



Basic ABA

Kiersten Johnson
Milestones Autism Organization
Milestones.org
216-371-4765

What is ABA?

- Applied Behavior Analysis
- B.F. Skinner
- www.Lovaas.com
- Based on learning and behaviors principals
 - Reinforcement
 - Prompting
 - Shaping
- Used to teach new skills, increase communication, promote independence and decrease challenging behaviors.

Why use ABA?

- Evidence-based practices – backed by research
- Full curriculum easily available and ready to implement
- You can teach anything (e.g. academics, social, self help, job training, leisure skills)

What is ABA?

ABA is a umbrella that encompasses:

- Discrete Trial Training (DTT)
- Verbal Behavior
- Direct Instruction
- Pivotal Response Intervention
- Incidental Teaching
- Functional Assessment
- Picture Exchange Communication (PECs)



ABA Tools and Techniques

- Discrete Trials
- Motivation and reinforcement
- Prompting
- Shaping
- Task analysis & chaining
- Pairing
- Using observations (data)

Getting Started

- Focus on target goals
- Do not try to teach or correct everything at once
- Note other issues to work on at a later time (running list)
- Identify prerequisites
- Try to teach in the Natural Environment



Building Blocks of Teaching

Typically skills are taught in a highly structured series and begin with:

1. Imitation (physical/verbal)
2. one step commands
3. receptive discrimination
4. expressive labeling in response to questions or directions



When can I use ABA?

- It should not be reserved for structured teaching sessions!
- Discrete trial format can and should be used in a natural environment.
- Your goal should be to *try to use the discrete trial format in every interaction with the child.

* It is not humanly possible to follow through with every direction/Sd during your entire day. Do what you can and don't beat yourself up!

Attending

- Attending:
 - Eye contact (fleeting)
 - Sitting appropriately
- Responds to name
- Using Eye Contact to communicate
- Quick edibles, Bubbles, Activity
- Generalize
- Reinforce eye contact when playing

Discrete Trial

Discrete Trial:

1. Discriminative Stimulus- Sd
(Direction/Signal) "Do you want cookie?"
2. Child's Response-
Child says, "Yes"
3. Consequence (Reinforcement or Prompt)
You give the cookie



Discrete Trial

Discrete Trial:

1. Discriminative Stimulus- Sd
(Direction/Signal) "Do you want cookie?"
2. Child's Response-
Child does not respond (parent says "yes") Prompt
Child attempts communication
3. Consequence (Reinforcement or Prompt)
You give the cookie

Discriminative Stimulus-Sd:

- Short, concise directions
- Have a clear expectation of your target response.
- Can be verbal:
i.e. "Where is the ball?" Let's color", "Do you want another one?"
- Can be non verbal:
i.e. Communication temptation-have a desired object you want them to request

Childs Response:

- Correct
- Partially Correct
- Incorrect
- No response

Reinforcement:

- What reinforcement do you get for going to work, cleaning your house, making dinner
- Everything we do is based on some form of reinforcement-immediate or delayed



Reinforcement:

- If correct - reinforce them...

- **Tangibles:**

- food, candy, drinks, toys, videos

- **Social:**

- **Physical**- tickles, squeezes, jump, swing
- **Verbal praise**- "You did it!", "Nice listening!" (behavior specific)
- **Embedded**- getting the cookie they asked for
- **Goal: Intrinsic Reinforcement- Satisfaction from being right, completing a puzzle, making someone else happy**
- Be sure to pair the Tangibles with the Social Reinforcement "Nice finishing the puzzle!" / Give toy



The Art of Reinforcement:

- Use **differential reinforcement** to shape responses.

- Learn to ride a bike

- High (attempt)
- Moderate (getting better)
- High (independent)
- Moderate (maintain encouragement)

- Shaping the skill



Reinforcement:

- At first it must be immediately after response.
- Slowly increase duration between reinforcement
 - First-Then Board
 - Token Board
- Slowly fade reinforcement to become as natural and embedded as possible
 - Goal- reinforce like a teacher in a classroom
- Intermittent reinforcement maintains the skill (praise every so often)


Reinforcement:

- If a child is frustrated or disinterested...
 - Increase the level or frequency of reinforcement.
 - Go back to something easier and then do the harder work afterwards
 - Use reinforcement to gain momentum
 - Shorten work requests or make it easier so they can have success

Reinforcement:

- Knowing how to reinforce is the most crucial part of the discrete trial.
- Know how you are going to reinforce before you present the Sd.
- Reinforcement preferences will **change!**
- You have to change with it!!!
 - reinforcement inventory
 - put them away

Connect With Your Child

- Pairing is the process by which you establish yourself as the reinforcer in order to build a positive relationship and communication with your child.
 1. List some of your child's favorite activities (i.e., swinging, dancing, listening to music)
 2. Choose one that you feel has the highest reinforcement. 
 3. Spend time doing that activity with your child.

Connect With Your Child

Do:

- Pairing may be used to connect you and your words with the delivery of reinforcers.
- Choose reinforcers that are better with you than without you.
- Be sure you are using items and activities that your child wants in that moment (follow your child's lead).
- Narrate activities (describe what you are doing).
- Pair frequently for short periods of time!



Prompting:

- Think about the prompts you would use to teach a child to say thank you to grandma for giving her a present.



Types of Prompts:

There are five basic types of prompts:

- **Positional prompting** (placing the object you want selected closer to the child)
- **Gestural prompting** (pointing to, looking at, moving, or touching the correct response)
- **Modeling** (acting out the desired response)
- **Verbal prompting** (giving the full verbal answer, a part of the word, the beginning sound or overemphasizing the word within some choices)
- **Physical prompting** (touching the child, such as hand-over-hand or physically directing the child to the correct answer or response)



Prompting:

- **Prompting ensures errorless learning.**
 - ❖ Prompt right away when teaching new skill.
 - ❖ Then the next time you ask him the same question, you want to give him an opportunity to show you the correct response.
 - ❖ If the child gives another incorrect response then go back to prompting him right away.
 - ❖ Most- Least Prompting – Only give what the child needs.

Errorless Teaching

- *When you see the child is going to be incorrect, jump in and prompt*
- *When there is a high degree of certainty that the child will be wrong, prompt them immediately.*
- *This is especially important for verbal responses especially echolalic kids.*

Prompting:

BE AWARE...

- Most of the time it will take more than one trial for a child to be able to give a correct response independently.
- The parent can use a variety of other minimal prompts to help the child (e.g. lifting hands into position, pointing to the hands, slight touch)
- Some children become dependent on the prompting to get the answer right. Try to fade the prompt as soon as you can so the child becomes independent.
- Be aware of giving an unknowing prompt. We sometimes *look* at the correct answer or *nudge* a child towards the correct response without even thinking about it.

Positive learning

Try to end every learning opportunity with a positive feeling.

Do this by:

- Making the reinforcement clear before starting
- Teach things in small steps
- Modify the environment for the child to be successful...and then fade it!
- Reinforce positive behavior
- Go back to something easier if the child become frustrated.
- Give breaks



Practice

- Think about the prompts and reinforcements you would use to teach a child to use a fishing rod.



Task Analysis

- Example:
Jig Saw Puzzle
 1. Dump out pieces
 2. Turn them over
 3. Find all the sides/corners
 4. Find common colors

- Games
- Skills
- Independent Play



Chaining

To teach your child a more complex skill you will need to:

- break it down into small teachable steps (task analysis).
- teach each step separately (discrete trial)
- present a picture or word that represents each step when learning (pairing)
- then chain the steps together

Backwards chaining

Visual Support

- Independence
 - schedules
- Communication
 - PECS
- Prompts
 - Timer
 - Directions



Simple Ways to Teach Everyday

- Communication Temptations
 - Bounce them on a ball or bed and then stop and wait for them to ask for more
 - Have a snack and wait for them to ask
- Assertiveness Training
 - Ask a sibling/peer to take their toy and prompt them to say, "Hey, that's mine!"
 - Give a cool toy to the sibling/peer and prompt the child to say, "Can I have that?"

Collecting Data

Why do we collect data?

- Find Baseline
- Objective assessment of behavioral change
- Measure progress
- Communication across settings and people
- Prevent relying on memory
- Problem solving difficulties in progress



Data

- **Child's response** (correct/ incorrect)
- **Level of assistance needed** (prompt level)
- **Nature of error** (wrong response or no response)
- **Anecdotal information** (additional comments)



Glossary

- **Stimulus**- something external that influences an activity. It can be visual, auditory, tactile or a combination of the above
- **Reinforcement**- an event that occurs after a behavior that increases the likelihood of that behavior occurring in the future
- **Prompting**- the presentation of a stimulus to help the child produce the targeted response after an instruction
- **Prompt Fading**- reduction of the level of prompting
- **Shaping**- reinforcement of consecutive approximations to a target behavior
- **Chaining**- a strategy that joins two or more responses into a behavior sequence
- **Incidental Teaching**-to make every waking moment a teachable moment

References

- *Behavioral Intervention for Young Children with Autism*, by Catherine Maurice
- *The Social Skills Picture Book* by Dr. Jed Baker
- *Reaching Out, Joining In: Teaching Social Skills to Young Children with Autism* by Weiss and Harris