6 Job-Site Training

The use of instructional strategies for training individuals on supported employment job sites has been well documented. Specific strategies have included the use of job duty and task analyses, natural supports, natural cues, compensatory strategies, prompting procedures, reinforcers, and self-management procedures (e.g., self-reinforcement, self-monitoring, and so forth) to mention a few. However, critics of providing instruction at customers' job sites have argued that training by an employment specialist draws attention to the customers and isolates them from co-workers and supervisors.

Well-designed instructional programs which are customer-driven do not segregate individuals with disabilities. Rather, poor practices isolate customers on job sites. Employment specialists must have knowledge of training strategies, the customer's support needs, employer's support needs, and the demands of the workplace in order to select the least intrusive method for providing support. This chapter will present a variety of these strategies and discuss facilitating customer independence in the workplace.

JOB DUTY AND TASK ANALYSES

Before the customer begins working, the employment specialist must analyze the job and organize the daily routine. This analysis includes identifying the areas in which various job tasks are performed, determining the essential and non-essential job functions, establishing a work routine, identifying natural supports and natural cues in the workplace, and designing appropriate training and support strategies. Usually, working one shift prior to introducing the customer to the position will be sufficient for completing these activities.

Working the job, gives the employment specialist the opportunity to note the major job duties and estimate the amount of time required for task completion. The Sequence of Job Duties Form can be used to record this information, including the movement required between work stations. If the sequence of job duties varies from day to day, this also is noted on the form. An example of a completed Sequence of Job Duties Form is found on the following page.

Sequence of Job Duties Form

Position: Stock clerk

Job Site: J. C. Penny's

" Job duties remain the same

" Job duties vary from day to day
(If checked, complete a separate form for each different sequence; circle day for which this form is completed:

Mon. Tues. Wed. Thurs. Fri. Sat. Sun.

Approximate Times	**Job Duty**
11:00 to 11:05	Punch in
11:05 to 11:15	Meet w/ supervisor and set up work area
11:15 to 12:30	Price gift merchandise
12:30 to 12:45	Move priced merchandise to stock area
12:45 to 1:00	Set up work area w/ clothing for pricing
1:00 to 1:10	Break
1:10 to 2:30	Price clothing
2:30 to 3:00	Deliver clothing to departments
3:00 to 3:25	Clean up work area & sort hangers
3:25 to 3:30	Punch out

Comments:

Signature: _____

Job Duty Analysis

Once the sequence of major job duties has been determined, the next step is to analyze the skills required to perform each major duty. During this step, the employment specialist identifies and describes the skills, tools, and equipment that are needed. Information may be obtained from interviews conducted with the employer, co-workers, and supervisors; observing co-workers perform the skills; and by personally completing the job duties. Typically, each duty on the sequence of job duties will have several associated skills. In the above example, setting up the work area at Penny's included several tasks. They are listed below:

JOB DUTY: Setting Up the Work Station

- Locates stock for pricing.
- Opens and empties boxes.
- Obtains inventory sheets and day's price tickets from supervisor.
- Locates and collects equipment: price gun, pencil, and inventory stamp.

During this stage of analysis, the employment specialist should concentrate first on the job duty, and how it is performed by the co-worker(s). Once this has been established, he/she can consider how the task can be organized or modified specific to the worker who will master it. The following suggestions have proven useful in completing a job duty analysis.

GUIDELINES FOR A JOB DUTY ANALYSIS

1. Interview the employer/supervisor for his/her input.
2. Serve a co-worker completing the job duty.
3. Identify the skills that must be completed successfully to perform the job duty.
4. Identify all tools and machinery that are required. Consider any modifications or accommodations that may be needed to this equipment.
5. Determine the most efficient procedure to complete each skill.
6. Try to eliminate or reduce unnecessary movement when completing the job duty analysis.
7. If changes are made in the "usual way of doing business", be sure to clear the modifications with the employer and/or supervisor.

(Moon, Inge, Wehman, Brooke, & Barcus, 1990)

Task Analyzing Job Duties

At this point, the employment specialist has identified the specific major job duties, the time of day when these duties occur, the specific skills associated with each duty, and any needed supplies and tools. Next, the employment specialist must develop a written task analysis for each skill that the customer will be performing. Steps in a task analysis should be stated in terms of observable behaviors with each step representing one "behavior." Once the step is complete, a visible change in the task or process occurs. Wording steps in the form of a verbal cue (e.g.,

Push the "off" button), allows the employment specialist to use the steps of the task analysis as verbal prompts during instruction. The following list of tips are offered as guidelines for writing a task analysis.

GUIDELINES FOR WRITING A TASK ANALYSIS

1. State steps in terms of observable behaviors.
2. Write steps in adequate detail with only one behavior per step.
3. Test the task analysis to ensure that each step results in a visible change in the task or process.
4. Order steps from first to last.
5. Word steps as verbal cues.
6. Build natural cues and compensatory strategies into the task analysis.
7. Consider efficiency; use both hands with the least amount of movement.
8. Eliminate discrimination by building judgement into the task (e.g., vacuuming in a pattern results in a clean rug vs. needing to discriminate where the rug is dirty).

(Moon, et al., 1990)

Case Study Example:

John and his employment specialist identified a job as a maintenance assistant at the local mall. The actual job duties included cleaning the restrooms and entrance areas of the mall prior to the opening of business each day Monday through Friday. This job was created for John based on his specific abilities and interests. After completing several situational assessments (e.g., food service, janitorial, and laundry work), John and his employment specialist identified the following interests and support needs:

1. John preferred a job where he could be mobile. He became quickly bored if he had to remain in one place.
2. John liked open spaces.
3. John needed a work environment where he could sing and make noise.
4. John preferred janitorial tasks to kitchen work or laundry work (as noted by the amount of time he spent engaged in the tasks without assistance.)

The employment specialist contacted the personnel department of the mall and met with the manager to discuss possible job duties that John might like. The manger identified that his maintenance crew was not keeping up with cleaning the entrance areas to the mall and the restrooms. He agreed to hire John part-time to complete these job duties.

The employment specialist worked the job for one day prior to John's first day of employment and developed a job duty analysis and task analyses. She talked with the supervisor and then observed the co-workers perform their job duties. Since no one was routinely performing the mall entrance cleaning, she spent time washing the windows and doors to the mall to develop her tasks analyses. The following job duty sequence was developed.

Time	Job duties
7:00 a.m.-7:10	Set up cart: Fill mop bucket, get rags, cleaning supplies
7:10-7:30	Clean men's room (sinks, toilets, mirrors)
7:30-7:35	Clean mop water, rags, & mop
7:35-7:45	Mop men's room
7:45-7:50	Clean mop water, rags, & mop
7:50-8:10	Clean women's room (sinks, toilets, mirrors)
8:10-8:15	Clean mop water, rags, & mop
8:15-8:25	Mop women's room
8:25-8:30	Set up cart: get window cleaner and supplies
8:30-11:00	Clean mall entrances: pick up trash, wash windows, wash doors.

Within one week of initial training, the employment specialist realized that John was having trouble meeting the time schedule as specified by the supervisor. Specifically, John was having difficulty emptying his mop bucket and cleaning his work supplies in the allotted 5 minutes. He liked to watch the bucket fill with water and overflow into the sink. Therefore, the employment specialist asked the supervisor if she could modify his job duty schedule to promote efficiency. The number of times that John emptied his mop bucket was decreased, and he was able to begin cleaning the entrance area of the mall at 8:30 a.m.. The following job duty schedule was agreed to by the supervisor.

Time	Job duties
7:00 a.m.-7:10	Set up cart: Fill mop bucket, get rags, cleaning supplies
7:10-7:30	Clean men's room (sinks, toilets, mirrors)
7:30-7:50	Clean women's room (sinks, toilets, mirrors)
7:50-8:00	Clean mop water, rags, & mop
8:00-8:10	Mop men's room
8:10-8:20	Mop women's room
8:20-8:30	Set up cart: get window cleaner and supplies
8:30-11:00	Clean mall entrances: pick up trash, wash windows, wash doors.

The employment specialist also developed task analyses for each of the skills John performed prior to his first day of work. During the first several days of employment, she observed John during training and modified each analysis based on his abilities. For instance, the following task analysis was developed for cleaning the toilet by watching the coworker who normally performed the job duty.

1. Grab brush and cleanser
2. Go to first toilet
3. Put cleanser in toilet
4. Set down container
5. Dip brush in bucket
6. Tap brush
7. Brush top of toilet
8. Brush sides of toilet
9. Brush front of toilet

10. Dip brush in bucket
11. Tap brush
12. Brush lid of toilet
13. Raise lid and brush
14. Brush inside of toilet
15. Dip brush in bucket
16. Tap brush
17. Lower lid of toilet
18. Brush outside of toilet bowl
19. Put brush in bucket
20. Get cleanser
21. Go to next toilet

However, when the employment specialist observed John doing the task, she noted that he spent too much time on several steps. For instance, instead of quickly tapping the brush on the side of the bucket, John perseverated on the step. The employment specialist decided to modify the task and teach John a pattern for cleaning the toilet. For instance, step 6, *tap the brush*, was changed to read, *tap the brush 3 x's*. John learned to count to three as a reminder for him to move on to the next step of the task analysis.

Another step that John had difficulty completing was step eight, *brush the top of toilet.* John could not discriminate clean vs. dirty surfaces, and he seemed to have no concept of when he should stop wiping the top of the toilet. Therefore, this step of the task was further broken down into smaller steps for instruction. In addition, other steps were analyzed further into component steps to assist John in learning the task and developing a pattern for completing the job duty. A sample step in John's task analysis follows.

Step 8 of Cleaning the Toilet:

Brush top of toilet. (Customer wipes top one time, always working left to right.)

- Place brush at back corner.
- Move brush across top of toilet.
- Place brush at front corner.
- Move brush across top.

The information placed in parentheses served as a cue to the trainer for consistency of prompting. By adding this comment, the employment specialist could ensure that other trainers who substituted would prompt this step in the same way. However, she did not want to add it to the verbal cues, since she wanted these to remain short.

This example demonstrates how the em-loyment specialist can first develop a task analysis based on the general requirements of the job. Once the customer begins working, this analysis can be modified based on the specific abilities and training needs of the individual worker. Remember, always check any changes to the job duty or task analyses with the employer and/or supervisor prior to implementation.

Summary: Developing a job duty analysis and a tasks analysis of each skill serves as the foundation for job-site training. Once this is accomplished, the customer and employment specialist can determine which skills the customer knows how to perform and which will require further instruction. In addition, this analysis will afford the employment specialist the opportunity to analyze

the worksite and identify the natural cues and supports that are available to the customer.

NATURAL SUPPORTS

Often, the success of a supported employment customer will be determined by the support of the co-workers in the workplace. If the customer is perceived as reliable, co-operative, and competent from the first day of employment, the chances for long-term job retention are increased. Therefore, the first step in job-site training is to identify the natural supports that are available in the workplace.

The use of the word *natural* implies that the supports are ones that are *typically* available to all workers in the workplace. They are not artificially contrived by the employment spe-cialist. As such, natural supports can be referred to as ***workplace supports*** which are naturally occurring on the job site. Workplace supports may include but are not limited to such things as a co-worker mentor who assists an employee in learning the job, a supervisor who monitors work performance, a co-worker who assists the customer in developing social relationships, orientation training or other com-pany sponsored training events, an employee assistance program, and so forth.

The employment specialist should not assume that workplace supports will be available automatically to the new employee. Even if a resource exists, the supported employment customer may not know how to access or benefit from its use. He/she may be unaware of the potential support, how to choose among the support alternatives, or how to access a desired resource (Inge, 1994).

The role of the employment specialist is to assist the customer in identifying and reviewing the variety of supports available and in selecting the ones that meet his/her needs. A company may have varying levels of these resource options. For instance, one company may have an intensive orientation and training program while another has none. In addition, the support must be analyzed to determine if it meets the needs of the customer. A one time, two-hour lecture on company policies may be of little benefit to the customer, while a co-worker who explains the "unwritten rules" of the workplace to all new employees may be an extremely valuable resource.

The employment specialist should not expect that employers and co-workers automatically will provide "natural supports" to a customer. Some individuals initially may feel uncomfortable providing instruction and supervision to a worker with a disability. The employment specialist can model appropriate social interactions and training techniques that will assist co-workers and supervisors to become proficient in assisting the supported employment customer. This can be as subtle as encouraging co-workers to direct questions and conversation to the individual rather than to the employment specialist from the first day of training. Another example may be the employment specialist who assists the customer in learning the names of his/her co-workers as quickly as possible.

Whenever identifying and using workplace supports, the employment specialist also needs to determine if he/she is creating an

unnecessary dependence on co-workers. For instance, a co-worker could be asked to assist the customer in setting up his/her work supplies everyday or in completing other portions of work tasks that he/she finds difficult. However, training by an employment specialist which assists the customer in working independently may be the least intrusive strategy.

If training by the employment specialist is the selected option, he/she continually must evaluate the assistance that is provided during job-site training. Something as simple as where the employment specialist stands during instruction can create dependence on the trainer and place a barrier between the customer and co-workers. The following section on questions and answers offers some points to consider when facilitating workplace supports.

Considerations for the Identification and Selection of Natural Supports

1. What are the possible workplace support resources? There could be many different ways to approach the same support need such as: a.) using a co-worker mentor to assist the customer in responding to a natural cue to increase his/her production; b.) asking a supervisor to assist the customer in monitoring his/her work production; or c.) having an employment specialist train the customer to monitor his/her production using a self-management program. The employment specialist should identify and review all the different support strategies and options with the customer, employer, and co-workers.

2. Which strategies match the learning style or needs of the customer? While there may be many support options available in the workplace, a customer will respond to any particular choice based on his/her learning style. Some individuals may respond better to verbal instructions, while others need detailed demonstrations and repeated practice to learn a new job duty. For instance, a supervisor may be willing to provide support to a customer by monitoring his/her work performance at set intervals of time. However, if the customer does not respond to the verbal instructions offered by the supervisor, there is a gap between the support provided and the support needed.

In this example, the employment specialist can work with the employer and customer to determine if the supervisor needs information on how to support the customer. Or, they may decide that the customer prefers for the employment specialist to assist him/her in learning the task. If this is the selected option, the employment specialist must be conscious of fading support to the naturally occurring supervision available from the employer.

3. What are the customer's, employer's, and co-worker's choices? The employment specialist should not assume that workplace supports will be provided by the employer or co-workers for all of the customer's needs. The employer's and/or co-workers' level of comfort with supplying the identified support should be determined. Does the customer want a co-worker assisting with this support need? How do the co-workers feel about

providing the assistance? Does the employer feel that this is a reasonable accommodation or should other support options be explored? This may be a particularly sensitive issue for discussions related to the personal care needs of customers with physical disabilities.

For instance, a customer may be hesitant to ask a stranger for personal care support such as eating, and co-workers may also feel uncomfortable providing the support. However, as relationships develop in the workplace, this assistance may evolve naturally. Initially, the employment specialist can facilitate this by asking co-workers to eat lunch with the customer and modeling how to provide assistance. Other customers facing the same situation may choose to hire a personal assistant to provide support while still others may choose to forgo eating during work hours.

4. Which support option results in or promotes customer independence? Would this strategy result in dependence on co-workers when independence could be achieved by the customer? Clearly, dependence on co-workers to provide support to the customer may be as intrusive as creating dependence on the employment specialist. Situations may occur when co-workers are not available to assist the customer with an identified support need.

For instance, one customer was having difficulty punching in at the beginning and end of his work shift. He was unable to select his time card, since he could not recognize or remember his Social Security number. The employment specialist decided that a co-worker should be assigned to assist the individual in locating the card and punching in or out. Although the employer was willing to provide the support, this particular idea creates dependence on the customer's co-workers.

A color cue added to the timecard may result in the customer learning to select it independently, or he may learn to place the card in a particular location that would not require identification of the Social Security number. While every worker needs to rely on co-workers for assistance or support, employment specialists should not create situations that perpetuate learned helplessness. In this instance, the co-worker might assist by placing the color cue on the card, or by checking to see that the customer successfully keeps it in the specified location. The customer would have responsibility for independently completing the task while receiving support from co-workers.

Initially, identifying and discussing the various support options with the customer, employers, and co-workers is the employment specialist's role during job-site training. Gradually, co-workers and supervisors can assume this responsibility as the employment specialist transfers his/her support to the resources naturally occurring in the workplace. In most instances, a combination of strategies will be selected to promote customer success. This combination of supports may include natural supports from co-workers, natural cues, compensatory strategies, as well as instruction from the employment specialist and/or co-workers. Determining which combination will promote independence while gradually fading the employment specialist's support to the co-workers

is the key to long term employment for supported employment customers. The remaining sections of this chapter will discuss job-site training strategies and how to put them all together to facilitate employment success.

NATURAL CUES

A natural cue represents some feature of the work environment, job tasks, or activities which signals an employee what to do next. Typically, a natural cue is one that the customer can see, hear, touch/feel, or smell and has not been changed or added to the worksite by the employment specialist. Examples may include the color of a cleaning supply, an on/off indi-cator light, a buzzer on the service door, the telephone ringing, announcements over a loud speaker, the "body language" of a co-worker, and the placement or location of work materials (e.g., mail in an "in" box, dirty dishes on an un-occupied table, etc.).

When a natural cue is present or occurs during the customer's work routine, he/she will either attend to the cue and respond correctly, not attend to the cue at all, or respond incorrectly. For instance, a customer may respond to the buzzer on the service door by opening it for the delivery person (the correct action); he/she may ignore the buzzer and continue pricing merchandise (no response); or he/she may go ask another worker to open the door (incorrect response).

Obviously, if the customer attends to and responds to a natural cue, instruction is not required. However, some workers must learn to recognize and attend to these cues. The employment specialist should work with the customer, the employer, and co-workers to identify the natural cues in the workplace which can assist the individual in completing his or her tasks successfully. Often, the co-workers and supervisor can be the most valuable source for this information.

For instance, a customer who worked in a hotel could not discriminate between the shoe shine cloth and shower cap packages. The items came in identical cardboard packets except for a very small label telling the contents. The customer needed to look on the counter in the bathroom and determine which items were missing and replace the correct toiletries. (Note that absence of an item on the counter was the first natural cue which signaled the customer that an item needed replacing.)

Since the customer could not read, she couldn't look at the two packages and tell which one was which without opening them. The customer's co-worker offered the perfect solution to this situation when asked for assistance. She told the employment specialist that she never read the labels on the packets. Instead, she picked up a package and squeezed it; the shower cap made a "crinkling" noise while the shoe shine cloth was soft. The natural, physical characteristics of the items told her which was which (Personal Communication, Theresa Southerland, August 6, 1996).

Adding an Extra Cue to the Natural Cue

Some customers still may fail to respond or recognize a cue even after it is pointed out to them. One way to call attention to the

cue may be to initially add an extra or artificial cue to the natural one. This extra cue can enhance the relevant features of the naturally occurring one. For example, a customer who was responsible for filling a condiment bar on an "as needed" basis did not respond to the naturally occurring cue of the empty bins. A piece of colored tape was placed on the inside of the bins to signal the customer that a bin needed filling. The tape highlighted the relevant feature of the work task, the empty bin, to which the customer was not responding.

Whenever extra cues are added to the work environment or work tasks, the employment specialist needs to consider fading them as the customer begins to notice the naturally occurring ones. In the bin example, the co-workers or employment specialist may initially place a wide strip of colored tape all around the inside of the bin. This could be faded in the following way:

FADING AN ADDED CUE

- Place a 2" wide strip of red tape around the inside of the bin.
- Decrease to a 1" wide strip of red tape around the inside of the bin.
- Change to red dots placed ½" apart around the inside of the bin.
- Fade to red dots placed 2" apart around the inside of the bin.
- Continue fading the distance between dots and/or the size of the dots until the customer responds to the empty bin.

The speed of fading should be based on the worker's ability to continue responding as the extra cue is faded. Remember to include the customer, co-workers, and supervisor in discussions on adding extra cues to the work environment. This will ensure ownership of the strategy by all individuals involved as well as guarantee that changes are not made that the supervisor would not approve.

In fact, the supervisor or co-workers should be approached about assisting the customer with the extra cue. The supervisor or a co-worker may volunteer to check that added cues are not removed by other employees who are unfamiliar with the customer's training program, and so forth. In fact, co-workers often discover that cues added for the supported employment customer are beneficial to them in performing their work tasks. As they assist the customer with his/her cues, they may begin to assist with identifying other supports. This shifting of responsibility from the employment specialist to co-workers and supervisor must occur in order for a relationship to develop between the customer and his/her co-workers.

Instruction for Using Natural Cues

In some situations, the employment specialist still may need to consider providing more intensive instruction to assist the customer in responding to natural cues. Typically, this will include developing a task analysis (TA) of the job duty that incorporates learning to recognize these cues. Another option may be to write a TA that eliminates the need for the customer to attend to the cue. For instance,

he/she learns to vacuum the floor in a specific pattern and therefore does not have to determine where the floor is dirty vs. clean.

Once the task analysis is developed, the employment specialist can select a prompting strategy to train the customer. Instruction will vary based on the worker's choice, needs, and situation. The least amount of assistance should always be tried first. For instance, when a flashing light comes on the dish machine indicating that the cycle is finished, the employment specialist could provide any number of prompts. The following list provides several examples in a least to most intrusive hierarchy. The reader is referred to the next section on prompting in this chapter for more information.

PROMPTING EXAMPLES FOR NATURAL CUES

- Provide an indirect verbal prompt (e.g., "what do you do now" or "what does that mean?")
- Give the customer a gestural prompt (e.g., point to the flashing light).
- Provide a direct verbal prompt (e.g., "the light is flashing, open the door of the dishmachine.".)
- Provide a model prompt paired with a verbal prompt (e.g., the employment specialist opens the door of the dishmachine while saying, "I see the light is flashing on the dishmachine".) The employment specialist then closes the door and asks the customer to complete the step in the task analysis.

INSTRUCTIONAL STRATEGIES

Once the job duties are identified and task analyses developed, the employment specialist must design instructional programs for each job duty or other related skills to be taught. The design should include input from the customer, the supervisor, and co-workers. Each program includes 1) a training objective, 2) data collection guidelines, 3) prompting procedures, 4) reinforcement procedures, and 5) strategies for compensatory strategies and program modifications. The following sections outline each of these components in detail.

Step 1 Program Objectives

Training objectives are written to include observable skills, the conditions under which they occur, and the criteria that will be used to evaluate performance. Each skill to be trained has a corresponding training objective. The following is an example for entering data into a company's mailing list.

Conditions under which work performance will occur:

- Given a list of addresses and cue, "add the names to the mailing list",

Observable work skill:

- Ramona will enter the names and addresses.

Criteria for evaluation of worker performance:

- With 100% accuracy according to the steps in the task analysis for three consecutive probe trials.

Step 2 Data Collection Guidelines

Recording and graphing data is critical to the success of job-site training. Measurement procedures are a vital component, because they allow the employment specialist to moni-tor the employee's progress. It will show whether a particular training strategy is effec-tive or needs modification (e.g., changing stra-tegies, adding external cues, modifying tasks, etc.). Data collection also can provide docu-mentation for the customer's continued funding (Moon et al., 1990).

Measurement procedures continue throughout initial job-site training into long term supports. This will assist the employment specialist in identifying additional training or retraining needs for the customer. Finally, data collection should never be an intrusive or obvious process.

Baseline, probe, and prompt data are based on the task analysis of each major job duty and indicate whether the customer is working independently. Initial data collection before instruction begins is referred to as baseline and should be conducted at least once prior to the initiation of a skill acquisition program. Data which is collected after training begins is referred to as probe data. The procedures for baseline and probe data are essentially the same and provides information on how well the customer performs a job duty without prompting or reinforcement from the employment specialist. Probe data should be collected at least once each week. Typically, a job task is considered learned when the employee independently and correctly performs every step for a minimum of three consecutive probe trials.

There are two different strategies that an employment specialist can use to collect data on a job site to include a single or multiple opportunity probe. Regardless of which proce-dure is used, the employment specialist shows the customer how to perform the specific job duty prior to conducting baseline assessment. After training begins, the customer is asked to perform the job duty without any prompting or demonstrations. Steps for using a single oppor-tunity probe are listed in the following table.

GUIDELINES FOR USING A SINGLE OPPORTUNITY PROBE

1. Have the customer move to the appropriate work area unless movement is part of the task analysis.
2. Stand beside or behind the customer so data collection does not interrupt the work flow.
3. Tell the customer that he/she is going to work without assistance to see what he/she can do independently.
4. Provide the work cue, (e.g., "Enter the names into the mailing list.")
5. Do not provide prompts or reinforcement.
6. Wait 3-5 seconds for the customer to make a response.
7. If he or she does not begin to work or makes an error, discontinue probe and score a (-) for all steps in task analysis.
8. If he or she begins work, continue as long as correct responses are made, scoring a (+) for correct performance.
9. As soon as an error occurs, discontinue probe and score a (-) for all remaining steps in the task analysis.

(Adapted from Moon et al., 1990)

There is one major benefit to using a single opportunity probe for data collection.

Specifically, assessment should not be time consuming or interrupt the natural flow of the workplace. Discontinuing the probe as soon as the customer makes an error allows for instruction to begin immediately on that specific step of the task analysis.

In contrast, use of a multiple opportunity probe shows which steps of the task the customer is having difficulty performing without assistance, prompting, or reinforcement. The employment specialist must assess the work environment and length of task to determine the most appropriate strategy for data collection. The next table outlines the steps for a multiple opportunity probe procedure.

GUIDELINES FOR USING A MULTIPLE OPPORTUNITY PROBE

1. Have the customer move to the appropriate work area unless movement is the first step in the task analysis.
2. Stand beside or behind the customer so that data collection does not interrupt the work flow.
3. Provide the work cue (e.g., "Enter the names into the mailing list.")
4. Do not provide verbal instruction, prompts, or reinforcement during data collection.
5. Wait a specified time (e.g., 3-5 seconds) for the customer to initiate a response.

(Continued)

6. Record a (+) if the customer com-pletes the step correctly.
7. If there is no response or the customer is incorrect, position the customer to perform the next step in the task analysis or complete the step yourself (if necessary).
8. Repeat items #5, #6, and #7 as needed in order to test all steps in the task analysis from first to last.

(Moon et al., 1990)

Step 3 Prompting Procedures

Least Prompts: The majority of the literature on teaching vocational tasks to individuals with severe disabilities focuses on the use of least prompts as the teaching strategy of choice (Barcus, Brooke, Inge, Moon, & Goodall, 1987; Cuvo, Leaf, & Borakove, 1978; Test, Grossi, & Keul, 1988). This strategy is also referred to as a response prompt hierarchy, since the trainer progresses from the least amount of assistance (usually a verbal prompt) to the most intrusive (usually a physical prompt) until one prompt results in the customer correctly responding.

Employment specialists are encouraged to consider various types of prompts to use in addition to the traditional verbal, model, physical sequence. For instance, as a customer becomes more proficient performing his/her job duties, try using an indirect verbal prompt in the sequence such as, “what do you do next,” before using the verbal prompt specific to the step in the task analysis. This may be effective also for training individuals who have been

dependent on trainers for verbal instruction. In addition, gestures can be used instead of a model prompt. Or, a partial physical prompt (e.g., touching the customer's arm) can be used instead of total physical assistance. The following table lists prompts that can be used to assist a customer in learning his/ her job tasks.

PROMPT EXAMPLES

Indirect Verbal Instructions:

- "What do you do now?"
- "What do you do next?"
- "What happens now?"

(Example of an indirect cue given in response to a natural cue such as a light blinking on the copy machine.)

Direct Verbal Instructions:

- "Get your timecard."
- "Stock the cart."
- "Fill the condiment containers."

Gestures:

- Point to the time clock (to prompt the customer to punch in/out).
- Tap a wrist watch (to prompt the customer to take a lunch break).
- Touch a stack of aprons (to prompt the customer to put on an apron).

Model Prompts:

- Co-worker shows the customer how to get to the employee break room.
- Supervisor demonstrates how to turn on the dishmachine.

Partial Physical Assistance:

- Employment specialist taps the customer on the elbow to prompt him/her to reach for the time card.
- Employment specialist guides the customer's elbow to prompt him/ her to pick up an apron.

(Continued)

Full Physical Assistance:

- Employment specialist, with hand over the customer's hand, selects the time card from the rack.
- Employment specialist, with hand on the customer's hand, guides him/her in placing a security sticker on a blouse.

Regardless of the types of prompts selected, the employment specialist must establish the length of time, latency period, that he or she will wait for the customer to respond before providing the next level of assistance. Usually a worker should be given approximately 3 or 5 seconds to respond independently. Individuals with physical disabilities, however, may require longer latency periods based on their movement limitations, and this should be determined on an individual basis (Inge, 1992; Sowers & Powers, 1991). Finally, the employment specialist is cautioned to deliver each prompt only once before moving to the next more intrusive prompt.

GUIDELINES FOR USING A LEAST PROMPT HIERARCHY

1. Have the customer move to the appropriate work area unless movement is part of the task analysis (TA).
2. Stand behind or beside the individual so that you can quickly provide prompts when necessary.
3. Provide the cue to begin the task. ("Clean the mirror," or "enter the addresses into the mailing list," etc.)

(Continued)

4. Wait 3 seconds for self-initiation of step 1 of the TA.
5. If the customer completes the step independently, provide reinforcement and proceed to step 2 of the TA.
6. If the customer is incorrect or does not respond within 3 seconds, provide a verbal prompt specific to step 1 of the TA. ((Example: "Pick up the windex.")
7. If the customer completes the step with a verbal prompt, provide reinforcement and move to step 2.
8. If the customer is incorrect or does not respond within 3 seconds, model the response (Example: The employment specialist picks up the windex).
9. If the customer completes the step with a model prompt, provide reinforcement and move to step 2.
10. If the customer is incorrect or does not respond within 3 seconds, physically guide him/her through the response (Example: The employment specialist guides the customer's hand to pick up the windex.)
11. Begin instruction on step 2 of the TA.
12. Repeat this procedure for each step in the TA until the task is completed. Always **interrupt an error** with the next prompt in the least prompt system.

(Barcus et al., 1987; Moon et al., 1990)

Data Collection Using the Least Intrusive Prompt System

Prompt data indicate the kinds of prompts that are given to the customer during the performance of the job duty. It is recommended that the recording of prompt data be limited to only one or two tasks per day (Barcus et al., 1987; Moon et al., 1986; Wehman et al., 1988). It is more important for the employment specialist to collect data on a predetermined schedule and to analyze prompt data frequently, than it is to collect data on a daily basis.

The same task analysis recording sheet used for probe data collection is used for recording prompt data. In the case of least prompts, the employment specialist records a symbol representing either independent performance of a step (+) or use of a specific prompt. For instance, a verbal prompt can be scored by a (v), model (m), gestural (g), or physical prompt (p).

By keeping track of the number and types of prompts that the worker requires over time, the employment specialist will be able to determine when it is possible to start gradually moving away from the customer during training. Initially the employment specialist may be located beside or behind the customer in a position to provide direct instruction. When the worker is independently performing approximately 70% to 80% of the steps in the task analysis for the job duty and the remaining with a verbal prompt, the employment specialist can move 3-6 feet away from the customer. If a prompt is needed at this point in training, the employment specialist can move up to the worker. Once a correct response is initiated, the trainer should move back to the designated distance.

In this manner the employment specialist can gradually fade his or her physical proxmity to a customer as he/she begins to independently perform the steps of the task analysis. Ultimately, the employment specialist must

remove his or her presence from the immediate work area in which the job duty is performed and eventually from the job site altogether. The removal of the trainer's presence from the immediate work area must be systematically planned and based on the performance of the customer (Moon et al., 1990).

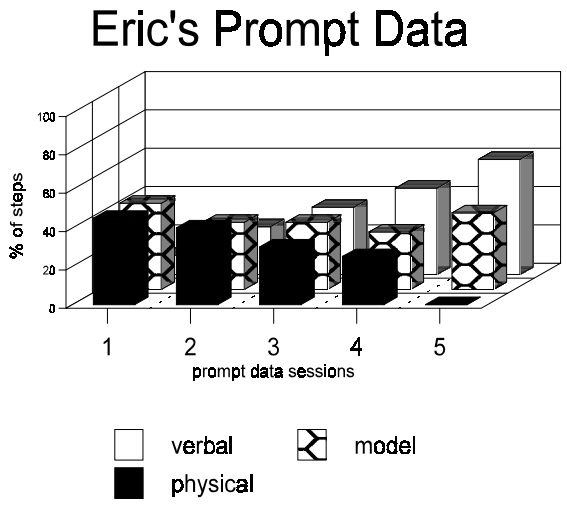
Graphing Data

Improvement in a customer's ability to perform job duties independently is easier to analyze if the data are displayed graphically. Tracking the percentage of steps the customer performs without prompts and reinforcement, allows the employment specialist to determine the rate at which the worker is acquiring the job skills. When plotting data on a graph, information such as frequency, percent, number of steps, and other finite data are placed on the vertical axis. Number of sessions, weeks, days, and other infinite numbers go along the horizontal axis.

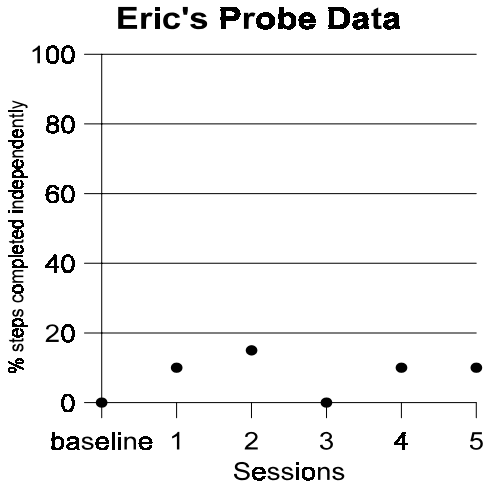
Data analysis can indicate whether a change or modification is needed to the training program. For instance, if the customer is gradually showing an increase in performing steps independently, continue the instructional program. Or, if the customer is gradually showing a decrease in the level of assistance (prompts) required to complete the task, continue the instructional program. However, if there is no change in either prompt or probe data within a week's period of time, the employment specialist must reevaluate the instructional plan and change components of the program. The following case study provides an example of how the employment specialist can graph probe and prompt data.

Graphing Case Study Example

Eric's employment specialist collected prompt data once each day on the job skill, setting up the condiment bar. The data for his first four days of work are displayed below:



This pictorial representation of the training data, shows that Eric is gradually decreasing his dependence on more intrusive prompts. For instance, on day one his prompt data showed that he required physical assistance on 45% of the steps in the task analysis. On day two, 40% of the steps required a physical prompt. Physical assistance accounted for 30% of the prompts on day 3. Only 25% of the steps required a physical prompt on day 4. Finally on day 5, Eric did not need any physical prompts to complete the steps in the task analysis during the prompting sequence. This gradual fading of the level of prompting assistance required indicated that Eric was responding to the least intrusive prompt strategy.



1990). There are several critical components to a time delay procedure (Gast, Ault, Wolery, Doyle, & Bellanger, 1988; Snell & Gast, 1981). First, the employment specialist must select a

The following graph is the data for Eric's initial probe session. Data was collected using a single opportunity probe with no assistance or reinforcement during the data collection. The probe sessions were conducted every other day prior to instruction. This graph presents data for the first five probe data collection sessions. Review of this information seems to indicate that Eric is making little progress in learning his job task for setting up the condiment bar. However, when the prompt data is reviewed for the same time period, the employment specialist realizes that Eric is making progress on this job duty. This is determined when the employment specialist realizes that Eric's prompting needs are decreasing. Continued analysis of the task would be required to ensure that Eric eventually does not depend on assis-tance from the employment specialist.

Prompting Strategies: Time Delay

Another way to systematically fade instructional prompts is known as time delay (Inge, Moon, & Parent, 1993; Moon et al.,

single prompt that consistently assists the customer in performing the job duty correctly. Initially, the prompt is given simultaneously with the request to perform the job duty. Gradually, increasing amounts of time (usually seconds) are waited between giving the request to perform the task and providing the prompt to complete the skill correctly. The number of trials at each delay level and length of the delay should be determined prior to initiation of training.

By pairing the prompt with the request to perform a work task, the customer is not

allowed to make errors initially. The delay pro-cedure allows the employment specialist to gradually fade assistance until the customer performs without prompting. For example, a set number of trials are determined for 0 second delay, the next set at 2 second delay, the next a 4 second delay, etc. until the customer performs without assistance. Unlike the system of least prompts, time delay requires that the employ-ment specialist select one prompt for use during training. Therefore, the procedure is particu-larly useful if an individual consistently demonstrates a preference for one type of prompt. For example, if a customer has shown that he or she always responds to a model prompt without making errors, the employment specialist can select it to place on delay.

Monitoring the training data is essential to ensure that the customer is not constantly making errors during the procedure. If an error occurs during training, the employment special-ist should implement an error correction pro-cedure. Typically, an error may occur once in-creasing amounts of time are waited before the prompt is provided. Usually error correction consists of immediately interrupting the cus-tomer's mistake and providing the prompt. If the customer makes 3 or more errors in a row, the trainer may consider reverting to a number of trials at 0 seconds before again delaying the prompt.

Constant time delay is a variation on the above strategy. Training also begins with a predetermined number of trials at 0 second delay. However, after the initial trials are conducted, a constant interval (e.g., 5 seconds) is selected for all remaining trials. Guidelines for training using a time delay strategy are listed in the following table.

GUIDELINES FOR TIME DELAY

1. Specify number of training trials to be conducted at 0-second delay (e.g., all trials on the first day of work will be at 0-second delay).
2. Specify time delay intervals (e.g., 2, 4, 6 or 1, 2, 3, 4 seconds).
3. Determine number of training trials to be conducted at each interval (e.g., all trials on the second day of work will be at a 2 second delay; all trials on the third day of work will be at a 4 second delay; and so forth).
4. Select ***one*** prompt for training that the customer consistently responds to correctly.
5. Design an error correction procedure; for example, specify that all errors will be interrupted immediately. If three errors occur consecutively, return to a pre-determined number of trials at 0-second delay. When these are completed, return to the previous delay level.
6. Implement procedure:
    a. Have the worker move to the work area unless movement is part of the task analysis.
    b. Provide the overall cue to begin work.
    c. Wait the specified delay level.
    d. If the worker performs independently, provide reinforcement and move to the next step of the task analysis.
    e. If no response occurs within the specified time, provide the prompt and reinforce the worker for step completion. Move to the next step of the task.
    f. Interrupt all errors immediately regardless of the time delay level and provide the selected prompt.
    g. Implement the error correction procedure if the worker makes 3 errors in a row on the same step of the task analysis.

Note: The guidelines for a constant time delay procedure follow the same steps outlined above with one exception. After the initial trials at 0-seconds are completed, training during all other trials is done at the selected constant delay, for example, 3 seconds, until the worker meets skill acquisition.

Time Delay Case Study Example

Monica is a young woman with cerebral palsy who is responsible for maintaining a company's mailing list. Initially, she could type using a headpointer, but she did not know how to use the software program to enter the names and addresses into the mailing list format. She learned this job duty with the assistance of an employment specialist and a time delay program.

First, the employment specialist loaded a software program called "sticky keys" onto Monica's computer to eliminate having to press two keys simultaneously (e.g. holding down the shift key while typing the first letter of a name). Second, she developed a task analysis for data entry. Third, the employment specialist selected a verbal prompt for the time delay strategy. This was the prompt of choice, since Monica always followed verbal instructions success-fully. The task analysis for entering one name and corresponding address follows:

Enter Name and Address

1. Press up arrow key.
2. Press control key.
3. Type F.
4. Press shift key.
5. Type first name.
6. Press enter key.
7. Press shift key.
8. Type last name.
9. Press enter key.
10. Type company name.
11. Press enter key 2 x's.
12. Type street.
13. Press enter key 2 x's.
14. Type zip code.
15. Press enter key 2 x's.
16. Type today's date.

17. Press enter key 3 x's.
18. Type 1.
19. Press enter key 3 x's.
20. Begin next entry.

Monica's time delay program consisted of one day of work with 0-second time delay. For instance, as soon as the instructional cue, "enter a name and address" was given, the employment specialist gave the first verbal cue, "press up arrow key." As soon as Monica pressed the up arrow key, the next verbal prompt was given, "press the shift key", and so forth. In this manner, the employment specialist "verbally walked" Monica successfully through the first day of data entry. On the next day of instruction, the employment specialist used a 2 second delay procedure. This meant that she paused for 2 seconds between prompts, for instance:

Give instructional cue.

Enter name and address.

- Wait 2 seconds. Reinforce if Monica correctly initiates first step in the task before prompt. If no response, provide a verbal cue specific to first step in the task analysis.

1. Press up arrow key. (Verbal prompt)

- Wait 2 seconds. Reinforce if correct response before prompt. If no response, give verbal cue for next step.

2. Press control key. (Verbal prompt)

- Wait 2 seconds. Reinforce if correct response before prompt. If no response, give verbal cue for next step.

3. Type F. (Verbal prompt)

- Wait 2 seconds. Reinforce if correct response before prompt. If no response, give verbal cue for next step.

4. Press shift key. (Verbal prompt)

- Wait 2 seconds. Reinforce if correct response before prompt. If no response, give verbal cue for next step.

5. Type first name. (Verbal prompt)

- Wait 2 seconds. Reinforce if correct response before prompt. If no response, give verbal cue for next step, etc.

If Monica began to make a mistake while the employment specialist was waiting between steps, she was interrupted immediately with the next verbal prompt. The delay level between steps was gradually increased each day until Monica was working independently.

Step 4 Reinforcement Procedures

Selection of reinforcers as well as the systematic delivery of reinforcement can assist the customer in becoming successful in the workplace. Typically, the most effective reinforcers are those that occur as a natural consequence to a given task or situation within the work environment (Wilcox & Bellamy, 1982). Therefore, the employment specialist begins by identifying items that are available

on the job site. This includes such things as co-worker praise, supervisor approval, positive written supervisor evaluations, pay raises or bonuses, and so forth.

However, some workers with significant disabilities may not initially understand the relationship between working and naturally occurring reinforcers such as earning a pay-check and approval from co-workers and super-visors. In these instances, more tangible rein-forcers may be used initially and gradually faded as the naturally occurring ones become meaningful. For example, there may be a vending machine located within the employee break room which can be used to reinforce the worker at the end of a job duty or an employee cafeteria where he or she can get a snack. The addition of edible or tangible reinforcers should never be used unless a procedure for fading them is built into the training program.

Remember that all individuals will not be reinforced by the same items and that even the most preferred reinforcer, if used too frequently, will lose its effectiveness (Falvey, 1989). Only after failing to identify a natural reinforcer, should the employment specialist select more artificial items (Moon et al., 1990). The following information may be useful in identifying potential reinforcers for supported employment customers (Barcus et al., 1987; Falvey, 1989; Inge, Barcus, Brooke, & Everson, 1995; Moon et al., 1990).

1. Survey the customer and those familiar with him/her to determine likes and dislikes. Include leisure activities, tangible items, types of verbal reinforcement, etc. Consider asking some of the following questions.
    a. What are some things you like to do by yourself for fun?
    b. What do you enjoy doing with friends/family in your free time?
    c. Do you have any hobbies or games you enjoy?
    d. Are there any hobbies or games you would like to learn?
    e. Do you like listening to music?
    f. Tell me about the type of music you like.
    g. Who do you like spending time with?
    j. If you had 50¢, $1, $5, $10, etc., what would you buy?
2. Observe the customer in several natural environments (e.g., at home, in a restaurant, at the mall) during his or her free time and record what he or she does.
3. Offer the customer a chance to interact with several novel items and record what he or she does. Often individuals with limited experiences, do not know what they like to do. Offering them options, allows cus-tomers to develop choices and interests. If the customer can not tell you about his or her choices, repeat the experiences over several days and determine if there is a pattern to the customer's choices.
4. Select an item and use it as a reinforcer, Observe to see if the worker's skill level increases.

Timing: After a reinforcer has been identified for use on a job site, a schedule of re-

inforcement should be established. Many customers who require additional reinforcement do not understand the connection between work well done and the paycheck. Ideally, all rein-forcement is provided immediately following the occurrence of the desired work skill. However, it usually is not feasible on a job site to provide tangible or edible reinforcement im-mediately after a response occurs. In these instances, the employment specialist must develop a training program that uses exchangeable reinforcers on predetermined schedules. These systems must be age appropriate and not draw attention to the worker. Exchangeable items may include money, tokens, points on a card, checks on a calendar, and so forth. These items are exchanged later for the item(s) that the customer selects.

There are several advantages to using exchangeable reinforcers (Moon et al., 1990). First, if the employment specialist uses money as the exchangeable item, he or she is teaching the customer the relationship between work and money. Also, all food and tangible objects (e.g., magazine) can be given at an appropriate time such as during break. Finally, the employment specialist can gradually increase the program requirements for earning the exchangeable item in order to fade the reinforcement. As an example, a customer earns 10¢ for every five minutes of work. At the end of one hour, he or she can spend the money earned in the vending machine.

Whenever, exchangeable tokens are used, the employment specialist also should provide verbal praise for working. As the customer becomes more successful, verbal praise usually becomes reinforcing. The tangible item gradually can be faded to naturally occurring praise from the supervisor and/or co-workers.

Schedule of delivery: Employment specialists can use two types of schedules to include a predetermined number of responses: *ratio schedule* of reinforcement; or a predetermined period of time, *interval schedule* of reinforcement (Inge, Dymond, Wehman, et al., 1993; Moon et al., 1990). Either of these types

of schedules can be fixed or variable. In a fixed ratio schedule, reinforcement is provided to the customer after a set **number** of responses (e.g., after every step in the task analysis, after every 3 steps in the TA, after every 5 names entered into the mailing list, after every 5 towels folded, and so forth.) Or the employ-ment specialist can use a variable schedule which requires giving the customer the rein-forcement after an average number of responses (e.g., on the average of every 3 steps in the TA, on the average of every 5 names entered into the mailing list, and so forth.) If a variable schedule is used, the customer usually does not anticipate when reinforcement will be provided which may approximate how reinforcement is provided in natural work environments.

Use of an interval schedule requires that reinforcement is provided based on **time** inter-vals. Using a fixed interval schedule, the em-ployment specialist may decide to reinforce the customer after every 5 minutes, at the end of a half hour, an hour, end of the day, and so forth. A variable interval schedule occurs on the average of a set period of time such as on the average of every half hour. Interval schedules of reinforcement are most like the naturally occurring reinforcement schedules on a job site. For instance, a paycheck is usually earned on a fixed interval schedule of once a week. Or, a supervisor typically praises his/her employees based on time intervals such as an annual performance evaluation.

When using ratio and interval schedules of reinforcement, the employment specialist should determine the number of responses or the length of the intervals for reinforcement based on the support needs of the customer. Obviously, if he/she works successfully with earning a paycheck once a week, a more intensive schedule should not be considered. However, if the customer has no concept of a paycheck, a more intrusive level of reinforcement should be implemented. Only when the employment specialist fades to the naturally occurring reinforcement of the job site will the customer be independent in the work place. Figure 2 in the appendix of this chapter provides a training program which demonstrates the fading of reinforcement.

COMPENSATORY STRATEGIES

Adding compensatory strategies to job-site training can enhance a customer's ability to learn and perform independently. In some instances, using a compensatory strategy can eliminate instruction and allow the individual to participate in activities that he/she otherwise would not be able. For instance, a customer may use a "money card" to purchase a soda from the break room vending machine. The money card eliminates the need for the customer to learn the difference between coins or the actual amount that is required to access the machine. However, the steps in using a compensatory strategy may require instruction and should be included within any task analyses that are developed.

If compensatory strategies are targeted, they must be designed with input from the customer, employer, and co-workers. In addition, care should be given to the design and

construction of materials to ensure that they do not stigmatize the customer. Materials should be those that any adult could access within a work environment and would be accepted by the work culture where they are used.

For instance, if a picture book is selected to assist a customer in remembering his/her work schedule, the employment specialist and customer should work together in the design of the booklet. Some of the things they may want to consider include the following:

- Pictures should be concise and eliminate unnecessary information.
- The number of pictures in the booklet should be evaluated. Too many may distract or confuse the customer rather than assist in task completion.
- The size of the booklet must be evaluated. Does it draw attention to the customer? Could it be made small enough to fit in a pocket?
- The materials must be those that any adult would use.
- The booklet should be durable. How often will it need to be replaced? Who will be assisting the customer after the employment specialist has faded from the work place?
- The materials should be simple to use. Is there a less complicated strategy that is just as effective? For instance, could the customer learn to use a written list of job tasks rather than a bulky picture book?

While the above list has been designed specific to the use of a picture booklet, the same concepts or ideas could be applied to almost any compensatory strategy used on a job site. They should be simple to use, concise, and the least intrusive strategy selected that will assist the customer in performing his/her job duties.

Case Study Using a Picture Book

Randy learned to perform his job duty of vacuuming the second floor of a local department store. However, he had difficulty moving from one department to another. For instance, one day he would remember to vacuum the shoe department while on another day, he would skip it entirely. On yet another day, he would remember to vacuum the shoe department, but forget to vacuum the woman's coat area. The employment specialist discussed this with Randy and his employer, and they came up with the following solution.

There were five areas Randy needed to vacuum in a day including: woman's coats, woman's shoes, woman's dresses, woman's accessories, and cosmetics. The employment specialist copied pictures that represented each area of the second floor. The pictures were approximately 3" by 3". Booklets were developed by stapling five pictures together in a packet. Randy's supervisor agreed to make sure that there were booklets always available in his locker.

At the beginning of a work day, Randy took out one booklet from his locker. He proceeded to the area of the store to be vacuumed as represented by the first picture in the packet. After he completed vacuuming the section, Randy tore the top picture from the booklet and threw it in the trash. He then moved to the next area. In this manner, Randy was able to se-quence the sections of the store for vacuuming. Throwing away a picture after

the work was completed seemed to be very reinforcing and helped Randy move through his work day.

Summary: Employment specialists are encouraged to design other compensatory strategies specific to customers for whom they are intended to benefit. Many types of added cues and prompts can be used. The following table provides more compensatory strategy ideas.

COMPENSATORY STRATEGY IDEAS

The customer can't remember his/her sequence of job duties.

- written list
- audio-cassette
- picture book
- assignment board
- flow chart

The customer has difficulty reading copy requests to determine work assignments.

- in/out boxes for each co-worker requesting work with name or picture of co-worker on box
- special form highlighting relevant features of the task such as thick out-lined box where number of copies is located
- audio-cassette requests for copy work

The customer can't count to package work materials.

- strips of tape on table which correspond to # of items in package
- picture of # of items in the package
- box with # of dividers which correspond to # of items in package
- sample of package for matching work

Compensatory Memory Strategies

Some individuals with brain injury will have specific memory difficulties related to their disability (Briel, in press; Kreutzer & Wehman, 1990; Penn & Cleary, 1988). This may include problems with auditory and visual memory and learning, as well as short and long term memory. Compensatory strategies are one way to deal with these issues. Some of the specific strategies that have been suggested for customers with brain injury include the use of imagery, number chunking, memory notebooks, verbal labeling, and verbal rehearsal, to mention a few. The following information is adapted from:

1. handout materials compiled by Virginia Commonwealth University's, Medical College of Virginia Neuropsychology Service in 1993,

2. a Supported Employment Telecourse Network broadcast from the Rehabilitation Research and Training Center on Supported Employment, and

3. personal communication with Ms. Pam Targett, Employment Services Director at the RRTC.

- ***Imagery:*** The process of using mental pictures/images of information to be recalled. **Example:** *The customer visualizes himself walking a specific route to assist in remembering how to find his job site.*
- ***Mnemonic:*** Impose an organizational structure on verbal information to cue recall of several elements. **Example:** *A clerical assistant recalls her sequence of job duties by remembering the word,* ***code****.*

C = *clock in*
O = *open mail*
D = *deliver mail*
E = *enter data*

- ***Number Grouping:*** Recalling numbers by perceptually reorganizing them into fewer elements. **Example:** *A customer working at central supply in a hospital needed to remember to pull items based on a four digit code. She would look at a computer printout and see four numbers such as 1,7,2, and 5. Instead of saying these separately, she recalled the information as seventeen twenty-five.*
- ***Memory Notebook:*** Maintaining written cues systematically in a log to keep up with things that have been done or need to be accomplished. **Example:** *A date or daytime organizer book is used by employees to remember appointments.*
- ***Verbal Rehearsal:*** Repeating key information to facilitate memory recall. **Example:** *Inventory control specialist for sets up her work station by stating the following aloud: 1.) turn on monitor; 2.) turn on computer, 3.) enter my password, 4.) hit enter, etc. She eventually learns to internalize this process by repeating the instruction quietly until she no longer needs to verbalize the information.*
- ***Assignment Board:*** A graphically presented list of task assignments. **Example:** *A customer keeps a bulletin board on the door of her locker. She lists her job duties with specific times for completion to refer to if needed throughout her work day.*
- ***Location and Place Markers:*** A visual cue physically placed at some point in a task sequence indicating where the task is to be resumed. **Example:** *Warehouse worker who straightens shelf inventory sometimes is called off task to fill an order. He cannot remember where he leaves his straightening task. The worker ties a bandanna on the shelf to cue himself for coming back to where he left off.*

SELF-MANAGEMENT

Self-management has been referred to as self-monitoring, self-observation, self-evaluation, self-reinforcement, self-instruction, and self-assessment, to mention a few terms (Browder & Shapiro, 1985; Karoly, 1977; Kazdin, 1984; Shapiro, 1981). Self-management strategies may be applied either before or after the targeted job duty or skill to assist the worker in performing a task successfully. For instance, the worker may use a preset alarm on a watch to determine when it is time to take a break. Another example, may be a worker who uses a compensatory strategy such as a picture book of tasks that need to be completed during the day. Yet another example, might be a worker who evaluates his/her work performance in order to self-reinforce such as marking checks on a card for a specific amount of work which is later exchanged for a reinforcer. The following table provides ex-amples of self-management terms, definitions, and examples.

FREQUENTLY USED TERMS AND

Self-Assessment... Discriminating the occurrence of one's behavior (Shapiro, 1981, p. 268).

Example: Bill assesses whether he has or has not completed a work task such as wiping all the tables in a fast food restaurant.

Self-Reinforcement... Providing oneself with reinforcing consequences contingent upon work performance (Kazdin, 1984, p. 300). This strategy usually is combined with other procedures such as self-assessment.

Examples: Mary takes a coin from a box and places it in her pocket after vacuuming each section of the department store (e.g., shoe section, women's sportswear, etc.).

Marcia places a check on a card after she prices all the items in a box. She exchanges these checks for a preferred item (e.g., soda, magazine, etc.) at the end of her work day.

Self-Instruction... Verbal statements to oneself which prompt, direct, or maintain behavior (O'Leary & Dubey, 1979, p. 459).

Example: John instructs himself by speaking out loud. Such as.."First, I go to the supply closet and get my cart...Now, I go to the windows...Spray the glass... Am I getting all the dirt?...Move on to the next set...Work fast." etc.

Table Adapted From: Browder, D.M. & Shapiro, E.S. (1985). Applications of self-management to individuals with severe handicaps: A review. JASH, 10(4), 200-208.

The effectiveness of self-management procedures has been well documented. For instance, Shafer and Brooke (1985) used a self-recording strategy to increase the punctuality of a young woman in a community job site. The supported employment customer recorded her check-out time on a piece of paper that was printed with a calendar grid. She was responsible for recording the time that her supervisor told her to leave the job site on this card, as well as, using the time clock to punch-out. The employment specialist compared her self-recording card with the actual punch-out time every three or four days. This self-monitoring strategy was successful in decreasing the number of days that the worker left the job site prior to schedule **without** daily supervision from the employment specialist.

Self-management usually entails instructing the employee to independently self-monitor by using such things as natural cues, adding external cues and prompts, compensatory strategies, assistive technology devices, and so forth. This instruction can be provided by the employment specialist, friends, family member, co-workers, and/or the supervisor depending on the customer's support needs. For instance, a family member may assist the customer in learning to check off days on a calendar to determine when he/she goes to work. A co-worker may instruct the same individual in using a timer to monitor production, while the employment specialist assists the individual in developing a self- reinforcement strategy to use on the job when he/she meets the production standard. Regardless of who

provides the customer instruction and support, the following guidelines should be considered.

1. Review training data. If the employee is having specific difficulties in sequencing, discriminating, meeting production, consider using self-management procedures.

2. Consider the learning style of the customer. Does he/she respond best to visual, auditory, tactile information, or is a combination of these needed?

3. Determine if the self-management strategies are stigmatizing. For instance, self-instruction may not be appropriate for the customer who is in frequent contact with co-workers and the public.

4. Always have the customer assist in the design and selection of self-management strategies.

5. Include the supervisor and/or co-workers in the process. Don't implement a strategy without approval.

6. Decide who will be responsible for supporting the customer in learning how to self-monitor.

7. Evaluate the procedure and modify if necessary.

8. Fade the self-management procedure if necessary.

INCREASING PRODUCTION TO COMPANY STANDARDS

Employment specialists are cautioned to provide initial skill training at a pace that requires the worker to maintain a steady and standard speed of performance. If this is successful, the customer should be performing his or her job duties to company standards once the skills are acquired. However, sometimes a customer may still need additional training to meet the company production rate.

Prior to developing a formal program, the employment specialist should determine if the customer is performing all steps of the task analysis as they were designed. Sometimes, production issues can be related to inefficient task analysis development or to inefficient worker implementation. In addition, some production issues are the result of the customer's ability to attend to the work task. Simply, moving the customer's work station to an area with less distractions may be enough to increase his or her production rate. The following steps should be completed prior to initiating training to increase the customer's production rate (Moon et al., 1990).

Steps in determining whether a formal program is necessary to increase production rate.

- Review the probe data for the task. Make sure the customer is performing all steps of the task analysis as designed.
- If the customer is not performing all steps, resume the training program until he/she is performing the steps of the TA in order.
- If all steps are being performed correctly, review the TA. Revise the task so that it is performed as efficiently as possible. (e.g., reduce worker movement).

- If the TA is revised, begin training until the customer is completing the job duty based on the revisions.
- If the original TA is satisfactory, determine if the customer is having difficulty with on-task behavior. If he/she has more than 20% off-task behavior, implement a training program.
- If the TA is efficient and on/off task performance is not a problem, design and implement a program to increase production.

Verify the job site production standard: The first step in increasing the customer's production rate is to verify a company standard which can be used to compare the employee's rate. This is accomplished by asking the supervisor if there is an established company production standard for each job duty that the worker is performing. Preferably, the employment specialist and the customer have been aware of this production rate from the first day of job-site training.

After the employer provides the current standard, the employment specialist should verify the rate based on the performance of co-workers who are performing these tasks. This can be accomplished by observing one or two employees for several days and taking an average of their production rate. If the production rate is defined by the **length of time** it takes to perform a job duty, complete the following steps:

Production Standard Based on Time

1. Note the time that the co-worker begins the job duty.
2. Observe the co-worker performing the task.
3. Note the time he/she completes the task.
4. Subtract the beginning time from the ending time to determine the amount of time it takes to complete the job duty.
5. Take an average production rate across several days to verify a company standard.

If the production standard is determined by counting the **number of units** completed during a given time period, complete the following steps to verify the company standard:

Production Standard Based on # of Units

1. Identify two time periods during the day to observe co-worker perform the job duty.
2. Count and record the number of units completed (e.g., number of towels folded) during the identified sample time period (e.g., 10 minutes, 30 minutes, etc.).
3. Keep the time period constant over all observation periods.
4. Take an average of the co-worker's production rate to verify a company standard.

Determining the Customer's Production Rate: After the company standard has been established, the customer should compare his/her rate to determine if additional training and support is required. Follow the above procedures to determine the customer's rate. Then divide the company standard by the customer's rate to get a percentage of standard for the worker. For instance, if the company rate is to finish the job duty in 15 minutes and the customer is taking 30 minutes, divide 15 by

30 to arrive at 50% of the production standard. Or, if the company rate is determined by the number of units completed, divide the number of units that the customer completed in the time period by the number completed by the co-worker. For instance, the customer folds 10 towels in the time period while the company standard is 25 towels. The customer's current production rate would 40% of the standard or 10 divided by 25. A production standard data form is located in the appendix of this chapter. The following case study is an example of how one customer learned to increase her production using self-management procedures.

SELF-MANAGEMENT CASE STUDY EXAMPLE

Jessica works part-time at a restaurant as a bus person 9:00 a.m. to noon, Tuesday, Thursday, and Saturday and 9:00 to 3:00 p.m. on Friday. From the first day of work, Jessica has earned $4.25 per hour for a total of 15 hours per week. During the times of the week that Jessica does not work, she attends her regular school program. Her primary job duty is to roll silverware and distribute it to the bus stations. She also occasionally greets customers as they enter the restaurant.

This job was designed for Jessica by the restaurant manager and her employment specialist. It was determined during the initial interview, that the waitresses have difficulty keeping an adequate supply of silverware during the work day. As such, the manager was very receptive to creating a position for Jessica that freed up the waitresses from this part of their job responsibility.

Initial job-site training took place throughout the restaurant, however the majority of the instruction occurred at a small work station located between two dining rooms. Waitresses and other employees constantly move in and out of this area, since it houses supplies for setting the tables, as well as, serving non-alcoholic beverages.

Initial Training

Initially, Jessica was trained by her employment specialist to roll silverware using a least prompt strategy. She successfully learned the task and could perform it without prompting; however, an analysis of her program data indicated that Jessica did not meet the production standards for rolling silverware. Jessica, her employment specialist, and super-visor decided that she should try using a self-management procedure.

Measurement and Recording Procedures

The first step in assisting Jessica in meeting production was to set and verify a company standard for rolling silverware. The manager wanted this task completed at a steady, constant work pace, but he did not have a specific predetermined standard for Jessica to follow. Therefore, the employment specialist observed co-workers, observed Jessica's production without reinforcement or prompting, and completed the task himself to determine a reasonable rate of performance. A production

standard of **10** pieces of silverware in **8** minutes was set, and the manager and co-workers agreed that the rate would be satisfactory. Prior to implementing the program design, the em-ployment specialist took a baseline of Jessica's performance. When measured unobtrusively, she completed one piece of silverware an average of every 90 seconds (10 pieces of silverware in 15 minutes.)

Program Design

Self-Monitoring: Two cues were selected based on Jessica's learning style to assist her in self-monitoring production. First, an auditory cue, a digital kitchen timer, was purchased by the employment specialist, and **8** minutes was placed in its stored memory. Next, a visual cue, **10** strips of colored tape, were placed on the table to the right side of Jessica's work station. Each piece of tape corresponded to one piece of rolled silverware. Jessica was trained to punch the "start/stop" button on the timer as the first step in beginning her silverware task. After rolling one piece of silverware, she placed the completed work on a strip of tape. Essentially, Jessica was in-structed to fill the "cue area" with silverware prior to the alarm sounding on the timer.

Self-Reinforcement: The second com-ponent of the program was the design of a "reinforcement booklet." A line drawing of **4** pieces of silverware positioned on a napkin was created by the employment specialist. He then divided one page of standard white bond paper into **5** sections approximately **8" by 2 1/4"**. Within these **5** sections, ten line drawings were

positioned. Next, the employment specialist used the copy machine to produce multiple pages of the "reinforcer". After producing the pages, he cut them into strips and stapled **5** "reinforcer" sheets together to make a booklet.

Self-reinforcement occurred after Jessica picked up the ten rolls of silverware from the "tape grid" and placed them in a silverware bin. If the timer had not rung, she pushed the "start/stop" button, picked up the "reinforcer booklet", tore off a sheet, and placed it on the table beside her work. At the end of the day, Jessica could take these "earned" pages to show at school and at home. If the timer rang prior to completion of ten pieces of silverware, Jessica was to tear off a reinforcer sheet and throw it in the trash can. She then finished the remainder of the ten, put the silverware in the finished silverware bin, and started on the next set of ten by setting the timer.

Five sections of ten were selected for each reinforcer sheet, since this corresponded to the number of napkins, **50**, in a pack, as well as, approximately **1** hour of work. It was felt that this could further assist Jessica in self-monitoring her production/speed. In other words, at the end of one hour of work, Jessica should have an empty pack of napkins, a full bin of rolled silverware, and a reinforcer sheet that she could take to school or home at the end of the day. The extra was allowed for getting new supplies and distributing the silverware to the waitress stations. In addition, Jessica's co-workers assisted her by agreeing to check on her at the end of each hour. If she had completed the task, she was able to assist her co-worker as a door greeter until the beginning of the next hour of work.

The employment specialist took the responsibility of assisting Jessica in learning how to use the self-monitoring program. Once she learned the task, her production standard was maintained with the support of her co-workers. Initially, Jessica did not fully understand the concept of working at a constant speed. The use of the self-management procedures assisted her in meeting production without constant inter-ference from the employment specialist, until she began to do so independently. In addition, it is suggested that the natural consequences of working at an acceptable speed (e.g. positive interactions from her supervisor and co-workers) began to influence Jessica's work performance. The self-management procedures quickly lead to the transfer of control from arti-ficial prompts and reinforcers to the naturally occurring supports on the job site. By using a self-management procedure Jessica is in control of her training, and she presents a competent image to her co-workers.

JOB SITE MODIFICATIONS

In some cases, the initial training program does not result in the customer learning the job duties. If this is the case, the employment specialist must determine how to revise the training plan. This can be done by reviewing the data and pinpointing what changes need to be made. Occasionally, the employment specialist may find it difficult to

determine exactly what is limiting success. In these instances, several employment specialists and the program manager should brainstorm solutions to the problems encountered. The following list of questions can assist in program modifications (Inge, et al., 1993; Moon et al., 1990). The answers will assist the employment specialist in modifying the training program to meet the support needs of the customer.

1. ***Analyze the training program.***

   - Does the prompting procedure (least prompts, time delay) match the learning style of the customer?
   - Is the customer responding to the type of prompt(s) selected?
   - Is the customer distracted by noise or people in the environment? Is he/she attending to the job task? Can the location of the task be modified to decrease distractions?
   - Can you reduce the number of job duties being taught in order to provide repeated practice on a specific job duty?

2. ***Evaluate the task analysis.***

   - Has the task been analyzed to match the customer's abilities?
   - Can the steps be further analyzed into smaller components?
   - Have the physical abilities of the customer been taken into consideration? Can the task analysis be modified to match the motor skills of the worker?
   - Does the task analysis eliminate the need to make quality judgements?
   - Do the steps in the tasks analysis include any added cues or compensatory strategies that have been added to the job duty?
   - Can several steps of the task be taught rather than the whole task analysis?

3. ***Assess the reinforcement.***

   - Are the naturally occurring reinforcers meaningful to the customer?
   - Does he or she need additional reinforcement to learn the job duty?
   - Has a program to systematically fade added reinforcement been designed and followed based on data collection?
   - Is the selected reinforcer(s) motivating to the customer?
   - Is the timing of reinforcement correct?
   - Does the schedule of reinforcement (variable vs. ratio) meet the support needs of the customer?
   - Has the reinforcement been faded too quickly?

4. ***Consider assistive technology.***

   - Is the customer's mobility or motor abilities affecting his or her skill acquisition?
   - Can the customer physically perform the job, but is it difficult or physically impossible for him or her to meet the production demands of the job?
   - Does the worker become fatigued when attempting to perform the motor demands of the task?
   - Has the work site been modified to meet the physical support needs of the customer? Are the work supplies positioned for maximum accessibility?

- Would the customer's level of independence be increased by the application of assistive technology?
- Is the job site supportive of technology, and will co-workers be available to provide assistance during a difficult portion of the task?
- Can the job be restructured to better match the physical abilities of the customer?

ASSISTIVE TECHNOLOGY

A customer with physical challenges will have specialized support needs in the workplace (Inge & Sharpton, 1995; Sowers & Powers, 1991). These challenges can be met with assistive technology devices and services. The 1994 Reauthorization of the Technology-Related Assistance for Individuals Act (Tech Act) defined assistive technology (AT) devices and services:

> The term *assistive technology device* means any item, piece of equipment, or product system, whether acquired commercially off the shelf, modified, or customized, that is used to increase, maintain, or improve functional capabilities of individuals with disabilities [20 U.S.C. § 140(25)].

> The term *assistive technology service* means any service that directly assists an individual with a disability in the selection, acquisition, or use of an assistive technology device [20 U.S.C. § 140(26)].

There is a continuum of complexity in technology related to the device as well as the type of materials or manufacturing techniques used to produce the device (Inge & Shepherd, 1995). Low technology usually includes devices which are simple, with few or no moveable parts (Mann & Lane, 1991). Low technology devices that customers may use on job sites may include 1) dycem (a non-skid mat which can stabilize work materials for the customer), 2) keyguards, 3) book stands, 4) reachers, 5) laptray, 6) built-up or enlarged handles on utensils or work tools. Low technology devices can be purchased almost anywhere from the local hardware store, catalogues, or can be made from materials that are found in a home workshop. Usually, these devices are low cost and can be obtained quickly.

High technology devices are defined by the use of electronics, specialized manufacturing techniques, and materials (Anson, 1993). High technology is most often associated with computers, robotics, environmental control units, power wheelchairs, and so forth. Rehabilitation engineers; occupational, physical, speech therapists; or other rehabilitation personnel can assist customers in identifying and obtaining high technology devices.

High tech devices are typically available through vendors of specialized companies dealing in specific types of merchandise. AT services and devices can be paid for by the Department of Rehabilitative Services, Medicaid, Social Security Work Incentives, private insurance, and by the employer (Wallace, 1995). Technology support needs should be identified

after the customer has selected a career path or potential job (Powers, 1995). This is very different from identifying devices and services and then trying to fit it into a job site. The following table provides information resources in the area of assistive technology.

ASSISTIVE TECHNOLOGY RESOURCES
Abledata Silver Spring, MD (800) 227-0216
Apple Computer, Inc. Office of Special Education 20525 Mariani Avenue Cupertino, CA 95014
Assistive Technology Sourcebook RESNA Press Department 4006 Washington, DC 20042-4006
Fred Sammons, Inc. Box 32 Brookfield, Il 60513
Helen Keller National Center 111 Middle Neck Road Sands Point, NY 11050
IBM National Support Center for Persons with Disabilities PO Box 2150 Atlanta, GA 30301-2105
Job Accommodation Network 918 Chestnut Ridge Road, Suite 1 Morgantown, WV 26506-6080 (800) ADA-WORK (voice & TDD) **(Continued)**
National Rehabilitation Information Center (NARIC) 8455 Colesville Road, Suite 935 Silver Spring, MD 20910-3319
National Technology Center American Foundation for the Blind 15 West 16th Street New York, NY 10011
Prentke Romich Company 1022 Heyl Road Wooster, OH 44691
President's Committee on Employment of People With Disabilities 1331 F Street, N. W., Suite 300 Washington, DC 20004 (202) 376-6200 (voice) (202) 376-6205 (TDD)
RESNA (Association for the Advancement of Rehabilitation Technology) 1700 North Monroe Street, Suite 1540 Arlington, VA 22209-1903

Assistive technology cannot provide solutions for all challenges faced by the customer. For instance, it may be unwise to identify a job with an extremely high production standard even if technology is available. Employment specialists should identify a support team to include the customer; family members; employer; assistive technology vendors; occupational, physical, and speech therapists; and rehabilitation engineers to assist in identifying technology for the workplace.

Assistive Technology Case Study

Monica is a young woman whose physical abilities are challenged by cerebral palsy.

She found a job with the assistance of an employment specialist entering data into a company's mailing list. Her employment specialist identified that she had many abilities that she could bring to the company, as well as challenges that could be met with assistive technology and supported employment. These strengths and challenges follow:

Monica's strengths:

- Types simple letters to friends and family members using a headpointer.
- Knows how to use a manual typewriter.
- Reads on a basic level, but she can copy whatever is written on the paper with accuracy even if she can't read the words.
- Is very social and expresses an interest in learning to use a computer for data entry.
- Uses a power chair for mobility.
- Can lift her right arm to shoulder height.
- Is extremely motivated to work.

Monica's work challenges:

- Can not use her fingers on either hand to grasp objects.
- Is not able to manipulate paper for data entry.
- Must rely on others for daily care activities.
- Does not have any computer training or previous work experiences.

The first issue to solve was to determine how Monica would manipulate paper for data entry. Requests for the mailing list arrive at the company on telephone message pads, business cards, and even scrap pieces of paper. Monica would not be able to pick up these small pieces of paper and move them. This concern was raised with Monica's supervisor who suggested a solution to the problem. She offered to tape requests on a standard 8 ½ by 11" piece of typing paper. After a page was full of requests, she would give these to Monica for data entry.

The next issue would be to determine how Monica would move the sheets of typing paper. It was decided that a standard secretarial stand could be attached to the side of her table to hold the papers. A page turner could then be installed to drop the pages one at a time. A rehabilitation engineer was called to make this device. In addition, he was asked to make a data entry guide that would move down the page to assist Monica in visually keeping her place. This required a two directional switch and a motor for the guide.

After working on these devices, the rehabilitation engineer reported that he was successful in producing the data entry guide but was having difficulty developing the page turner portion of the device. At this point, an occupational therapist evaluated Monica to determine if she would be able to move the paper from the device without adding the page turner. A task analysis revealed that she could take her head pointer and pull the top of the paper forward. Once she had accomplished this, Monica could raise her arm to shoulder

level and push the paper off the stand with the side of her hand. Timing Monica's physical movement revealed that she could push a sheet of paper off the typing stand within 30 seconds, a reasonable time for completion of the task.

Next, a keyguard was ordered from a computer supply store and placed on the computer keyboard to assist Monica in striking the correct keys when typing. A software program, "sticky keys" was installed on her computer which eliminated the need for her to depress two keys simultaneously. The computer was placed on a table which had blocks to raise it to a comfortable work height. Finally, Monica's employment specialist designed task analyses and an instructional program to assist her in learning her job duties. This instructional program was discussed earlier in the prompting section of this chapter.

CHANGE IN THE CUSTOMER'S JOB DUTIES

Sometimes, in spite of efforts to change the instructional program, modify the workplace, or add assistive technology devices and services, the customer still has difficulty performing a job duty (Moon et al., 1990). In these instances, the employment specialist may need to negotiate with the employer to determine if a co-worker can share the job duty or switch for one that is of equal responsibility. The customer, employer, co-worker(s), and employment specialist should meet to discuss the alternatives. A change in the customer's responsibilities will necessitate the implementation of a new instructional program for training him/her in performance of the new job duties.

FADING FROM THE JOB SITE

Once the worker has learned to perform all the skills necessary correctly and independently, the employment specialist must ensure that the performance of these duties are maintained to company standards under naturally occurring supervision and reinforcement. The focus of training at this point is to increase the worker's independence while fading the employment specialist's presence from the job site. Much of this will occur naturally if the employment specialist has paid attention to including the supervisor and co-workers in the program design from day one of job-site training.

For instance, as the customer begins performing steps in the task analysis independently, the employment specialist fades his or her presence from the immediate work area (e.g., the employment specialist is 3 feet away from the customer and then 5 feet, etc.). This procedure was described earlier in the data collection section of this chapter. If planning has been done correctly, the employment specialist is now ready to develop a fading schedule for leaving the job site.

The customer's first time alone for part of the day is a significant step. The employment specialist should explain to the customer, supervisor, and co-workers that he or she can be contacted and will return to the job site

immediately if needed. As the customer continues to do well based on data results and supervisor and co-worker comments, the employment specialist gradually fades his or her presence until the worker is alone for an entire work day. Initially, the employment specialist should stop by the job site at the end of the day to ensure that the customer is comfortable with the fading schedule. The following guidelines may be useful when fading from the job site.

GUIDELINES FOR FADING FROM THE JOB SITE

1. Discuss the fading schedule with the customer and supervisor.
2. Agree on a day to begin fading the employment specialist's presence.
3. Inform the customer and co-workers (if appropriate) that you are leaving the job site and for how long.
4. Give the customer and supervisor a telephone number where the employment specialist can be reached.
5. Leave for 1-2 hours for the first fading session.
6. Continue to collect probe, on/off task, and production data on the job duties.
7. Gradually increase your time off the site as the customer continues to be independent, until he or she is working for the entire day with the naturally occurring support of the workplace.

to fade from the job site as quickly as possible.

SUMMARY

Job-site training involves the direct instruction of job duties and related non-vocational skills. The employment specialist's role is to facilitate the customer's successful work performance; be available for support to the customer, supervisor, and co-workers; and

Once the employment specialist has imple-

mented the procedures outlined in this chapter based on the support needs of the customer, and the worker is independently completing his or her job under naturally occurring supervision of the job site, the employment specialist moves into the follow-along phase of supported employment.

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APPENDIX

- **Sequence of Job Duties Form**
- **Task Analysis Form**
- **Percent Time On-Task Data Form**
- **Production Rate Recording Form**

VIRGINIA COMMONWEALTH UNIVERSITY
REHABILITATION RESEARCH AND TRAINING CENTER
Sequence of Job Duties Form

[ ] Daily
(Job duties remain the same from day-to-day

[ ] Varies day-to-day
(If checked here, complete a separate form for each different sequence)
If above box is checked, indicate day for which this form is completed:

[ ] Mon [ ] Tues [ ] Wed [ ] Thurs [ ] Fri [ ] Sat [ ] Sun

Approximate Time	Job Duty

Comments: _____

_____

_____

_____

SIGNATURE/TITLE: _____ DATE: _____

Task Analysis Form

Trainer: _____

Customer: _____

Environment: _____

Work Cue: _____

Data Collection:
+ independent correct response
- incorrect response
v verbal prompt
m model prompt
p physical prompt

Percent Time On-Task Data

Employee: _____ Job Site: _____

Trainer: _____ Job Title: _____

Date	Observation Period	Time Start	Time End	1-Minute Intervals (+) = On-Task; (-) = Off-Task										% Time On-Task	Job Duty

Definitions:

On-Task: _____

Off-Task: _____

Production Rate Recording Form

Name: Month: _____

Task: _____ Standard: _____

Date	Time Begin Task	Time End Task	Total Time	Units Completed	% of Standard

Standard is the average number of units completed by co-workers performing the same task within a specified time period, or the standard can be the length of time that it takes the co-workers to complete the job duty.

Calculate standard by 1.) dividing the number of units that the customer completes in the time period by the company standard or 2.) dividing the company standard (length of time to complete the job duty) by the length of time it takes the customer to complete the duty to arrive at the customer's production rate.