

# Data-Based Decision Making in a Preschool Service-Learning Practicum

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## Introduction

Data-based decision making, when done systematically, can lead to better outcomes for students. Collecting and graphing data not only provide educators an effective way to monitor student progress, but also help determine necessary instructional changes. By implementing consistent and effective data-based decision making, early childhood educators can promote positive outcomes in short periods of time.

The purpose of this presentation is to share three examples of systematic data-based decision making used by graduate students as part of a 12-week service-learning assignment. The students' methods and graphs are provided, along with brief testimonials regarding their decisions.

## Procedures

Twelve graduate students were enrolled in the 3-credit hour course *Preschool Children with Disabilities* in the Fall of 2013. Students were asked to select a child with a disability from their current preschool classroom as the focus on their course assignments. Unemployed students were assigned to a preschool in their local community. Students were encouraged to select children who had shown slow progress towards specified targets.

Under the guidance and supervision of the instructor, students independently completed a six-part project. Feedback and grading occurred after each part was completed. The three examples presented here were purposively selected because they ranked high on grades assigned for the final product, demonstrated three distinct target behaviors, and had clear graphics to represent the intervention efforts and outcomes.

## Project Overview

All three students followed the same systematic data-based decision making process which was outlined in the course requirements:

- 1) **Assess:** determine child's needs using teacher-/parent-reports, observation, and criterion-based assessments;
- 2) **Target:** identify a functional target behavior in need of change/growth;
- 3) **Plan:** develop a child-specific instructional plan containing systematic hierarchy of evidence-based strategies (i.e., prompts and/or consequences) that match the child's needs;
- 4) **Monitor:** collect data and graph child's progress over time ;
- 5) **Evaluate:** determine the effectiveness of the plan over time, making refinements based on the data; and
- 6) **Reflect:** provide a testimonial on lessons learned.

## Child A

Age: 4yr2mo  
Diagnosis: moderate bilateral hearing loss (aided); speech-language impairment  
Placement: integrated public preschool program

### Assess

IEP review, teacher reports, observation of classroom and child engagement, *Assessment, Evaluation, and Programming System Three to Six Years (AEPS -II)*

### Target

The child will speak audibly so that peers and teachers understand her answers to questions, comments, requests, and/or questions.

### Plan

*The teacher will...*

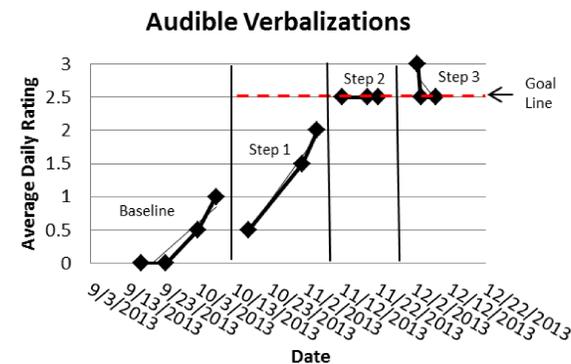
Step 1: provide verbal model for child to imitate, picture prompt, and thumbs-up signal to indicate audible speech.

Step 2: prompt child with picture prompt, gestural cue of hand behind the ear, and verbal directive .

Step 3: will use gestural cue of hand behind the ear and verbal directive.

Step 4: will provide child thumbs up signal for audible verbalizations.

### Monitor



### Evaluate

It became evident at Step 1 that the child did not understand the difference between audible and inaudible verbalizations. A "bridge step" using a speech app was added to the plan the following week. Child progressed quickly once the target behavior was understood.

### Reflect

"By gathering the assessment data that I did, I was able to better understand [child's] needs, as well as strengths. This information allowed me to develop a plan that was both feasible and effective in improving [child's] audible verbalizations, as well as her communication in general.

## Child B

Age: 4yr4mo  
Diagnosis: profound bilateral hearing loss (aided), developmental delay/speech and language  
Placement: integrated preschool program

### Assess

IEP and MDT review, teacher reports, observation of classroom and child engagement, Routines-Based Interview (RBI) with family, , AEPS-I (birth-3 years) and AEPS-II

### Target

The child will communicate his wants and needs by using 1-2 words/signs in order to inform, direct, ask or express himself.

### Plan

*The teacher will...*

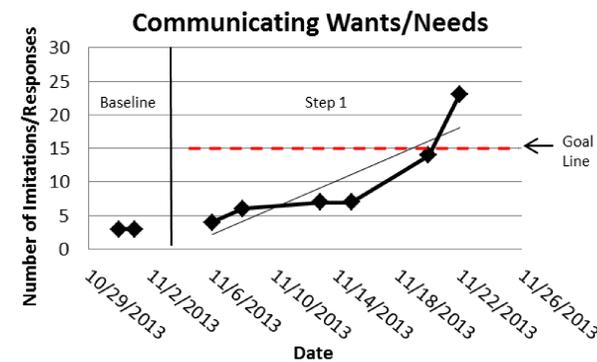
Step 1: provide verbal model (sign) for child to imitate.

Step 2: prompt by verbally directing child to communicate want or need with a suggested comment.

Step 3: prompt by verbally directing child to express want or need.

Step 4: prompt by asking a question to initiate child communicating want or need.

### Monitor



### Evaluate

Child was slow to imitate signs at first, but gradually began to imitate more and more as the strategies were consistently implemented. Improvements in attention to adults' signs and spontaneous use of signs was also noted.

### Reflect

"A part of me thinks that we as a team became more consistent with the strategy use as the data increased. When I saw the sudden jump in data I was excited, and the even larger leap the next session made me feel confident that this plan was working."

## Child C

Age: 4yr1mo  
Diagnosis: Autism, speech-language impairment  
Placement: Head Start preschool

### Assess

IEP review, teacher/parent reports, *Teaching Strategies GOLD* Assessment

### Target

The child will label emotions and act appropriately when feeling a strong emotions.

### Plan

*The teacher will...*

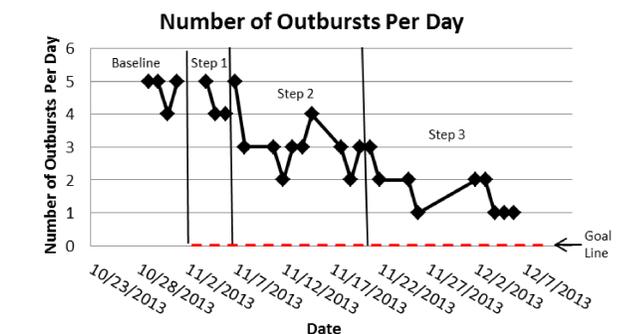
Step 1: read through a feelings book with child prior to escalation of emotions, and review labels for feelings and coping mechanisms.

Step 2: prompt child to label emotions in feelings book prior to escalation and provide examples of coping mechanisms.

Step 3: provide labels for child's feelings and prompt coping mechanisms.

Step 4: ask child to identify feelings and what coping mechanism can be used.

### Monitor



### Evaluate

Child progressed quickly through Steps 1 and 2, and was beginning to identify own "sad" feelings when this practicum concluded.

### Reflect

"I noticed the spikes and didn't feel as confident in the plan until I put it on the graph. This information was extremely beneficial to [the child's] family during our IEP meeting."

### Results/Implications

Ten students demonstrated effective data-based decision making in this course. Findings from this project suggest that young practitioners can promote positive outcomes for students with disabilities in short periods of time with mentoring and coaching in systematic data-based decision making. More efforts should be made to include comprehensive instruction and training in data-based decision making in pre-service training programs.

