Autism and Supporting Language Development
Choose Innovation Institute June 3-4, 2025

UNIVERSITY CENTER FOR EXCELLENCE IN DEVELOPMENTAL DISABILITIES
EDUCATION, RESEARCH AND SERVICE

Autism Spectrum Disorder and Supporting Language Development

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Presenter

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Thank you to colleagues with the Autism Programs:

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DISCLOSURES:

The presenter has no financial disclosures

Objectives: Participants will be able to

Recognize social communication characteristics and differences in language development in young children with autism

Describe research-based strategies to support language and social communication in autistic students across preschool settings

Find ASD-specific resources

Prevalence of Autism Spectrum Disorder Diagnosis

1 in 36*

Centers for Disease Control and Prevention (March 2023)

2020 data showed:

➤ Overall increase from 2020

➤ 1 in 4 ratio for females to males

➤ 30% increase in Asian, Black and Hispanic children diagnosed

Diagnostic and Statistical Manual (DSM-5-TR) Diagnostic Criteria

Less of these behaviors

Differences in Social Communication
Nonverbal Communication
Social Reciprocity
Relationships and Play

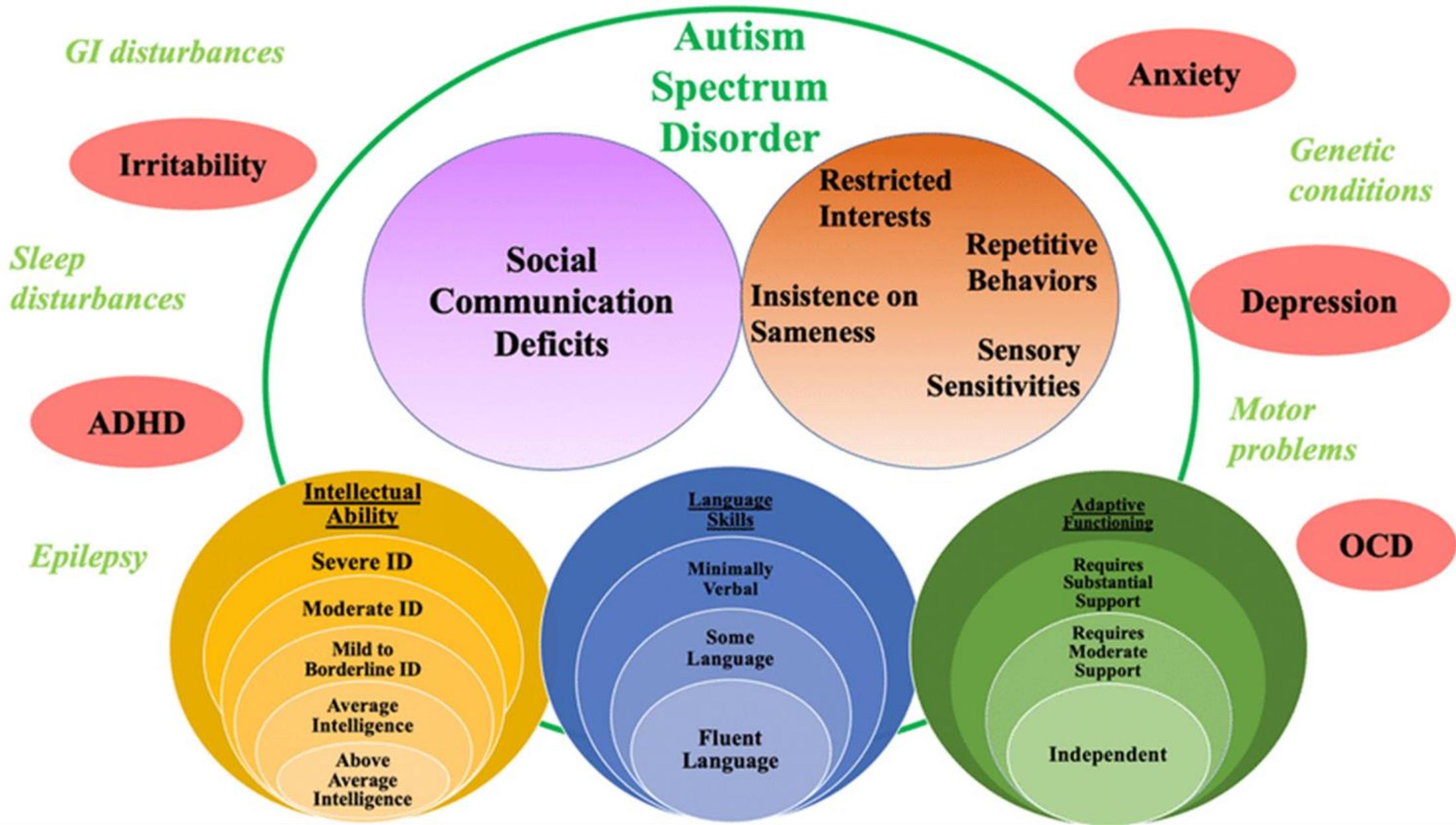| Restricted Interests and Repetitive Behaviors |
|---|
| Repeating sounds, words, movements |
| Preference for sameness |
| Intense or idiosyncratic interests |
| Sensory responses |

More of these behaviors

Rosen, N.E., Lord, C. & Volkmar, F.R. The Diagnosis of Autism: From Kanner to DSM–III to DSM–5 and Beyond. *J Autism Dev Disord* **51**, 4253–4270 (2021). https://doi.org/10.1007/s10803-021-04904-1

Social Emotional Reciprocity

Differences in the way interests are shared

Might not initiate or respond to social interactions

Differences in back and forth conversations

Non-verbal Communication Behaviors

Differences in eye contact, body language and use of gestures

Possible lack of facial expression and body language

Verbal and nonverbal behaviors might not be in sync

Developing, maintaining and understanding relationships

May not show interest in others, particularly peers

Challenges in making friends

Challenges in adjusting behavior to different social situations or partners

Video Examples

Autism Navigator

https://resources.autismnavigator.com/asdglossary/#/section/43/gettingStarted

Restricted, repetitive patterns of behavior, interests, or activities

Stereotyped or repetitive motor movements, use of objects, or speech

Prefer sameness and routines

Unique and/or intense interests

Different response to sensory input or strong interest in sensory experiences

Video Examples

Autism Navigator

https://resources.autismnavigator.com/asdglossary/#/section/43/gettingStarted
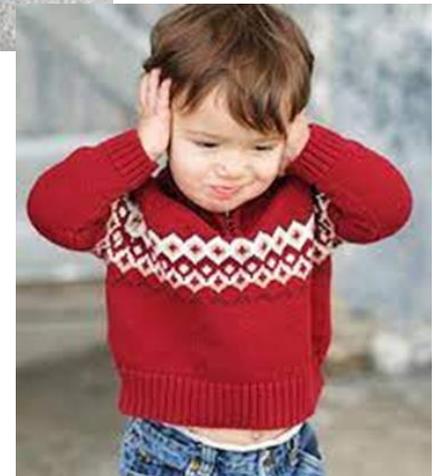
DSM-5 ASD Symptom Severity – Levels of Support

Level 1 – Needs Support	• Accommodations and intermittent support
Level 2 – Needs Substantial Support	• Direct teaching social communication and other specialized instruction
Level 3 – Needs Very Substantial Support	• Intensive intervention for functional and adaptive skills; high level of supervision

Neurotypical and Autistic Language Development

Why is language development different in autistic children?

Social Motivational theories:

Differences in orienting to social cues, seeking interaction, maintaining social engagement impact language outcomes

Communication Milestones – Preverbal

NEUROTYPICAL 0-6 MONTHS

Quiets or smiles when parent talks

Makes sounds back and forth with you

Vocalizations reflect when happy or upset

Recognizes loved ones

Turns or looks toward people talking: attention to a social cue

4 – 6 months: Giggles and laughs, responds to facial expressions, looks at objects of interest, vocalizes during play

ATYPICAL DEVELOPMENT

May not orient to voices

Little or no emotional response to familiar voices

May not distinguish between familiar and unfamiliar voices

Difficult to comfort

Less happy sounds; cries difficult to read

Limited response to sounds

Communication Milestones – Preverbal

NEUROTYPICAL 6-12 MONTHS

6-9 months: Looks at you when you call their name. Stops when you say "no"

Looks for loved ones when upset, raises arms to be picked up

Recognizes the names of some people and objects

Reaches for objects; points, waves, shows or gives objects

Imitates and initiates social gestures (blow kiss, peek-a-boo)

Babbles, tries to copy sounds, may say first words

ATYPICAL DEVELOPMENT

Little to no babbling

Limited back and forth social interaction

Difficulty to understand what baby wants

Limited response to name

May not understand or respond to "no"

May not recognize names for persons and objects

Limited gestures

Communication Milestones – FIRST WORDS

NEUROTYPICAL 12-18 MONTHS

Phonology: 2-8 different consonants, combines syllables and real words with speech-like inflection

Vocabulary: Understands and uses words for objects, actions, and people

Pragmatics: Communicates for different intentions: request, comment, get information

Uses a variety of gestures: shake and nod head, clap, high-five: "16 by 16"

ATYPICAL DEVELOPMENT

May be more repetitive or use echolalia

Vocabulary strengths: shapes, letters, numbers

Communicates social intentions less frequently.

Fewer variety of gestures

Nonverbal communication not integrated

Communication Milestones – WORD COMBINATIONS

NEUROTYPICAL 18-30 MONTHS

Understands and uses 50 different words

Follows related two-step directions

Puts two or more words* together for a variety of purposes

Uses words to ask for help

Initiates and responds

ATYPICAL DEVELOPMENT

Expressive language skills may appear stronger that receptive. May use more scripted speech, delayed echolalia

Less initiation socially and verbally

•Independent vs asking for help

•Usually to meet personal needs

Initiates interaction more than responding to others

•Shares information on strong interests

•Directs rather than cooperates in play

Communication Milestones – Sentences

NEUROTYPICAL 30-48 MONTHS

Speech becomes more clear

Asks and answers questions including why and how

Using grammatical morphemes

Sentences are longer: 3-4 words

Narration

Talks about past and future events

ATYPICAL DEVELOPMENT

Differences in speech intonation may be apparent

Greatest difficulty with social pragmatics

May ask repetitive questions or verbal routines

May have difficulty initiating, responding, maintaining conversation

Experts in specific interests

Intervention for ASD

Intervention Goals for ASD

To improve functional and social communication skills
- Initiate spontaneous communication in functional activities
- Engage in reciprocal communication interactions
- Generalize skills across activities, environments, and social partners

Independence, Inclusion, and Quality of Life

Principles of Intervention for ASD

Evidence-based
- Published research and practical experience shows the practice is effective

Socially Valid
- Based on family and student's goals and preferences

Developmental
- Sequence and process of typical language development provides a framework

Data Informed
- Progress is measured frequently and intervention is adapted as needed

Engaging
- Builds motivation based on individual strengths and interests

What is Applied Behavior Analysis (ABA)?

A system of techniques and principles to teach new skills and change behavior

- Individualized goals
- Intensive intervention – may be 10-40 hours a week
- Complex behaviors may be broken down to teachable steps
- Systematic prompting and reinforcement
- Services implemented by qualified professionals: Master and Doctorate level Board Certified Behavior Analysts oversee behavior therapists)

Naturalistic Developmental Behavioral Interventions: NDBI

Project ImPACT: Improving Parents as Communication Teachers

Early StartDenver Model – child-led, play-based treatment approach

Reciprocal Imitation Training (RIT)

JASPER: Joint Attention, Symbolic Play Engagement and Regulation)

SCERTS: Social Communication/Emotional Regulation/Transactional Supports

Routines

Meaningful functional activities with predictable steps

➢Creates repeated opportunities for receptive and expressive communication
  ➢objects, actions, descriptive language

Think of Routines in your Classroom:

How do we scaffold routines for students at different levels of development?
  ◦ Preverbal
  ◦ First Words
  ◦ Word Combinations
  ◦ Sentences

Reinforcement

Any response to a behavior that increases the likelihood of the behavior happening again

➤ Non-contingent reinforcement and Pairing

➤ Differential reinforcement

➤ Naturalistic and social reinforcement

➤ Pivotal skill for motivation and other learning

Reinforcement

Differential Reinforcement: Response to the presence or absence of a behavior.

What communication behaviors would you reinforce for learners at different stages?

◦ Preverbal
◦ First words
◦ Word Combinations
◦ Sentences

Reciprocity

Meaningful back and forth social interaction between two people (1:1)

How do we support reciprocity for students at different levels of development?

- Pre-verbal
- First words
- Word Combinations
- Sentences

Evidence-Based Treatment Modes/Modalities

Augmentative and Alternative Communication (AAC)

PECS: Picture Exchange Communication System
SGD: Speech Generating Devices
Communication Boards
Objects
Gestures
Sign language

Evidence-Based Treatment Modes/Modalities

Activity Schedules/Visual Supports

Objects, photos, drawings, text

- ✓ To complete a task
- ✓ To complete a sequence of tasks
- ✓ To transition for one task to another
- ✓ To reinforce appropriate behavior

Other Evidence-Based Practices for Communication ages 0-5

Focused interventions based on principles of applied behavior analysis (ABA)

- Antecedent Based Intervention
- Behavioral momentum intervention
- Functional Communication Training
- Direct instruction and Discrete Trial Training
- Music Mediated Intervention

https://autismpdc.fpg.unc.edu/

Other Evidence-Based Practices for Communication ages 0-5

<u>Focused interventions based on principles of applied behavior analysis (ABA)</u>

- Peer-Mediated/Implemented Interventions
- Social Narratives
- Social Skills Training groups
- Video Modeling
- Visual Supports

https://autismpdc.fpg.unc.edu/

Treatment Modes/Modalities

Computer Based Instruction

Teach language, vocabulary, social skills, social understanding, and social problem solving (*FaceSay, Mind Reading*)

Video Modeling and video self-modeling

Video recordings of desired behaviors and then the individual imitates the behavior/social skill (*Everyday Speech*)

Service Delivery Options

Direct Service

• Format (one-on-one or in group)

• Provider (SLP, caregiver)

• Dosage (frequency, intensity, and duration of service)

• Setting (home, school, clinic)

Other Service Delivery Options

Collaboration – for example, planning lessons with teachers to increase social communication opportunities

Consultation – for example, observing various times on the playground and meeting with classroom teacher on monthly basis to discuss ongoing social situations/social difficulties

Training – for example, providing staff training about implications for social language deficits

Advocacy – for example, teach student how to advocate for his needs and weaknesses (break card, IEP meeting)

Caregiver Training

Parent coaching	Parent Mediated Intervention
• Build parent knowledge • Indirect • Coach is the "therapist" • Parent role is less active	• Builds parent skills • Direct impact on child • Parent is the "therapist" • Active parent role

Resources

UNM CDD Resources AUTISM PORTAL

UNM CDD Resources for 0-3

https://cdd.health.unm.edu/autismportal/resources-for-0-3-years-old/

UNM CDD Autism Portal Trainings for Providers

https://cdd.health.unm.edu/autismportal/online-training/for-providers/

UNM CDD Autism Portal Trainings for Parents

https://cdd.health.unm.edu/autismportal/online-training/for-parents/

UNM CDD Autism Resource Locator

https://cdd.health.unm.edu/autismportal/survey/

FINDER

NEW MEXICO DISABILITY RESOURCES

Seek. Discover. Connect. Inform.

Seek. Discover. Connect. Inform.

NM FINDER is a **free** online resource that gives you 24/7 access to the service providers, programs, equipment and community advocates that can improve your quality of life.

https://www.nmfinder.org/

CDD Autism Family and Provider Resource Team

✓ Family Peer Support Workers

✓ Personalized support via phone

We are a state-wide team of resource specialist able to assist individuals on the autism spectrum, families, and providers in locating autism specific resources as well as guidance in navigating the various systems associated with autism.

CENTER FOR DEVELOPMENT & DISABILITY
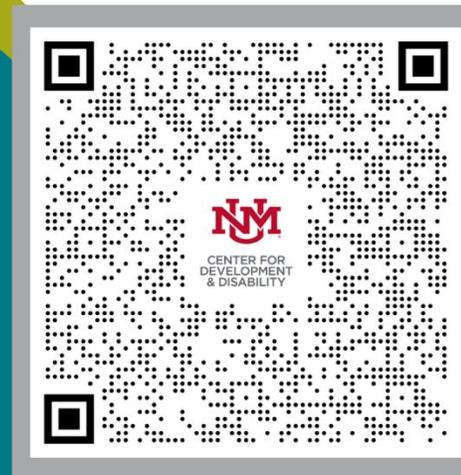
Please Contact Us At:
(505) 272-1852
Toll-Free 1-800-270-1861
HSC-AutismPrograms@salud.unm.edu

Parent Coaching at CDD
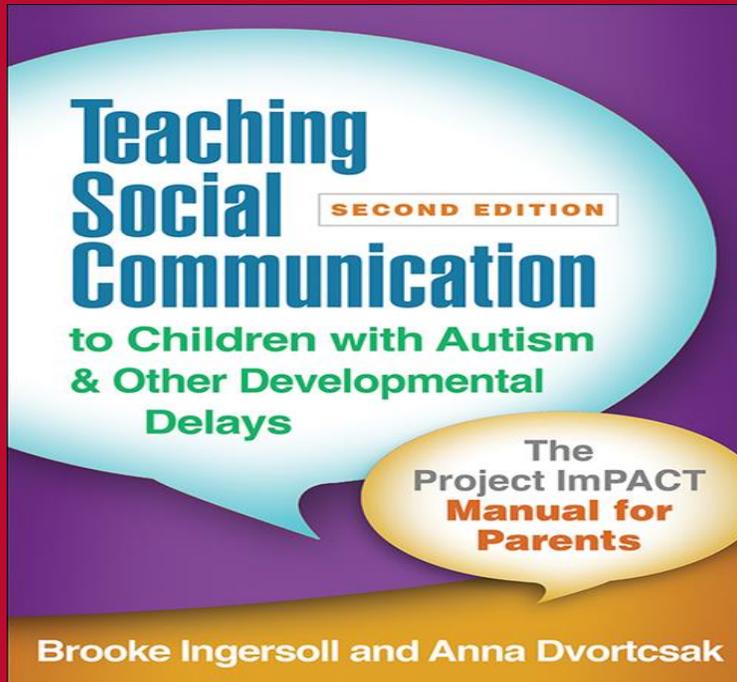
Autism Parent Home Training (PHT) Program

- Statewide
- Children through age 5 with a confirmed diagnosis of ASD
- 6 sessions home or telehealth visits
- Parent consultation model: can work on a variety of skills/goal areas

For further information or to make a referral:
  ◦ Sylvia Acosta, 505-272-4725; syacosta@salud.unm.edu

Parent Mediated Intervention at CDD

Teaching Social Communication to Children with Autism & Other Developmental Delays — SECOND EDITION — The Project ImPACT Manual for Parents

Brooke Ingersoll and Anna Dvortcsak

- Project ImPACT (Improving Parents as Communication Teachers)
- Coaches parents to help their child develop:
  - Social engagement, communication, imitation, and play skills
  - Implemented during daily routines/activities and play
- Toddler/preschool age children up to age 6-7
- Parent manual available in English and Spanish
- Twelve 1 ½ hour weekly sessions

https://www.project-impact.org/

Educational Supports (Special Education)

11 IEP Considerations for Students with Autism

1. Extended School Year
2. Daily Schedules
3. In-home and community based training
4. Positive behavior support strategies
5. Futures planning

6. Parent/family training and support
7. Staff to student ratio
8. Communication interventions
9. Social Skills supports
10. Professional educator/staff support
11. Evidence-based teaching strategies

https://cdd.health.unm.edu/autismportal/wp-content/uploads/2023/08/15-3_-IEP-Considerations.pdf

Where do I find evidenced based interventions for ASD?

National Professional Development Center (2014)
https://autismpdc.fpg.unc.edu/national-professional-development-center-autism-spectrum-disorder

National Standards Project 2 (2015)

https://nationalautismcenter.org/national-standards/phase-3/

The National Clearinghouse on Autism Evidence and Practice (2020)

https://ncaep.fpg.unc.edu/

NM Medicaid ABA Guidelines

NM Turquoise Care covers ABA services. Parents can request care coordination from Managed care organization.

At-risk category for ages 12 months to 36 months who present with multiple risk factors

Must have a medical diagnosis from an approved Autism Evaluation Practitioner (AEP) or be on a waitlist

Gaps in service continue to exist

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