

The Clinical Assessment of Language Comprehension

by

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PROCEDURE



Comprehension of Familiar Routines

DEVELOPMENTAL LEVEL

8-12 months

LINGUISTIC LEVEL

Lexical

LINGUISTIC STIMULI

Words taken from routine games played regularly by the child and parent or caregiver

RESPONSE TYPE

Natural—behavioral compliance: entering the game when mentioned with appropriate gestures

MATERIALS

None

PROCEDURE

- 1. Ask parents to demonstrate one of the games they often play with the child (e.g., pat-a-cake, peekaboo, "So Big," "I'm gonna-get-you") without using gestures or motor activities to cue the child.
- 2. Play more than one game when possible and use appropriate intonation both with and without words to distinguish between intonation and lexical cues.
- If the child fails to respond to the words for any game, take the opportunity to demonstrate to parents the power of gestures in cuing what appear to be appropriate responses to verbal language.
- 4. Record responses on a score sheet like the one on page 35.

PASSING RESPONSE

The child enters game(s) at parent's or caregiver's verbal request with appropriate gestures.

PROCEDURE



Joint Reference Activity

DEVELOPMENTAL LEVEL

8 months and up

LINGUISTIC LEVEL

Discourse

LINGUISTIC STIMULI

Natural conversation

RESPONSE TYPE

Natural—behavioral compliance

MATERIALS

Age-appropriate toys

Procedure

- 1. Have the parent play with toys and talk with the child as he or she might at home.
- Observe whether the child's attention can be directed to particular objects and activities by the parent's use of speech and gestures. Attention is signaled by looking at the object the parent points out, moving toward it, or acting on it in some way.

Note that the purpose of this procedure is *not* to ascertain whether the child has lexical comprehension of the words the parent uses, but whether the child can use auditory and visual cues to focus attention on objects of common interest. This ability lays the basis for the comprehension strategy examined in Procedure 2.3.

Record responses on a score sheet like the one on page 35.

PASSING RESPONSE

The child attends to objects indicated by the parent.

DIAGNOSTIC NOTE

Children with autism often have more difficulty in this area of discourse development than children without autism (Wetherby & Prutting, 1984). Therefore, it is a good diagnostic indicator. If a child shows frequent request functions using nonverbal means (e.g., pulling an adult to an object), but makes very little use of joint attention, autism may be suspected. Children who show joint attentional behavior, however, but are not using verbal means of expression, may have a more specific language disorder.

PROCEDURE

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Comprehension of Object and Person Names

DEVELOPMENTAL LEVEL

12-18 months

LINGUISTIC LEVEL

Lexical

LINGUISTIC STIMULI

Object names produced by the child or that the parents believe the child knows

RESPONSE TYPE

Natural—attention to objects

MATERIALS

- Toys or objects brought by the parent whose names the child says or may know
- Other common objects, such as a shoe, diaper, bottle, ball, truck, and baby doll
- To test for comprehension of person names, one or two people the child knows (e.g., parent[s], a caregiver)

PROCEDURE

- 1. Place several of the objects on the floor in front of the child.
- 2. Get the child's attention by calling his or her name in a loud, singsong manner.
- 3. Present the name of the object you want the child to choose in a simple carrier phrase such as, "Where's the shoe?" Use exaggerated intonation to mark the object's name (shoe). Repetition of the carrier phrase is allowed.
- 4. Repeat the procedure using different objects. Be sure to name an object the child is not already attending to, and be sure not to point to or look at the object you are naming. (This is harder to do than it sounds!) Only those objects on which the child is to act should be visible. In a novel situation, young children may be too distracted if extraneous stimuli are not controlled. Person names may be tested as well, by asking, "Where's Mama?" or by asking the child to indicate other familiar people in the room when the child is looking elsewhere.
- 5. Record responses on a score sheet like the one on page 35.

PASSING RESPONSE

The child looks at, shows, or gets object named or the child looks at or indicates person named. An appropriate response is repeated in several trials for each object or person name.

RESPONSE STRATEGIES

- Look at what the adults look at
- Act on objects noticed
- Imitate ongoing activities

To avoid being misled by these strategies, be sure not to look at the object being named, or to use any gestures in administering these items.

PROCEDURE 2.6



DEVELOPMENTAL LEVEL

18-24 months

LINGUISTIC LEVEL

Syntactic

LINGUISTIC STIMULI

Person, object, and action words combined to express the following semantic relations:

Possessor-Possession (e.g., Mommy's shoe)

Action-Object (e.g., Kiss the truck!)

Agent-Action with child as agent (e.g., *Maria*, *jump!*) Agent-Action-Object (e.g., *Maria*, *kiss the truck!*)

RESPONSE TYPE

Natural—behavioral compliance

MATERIALS

- Toys or objects brought by the parent whose names the child says or may know
- Other common objects, such as a shoe, diaper, bottle, ball, truck, and baby doll
- To test for comprehension of person names, one or two people the child knows (e.g., parent[s], a caregiver)

PROCEDURE

1. Choose objects and actions for which the child has demonstrated comprehension in Procedures 2.3 and 2.4.

Possessor-Possession: Ask the child, "Where's Mama's shoe?" versus "Where's (child's) shoe?"; "Where's (child's) nose?" versus "Where's Mama's nose?"

Action-Object: Ask the child to perform an unconventional action on an object he or she is not already attending to. For example, if the child is holding a doll, say "Kiss the truck," rather than "Kiss the doll."

Agent-Action and Agent-Action-Object with the child as agent: Ask the child to perform an action ("Sally, jump!") or an action on an object ("Sally, bite the doll!") to which the child is not already attending.

2. Record responses on a score sheet like the one on page 35.

PASSING RESPONSE

The child responds correctly to both elements in the instruction. The response is repeated in several trials.

RESPONSE STRATEGIES

- Locate objects mentionedGive evidence of notice

- "Do what you usually do" (i.e., conventional action)
 "Child as agent" (i.e., child acts on objects or persons in the way mentioned)

PROCEDURE 3.3

Comprehension of Twoand Three-Word Instructions with Toys as Agents

DEVELOPMENTAL LEVEL

24-48 months

LINGUISTIC LEVEL

Syntactic

LINGUISTIC STIMULI

Agent-action and agent-action-object relations with an agent other than the child specified

RESPONSE TYPE

Contrived—object manipulation

MATERIALS

- Toys or objects brought by the parent whose names the child says or may know
- Other common objects, such as a shoe, diaper, bottle, ball, truck, baby doll, puppets, and toy animals (This should include items that can serve as agents of actions.)

PROCEDURE

- 1. Plan to use vocabulary from Procedures 2.3 and 2.4 for which the child has demonstrated comprehension.
- 2. Familiarize the child with names for the new "agent" toys, and check the child's knowledge of these names.
- 3. Have several objects available from which the child must choose.
- 4. Ask the child to act out the instruction such as:

horse eat doll kiss comb
cow drink horse eat spoon
doll comb doll kick cup
horse run cow throw comb
doll eat horse hit cup

Instructions should be presented in a simple carrier phrase, such as "Make the horse eat," or "Show me: 'The doll kisses the comb.'" Three-word instructions should *not* be semantically reversible.

5. Record responses on a score sheet like the one on page 125.

PASSING RESPONSE

The child chooses the correct agent from the array and uses it to perform the mentioned action. For three-word instructions, the correct agent and object must be chosen and the appropriate action demonstrated on the object. Responses should be repeated over several trials.

RESPONSE STRATEGIES

- "Child-as-agent" (i.e., child acts on objects him- or herself in the way mentioned)
- "Do what you usually do" (i.e., conventional use of objects)
- "Probable event"

The latter two strategies listed above may be identified only at the end of testing when the pattern of responses also is identified.

PROCEDURAL NOTE

The data collected from this procedure can be added to those gathered in Procedures 2.1–2.6 to get a cumulative picture of developing sentence comprehension. If the child passes most of the irreversible three-word items tested here, assessment can go on with Procedure 3.7 to examine more complex word-order comprehension tasks. If the child does not pass any three-word items, it is unlikely that he or she will be successful with the word-order items in Procedure 3.7. The clinician should not administer Procedure 3.7 to this child.

PROCEDURE 2 1

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Comprehension of Locatives: Search Task

DEVELOPMENTAL LEVEL

30-48 months

LINGUISTIC LEVEL

Lexical

LINGUISTIC STIMULI

Prepositions in, on, under, behind, in front of, and beside

RESPONSE TYPE

Natural—behavioral compliance

MATERIALS

- Toy mailbox or egg carton for reference object
- Six small boxes and six raisins, peanuts, or small candies
- A piece of cardboard for use as a screen

PROCEDURE

- 1. Place the six small boxes in the six locative positions (indicated by the prepositions above) relative to the toy mailbox.
- 2. Introduce the toy mailbox and the screen to the child.
- Give the child the following instructions: "Here is a raisin (or peanut or candy). I'm going to hide it and I'll tell you where to find it."
- 4. Put up the screen between the child and the test items.
- 5. Hide one raisin (or peanut or candy) under the small box *in* the mailbox.
- 6. Remove the screen.
- 7. Tell the child, "The candy is in the mailbox."
- 8. Record the child's response on a score sheet like the one on page 126. Normative data from Hodun (1975) appear there.
- 9. Put the screen up again and repeat the procedure using the next stimulus locative. The stimulus locatives must be presented in the following order: *in*, *on*, *under*, *behind*, *in front of*, *beside*. Because the first three locatives are the easiest, they are presented first to ensure some success. Alter the stimulus sentence as appropriate for each locative preposition.

PASSING RESPONSE

The child finds the prize (raisin, peanut, or candy) under the appropriate box. Response is repeated on several trials with different target objects.

RESPONSE STRATEGY

• "Probable location" (i.e., child searches for objects where they are usually found)

DEVELOPMENTAL NOTE

Although *in*, *on*, and *under* are understood by 50%–85% of children at 30 months of age, *in front of* and *beside* are not comprehended by most children until 42 months (Hodun, 1975). Hodun (1975) reports that this search task is easier for children than the placement task (see Procedure 3.5).

PROCEDURE 3.5

Comprehension of Locatives: Placement Task

DEVELOPMENTAL LEVEL

30-48 months

LINGUISTIC LEVEL

Lexical

LINGUISTIC STIMULI

Prepositions in, on, under, behind, in front of, and beside

RESPONSE TYPE

Natural—behavioral compliance

MATERIALS

- Two toys that can serve as agents (e.g., stuffed animals)
- Small toys, candies, or raisins
- A small bag
- Large fronted reference object(s) with suitable hiding places for all prepositions listed, such as mailbox, stove, desk, money box, truck, or jeep

Procedure

1. Give the child instructions similar to the following:

"I would like you to play a game with me. Here, meet my two friends, Pinky (toy hippo) and Red (toy dog). Let's play with my friends and the toys over here (next to reference objects). Do you know what these are called? That's right, this is a mailbox, a stove, a desk, a money box, a truck, and a jeep. (The child's own names for the objects are used throughout the procedure wherever these differ from the ones originally assigned.) I'll show you how to play this game with my friends. See Pinky? He wants to go in the truck. Put Pinky in the truck. Thank you. That's where he wanted to go. Let's play again. Here's Pinky...."

Include in the instructions improbable locations to differentiate response strategies from comprehension. Test *in*, *on*, and *under* first, giving at least three test items for each preposition. If the child is consistently successful, contrive to test each of the other terms, also giving three trials for each. If the child is unsuccessful on two of three of the first three prepositions tested, discontinue testing.

2. Record responses on a score sheet like the one on page 126. Use the scoring key on the score sheet to simplify the process. If the child's response is incorrect, note the number of the preposition where the child did place the object. For example, if the child was told to place the object *beside* the mailbox and he or she placed it *in* the mailbox, record X1 in the box for that trial. These notes will allow the clinician to review the score sheet for patterns of response strategies later. Normative data from Hodun (1975) appear on the score sheet on page 126.

PASSING RESPONSE

The child consistently places objects correctly according to the preposition named in the instruction.

RESPONSE STRATEGY

"Probable location" (i.e., child puts objects in containers and on surfaces)

PROCEDURE 3.6



Comprehension of Locatives: Body Placement Task

DEVELOPMENTAL LEVEL

30-48 months

LINGUISTIC LEVEL

Lexical

LINGUISTIC STIMULI

Prepositions in, on, under, behind, in front of, and beside

RESPONSE TYPE

Natural—behavioral compliance

MATERIALS

• A large wooden or cardboard box with the cover attached to one side to mark the front (reference object)

PROCEDURE

- Place the box about 6 feet from the child with its front facing him or her.
- 2. Tell the child, "Let's play a game. I'll tell you where to hide. Go in the box."
- 3. Record the response on a score sheet like the one on page 126.
- 4. Repeat the procedure using the next locative. The stimulus locatives must be provided in the following order: *in*, *on*, *under*, *behind*, *in front of*, *beside*.

PASSING RESPONSE

The child moves to the appropriate position. Response is repeated in several trials.

RESPONSE STRATEGY

• "Probable location" (i.e., child searches for objects where they are usually found)

FOR USE WITH
PROCEDURE:
3.3



SCORE SHEET Assessing Comprehension of Two- and Three-Word Instructions with Toys as Agents

Instructions: In the left column, list the stimulus items to be administered by the adult. In the middle column, record the child's response using the scoring key below. In the right column, notes may be made about the child's response; for example, if in response to "horse eat" the child picks up the toy horse and flies it around the room, a note should be made that the child selected the correct agent.

Child's name:	
Child's chronological age (years.months):	
Date:	

Adult's utterance	Child's response	Notes about child's response
horse eat		
cow drink		
doll Kiss comb		
doll Kiss comb horse eat spoon		

Scoring key:

+ = Correct response

-= Incorrect response

NR = No response

IN = Inappropriate response

FOR USE WITH PROCEDURES: 3.4 3.5 3.6



SCORE SHEET Assessing Comprehension of Locatives

Instructions: For each locative word (e.g., in), record in the box corresponding to the trial a ✓ for a correct response, an X for an incorrect response, or NR for no response. If you choose to assess locatives with Procedure 3.4, use the Search Task grid to record responses. If you choose Procedure 3.5 or 3.6, use the Placement Task grid. (Only one of these procedures is needed to assess locative comprehension for any given child. Choose the procedure that best seems to address the child's abilities and interests.) If the child's response is incorrect, note the number of the preposition that indicates the child's response. For example, if in the Placement Task the child was told to place the object beside the mailbox and he or she placed it in the mailbox, record X1 in the box for that trial. Later, review these responses for patterns of response strategies. If there is no response, this should not be recorded as an incorrect response. Normative data are provided below for comparative purposes.

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		Search Task Trials							Placement Task Trials									
	1	2		4		6		8	9	1	2	3	4	5	6	7	8	9
1. ln																		
2. On																		
3. Under																		
4. Behind																		
5. In front of																		
6. Beside																		

Percentage correct scores for two age groups on placement and search tasks for locatives

	30 mg	onths	
Locative	Placement	Search	Combined
In	87.5	83.3	85.4
On	62.5	58.3	60.4
Under	50.0	70.8	60.4
Behind	4.2	33.3	18.8
In front of	8.3	37.5	22.9
Beside	0.0	0.0	0.0
	42 mo	nths	
Locative	Placement	Search	Combined
In	100.0	100.0	100.0
On	95.8	100.0	97.9
Under	79.2	83.3	81.3
Behind	58.5	66.7	62.5
In front of	70.8	87.5	79.2
Beside	37.5	50.0	43.8

Source: Hodun (1975).

FOR USE WITH PROCEDURES: 3.8 3.9

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SCORE SHEET Assessing Answers to Questions

Instructions: This form provides spaces to record responses for as many as four trials per question type entry. More trials may be used, if necessary, by photocopying this form. Fewer than four trials may be used, but a minimum of two is recommended. The scoring key below should be used to code the child's responses. If the child responds inappropriately (e.g., *IN* is entered for response), make notes about the child's response(s) in the right column. These notes will enable you to determine how the child is interpreting specific question types and which response strategies he or she is using. For example, a child who consistently answers "why" questions as "what" questions may be using a "supply the missing information" response strategy. Knowing this can be helpful in planning intervention.

Child's name:	
Child's chronological age (years.months):	
Date:	

	Age of		Tri	als				
Question type	mastery	1	2	3	4	Notes on child's response		
Yes/no	2.0+							
What?	2.6+							
What (X) doing?	2.6+							
Where (place)?	2.6+							
Where (direction)?	2.6+							
Whose?	3.0+							
Who?	3.0+							
Why?	3.0+							
How many?	3.0+							
How?	3.6+							
How much?	4.0+		İ					
How long (duration)?	4.0+							
How far?	4.0+							
How often?	4.6+		-					
When?	4.6+							

Scoring key:

- + = (Semantically) correct response
- = (Semantically) incorrect response
- NR = No response
- IN = Inappropriate response

FOR USE WITH PROCEDURE: 3.9



SCRIPT SCORE SHEET Question Comprehension: Structured Format

Instructions: This score sheet has been developed for the example script known as "The Car Story." For each question below, categorize and record the child's response in the correct column under scoring key. Remember that the child's response does not have to be strictly true to be recorded as correct. What is important is that the child give the correct type of answer.

Child's name:				_
Child's chronological age (year	s.months):			
Date:				X
		Scoring	g key	•
Script entry	Correct motor response	Correct verbal response	Incorrect response	No response
1. Is this a dog? (no) It's pretty. It's a car				

Script entry	Correct motor response	Correct verbal response	Incorrect response	No response
1. Is this a dog? (no) It's pretty. It's a car. Look it goes, Vroom! Vroom	!			
 It can go here. (on table) It goes fast. Bye-bye car. Where is it going? (Place in garage of dollhouse) 				
3. Let's give Mommy a ride. Here she goes. Who is in the car? Bye-bye, Mommy.				
4. Give me the toy. (Clinician places Mommy doll in bed.) Where is shee Mommy is tired. Mommy is going to bed.				
5. What is Mommy doing? (sleeping) Sh. Be very quiet. Don't wake Mommy. Here comes Daddy.				nd. ·

	Scoring key								
Script entry	Correct motor response	Correct verbal response	Incorrect response	No response					
 Daddy wants supper. Let's find something to eat. Where is Daddy going? (Clinician moves Daddy doll toward kitchen.) Sit down here, Daddy. 									
7. Daddy's finished eating. That was good. Who is eating? Let's go for a walk.									
8. Daddy has a doggie. Here's the doggie. <i>Whose doggie?</i> The doggie is tired.									
9. Here is the ball. Let's play ball. It's red. What is it?									
10. Here comes doggie. Doggie says bow-wow. Doggie has two friends. How many friends?									
11. Look at Daddy (Clinician moves Daddy doll in walking fashion.) <i>What is Daddy doing?</i> Hurry up, Daddy. Sit down.									
12. Who sits down? Daddy's in the chair. Daddy reads the book Here comes Mommy.									

	Scoring key			
Script entry	Correct motor response	Correct verbal response	Incorrect response	No response
13. Mommy says Hi. Whose book? It's a storybook.				
14. Whose is it? (Point to child's shoe) See my watch. My watch goes tick, tick. It's round.				
15. I like toys. Is Mommy here? Stand up. Sit down.				
16. Here are the blocks. (Clinician dumps blocks on table.) Oh look. How many? Let's put the key away.				
17. Here is something It's red. It's square. Is it a block?				
18. How many? (Clinician adds blocks.) I'll put one here and here (builds tower) Push them down.				
19. Look at this. (Clinician gets a truck.) See it go. What is this? (truck) Vroom. Vroom.				
20. Put the blocks in the truck. Watch the truck. (Clinician moves the truck.) What is it doing? It can go fast.				16.011

FOR USE WITH PROCEDURE: 3.9



SCRIPT SCORE SHEET Question Comprehension: Structured Format

Instructions: This score sheet has been developed for the example script known as "The Cookie Monster Story." For each question posed to the child, record the child's response verbatim in the third column.

Child's name:	\Diamond
Child's chronological age (years.months):	
Date:	

Action of puppets	Question to child	Child's response
Grunge hits Cookie Monster with a stick.	What is Grunge doing?	
Grunge hits Cookie Monster with a stick and says "I want your cookies."	How is Grunge hitting Cookie Monster?	
Grunge alternately hits Cookie Monster and Cookie Monster's cookies. Cookie Monster alternately cries "Ouch" when hit and "Oh, my poor cookies" when they are being hit. Narrator: Oh, no! Grunge is still hitting. Boy is he mean.	Why is Grunge hitting Cookie Monster?	
Grunge alternately punches Cookie Monster and throws rocks at him. Cookie Monster alternately cries "Ouch, mean Grunge" and "Ouch, Ooooo those rocks."	Who is hitting Cookie Monster?	
	What is hitting Cookie Monster?	

Action of puppets	Question to child	Child's response
Cookie Monster retreats and hides under a box.	Where is Cookie Monster hiding?	
	Why is Cookie Monster hiding?	
Cookie Monster comes out of hiding and grabs the stick and starts hitting Grunge.	What is Cookie Monster doing?	
Cookie Monster hits Grunge with a stick, simultaneously saying, "I want my cookies back."	How is Cookie Monster hitting Grunge?	
	Why is Cookie Monster hitting Grunge?	
Cookie Monster alternately hits Grunge and Grunge's toy car. Grunge alternately cries "Ouch" when hit and "Oh, my poor car" when it is hit. Narrator: "Cookie Monster is hitting now."	Who is Cookie Monster hitting?	
	What is Cookie Monster hitting?	
Cookie Monster alternately hits Grunge and throws rocks at him. Grunge alternately cries "Ouch, mean Cookie Monster" and "Ouch, Ooooo those rocks."	Who is hitting Grunge?	
	What is hitting Grunge?	
Grunge retreats and hides under a box.	Why is Grunge hiding?	
Cookie Monster gets back his cookies.	Where is Grunge hiding?	