interventions—as the name suggests—focus on the consequences of misbehavior. Good behavioral support plans include positive reinforcement interventions such as those described in The Tough Kid Book. The use of positive reinforcement serves three functions. First, it can be used to promote the student using replacement behaviors. Second, it can be used to reinforce the absence of the target behavior. Third, we can reinforce peers who have given attention to the student for displaying the inappropriate behavior.

Identifying replacement behaviors is the last topic to be addressed in the "general approach" section of the behavioral support plan. Describing potential replacement behaviors is important because they help the student generalize the results of functional assessment to other settings. The general logic of teaching replacement behaviors is that by teaching as student appropriate behaviors that serve the same functional as the inappropriate behavior, and reinforcing him for using it, the inappropriate behavior is less likely to occur. For example, teaching a student to ask the teacher for a break may allow him to escape an aversive task just as well as did previously making animal noises. If the student sees that asking for a break works better (i.e., he is reinforced rather than punished) than making animal noises, it is more likely to be performed in other situations and settings.

It is relatively simple to identify replacement behaviors when we think "response class." A response class is a group of behaviors that share some common characteristic—most notably, the same function. We would generate a large list of behaviors that appropriate allow the student to escape an aversive task (e.g., ask for help, request a break, ask for an easier task). We would then ask the student to list any additional behaviors that would serve this same function appropriately. Next we would ask the student to rank order which behaviors would be most acceptable. Finally, we would teach and reinforce the student for performing the replacement behavior. We would try to continually identify possible replacement behaviors so that the student's repertoire would eventually expand, thus further promoting generalization.

Areas of Concern

No behavioral support plan will be foolproof. Like functional assessment, behavioral support plans should be flexible and evolve with the needs of the student. There is a simple yet profound axiom: take what the student gives you. This axiom points out that the very nature of students with challenging behaviors is challenging. No one intervention will work forever. An important point is that functional assessment is ongoing—we are always trying to find new and more effective manipulations that lead to improved behavioral support plans. This process is enhanced when we consider, and plan for, unexpected events that become areas of concern. There are two main

areas of concern that should be addressed in this section of a behavioral support plan: (a) key routines and (b) difficult situations.

Key routines involved describing how to respond when the most dangerous and difficult behaviors occur. Although every effort will be made to develop proactive procedures that decrease the likelihood of problem behaviors (through antecedent and instructional modification), we should nevertheless assume that any problem behaviors displayed by the student in the past will occur in the future. A behavior support plan that does not have clearly defined procedures for responding to these difficult situations is incomplete. Therefore, our key routines should describe difficult behaviors and present strategies for preventing their occurrence. For example, in a previous example, three manipulations were described for a student who would tantrum to escape a difficult task. Key routines would address other possible inappropriate behaviors the student may display to escape the task, such as poking other students or making animal noises. We would also want to reiterate strategies to reduce the likelihood of peers inadvertently reinforcing the student for performing these behavior.

Describing difficult situations goes hand-in-hand with key routines. Here, we want to elaborate on one or two specific situations that past experience indicated may trigger other problematic behaviors. For example, if we identified "animal noises" as a second way that the student escapes a difficult task, specific interventions should be emphasized to remediate this problem.

Monitoring and Evaluation

Behavior support plans should be monitored and evaluated on an ongoing basis. The two key questions for any plan are (a) Is the plan having any impact on the behavior of the personnel in the target setting? And (b) Is the plan having any impact on the behavior of the target student? The section of the behavior support plan that defines monitoring and evaluation procedures should indicate (a) the system that will be used for collecting data and (b) the process for data review (how often and by whom). In most cases, the behavioral recording technique used during functional analysis can be used to monitor progress. In a previous example, the frequency of tantrums before and during manipulations was recorded and graphed by counting its occurrence. We can recommend that this observation, recording, and graphing process continue throughout the school year. The only modification is that instead of collecting and graphing behavioral observations daily, we can collect them once or twice a week. This recommendation will provide us with information more sporadically but over a longer period of time in order to assess the long-term effects of the behavioral support plan.

Figure 1: A-B-C Analysis

Antecedent	Behavior	Consequence
1. Teacher: "Time for math worksheets." Teacher begins handing out sheets.	2. Kevin gets out of desk and walks around room.	3. Sally giggles when Kevin pushes her elbow as she writes her name on the worksheet.
4. Teacher tells Kevin to sit down.	5. Kevin raises his hand.	6. Teacher: "I'll be right with you, Kevin,"
7. Kevin turns around to talk to Bill	8. Teacher tells Kevin to stop talking and get to work.	9. Kevin drops worksheet on floor.
10. Teacher is looking for a pencil at her desk.	11. Kevin gets out of seat and heads for pencil sharpener.	12. Teacher: "Where's your worksheet, Kevin?
13. Kevin: "I'm not sure."	14. Teacher: "Check under your desk."	15. Kevin: "I'll copy the problems from Bill."
16. Teacher: "Pick up your worksheet or you'll stay in for recess."	17. Kevin walks over to worksheet.	18. Teacher ignores Kevin.
19. Kevin knocks Sally's book off her desk.	20. Teacher: "Kevin, pick up her book now."	21. Kevin smiles at Sally.

Figure 2: Sample Interview.

How long has respondent known the student? _____

Approximate time spent with the student per week _____

1. What do you see as the major problems? Prioritize problems from most to least severe.
2. In what situations do these behaviors occur?
3. In what situations is behavior most appropriate?
4. What are the student's greatest strengths?
5. What are the student's greatest weaknesses?
6. Why do you think the student acts in the way s/he does?
7. What do you think needs to be done to help the student? How?
8. What does the student like the most?
9. What does the student like the least?
10. What events or actions seem to trigger inappropriate behavior during:

    teaching lunch

    recess unstructured time

11. What can be done to increase the likelihood of appropriate behavior during:

    teaching lunch

    recess unstructured time

Figure 3: Behavioral Observation Chart.

Student Lisa Lightly Date 3/21

Observer Ms. Bishop Time Began: 9:00 Time Ended: 9:20

Materials/Tasks (What is the student being asked to do?)	**Appropriate Behaviors** Student		**Inappropriate Behaviors** Student	
	Ask Question	Finish Work	Talk Out	Out of Seat
Paper-Pencil			𝍸 |||	|||
Listening Activity			𝍸 |	||
Class Discussion	||||			
Workbook			||||	|
Individual Lesson			|||	||
Group Lesson		||		
Transition			𝍸	
Lecture	||			
Free Time	𝍸	|||		

Figure 4: Scatter Plot.

Student: Lisa Lightly Date Began: 3/21

Date Ended: 4/2

Observer: Ms. Bishop

Target Behavior: Talking without permission

Directions: Make a tally mark each time the student exhibits the target behavior.

Activity	Time	Days M	T	W	TH	F	M	T	W	TH	F
Warm up	8:30-9:00	2		1			3	2			
Reading ups	9:00-9:30	1					3				
Spelling	9:30-10:00	3					2				
Recess	10:00-10:30										
Math	10:30-11:00	3	2		3	3	4		1		2
Lunch	11:00-11:30										
Social Studies	11:30-12:00						3				
Science	12:00-12:30				1						
Catch up	12:30-1:00	3					2				

Figure 5: Functional Assessment Hypothesis Generation Protocol.

I. BEHAVIOR DEFINITION

A. Definition Components: Operationally defining the problem behavior is the first step in conducting an effective functional assessment. In order to arrive at a reliable definition that can observed and measured, answer the following questions:

1. What does the problem behavior look like? (check one that is of greatest concern)

___ talks out/disrupts class
___ insubordination
___ not completing work
___ inappropriate language
___ destruction of property
___ aggression
___ tardy/late to class
___ out of seat/place
___ excessive movement/fidgeting
___ threatening
___ theft
___ other (specify _____

2. How is the behavior performed (topography)? *Consider the following categories: type of physical movement; use of objects*

_____
_____
_____

3. How long does it last when it occurs (duration)? *Check box that corresponds to the approximate length of action and circle the appropriate time measurement*

___ 1 – 2 seconds/minutes
___ 3 – 5 seconds/minutes
___ 5 – 10 seconds/minutes
___ 10 – 15 seconds/minutes
___ 15 – 20 seconds/minutes
___ 20 – 25 seconds/minutes
___ 25 – 30 seconds/minutes
___ other _____

4. How often does it occur (frequency)? *Indicate the rate of occurrence using formula:*

_____ times per _____. *Ex: three or four times an hour.*

continues

Figure 5. (con't).

5. How damaging or destructive is the behavior (intensity)? *Ex: with no physical injury*

_____
_____
_____

6. Where does the behavior occur and who is typically involved (setting)?

_____
_____
_____

B. Definition Summary: Using the answers to the questions above, write an operational definition of the target behavior. *Ex: During transition periods when new students are present, Jane uses aggression by striking peers with an open hand on the back for one to two seconds three of four times a period with no physical injury .*

_____
_____
_____

II. FACTOR IDENTIFICATION

A. Setting Events: Using the checklists below, identify factors that usually occur prior to or as a result of the problem behavior.

1. Factors that appear to set off and/or precede the problem behavior:

Teacher behaviors:
___ Task explanation/demand
___ Performance feedback/evaluation
___ Lesson presentation/lecture
___ Teacher reprimand
___ Teacher encouragement/praise
___ Individual attention to student
___ Independent work/lack of attention

continues

Figure 5. (con't).

Student behaviors:
___ Drowsy/sleepy appearance
___ Physical complaints (hunger, pain, etc.)
___ Disturbed affect (sad, angry appearance)
___ Excessive motor activity (fidgety, restless)
___ Peer attention (negative)
___ Peer attention (positive)

Environmental factors:
___ Elevated/excessive noise levels
___ Presence of unusual/extra adult(s)
___ Presence of unusual/extra peer(s)
___ Transition task/activity (expected/routine)
___ Transition task/activity (unexpected/irregular)
___ Access/availability of preferred activity/task
___ Termination of preferred activity/task
___ Access/availability of food

2. Factors that appear to maintain/follow the occurrence of problem behavior:

Teacher behaviors:
___ Teacher reprimand
___ Teacher encouragement/praise
___ Task removal
___ Withdrawal of teacher attention/ignoring

Student behaviors:
___ Peer attention (negative)
___ Peer attention/affirmation (positive)
___ Withdrawal of peer attention/isolation

Environmental factors:
___ Access/availability of preferred activity/task
___ Removal of student to alternative setting

continues

Figure 5. (con't.)

B. Behavioral Intent Identification: Using the checklist below, identify the possible functions or outcomes that the behavior may serve for the student. If more than one function appears to be a reasonable explanation, rank order your responses from 1 to 3 with 1 being the most likely function of the behavior.

___ Attention
___ Tangible reward
___ Gain access to objects/activities
___ Gratification
___ Escape/avoid task/event
___ Power/control
___ Acceptance/affiliation/approval
___ Sensory stimulation
___ Expression of self
___ Justice/revenge
___ Escape/avoid attention
___ Other_____

III. OBSERVATION

Observer: _____ Date Began: _____

Target Behavior: _____

_____

ACTIVITY	TIME	DAYS									
		M	T	W	TH	F	M	T	W	TH	F

_____

continues

Figure 5. (con't.)

IV. FUNCTIONAL HYPOTHESIS

A Hypothesis statement: Using the information from sections I, II and III, construct an hypothesis statement according to the form.

When _____
(identify setting events)

_____ will _____
student behavior

in order to _____
(intended outcome/function)

B. Functional Analysis Plan: In order to test the hypothesis, the following functional analysis will be attempted:

1. Contextual Modification: (What changes in environment/and or teacher behaviors will be attempted?)

_____
_____
_____

2. Curricular Accommodation: (What changes in instructional materials/techniques will be attempted?)

_____
_____
_____

3. Replacement Strategy: (What new behaviors/strategies will be taught?)

_____
_____
_____