



**Justice Center**  
THE COUNCIL OF STATE GOVERNMENTS



**BJA**  
Bureau of Justice Assistance  
U.S. Department of Justice

# Addressing the Needs of People with Brain Injuries in the Justice System

November 2, 2022 | 2:00–3:30 p.m., ET | National Association of State Head Injury Administrators | Judy Dettmer, Rebecca Wolfkiel

# Presentation Outline

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- I. Overview and Introductions
- II. Defining Brain Injuries: Severity, Complications, and Behavioral Health
- III. Impact of Brain Injuries for People with Justice System Involvement
- IV. Screening, Referral, and Support
- V. Questions and Answers

# Presenters

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- Judy Dettmer, *Director of Strategic Partnerships, National Association of State Head Injury Administrators (NASHIA)*
- Maria Fryer, *Mental Health and Justice Systems Policy Advisor, Bureau of Justice Assistance, U.S. Department of Justice*
- Ethan Kelly, *Senior Policy Analyst, Behavioral Health, The Council of State Governments (CSG) Justice Center*
- Rebecca Wolfkiel, *Executive Director, NASHIA*

# The Council of State Governments Justice Center

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We are a national nonprofit, nonpartisan organization that combines the power of a membership association, serving state officials in all three branches of government, with policy and research expertise to develop strategies that increase public safety and strengthen communities.

# Justice and Mental Health Collaboration Program

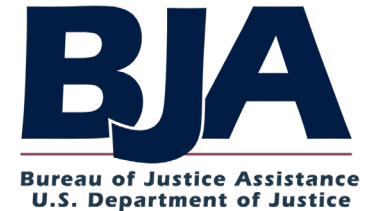
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The Justice and Mental Health Collaboration Program (JMHCP) promotes innovative cross-system collaboration and provides grants directly to states, local governments, and federally recognized Indian Tribes. It is designed to improve responses to people with mental health conditions and substance use disorders who are involved in the criminal justice system.

# The U.S. Department of Justice Bureau of Justice Assistance

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**Mission:** BJA's mission is to provide leadership and services in grant administration and criminal justice policy development to support state, local, and Tribal justice strategies to achieve safer communities. BJA works with communities, governments, and nonprofit organizations to reduce crime, recidivism, and unnecessary confinement, and promote a safe and fair criminal justice system.



Visit the [BJA website](#) to learn more.

# National Association of State Head Injury Administrators (NASHIA)

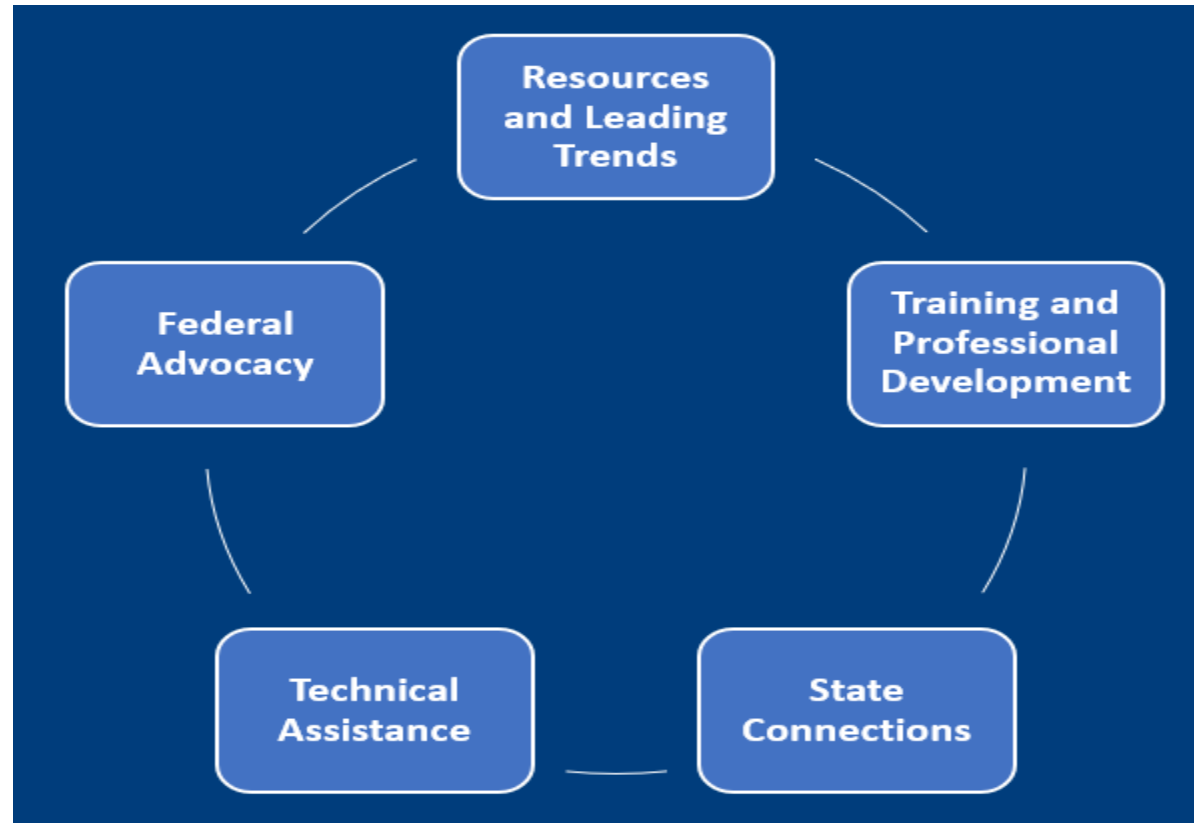
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NASHIA is a nonprofit organization created to assist state government in promoting partnerships and building systems to meet the needs of individuals with brain injury and their families.



# Areas of Focus for NASHIA

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# Components of a Comprehensive Brain Injury Program

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# Presentation Outline

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# Learning Objectives

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Gain an understanding of the prevalence of brain injury in the justice system.

Learn about importance of screening and accommodating brain injury from a person-centered approach.

Learn about resources available to support individuals with brain injury.

# Brain Injury Defined

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## Acquired Brain Injury

Traumatic Brain Injury



External Forces  
ex: assault, fall, blast  
injury, motor vehicle  
accident

Non-Traumatic  
Brain Injury



Internal Event  
ex: stroke, tumor,  
lack of oxygen,  
infection

# Classification of Severity

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- **Mild** > Loss of consciousness 0–30 minutes (concussion)
- **Moderate** > Loss of consciousness 30 minutes–24 hours
- **Severe** > Loss of consciousness for over 24 hours

# Mild Traumatic Brain Injuries (TBI): Complications

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**75 percent of TBIs are mild.** TBI symptoms may appear mild but can lead to significant, life-long impairment affecting an individual's ability to function physically, cognitively, and psychologically.

Symptoms may be subtle

- **90 percent** of concussions are **not associated with a loss of consciousness.**
- Concussive symptoms may develop over days or even months later.

Treated in non-hospital setting, not in ED, or not treated at all

- 90 percent of TBI may go **unreported.**
- Often not visible on CT scan or MRI

Brain injury can **mirror** other disabilities or conditions.

# Mild TBI: Complications

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- Most individuals with one uncomplicated, mild brain injury will resolve back to baseline.
- Two significant reasons why mild brain injury can result in lasting impairment:
  1. Repeated exposure, e.g., abuse, intimate partner violence, combat, sports
  2. Underlying co-occurring conditions such as addiction or mental illness

# Possible Physical Changes

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<b>Injury-related challenge</b>	<b>How it may affect a person functionally</b>
Coordination	Unsteady gait, poor eye-hand coordination, slow or slurred speech, tremors, paralysis
Visual Deficits	Staring or poor eye contact, blurred or double vision, inability to follow an object with their eyes
Additional Physical Challenges	Seizures, deaf or hard of hearing, fatigue



# Possible Cognitive Changes

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<b>Injury-related challenge</b>	<b>How it may affect a person functionally</b>
Memory	Trouble following directions, providing requested information, making appointments
Processing (receptive)	Understanding what is being said and reading
Processing (expressive)	Trouble putting thoughts into words—tip of the tongue syndrome
Problem-solving (related to frontal lobe and temporal tip injury)	Impulsive, easily frustrated, sexually disinhibited, verbally/physically combative, interpersonally inflexible, poorly organized

# Possible Emotional Changes

<b>Injury-related challenge</b>	<b>How it may affect a person functionally</b>
Depression	Flat affect, lack of initiation, sadness, irritability
Unawareness	Unable to take social cues from others
Confabulation	"Making up stories"
Perseveration	Gets "stuck" on a topic of conversation or physical action
Post Traumatic Stress Disorder	Intrusive thoughts, sleep disturbance, hypervigilance
Anxiety	Can exacerbate other cognitive/behavioral problems

# Behavioral Health and Brain Injury

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## **Suicide Attempts:**

- 28% with suicidal thoughts, 17% attempts
- Compared to 4% in general population

## **Substance Use:**

- Post-rehabilitation for TBI:
  - 11.5% used an illicit substance since injury
  - 16.9% misused alcohol since injury

## **Mental Health:**

- 1/3 of TBI survivors experience mental health symptoms after a TBI
- Compared to 26.2% in general population

See sources, slide 63

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# TBI and Criminal Justice: Prevalence

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- A meta-analysis found the prevalence of TBI in the justice population to be 60.25 percent vs. 8.5 percent of the general population with reported history of TBI.
- A meta-analysis found that approximately 30 percent of adjudicated youth have sustained a previous brain injury.
- In a Colorado study, women convicted of offenses reported a history of TBI at a rate of 97 percent.

See resources, slide 64

# TBI and Criminal Justice: Negative Outcomes

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- Increased utilization of services while incarcerated (health and psychological)
- Lower treatment completion rates and higher rates of disciplinary incidents
- Lower ability to maintain rule-abiding behavior during incarceration
- Higher number of prior incarcerations
- Higher rates of recidivism, 69 percent compared to 37 percent of peers without TBI
- Criminal behavior can increase after TBI (especially severe TBI)

A. L. Piccolino and K. B. Solberg, "The impact of traumatic brain injury on prison health services and offender management," *Journal of Correctional Health Care* 20, no. 3, (2014): 203–212.

# Psychosocial Vulnerabilities



Brain Injury and Criminal Justice Position Paper, Colorado Evaluation and Action Lab grant, 2020.

# Problems Worsen with Each New Injury

COGNITIVE/THINKING	EMOTIONAL	PHYSICAL
Memory and attention	Depression and anxiety	Unsteady gait, poor coordination
Comprehension of what is being read or heard	Reduced or lack of awareness of functional impact of injury-imposed challenges	Slow or slurred speech
Communicating thoughts verbally or in writing	Disinhibition and impulsivity	Sensitivity to noise or light
Problem-solving difficulties, impulse control and difficulty organizing thoughts, words and actions (aka executive skills)	Reduced frustration tolerance and irritability	Fatigue

Robert Walker et al., "Head injury among drug abusers: An indicator of co-occurring problems," *Journal of Psychoactive Drugs Jul-Sep 2003* 35, no. 3, (2003): 343.

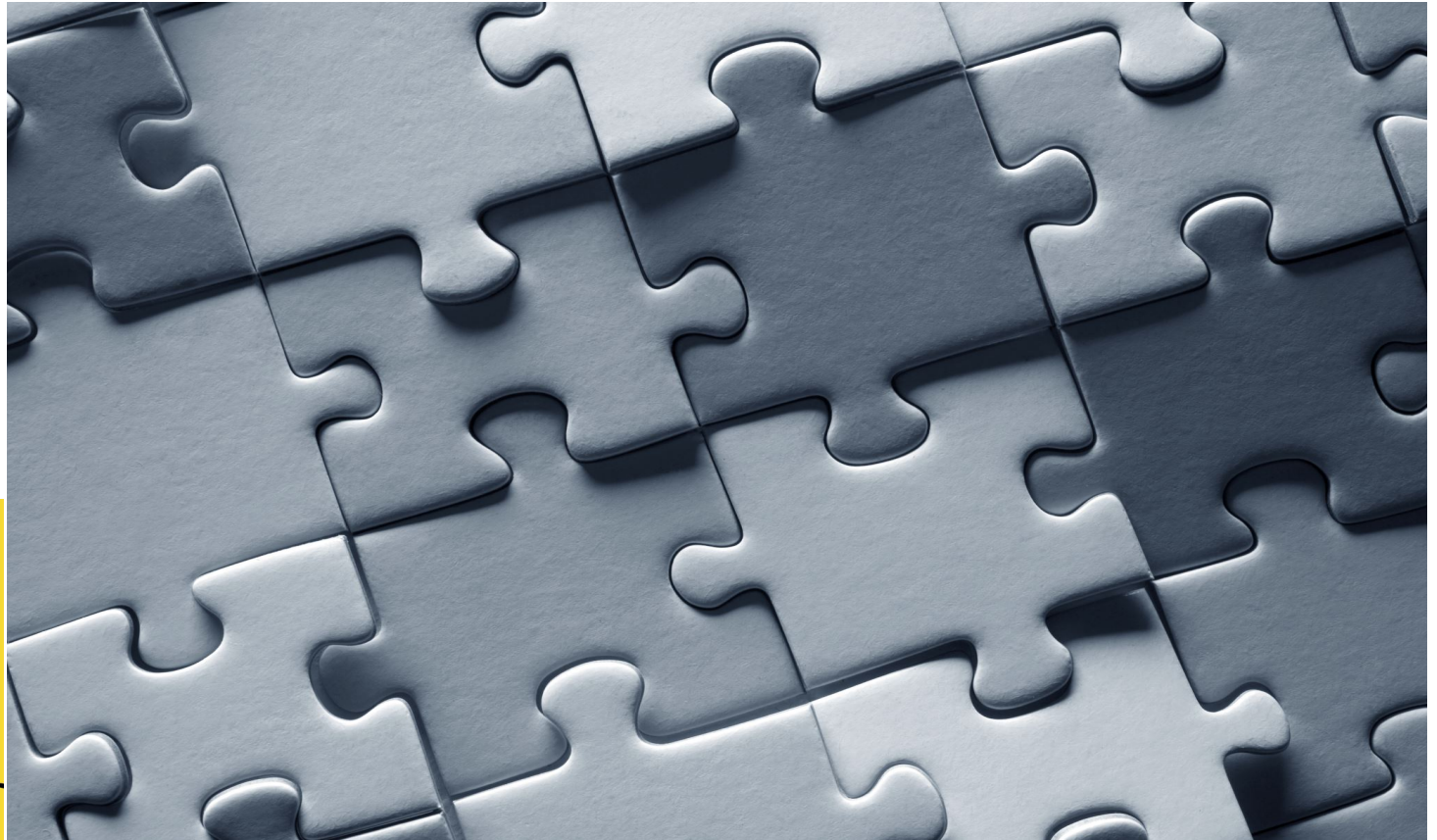


# Presentation Outline

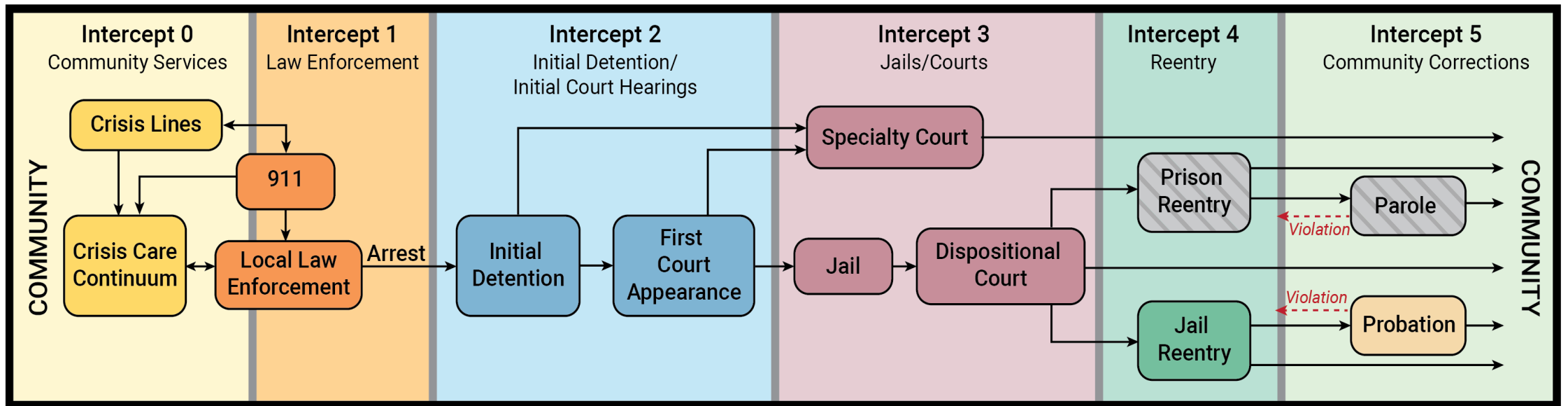
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# A Big Problem with Some Simple Solutions



# The Sequential Intercept Map



© 2019 Policy Research Associates, Inc.

Policy Research Associates, *The Sequential Intercept Model* (Delmar, NY: Policy Research Associates, 2019).

# Tangible Solutions

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# The Importance of Screening for TBI

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- The **Commission on Safety and Abuse in America's Prisons** was established in 2005 to identify and recommend solutions to the most serious challenges facing America's jails and prisons.
- Recommendations from the **Mental Health Problems of Prison and Jail Inmates** and the **Commission on Safety and Abuse in America's Prisons**
  - Increased health screening, evaluation, and treatment for incarcerated people
  - Routine screening for TBI
  - Screening individuals with TBI for substance use disorders and co-occurring mental health diagnoses
  - Education for personnel about how to manage and support individuals with TBI

For sources, see slide 65.

# Considerations for Selecting a Screening Tool

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- Tools are best if they're cost-effective and easy to administer.
- Best to use a validated tool.
- Tools to consider include the following:
  - Ohio State University – Traumatic Brain Injury Identification Method
  - Traumatic Brain Injury Questionnaire
  - Brain Injury Screen Questionnaire
  - Brain Check Survey

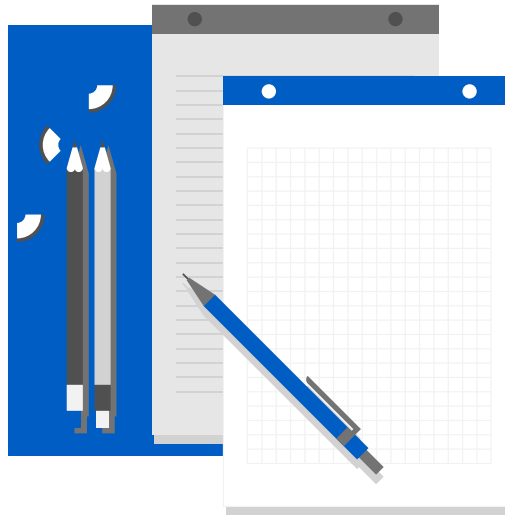
# The Importance of Screening for Impairment

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- Most of the lifetime history screening tools do not provide information about current impairment.
- Understanding both the history of injury and current impairment allows for effective adjustments/accommodations to be implemented.
- Identifying the current impairment will help increase the person's ability to advocate for themselves.

# Importance of Screening for Impairment



Tools are best if cost-effective and easy to administer

Self-Report

Neuropsychological screen



# Neuropsychological Screening Tools

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- Neuropsychological screening tools to consider include the following:
  - Automated Neuropsychological Assessment Metrics, Core Battery
  - Neuropsychological Assessment Battery – Screening Module
  - Repeatable Battery for the Assessment of Neuropsychological Status
- Self-Report screening tools to consider:
  - Adult TBI Protocol
  - Juvenile TBI Protocol

# Colorado Symptoms Questionnaire

MEMORY CONCERNS	<b>I do not experience this problem at all</b>	<b>I experience this problem but it does not bother me</b>	<b>I am mildly bothered by this problem</b>	<b>I am moderately bothered by this problem</b>	<b>I am extremely bothered by this problem</b>
Losing or misplacing important items (e.g., keys, wallet, papers)	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Forgetting what people tell me	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Forgetting what I've read	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

"Symptoms Questionnaire," MindSource Brain Injury Network, accessed October 11, 2022, [https://cdpsdocs.state.co.us/ccjj/committees/ADTF/Materials/2019-07-10\\_CCJJ-ADTF\\_StrategiesGuidebk-CMH\\_2019-05-06.pdf](https://cdpsdocs.state.co.us/ccjj/committees/ADTF/Materials/2019-07-10_CCJJ-ADTF_StrategiesGuidebk-CMH_2019-05-06.pdf)

# Strategies Guidebook for Professionals

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- Memory Problems
- Delayed Processing
- Inhibition Problems/Impulsivity
- Physical and Sensorimotor Problems
- Emotional Dysregulation

Mindsources Brain Injury Network Colorado & University of Denver Graduate School of Professional Psychology, *Cognitive Strategies for Community Mental Health* (Colorado: MindSource Brain Injury Network, 2019), 2.

# NASHIA Online Brain Injury Screening and Support System

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Benefit to the client:

- Identify TBI and non-TBI history.
- Determine program eligibility.
- Identify impairment and share strategies regarding the associated symptoms.
- Provide strategies for professionals on how to support clients with brain injuries.

# The “So What”: Adjusting/Accommodating

## Framework for Support



We are NOT treating the brain injury; we ARE treating the behavioral health concern in the context of brain injury.



Demystifies brain injury for non-brain injury professionals.



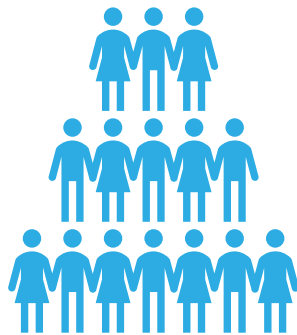
Empowers individuals with brain injury and families to advocate for appropriate supports.

# The “So What”: Adjusting/Accommodating

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Strategies should be easy to implement and appropriate to the environment.



Strategies should be person centered; the person needs to be integral in:

1. Recognizing the need for a strategy
2. Developing a strategy
3. Monitoring progress

# Understanding Brain Development

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**Higher Order Processes:** Social/Emotional Competency, Executive Functioning

**Intermediate Processes:** Language, Learning, and Visual-Spatial Processes

**Fundamental Processes:** Memory, Processing Speed, Attention, Inhibition, Sensory-Motor

Building Blocks of Brain Development,” Colorado Kids with Brain Injury, accessed October 11, 2022, <https://cokidswithbraininjury.com/educators-and-professionals/brain-injury-matrix-guide/>.

# The “So What”: Adjusting / Accommodating

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## Impaired Attention

What it looks like:

- Fidgets, squirms in seat, can't sit still
- Interrupts conversation
- Talks excessively
- Off topic
- Impulsivity (inability to inhibit)



# The “So What”: Adjusting/Accommodating

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## Impaired Attention

### Adjustments/Accommodations:

- Check to make sure you have the person’s attention before giving instructions.
- Work on one task at a time to avoid the need to divide attention.
- Reduce distractions; meet in a quiet environment.
- Keep instructions brief, simple, and to the point.

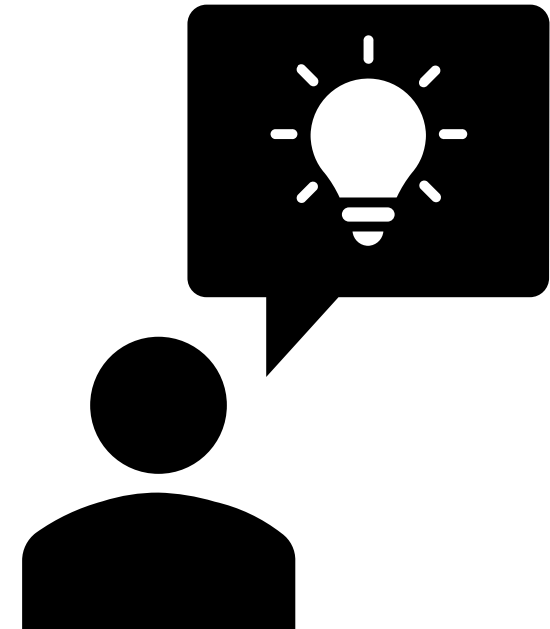
# The “So What”: Adjusting/Accommodating

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## Short-Term Memory Loss

What it looks like:

- Can't remember more than one thing at a time
- Can't remember details
- Appears disorganized
- Appears to have an “attitude” problem
- Appears manipulative



# The “So What”: Adjusting/Accommodating

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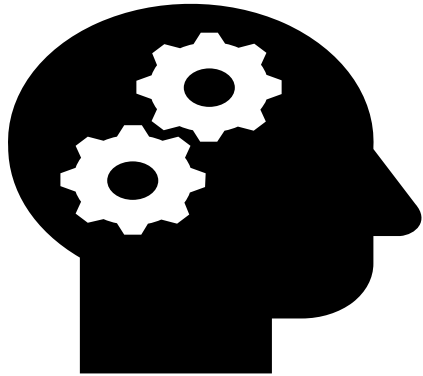
## Short-Term Memory Loss

### Adjustments/Accommodations:

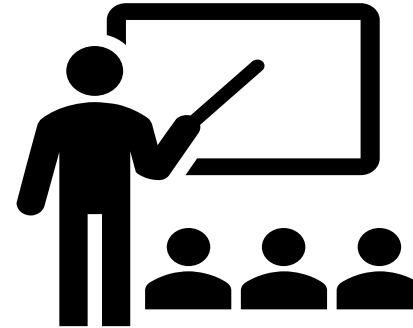
- Repeat and summarize information.
- Provide written summary.
- Review new information frequently.
- Stick to routine as much as possible.
- Keep information concise, tangible, and relevant.

# Skill vs. Will (Can't vs. Won't)

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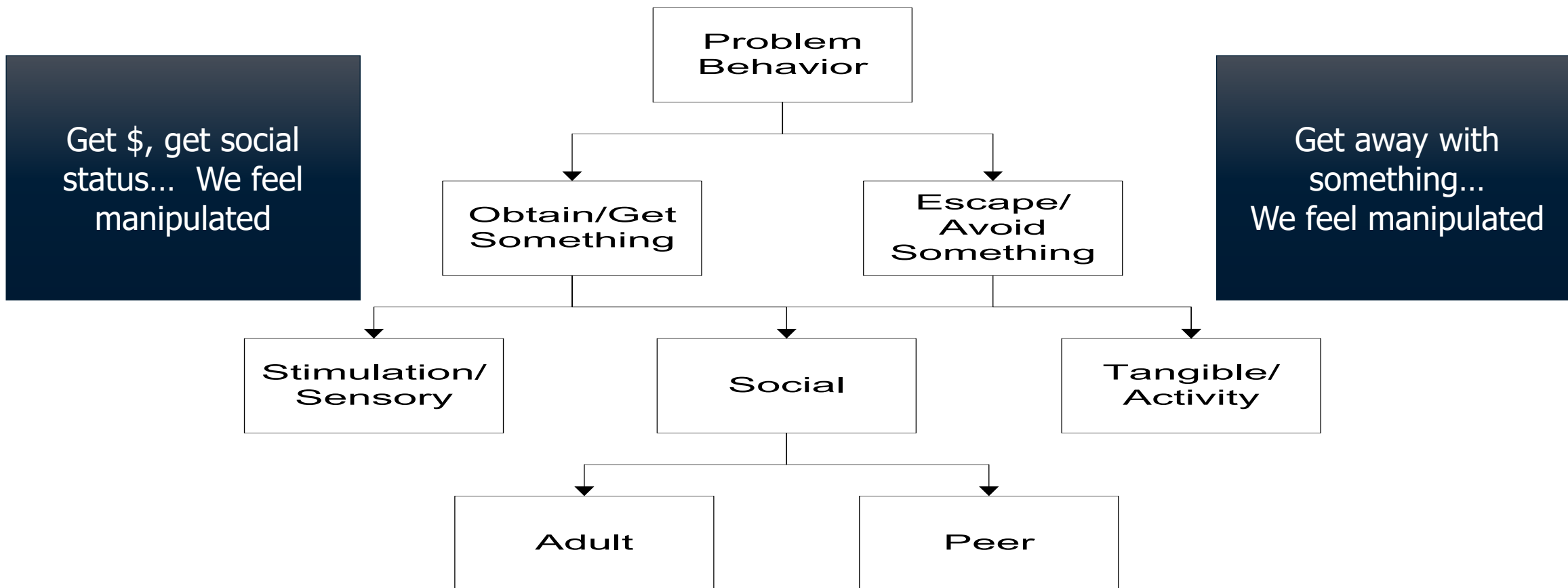


If they think they have the skill but choose not to use it, likely to think punishment.



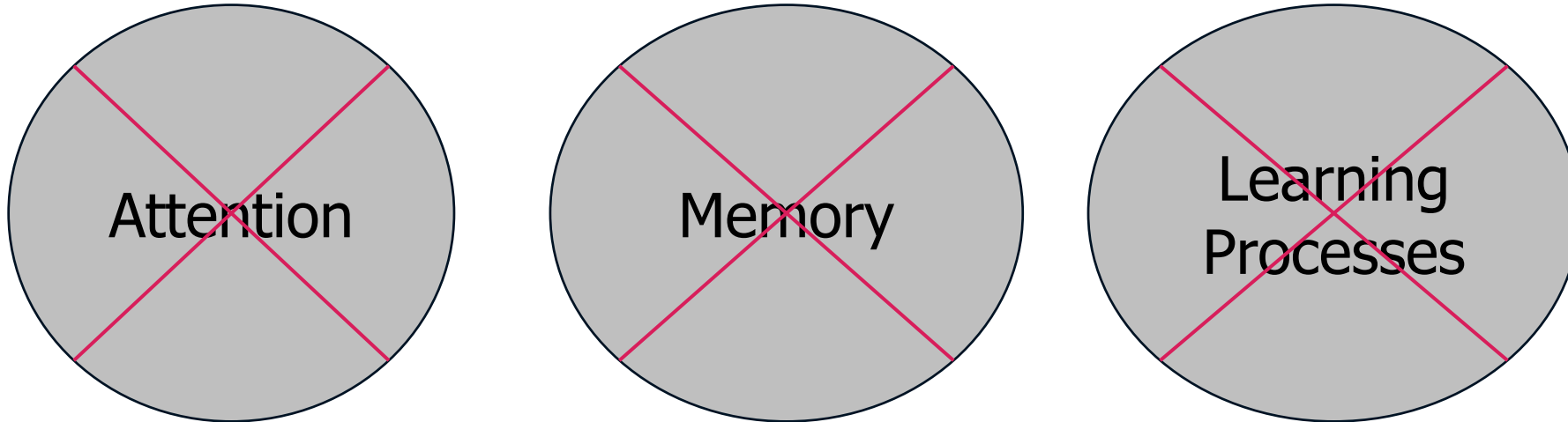
If they think they don't have the skill, less likely to think punishment, more likely to think of teaching the skill.

# Look for the Function of the Behavior



# The Impact of Brain Injury on Brain Development

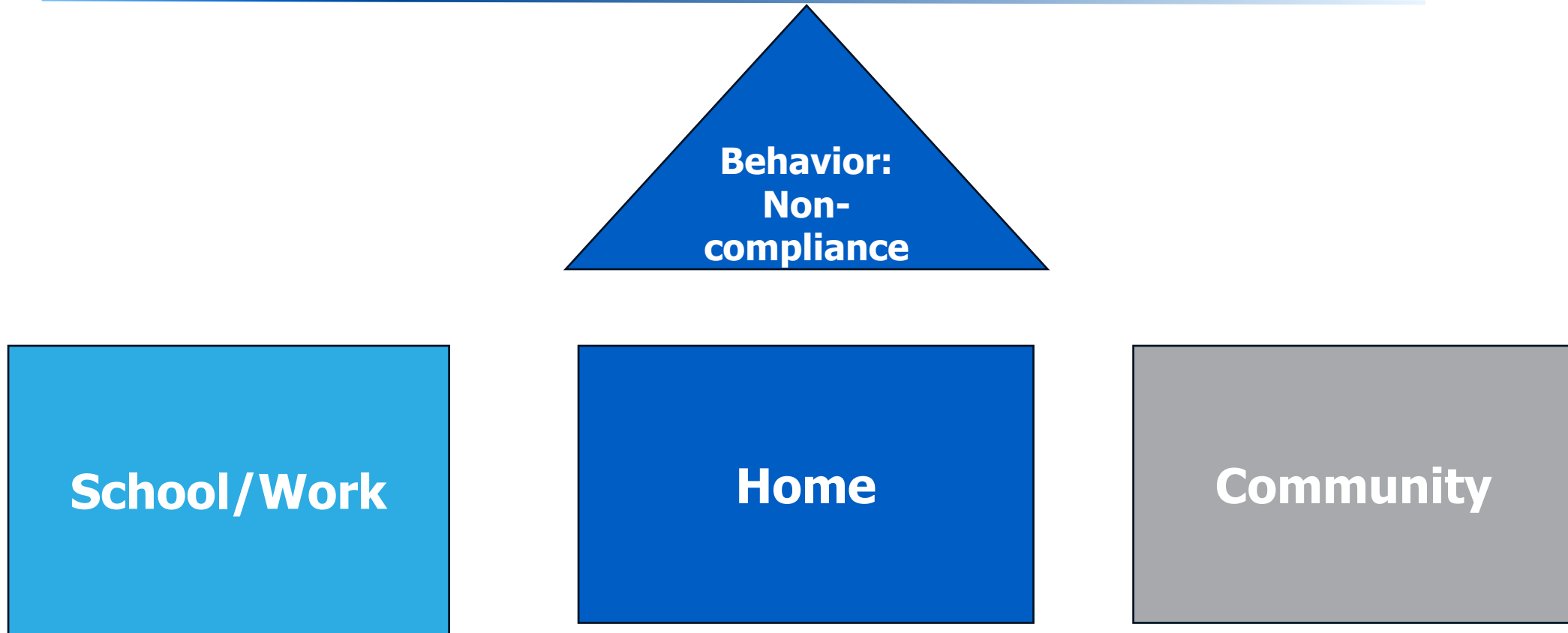
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"Building Blocks of Brain Development," Colorado Kids with Brain Injury, accessed October 11, 2022, <https://cokidswithbraininjury.com/educators-and-professionals/brain-injury-matrix-guide/>.

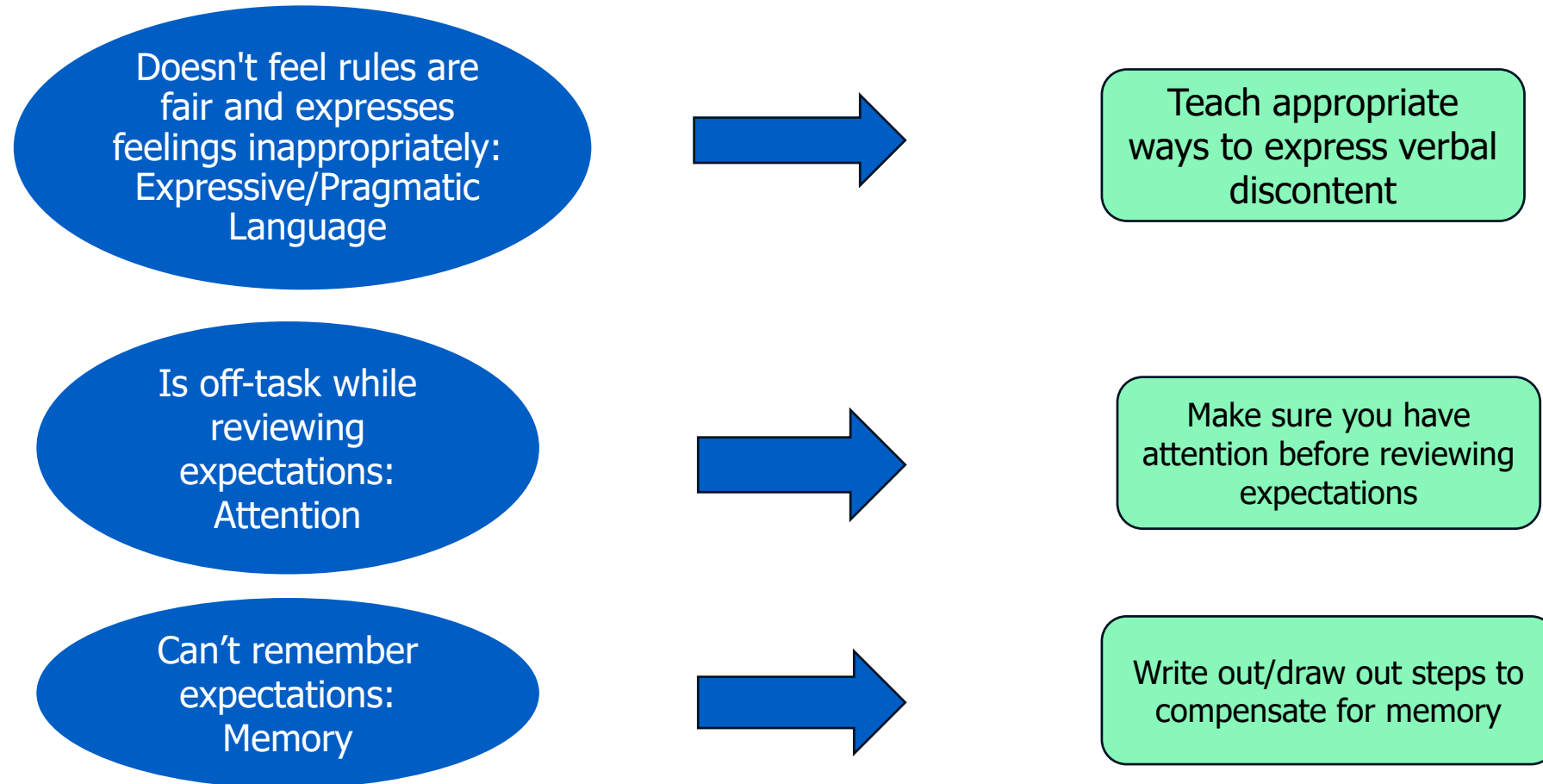
# Looking at Behavior in the Primary Domains

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# Strategies to Assist with Functional Behavior

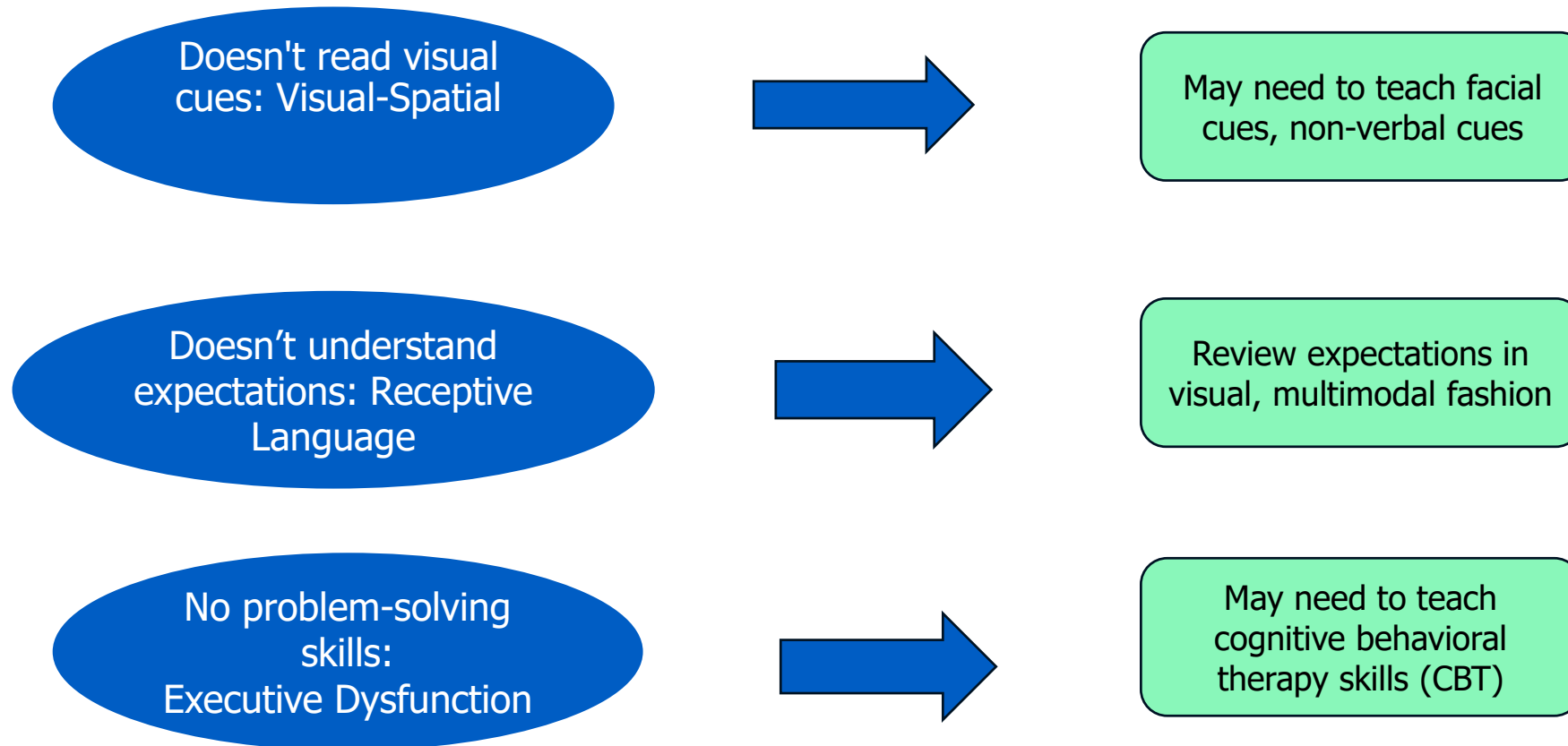
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# Strategies to Assist with Functional Behavior

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# Psychoeducational Supports

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- It is important to provide education about brain injury to the justice-involved individual and, when appropriate, their family.
- The screening process might be the first time they are identifying and understanding that they have a brain injury.
- Message needs to be that they are not “broken” and that there are ways to compensate for the deficits they experience.
- The person may not be able to recognize their deficits immediately. It is important to meet them where they are.

# An Example from Colorado: Achieving Healing Through Education, Accountability, and Determination (AHEAD)

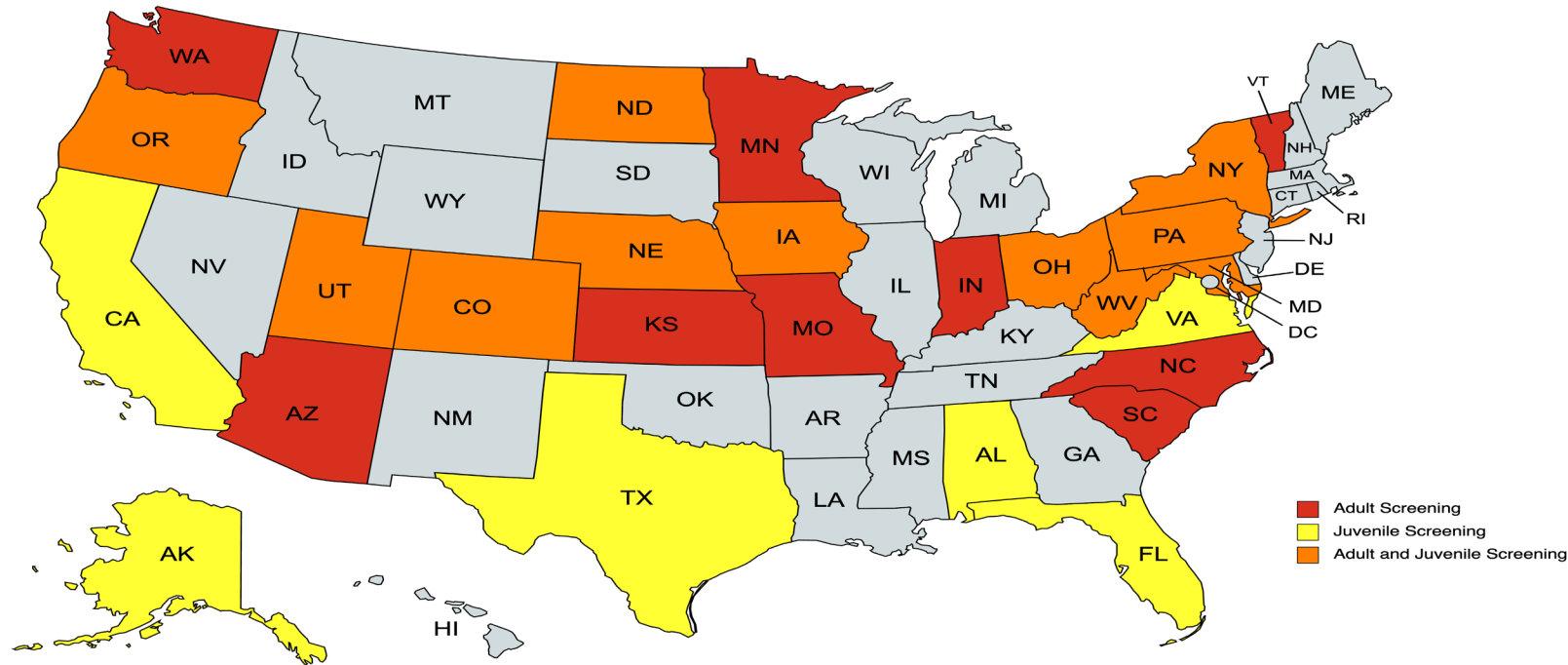
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## Seven Modules:

1. Understanding TBI/Symptom Recognition
2. Memory Skills/Goal Setting
3. Emotional Regulation
4. Communication Mastery
5. TBI and Anger
6. Stopping and Thinking
7. Grief

A.H.E.A.D: Achieving Healing Through Education, Accountability, and Determination, Mindsource Brain Injury Network, accessed October 11, 2022, <https://mindsourcecolorado.org/ahead/>.

# Brain Injury and Criminal and Juvenile Justice Initiatives



Created with mapchart.net

# Presentation Outline

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- IV. Screening, Referral, and Support
- V. Discussion with Panelists

# Discussion with the Panelists

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Please use the chat function to type your questions for the presenters.

# Neuropsychological Screening Course

Neuropsychological  
Screening:  
Using Brain Injury  
and Cognitive  
Screening to Inform  
Treatment Planning  
Across Settings

with  
Dr. Kim Gorgens



NATIONAL ASSOCIATION  
OF STATE HEAD INJURY  
ADMINISTRATORS

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# Behavioral Health/Criminal and Juvenile Justice and Brain Injury Resources

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## NASHIA:

- Website Resources

[Criminal & Juvenile Justice](#)

[Tip Card, Toolkit & Workbook, Advisory on Treating Brain Injury](#)

- Leading Practices Academy

- Direct state TA and consultation
- Six Academy meetings per year
- Peer-to-peer support
- Online HUB with resources and community forum
- Annual Summit

[Leading Practices Academy on Criminal and Juvenile Justice](#)

[Leading Practices Academy on Behavioral Health](#)



# Resources for the Field

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- National Association of State Head Injury Administrators: <https://www.nashia.org/>
- NASHIA: [Criminal and Juvenile Justice Best Practice Guide and Supporting Materials](#)
- Brain Injury Association of America: <https://www.biausa.org/>
- United States Brain Injury Alliance: <https://usbia.org/>

# Resources for the Field

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- “Lifetime History Screening Tool”: [Lifetime history screening tool chart](#)
- Colorado Symptom Questionnaire: To obtain online access, contact Liz Gerdeman @ [liz.gerdeman@state.co.us](mailto:liz.gerdeman@state.co.us), [Fillable Copy](#)
- BrainLine: <https://www.brainline.org/>
- Model Systems Knowledge Translation Center: <https://msktc.org/>
- [The Surprising Connection Between Brain Injuries and Crime](#)

# Resources for the Field

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- Adult TBI Protocol: [adult self-report and strategies](#)
- Juvenile TBI Protocol: [juvenile self-report and strategies](#)
- More information about these screens can be found at this link and by clicking on “Neuropsychological Screening Batteries Chart”:  
[Neuropsychological Screens](#)

# Resources for the Field

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## Accommodating the Symptoms of TBI [Booklet PDF](#)

Presented by:

Ohio Valley Center for Brain Injury  
Prevention and Rehabilitation

With contributions from Minnesota Department of Human  
Services State Operated Services

Developed in part with support of a grant from the U.S. Department of Health and Human Services, Health Resources and Services Administration (HRSA) to Ohio Rehabilitation Services Commission and The Ohio State University.

[Booklet order form PDF](#)

# Resources for the Field

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## Free Online Toolkit

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Developed by researchers at the Department of Veterans Affairs, this toolkit is designed to assist providers in identifying TBI and associated co-occurring problems and determining potential need for further evaluation and/or mental health treatment modification.

Click [here](#) to access the toolkit. Click [here](#) and open the “Training Resources” menu for valuable slides from the initial training on this toolkit.

The goal is to offer providers working with clients who have a history TBI and mental health symptoms the following:

- Background information/Education
- Screening and Assessment Tools
- Interventions and Treatment Modification Suggestions
- Additional resources

## Mental Health, Criminal Justice, and Brain Injury Toolkit

# Resources for the Field



## Cokids with Brain Injury

# Sources: Slide 19

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- Jessica L. Mackelprang et al., “Rates and Predictors of Suicidal Ideation During the First Year After Traumatic Brain Injury,” *Am J Public Health* (2014).
- John D. Corrigan, PhD, et al, “US Population Estimates of Health and Social Outcomes 5 Years After Rehabilitation for Traumatic Brain Injury,” *Journal of Head Trauma Rehabilitation*, 29 no. 6 (2014): E1-E9
- J. Ponsford, Y. Alway, and K. R. Gould, “Epidemiology and natural history of psychiatric disorders after TBI,” *J Neuropsychiatry Clin Neuroscience* 30, no. 4 (2018): 262–270.

# Sources: Slide 21

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- E. Shiroma, P. Ferguson, and E. Pickelsimer, "Prevalence of traumatic brain injury in an offender population: A meta-analysis," *Journal of Head Trauma Rehabilitation*, 27, no. 3 (2010): 1–10, <http://doi.org/10.1177/1078345809356538>.
- Marlena M. Wald, Sharyl R. Helgeson, and Jean A. Langlois, "Traumatic Brain Injury Among Prisoners," *Brain Injury Professional Magazine*, November 3, 2008, accessed September 28, 2022, <https://www.brainline.org/article/traumatic-brain-injury-among-prisoners>.
- Thomas J. Farrer, R. Brock Frost, and Dawson W. Hedges, "Prevalence of traumatic brain injury in juvenile offenders: A meta-analysis," *Child Neuropsychology* 9, no.3 (2013): 225–34, doi: 10.1080/09297049.2011.647901.



## Sources: Slide 29

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- Commission on Safety and Abuse in America's Prisons, "Confronting Confinement," The Vera Institute, accessed October 11, 2022, [https://www.vera.org/downloads/publications/Confronting\\_Confinement.pdf](https://www.vera.org/downloads/publications/Confronting_Confinement.pdf)
- "Mental Health Problems of Prison and Jail Inmates," Bureau of Justice Statistics, accessed October 11, 2022, <http://www.ojp.usdoj.gov/bjs/mhppji.htm>

# Contact Information

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- Judy Dettmer, *Director of Strategic Partnerships, NASHIA-* [jdettmer@nashia.org](mailto:jdettmer@nashia.org)
- Rebecca Wolfkiel, *Executive Director, NASHIA-* [rwolfkiel@nashia.org](mailto:rwolfkiel@nashia.org)

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Join our distribution list to receive updates and announcements:

<https://csgjusticecenter.org/resources/newsletters/>

For more information, please contact Ethan Kelly at [ekelly@csg.org](mailto:ekelly@csg.org)

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