



**AIM**  
ACCEPT.IDENTIFY.MOVE.

A Behavior Analytic Curriculum for  
Social-Emotional Development in Children

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# About Me



**ASU**® Department  
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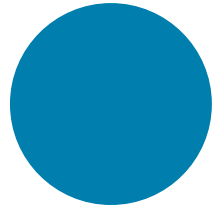
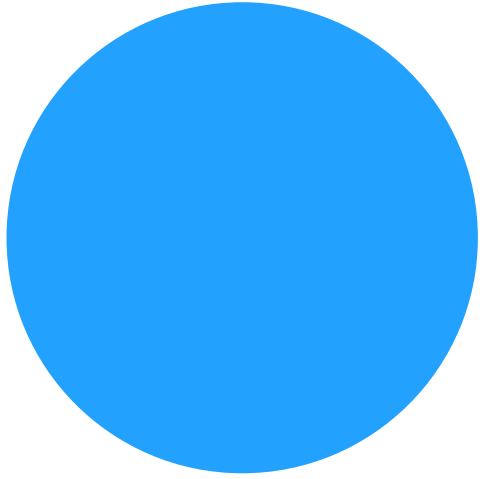


# Agenda

- Day 1: Understand
  - Foundations
  - Mindfulness
  - ACT
  - ABA
  - Synthesis
- Day 2: Apply
  - AIM Components
  - Mindfulness
  - ACT
  - ABA
  - Data & Evaluation



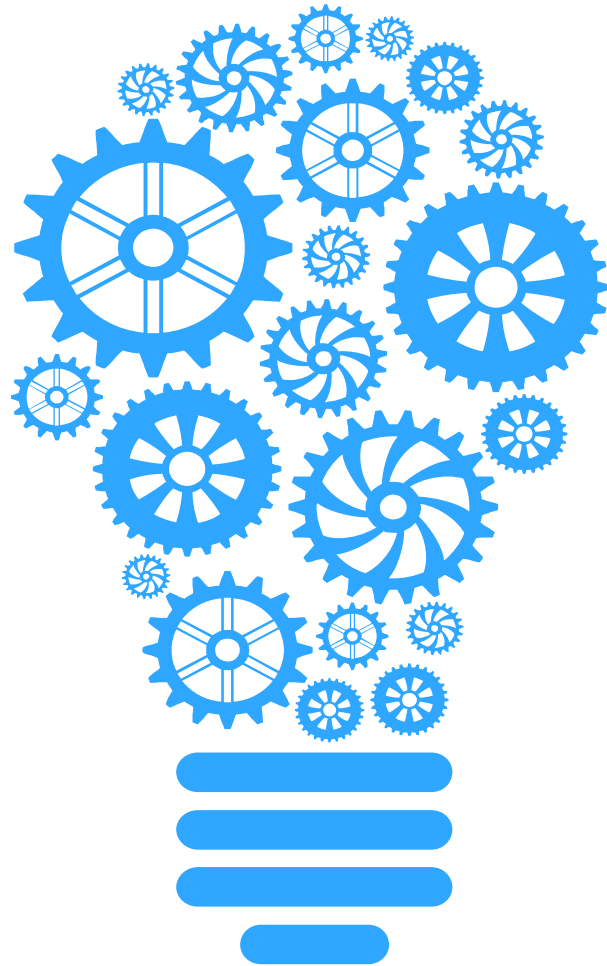




# Foundations







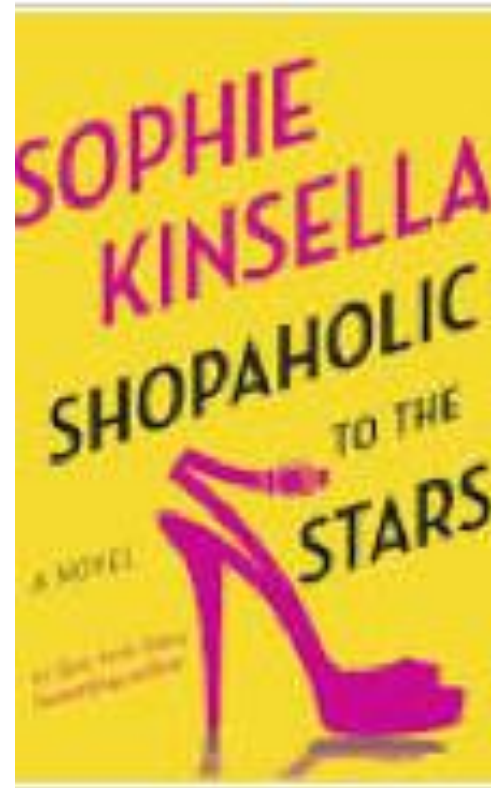
2 minutes of  
nothing



# Which one is you?







# The Mainstream

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# What is Mindfulness?

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- Mindfulness is "the intentional, accepting and non-judgmental focus of one's attention on the emotions, thoughts and sensations occurring in the present moment" which can be trained by meditational practices derived from Buddhism
- Mindfulness practice is being employed in psychology to alleviate a variety of mental and physical conditions, including obsessive-compulsive disorder, anxiety, and in the prevention of relapse in depression and drug addiction.
- It has gained worldwide popularity as a distinctive method to handle emotions.





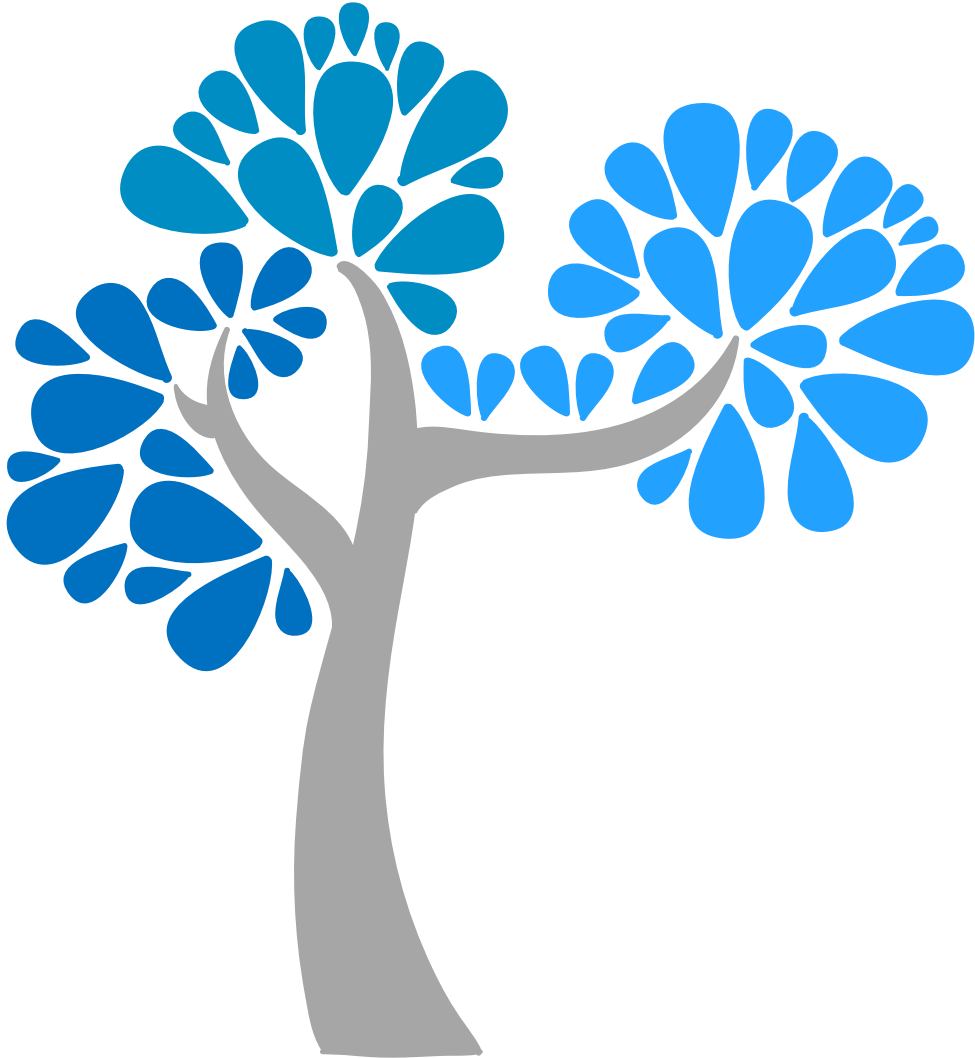
# Meditation for the Masses & Classes



- Decrease in anxiety
- Mood change
- Pre-frontal cortex activation
- Immune response



# Meditation for the Masses



- Creativity
- Cognitive flexibility
- Memory
- Reaction time
- IQ





# Practicing Mindfulness

3 Minutes of Mindfulness  
Breathing

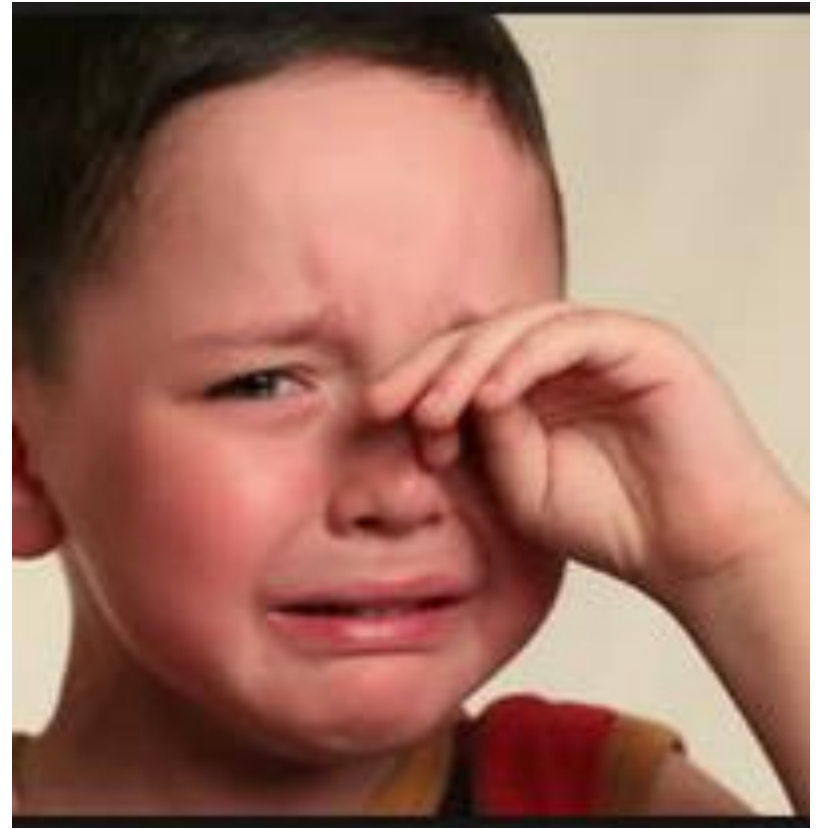


# Question

How was this  
experience different for  
you than the 2 minutes  
of “nothing” from  
before?







Are you happy all the time?  
What about the students you work with?

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# Where there is light, there is dark





# The dark impacts us all...





# What has Behavior Analysis Done?

- Not much.
  - Autism epidemic shifted the discipline to quick pragmatic fixes of basic language and behavior problems.
  - Most higher functioning students in school systems with autism are treated by non-behavioral social workers or speech therapists
  - Mandated positions within school systems. Behavior Analysts are not.
- Behavior “Therapy” Movement:
  - A variety of types. From basic Antecedent-Behavior-Consequence attempts, to self-monitoring, and more “therapy” type approaches
  - Requires a pretty flexible language repertoire





# Is Therapy Really Behavioral?

- According to Skinner.....It appears to be.
  - “As nature prepares the puppy to be a serious fighter by contriving consequences which shape effective play.....the same thing may be said for many aspects of therapy. By contriving relatively unambiguous social contingences, the therapist builds a repertoire which will be naturally effective in the client’s daily life. The contrived contingencies of therapy must eventually be terminated....the therapist must withdraw from the life of the client before therapy can be said to be complete.” –Skinner, Contrived Reinforcement (1982)
  - “Face-to-face psychotherapy is another field in which behavior modification is used, and it is particularly significant because that kind of therapy is usually concerned precisely with the effects of punishment. Psychoanalysis can be regarded as a systematic reversal of the effects of the punishment one has received at some earlier time, and psychotherapeutic counseling is largely a matter of finding a way of life - a new place to live, a new job, new friends--in which the client's behavior will be positively reinforced.” –Skinner, The Non-Punitive Society (1979)



A dangerous  
quote...

“Once people start talking, really  
talking, traditional behavior  
analysis interventions fail.”

- Dixon



# Traditional Perspective of Suffering



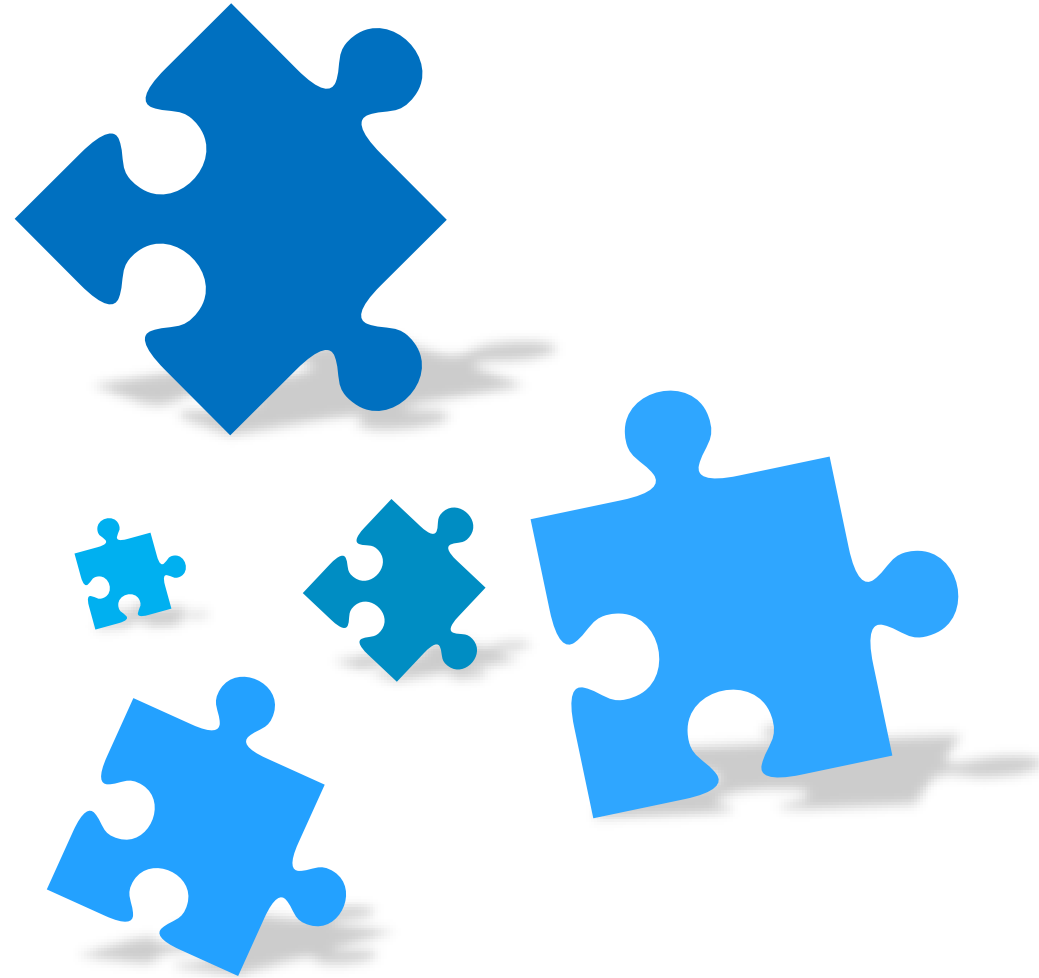
Humans, given the right circumstances, are naturally psychologically healthy, happy and content



Psychological pain is abnormal, meaning something is wrong that needs to be fixed

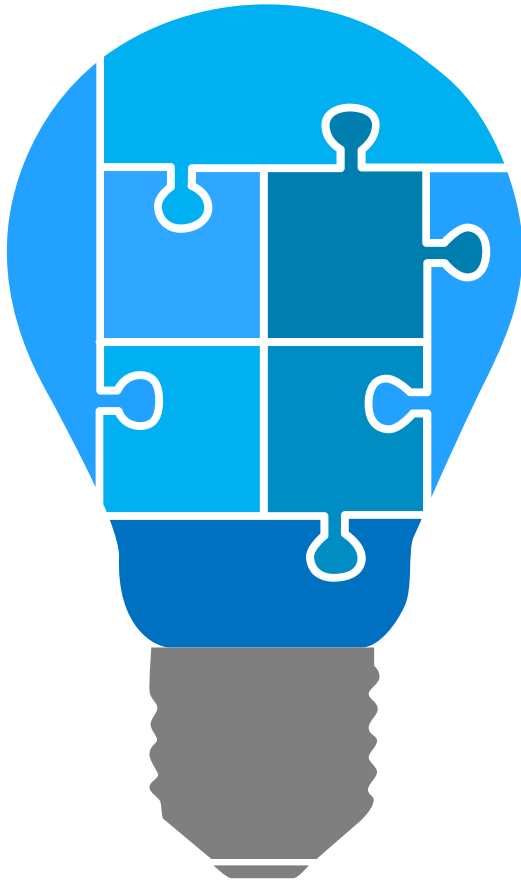


If we are suffering due to difficult thoughts, feelings, or emotions, then we should (and can) avoid, reduce, alter, or eliminate them





# An Alternate Perspective



The normal psychological processes of the human mind (thoughts, feelings, memories) are often destructive, and create psychological suffering for all of us at some point

*If we are suffering, that means we are stuck, not broken or sick*



# An Alternate Perspective



We need a scientific account of human behavior otherwise we default to:

Moral defects, mental defects, or personality defects

*Relational Frame Theory provides us with a scientific account to explain complex human behavior*



# Two Approaches to Self-Management

## Traditional Approach

- Bad thoughts and events are to be suppressed
- Change the content of what is in your head. Aka, what verbal behavior you emit to yourself
- Find alternative ways to minimize contact with distress (new friends, way to school, perfect seat in class)

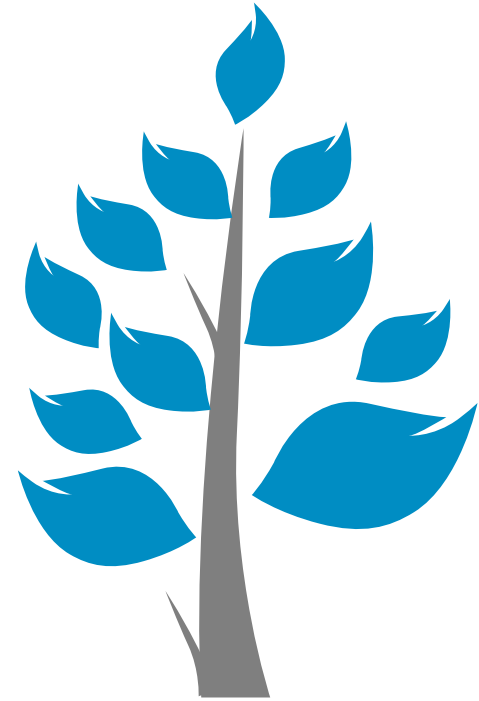
## Acceptance-Based Approach

- Bad thoughts and events are to be accepted
- Leave all the content in your head. Just interact with it differently. Aka, don't follow all those self-rules you easily generate
- Find clear values (reinforcers) that you are really want to work for, and not let the noise in your head (verbal self-rules) get in your way of these values



# Acceptance & Commitment Therapy (ACT)

“ACT is a therapeutic approach that uses acceptance and mindfulness processes, and commitment and behavior change processes, to produce greater psychological flexibility.”





# ACT Perspective on Suffering

**Look to your experience.**

**Have you met anyone who has never experienced ...**

- Sadness
- Fear
- Anxiety
- Negative thoughts
- Scary dreams
- Bad memories



These are normal human experiences  
Our suffering is due to our use of language  
and our attempts to control our internal experiences



# Philosophical & Theoretical Foundations

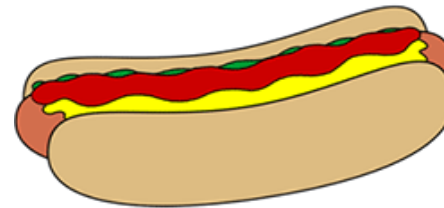
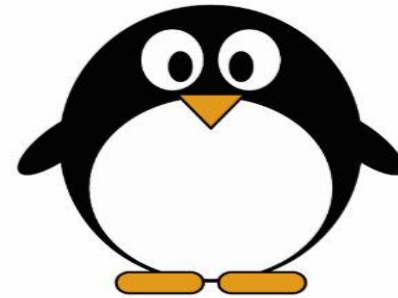
## Acceptance and Commitment Therapy

- Goal is to change the individual's interaction with verbal behavior, not change the content of the verbal behavior
- Aims to change the *function* of verbal behavior

## ACT is rooted in Relational Frame Theory

- Empirical foundation of how humans learn to relate to the world around them
- Most language is derived, not directly taught, and as a result, can be altered via indirect experience. Often through the creation of alternative rules and frames of stimuli





How is the animal like your favorite food?

How is the animal better than the food?

How is the animal the PARENT of the food?



# Philosophical & Theoretical Foundations

## Relational Frame Theory

- We make arbitrary connections (relations) between things.
- Connections are based on history and context



Apple



Tastes  
Yummy



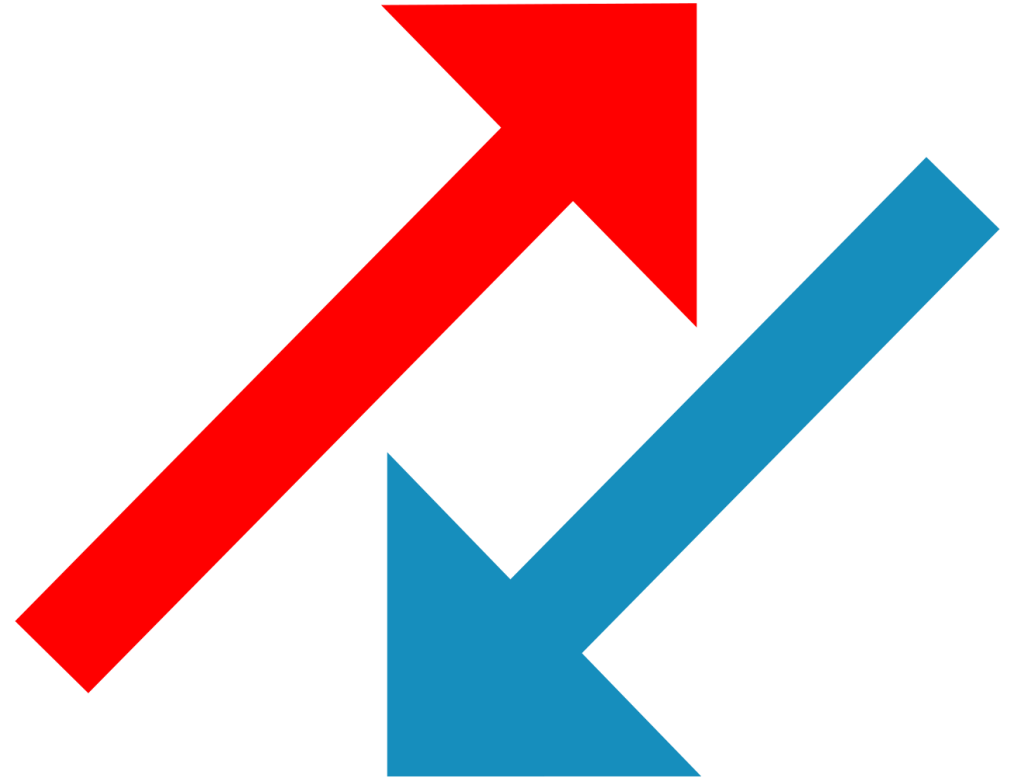
Healthy

*If I say “Sand,” what shows up for you?*



# Relational Frames

- Responding to arbitrary (non-formal) contextual cues in the environment
- How a person responds to the contextual cues (stimuli) in their environment is a result of their history of responding

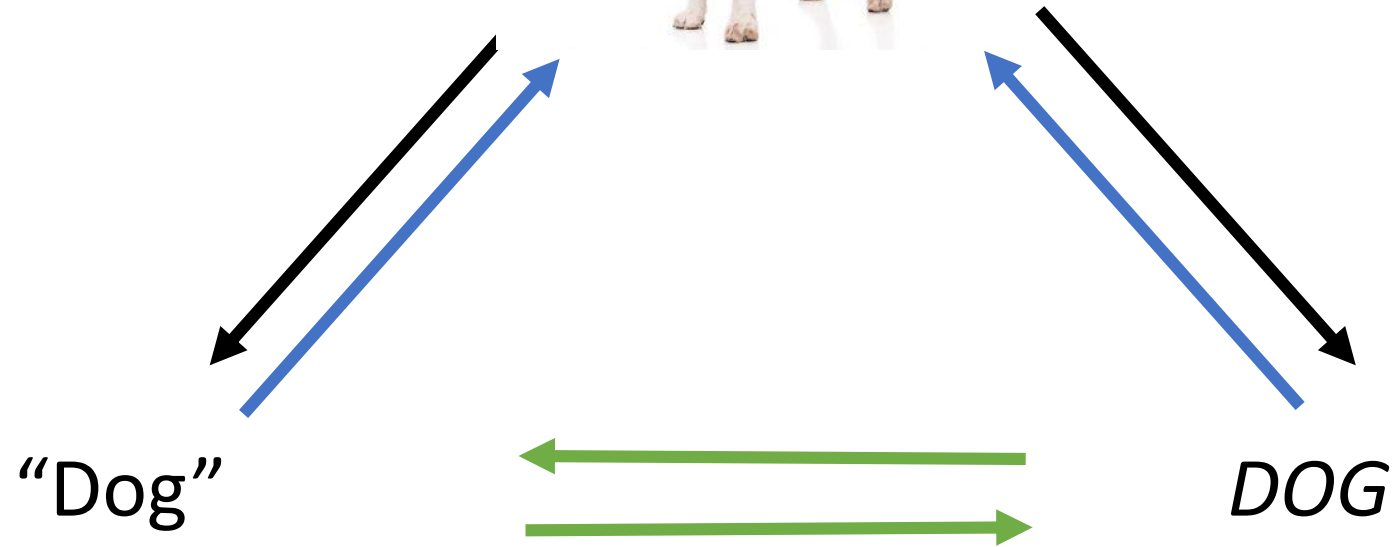




# Derived Relations



**Mutual  
Entailment**



**Combinatorial  
Entailment**



# Relational Frames

- Frames of **Coordination**
  - 'same as', 'similar', 'like'
- **Temporal** and **Causal** Frames
  - 'before and after', 'if/then', 'cause of', 'parent of', and so on
- **Comparative** and **Evaluative** Frames
  - 'better than', 'bigger than', 'faster than', 'prettier than', and so on
- **Deictic** Frames
  - 'I/you', 'here/there'
- **Spatial** Frames
  - 'near/far'
- **Oppositional** Frames
  - 'different as', 'different', 'contrary'



# Transformation of stimulus function

- Transformation occurs when one stimulus is related to another, and the function of the former alters the function of the latter without direct training  
(Dymond & Rehfeldt, 2000)



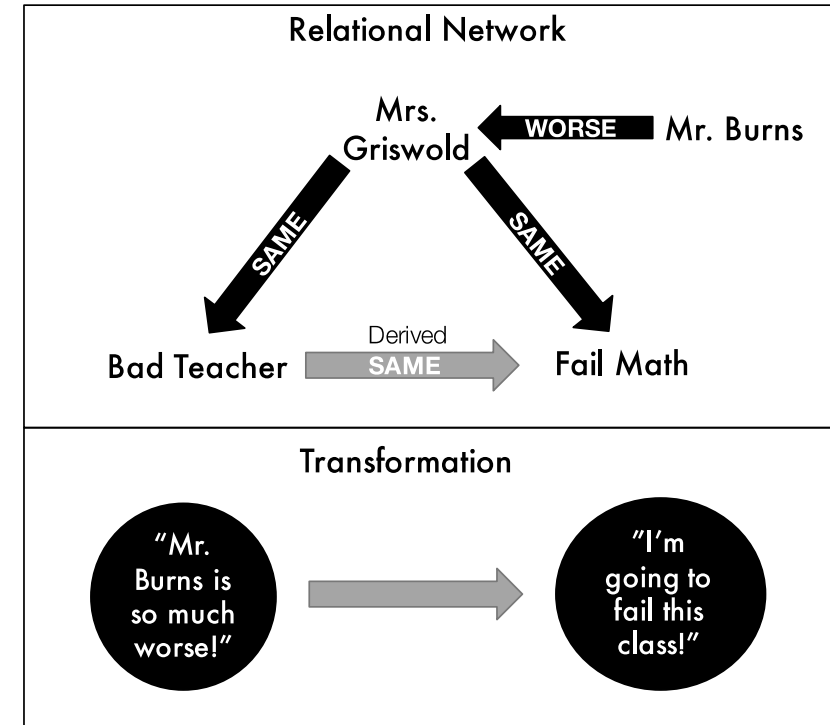
**= 25X MORE CAFFEINE THAN COFFEE**





# Example

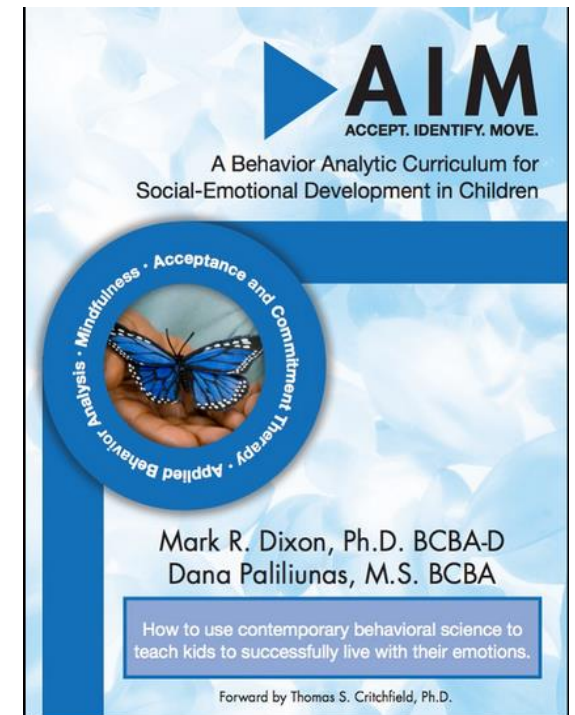
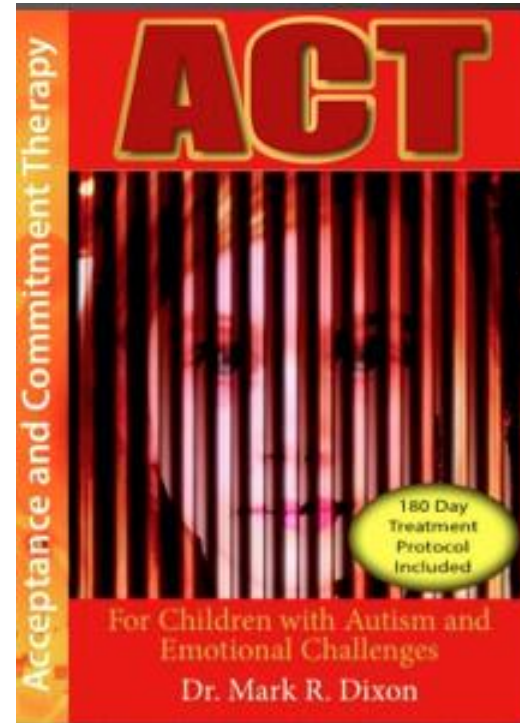
- Imagine a challenging math teacher.
- In fifth grade, a boy had this terribly challenging math teacher, Mrs. Griswold, and struggled.
- Next year, new teacher...someone says, "Oh man, Mr. Burns is SO MUCH WORSE than Mrs. Griswold!"
- The functions of "Mrs. Griswold" transformed the function of "Mr. Burns" with the relation "worse than."
- How might he approach his new math class?





# Advancing to Complex Applications of Language and Cognition

- The advantages of relational responding are plentiful
  - Exponential increases in skills, ability to problem solve, reason, be thoughtful
- But, so are the disadvantages
  - We get entangled in language connections. Some that are irrational.





# What happens when a dog bites you?





# But remember everything isn't just equal...

- Mary has a cat that is meaner than any dog you have ever seen!
- This flu shot hurts more than a dog bite.
- You're acting like an animal!
  - Dogs are animals. Dogs are violent. I am violent.



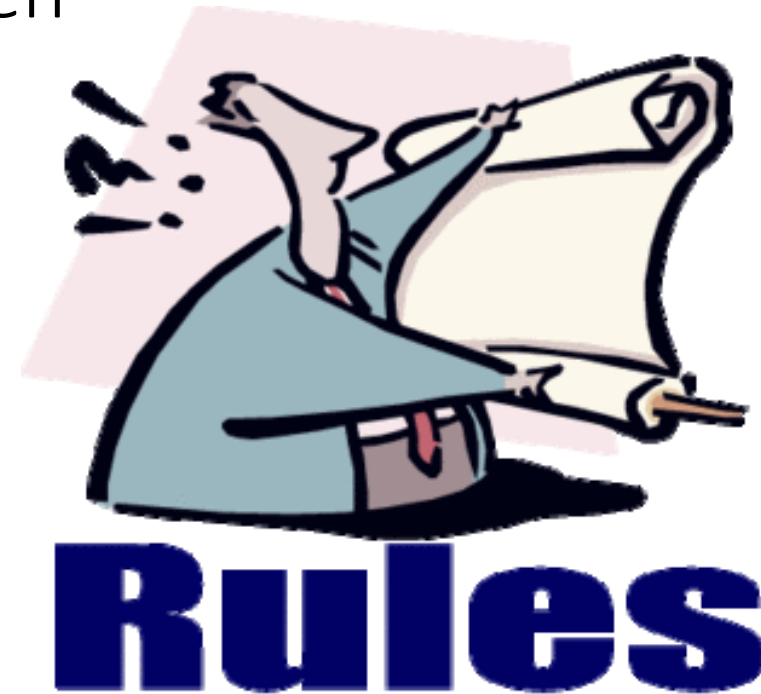
# Or simple...

- When I go to the cafeteria I get bullied. When I get bullied I feel afraid.
  - My friend asks me to go to the mall with them
  - Last time I was in a social setting I was bullied
  - I decline to go to the mall because I'm afraid of being bullied



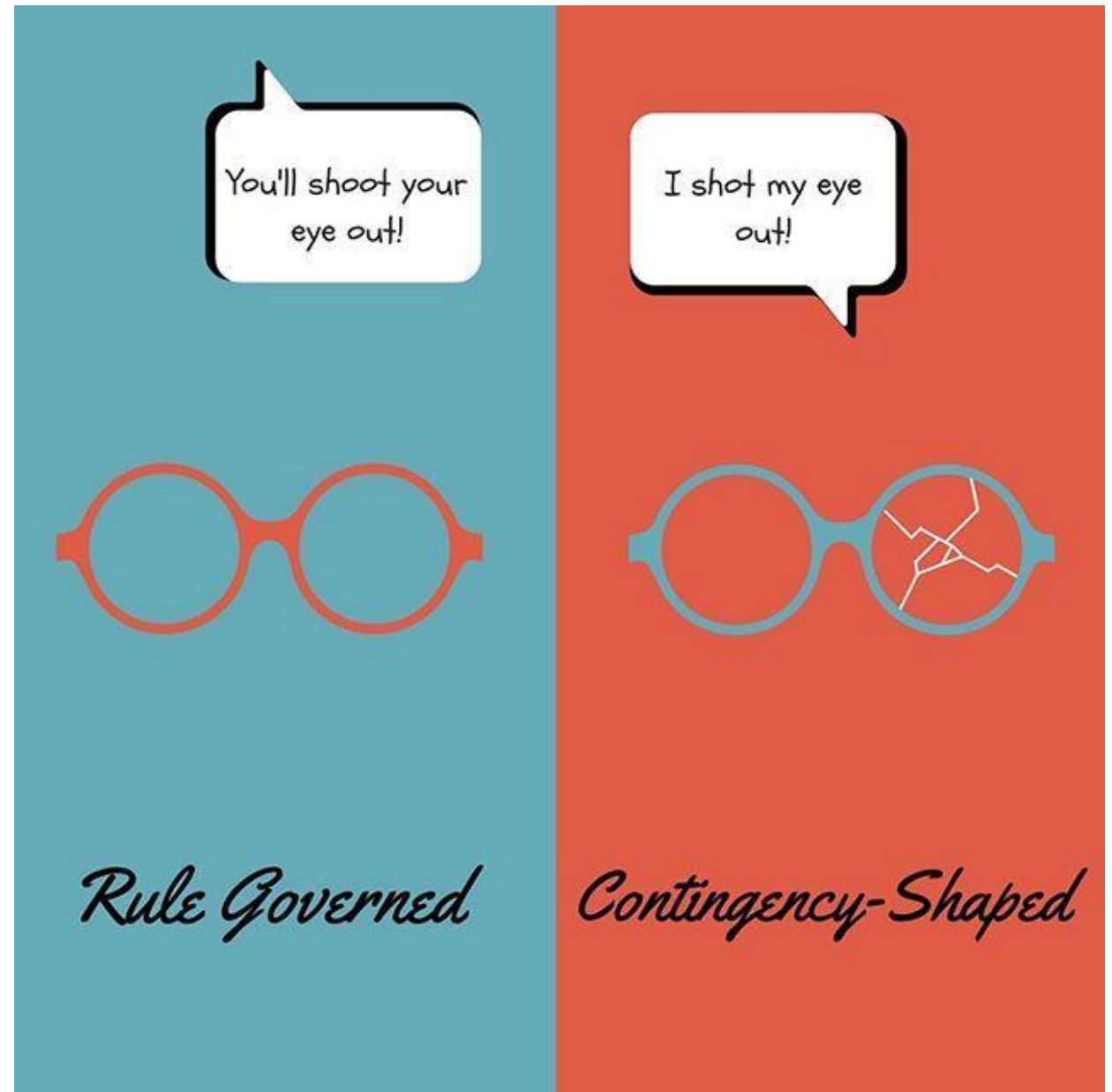
# Rule-Governed Behavior

- Behavior that occurs due to contact with the rule, NOT contingencies the rule describes.
- Rules involve responding conditionally between stimuli that describe antecedents, behaviors, and consequences





# Rule- Governed Behavior vs. Contingency- Shaped Behavior





# Rule-Governed Behavior

- This can be good or bad
  - Verbal individuals do not always respond to programmed contingencies in an expected or preferred way
- Contingency-shaped behavior is likely to remain sensitive to changes in the contingencies, whereas
- Behavior under the control of rules becomes desensitized to the contingencies and the rule is followed even when doing so becomes maladaptive
- Can we see how this might backfire on us? So what do we do?



If our environment AND our  
language effects the way we  
behave...

...then our behavior  
interventions need to  
address our environment  
AND our language.







## Intervention

The stuff that makes us anxious, sad, and worried is rarely the actual stuff itself

Instead it's our verbal interactions that are far removed from the actual stuff



# What Can I Delete from Your Life



## And how long has it been with you



What if it will never go away



How do you want to live your life



# Psychological and Social-Emotional Needs

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Students who have language skills grapple with these same problems

At their own developmental, skill, cognitive level

Our interventions need to address these complex behaviors to be effective





# Language of Treatment vs Behavior Analysis

## “Mindfulness/Defusion/etc”

- Discriminate between stimuli/events occurring privately vs. within current external environment
- Train attending to current environment when private verbal behavior is not adaptive
- Determine the function of private events/verbal behavior
- Reduce excessive/ineffective rule-governed behavior

## “Values/Committed Action”

- Identify personal reinforcers
  - Abstract these to general verbal descriptions
- Discriminate between behavior that accesses reinforcers and that which do not
- Goal set, self-monitor behavior
- Perspective taking
- Increase optimal choice-making
- Create larger patterns of behavior that are related to reinforcers



# PSYCHOLOGICAL FLEXIBILITY

## What is it?

The ability to engage in adaptive behavior depending on the present environment in order to more successfully obtain reinforcers.



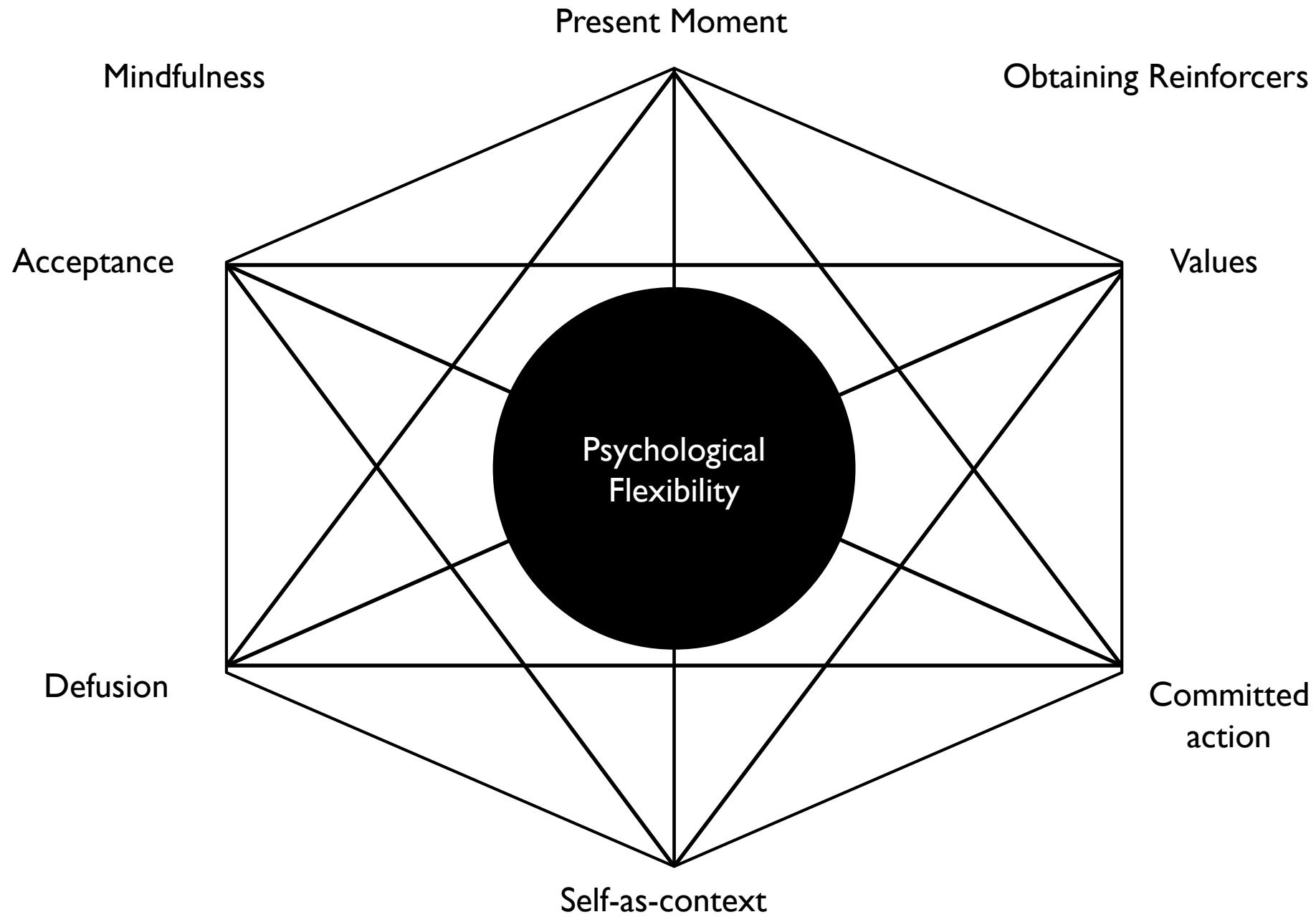


Adaptive,  
Flexible  
Behavior

GOAL



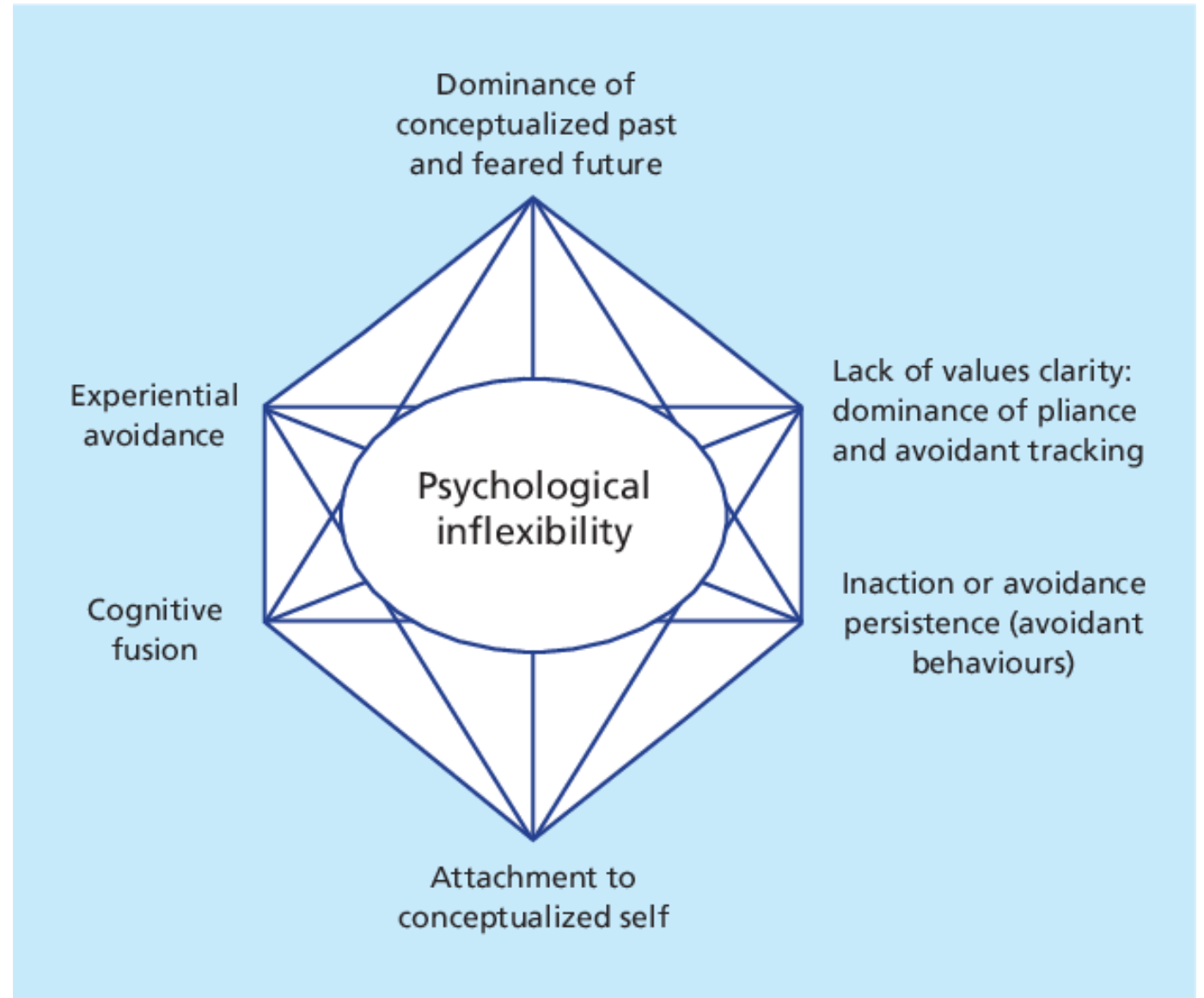






# Psychological Inflexibility

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# Present Moment Awareness

- Engaging the individual with his/her experiences with the world directly
- Develop awareness of thoughts, feelings, sensations
- Meditation and mindful breathing activities are commonly used



# Acceptance

- Develop willingness to experience external and internal experiences, fully and without judgment
- Practice engaging in thoughts the individual might otherwise avoid
- Increase ability to tolerate both good and bad outcomes





# Try It!

**Pull out a piece of paper...**

**On one side, write down a thought or feeling you try to push out of your life or wish you could never experience again.**

**Now, flip it over, and on the other side, write down the most meaningful or fulfilling thought or feeling you experience.**

**Crumple up the paper...**





# Defusion

- Encourages the individual to let go of the need to control/eliminate distressing thoughts/experiences
- Instead, change the way they interact with the thought/feeling
- This lessens the effect of thoughts on behavior





# Try It!

**Think of one word brings you a lot of pain, discomfort or suffering in your life.**

**For 30 seconds, everyone in this room is going to say that word out loud to themselves over and over and over again – all at the same time.**

**What happened to that word?**





# Self-as-Context

- Develop and harness the individual's ability to take perspectives
- Make a distinction between self-as-content and self-as-context
- Bring awareness to experiences without attachment to them
- Move from evaluating to describing





# Brief Observing Self Exercise I

- Close your eyes. Notice: where are your thoughts? Above you, behind you, in front of you, to one side? Inside your head or body?
- Are they pictures, words or sounds? Moving or still? What speed & what direction?
- There are your thoughts – and there ‘you’ are, observing your thoughts.
- Your thoughts keep changing. The ‘you’ that observes them does not change.
- This gets your mind whirring/ debating/ analyzing – so let’s do that again. Notice: where are your thoughts? (*Repeat as needs*)



# Brief Observing Self Exercise 2

- Notice how you're sitting (5 secs)
- Notice what you can see (5 secs)
- Notice what you can smell and taste (5 secs)
- Notice what you can hear (5 secs)
- Notice what you're thinking (5 secs)
- Notice what you're feeling (5 secs)
- Notice what you're doing (5 secs)
- *There's a part of you in there notices everything you see, hear, touch, taste, smell, think, feel, or do ... is it good, bad, or 'just there'?*



# Brief Observing Self Exercise 3

- Notice how you're sitting (5 secs) *And as you do, be aware that you're noticing (10 secs)*
- Notice what you can see ... *And as you do etc.*
- Notice what your mind is saying .. *And as etc.*
- Notice what you can smell and taste ... *And etc.*
- Notice what you can hear .... *And as etc.*
- Notice what you're thinking .... *And as etc.*
- Notice what you're feeling .... *And as etc.*
- Notice what you're doing .... *And as etc.*
- Notice what thoughts you're having ... *And etc.*





# Values

- Intangible outcomes of purposive action that are meaningful to the individual
- Not the same as goals or objectives
- Embody the overarching sources of reinforcement in the individual's life
- Increase the clarity of values to the individual



# Try It!

**Draw 2 tombstones...**

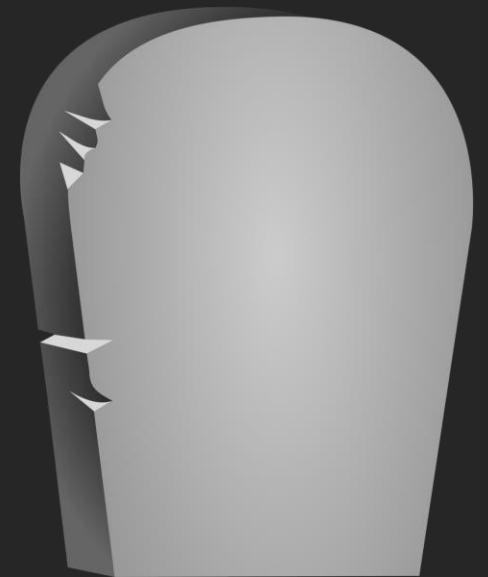
**In the first, write down some thing that you try to control**

**– EX: “Here lies Barb. She never showed her vulnerability to anyone.”**

**In the second, write down some thing that is very important to you**

**-EX: “Here lies Barb. She was a dedicated educator.”**

**How would you prefer to be remembered?**





# Committed Action

- Develop larger and larger behavior patterns that are linked to values
- Increase access to reinforcement
- May focus on skill acquisition, shaping, and goal setting







## Is ACT Really Evidence Based?

- Over 200 Randomized Controlled Trials
- Hundreds of related empirical demonstrations (i.e. acceptance, values, RFT)
- National Institute of Health: Evidence-based Practice



# Overview of Research: Adults

- Individuals with:
  - General mental health needs, stress, addictions, depression, psychosis, anxiety disorders, chronic pain, diabetes, cancer, OCD, racial prejudice, weight loss needs, etc.
- Settings:
  - Workplaces, organizations, schools, communities, inpatient clinics, outpatient clinics, etc.





# Overview of Research: Children

- Outcomes include:
  - Reduction in psychological disorders, changes in problem behavior, and increase in quality of life for children





# ACT & Attention

- Rationale: Would the ACT content have an impact on sustained attention in elementary-aged children?
- Subjects: RCT - 20 treatment / 20 control
- Ages 6-12yrs old.
- Procedures:
  - Baseline: Completion of 3 attention tasks (all 40 subjects)
    - CPT-X
    - Go-no-Go
    - Visual Cancellation



# ACT&Attention

- Treatment Condition (20 subjects)
  - 6 sessions of activities from an ACT intervention (Dixon 2014)
  - 20 min each session
  - Group Setting with clinician
    - Days: 24, 27, 28, 37, 79, 168
- Post-Test
  - All 3 pre-tests were completed by all 40 subjects



# Task I: CPT-X

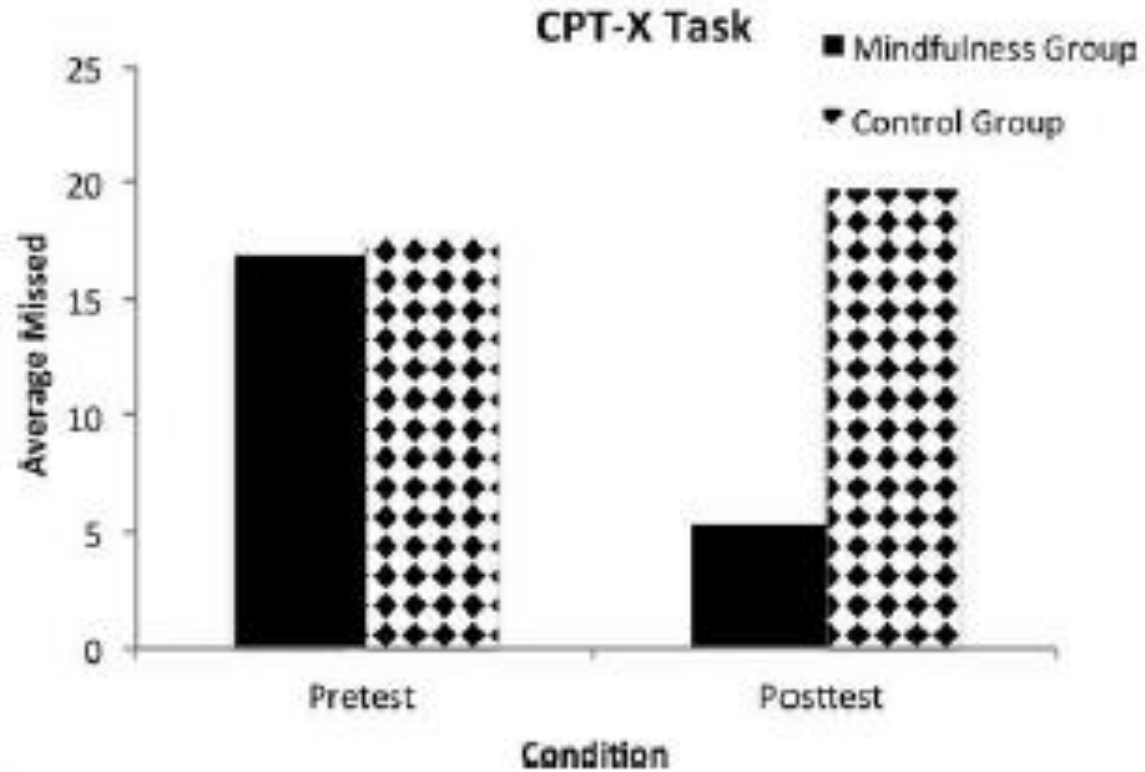
One of the following letters  
displayed on the computer screen

A, E, F, H, L, N, T, V, X, Y, Z

Press 1 when you see X.

Press 2 when you see any other  
letter





**Figure 1.** The average number of misses across pretest and posttest conditions for the experimental and control groups for the CPT-X Task.

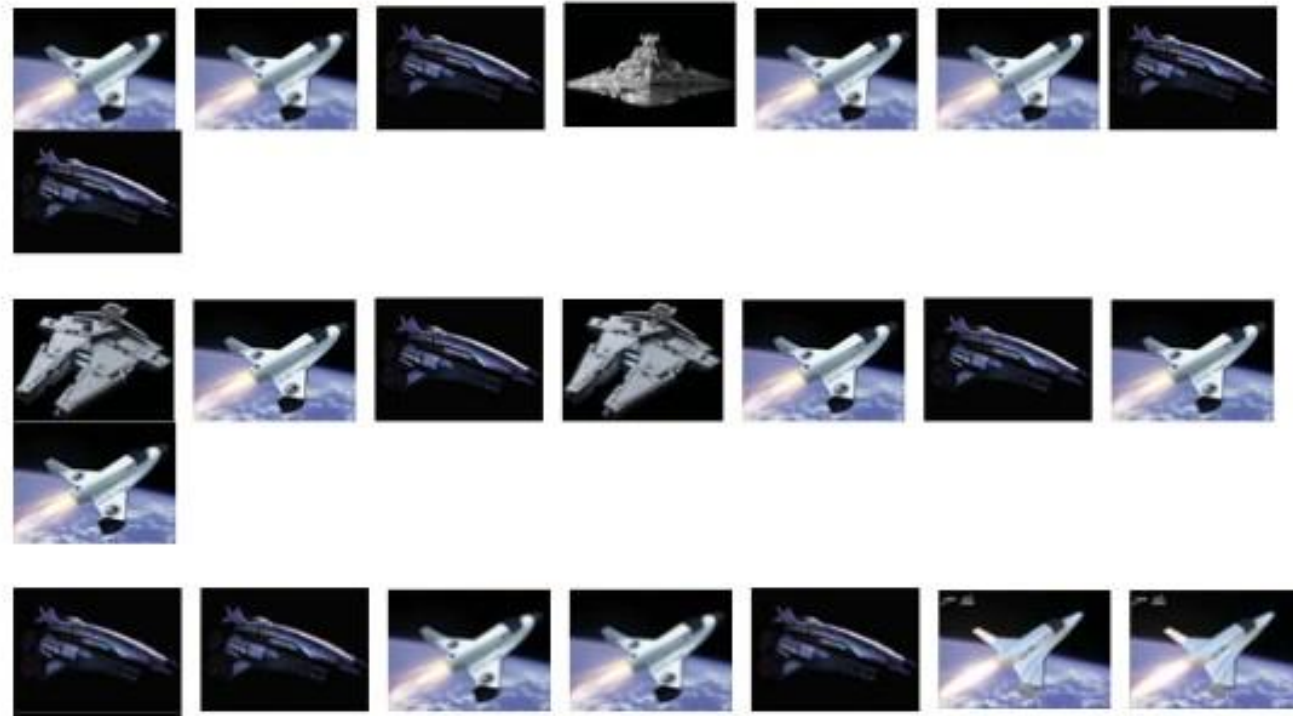
The results did show significance between the experimental ( $M = 1.35, SD = 1.98$ ) compared to the control group ( $M = 6.35, SD = 5.18$ ) at posttest  $F(1, 38) = 16.23, p = .000, \eta p^2 = .299$ .



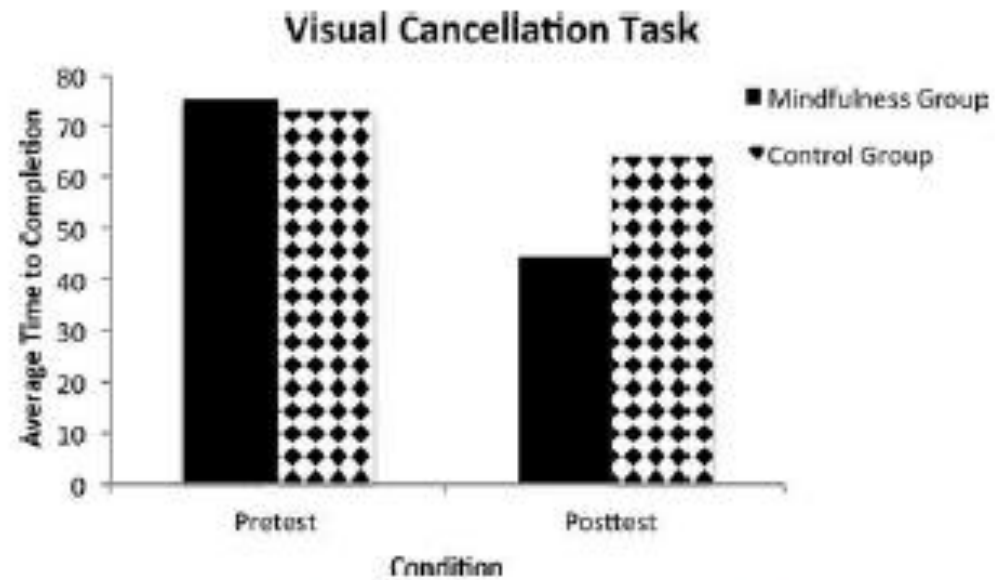
## Task 3: Visual Cancellation

Instructions:

- Put a dot on the “target” (two identical spaceship images)
- Go through the task as fast as you can







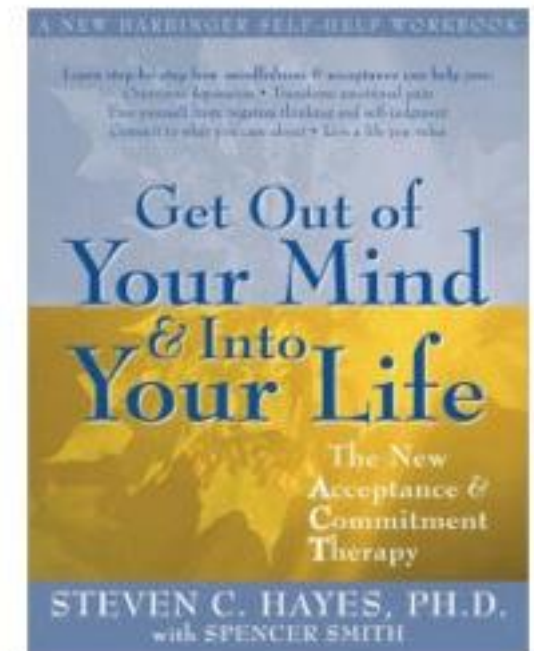
**Figure 5.** The average time to completion across pretest and posttest conditions for the experimental and control groups for the Visual Cancellation Task.

The results did show significance between the experimental ( $M = 44.51$ ,  $SD = 11.78$ ) compared to the control group ( $M = 64.27$ ,  $SD = 26.10$ ) at posttest  $F(1, 38) = 10.82$ ,  $p = .002$ ,  $\eta p^2 = .231$ .

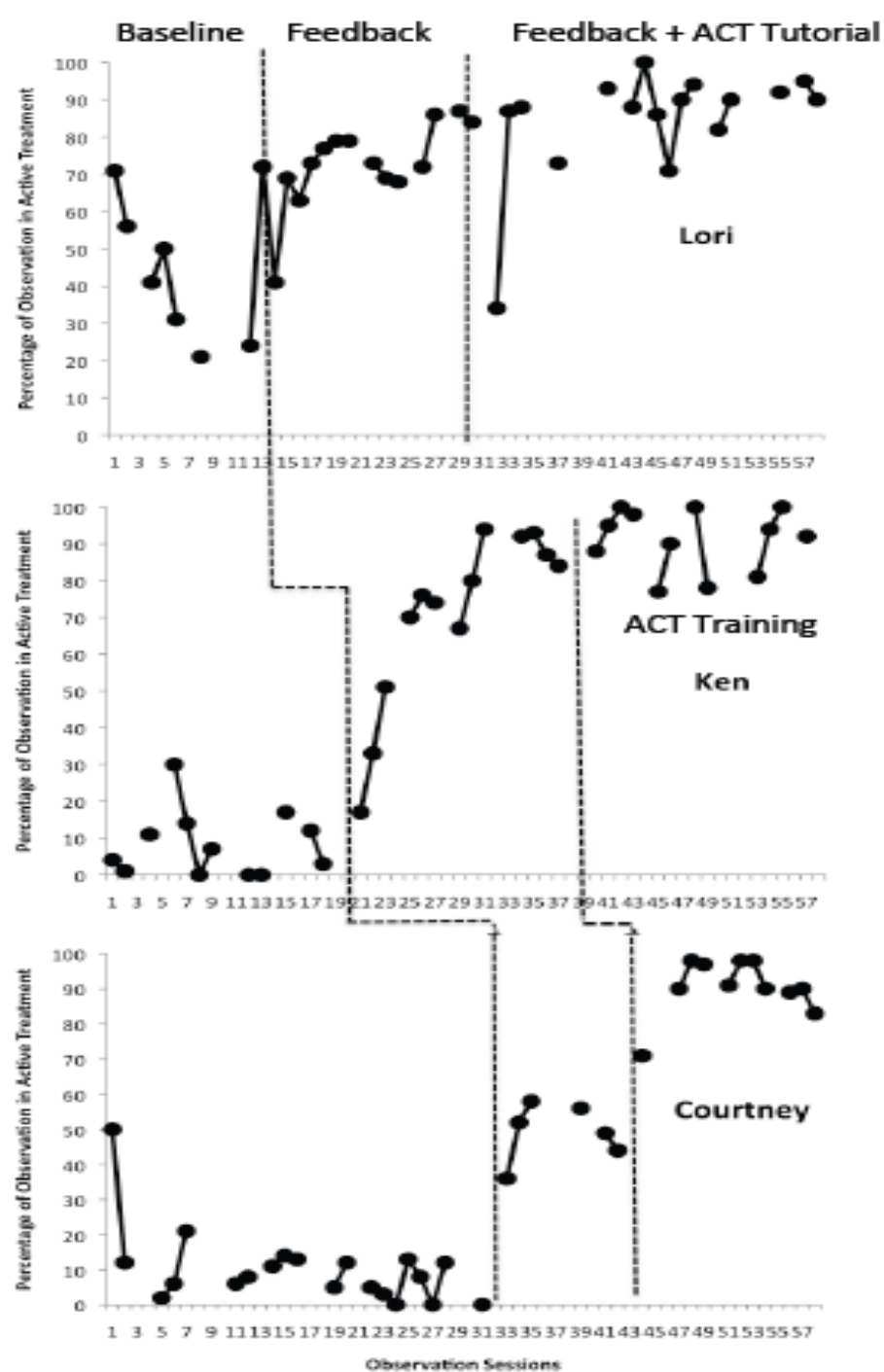


# BST, ACT, and Job Performance

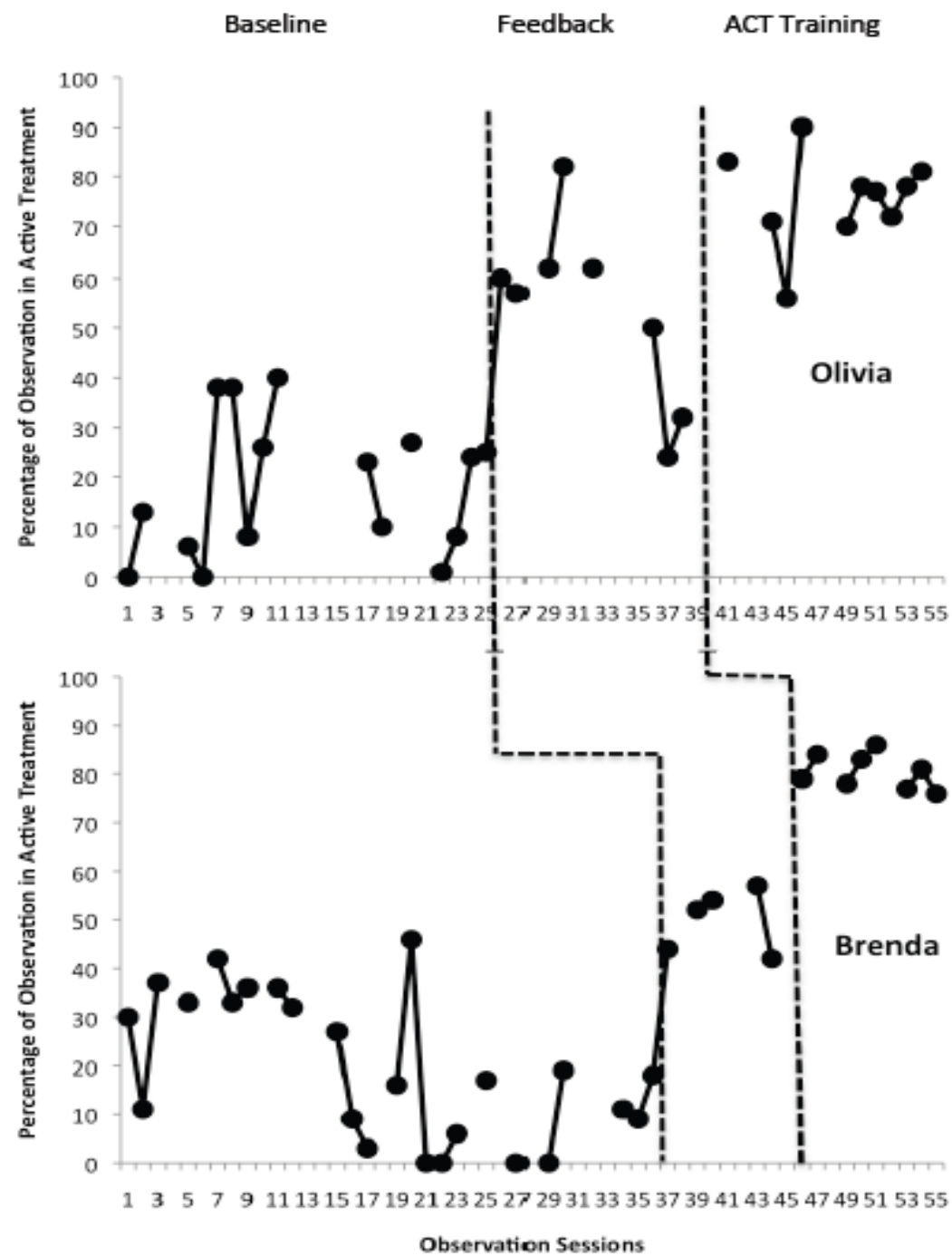
- Single-subject investigation examining verbal performance feedback and 8 hour version of ACT training program
- Participants
  - 5 direct care staff employed working with children with autism day/residential:
- Experimental Design
  - Multiple baseline design across participants (A-B-BC)
    - A = Baseline
    - B = BST 3x or more/week
    - C = ACT training program
- IV – Two 4-hour training sessions of working through self-help book
- DV Measures
  - Percent of time engaged in active treatment
  - Percent of operant teaching skills



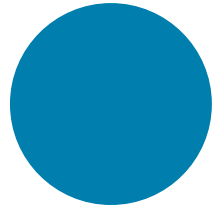
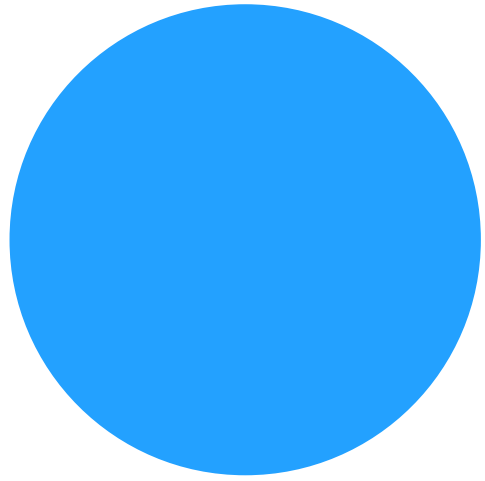












Scope of Practice





# Scope of Practice: The BCBA

Clinical Psychologist  
Licensed Therapist  
Social Worker

Behavior Analyst

Substance Use  
Anxiety Fearful  
Depression ADHD Sexual Abuse

Bullying Self-Injury Property Destruction  
Avoidance Work Refusal No Friends  
Verbal Aggression Throwing Items Spitting

Unseen, diagnoses, & not measurable

Visible, measureable, & countable

Are these convenient ways of labeling  
actual behavior?

Yes → Redefine and treat the outcome  
behaviors  
No → Ensure appropriate care by  
trained professional.

Are these simplistic ways of labeling  
actual clinical disorders?

Yes → Refer for appropriate care by  
clinically trained professional  
No → treat using ACT and ABC  
analyses



# Student Behaviors

## Scope of Practice: The Educator

### Related Service Providers

Audiology    Speech Impediments  
Fine motor skills    Neglect  
Anxiety    Medical Needs

Help student benefit from special education services; address specific skill areas

Are any of these manifesting in behavior in class that impede learning?

Yes -> Redefine and treat the outcome behaviors  
No -> Ensure appropriate care by trained professional.

### Educator

Bullying    Taking Items    Disrespect  
Talking Out    Work Refusal    Inattention  
Lying    Inappropriate Language    Tardiness

Visible, measureable, & countable; may interfere with classroom learning

Are these symptoms of an actual clinical disorder that requires additional treatment?

Yes -> Refer for appropriate care by trained professional  
No -> treat using ACT and ABC analyses



Content Item	Description on BACB/BCaBA Task List (5 <sup>th</sup> ed.) & ACT Connection
F-3	<p>Identify and prioritize socially significant behavior-change goals</p> <ul style="list-style-type: none"> <li>•The ACT focus is entirely rooted in selecting pragmatic goals for the client; all behaviors targeted for intervention directly relate to the client's natural environment, and therapeutic goals must relate to adaptive, flexible behaviors.</li> </ul>
G-1	<p>Use positive and negative reinforcement procedures to strengthen behavior</p> <ul style="list-style-type: none"> <li>•The "Reinforcer Core" of the ACT model emphasizes contingency management, and incorporates reinforcement procedures to strengthen adaptive, flexible behaviors.</li> </ul>
G-2	<p>Use interventions based on motivating operations and discriminative stimuli</p> <ul style="list-style-type: none"> <li>•ACT intervention conditions natural environmental stimuli as motivating operations evoking adaptive, flexible behavior, and reduces the influence of delayed reinforcement on current behavior, increasing the saliency of discriminative stimuli for delayed reinforcers and their potency.</li> </ul>



G-6	<p>Use instructions and rules</p> <ul style="list-style-type: none"><li>•ACT addresses problem behavior that is the result of rule-governed behavior that maintains maladaptive and inflexible behavior. As well, ACT will develop instructions and rules that occasion the occurrence of adaptive, flexible behavior.</li></ul>
G-10.	<p>Teach simple and conditional discriminations.</p> <ul style="list-style-type: none"><li>•Both the "Mindful Core" and "Reinforcer Core" require instruction in simple and conditional discriminations. For example, the client must learn to discriminate between stimuli present in the environment and those in their verbal behavior, as well as the distinction between "literal" and "nonliteral" thoughts. As well, the client must discriminate between behavior related to values and behavior that is not related to values.</li></ul>
G-19	<p>Use contingency contracting</p> <ul style="list-style-type: none"><li>•The "Reinforcer Core" relies on both therapist and client input in the development of contingency contracts related to the client's valued behavior and therapeutic goals. These contracts will be monitored by both the therapist and the client to evaluate therapeutic outcomes.</li></ul>

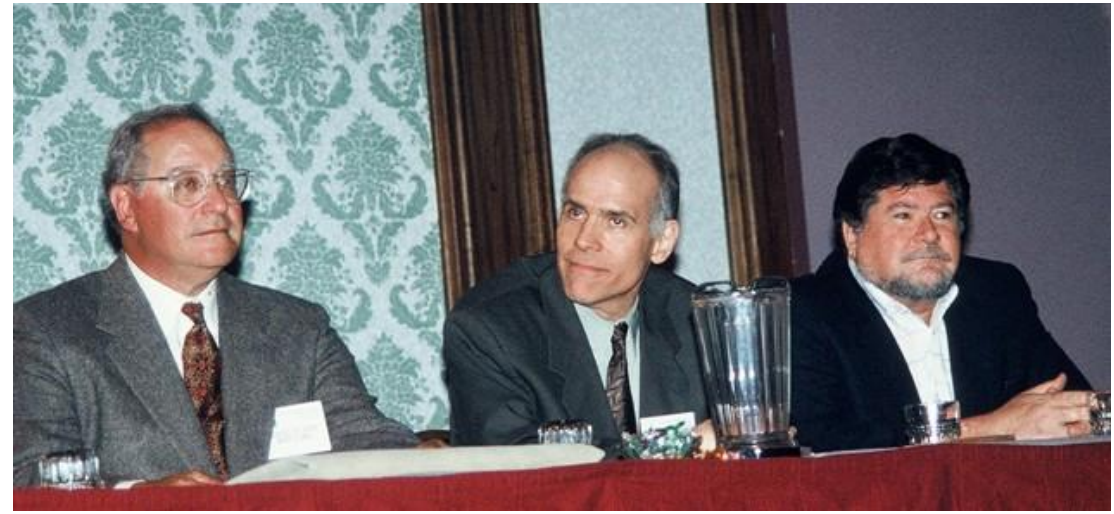


G-20	<p>Use self-management strategies.</p> <ul style="list-style-type: none"><li>•As part of the “Mindful Core,” clients will learn to monitor their own behavior in order to learn when to implement therapeutic techniques (i.e. defusion); he or she will need to discriminate between behavior that is “mindful” and behavior that is not, and respond accordingly. As part of the “Reinforcer Core,” clients will learn to monitor their own behavior related to valued outcomes, and implement self-management strategies in order to increase adaptive, flexible behavior, and evaluate their own progress.</li></ul>
G-22	<p>Use procedures to promote maintenance.</p> <ul style="list-style-type: none"><li>•Although ACT exercises may occur in analog settings, transfer to the natural environment is a key component of ACT. The overarching therapeutic goal of ACT is the development of an operant that includes adaptive, flexible behavior, which is mediated by both natural environmental contingencies and the clients’ verbal behavior.</li></ul>

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# Baer, Wolf, & Risley (1968)



- **Applied:** Socially meaningful
- **Behavioral:** Focuses on overt behavior
- **Analytic:** Attempts to demonstrate experimental control
- **Effective:** Produces large, clinically significant effects
- **Technological:** Procedures described clearly for replication
- **Conceptually systematic:** Based on behavioral principles
- **Generality:** Produces generalized behavior change



# Know, understand, and follow all rules and laws when designing, implementing, and delivering any sort of service / treatment.

- ACT is rooted in behavior analysis
- ACT is an extension of RFT
- ACT has been used as a psychotherapy approach
- You are not a psychotherapist
- ACT can be used as a staff training technique, but you should not become a therapist to your staff
  - Same for parent training, teacher training, and student-training
- RFT and ACT (as a self-rule changing, goal setting, self-monitoring, and contingency management approach) are within your world

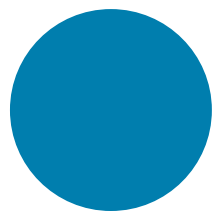
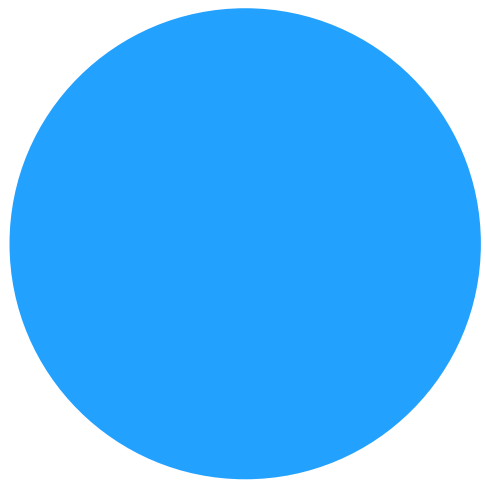


# Note (You know this already):

Refer	Refer to ethical and practice guidelines
Practice	Practice within your own competence
Seek	Seek training/consultation as needed







# AIM Components



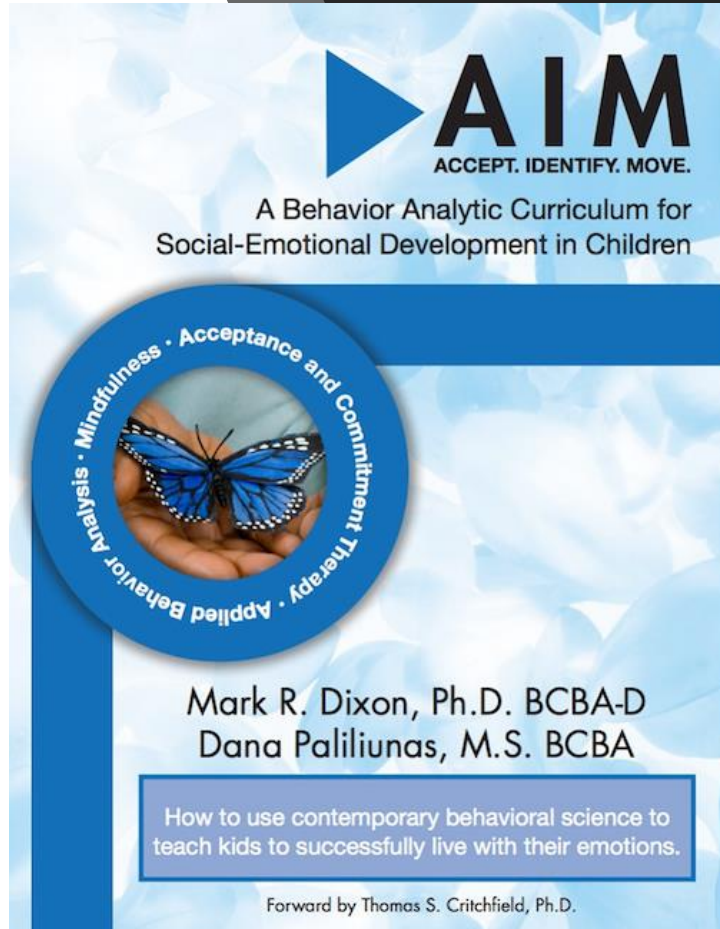




How do we build ACT-based  
behavioral intervention?



# WHAT IS AIM?



- Method for managing behavior while teaching social-emotional skills
- Teach children with to manage their behaviors, and the daily struggles with life they must navigate
- Blends together the concepts of Mindfulness, Acceptance and Commitment Therapy, and Applied Behavior Analysis.
- Incorporates cutting edge techniques in behavior analysis for a complete
  - Instructional curriculum
  - Behavior management system
  - Data management system



# ELEMENTS OF MINDFULNESS

## Awareness

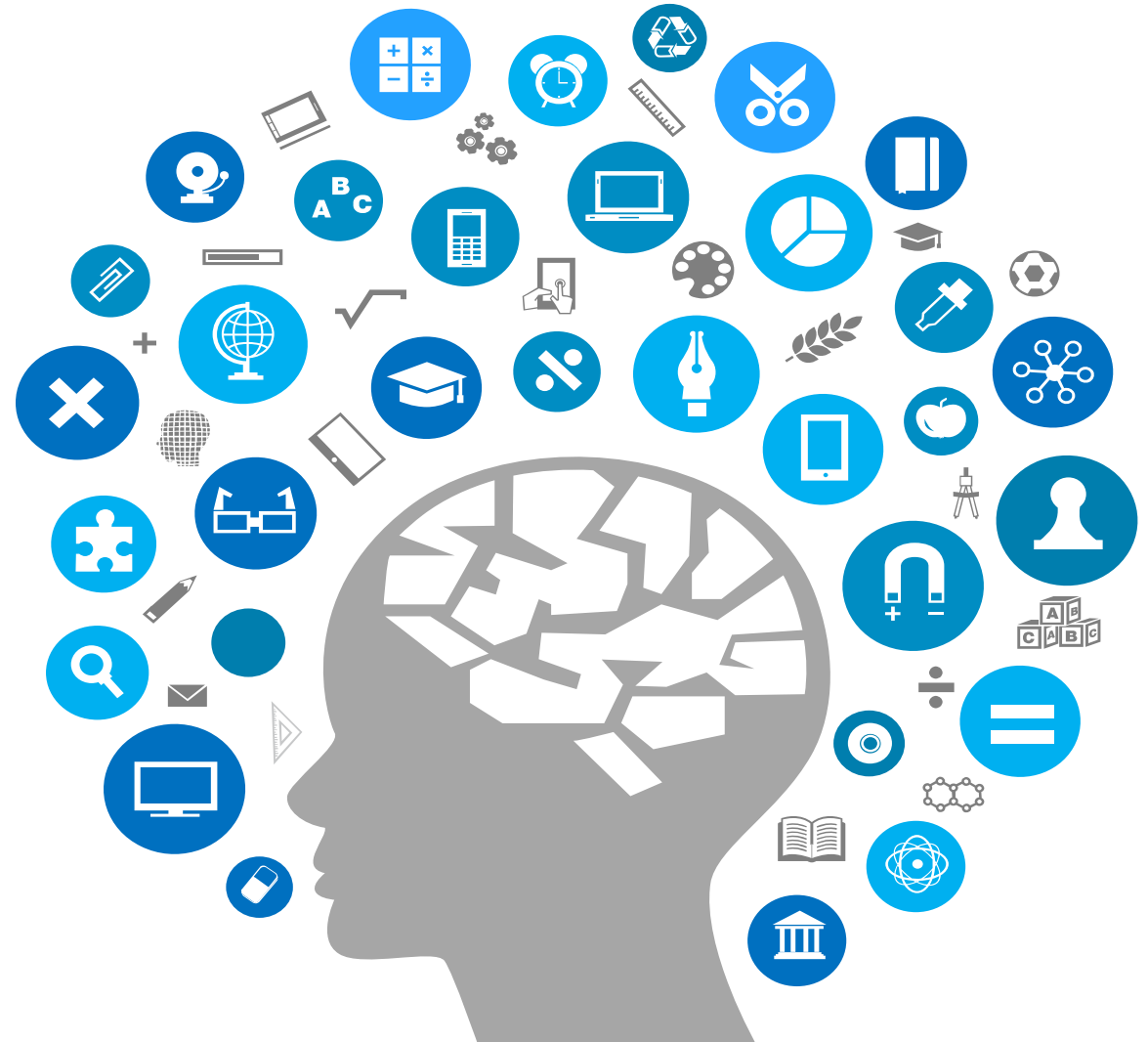
Focus your attention on one thing at a time, including awareness of yourself and all the stimuli within and around you

## Nonjudgmental Observation

Looking at your experiences in a non-evaluative way, simply looking at things objectively as opposed to labeling them

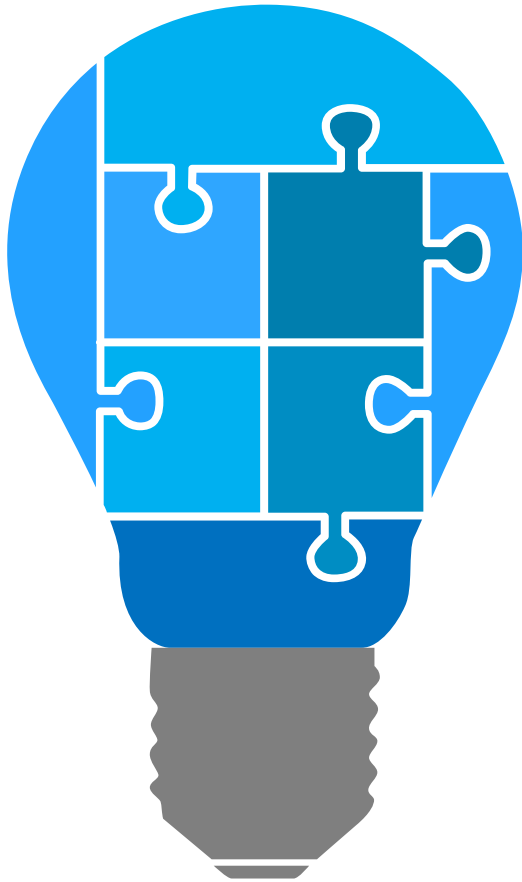
## Present Moment

Being in touch with the present moment as opposed to being caught up in thoughts about the past





# WHY MINDFULNESS?



Research has demonstrated the benefits of mindfulness in many areas, including:

- Anxiety
- Chronic Pain
- Depression
- Physical health
- Self-control
- Behavior and emotional regulation
- Attention/focus
- Empathy/compassion
- Increased attendance and grades



# Mindfulness and Kids?

- “Mindfulness is awareness that arises through paying attention, on purpose, in the present moment, non-judgmentally.” (John Kabat-Zinn)
- This sounds hard, especially for students!
- Practice mindfulness is cumulative, so take small steps and practice, practice, practice
- Goal is to engage in mindfulness as part of everyday life, not be a perfectly mindful person all the time





# PRIMARY DIMENSIONS of ACT

## Mindfulness:

- Getting into the present.
- Focus on creating new verbal behavior which is needed to change the behavior of the child

## Reinforcer Seeking:

- Finding things you value, and engaging in behavior to obtain those reinforcers
- This is all behavior analysis

## Application:

- Six separate components of ACT intervention are utilized to increase both mindfulness and access to reinforcement





# Present Moment

- Objective: Living in the here and now
- Challenge: Relational responding removes us from physical stimuli to functional relations between stimuli (and the rabbit hole opens)
- Kids: Predisposed to fixate on certain stimuli in environment (even verbal stimuli)
- Approach: Redirection to physical world, noticing stimuli elements that were not attended to, reminding of values







# Acceptance

- Objective: Tolerating both good and bad (obtaining reinforcers and losing reinforcers)
- Challenge: Sooner smaller consequences override larger later consequences
- Kids: Impulsive behaviors come at the cost of obtaining bigger better things
- Approach: Bringing delays into the present. “Bad” stuff is ok. Fighting bad stuff wont make it go away.











# Defusion

- Objective: Stepping back from thoughts and noticing them as not part of self
- Challenge: Discrimination between a thought and the literal world
- Kids: Thoughts become preservations and inability to discriminate truth from thought
- Approach: Making thoughts silly, accepting that noise in head is just noise







# Self

- Objective: Finding the real you that moves beyond different contexts
- Challenge: Feels confusing
- Kids: Abstract concept to think about thoughts as separate from yourself
- Approach: The story we tell ourselves versus the "us" that experiences things









# Values

- Objective: Moving life in a direction of value and worth
- Challenge: Too far in future and too delayed
- Kids: Abstract concept, and is at odds with more immediate reinforcers
- Approach: Re-configure values as “stuff” that can be bigger than physical things as child becomes more advanced











# Committed Action

- Objective: Keep engaging in behavior that moves towards values
- Challenge: Easy to give up. Once a failure....
- Kids: Don't like to lose. Failure is a cue for more failure
- Approach: Its ok to mess up. Its ok to be a gigantic mess today. No consequences from prior days.

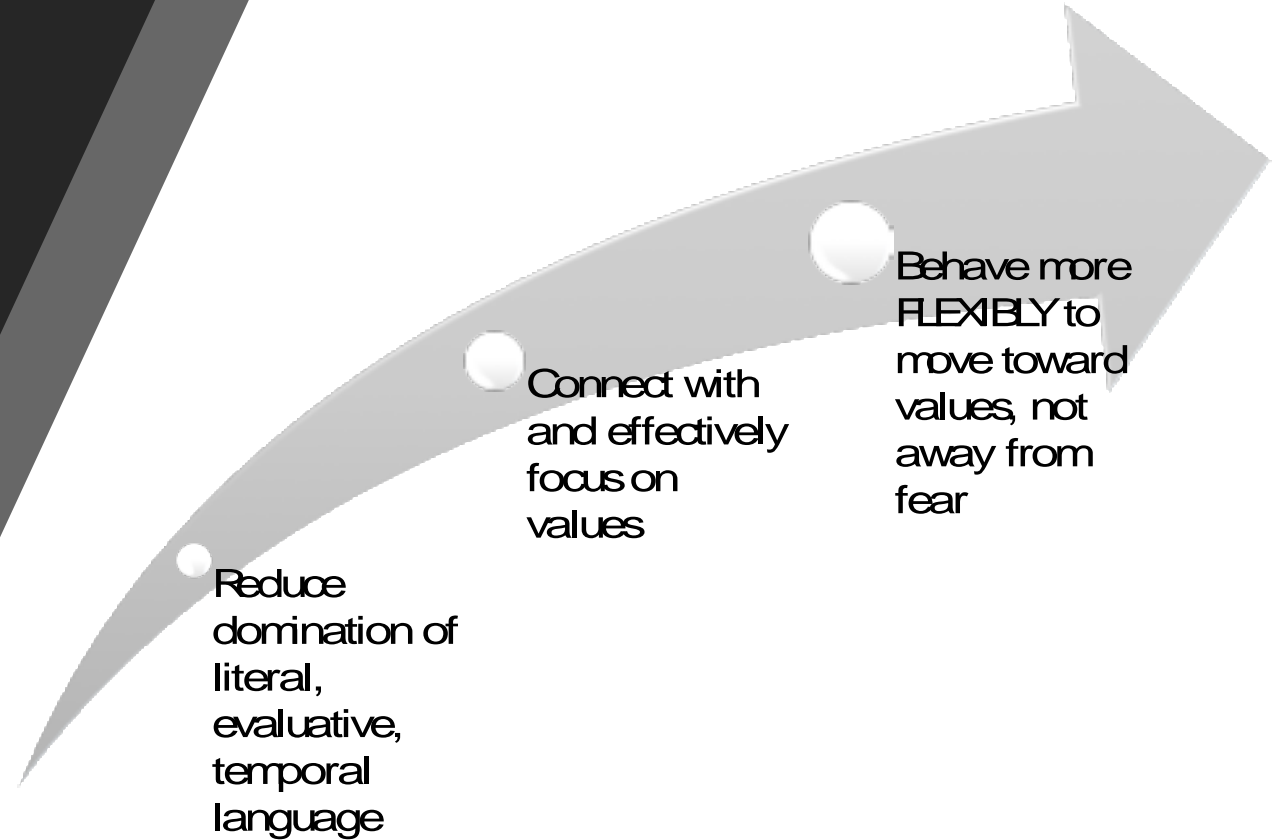






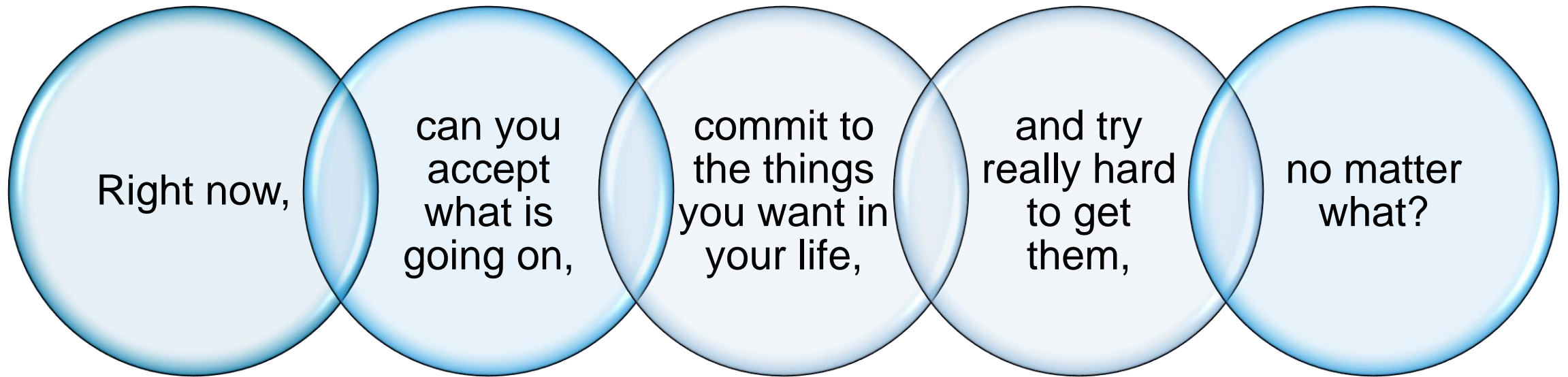
# Additional Considerations

- Focus on behavioral inflexibility that arises from language processes
- Make activities more concrete & physical
- Increase experiential activities
- “Translate” ACT concepts to kid-language



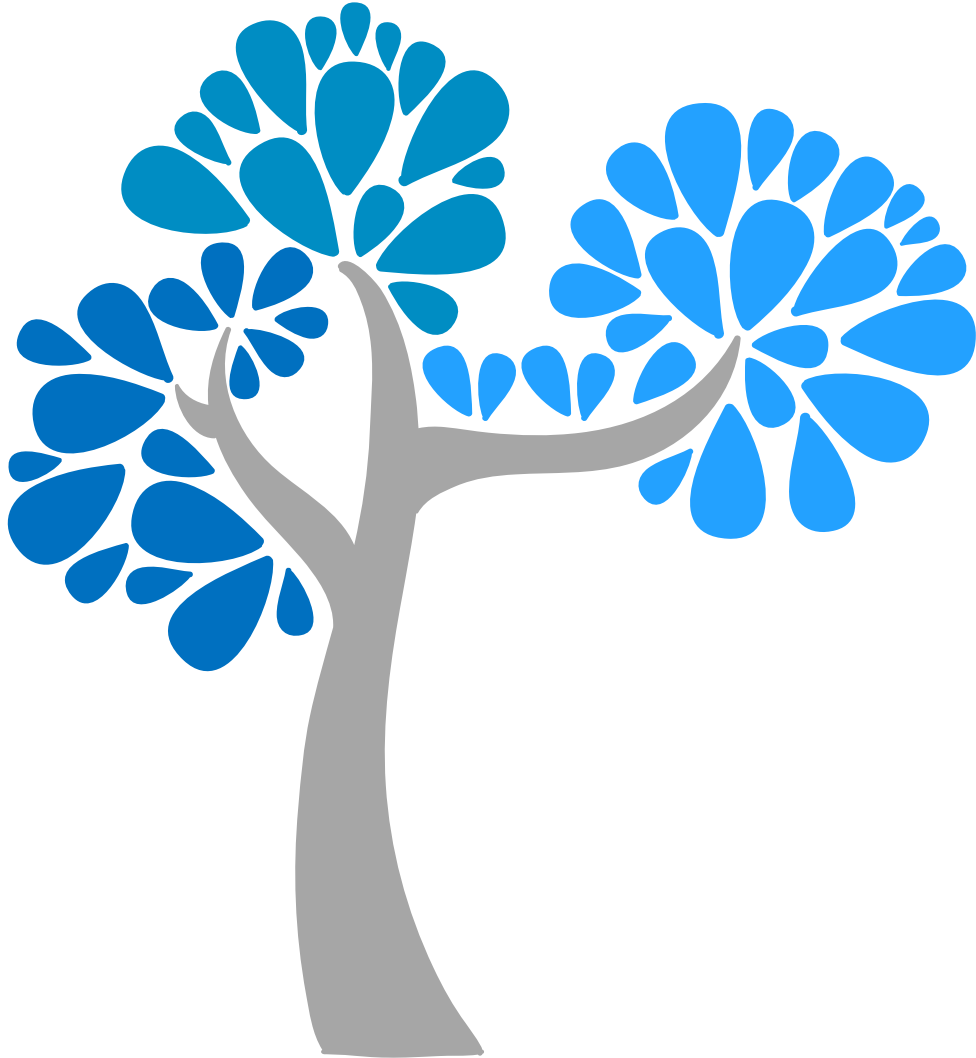


# THE ACT QUESTION – FOR CHILDREN





# APPLIED BEHAVIOR ANALYSIS



- A way to analyze human behavior that demonstrates it is orderly and predictable
- Functional understanding of behavior:
  - Antecedent – Behavior – Consequence
  - Key is to understand the « A » and « C » that surround a behavior
  - In order to identify the cause of the behavior
- Identifying the correct function leads to effective treatment...or vice versa



# A-B-C?

## Antecedent

- What happened immediately before?



## Behavior

- What did the student do?

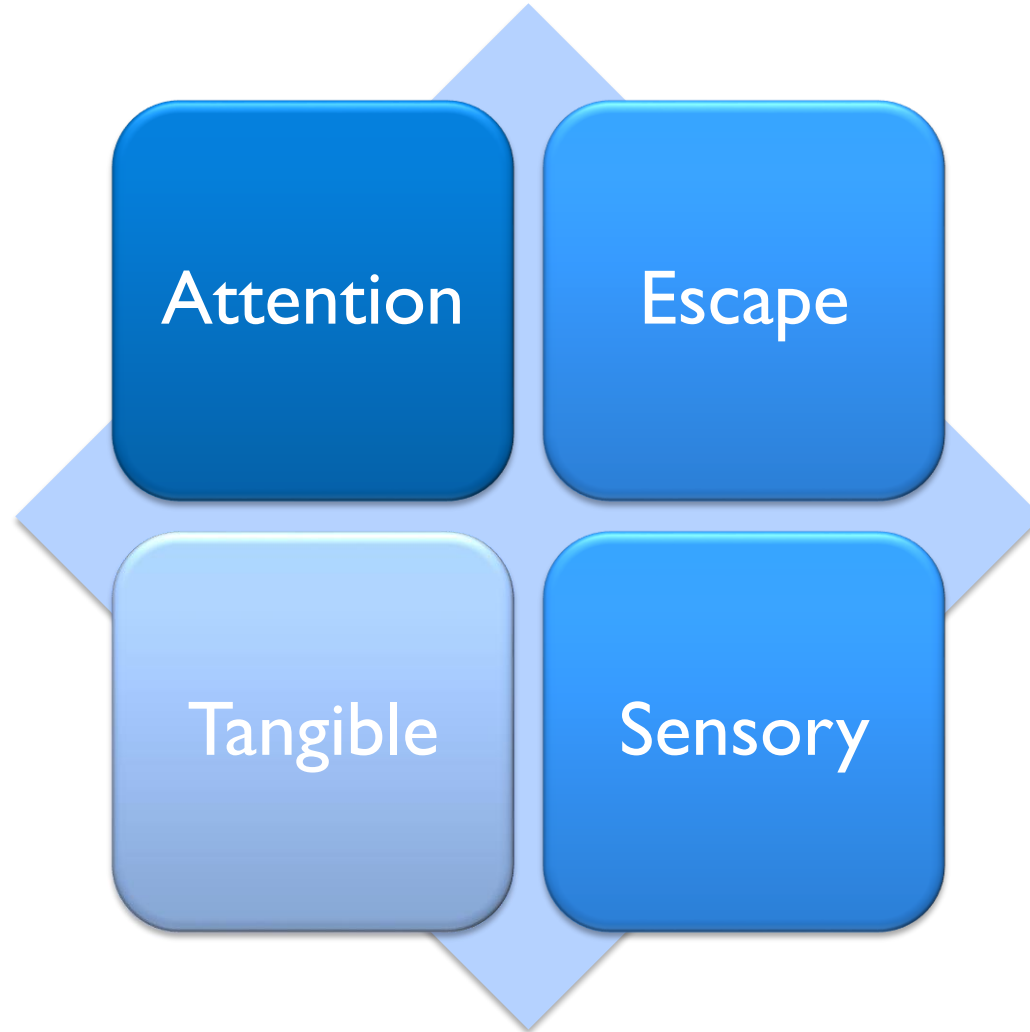


## Consequence

- What happened immediately after?

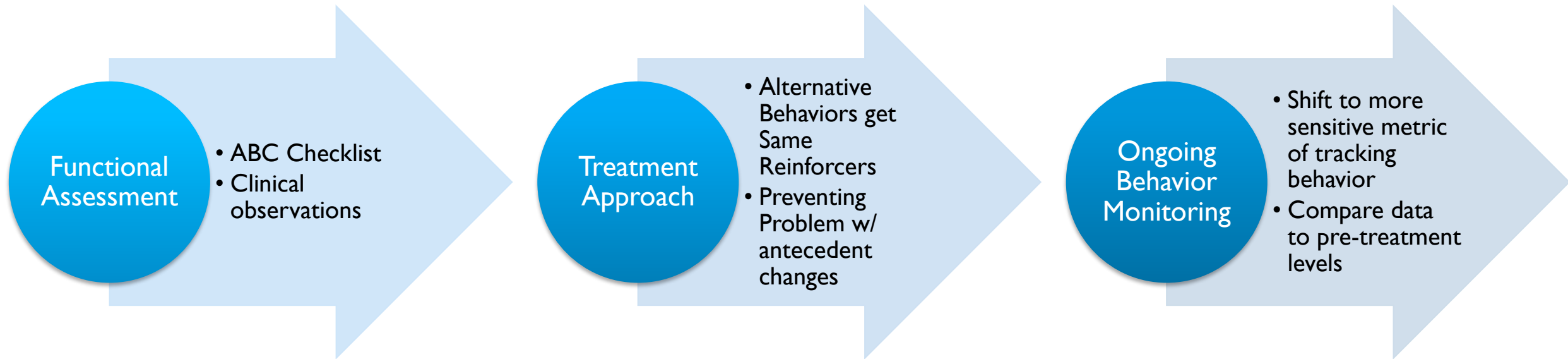


# Function of Behavior





# FROM FUNCTION TO SOLUTION



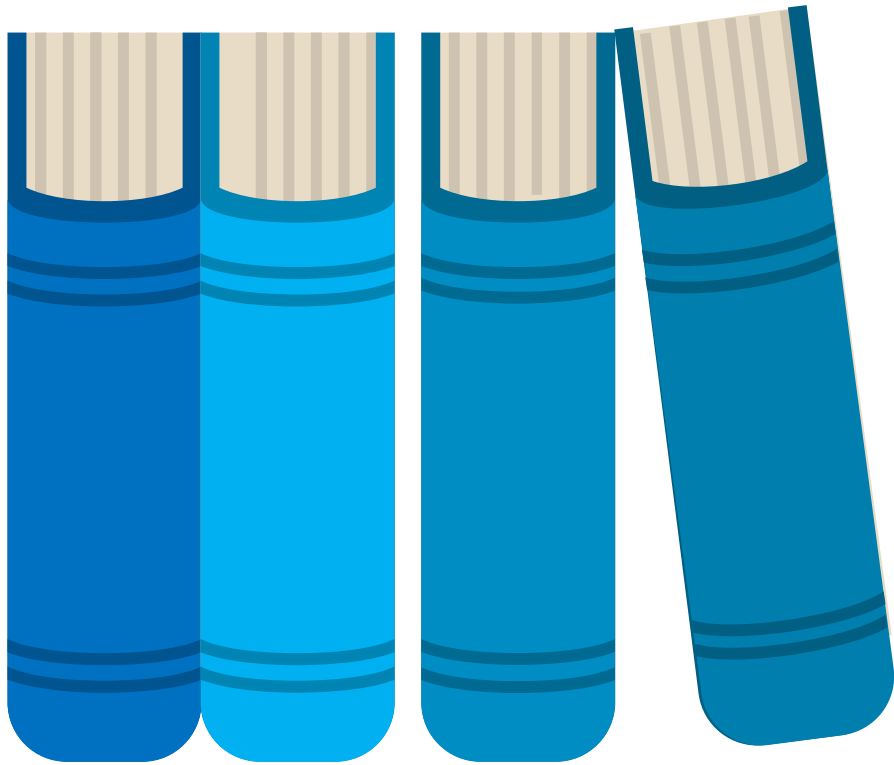


# Functional Understanding

- Antecedent – Behavior – Consequence
- Same looking behavior for many different causes
- Key is to understanding the “antecedents” and the “consequences” that surround a behavior
- Only 4 possible causes for a behavior
  - Attention, escape, tangible and sensory
  - No excuses: control, bad day, upset, worried, no meds
- Identify the correct function – treatment works
- Identify the incorrect function – treatment makes things worse



# CONTINGENCY MANAGEMENT



Incorporating function and reinforcement into a system

- Identify Reinforcers
  - Evaluate preferences
  - Build reinforcer store
  - Restrict access
- Create an Economy
  - Assign costs
  - Select functional options
  - Deal with negatives
- Ongoing Behavior Monitoring
  - Adherence to classroom rules
  - Targeted therapeutic goals
  - Cash outs



# Contingencies Managed

- Problem behavior must fail to gain access to the once-desired consequences
- Positive behavior must be able to gain access to functionally equal consequences
  - Escape, attention, tangibles, sensory
- Sooner-smaller and larger-later risk factors
- Psychologically bringing the future into the present
- Dynamics of the economy, inflation, price busts, substitutable reinforcers
- The bank (positive carry over) and the debt (zeroing out negative)
- Points every 30 minutes and multiple “cash-outs” each day.





# SYNTHESIZING: THE DYNAMIC CONTEXT

Alter the context in  
which behavior occurs

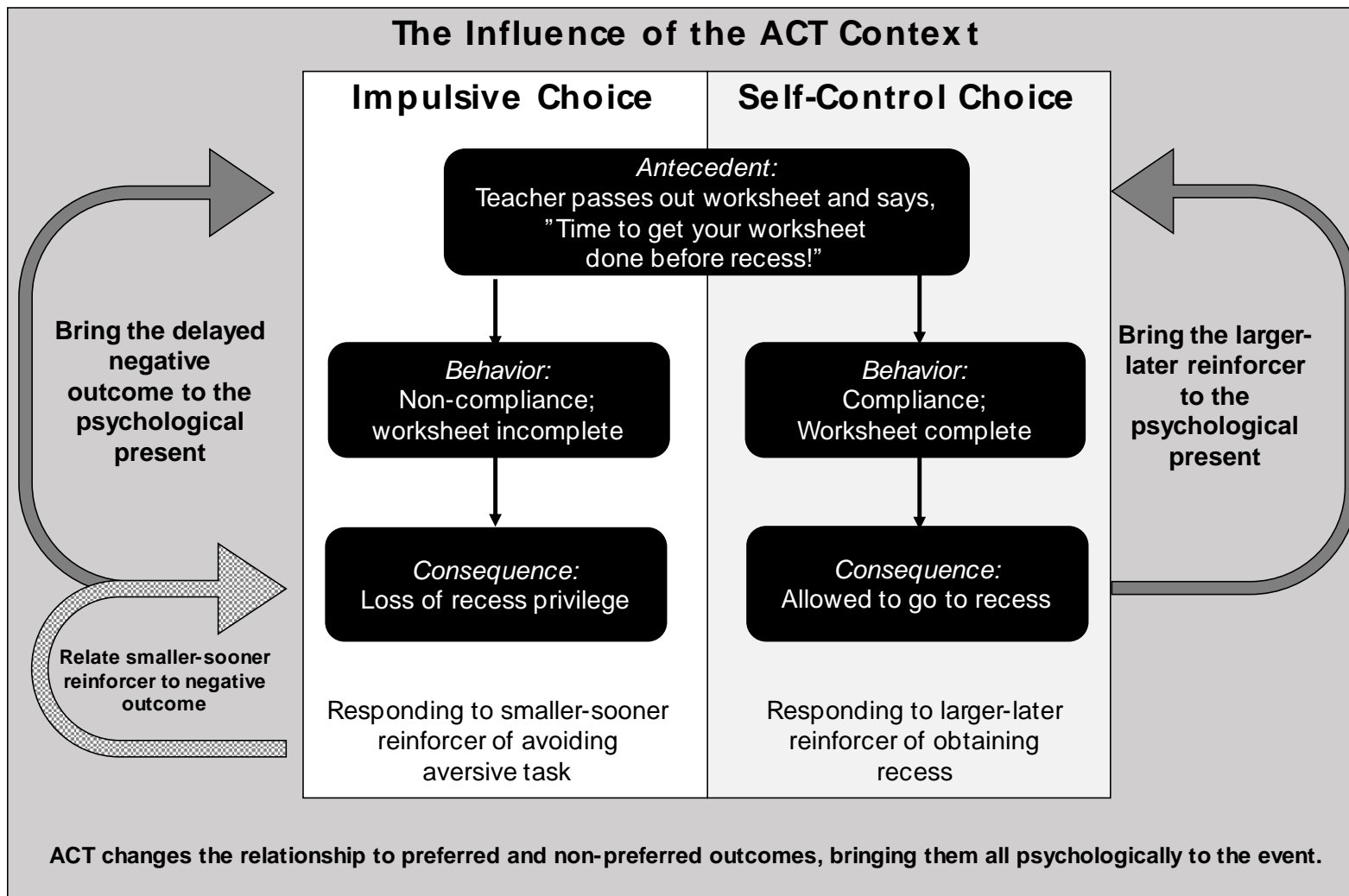
Alter the child's  
relationship to verbal  
behavior about events



Reinforce a set of  
flexible, adaptive  
behaviors that lead to  
preferred outcomes

Ultimate goal: Increase likelihood of the child responding to the contingencies that you have arranged or that exist naturally in the environment that reinforce appropriate behaviors

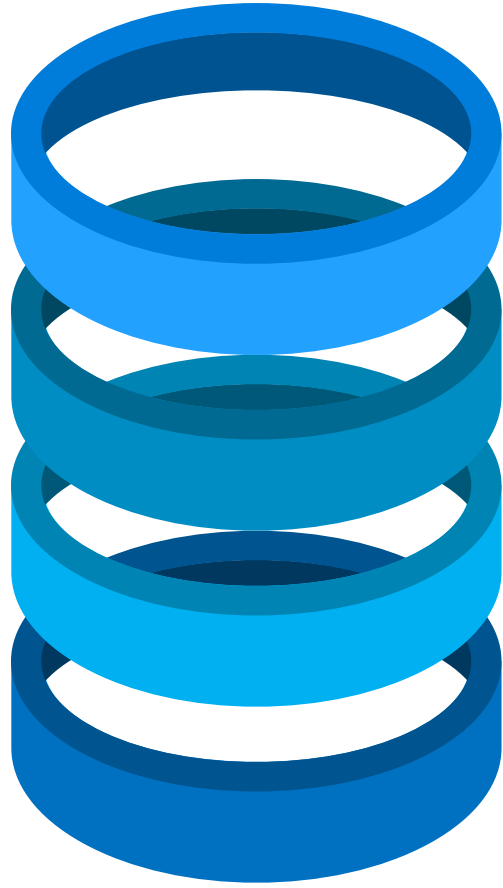




# HOW DOES THIS WORK?



# PUTTING IT ALL TOGETHER



**DEVELOP MINDFUL  
PRACTICE**

**THERAPEUTIC  
RECONDITIONING**

**FUNCTIONAL BEHAVIOR  
MANAGEMENT**



# MINDFUL AWARENESS



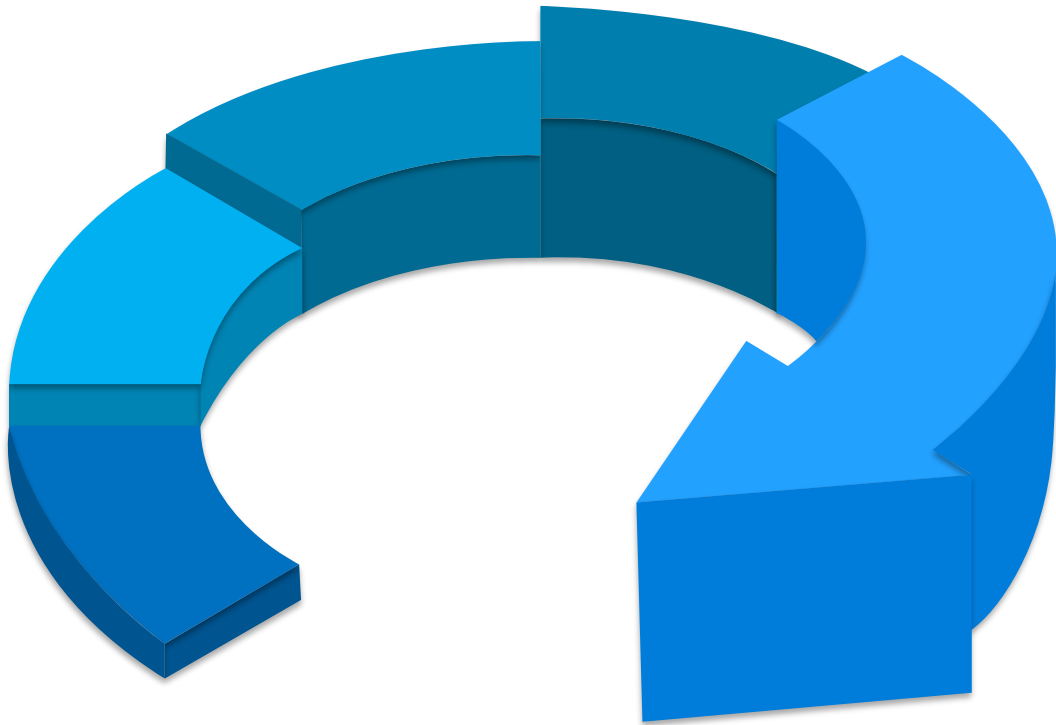
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GOAL: Help a the child notice their mind, understand how their mind pulls them away from the present, and how drifting into thoughts can lead to missing out on what they value in life.

Refocus attention to stimuli in the present, lose focus on maladaptive verbal behavior.



# THERAPEUTIC RECONDITIONING



## “THERAPY” EMPHASIZES:

- Observable, measurable behavior
- Specific training and instructional approaches that increase skills necessary to engage in flexible behaviors
- Contingency management: reinforcement for adaptive behaviors only



# CHARACTERISTICS OF AIM THERAPEUTIC APPROACH





# FUNCTIONAL APPROACH TO BEHAVIOR

- Identify the function of behavior, and develop appropriate intervention
- Incorporating:
  - Reliance on data collection
  - Preventative/reactive measures focused on environmental, verbal, situational stimuli to reduce the likelihood of maladaptive behaviors



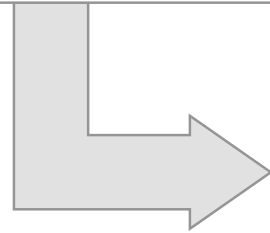


# The Flow of the Behavioral Event



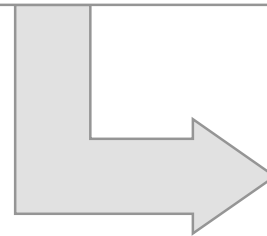
## **A**ntecedent or Trigger

- **A**wareness of how the child failed to maintain flexibility.



## **B**ehavior

- **C**ommunicate the ACT language in response to the behavior.



## **C**onsequence

- **T**reat the student for more flexibility of responding as they move forward.





# In Summary

- Understanding a functional approach to behavior and language can help solve some of the complex issues individuals face
- Contingency management programs can set up the environment to effectively manage problem behavior
- ACT can be successfully implemented in a variety of settings, with different ages and populations
- It is important to have a comprehensive approach to language to strengthen the effectiveness of interventions
- The key is synthesizing behavior management and a therapeutic approach



# (Potential) To-do:

- Form small groups
- Think of a student with whom you work
- After de-identifying your student, consider his/her profile:
  - Age, diagnoses, setting(s) of instruction, existing and former goals/plans, meds (if applicable), outside services, etc.
- Please complete a CPFQ-Caregiver report for this student, and bring those results tomorrow
- Any other considerations you might have that will inform your AIM-based intervention



An abstract graphic design featuring a solid blue diamond on the left side. To its right are two overlapping, hollow blue diamonds. Two thin blue lines extend diagonally from the top-left and bottom-left corners of the solid diamond towards the right edge of the frame.

**See you  
tomorrow!**