

Supplemental Table 1. Six-level Visual Behavior Scale (VBS) completed based on ophthalmologist's examination.

6	No behavioral response to light
5	Response to light under any ambient illumination
4	Response to motion
3	Poor fixation, but redirection of gaze or head position toward any object (e.g., face or large toy)
2	Ability to accurately fixate and follow a 6-inch colorful toy, at a distance of 1 foot against any background
1	Ability to accurately fixate upon and follow a 1-inch, colorful, unlighted toy at 1 foot against any background.

Supplemental Table 2. These 24 questions will be asked by the in-person examiner during the parent interview.

1.	Tell me what you do with a toy to get your child interested in it.
2.	When you show your child something, how do you know he or she sees it?
3.	Does your child have a favorite side or a favorite head position?
4.	Does your child usually find objects by looking or by feeling for them?
5.	Do you have concerns about the way your child sees?
6.	Where do you usually hold objects for your child to look at?
7.	What are your child's favorite things in your house?
8.	What, if anything, have doctors told you about your child's eyes?
9.	When does your child usually like to look at things?
10.	What color(s) are the things your child likes to look at most?
11.	What does your child do when he or she is near very shiny or mirrored objects?
12.	Describe how your child behaves around lamps or ceiling fans.
13.	Are you usually able to identify (be certain of) what your child is looking at?
14.	Does your child usually first notice things that move or things that don't move?
15.	How does your child position his or her head when you think he or she is looking? How do they position their head while swatting or reaching toward something?
16.	Is there a color that your child sees more than other colors?
17.	Does your child seem to notice things more at home or more in new places?
18.	How does your child react when you give him or her new things to look at?
19.	Do you position your child in a certain way to help him or her see things?
20.	Have you ever been concerned about the way your child's eyes move?
21.	What does your child do when there are many objects in front of him or her to look at?
22.	Tell me about how he/she responds to faces?
23.	If he/she has his or her own object to look at and a new object, which object do you think he or she would prefer?
24.	Tell me what your child's favorite objects or toys look like.

Supplemental Table 3. Scoring algorithm for Across-CVI Characteristics method of scoring CVI Range-CR. Each characteristic in a block is graded as Resolved (R), currently present (+), partially present (+/-), or not present (-). A decimal or ordinal score is calculated based on the number of characteristics graded as R or +.

Block	Number Items Demonstrated in Block (R/+)	Total # Items Demonstrated, Except Overscores	Decimal Score	Ordinal Score
1-2	0	0	0	0
	1	1	0.2	0+
	2	2	0.4	0+
	3	3	0.6	0+
	4	4	0.8	0+
	5	5	1	1
	6	6	1.25	1+
	7	7	1.5	1+
	8	8	1.75	1+
3-4	9	9	2	2
	1	10	2.2	2+
	2	11	2.4	2+
	3	12	2.6	2+
	4	13	2.8	2+
	5	14	3	3
	6	15	3.25	3+
	7	16	3.5	3+
	8	17	3.75	3+
5-6	9	18	4	4
	1	19	4.2	4+
	2	20	4.4	4+
	3	21	4.6	4+
	4	22	4.8	4+
	5	23	5	5
	6	24	5.25	5+
	7	25	5.5	5+
	8	26	5.75	5+
7-8	9	27	6	6
	1	28	6.2	6+
	2	29	6.4	6+
	3	30	6.6	6+
	4	31	6.8	6+
	5	32	7	7
	6	33	7.2	7+
	7	34	7.4	7+
	8	35	7.6	7+
	9	36	7.8	7+
9-10	10	37	8	8
	1	38	8.17	8+
	2	39	8.33	8+
	3	40	8.50	8+
	4	41	8.67	8+
	5	42	8.83	8+
	6	43	9	9
	7	44	9.17	9+
	8	45	9.33	9+
	9	46	9.50	9+
	10	47	9.67	9+
	11	48	9.83	9+
12	49	10	10	

Supplemental Worksheets. Scoring worksheets for Across- and Within-CVI Characteristics methods of scoring the CVI Range.

The CVI Range: Across-CVI Characteristics Assessment Method

Rating I

Rate the following statements as related to the student/child's visual behaviors by marking the appropriate column to indicate the methods used to support the scores:

O = Information obtained through observation of the student/child

I = Information obtained through interview regarding the student/child

D = Information obtained through direct contact with the student/child

In the remaining columns, rate each statement with one of the following descriptors:

R = Represents a visual behavior that is resolving or approaching typical behavior

+ = Describes current functioning of student/child

+/- = Partially describes the student/child emerging

- = Does not apply to student/child

The CVI Range: Across-CVI Characteristics Assessment Method

CVI Range 1-2: Student functions with minimal visual responses

O	I	D	R	+	+/-	-	
							May localize, but no appropriate fixations on objects or faces
							Consistently attentive to lights or perhaps ceiling fans
							Prolonged periods of latency in visual tasks
							Responds only in strictly controlled environments
							Objects viewed are a single color
							Objects viewed have movement and/or shiny or reflective properties
							Visually attends in near space only
							No blink in response to touch or visual threat
							No regard of the human face

CVI Range 3-4: Student functions with more consistent visual response

O	I	D	R	+	+/-	-	
							Visually fixates when the environment is controlled
							Less attracted to lights: can be redirected
							Latency slightly decreases after periods of consistent viewing
							May look at novel objects if they share characteristics of familiar objects
							Blinks in response to touch and/or visual threat, but the responses may be latent and/or inconsistent
							Has "favorite" color
							Shows strong visual field preferences
							May notice moving objects at 2 to 3 feet
							Look and touch completed as separate events

CVI Range 5-6: Student uses vision for functional tasks

O	I	D	R	+	+/-	-	
							Objects viewed may have two to three colors
							Light is no longer a distractor
							Latency present only when the student is tired, stressed, or overstimulated
							Movement continues to be an important factor for visual attention
							Student tolerates low levels of background noise
							Blink response to touch is consistently present
							Blink response to visual threat is intermittently present
							Visual attention now extends beyond near space, up to 4 to 6 feet
							May regard familiar faces when voices do not compete

CVI Range 7-8: Student demonstrates visual curiosity

O	I	D	R	+	+/-	-	
							Selection of toys or objects is less restricted; requires one to two sessions of “warm up”
							Competing auditory stimuli tolerated during periods of viewing; the student may now maintain visual attention on objects that produce music
							Blink response to visual threat consistently present
							Latency rarely present
							Visual attention extends to 10 feet with targets that produce movement
							Movement not required for attention at near distance
							Smiles at/regards familiar and new faces
							May enjoy regarding self in mirror
							Most high-contrast colors and/or familiar patterns regarded and interpreted
							Simple books, picture cards, or symbols regarded and interpreted

CVI Range 9-10: Student spontaneously uses vision for most functional activities at level approaching near typical

O	I	D	R	+	+/-	-	
							Selection of toys or objects not restricted to the familiar; visually curious in new settings
							Only the most complex environments affect visual response
							Latency never present
							No color or pattern preference
							Visual attention and interpretation extends beyond 20 feet
							Views and interprets information from non-backlit two-dimensional materials and simple images
							Uses vision to imitate actions
							Demonstrates memory of visual events
							Displays typical visual-social responses
							Visual fields unrestricted
							Look and reach completed as a single action
							Views and interprets information from non-backlit two-dimensional images presented on complex, visually dense backgrounds

The CVI Range: Within-CVI Characteristics Assessment Method

Determine the level of CVI present or resolved in the 10 categories below and add to obtain total score. Rate the following CVI categories as related to the student/child's visual behaviors by circling the appropriate number (the CVI Progress Chart may be useful as a scoring guide):

0 Full effect of the characteristic is present

.25 Behavior on this characteristic has begun to change or improve

.5 The characteristic is affecting visual functioning approximately half the time

.75 Occasional effect of the characteristic; response is nearly like that of individuals the same age

1 Resolving, approaching typical, or response is the same as others of the same age

1. Color Preference	0	.25	.5	.75	1
2. Need for movement	0	.25	.5	.75	1
3. Visual latency	0	.25	.5	.75	1
4. Visual field preferences	0	.25	.5	.75	1
5. Difficulties with visual complexity- object array sensory faces	0	.25	.5	.75	1
		.25	.5	.75	1
	0	.25	.5	.75	1
		.25	.5	.75	1
	0	.25	.5	.75	1
6. Need for light	0	.25	.5	.75	1
7. Difficulty with distance viewing	0	.25	.5	.75	1

8. Atypical visual reflexes	0	.25	.5	.75	1
9. Difficulty with visual novelty	0	.25	.5	.75	1
10. Absence of visually guided reach	0	.25	.5	.75	1