

# Tracking Early Intervention Outcomes at the Program, State, & National Levels

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## **Disclaimer**

The findings and conclusions in this presentation are those of the authors and do not necessarily represent the official position of the Centers for Disease Control and Prevention (CDC).

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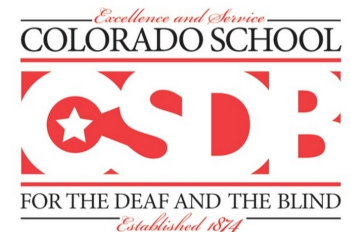
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**ODDAGE**

OUTCOMES &  
DEVELOPMENTAL  
DATA ASSISTANCE  
CENTER FOR  
EHDI PROGRAMS



University of Colorado  
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# Today's Topics

- Overview of a new CDC-supported national outcomes surveillance project (ODDACE)\*
  - Project purpose and goals
  - Eligible participants
  - Assessments
  - Potential obstacles
  - Benefits of participation

\*CDC Award: CDC-RFA-DD20-2005



# Outcomes and Developmental Data Assistance Center for EHDI (ODDACE)

## Background

- Long interested in understanding language & developmental outcomes of children who are deaf or hard of hearing.
  - Does the capacity exist to systematically collect this data?
- Previous CDC-funded Projects



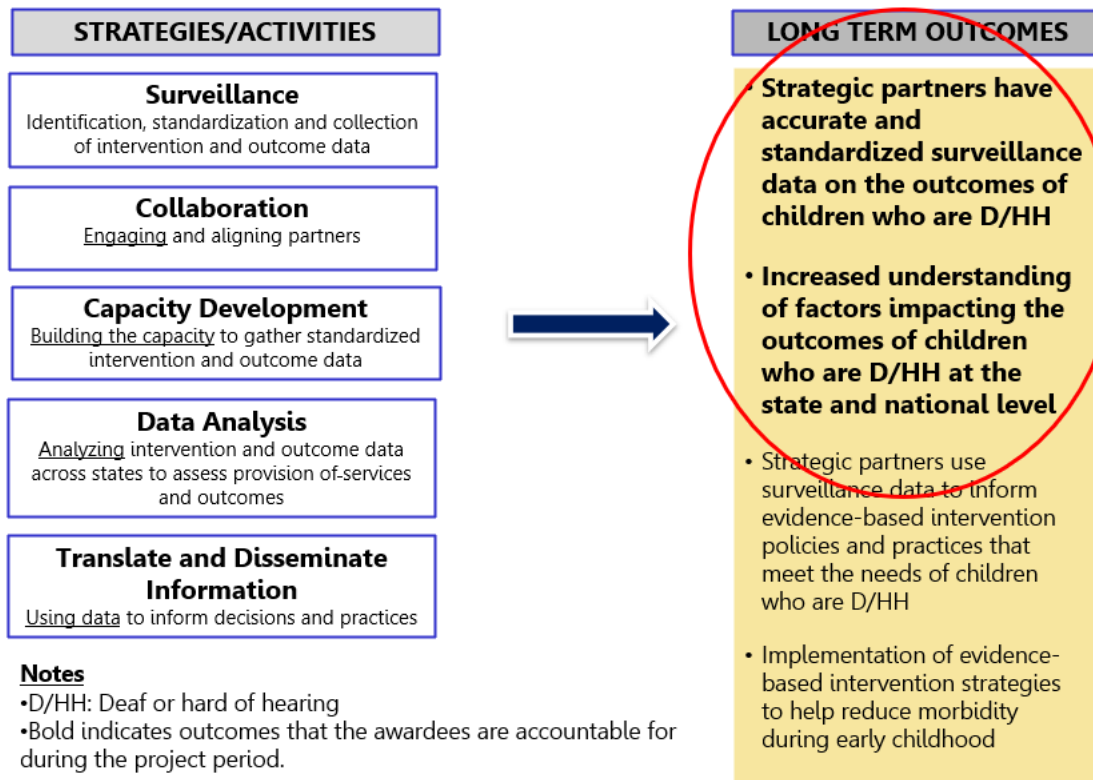
## Outcomes and Developmental Data Assistance Center for EHDI (ODDACE) Programs

- Notice of Funding Opportunity released in Spring, 2020
  - NCBDDD Outcomes and Developmental Data Assistance Center for EHDI (ODDACE) Programs, CDC-RFA-DD20-2005
  - Four Focus Areas
    - Strengthen capacity
    - Assess relationship of intervention and outcomes
    - Promote best practices
    - Assist in implementation



# Outcomes and Developmental Data Assistance Center for EHDI (ODDACE) Programs

## ODDACE Logic Model



# Project Goals

- **Support** states in assessing outcomes



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- **Support** states in assessing outcomes
- **Assist** states in using results to inform intervention
- **Develop** a national resource for EHDI that includes a comprehensive database of intervention and outcomes information
- **Determine** program, child, and family characteristics related to successful outcomes

# Eligible Program Participants

- All early intervention programs that serve children who are deaf/hard of hearing
- Individual interventionists
  - If not connected to a program or program as a whole is not participating
- Individual families
  - If program/interventionist is not participating

# Eligible Child Participants

- Ages 1 month to 3 years
  - Optional extension to age 6 years
- Unilateral or bilateral loss
- Any degree from mild to profound
- Additional disabilities or hearing loss only
- English, Spanish or ASL as language of the home

# Procedures

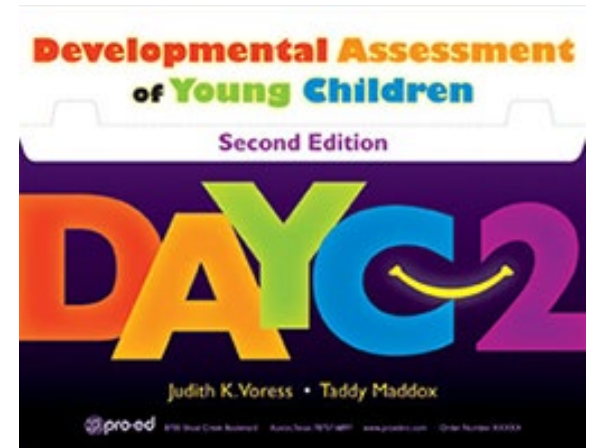
- Developmental assessments are completed by the parent and/or interventionist
- Assessment protocols are sent to the ODDACE team at the University of Colorado-Boulder
- Database of outcomes/test results is created and populated by the ODDACE team for each participating program

# Required Assessments



# DAYC-2: Domains Assessed

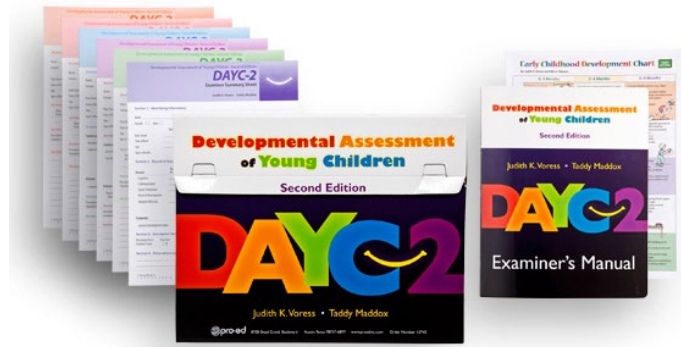
- Cognitive
- Communication
  - Expressive language
  - Language comprehension
- Social Emotional
- Physical
  - Gross motor
  - Fine motor
- Adaptive Behavior





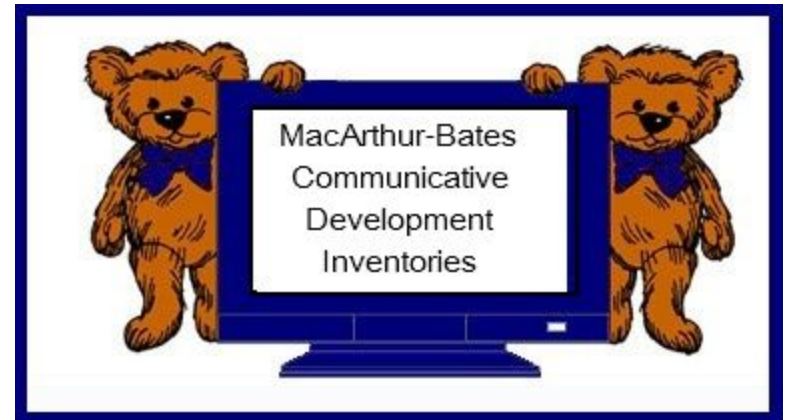
# Developmental Assessment of Young Children: DAYC-2

- 1 month to 5 years
- Assesses multiple developmental domains
- Interview and observation
- ODDACE has included ASL alternatives for spoken English items



# MacArthur-Bates Communicative Development Inventories

- 8 months to 3 years of age
- Completed by parent
- Words and Gestures
- Words and Sentences
- Level 3
- All levels measure expressive vocabulary
- English, Spanish and ASL versions



# Optional Assessments



# Communication Matrix

- Any age
- Interview and observation
- For children with global delays who are non-verbal
- Primarily focuses on pre-symbolic communication (e.g., gestures, eye gaze, facial expression, etc.)

**Key:**  
  = Suppassed  
  = Not Used  
  = Emerging  
  = Mastered

	I Expressions						II Intentional Balance						III Uniconventional Communication						IV Conventional Communication						V Gestural Symbols						VI Distal Symbols						VII Lexicons					
	A1	A2	A3	A4	A5	A6	B1	B2	B3	B4	B5	B6	C1	C2	C3	C4	C5	C6	C7	C8	C9	C10	C11	C12	C13	C14	C15	C16	C17	C18	C19	C20	C21	C22	C23	C24	C25					
I Expressions	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed					
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V Gestural Symbols	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed					
VI Distal Symbols	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed					
VII Lexicons	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed	Suppassed					

Communication Matrix Profile for Parents and Professionals Standard View

# Cincinnati Auditory Skills Checklist (ASC)

- Any age
- Interview and observation
- Measures skills in an auditory *only* condition
  - Without gestures, sign or speechreading



# SKI-HI Language Development Scale (LDS)

- 1 month to 5 years of age
- Measures receptive and expressive language
- Designed for children who are deaf or hard of hearing



# Language Environment Analysis (LENA)

- 2 months to 4 years of age
- Records full day of spoken language
- Measures both child output and parent input to child
- Compares to norms for child's age
- Free from ODDACE to pilot for a year



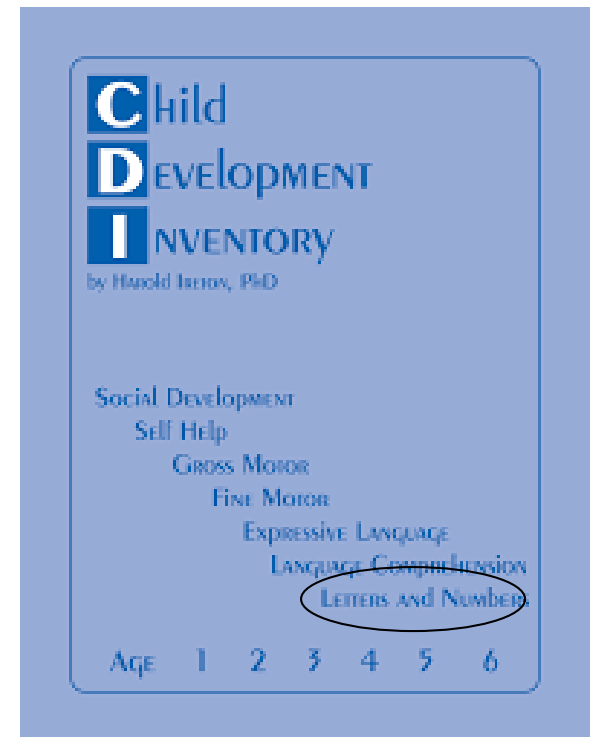
# Pragmatics Checklist

- 3- to 6-year-old assessment
- Interview and observation
- Checklist of 45 pragmatic skills



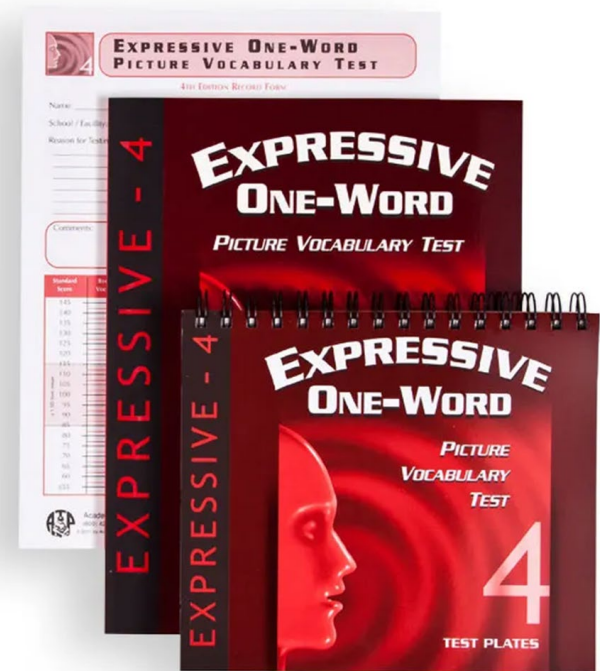
# Child Development Inventory: Letters and Numbers

- 3 to 6-year-old assessment
- Early literacy and numeracy skills
- Completed by parent



# Expressive One Word Picture Vocabulary Test (EOWPVT)

- 3- to 6-year-old assessment
- Administered by interventionist
- Child names pictures



# Clinical Evaluation of Language Fundamentals (CELF) Preschool-3

- 3 to 6-year-old assessment
- Administered by interventionist
- 10 language subtests
- Can administer a reduced set of subtests



# Services Provided by ODDACE

- Assessments scored
- Written report of results provided
- Graphic summary of developmental scores
- Comparison of scores to hearing norms
- Annual accountability report characterizing state's performance and comparing this to the national averages

# Overcoming Potential Obstacles

- Assessment can reduce time for intervention
  - Assessment is an integral part of intervention
  - Familiarizes family with developmental seq
  - Improves family's observation skills
- Other assessments are required by my program/state
  - Database can be created with assessments you need/want to use

# Benefits for Children and Families

- Includes parent input in assessment process
- Measures skills across variety of areas
- Identifies potential delays in a timely fashion
- Objectively monitors progress over time
- Compares performance to hearing children
- Enhances families' ability to observe and describe their child's skills

# Benefits for Interventionists

- Determines eligibility; help justify services
- Monitors progress of child
- Alerts interventionist to need for referral
- Provides data for Part C to Part B transition
- Assists in IFSP/IEP goal development
- Provides data-driven approach to educational programming decisions

# Benefits to All

- Contribution to national surveillance
  - Improve our understanding of language strengths and challenges of children with hearing loss
  - Help identify factors that are predictive of more successful language outcomes
  - Serve as a resource for EHDI stakeholders



# How to Participate

- If you are interested in participating and/or learning more, contact:
  - [Allison.Sedey@colorado.edu](mailto:Allison.Sedey@colorado.edu)
- Visit our website by Googling “ODDACE University of Colorado Boulder”\*

\*URL not available at time of recording

**The ODDACE team would love to collaborate  
with your state/program!**  
**Allison.Sedey@colorado.edu**

