

Appendix G: Percentages of Each Score by Item

Grade 3 Math

Component #	Level A (n=635)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Orients toward materials	1.4%	2.8%	1.6%	0.9%	5.7%	87.6%
2	Matches items of same length – smallest difference is 4x	1.9%	8.2%	23.6%	3.9%	16.7%	45.7%
3	Selects biggest/smallest item – smallest difference is 4x	1.1%	6.6%	20.9%	3.8%	16.2%	51.3%
*4	Selects set with a lot/a few – smallest difference is 4x	3.8%	5.2%	26.8%	4.6%	21.3%	38.4%
5	Identifies biggest/smallest item based on volume – smallest different is 4x	6.1%	3.6%	15.1%	3.8%	16.7%	54.6%
6	Selects coins – all items are dissimilar in appearance	6.6%	2.7%	14.2%	3.1%	12.0%	61.4%
7	Identifies heaviest or lightest item – all items similar in appearance – size and weight vary directly	7.4%	3.8%	20.2%	10.1%	24.1%	34.5%
8	Sorts 1 object into 1 of 3 dissimilar groups – no overlap – with model	8.5%	3.3%	15.7%	4.1%	17.3%	51.0%
9	Matches 2 sets of items with 1 item each – difference is 4x	7.4%	3.8%	19.4%	5.2%	18.6%	45.7%
10	Matches items with same volume – smallest difference is 4x	9.1%	3.5%	18.3%	9.8%	16.4%	43.0%
11	Matches items of same size – smallest difference is 4x	8.0%	3.6%	20.5%	2.8%	16.2%	48.8%
*12	Selects set with most/least using items – smallest difference is 4x	8.5%	3.6%	22.0%	4.3%	25.4%	36.2%
13	Selects clock – all distracters differ in appearance	9.0%	2.7%	10.7%	2.8%	9.0%	65.7%
14	Matches items of same length – smallest difference is 4x	8.7%	3.8%	12.9%	2.2%	17.0%	55.4%
15	Selects coins – all items are dissimilar in appearance	8.8%	3.1%	14.0%	3.1%	9.6%	61.3%
16	Selects biggest/smallest item – smallest difference is 4x	9.4%	3.3	19.8%	4.3%	22.5%	40.6%
17	Identifies heaviest or lightest item – all items similar in appearance – size and weight vary directly	9.0%	2.4%	21.9%	3.5%	20.5%	42.8%
18	Sorts 1 object into 1 of 3 dissimilar groups – no overlap – with model	8.8%	3.0%	11.8%	4.4%	14.6%	57.3%
19	Matches items with same volume – smallest difference is 4x	8.8%	3.6%	14.0%	3.3%	17.6%	52.6%
20	Identifies biggest/smallest item based on volume – smallest different is 4x	10.6%	3.3%	23.1%	13.1%	19.1%	30.9%
21	Matches items of same size – smallest difference is 4x	9.9%	3.9%	13.7%	2.7%	20.0%	49.8%
22	Matches 2 sets of items with 1 item each – difference is 4x	11.2%	5.0%	17.5%	3.0%	15.0%	48.2%

Appendix G: Percentages of Each Score by Item

Grade 3 Math (cont.)

Component #	Level B (n=475)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Selects number named up to 5 from array of 4	1.1%	0.0%	0.0%	1.5%	5.7%	91.6%
2	Selects longest/shortest item 1-5 inches in length from array of 4	1.3%	0.2%	5.7%	4.6%	14.9%	73.3%
3	Counts items up to 5 in ordered array with the teacher pointing to each item	1.5%	0.6%	2.3%	2.9%	12.0%	80.6%
*4	Selects quantity named (highest or lowest) and shown from 1-5 in array of 4 ordered sets – 1 similar set (± 5 of target)	0.6%	0.2%	4.4%	4.6%	12.0%	78.1%
5	Selects heaviest/lightest item from array of 4 – weight and size vary directly	0.8%	0.2%	13.7%	9.3%	25.7%	50.3%
6	Selects largest or smallest value from graph without numbers – ordered display	0.6%	0.4%	14.7%	12.4%	31.2%	40.6%
7	Counts one-dollar bills or pennies up to 5 with the teacher pointing to each item	0.6%	0.2%	1.7%	2.7%	9.7%	85.1%
*8	Matches digital time to hour from array of 4	0.8%	0.2%	1.1%	1.9%	13.9%	82.1%
9	Measures item area by counting units from 1-5 with teacher pointing to each item	0.8%	0.2%	2.9%	4.4%	12.4%	79.2%
10	Sorts 4 items into 4 groups – 1 pair overlaps on 1 dimension – with model	1.1%	0.2%	4.8%	13.9%	23.6%	56.4%
11	Selects longest/shortest item 1-5 inches in length from array of 4	1.3%	0.2%	7.6%	7.6%	22.7%	60.4%
*12	Measures volume of 1-5 full units	0.8%	0.2%	33.3%	14.1%	12.6%	38.9%
13	Selects largest or smallest value from graph without numbers – ordered display	1.1%	0.6%	12.2%	10.7%	23.6%	51.8%
14	Selects heaviest/lightest item from array of 4 – weight and size vary directly	1.3%	0.2%	5.5%	3.2%	9.9%	80.0%
15	Counts one-dollar bills or pennies up to 5 with the teacher pointing to each item	2.1%	0.0%	1.1%	2.9%	7.2%	86.7%
*16	Measures item length using ruler and counting units from 1-5 with the teacher pointing to each unit	1.1%	0.0%	2.1%	3.4%	14.9%	78.5%
17	Counts items up to 5 in ordered array with the teacher pointing to each item	1.1%	0.0%	1.1%	4.0%	7.6%	86.3%
18	Sorts 4 items into 4 groups – 1 pair overlaps on 1 dimension – with model	1.1%	0.0%	1.5%	6.9%	9.1%	81.5%
19	Measures item area by counting units from 1-5 with teacher pointing to each item	1.1%	0.0%	1.7%	2.9%	6.3%	88.0%
20	Reads whole number price up to \$5 or 5¢	1.1%	0.0%	8.0%	6.7%	22.5%	61.7%
21	Selects longest/shortest item 1-5 inches in length from array of 4	1.3%	0.0%	5.1%	3.2%	16.0%	74.5%
22	Counts one-dollar bills or pennies up to 5 with the teacher pointing to each item	1.1%	0.0%	2.7%	3.8%	5.5%	86.9%

Appendix G: Percentages of Each Score by Item

Grade 3 Math (cont.)

	Level B (n=475)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
23	Selects largest or smallest value from graph without numbers – ordered display	1.1%	0.2%	13.7%	15.2%	27.6%	42.3%
24	Selects heaviest/lightest item from array of 4 – weight and size vary directly	1.1%	0.6%	5.9%	3.2%	10.9%	78.1%

Appendix G: Percentages of Each Score by Item

Grade 3 Math (cont.)

Component #	Level C (n=371)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Selects largest/smallest value from graph of ordered numbers from 1-9	0.8%	0.0%	3.2%	4.6%	16.2%	75.2%
2	Counts one-dollar bills or pennies up to 9	1.3%	0.0%	2.2%	1.6%	7.8%	87.1%
3	Measures volume by counting whole number amounts between 2 and 9	1.9%	0.0%	12.7%	6.7%	17.8%	60.9%
*4	Orders 4 sets of evenly spaced fixed items from 1-9	0.8%	0.0%	14.3%	17.5%	19.7%	47.7%
5	Adds 2 sets of items with sums ≤ 9 by counting and using action	1.6%	0.0%	1.3%	4.0%	10.0%	83.0%
6	Selects quantity named and shown from array of 5 ordered sets with 1-9 items – 2 similar sets (± 5 of target)	0.8%	0.0%	2.7%	4.6%	13.5%	78.4%
7	Locates number described up to 9 in 5-6 item display	0.8%	0.0%	25.3%	17.8%	27.8%	28.0%
*8	Reads digital time to 15 minutes	1.6%	0.0%	7.0%	6.2%	6.2%	79.0%
9	Measures length of item using fixed ruler	1.1%	0.0%	6.5%	5.4%	12.4%	74.7%
10	Subtracts 2 numbers ≤ 9 by counting items and using subtraction to take away	0.8%	0.0%	2.4%	5.1%	8.6%	83.0%
11	Identifies heaviest/lightest item – constant size – from array of 5	1.3%	0.0%	1.3%	2.4%	3.0%	91.9%
*12	Determines least or most likely outcome, given characteristic of population of items up to 19 – extreme proportions	1.3%	0.0%	17.3%	10.0%	24.3%	47.2%
13	Identifies shortest/longest straight-line path starting from different location from an array of 5	1.1%	0.0%	2.7%	0.8%	10.8%	84.6%
14	Orders 4 consecutive numbers up to 9	0.8%	0.0%	8.9%	15.6%	15.9%	58.8%
15	Adds 2 prices with sums $\leq \$9$ or $\leq 9\text{¢}$ by counting sets of one-dollar bills or pennies	1.1%	0.3%	4.3%	12.1%	15.9%	66.3%
*16	Selects equally divided continuous item from array of 5 figures – 1 distracter has equally divided pieces	1.1%	0.0%	5.7%	7.0%	17.8%	68.5%
17	Selects one-, five-, ten-, or twenty-dollar bill from array of 5 – all choices look different	1.3%	0.0%	1.3%	1.6%	7.5%	88.1%
18	Sorts 8 items into 4 groups – all groups are distinct but resemble each other – no model	1.3%	0.3%	6.5%	13.7%	21.8%	56.3%
19	Adds 3 sets of items with sums ≤ 9 by counting and using action	1.1%	0.0%	3.2%	4.3%	9.4%	81.9%
*20	Reads analog time to hour	1.3%	0.0%	5.7%	4.9%	7.8%	80.3%
21	Subtracts 2 prices $\leq \$9$ or $\leq 9\text{¢}$ by counting dollars or pennies and using subtraction to take away	1.1%	0.0%	1.9%	8.1%	12.7%	76.3%

Appendix G: Percentages of Each Score by Item

Grade 3 Math (cont.)

Component #	Level C (n=371)	Percentage at Each Score					
	Description	0	1	2	3	4	5
22	Locates number described up to 9 in 5-6 item display	1.6%	0.0%	14.8%	13.2%	23.7%	46.6%
23	Adds 2 sets of items with sums ≤ 9 by counting and using action	1.1%	0.0%	1.6%	1.1%	6.2%	90.0%
24	Measures item length using fixed ruler	1.3%	0.0%	5.1%	7.8%	9.7%	76.0%
25	Subtracts 2 numbers ≤ 19 by counting items and using subtraction to take away	2.2%	0.3%	11.9%	11.6%	16.2%	58.0%

Appendix G: Percentages of Each Score by Item

Grade 4 Math

Component #	Level A (n=515)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Orients toward materials	2.7%	5.6%	3.7%	1.7%	4.5%	81.7%
2	Matches items of same length – smallest difference is 4x	2.7%	9.1%	22.7%	3.5%	17.9%	44.1%
3	Selects biggest/smallest item – smallest difference is 4x	1.7%	8.3%	18.8%	4.3%	21.2%	45.6%
*4	Selects set with a lot/a few – smallest difference is 4x	5.6%	5.2%	26.6%	6.0%	21.4%	35.1%
5	Identifies biggest/smallest item based on volume – smallest different is 4x	8.5%	5.0%	12.4%	4.1%	19.6%	50.3%
6	Selects coins – all items are dissimilar in appearance	8.3%	5.4%	14.4%	3.9%	10.7%	57.3%
7	Identifies heaviest or lightest item – all items similar in appearance – size and weight vary directly	9.5%	3.7%	24.3%	7.0%	23.7%	31.8%
8	Sorts 1 object into 1 of 3 dissimilar groups – no overlap – with model	9.7%	4.5%	12.0%	3.3%	18.1%	50.5%
9	Matches 2 sets of items with 1 item each – difference is 4x	10.5%	5.6%	21.6%	3.5%	12.4%	46.4%
10	Matches items with same volume – smallest difference is 4x	10.9%	4.1%	17.1%	8.0%	18.1%	41.9%
11	Matches items of same size – smallest difference is 4x	11.7%	4.9%	20.6%	3.9%	13.0%	46.0%
*12	Selects set with most/least using items – smallest difference is 4x	10.9%	4.7%	20.6%	6.6%	18.8%	38.4%
13	Selects clock – all distracters differ in appearance	11.8%	4.1%	8.9%	3.1%	8.2%	63.9%
14	Matches items of same length – smallest difference is 4x	11.1%	4.5%	17.9%	4.1%	12.4%	50.1%
15	Selects coins – all items are dissimilar in appearance	11.5%	4.1%	14.4%	4.1	12.0%	54.0%
16	Selects biggest/smallest item – smallest difference is 4x	12.0%	4.1	19.0%	7.0%	20.8%	37.1%
17	Identifies heaviest or lightest item – all items similar in appearance – size and weight vary directly	12.2%	3.7%	18.4%	6.6%	20.0%	39.0%
18	Sorts 1 object into 1 of 3 dissimilar groups – no overlap – with model	11.5%	3.1%	12.2%	3.5%	14.8%	55.0%
19	Matches items with same volume – smallest difference is 4x	12.4%	4.7%	15.7%	4.3%	17.9%	45.0%
20	Identifies biggest/smallest item based on volume – smallest different is 4x	12.6%	3.5%	20.6%	9.5%	20.4%	33.4%
21	Matches items of same size – smallest difference is 4x	12.4%	4.5%	11.8%	4.5%	16.1%	50.7%
22	Matches 2 sets of items with 1 item each – difference is 4x	13.4%	4.5%	17.7%	4.1%	13.8%	46.5%

Appendix G: Percentages of Each Score by Item

Grade 4 Math (cont.)

Component #	Level B (n=436)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Selects number named up to 5 from array of 4	0.9%	0.0%	0.9%	0.7%	3.9%	93.6%
2	Selects longest/shortest item 1-5 inches in length from array of 4	0.9%	0.0%	3.9%	3.0%	17.0%	75.2%
3	Counts items up to 5 in ordered array with the teacher pointing to each item	1.8%	0.2%	2.3%	4.8%	10.1%	80.7%
*4	Selects quantity named (highest or lowest) and shown from 1-5 in array of 4 ordered sets – 1 similar set (± 5 of target)	1.4%	0.0%	4.4%	4.8%	14.7%	74.8%
5	Selects heaviest/lightest item from array of 4 – weight and size vary directly	0.7%	0.7%	13.8%	8.7%	25.0%	51.1%
6	Selects largest or smallest value from graph without numbers – ordered display	0.9%	0.2%	13.1%	10.8%	34.6%	40.4%
7	Counts one-dollar bills or pennies up to 5 with the teacher pointing to each item	1.4%	0.0%	3.2%	3.2%	8.5%	83.7%
*8	Matches digital time to hour from array of 4	1.6%	0.2%	1.6%	1.8%	7.8%	86.9%
9	Measures item area by counting units from 1-5 with teacher pointing to each item	1.1%	0.2%	3.9%	4.6%	12.8%	77.3%
10	Sorts 4 items into 4 groups – 1 pair overlaps on 1 dimension – with model	0.9%	0.2%	4.8%	11.5%	18.1%	64.4%
11	Selects longest/shortest item 1-5 inches in length from array of 4	1.8%	0.0%	7.8%	4.4%	26.4%	59.6%
*12	Measures volume of 1-5 full units	1.1%	0.2%	30.0%	13.8%	13.1%	41.7%
13	Selects largest or smallest value from graph without numbers – ordered display	1.1%	0.2%	9.6%	6.9%	25.7%	56.4%
14	Selects heaviest/lightest item from array of 4 – weight and size vary directly	1.6%	0.2%	4.8%	3.0%	11.5%	78.9%
15	Counts one-dollar bills or pennies up to 5 with the teacher pointing to each item	3.0%	0.0%	3.0%	3.7%	8.0%	82.3%
*16	Measures item length using ruler and counting units from 1-5 with the teacher pointing to each unit	0.7%	0.0%	3.0%	3.9%	11.5%	81.0%
17	Counts items up to 5 in ordered array with the teacher pointing to each item	1.1%	0.0%	3.2%	3.4%	6.2%	86.0%
18	Sorts 4 items into 4 groups – 1 pair overlaps on 1 dimension – with model	1.6%	0.2%	2.3%	6.4%	9.2%	80.3%
19	Measures item area by counting units from 1-5 with teacher pointing to each item	1.6%	0.0%	2.3%	2.5%	6.7%	86.9%
20	Reads whole number price up to \$5 or 5¢	1.4%	0.0%	7.8%	5.3%	18.3%	67.2%
21	Selects longest/shortest item 1-5 inches in length from array of 4	1.6%	0.0%	4.1%	1.4%	15.8%	77.1%
22	Counts one-dollar bills or pennies up to 5 with the teacher pointing to each item	1.8%	0.2%	2.3%	4.1%	6.0%	85.6%
23	Selects largest or smallest value from graph without numbers – ordered display	1.8%	0.2%	13.1%	11.5%	29.6%	43.8%
24	Selects heaviest/lightest item from array of 4 – weight and size vary directly	2.1%	0.2%	5.0%	3.7%	13.8%	75.2%

Appendix G: Percentages of Each Score by Item

Grade 4 Math (cont.)

Component #	Level C (n=537) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Selects largest/smallest value from graph of ordered numbers from 1-9	1.9%	0.2%	3.0%	4.1%	11.7%	79.1%
2	Counts one-dollar bills or pennies up to 9	1.9%	0.4%	1.7%	1.9%	6.3%	87.9%
3	Measures volume by counting whole number amounts between 2 and 9	2.4%	0.2%	10.6%	7.1%	14.5%	65.2%
*4	Orders 4 sets of evenly spaced fixed items from 1-9	1.7%	0.0%	11.9%	20.1%	16.8%	49.5%
5	Adds 2 sets of items with sums ≤ 9 by counting and using action	1.7%	0.2%	1.7%	3.2%	7.4%	85.8%
6	Selects quantity named and shown from array of 5 ordered sets with 1-9 items – 2 similar sets (+ 5 of target)	1.7%	0.0%	2.6%	6.0%	10.1%	79.7%
7	Locates number described up to 9 in 5-6 item display	1.5%	0.6%	18.2%	20.1%	25.5%	34.1%
*8	Reads digital time to 15 minutes	2.2%	0.4%	6.0%	3.2%	4.7%	83.6%
9	Measures length of item using fixed ruler	1.9%	0.2%	3.9%	4.5%	9.3%	80.3%
10	Subtracts 2 numbers ≤ 9 by counting items and using subtraction to take away	1.5%	0.2%	2.8%	6.7%	8.9%	79.9%
11	Identifies heaviest/lightest item – constant size – from array of 5	1.5%	0.0%	1.1%	1.5%	4.3%	91.6%
*12	Determines least or most likely outcome, given characteristic of population of items up to 19 – extreme proportions	2.0%	0.2%	11.0%	10.2%	24.0%	52.5%
13	Identifies shortest/longest straight-line path starting from different location from an array of 5	1.5%	0.0%	2.4%	2.8%	6.7%	86.6%
14	Orders 4 consecutive numbers up to 9	1.5%	0.4%	8.4%	13.6%	10.4%	65.7%
15	Adds 2 prices with sums $\leq \$9$ or $\leq 9\text{¢}$ by counting sets of one-dollar bills or pennies	1.5%	0.2%	2.8%	11.4%	15.1%	69.1%
*16	Selects equally divided continuous item from array of 5 figures – 1 distracter has equally divided pieces	1.7%	0.2%	5.4%	5.4%	15.5%	71.9%
17	Selects one-, five-, ten-, or twenty-dollar bill from array of 5 – all choices look different	1.7%	0.2%	1.7%	1.3%	7.4%	87.7%
18	Sorts 8 items into 4 groups – all groups are distinct but resemble each other – no model	2.4%	0.0%	5.8%	16.4%	17.3%	58.1%
19	Adds 3 sets of items with sums ≤ 9 by counting and using action	1.7%	0.0%	1.5%	3.9%	8.8%	84.2%
*20	Reads analog time to hour	2.6%	0.0%	5.2%	3.4%	5.6%	83.2%
21	Subtracts 2 prices $\leq \$9$ or $\leq 9\text{¢}$ by counting dollars or pennies and using subtraction to take away	1.7%	0.0%	2.2%	5.6%	10.1%	80.4%
22	Locates number described up to 9 in 5-6 item display	1.9%	0.2%	12.5%	15.8%	19.7%	49.9%

Appendix G: Percentages of Each Score by Item

Grade 4 Math (cont.)

	Level C (n=537)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
23	Adds 2 sets of items with sums ≤ 9 by counting and using action	2.2%	0.0%	1.1%	1.7%	3.5%	91.4%
24	Measures item length using fixed ruler	2.4%	0.0%	5.2%	7.1%	8.9%	76.4%
25	Subtracts 2 numbers ≤ 19 by counting items and using subtraction to take away	2.2%	0.7%	8.4%	14.9%	19.2%	54.6%

Appendix G: Percentages of Each Score by Item

Grade 5 Math

Component #	Level A (n=487)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Orients toward materials	2.7%	3.7%	3.1%	1.4%	4.1%	85.0%
2	Matches items of same length – smallest difference is 4x	1.8%	6.4%	25.1%	4.7%	20.5%	41.5%
3	Selects biggest/smallest item – smallest difference is 4x	1.0%	4.7%	26.3%	7.2%	23.6%	37.2%
*4	Selects sets with a lot/a few – smallest difference is 3x	6.2%	3.5%	22.6%	4.9%	23.4%	39.4%
5	Identifies biggest/smallest item based on volume – smallest different is 3x	8.0%	3.5%	19.7%	5.1%	26.1%	37.6%
6	Selects dollar bills – all items are dissimilar in appearance	9.4%	2.1%	16.8%	5.3%	12.3%	54.0%
7	Identifies heaviest or lightest item – all items similar in appearance – size and weight do not vary directly	9.7%	1.6%	21.1%	4.3%	24.0%	39.2%
8	Sorts 1 object into 1 of 3 groups (2 similar and 1 dissimilar) – no overlap – with model	9.7%	2.3%	17.2%	6.2%	18.3%	46.2%
9	Matches 2 sets of items with 1-2 items each – difference is 3x	11.1%	3.5%	20.3%	3.5%	17.5%	44.1%
10	Matches items with same volume – smallest difference is 3x	11.7%	2.3%	17.5%	11.5%	19.5%	37.6%
11	Matches items of same size – smallest difference is 3x	11.1%	2.9%	19.1%	3.9%	19.3%	43.7%
*12	Selects set with most/least using items – smallest difference is 3x	12.9%	2.5%	21.4%	4.3%	28.3%	30.6%
13	Selects clock – 1 distracter is similar	12.7%	1.0%	8.8%	3.3%	11.3%	62.8%
14	Identifies longest/shortest item – smallest difference is 3x	12.1%	1.8%	19.5%	6.4%	23.2%	37.0%
15	Matches items of same length – smallest difference is 3x	13.8%	2.3%	17.5%	2.9%	19.3%	44.4%
16	Identifies heaviest or lightest item – all items similar in appearance – size and weight do not vary directly	12.7%	1.8%	25.5%	6.2%	24.6%	29.2%
17	Matches 2 sets of items with 1-2 items each – difference is 3x	13.1%	2.7%	20.9%	3.3%	15.4%	44.6%
18	Matches items with same volume – smallest difference is 3x	14.0%	2.7%	16.2%	2.7%	16.8%	47.6%
19	Matches items of same size – smallest difference is 3x	12.5%	2.1%	18.1%	2.5%	13.1%	51.7%
20	Sorts 1 object into 1 of 3 groups (2 similar and 1 dissimilar) – no overlap – with model	14.2%	2.1%	15.4%	4.7%	12.1%	51.5%
21	Identifies biggest/smallest item based on volume – smallest different is 3x	14.0%	2.5%	12.7%	8.8%	17.9%	44.1%
22	Identifies longest/shortest item – smallest difference is 3x	16.0%	2.5%	18.9%	3.9%	16.8%	41.9%

Appendix G: Percentages of Each Score by Item

Grade 5 Math (cont.)

Component #	Level B (n=455)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Selects largest or smallest value from 1-9 in array of 4 ordered numbers	0.4%	0.0%	9.0%	6.2%	26.6%	57.8%
2	Selects heaviest/lightest item from array of 4 – weight and size are not related	1.5%	0.0%	12.7%	8.1%	30.1%	47.5%
3	Counts items in ordered array up to 9	1.1%	0.2%	6.2%	9.0%	12.1%	71.4%
*4	Orders 3 consecutive numbers up to 9	0.4%	0.2%	14.7%	26.4%	22.6%	35.6%
5	Selects quantity named and shown from 1-9 in array of 4 ordered sets – 2 similar sets (± 5 of target)	0.9%	0.2%	8.6%	11.6%	18.7%	59.8%
6	Selects largest or smallest value from graph without numbers – unordered display	0.7%	0.4%	8.6%	6.2%	25.5%	58.7%
7	Counts one-dollar bills or pennies up to 9	3.3%	0.0%	3.7%	5.5%	8.4%	79.1%
*8	Matches digital time to half hour from array of 4	1.1%	0.0%	2.6%	2.9%	18.5%	74.9%
9	Measures item area by counting units from 1-9	1.1%	0.2%	4.8%	6.8%	8.6%	78.5%
10	Sorts 4 items into 4 groups – 2 pairs overlap on 1 dimension – with model	0.9%	0.2%	8.4%	19.1%	23.1%	48.4%
11	Measures item length by using ruler and counting 1-9 units	0.7%	0.2%	26.8%	26.6%	12.3%	33.2%
*12	Selects longest/shortest flexible item 1-19 inches in length from array of 4	1.3%	0.0%	5.7%	5.1%	19.3%	68.4%
13	Identifies measured amount (1 cup) from array of measuring cups and measuring spoons	1.5%	0.0%	12.7%	11.0%	27.9%	46.6%
14	Selects heaviest/lightest item from array of 4 – weight and size are not related	1.5%	0.2%	9.2%	4.4%	25.3%	59.3%
15	Counts one-dollar bills or pennies up to 9	1.8%	0.0%	6.2%	8.8%	9.5%	73.8%
*16	Orders 3 sets of evenly-spaced sets of items from 1-9	1.8%	0.0%	14.5%	18.9%	19.3%	45.5%
17	Counts items in ordered array up to 9	0.9%	0.0%	5.5%	9.0%	5.3%	79.3%
18	Sorts 4 items into 4 groups – 2 pairs overlap on 1 dimension – with model	2.2%	0.2%	4.2%	12.3%	11.9%	69.0%
19	Measures item area by counting units from 1-9	1.1%	0.0%	7.0%	12.1%	11.6%	68.1%
20	Selects largest or smallest value from 1-9 in array of 4 ordered numbers	1.3%	0.2%	13.6%	9.9%	26.4%	48.6%
21	Selects one-dollar bill from array of 4 – all distracters are coins	2.6%	0.2%	2.9%	2.0%	8.8%	83.3%
22	Selects quantity named and shown from 1-9 in array of 4 ordered sets – 2 similar sets (± 5 of target)	1.3%	0.0%	5.3%	11.4%	18.2%	63.7%
23	Selects largest or smallest value from graph without numbers – unordered display	1.5%	0.0%	7.0%	8.1%	22.4%	60.9%

Appendix G: Percentages of Each Score by Item

Grade 5 Math (cont.)

	Level B (n=455)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
24	Measures item length by using ruler and counting 1-9 units	1.3%	0.0%	24.6%	22.6%	11.6%	39.8%

Appendix G: Percentages of Each Score by Item

Grade 5 Math (cont.)

Component #	Level C (n=525)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Locates number described up to 19 in 7-8 item table focused on 1 variable	0.8%	0.2%	14.7%	21.5%	19.4%	43.4%
2	Counts five-dollar bills to 15 dollars	1.1%	0.2%	4.4%	10.1%	12.0%	72.2%
3	Measures to whole cup by locating 1 of 5 marked quantities	1.3%	0.2%	13.9%	18.1%	17.3%	49.1%
*4	Orders 4 sets of evenly spaced fixed sets from 1-19 with 3 sets having same 10s place	1.0%	0.2%	12.8%	21.0%	17.3%	47.8%
5	Adds 2 numbers named and shown with sums ≤ 19 using a calculator and using action	1.9%	0.6%	6.7%	10.7%	14.7%	65.3%
6	Selects closest quantity from array of 5 sets with 1-19 using model and 2 similar sets (± 5 of target)	1.3%	0.0%	6.7%	11.8%	20.6%	59.6%
7	Selects item most appropriate for filling a larger item from array of 5	1.5%	0.2%	5.1%	5.0%	19.2	68.8%
*8	Reads digital time to minute	1.50%	0.20%	3.0%	3.0%	4.0%	88.2%
9	Measures item length to within an inch	1.1%	0.2%	10.3%	19.6%	14.9%	53.9%
10	Subtracts 2 numbers named and shown ≤ 19 using a calculator and using subtraction to take away	1.5%	0.2%	12.8%	15.2%	16.6%	53.7%
11	Selects heaviest/lightest item from array of 5 – weight and size do not vary directly	1.5%	0.0%	3.0%	2.3%	11.0%	82.1%
*12	Determines least or most likely outcome, given characteristic of population of items up to 19 – extreme proportions	1.1%	0.0%	6.3%	8.6%	16.8%	67.2%
13	Identifies shortest/longest straight-line path starting from same location from an array of 5	1.1%	0.0%	3.2%	2.9%	12.2%	80.6%
14	Orders 4 non-consecutive numbers up to 19 – all have the same 10s place	1.1%	0.0%	9.5%	11.4%	10.5%	67.2%
15	Adds 2 prices named and shown with sums $\leq \$19$ or 19¢ using a calculator and using action	1.1%	0.2%	6.7%	9.9%	11.6%	70.5%
*16	Selects largest/smallest value from graph of unordered numbers from 1-19	1.0%	0.0%	1.5%	3.6%	9.0%	85.0%
17	Names penny, nickel, dime, or quarter	1.7%	0.0%	2.5%	2.9%	9.9%	83.0%
18	Sorts 9 items into 4 groups – 1 pair varies on 1 dimension – no model	1.0%	0.2%	7.8%	16.2%	18.3%	56.6%
19	Adds 3 numbers named and shown with sums ≤ 19 using a calculator and using action	1.5%	0.2%	10.7%	12.8%	12.2%	62.7%
*20	Reads analog time to 15 minutes	1.0%	0.2%	25.5%	18.3%	14.9%	40.2%
21	Subtracts 2 prices named and shown $\leq \$19$ or $\leq 19\text{¢}$ using a calculator and using subtraction to take away	1.7%	0.0%	11.0%	14.5%	13.1%	59.6%
22	Counts items by 2s or 5s to 18	1.1%	0.2%	17.3%	16.6%	13.7%	51.0%

Appendix G: Percentages of Each Score by Item

Grade 5 Math (cont.)

	Level C (n=525)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
23	Adds 2 similar sets of items with sums ≤ 19 by counting items	1.5%	0.0%	3.0%	7.4%	13.5%	74.5%
24	Counts out one-dollar bills or pennies up to 19 starting at 2 or more	1.9%	0.0%	5.9%	17.7%	10.1%	64.4%
25	Subtracts to identify part from whole by counting with numbers ≤ 19	2.9%	0.4%	2.5%	4.6%	8.6%	81.1%

Appendix G: Percentages of Each Score by Item

Grade 6 Math

Component #	Level A (n=550)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Orients toward materials	2.4%	3.1%	3.3%	0.5%	4.7%	86.0%
2	Matches items of same length – smallest difference is 4x	1.8%	5.8%	25.3%	2.4%	20.5%	44.2%
3	Selects biggest/smallest item – smallest difference is 4x	1.5%	5.6%	23.5%	5.1%	21.1%	43.1%
*4	Selects sets with a lot/a few – smallest difference is 3x	5.6%	4.2%	21.3%	6.4%	23.3%	39.1%
5	Identifies biggest/smallest item based on volume – smallest different is 3x	8.2%	4.2%	18.2%	4.9%	22.0%	42.0%
6	Selects dollar bills – all items are dissimilar in appearance	9.1%	3.3%	11.6%	2.5%	10.4%	63.1%
7	Identifies heaviest or lightest item – all items similar in appearance – size and weight do not vary directly	9.3%	3.8%	17.6%	3.1%	22.0%	44.2%
8	Sorts 1 object into 1 of 3 groups (2 similar and 1 dissimilar) – no overlap – with model	9.3%	2.9%	14.7%	4.4%	17.1%	51.5%
9	Matches 2 sets of items with 1-2 items each – difference is 3x	10.5%	3.3%	16.5%	2.7%	18.7%	48.2%
10	Matches items with same volume – smallest difference is 3x	12.9%	3.3%	15.5%	13.5%	17.6%	37.1%
11	Matches items of same size – smallest difference is 3x	11.1%	3.3%	16.0%	3.3%	16.7%	49.6%
*12	Selects set with most/least using items – smallest difference is 3x	11.8%	2.9%	20.4%	4.9%	26.0%	33.8%
13	Selects clock – 1 distracter is similar	12.2%	2.2%	7.5%	1.3%	8.9%	68.0%
14	Identifies longest/shortest item – smallest difference is 3x	11.8%	3.5%	16.4%	6.2%	24.0%	38.2%
15	Matches items of same length – smallest difference is 3x	12.5%	3.1%	13.8%	3.5%	15.5%	51.6%
16	Identifies heaviest or lightest item – all items similar in appearance – size and weight do not vary directly	12.5%	3.5%	21.8%	5.8%	26.4%	30.0%
17	Matches 2 sets of items with 1-2 items each – difference is 3x	12.4%	4.2%	14.9%	2.9%	16.5%	49.1%
18	Matches items with same volume – smallest difference is 3x	13.5%	3.1%	14.2%	3.6%	14.4%	51.3%
19	Matches items of same size – smallest difference is 3x	12.2%	4.0%	14.0%	3.5%	14.0%	52.4%
20	Sorts 1 object into 1 of 3 groups (2 similar and 1 dissimilar) – no overlap – with model	13.3%	2.9%	8.4%	5.5%	11.6%	58.4%
21	Identifies biggest/smallest item based on volume – smallest different is 3x	14.0%	2.9%	10.4%	14.0%	14.9%	43.8%
22	Identifies longest/shortest item – smallest difference is 3x	14.5%	3.1%	16.9%	4.0%	20.2%	41.3%

Appendix G: Percentages of Each Score by Item

Grade 6 Math (cont.)

Component #	Level B (n=570) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Selects largest or smallest value from 1-9 in array of 4 ordered numbers	0.7%	0.0%	8.1%	4.7%	23.3%	63.2%
2	Selects heaviest/lightest item from array of 4 – weight and size are not related	1.1%	0.2%	10.5%	6.1%	27.0%	55.1%
3	Counts items in ordered array up to 9	1.1%	0.2%	3.5%	7.9%	8.6%	78.8%
*4	Orders 3 consecutive numbers up to 9	0.7%	0.0%	13.7%	23.0%	17.2%	45.4%
5	Selects quantity named and shown from 1-9 in array of 4 ordered sets – 2 similar sets (± 5 of target)	1.4%	0.2%	5.3%	8.9%	14.6%	69.5%
6	Selects largest or smallest value from graph without numbers – unordered display	1.1%	0.2%	7.5%	5.3%	22.8%	63.2%
7	Counts one-dollar bills or pennies up to 9	2.3%	0.0%	4.0%	4.7%	7.4%	81.6%
*8	Matches digital time to half hour from array of 4	0.2%	1.1%	2.3%	2.1%	12.5%	81.9%
9	Measures item area by counting units from 1-9	0.9%	0.2%	4.0%	4.0%	6.8%	84.0%
10	Sorts 4 items into 4 groups – 2 pairs overlap on 1 dimension – with model	1.2%	0.2%	6.1%	16.7%	21.4%	54.4%
11	Measures item length by using ruler and counting 1-9 units	0.9%	0.2%	18.1%	25.8%	14.0%	41.1%
*12	Selects longest/shortest flexible item 1-19 inches in length from array of 4	1.4%	0.0%	5.1%	4.7%	13.0%	75.8%
13	Identifies measured amount (1 cup) from array of measuring cups and measuring spoons	1.2%	0.2%	8.8%	6.5%	30.2%	53.0%
14	Selects heaviest/lightest item from array of 4 – weight and size are not related	1.2%	0.2%	5.6%	4.2%	21.2%	67.4%
15	Counts one-dollar bills or pennies up to 9	0.9%	0.2%	3.5%	7.0%	6.7%	81.8%
*16	Orders 3 sets of evenly-spaced sets of items from 1-9	1.8%	0.4%	8.6%	18.4%	16.0%	54.7%
17	Counts items in ordered array up to 9	1.8%	0.2%	3.7%	4.7%	5.8%	83.7%
18	Sorts 4 items into 4 groups – 2 pairs overlap on 1 dimension – with model	2.8%	0.2%	2.8%	11.1%	8.1%	75.1%
19	Measures item area by counting units from 1-9	1.2%	0.2%	5.6%	8.9%	11.6%	72.5%
20	Selects largest or smallest value from 1-9 in array of 4 ordered numbers	1.1%	0.0%	9.6%	7.5%	21.6%	60.2%
21	Selects one-dollar bill from array of 4 – all distracters are coins	2.1%	0.2%	1.4%	1.8%	5.8%	88.8%
22	Selects quantity named and shown from 1-9 in array of 4 ordered sets – 2 similar sets (± 5 of target)	1.6%	0.2%	6.1%	7.5%	14.6%	70.0%
23	Selects largest or smallest value from graph without numbers – unordered display	1.6%	0.2%	6.3%	4.7%	16.1%	71.1%
24	Measures item length by using ruler and counting 1-9 units	1.8%	0.2%	17.4%	18.6%	11.9%	49.8%

Appendix G: Percentages of Each Score by Item

Grade 6 Math (cont.)

Component #	Level C (n=586)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Locates number described up to 19 in 7-8 item table focused on 1 variable	0.5%	0.2%	11.7%	20.7%	15.3%	51.6%
2	Counts five-dollar bills to 15 dollars	0.8%	0.2%	2.2%	5.9%	10.7%	80.1%
3	Measures to whole cup by locating 1 of 5 marked quantities	1.9%	0.3%	10.9%	11.4%	13.8%	61.8%
*4	Orders 4 sets of evenly spaced fixed sets from 1-19 with 3 sets having same 10s place	0.7%	0.2%	10.4%	14.9%	15.3%	58.6%
5	Adds 2 numbers named and shown with sums ≤ 19 using a calculator and using action	2.0%	0.2%	3.2%	6.6%	10.9%	77.1%
6	Selects closest quantity from array of 5 sets with 1-19 using model and 2 similar sets (+ 5 of target)	0.7%	0.0%	4.6%	7.3%	16.6%	70.8%
7	Selects item most appropriate for filling a larger item from array of 5	1.0%	0.0%	4.2%	4.4%	16.3	73.9%
*8	Reads digital time to minute	1.20%	0.00%	0.7%	2.2%	2.7%	92.9%
9	Measures item length to within an inch	1.2%	0.0%	9.2%	16.5%	13.6%	59.6%
10	Subtracts 2 numbers named and shown ≤ 19 using a calculator and using subtraction to take away	1.2%	0.0%	6.3%	9.7%	16.5%	66.4%
11	Selects heaviest/lightest item from array of 5 – weight and size do not vary directly	0.5%	0.0%	3.2%	1.2%	6.3%	88.8%
*12	Determines least or most likely outcome, given characteristic of population of items up to 19 – extreme proportions	1.4%	0.0%	5.8%	5.8%	20.0%	67.1%
13	Identifies shortest/longest straight-line path starting from same location from an array of 5	0.7%	0.0%	2.9%	1.2%	10.4%	84.7%
14	Orders 4 non-consecutive numbers up to 19 – all have the same 10s place	1.0%	0.0%	4.6%	8.1%	10.4%	75.9%
15	Adds 2 prices named and shown with sums $\leq \$19$ or 19¢ using a calculator and using action	1.2%	0.0%	3.1%	4.2%	11.5%	80.0%
*16	Selects largest/smallest value from graph of unordered numbers from 1-19	0.8%	0.0%	1.7%	2.0%	6.5%	89.0%
17	Names penny, nickel, dime, or quarter	2.7%	0.0%	1.4%	1.7%	5.9%	88.3%
18	Sorts 9 items into 4 groups – 1 pair varies on 1 dimension – no model	1.4%	0.2%	6.1%	10.9%	17.3%	64.2%
19	Adds 3 numbers named and shown with sums ≤ 19 using a calculator and using action	0.5%	0.0%	5.3%	7.5%	9.8%	76.9%
*20	Reads analog time to 15 minutes	0.7%	0.0%	16.6%	19.2%	13.1%	50.4%
21	Subtracts 2 prices named and shown $\leq \$19$ or $\leq 19\text{¢}$ using a calculator and using subtraction to take away	1.7%	0.2%	7.3%	7.5%	13.2%	70.1%
22	Counts items by 2s or 5s to 18	1.0%	0.0%	11.4%	14.1%	15.3%	58.2%
23	Adds 2 similar sets of items with sums ≤ 19 by counting items	0.8%	0.0%	2.0%	3.4%	10.2%	83.5%

Appendix G: Percentages of Each Score by Item

Grade 6 Math (cont.)

	Level C (n=586)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
24	Counts out one-dollar bills or pennies up to 19 starting at 2 or more	2.0%	0.2%	4.1%	11.4%	8.7%	73.7%
25	Subtracts to identify part from whole by counting with numbers ≤ 19	1.4%	0.7%	1.4%	3.9%	9.0%	83.5%

Appendix G: Percentages of Each Score by Item

Grade 7 Math

Component #	Level A (n=624)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Scans materials	1.6%	5.3%	1.6%	1.3%	3.4%	86.9%
2	Matches items of same length – smallest difference is 4x	1.1%	8.5%	18.3%	2.4%	15.9%	53.7%
3	Selects biggest/smallest item – smallest difference is 2x	1.4%	7.4%	18.4%	4.0%	20.2%	48.6%
4	Selects sets with 1 – smallest difference is 2x	6.4%	4.3%	13.1%	4.2%	14.6%	57.4%
5	Identifies biggest/smallest item based on volume – smallest different is 2x	8.8%	2.7%	15.5%	6.1%	24.7%	42.1%
6	Recognizes dollar bill as money – one distracter is similar and one is dissimilar in appearance	8.7%	2.1%	10.3%	3.7%	10.6%	64.7%
7	Identifies heavy or light item – items differ in appearance and size and weight vary directly	8.8%	3.0%	21.6%	5.4%	27.9%	33.2%
8	Sorts 1 object into 1 of 3 groups (all similar) – no overlap – with model	10.3%	2.7%	14.7%	4.6%	16.0%	51.6%
9	Matches 2 sets of items with 1-2 items each – difference is 2x	9.3%	3.2%	13.9%	4.3%	17.1%	52.1%
10	Matches identical numbers from 1-2 – distracters are pictures	9.1%	3.2%	13.1%	3.2%	12.8%	58.5%
11	Matches items of same size – smallest difference is 2x	9.9%	2.9%	14.4%	1.4%	12.2%	59.1%
12	Selects set with most/least using items – smallest difference is 2x	9.9%	2.7%	18.6%	5.1%	22.4%	41.2%
13	Selects clock – both distracters are similar	9.6%	2.1%	12.5%	4.3%	10.1%	61.4%
14	Identifies longest/shortest item – smallest difference is 2x	9.9%	2.1%	17.5%	4.2%	23.1%	43.3%
15	Matches items with same volume – smallest difference is 2x	10.1%	3.7%	19.4%	16.5%	16.3%	34.0%
16	Matches item to space – distracters are dissimilar	9.8%	2.4%	15.9%	6.3%	20.5%	45.2%
17	Selects full/empty item	10.6%	2.6%	11.1%	3.7%	13.9%	58.2%
18	Matches digital time 1:00 or 2:00 from array of 3 – distracters are pictures	10.6%	3.0%	12.7%	1.9%	13.0%	58.0%
19	Identifies daytime or nighttime item or activity.	9.9%	3.2%	20.2%	5.4%	28.8%	32.4%
20	Matches identical numbers from 1-2 – distracters are pictures	10.6%	2.7%	12.7%	3.5%	11.7%	58.7%

Appendix G: Percentages of Each Score by Item

Grade 7 Math (cont.)

Component #	Level B (n=570) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Matches digital time to 5 minutes from array of 4	0.4%	0.2%	0.9%	2.5%	12.8%	83.3%
2	Selects largest or smallest value from 1-19 in array of 4 unordered numbers with varying 10s place	0.4%	0.2%	3.2%	5.8%	14.0%	76.5%
3	Counts items in ordered array up to 19 starting at 2 or more with bridge	0.4%	0.4%	6.3%	16.7%	18.1%	58.2%
4	Orders 3 consecutive numbers from 10 to 19	0.4%	0.7%	11.8%	24.7%	26.8%	35.6%
5	Selects largest or smallest value from graph of ordered numbers from 1-19	0.5%	0.4%	3.5%	4.2%	18.6%	72.6%
6	Counts one-dollar bills or pennies up to 19 starting at 2 or more with bridge	0.9%	0.2%	4.6%	13.5%	13.2%	67.7%
7	Measures item area by counting units from 1-19	0.7%	0.4%	5.3%	8.4%	11.9%	73.3%
*8	Selects quantity named and shown from 1-19 in array of 4 ordered sets – 3 similar sets (± 5 of target)	0.5%	0.0%	3.5%	9.3%	17.7%	68.9%
9	Sorts 4 items into 4 groups – 3 groups overlap on 1 dimension – with model	1.1%	0.0%	3.3%	8.8%	21.2%	65.6%
10	Measures item length using fixed ruler	0.7%	0.2%	3.9%	6.8%	8.1%	80.4%
11	Locates number described up to 19 in 7-8 – item display	0.4%	0.2%	25.8%	23.5%	21.6%	28.6%
*12	Selects longest/shortest distance from array of 4 – all have different 10s place	0.9%	0.0%	6.1%	6.1%	18.9%	67.9%
13	Identifies measured amount (1/2 cup, 1/4 cup) from array of cups and spoons	0.9%	0.0%	12.8%	10.0%	38.9%	37.4%
14	Adds 2 numbers named and shown with sums ≤ 19 by counting and using action	0.7%	0.2%	8.1%	11.4%	14.4%	65.3%
15	Counts out one-dollar bills or pennies up to 19 from a larger set	0.9%	0.2%	10.9%	12.8%	20.0%	55.3%
*16	Selects largest/smallest area by counting units from 1-19 – orientation of array differs	0.7%	0.0%	2.5%	2.3%	20.0%	74.6%
17	Subtracts 2 numbers ≤ 19 by counting items and using subtraction to take away	0.9%	0.0%	6.0%	17.4%	18.9%	56.8%
18	Selects item evenly-distributed to 2 from array of 4 – all unequal divisions	1.1%	0.0%	5.3%	4.9%	24.6%	64.2%
19	Selects activity that takes the least/most amount of time from a 7-8 item table of 4 times with hours	1.1%	0.2%	7.0%	6.7%	24.6%	60.5%
*20	Orders 3 items according to weight – size and weight vary directly	1.1%	0.0%	11.6%	20.5%	17.9%	48.9%
21	Selects 1, 5, 10, or 25 cents from array of 4 – all distracters are coins	2.1%	0.2%	2.6%	3.5%	17.5%	74.0%
22	Adds 3 sets of items with sums ≤ 19 by counting and using action	1.2%	0.0%	5.8%	9.1%	11.8%	72.1%

Appendix G: Percentages of Each Score by Item

Grade 7 Math (cont.)

	Level B (n=570)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
23	Subtracts 2 prices $\leq \$19$ or $\leq 19¢$ by counting dollars or pennies and using subtraction to take away	1.1%	0.0%	5.3%	12.6%	11.6%	69.5%
24	Selects activity associated with time from array of 4	1.1%	0.0%	1.4%	2.1%	6.1%	89.1%
25	Counts out items to 19 from a larger set	1.9%	0.5%	11.8%	8.9%	14.2%	62.5%

Appendix G: Percentages of Each Score by Item

Grade 7 Math (cont.)

Component #	Level C (n=535)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Locates number described up to 99 in 9-10 item display, attending to 2 nd variable	0.9%	0.0%	14.0%	13.6%	17.0%	54.4%
2	Counts quarters, dimes, or nickels to 1 dollar	1.5%	0.0%	3.2%	8.0%	8.6%	78.7%
3	Measures to 1/2 cup by locating 1 of 5 marked quantities	1.7%	0.0%	11.6%	12.7%	19.1%	55.0%
*4	Orders 4 non-consecutive numbers up to 99 – all have same 10s place	1.1%	0.0%	6.5%	9.0%	12.9%	70.5%
5	Adds 2 numbers with sums of ≤ 99 using a calculator, action, and a word problem	2.1%	0.0%	3.2%	5.4%	9.2%	80.2%
6	Selects closest amount from array of 5 sets with 10-99 using model and 3 similar sets (+ 5 or target)	1.3%	0.6%	9.0%	8.6%	18.7%	61.9%
7	Selects pictures with biggest/smallest fraction – division is shown	0.9%	0.0%	9.3%	7.7%	33.1%	49.0%
*8	Reads analog time to 5 minutes	1.3%	0.2%	9.5%	7.5%	9.9%	71.6%
9	Measures item length to within a 1/2 inch	1.7%	0.0%	24.1%	18.3%	12.1%	43.7%
10	Subtracts 2 numbers ≤ 99 using a calculator, a word problem, and using subtraction to take away	1.1%	0.0%	10.1%	10.5%	16.4%	61.7%
11	Identifies heaviest/lightest set of 2-3 items – from array of 5	1.9%	0.2%	2.6%	3.7%	8.8%	82.8%
*12	Determines least or most likely outcome, given characteristic of population of items up to 99 – extreme proportions	1.1%	0.0%	14.4%	9.7%	25.0%	49.5%
13	Identifies shortest/longest path from 5 paths with same starting point, angled turn, and different ending points from an array of 5	1.5%	0.0%	1.9%	1.3%	4.9%	90.5%
14	Identifies item that can be purchased given money available – from 1-99 dollars	0.9%	0.0%	11.0%	5.8%	28.6%	53.6%
15	Adds 2 prices with sums $\leq \$99$ or $\leq 99\text{¢}$ using a calculator, action, and a word problem	1.7%	0.0%	6.0%	3.7%	12.0%	76.6%
*16	Determines mode from graph with values to 99 by selecting from 5 bars – mode is at least 15 units more than other values	1.1%	0.0%	2.6%	1.5%	8.2%	86.5%
17	Counts out money from a combination of one- and five-dollar bills or one- and ten-dollar bills from a larger set up to 99 dollars	0.9%	0.0%	8.0%	17.8%	9.3%	63.9%
18	Sorts 9 items into 4 groups – 2 pairs vary on 1 dimension – no model	1.7%	0.0%	9.0%	13.3%	13.5%	62.4%
19	Adds 3 numbers with sums ≤ 99 using a calculator, action, and a word problem	1.1%	0.0%	6.2%	4.3%	11.2%	77.2%
*20	Orders 3 numbers according to weight – no same numbers in the tens place	1.1%	0	3.0%	6.2%	7.9%	81.9%
21	Divides numbers ≤ 99 by counting and using division to determine the number of items in each group	2.4%	0.2%	15.3%	19.8%	22.1%	40.2%

Appendix G: Percentages of Each Score by Item

Grade 7 Math (cont.)

	Level C (n=535)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
22	Counts items using combination of 1s and 5s or 1s and 10s to 99	2.6%	0.4%	9.5%	14.2%	12.5%	60.7%
23	Selects division of item from array of 5 continuous figures – 3 distracters are equally spaced	1.5%	0.0%	5.6%	5.2%	19.4%	68.2%
24	Multiplies numbers with products ≤ 99 using counting and a natural grouping	2.2%	0.0%	2.2%	1.5%	9.5%	84.5%
25	Measures whole number amount using $\frac{1}{2}$ cup	3.9%	0.7%	34.6%	17.8%	12.5%	30.5%

Appendix G: Percentages of Each Score by Item

Grade 8 Math

Component #	Level A (n=666)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Scans materials	2.7%	4.7%	0.9%	1.4%	3.8%	86.6%
2	Matches items of same length – smallest difference is 4x	1.5%	9.0%	15.9%	3.3%	17.9%	52.4%
3	Selects biggest/smallest item – smallest difference is 2x	1.7%	7.4%	14.3%	5.3%	17.1%	54.2%
4	Selects sets with 1 – smallest difference is 2x	4.5%	5.1%	12.6%	3.8%	14.1%	59.9%
5	Identifies biggest/smallest item based on volume – smallest different is 2x	6.6%	4.5%	16.8%	4.5%	27.0%	40.5%
6	Recognizes dollar bill as money – one distracter is similar and one is dissimilar in appearance	7.5%	3.3%	9.5%	3.8%	8.0%	68.0%
7	Identifies heavy or light item – items differ in appearance and size and weight vary directly	7.2%	4.4%	21.3%	8.0%	23.0%	35.7%
8	Sorts 1 object into 1 of 3 groups (all similar) – no overlap – with model	8.0%	4.2%	14.3%	4.1%	13.4%	55.9%
9	Matches 2 sets of items with 1-2 items each – difference is 2x	7.7%	4.2%	14.1%	5.6%	14.0%	54.5%
10	Matches identical numbers from 1-2 – distracters are pictures	7.4%	4.7%	10.1%	3.5%	13.1%	61.4%
11	Matches items of same size – smallest difference is 2x	8.1%	4.2%	14.3%	2.6%	12.2%	58.4%
12	Selects set with most/least using items – smallest difference is 2x	8.1%	4.2%	17.9%	5.1%	24.5%	40.1%
13	Selects clock – both distracters are similar	8.6%	3.9%	12.0%	3.6%	10.8%	61.0%
14	Identifies longest/shortest item – smallest difference is 2x	8.3%	4.4%	15.6%	7.1%	18.8%	45.9%
15	Matches items with same volume – smallest difference is 2x	9.3%	3.6%	17.9%	8.1%	17.3%	43.8%
16	Matches item to space – distracters are dissimilar	8.6%	4.5%	14.1%	7.2%	17.7%	47.9%
17	Selects full/empty item	9.2%	3.8%	10.8%	5.0%	13.4%	58.0%
18	Matches digital time 1:00 or 2:00 from array of 3 – distracters are pictures	8.7%	4.1%	12.3%	3.6%	10.4%	61.0%
19	Identifies daytime or nighttime item or activity	8.4%	3.8%	21.9%	6.5%	28.5%	30.8%
20	Matches identical numbers from 1-2 – distracters are pictures	9.6%	4.5%	8.6%	2.9%	10.8%	63.5%

Appendix G: Percentages of Each Score by Item

Grade 8 Math (cont.)

Component #	Level B (n=595) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Matches digital time to 5 minutes from array of 4	1.0%	0.0%	1.8%	1.0%	10.8%	85.4%
2	Selects largest or smallest value from 1-19 in array of 4 unordered numbers with varying 10s place	0.8%	0.0%	2.7%	4.2%	14.1%	78.2%
3	Counts items in ordered array up to 19 starting at 2 or more with bridge	1.0%	0.2%	4.2%	10.8%	14.1%	69.7%
*4	Orders 3 consecutive numbers from 10 to 19	1.0%	0.3%	13.4%	24.0%	22.5%	38.7%
5	Selects largest or smallest value from graph of ordered numbers from 1-19	1.0%	0.0%	4.7%	2.9%	18.0%	73.4%
6	Counts one-dollar bills or pennies up to 19 starting at 2 or more with bridge	1.3%	0.2%	3.2%	8.4%	9.9%	77.0%
7	Measures item area by counting units from 1-19	1.3%	0.3%	5.0%	6.7%	13.1%	73.4%
*8	Selects quantity named and shown from 1-19 in array of 4 ordered sets – 3 similar sets (± 5 of target)	1.0%	0.0%	5.2%	8.9%	17.0%	67.9%
9	Sorts 4 items into 4 groups – 3 groups overlap on 1 dimension – with model	2.7%	0.0%	2.7%	9.6%	19.8%	65.2%
10	Measures item length using fixed ruler	1.3%	0.0%	3.2%	3.7%	7.1%	84.7%
11	Locates number described up to 19 in 7-8 item display	1.5%	0.0%	24.0%	22.2%	22.5%	29.7%
*12	Selects longest/shortest distance from array of 4 – all have different 10s place	1.5%	0.0%	7.7%	5.5%	16.5%	68.7%
13	Identifies measured amount ($\frac{1}{2}$ cup, $\frac{1}{4}$ cup) from array of cups and spoons	2.0%	0.0%	14.3%	8.7%	33.8%	41.2%
14	Adds 2 numbers named and shown with sums ≤ 19 by counting and using action	1.5%	0.2%	5.7%	8.6%	11.6%	72.3%
15	Counts out one-dollar bills or pennies up to 19 from a larger set	1.7%	0.2%	9.1%	10.4%	17.1%	61.5%
*16	Selects largest/smallest area by counting units from 1-19 – orientation of array differs	1.7%	0.0%	2.7%	2.0%	17.8%	75.8%
17	Subtracts 2 numbers ≤ 19 by counting items and using subtraction to take away	1.5%	0.0%	5.0%	13.9%	15.1%	64.4%
18	Selects item evenly-distributed to 2 from array of 4 – all unequal divisions	1.5%	0.2%	6.2%	5.5%	20.0%	66.6%
19	Selects activity that takes the least/most amount of time from a table of 4 times with hours	1.7%	0.0%	9.9%	5.2%	22.7%	60.3%
*20	Orders 3 items according to weight – size and weight vary directly	1.7%	0.2%	10.8%	16.5%	18.2%	52.8%
21	Selects 1, 5, 10, or 25 cents from array of 4 – all distracters are coins	2.9%	0.2%	3.5%	1.8%	13.3%	78.3%
22	Adds 3 sets of items with sums ≤ 19 by counting and using action	2.0%	0.0%	2.5%	8.4%	11.6%	75.5%

Appendix G: Percentages of Each Score by Item

Grade 8 Math (cont.)

Component #	Level B (n=595)	Percentage at Each Score					
	Description	0	1	2	3	4	5
23	Subtracts 2 prices \leq \$19 or \leq 19¢ by counting dollars or pennies and using subtraction to take away	2.9%	0.0%	4.0%	8.9%	9.6%	74.6%
24	Selects activity associated with time from array of 4	2.4%	0.5%	0.3%	0.3%	5.5%	90.9%
25	Counts out items to 19 from a larger set	2.5%	0.0%	7.6%	6.9%	13.4%	69.4%

Appendix G: Percentages of Each Score by Item

Grade 8 Math (cont.)

Component #	Level C (n=438)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Locates number described up to 99 in 9-10 item display, attending to 2 nd variable	0.7%	0.2%	15.1%	13.2%	18.9%	51.8%
2	Counts quarters, dimes, or nickels to 1 dollar	0.5%	0.0%	2.1%	4.8%	6.6%	85.8%
3	Measures to 1/2 cup by locating 1 of 5 marked quantities	1.8%	0.0%	13.0%	11.4%	17.6%	55.9%
*4	Orders 4 non-consecutive numbers up to 99 – all have same 10s place	0.7%	0.0%	4.1%	7.1%	13.2%	74.9%
5	Adds 2 numbers with sums of ≤ 99 using a calculator, action, and a word problem	1.4%	0.0%	4.3%	1.6%	12.1%	80.6%
6	Selects closest amount from array of 5 sets with 10-99 using model and 3 similar sets (± 5 or target)	1.1%	0.2%	6.8%	11.6%	21.9%	58.2%
7	Selects pictures with biggest/smallest fraction – division is shown	0.7%	0.2%	9.1%	4.6%	27.4%	58.0%
*8	Reads analog time to 5 minutes	1.8%	0.0%	8.4%	7.1%	9.1%	73.3%
9	Measures item length to within a 1/2 inch	1.1%	0.2%	20.5%	15.1%	16.2%	46.8%
10	Subtracts 2 numbers ≤ 99 using a calculator, a word problem, and using subtraction to take away	1.8%	0.0%	9.1%	6.8%	15.5%	66.7%
11	Identifies heaviest/lightest set of 2-3 items – from array of 5	1.8%	0.0%	4.6%	1.6%	12.1%	79.9%
*12	Determines least or most likely outcome, given characteristic of population of items up to 99 – extreme proportions	1.1%	0.0%	15.3%	8.4%	23.5%	51.4%
13	Identifies shortest/longest path from 5 paths with same starting point, angled turn, and different ending points from an array of 5	1.1%	0.0%	0.7%	0.5%	4.1%	93.4%
14	Identifies item that can be purchased given money available – from 1-99 dollars	1.4%	0.0%	10.0%	3.7%	22.1%	62.6%
15	Adds 2 prices with sums $\leq \$99$ or $\leq 99¢$ using a calculator, action, and a word problem	1.1%	0.0%	4.3%	2.7%	12.1%	79.7%
*16	Determines mode from graph with values to 99 by selecting from 5 bars – mode is at least 15 units more than other values	0.9%	0.0%	0.9%	1.8%	5.3%	91.1%
17	Counts out money from a combination of one- and five-dollar bills or one- and ten-dollar bills from a larger set up to 99 dollars	1.1%	0.0%	3.0%	12.1%	7.3%	76.5%
18	Sorts 9 items into 4 groups – 2 pairs vary on 1 dimension – no model	1.1%	0.0%	7.1%	12.8%	17.1%	61.9%
19	Adds 3 numbers with sums ≤ 99 using a calculator, action, and a word problem	1.6%	0.0%	3.7%	3.0%	9.4%	82.2%
*20	Orders 3 numbers according to weight – no same numbers in the tens place	0.9%	0.0%	1.1%	4.1%	5.5%	88.4%
21	Divides numbers ≤ 99 by counting and using division to determine the number of items in each group	2.1%	0.0%	16.2%	14.8%	24.4%	42.2%

Appendix G: Percentages of Each Score by Item

Grade 8 Math (cont.)

Component #	Level C (n=438)	Percentage at Each Score					
	Description	0	1	2	3	4	5
22	Counts items using combination of 1s and 5s or 1s and 10s to 99	1.4%	0.0%	5.5%	11.0%	13.7%	68.3%
23	Selects division of item from array of 5 continuous figures – 3 distracters are equally spaced	0.9%	0.0%	6.4%	3.4%	15.1%	74.0%
24	Multiplies numbers with products ≤ 99 using counting and a natural grouping	0.9%	0.0%	1.1%	2.1%	7.1%	88.6%
25	Measures whole number amount using $\frac{1}{2}$ cup	2.7%	0.5%	29.7%	19.2%	12.6%	34.9%

Appendix G: Percentages of Each Score by Item

Grade 11 Math

Component #	Level A (n=671)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Scans materials	3.6%	3.7%	1.2%	2.1%	3.7%	85.7%
2	Matches items of same length – smallest difference is 1x	3.4%	5.1%	15.9%	3.6%	20.7%	51.3%
3	Selects biggest/smallest item – smallest difference is 1x	3.4%	5.7%	12.5%	4.9%	13.4%	60.1%
4	Selects sets with 1 – smallest difference is 1x	6.7%	3.3%	14.8%	5.4%	13.1%	56.8%
5	Identifies biggest/smallest item based on volume – smallest different is 1x	10.3%	3.3%	11.6%	5.4%	13.3%	56.2%
6	Recognizes dollar bill as money – all items are similar in appearance	10.0%	3.0%	9.7%	4.2%	7.7%	65.4%
7	Identifies heavy or light item – items differ in appearance and size and weight do not vary directly	9.8%	3.1%	12.4%	6.3%	16.7%	51.7%
8	Sorts 3 objects into 3 dissimilar groups – no overlap – with model	10.4%	3.0%	18.6%	14.5%	23.7%	29.8%
9	Matches 2 sets of items with 1-5 items each – difference is 1x	10.9%	3.1%	16.1%	4.6%	18.3%	46.9%
10	Matches identical numbers from 1-5 – distracters are icons	10.9%	2.7%	10.4%	2.8%	13.3%	59.9%
11	Selects part or whole items	10.7%	3.1%	13.1%	5.5%	14.5%	53.1%
12	Matches items of same size – smallest difference is 1x	10.7%	3.3%	13.0%	4.2%	14.6%	54.2%
13	Selects set with most/least using items – smallest difference is 1x	11.2%	2.7%	18.7%	7.3%	25.4%	34.8%
14	Identifies longest/shortest item – smallest difference is 1x	12.2%	3.3%	13.3%	5.4%	17.1%	48.7%
*15	Matches items with same volume – smallest difference is 1x	11.8%	3.0%	11.8%	13.6%	11.8%	48.1%
16	Matches item to space – one distracter is similar, one is dissimilar	12.1%	2.5%	11.3%	5.7%	15.2%	53.2%
17	Selects full/half full/empty item	12.7%	3.1%	17.3%	6.1%	21.3%	39.5%
18	Matches digital time 1:00 - 5:00 from array of 3 – distracters are single digit whole numbers	11.9%	2.7%	10.3%	3.9%	11.0%	60.2%
19	Identifies morning, afternoon, evening, or nighttime activity	12.1%	3.6%	11.6%	3.7%	10.4%	58.6%
20	Matches identical numbers from 1-5 – distracters are icons	12.1%	3.0%	8.9%	3.0%	11.2%	61.8%
21	Selects part or whole items	12.1%	2.8%	12.7%	4.9%	16.1%	51.3%

Appendix G: Percentages of Each Score by Item

Grade 11 Math (cont.)

Component #	Level B (n=612)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Identifies measured amount (1/2 cup, 1/4 cup) from array of cups	2.1%	0.0%	3.6%	4.6%	15.5%	74.2%
2	Selects largest or smallest value from graph of unordered numbers from 1-99	2.1%	0.0%	2.6%	4.4%	14.2%	76.6%
3	Counts one-dollar bills or pennies up to \$99 or 99¢ starting at 10 or more	2.1%	0.2%	4.7%	12.6%	10.6%	69.7%
*4	Orders 3 numbers up to 99 – all with same 10s place	2.3%	0.0%	10.5%	12.3%	15.7%	59.2%
5	Selects closest amount from array of 4 sets with 1-19 using model and 2 similar sets (± 5 of target)	2.9%	0.0%	7.2%	7.4%	21.1%	61.4%
6	Multiplies numbers by 2s or 5s with products ≤ 99 by counting moveable items	2.3%	0.2%	22.7%	20.1%	12.3%	42.5%
7	Measures composite item area by counting units up to 99	3.3%	0.0%	6.9%	4.2%	14.7%	70.9%
*8	Traces the shortest path between 3 locations	2.9%	0.0%	15.7%	20.3%	20.4%	40.7%
9	Sorts 9 items into 4 similar groups – no overlap – no model	3.4%	0.0%	6.2%	7.8%	20.8%	61.8%
10	Measures length to 1 inch using a ruler	2.3%	0.0%	18.6%	18.5%	15.0%	45.6%
11	Locates number described up to 99 in 9-10 item display	2.8%	0.3%	15.5%	14.4%	15.8%	51.1%
*12	Evaluates distances from 1-99 feet/miles by selecting from array of 4	2.5%	0.2%	7.4%	4.6%	14.2%	71.2%
13	Selects largest/smallest location	2.3%	0.0%	5.1%	2.6%	10.8%	79.2%
14	Adds 2 numbers named and shown with sums ≤ 99 using a calculator and action	2.3%	0.0%	10.0%	6.7%	12.9%	68.1%
15	Counts five-dollar bills or nickels up to \$95 or 95¢	3.3%	0.2%	8.3%	7.0%	5.7%	75.5%
*16	Selects activity that takes the least/most amount of time from array of 4	2.3%	0.3%	5.2%	2.9%	13.2%	76.0%
17	Subtracts 2 numbers named and shown ≤ 99 using a calculator and using subtraction to take away	2.3%	0.0%	16.2%	13.9%	15.8%	51.8%
18	Selects equally divided continuous item from array of 4 figures – 2 unequal divisions	2.6%	0.0%	4.4%	2.8%	8.7%	81.5%
19	Selects unit of time associated with activity from array of 4 numbers with 2 time labels	2.0%	0.0%	13.7%	6.4%	19.6%	58.3%
*20	Orders 3 items according to weight – size and weight are not related	2.0%	0.2%	9.8%	13.7%	14.7%	59.6%
21	Names the value of the coin	4.2%	0.2%	3.3%	2.9%	8.5%	80.9%

Appendix G: Percentages of Each Score by Item

Grade 11 Math (cont.)

Component #	Level B (n=612)	Percentage at Each Score					
	Description	0	1	2	3	4	5
22	Adds 3 numbers named and shown with sums ≤ 99 using a calculator and action	2.1%	0.0%	10.0%	5.9%	9.6%	72.4%
23	Selects appropriately sized container for several items	2.9%	0.0%	1.0%	5.6%	8.0%	82.5%
24	Selects largest/smallest area by counting units up to 99 – both dimensions vary	2.8%	0.0%	1.8%	0.8%	6.5%	88.1%
25	Subtracts 2 prices named and shown $\leq \$99$ or $\leq 99\text{¢}$ using a calculator	2.8%	0.3%	12.1%	9.2%	10.8%	64.9%

Appendix G: Percentages of Each Score by Item

Grade 11 Math (cont.)

Component #	Level C (n=264)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Locates fraction described in 11-12 item display	8.7%	0.0%	8.7%	11.7%	14.0%	56.8%
2	Counts using a combination of one-, five-, ten-, and/or twenty-dollar bills up to 500 dollars	8.3%	0.4%	12.9%	22.3%	8.7%	47.3%
3	Measures by locating 1 to 5 marked quantities	8.3%	0.0%	5.3%	9.1%	11.4%	65.9%
*4	Orders 4 non-consecutive numbers up to 500 – all have same 100s and 10s place	8.3%	0.0%	1.5%	3.0%	3.4%	83.7%
5	Links expression adding 2 numbers ≤ 500 to problem situation from array of 5	8.7%	0.0%	4.2%	6.4%	11.7%	68.9%
6	Selects closest number from array of 5 numbers from 1-500	8.7%	0.0%	8.0%	6.4%	18.9%	58.0%
7	Selects average value from array of 5	8.7%	0.4%	9.1%	15.2%	22.7%	43.9%
*8	Orders 4 items according to weight	8.7%	0.0%	3.4%	5.3%	5.3%	77.3%
9	Measures item length to within 1/4 inch	9.1%	0.4%	37.5%	27.7%	7.6%	17.8%
10	Subtracts 2 prices with dollars and cents \leq \$500 using a calculator and using subtraction to determine difference	9.1%	0.4%	14.4%	18.9%	18.9%	38.3%
11	Matches fraction symbol shown to picture from array of 5 – all choices are ≤ 1	9.8%	0.4%	8.0%	7.2%	12.1%	62.5%
*12	Determines mode from graph with values to 99 by selecting from 5 bars – at least 2 bars are 14 or fewer units from mode	9.8%	0.8%	1.5%	3.0%	3.8%	81.1%
13	Identifies shortest/longest path from 5 paths with same starting point, curves, and different ending points from an array of 5	10.6%	0.0%	0.0%	1.9%	1.1%	86.4%
14	Determines least or most likely outcome, given characteristic of population of items up to 500 – close proportions	9.5%	0.0%	8.0%	11.4%	15.2%	56.1%
15	Adds 2 prices with dollars and cents for sums \leq \$500 using a calculator and a word problem without action	9.5%	0.4%	4.9%	7.2%	11.7%	66.3%
16	Identifies time corresponding to commonly used time phrases	9.1%	0.0%	5.3%	3.8%	18.6%	63.3%
17	Counts out money from a combination of one-, five-, ten- and/or twenty-dollar bills from a larger set up to 500 dollars	9.1%	0.0%	5.7%	18.2%	15.5%	51.5%
18	Sorts 9 items into 4 groups – all groups vary on 2 dimensions – no model	11.0%	0.0%	8.7%	18.2%	22.7%	39.4%
19	Selects division of items from array of 5 continuous figures – all choices are evenly spaced	9.5%	0.0%	5.7%	3.4%	9.8%	71.6%

Appendix G: Percentages of Each Score by Item

Grade 11 Math (cont.)

	Level C (n=264)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
20	Identifies heaviest/lightest item by whole number from an array of 5	9.1%	0.0%	3.0%	2.7%	6.1%	79.2%
21	Divides numbers named and shown ≤ 500 using a calculator and using division to determine number of groupings	9.5%	0.4%	12.5%	18.6%	18.2%	40.9%
22	Determines hours between 2 times	9.5%	0.8%	15.9%	8.0%	10.2%	55.7%
23	Multiplies numbers with products ≤ 500 using a calculator and no natural groups	9.5%	0.4%	14.4%	12.5%	29.2%	34.1%

Appendix G: Percentages of Each Score by Item

Grade 3 Reading

Component #	Level A (n=497)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Orients toward materials	1.4%	2.6%	3.2%	0.6%	5.0%	86.9%
2	Matches identical objects – distracters are objects from different categories in appearance	1.2%	6.6%	21.1%	5.2%	20.3%	45.5%
3	Selects object named – distracters are objects from different categories in appearance	2.0%	7.0%	11.9%	3.6%	11.9%	63.6%
*4	Identifies category of objects – distracters are objects from different conceptual categories	4.4%	7.2%	19.9%	4.4%	19.9%	44.1%
5	Selects related objects – distracters are objects from different conceptual categories	5.4%	5.0%	23.1%	6.8%	21.1%	38.4%
6	Answers literal 'what' question by selecting object – distracters are objects from different conceptual categories	7.8%	5.2%	17.3%	6.2%	14.5%	48.9%
7	Selects similar objects – distracters are objects from different conceptual categories	7.0%	6.2%	21.7%	7.4%	22.1%	35.4%
8	Demonstrates function of object – open-ended response	8.2%	5.8%	27.2%	3.0%	14.5%	41.2%
9	Answers literal 'who' question by selecting object – distracters are objects from different conceptual categories	8.9%	5.0%	13.1%	3.6%	14.5%	54.9%
10	Selects object by function – distracters are objects from different conceptual categories	9.1%	5.2%	29.8%	4.2%	17.9%	33.8%
11	Selects object named – distracters are objects from different categories in appearance	9.9%	3.4%	18.5%	4.6%	13.9%	49.7%
12	Matches identical objects – distracters are objects from different categories in appearance	10.3%	3.6%	15.5%	4.0%	18.7%	47.9%
13	Selects related objects – distracters are objects from different conceptual categories	9.7%	4.2%	15.3%	4.4%	20.9%	45.5%
14	Selects similar objects – distracters are objects from different conceptual categories	9.9%	4.0%	13.3%	6.0%	16.5%	50.3%
15	Answers literal 'what' question by selecting object – distracters are objects from different conceptual categories	10.1%	4.4%	17.1%	6.8%	14.7%	46.9%
16	Demonstrates function of object – open-ended response	9.9%	6.6%	33.0%	6.6%	14.3%	29.6%
17	Selects object by function – distracters are objects from different conceptual categories	10.5%	3.8%	15.1%	5.4%	19.1%	46.1%
18	Answers literal 'who' question by selecting object – distracters are objects from different conceptual categories	10.3%	4.6%	15.1%	4.2%	13.3%	52.5%
19	Selects object named – distracters are objects from different categories in appearance	11.5%	3.2%	8.9%	4.2%	11.9%	60.4%
20	Selects related objects – distracters are objects from different conceptual categories	10.7%	5.6%	21.9%	5.8%	16.7%	39.2%
21	Matches identical objects – distracters are objects from different categories in appearance	13.7%	4.4%	16.9%	3.6%	17.1%	44.1%

Appendix G: Percentages of Each Score by Item

Grade 3 Reading (cont.)

Component #	Level B (n=624) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Selects picture with beginning sound named	0.6%	0.0%	7.5%	6.1%	20.5%	65.1%
2	Selects picture by feature	0.8%	0.0%	2.2%	2.6%	12.2%	82.2%
3	Names action in a simple picture – open-ended response	0.8%	0.5%	4.5%	1.6%	5.3%	87.3%
*4	Matches identical word in connected or disconnected array – all choices have same beginning letter and different ending letters – words 3-4 letters in length	1.0%	0.2%	3.8%	3.8%	14.1%	77.1%
5	Answers literal ‘who’ question by selecting picture – distracters are pictures from same conceptual category	1.1%	0.2%	4.5%	1.9%	11.9%	80.4%
*6	Locates partially hidden item in scene – 5 items pictured	1.1%	0.3%	0.8%	0.8%	4.0%	92.9%
7	Selects icon named	1.0%	0.0%	5.4%	4.6%	8.2%	80.8%
8	Selects related picture – distracters are pictures from same conceptual category	0.8%	0.3%	3.7%	2.9%	9.1%	83.2%
9	Answers literal ‘what’ question by selecting picture – distracters are pictures from same conceptual category	1.1%	0.2%	8.0%	3.8%	25.8%	61.1%
10	Demonstrates understanding of 2-10 word, 1-step oral command	2.6%	0.2%	6.3%	3.7%	6.7%	80.6%
11	Selects picture by function – distracters are pictures from same conceptual category	0.8%	0.2%	1.1%	1.8%	5.0%	91.2%
*12	Selects picture named in connected or disconnected array – distracters are pictures from same category in appearance	1.0%	0.0%	1.8%	3.2%	6.6%	87.5%
13	Identifies category of picture – distracters are pictures from different conceptual categories	1.0%	0.0%	4.8%	3.7%	12.0%	78.5%
14	Names item in a complex picture – open-ended response	1.0%	0.3%	6.1%	2.9%	6.6%	83.2%
15	Selects similar pictures – distracters are pictures from same conceptual category	1.0%	.2%	6.3%	7.1%	16.2%	69.2%
*16	Selects picture demonstrating meaning of action word	1.1%	0.0%	4.3%	3.2%	11.1%	80.3%
17	Selects picture with beginning sound named	1.1%	0.2%	8.5%	6.1%	19.6%	64.6%
18	Answers literal ‘who’ question by selecting picture – distracters are pictures from same conceptual category	0.8%	0.2%	3.7%	2.4%	13.6%	79.2%
19	Selects picture by feature	0.8%	0.0%	5.6%	5.0%	15.5%	73.1%
20	Selects related picture – distracters are pictures from same conceptual category	0.8%	0.0%	1.3%	1.9%	6.4%	89.6%
21	Selects picture by function – distracters are pictures from same conceptual category	0.6%	0.0%	9.1%	6.9%	22.8%	60.6%

Appendix G: Percentages of Each Score by Item

Grade 3 Reading (cont.)

Component #	Level B (n=624)	Percentage at Each Score					
	Description	0	1	2	3	4	5
22	Demonstrates understanding of 2-10 word, 1-step oral command	2.7%	0.3%	1.6%	0.8%	4.6%	89.9%
23	Answers literal 'what' question by selecting picture – distracters are pictures from same conceptual category	0.8%	0.0%	5.3%	3.2%	13.0%	77.7%
24	Identifies category of picture – distracters are pictures from different conceptual categories	2.9%	0.6%	2.9%	1.8%	7.7%	84.1%

Appendix G: Percentages of Each Score by Item

Grade 3 Reading (cont.)

Component #	Level C (n=360)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Selects 1 word with beginning sound named in array of 5	1.1%	0.0%	0.8%	1.1%	4.4%	92.5%
2	Selects 1 word by function in array of 5	1.4%	0.0%	1.4%	1.9%	9.4%	85.8%
3	Selects 1 word named in connected or disconnected array of 5 with all choices having same beginning letter	1.4%	0.3%	1.4%	2.5%	6.1%	88.3%
*4	Supplies last word missing in sentence using clue from complex picture	1.4%	0.0%	12.8%	5.0%	13.6%	67.2%
5	Reads 1 word in context – regularly decodable	1.4%	0.0%	12.8%	5.8%	7.5%	72.5%
6	Answers literal ‘what’ question after hearing 3 sentences	1.9%	0.0%	10.8%	6.4%	16.7%	64.2%
7	Answers literal ‘where’ question after hearing 3 sentences	2.8%	0.0%	5.3%	7.2%	12.2%	72.5%
8	Gives an example to complete a definition	1.1%	0.0%	14.7%	17.5%	29.4%	37.2%
9	Reads 1 word in context – regularly decodable	1.1%	0.0%	2.5%	4.4%	2.2%	89.7%
10	Answers literal ‘where’ question after hearing 3 sentences	2.5%	0.0%	6.4%	6.7%	10.3%	74.2%
11	Answers literal ‘what’ question after hearing 3 sentences	1.7%	0.0%	6.4%	3.3%	7.5%	81.1%
12	Selects picture representing 1 word read silently from array of 5 pictures	1.1%	0.0%	0.8%	1.7%	4.2%	92.2%
13	Reads 1 word in context – regularly decodable	1.7%	0.0%	10.8%	6.1%	4.4%	76.9%
14	Orders 3 pictures based on text	1.1%	0.3%	18.3%	22.2%	18.6%	39.4%
15	Demonstrates understanding of 2-10 word 2-step oral command	2.8%	0.0%	4.4%	11.1%	11.7%	70.0%
16	Reads 1 word in context – regularly decodable	1.4%	0.0%	13.3%	5.8%	4.2%	75.3%
17	Selects picture to identify main event from narrative text	1.1%	0.0%	4.2%	6.1%	17.5%	71.1%
18	Reads 1 word in context – regularly decodable	1.4%	0.0%	11.9%	5.8%	5.6%	75.3%
19	Answers literal ‘when’ question after hearing 3 sentences	1.9%	0.6%	20.0%	10.8%	26.9%	39.4%
20	Answers literal ‘who’ question after hearing 3 sentences	1.7%	0.6%	7.5%	8.3%	13.3%	68.6%
21	Selects word within same conceptual category	1.9%	0.6%	1.9%	2.8%	14.7%	78.1%

Appendix G: Percentages of Each Score by Item

Grade 4 Reading

Component #	Level A (n=439)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Orients toward materials	3.0%	4.6%	2.1%	2.5%	5.3%	82.6%
2	Matches identical objects – distracters are objects from different categories in appearance	2.3%	7.1%	20.5%	4.6%	19.1%	46.5%
3	Selects object named – distracters are objects from different categories in appearance	3.0%	6.4%	12.5%	5.5%	12.3%	60.4%
*4	Identifies category of objects – distracters are objects from different conceptual categories	6.2%	5.7%	23.5%	5.5%	18.2%	41.0%
5	Selects related objects – distracters are objects from different conceptual categories	7.1%	7.5%	19.4%	7.5%	20.3%	38.3%
6	Answers literal 'what' question by selecting object – distracters are objects from different conceptual categories	9.1%	4.6%	17.5%	4.6%	12.8%	51.5%
7	Selects similar objects – distracters are objects from different conceptual categories	9.8%	4.3%	21.6%	8.4%	21.9%	33.9%
8	Demonstrates function of object – open-ended response	10.3%	7.3%	23.2%	5.2%	15.3%	38.7%
9	Answers literal 'who' question by selecting object – distracters are objects from different conceptual categories	10.3%	5.5%	14.1%	5.0%	17.3%	47.8%
10	Selects object by function – distracters are objects from different conceptual categories	10.7%	5.0%	25.7%	7.1%	22.1%	29.4%
11	Selects object named – distracters are objects from different categories in appearance	11.4%	5.5%	20.5%	4.6%	11.8%	46.2%
12	Matches identical objects – distracters are objects from different categories in appearance	11.2%	4.1%	14.8%	7.1%	16.9%	46.0%
13	Selects related objects – distracters are objects from different conceptual categories	12.5%	5.9%	16.6%	4.6%	20.0%	40.3%
14	Selects similar objects – distracters are objects from different conceptual categories	13.4%	5.0%	12.5%	5.5%	20.3%	43.3%
15	Answers literal 'what' question by selecting object – distracters are objects from different conceptual categories	13.2%	4.1%	18.0%	3.9%	16.2%	44.6%
16	Demonstrates function of object – open-ended response	13.9%	5.0%	27.2%	5.9%	15.1%	32.9%
17	Selects object by function – distracters are objects from different conceptual categories	13.9%	4.6%	13.2%	5.0%	19.8%	43.5%
18	Answers literal 'who' question by selecting object – distracters are objects from different conceptual categories	13.9%	5.0%	15.5%	4.6%	13.0%	48.1%
19	Selects object named – distracters are objects from different categories in appearance	14.8%	3.9%	7.7%	4.6%	10.9%	58.1%
20	Selects related objects – distracters are objects from different conceptual categories	13.9%	5.7%	19.1%	4.8%	17.8%	38.7%
21	Matches identical objects – distracters are objects from different categories in appearance	17.8%	4.8%	12.1%	4.6%	17.4%	43.4%

Appendix G: Percentages of Each Score by Item

Grade 4 Reading (cont.)

Component #	Level B (n=551)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Selects picture with beginning sound named	0.4%	0.4%	8.2%	5.4%	15.8%	69.9%
2	Selects picture by feature	0.9%	0.5%	1.5%	0.9%	8.7%	87.5%
3	Names action in a simple picture – open-ended response	0.5%	0.4%	2.4%	2.2%	5.3%	89.3%
*4	Matches identical word in connected or disconnected array – all choices have same beginning letter and different ending letters – words 3-4 letters in length	0.9%	0.0%	2.7%	2.9%	13.2%	80.2%
5	Answers literal ‘who’ question by selecting picture – distracters are pictures from same conceptual category	0.7%	0.4	4.2%	2.2%	12.5%	80.0%
*6	Locates partially hidden item in scene – 5 items pictured	0.9%	0.2%	1.1%	0.5%	3.1%	94.2%
7	Selects icon named	0.4%	0.5%	3.6%	3.1%	10.3%	82.0%
8	Selects related picture – distracters are pictures from same conceptual category	0.4%	0.2%	2.0%	2.0%	10.9%	84.6%
9	Answers literal ‘what’ question by selecting picture – distracters are pictures from same conceptual category	0.7%	0.4	5.6%	2.5%	21.6%	69.1%
10	Demonstrates understanding of 2-10 word, 1-step oral command	1.8%	0.9	3.3%	1.5%	6.2%	86.4%
11	Selects picture by function – distracters are pictures from same conceptual category	0.4%	0.2	0.9%	0.9%	5.3%	92.4%
*12	Selects picture named in connected or disconnected array – distracters are pictures from same category in appearance	0.5%	0.2	2.0%	2.0%	5.8%	89.5%
13	Identifies category of picture – distracters are pictures from different conceptual categories	0.7%	0.2	2.4%	1.1%	9.6%	86.0%
14	Names item in a complex picture – open-ended response	0.7%	0.0%	4.0%	2.4%	4.7%	88.2%
15	Selects similar pictures – distracters are pictures from same conceptual category	0.7%	0.2	5.1%	5.4%	16.5%	72.1%
*16	Selects picture demonstrating meaning of action word	0.9%	0.0%	2.9	1.3%	9.8%	85.1%
17	Selects picture with beginning sound named	0.9%	0.2	6.7%	5.8%	19.1%	67.3%
18	Answers literal ‘who’ question by selecting picture – distracters are pictures from same conceptual category	1.1%	0.0%	3.4%	2.5%	11.4%	81.5%
19	Selects picture by feature	0.7%	0.0%	2.7	1.8%	12.7%	82.0%
20	Selects related picture – distracters are pictures from same conceptual category	1.3%	0.0%	1.1%	0.9%	5.6%	91.1%
21	Selects picture by function – distracters are pictures from same conceptual category	0.9%	0.2	4.4%	6.7%	19.1%	68.8%
22	Demonstrates understanding of 2-10 word, 1-step oral command	3.1%	0.4	2.2%	0.9%	3.1%	90.4%

Appendix G: Percentages of Each Score by Item

Grade 4 Reading (cont.)

	Level B (n=551)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
23	Answers literal 'what' question by selecting picture – distracters are pictures from same conceptual category	1.6%	0.0%	2.9%	3.3%	12.3%	79.9%
24	Identifies category of picture – distracters are pictures from different conceptual categories	1.5%	0.7	1.8%	0.9%	7.3%	87.8%

Appendix G: Percentages of Each Score by Item

Grade 4 Reading (cont.)

Component #	Level C (n=498) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Selects 1 word with beginning sound named in array of 5	2.0%	0.0%	0.6%	1.0%	2.0%	94.4%
2	Selects 1 word by function in array of 5	1.8%	0.0%	0.2%	0.8%	5.4%	91.8%
3	Selects 1 word named in connected or disconnected array of 5 with all choices having same beginning letter	1.6%	0.0%	1.2%	3.8%	3.6%	89.8%
*4	Supplies last word missing in sentence using clue from complex picture	1.6%	0.0%	9.0%	3.6%	13.9%	71.9%
5	Reads 1 word in context – regularly decodable	1.8%	0.0%	7.4%	5.8%	7.6%	77.3%
6	Answers literal 'what' question after hearing 3 sentences	2.8%	0.0%	3.6%	4.8%	11.6%	77.1%
7	Answers literal 'where' question after hearing 3 sentences	2.2%	0.4%	4.0%	4.2%	11.0%	78.1%
8	Gives an example to complete a definition	1.6%	0.2%	12.7%	14.7%	23.1%	47.8%
9	Reads 1 word in context – regularly decodable	1.8%	0.0%	2.4%	3.8%	2.4%	89.6%
10	Answers literal 'where' question after hearing 3 sentences	3.0%	0.2%	4.8%	3.2%	11.4%	77.3%
11	Answers literal 'what' question after hearing 3 sentences	2.8%	0.0%	2.4%	2.0%	5.2%	87.6%
12	Selects picture representing 1 word read silently from array of 5 pictures	2.2%	0.0%	0.4%	3.0%	3.4%	91.0%
13	Reads 1 word in context – regularly decodable	1.8%	0.0%	6.6%	6.0%	5.6%	79.9%
14	Orders 3 pictures based on text	1.6%	0.0%	14.5%	18.3%	18.3%	47.4%
15	Demonstrates understanding of 2-10 word 2-step oral command	4.2%	0.0%	3.6%	7.0%	12.4%	72.7%
16	Reads 1 word in context – regularly decodable	1.6%	0.0%	7.6%	6.6%	3.2%	80.9%
17	Selects picture to identify main event from narrative text	1.6%	0.0%	1.8%	2.6%	12.2%	81.7%
18	Reads 1 word in context – regularly decodable	1.6%	0.2%	7.6%	6.2%	5.4%	78.9%
19	Answers literal 'when' question after hearing 3 sentences	2.4%	0.6%	14.1%	12.9%	25.1%	45.0%
20	Answers literal 'who' question after hearing 3 sentences	2.0%	0.2%	7.6%	6.6%	8.8%	74.7%
21	Selects word within same conceptual category	1.8%	0.2%	2.4%	0.8%	8.2%	86.5%

Appendix G: Percentages of Each Score by Item

Grade 5 Reading

Component #	Level A (n=464)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Orients toward materials	2.2%	2.4%	2.2%	0.4%	5.2%	87.7%
2	Matches identical objects – distracters are objects from same and different categories in appearance	1.7%	6.0%	20.7%	4.5%	18.8%	48.3%
3	Selects object named – distracters are objects from same and different categories in appearance	1.7%	5.4%	18.1%	5.4%	15.7%	53.7%
*4	Identifies category of objects – distracters are objects from same and different conceptual categories	6.3%	3.4%	23.7%	7.3%	18.8%	40.5%
5	Selects related objects – distracters are objects from same and different conceptual categories	8.0%	2.2%	21.1%	4.7%	18.5%	45.5%
6	Answers literal ‘what’ question by selecting object – distracters are objects from same and different conceptual categories	9.3%	1.3%	12.9%	5.0%	15.3%	56.3%
7	Selects similar objects – distracters are objects from same and different conceptual categories	10.8%	2.8%	24.6%	7.1%	20.0%	34.7%
8	Answers literal ‘who’ question by selecting object – distracters are objects from same and different conceptual categories	9.9%	2.2%	21.3%	4.7%	19.8%	42.0%
9	Selects object by function – distracters are objects from same and different conceptual categories	11.0%	2.6%	20.5%	6.9%	17.0%	42.0%
10	Selects object named – distracters are objects from same and different categories in appearance	11.4%	3.0%	18.5%	3.9%	14.7%	48.5%
11	Matches identical objects – distracters are objects from same and different categories in appearance	11.9%	2.4%	13.1%	4.1%	18.5%	50.0%
*12	Demonstrates function of 2 related objects – open-ended response	11.6%	3.2%	17.0%	11.6%	13.6%	42.9%
13	Selects related objects – distracters are objects from same and different conceptual categories	12.3%	2.2%	21.8%	5.2%	18.8%	39.9%
14	Selects similar objects – distracters are objects from same and different conceptual categories	11.0%	2.6%	23.5%	8.4%	16.8%	37.5%
15	Answers literal ‘what’ question by selecting object – distracters are objects from same and different conceptual categories	12.1%	1.5%	16.8%	3.9%	12.9%	52.8%
16	Selects object by function – distracters are objects from same and different conceptual categories	12.3%	1.5%	14.9%	3.4%	13.4%	54.5%

Appendix G: Percentages of Each Score by Item

Grade 5 Reading (cont.)

Level A (n=464)		Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
17	Answers literal 'who' question by selecting object – distracters are objects from same and different conceptual categories	12.5%	2.6%	17.5%	4.5%	19.8%	43.1%
18	Selects object named – distracters are objects from same and different categories in appearance	11.6%	2.6%	16.6%	2.6%	10.6%	56.0%
19	Selects related objects – distracters are objects from same and different conceptual categories	12.5%	2.6%	22.2%	4.7%	21.3%	36.6%
20	Matches identical objects – distracters are objects from same and different categories in appearance	13.1%	2.8%	15.5%	5.0%	17.9%	45.7%
21	Selects similar objects – distracters are objects from same and different conceptual categories	12.7%	3.0%	21.1%	8.4%	19.6%	35.1%
22	Selects object by function – distracters are objects from same and different conceptual categories	14.9%	2.8%	23.1%	7.5%	20.3%	31.5%

Appendix G: Percentages of Each Score by Item

Grade 5 Reading (cont.)

Component #	Level B (n=512) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Selects picture with same beginning sound as target picture named	0.8%	0.2%	9.4%	12.7%	25.4%	51.6%
2	Selects icon by function	1.0%	0.2%	5.3%	5.5%	17.2%	70.9%
3	Names event in a picture	1.0%	0.2%	5.9%	10.7%	23.0%	59.2%
*4	Matches identical words in connected or disconnected array – all choices have same beginning and ending letters – words 4-5 letters in length	1.0%	0.2%	4.7%	3.1%	17.2%	73.8%
5	Answers literal 'who' question by selecting picture – distracters are pictures from same conceptual category	0.8%	0.2%	10.4%	4.3%	24.2%	60.2%
*6	Locates partially hidden item in scene – more than 5 items pictured	1.0%	0.2%	1.8%	1.2%	5.1%	90.8%
7	Names picture – synthesizes information to give noun	1.0%	0.4%	3.5%	5.9%	17.4%	71.9%
8	Answers literal 'where' question by selecting picture – distracters are pictures from same conceptual category	0.8%	0.0%	4.5%	2.0%	16.2%	76.6%
9	Answers literal 'what' question by selecting picture – distracters are pictures from same conceptual category	0.8%	0.0%	4.7%	3.3%	21.1%	70.1%
10	Demonstrates understanding of 2-10 word, 2-step oral command	1.4%	0.0%	1.4%	8.0%	6.4%	82.8%
11	Selects complex picture by function – distracters are pictures from different conceptual categories	0.8%	0.4%	0.8%	2.0%	4.7%	91.4%
*12	Selects item named in complex picture	1.0%	0.2%	2.1%	1.0%	5.3%	90.4%
13	Identifies category of picture – distracters are pictures from same conceptual category	1.0%	0.0%	1.8%	2.3%	9.2%	85.5%
14	Selects picture of last word missing in sentence using clue from picture – all choices from same conceptual category	1.0%	0.0%	1.2%	3.9%	14.8%	79.1%
15	Selects picture of rhyming word	1.0%	0.0%	14.6%	10.9%	35.7%	37.7%
*16	Names icon – open-ended response	1.4%	0.6%	21.1%	8.8%	13.5%	54.7%
17	Completes a definition of a picture – open-ended	1.2%	0.4%	3.5%	3.7%	7.6%	83.6%
18	Answers literal 'who' question by selecting picture – distracters are pictures from same conceptual category	1.4%	0.0%	9.8%	3.9%	23.8%	61.1%
19	Names event in a picture	1.4%	0.0%	5.5%	10.2%	18.6%	64.5%
*20	Selects picture showing 1 feature named	1.0%	0.0%	2.3%	1.6%	7.0%	88.1%

Appendix G: Percentages of Each Score by Item

Grade 5 Reading (cont.)

Component #	Level B (n=512)	Percentage at Each Score					
	Description	0	1	2	3	4	5
21	Selects icon by function	1.2%	0.0%	4.5%	3.3%	12.1%	78.9%
22	Answers literal 'where' question by selecting picture – distracters are pictures from same conceptual category	1.4%	0.0%	2.0%	1.8%	9.0%	85.9%
23	Selects picture of rhyming word	1.2%	0.0%	13.1%	10.0%	30.5%	45.3%
24	Answers literal 'what' question by selecting picture – distracters are pictures from same conceptual category	1.6%	0.0%	4.3%	2.0%	16.4%	75.8%
25	Selects complex picture showing first or last event in story	2.3%	0.6%	10.0%	6.3%	28.5%	52.3%

Appendix G: Percentages of Each Score by Item

Grade 5 Reading (cont.)

Component #	Level C (n=491)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Reads 2-10 words	1.0%	0.0%	1.4%	21.4%	16.9%	59.3%
2	Describes 1 event from narrative text	0.8%	0.0%	1.8%	7.9%	10.6%	78.6%
*3	Reads 2-10 word sentence silently and supplies word missing in sentence using clue from picture	0.8%	0.0%	9.2%	15.5%	16.5%	58.0%
4	Defines the function of a word	1.0%	0.0%	1.4%	3.9%	5.1%	88.6%
5	Reads 2-10 words	0.6%	0.0%	2.2%	40.9%	21.6%	34.6%
6	Answers literal 'where' question	0.8%	0.0%	4.7%	4.3%	7.9%	82.3%
7	Answers literal 'who' question	0.8%	0.0%	6.5%	5.9%	4.9%	81.9%
8	Answers literal 'who' question	0.8%	0.0%	7.7%	6.3%	6.5%	78.6%
9	Selects 2-3 words by function in array of 5	0.4%	0.0%	3.7%	6.1%	24.6%	65.2%
10	Reads 2-10 words	0.4%	0.0%	2.9%	35.6%	17.3%	43.8%
11	Orders words representing main ideas from story	0.4%	0.2%	13.2%	18.7%	16.5%	50.9%
12	Reads 2-10 words	0.4%	0.0%	2.9%	33.4%	22.0%	41.3%
13	Answers literal 'what' question	1.2%	0.0%	7.1%	6.9%	15.7%	69.0%
14	Answers literal 'what' question	0.8%	0.0%	15.9%	10.8%	15.5%	57.0%
15	Demonstrates understanding of 2-10 word written command	0.6%	0.4%	6.9%	17.7%	11.8%	62.5%
16	Reads 2-10 words	0.6%	0.0%	3.1%	31.8%	20.8%	43.8%
17	Names 1 fact from expository text	1.2%	0.0%	2.4%	7.7%	7.5%	81.1%
18	Reads 2-10 words	0.6%	0.0%	2.6%	26.1%	13.4%	57.2%
19	Answers literal 'how' question	2.0%	0.0%	4.3%	6.9%	9.6%	77.2%
20	Answers literal 'when' question	1.4%	0.2%	5.3%	5.7%	4.7%	82.7%
21	Answers literal 'what' question	3.1%	0.2%	5.3%	6.9%	6.9%	77.6%

Appendix G: Percentages of Each Score by Item

Grade 6 Reading

Component #	Level A (n=482)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Orients toward materials	2.1%	2.9%	1.5%	1.7%	4.1%	87.8%
2	Matches identical objects – distracters are objects from same and different categories in appearance	1.9	6.4	21.6	2.7	20.1	47.1
3	Selects object named – distracters are objects from same and different categories in appearance	2.1%	6.4%	19.3%	4.4%	13.7%	54.1%
*4	Identifies category of objects – distracters are objects from same and different conceptual categories	6.8%	4.8%	20.5%	4.6%	14.7%	48.5%
5	Selects related objects – distracters are objects from same and different conceptual categories	9.3%	3.7%	15.8%	5.0%	20.5%	45.6%
6	Answers literal 'what' question by selecting object – distracters are objects from same and different conceptual categories	9.8%	3.3%	13.1%	3.1%	13.9%	56.8%
7	Selects similar objects – distracters are objects from same and different conceptual categories	11.8%	3.9%	15.4%	4.1%	21.4%	43.4%
8	Answers literal 'who' question by selecting object – distracters are objects from same and different conceptual categories	11.4%	4.8%	21.2%	2.7%	15.4%	44.6%
9	Selects object by function – distracters are objects from same and different conceptual categories	12.7%	3.9%	16.2%	3.5%	20.5%	43.2%
10	Selects object named – distracters are objects from same and different categories in appearance	12.9%	3.1%	14.1%	3.1%	11.0%	55.8%
11	Matches identical objects – distracters are objects from same and different categories in appearance	13.3%	3.1%	12.0%	2.3%	14.9%	54.4%
*12	Demonstrates function of 2 related objects – open-ended response	12.9%	4.4%	15.6%	7.5%	17.4%	42.3%
13	Selects related objects – distracters are objects from same and different conceptual categories	12.9%	2.9%	15.1%	3.7%	22.0%	43.4%
14	Selects similar objects – distracters are objects from same and different conceptual categories	13.5%	3.7%	20.3%	7.7%	17.6%	37.1%
15	Answers literal 'what' question by selecting object – distracters are objects from same and different conceptual categories	14.7%	3.1%	13.1%	2.1%	14.5%	52.3%
16	Selects object by function – distracters are objects from same and different conceptual categories	13.5%	2.7%	12.7%	3.3%	15.6%	52.3%

Appendix G: Percentages of Each Score by Item

Grade 6 Reading (cont.)

Level A (n=482)		Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
17	Answers literal 'who' question by selecting object – distracters are objects from same and different conceptual categories	14.1%	3.5%	13.7%	2.7%	20.1%	45.9%
18	Selects object named – distracters are objects from same and different categories in appearance	14.1%	3.3%	13.5%	1.9%	13.5%	53.7%
19	Selects related objects – distracters are objects from same and different conceptual categories	14.7%	3.9%	16.2%	3.3%	19.5%	42.3%
20	Matches identical objects – distracters are objects from same and different categories in appearance	15.6%	3.1%	15.8%	3.9%	17.6%	44.0%
21	Selects similar objects – distracters are objects from same and different conceptual categories	15.4%	3.9%	18.3%	5.4%	19.5%	37.6%
22	Selects object by function – distracters are objects from same and different conceptual categories	15.8%	4.6%	22.4%	5.2%	16.6%	35.5%

Appendix G: Percentages of Each Score by Item

Grade 6 Reading (cont.)

Component #	Level B (n=651)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Selects picture with same beginning sound as target picture named	1.1%	0.2%	7.1%	8.8%	25.7%	57.3%
2	Selects icon by function	1.4%	0.2%	5.1%	3.8%	11.8%	77.7%
3	Names event in a picture	1.2%	0.3%	5.2%	11.7%	16.4%	65.1%
*4	Matches identical words in connected or disconnected array – all choices have same beginning and ending letters – words 4-5 letters in length	1.4%	0.0%	1.8%	3.1%	11.7%	82.0%
5	Answers literal 'who' question by selecting picture – distracters are pictures from same conceptual category	1.4%	0.2%	6.0%	3.5%	22.9%	66.1%
*6	Locates partially hidden item in scene – more than 5 items pictured	1.5%	0.2%	1.1%	0.9%	3.5%	92.8%
7	Names picture – synthesizes information to give noun	2.0%	0.3%	3.1%	5.1%	15.4%	74.2%
8	Answers literal 'where' question by selecting picture – distracters are pictures from same conceptual category	0.9%	0.5%	3.4%	3.4%	10.9%	81.0%
9	Answers literal 'what' question by selecting picture – distracters are pictures from same conceptual category	1.2%	0.0%	5.7%	2.8%	19.4%	71.0%
10	Demonstrates understanding of 2-10 word, 2-step oral command	3.1%	0.3%	0.8%	5.1%	6.0%	84.8%
11	Selects complex picture by function – distracters are pictures from different conceptual categories	1.5%	0.0%	0.8%	5.1%	6.0%	84.8%
*12	Selects item named in complex picture	1.5%	0.0%	1.2%	0.9%	6.6%	89.7%
13	Identifies category of picture – distracters are pictures from same conceptual category	1.5%	0.0%	1.8%	1.7%	6.3%	88.5%
14	Selects picture of last word missing in sentence using clue from picture – all choices from same conceptual category	1.4%	0.2%	2.2%	4.0%	14.7%	77.6%
15	Selects picture of rhyming word	1.4%	0.0%	13.5%	7.7%	37.3%	40.1%
*16	Names icon – open-ended response	1.4%	0.3%	19.5%	7.8%	14.3%	56.7%
17	Completes a definition of a picture – open-ended	1.7%	0.2%	2.8%	2.9%	7.1%	85.4%
18	Answers literal 'who' question by selecting picture – distracters are pictures from same conceptual category	1.5%	0.2%	7.4%	3.4%	22.0%	65.6%
19	Names event in a picture	1.2%	0.3%	5.5%	9.5%	16.4%	67.0%
*20	Selects picture showing 1 feature named	1.2%	0.2%	0.6%	0.9%	6.1%	90.9%
21	Selects icon by function	1.4%	0.3%	2.6%	2.3%	10.9%	82.5%

Appendix G: Percentages of Each Score by Item

Grade 6 Reading (cont.)

	Level B (n=651)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
22	Answers literal 'where' question by selecting picture – distracters are pictures from same conceptual category	1.1%	0.2%	1.5%	2.2%	6.9%	88.2%
23	Selects picture of rhyming word	1.1%	0.2%	11.8%	6.6%	32.0%	48.4%
24	Answers literal 'what' question by selecting picture – distracters are pictures from same conceptual category	1.2%	0.2%	2.9%	2.2%	16.3%	77.3%
25	Selects complex picture showing first or last event in story	1.5%	0.9%	12.3%	5.2%	26.6%	53.5%

Appendix G: Percentages of Each Score by Item

Grade 6 Reading (cont.)

Component #	Level C (n=576) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Reads 2-10 words	0.2%	0.0%	1.2%	13.0%	13.4%	72.2%
2	Describes 1 event from narrative text	0.3%	0.0%	2.4%	3.8%	9.4%	84.0%
*3	Reads 2-10 word sentence silently and supplies word missing in sentence using clue from picture	0.2%	0.0%	3.8%	12.0%	15.3%	68.8%
4	Defines the function of a word	1.0%	0.2%	1.2%	0.7%	3.8%	93.1%
5	Reads 2-10 words	0.2%	0.2%	2.3%	27.1%	24.3%	46.0%
6	Answers literal 'where' question	0.9%	0.0%	1.7%	1.9%	5.0%	90.5%
7	Answers literal 'who' question	1.0%	0.0%	3.8%	3.3%	3.3%	88.5%
8	Answers literal 'who' question	0.3%	0.0%	4.7%	3.0%	5.2%	86.8%
9	Selects 2-3 words by function in array of 5	0.2%	0.0%	4.7%	3.5%	18.2%	73.4%
10	Reads 2-10 words	0.3%	0.0%	1.0%	24.7%	18.8%	55.2%
11	Orders words representing main ideas from story	0.2%	0.0%	10.6%	12.3%	13.9%	63.0%
12	Reads 2-10 words	0.2%	1.0%	25.7%	23.6%	49.5%	100.0%
13	Answers literal 'what' question	0.5%	0.0%	7.3%	5.4%	17.4%	69.4%
14	Answers literal 'what' question	0.2%	0.2%	10.6%	10.4%	15.1%	63.5%
15	Demonstrates understanding of 2-10 word written command	0.2%	0.2%	3.1%	11.3%	12.3%	72.9%
16	Reads 2-10 words	0.2%	0.2%	1.4%	23.1%	21.0%	54.2%
17	Names 1 fact from expository text	0.5%	0.0%	2.3%	3.8%	5.0%	88.4%
18	Reads 2-10 words	0.5%	0.0%	0.9%	15.1%	12.0%	71.5%
19	Answers literal 'how' question	1.7%	0.2%	2.4%	3.0%	3.8%	88.9%
20	Answers literal 'when' question	1.7%	0.2%	2.4%	3.0%	3.8%	88.9%
21	Answers literal 'what' question	4.2%	0.7%	4.5%	4.0%	5.9%	80.6%

Appendix G: Percentages of Each Score by Item

Grade 7 Reading

Component #	Level A (n=516)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Scans materials	2.1%	6.2%	2.1%	1.4%	3.7%	84.5%
2	Matches identical pictures – distracters are pictures from different categories in appearance	1.4%	9.1%	16.3%	3.9%	16.1%	53.3%
3	Selects picture named – distracters are pictures from different categories in appearance	1.2%	9.3%	19.4%	3.1%	14.7%	52.3%
4	Identifies category of picture – distracters are pictures from different conceptual categories	6.6%	6.6%	17.2%	5.6%	20.5%	43.4%
5	Selects related pictures – distracters are pictures from different conceptual categories	9.9%	4.8%	17.6%	4.3%	15.1%	48.3%
6	Answers literal 'what' question by selecting picture – distracters are pictures from different conceptual categories	10.5%	3.3%	17.6%	4.3%	21.7%	42.6%
7	Selects similar pictures – distracters are pictures from different conceptual categories	10.9%	2.9%	19.8%	7.9%	23.1%	35.5%
8	Demonstrates function of item in picture – open-ended response	10.9%	6.4%	27.3%	6.2%	12.0%	37.2%
9	Answers literal 'who' question by selecting picture – distracters are pictures from different conceptual categories	10.7%	5.0%	16.1%	3.5%	15.3%	49.4%
10	Selects picture by function – distracters are pictures from different conceptual categories	10.9%	4.7%	15.1%	3.3%	13.8%	52.3%
11	Answers literal 'where' question by selecting picture – distracters are pictures from different conceptual categories	11.2%	3.5%	15.7%	4.3%	14.0%	51.2%
12	Selects picture named – distracters are pictures from different categories in appearance	11.2%	2.7%	12.6%	3.7%	12.6%	57.2%
13	Matches identical pictures – distracters are pictures from different categories in appearance	11.4%	4.5%	12.4%	4.7%	14.1%	52.9%
14	Selects related pictures – distracters are pictures from different conceptual categories	11.0%	3.1%	17.6%	5.2%	22.3%	40.7%
15	Selects similar pictures – distracters are pictures from different conceptual categories	11.4%	4.5%	19.4%	6.8%	20.7%	37.2%
16	Answers literal 'what' question by selecting picture – distracters are pictures from different conceptual categories	11.6%	4.5%	14.1%	4.3%	16.9%	48.6%
17	Answers literal 'who' question by selecting picture – distracters are pictures from different conceptual categories	11.6%	3.3%	16.9%	3.5%	17.2%	47.5%
18	Selects picture by function – distracters are pictures from different conceptual categories	12.2%	3.3%	16.9%	3.3%	10.9%	53.5%
19	Answers literal 'where' question by selecting picture – distracters are pictures from different conceptual categories	12.2%	3.7%	15.3%	4.3%	15.7%	48.8%
20	Selects picture named – distracters are pictures from different categories in appearance	12.8%	3.7%	14.3%	3.5%	10.1%	55.4%

Appendix G: Percentages of Each Score by Item

Grade 7 Reading (cont.)

Component #	Level B (n=677) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Selects word named in connected or disconnected array – all choices have same beginning letter	1.5%	0.0%	1.3%	2.8%	6.6%	87.7%
2	Selects complex picture by function	1.5%	0.0%	0.4%	1.2%	2.2%	94.7%
3	Names 2 details in a picture	1.6%	0.0%	5.3%	22.7%	17.7%	52.6%
*4	Selects picture showing 2 features named	1.6%	0.0%	4.4%	2.1%	14.0%	77.8%
5	Answers literal 'who' question – open-ended	5.3%	0.3%	6.9%	3.8%	13.1%	70.3%
6	Gives an example to complete a definition	1.6%	0.1%	6.2%	4.9%	6.9%	80.2%
7	Identifies category of word – distracters are complex pictures from different conceptual categories	1.6%	0.1%	1.0%	1.8%	5.5%	90.0%
8	Answers literal 'where' question – open-ended	3.2%	0.3%	4.7%	4.6%	9.6%	77.4%
9	Answers literal 'what' question – open-ended	2.5%	0.3%	10.0%	5.9%	12.9%	68.4%
10	Demonstrates understanding of 1 command presented as a complex picture	1.5%	0.3%	10.3%	16.1%	17.1%	54.7%
11	Answers literal 'when' question – open-ended	5.6%	0.1%	13.0%	5.0%	26.0%	50.1%
*12	Selects last word missing in sentence using clue from picture	1.6%	0.0%	1.6%	5.5%	11.7%	79.6%
13	Selects word named in connected or disconnected array – all choices have same beginning letter	2.5%	0.1%	1.0%	2.5%	4.7%	89.1%
14	Selects rhyming words	1.8%	0.0%	7.8%	5.0%	23.8%	61.6%
15	Selects picture to identify main event from narrative text	1.6%	0.0%	0.7%	17.3%	7.2%	73.1%
*16	Reads complex picture with 1 word	1.8%	0.0%	3.1%	4.3%	4.6%	86.3%
17	Selects word with same beginning sound as target picture named	1.6%	0.0%	6.2%	10.0%	23.6%	58.5%
18	Answers literal 'what' question – open-ended	2.7%	0.3%	6.2%	4.1%	11.1%	75.6%
19	Selects complex picture showing next event in story	1.6%	0.0%	5.5%	4.7%	20.1%	68.1%
20	Selects word named in connected or disconnected array – all choices have same beginning letter	1.8%	0.0%	2.5%	2.5%	11.8%	81.4%
21	Selects rhyming words	2.1%	0.0%	8.9%	5.8%	26.9%	56.4%
22	Answers literal 'when' question – open-ended	3.4%	0.4%	31.5%	9.3%	32.9%	22.5%
23	Answers literal 'where' question – open-ended	6.2%	0.6%	5.2%	2.8%	11.4%	73.9%

Appendix G: Percentages of Each Score by Item

Grade 7 Reading (cont.)

Component #	Level C (n=536)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Names item that can be used in place of another item	0.4%	0.0%	6.9%	4.9%	9.7%	78.2%
2	Reads 11-29 words	0.6%	0.0%	0.7%	16.0%	35.8%	46.8%
3	Orders three 1-5 word phrases representing main ideas from text	0.6%	0.0%	2.8%	4.9%	8.2%	83.6%
4	Reads 11-29 word passage silently and supplies missing word	0.9%	0.0%	12.7%	17.0%	9.1%	60.3%
5	Reads 11-29 words	0.7%	0.0%	1.1%	19.4%	42.0%	36.8%
6	Answers literal 'when' question	0.7%	0.0%	8.0%	5.6%	29.9%	55.4%
7	Answers literal 'where' question	1.7%	0.0%	4.7%	3.0%	8.0%	82.6%
8	Answers literal 'how' question	1.5%	0.0%	6.5%	6.0%	17.2%	68.8%
9	Answers literal 'why' question	1.7%	0.0%	2.1%	3.7%	5.2%	87.3%
10	Demonstrates understanding of 11-29 word written command	0.6%	0.2%	3.5%	10.4%	11.4%	73.7%
11	Reads 11-29 words	0.6%	0.0%	0.9%	21.8%	35.1%	41.6%
12	Answers inferential 'what' question	1.3%	0.7%	16.8%	20.0%	15.3%	45.9%
13	Answers inferential 'when' question	1.1%	0.2%	30.8%	19.8%	18.8%	29.3%
14	Reads 11-29 words	0.9%	0.0%	0.9%	13.6%	36.2%	48.1%
15	Describes 3 events from narrative text	1.1%	0.0%	1.1%	11.6%	16.2%	69.8%
16	Reads 11-29 words	0.6%	0.0%	0.7%	25.2%	32.1%	41.2%
17	Answers inferential 'where' question	1.3%	0.0%	6.9%	6.9%	16.2%	68.5%
18	Answers literal 'what' question	1.1%	0.0%	4.5%	4.1%	11.6%	78.5%
19	Reads 11-29 words	0.9%	0.2%	0.7%	17.9%	30.6%	49.6%
20	Names 3 facts from expository text	2.2%	0.0%	2.6%	19.6%	16.2%	59.3%

Appendix G: Percentages of Each Score by Item

Grade 8 Reading

Component #	Level A (n=535) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Scans materials	3.0%	4.5%	2.1%	1.3%	4.1%	85.0%
2	Matches identical pictures – distracters are pictures from different categories in appearance	1.5%	10.7%	12.5%	3.4%	14.6%	57.4%
3	Selects picture named – distracters are pictures from different categories in appearance	2.1%	8.6%	17.0%	4.3%	14.0%	54.0%
4	Identifies category of picture – distracters are pictures from different conceptual categories	3.7%	8.4%	16.6%	3.2%	20.6%	47.5%
5	Selects related pictures – distracters are pictures from different conceptual categories	6.2%	7.1%	18.5%	5.2%	11.6%	51.2%
6	Answers literal 'what' question by selecting picture – distracters are pictures from different conceptual categories	6.9%	6.5%	20.7%	3.7%	18.5%	43.6%
7	Selects similar pictures – distracters are pictures from different conceptual categories	7.5%	6.4%	20.9%	6.4%	23.7%	35.1%
8	Demonstrates function of item in picture – open-ended response	8.0%	8.8%	23.7%	7.5%	9.9%	42.1%
9	Answers literal 'who' question by selecting picture – distracters are pictures from different conceptual categories	9.0%	6.5%	14.8%	4.1%	14.8%	50.8%
10	Selects picture by function – distracters are pictures from different conceptual categories	9.2%	5.2%	15.1%	3.2%	14.2%	53.1%
11	Answers literal 'where' question by selecting picture – distracters are pictures from different conceptual categories	9.0%	5.0%	14.2%	4.3%	12.5%	55.0%
12	Selects picture named – distracters are pictures from different categories in appearance	9.0%	4.7%	13.1%	3.0%	12.7%	57.6%
13	Matches identical pictures – distracters are pictures from different categories in appearance	9.2%	5.6%	14.8%	4.5%	14.2%	51.6%
14	Selects related pictures – distracters are pictures from different conceptual categories	9.2%	5.0%	20.7%	4.5%	19.1%	41.5%
15	Selects similar pictures – distracters are pictures from different conceptual categories	9.3%	5.6%	22.2%	7.1%	18.7%	37.0%
16	Answers literal 'what' question by selecting picture – distracters are pictures from different conceptual categories	9.3%	6.0%	12.9%	4.9%	14.6%	52.3%
17	Answers literal 'who' question by selecting picture – distracters are pictures from different conceptual categories	9.2%	6.2%	16.3%	5.4%	13.8%	49.2%
18	Selects picture by function – distracters are pictures from different conceptual categories	9.2%	6.5%	13.5%	4.7%	12.7%	53.5%
19	Answers literal 'where' question by selecting picture – distracters are pictures from different conceptual categories	9.2%	6.2%	14.2%	3.9%	13.8%	52.7%

Appendix G: Percentages of Each Score by Item

Grade 8 Reading (cont.)

	Level A (n=535)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
20	Selects picture named – distracters are pictures from different categories in appearance	10.5%	5.8%	13.6%	3.0%	11.2%	55.5%

Appendix G: Percentages of Each Score by Item

Grade 8 Reading (cont.)

Component #	Level B (n=674) Description	Percentage at Each Score					
		0	1	2	3	4	5
1	Selects word named in connected or disconnected array – all choices have same beginning letter	0.7%	0.1%	1.9%	0.7%	7.7%	88.7%
2	Selects complex picture by function	0.9%	0.3%	0.6%	0.6%	2.8%	94.8%
3	Names 2 details in a picture	0.7%	0.6%	6.2%	23.3%	16.9%	52.2%
*4	Selects picture showing 2 features named	1.2%	0.0%	3.0%	1.5%	11.9%	82.5%
5	Answers literal 'who' question – open-ended	5.5%	0.0%	6.5%	4.9%	12.5%	70.3%
6	Gives an example to complete a definition	1.2%	0.0%	5.8%	3.7%	5.6%	83.7%
7	Identifies category of word – distracters are complex pictures from different conceptual categories	1.2%	0.0%	1.0%	0.9%	5.2%	91.7%
8	Answers literal 'where' question – open-ended	2.7%	0.0%	5.5%	4.3%	11.6%	76.0%
9	Answers literal 'what' question – open-ended	3.0%	0.0%	8.9%	5.2%	10.4%	72.6%
10	Demonstrates understanding of 1 command presented as a complex picture	1.0%	0.3%	9.3%	17.1%	22.3%	49.9%
11	Answers literal 'when' question – open-ended	3.7%	0.0%	11.1%	4.9%	24.9%	55.2%
*12	Selects last word missing in sentence using clue from picture	1.2%	0.0%	4.0%	3.9%	12.3%	78.6%
13	Selects word named in connected or disconnected array – all choices have same beginning letter	1.3%	0.0%	0.6%	0.6%	5.3%	92.0%
14	Selects rhyming words	1.3%	0.1%	7.3%	5.6%	21.7%	63.9%
15	Selects picture to identify main event from narrative text	1.6%	0.0%	2.5%	2.5%	7.4%	85.9%
*16	Reads complex picture with 1 word	1.3%	0.0%	3.9%	3.3%	6.4%	85.2%
17	Selects word with same beginning sound as target picture named	1.5%	0.0%	7.3%	11.3%	23.7%	56.2%
18	Answers literal 'what' question – open-ended	2.7%	0.0%	6.4%	3.7%	10.5%	76.7%
19	Selects complex picture showing next event in story	1.2%	0.0%	6.5%	3.7%	18.4%	70.2%
20	Selects word named in connected or disconnected array – all choices have same beginning letter	1.5%	0.0%	2.8%	2.1%	10.2%	83.4%
21	Selects rhyming words	1.9%	0.0%	7.1%	5.6%	25.4%	59.8%
22	Answers literal 'when' question – open-ended	3.1%	0.4%	27.9%	10.2%	30.9%	27.3%
23	Answers literal 'where' question – open-ended	5.9%	0.3%	6.4%	2.5%	11.7%	73.0%

Appendix G: Percentages of Each Score by Item

Grade 8 Reading (cont.)

Component #	Level C (n=493)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Names item that can be used in place of another item	1.2%	0.0%	4.3%	4.9%	9.7%	79.9%
2	Reads 11-29 words	1.4%	0.2%	1.2%	14.2%	32.0%	50.9%
3	Orders three 1-5 word phrases representing main ideas from text	1.4%	0.0%	2.4%	3.0%	6.1%	87.0%
4	Reads 11-29 word passage silently and supplies missing word	1.4%	0.0%	10.1%	13.6%	9.1%	65.5%
5	Reads 11-29 words	1.6%	0.0%	0.4%	17.0%	39.6%	41.4%
6	Answers literal 'when' question	2.6%	0.0%	6.1%	5.1%	27.8%	58.4%
7	Answers literal 'where' question	1.8%	0.0%	4.9%	2.2%	7.1%	84.0%
8	Answers literal 'how' question	2.6%	0.2%	7.5%	5.7%	15.4%	68.6%
9	Answers literal 'why' question	3.4%	0.0%	1.6%	1.4%	4.9%	88.6%
10	Demonstrates understanding of 11-29 word written command	1.4%	0.0%	1.4%	7.1%	9.7%	80.1%
11	Reads 11-29 words	1.6%	0.0%	0.6%	17.2%	38.7%	41.8%
12	Answers inferential 'what' question	1.6%	0.2%	14.0%	18.1%	18.1%	48.1%
13	Answers inferential 'when' question	1.8%	0.2%	27.0%	17.8%	20.1%	33.1%
14	Reads 11-29 words	2.0%	0.0%	0.8%	10.1%	31.8%	54.8%
15	Describes 3 events from narrative text	2.0%	0.2%	0.8%	6.1%	15.6%	74.8%
16	Reads 11-29 words	2.0%	0.0%	0.4%	21.1%	34.9%	41.2%
17	Answers inferential 'where' question	2.0%	0.0%	12.4%	9.3%	19.7%	56.4%
18	Answers literal 'what' question	2.2%	0.0%	4.7%	3.9%	13.8%	75.3%
19	Reads 11-29 words	2.2%	0.2%	0.4%	11.0%	33.7%	52.3%
20	Names 3 facts from expository text	3.0%	0.4%	3.0%	14.0%	15.4%	63.9%

Appendix G: Percentages of Each Score by Item

Grade 11 Reading

Component #	Level A (n=474)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Scans materials	4.0%	4.4%	1.1%	2.3%	4.6%	83.5%
2	Matches identical pictures – distracters are pictures from same category in appearance	3.4%	7.8%	16.0%	4.6%	17.9%	50.2%
3	Selects picture named – distracters are pictures from same category in appearance	3.6%	8.2%	13.9%	4.4%	9.1%	60.8%
4	Identifies category of picture – distracters are pictures from same and different conceptual categories	7.8%	6.1%	23.2%	4.6%	17.7%	40.5%
5	Selects related pictures – distracters are pictures from same and different conceptual categories	10.1%	4.9%	17.3%	6.5%	19.2%	42.0%
6	Answers literal 'what' question by selecting picture – distracters are pictures from same conceptual category	11.8%	4.4%	12.0%	5.5%	12.9%	53.4%
7	Selects similar pictures – distracters are pictures from same and different conceptual categories	13.5%	3.8%	18.4%	6.3%	17.5%	40.5%
8	Demonstrates function of item in picture using a picture – open-ended response	13.1%	5.1%	21.9%	3.6%	15.4%	40.9%
9	Answers literal 'who' question by selecting picture – distracters are pictures from same conceptual category	13.5%	3.6%	15.6%	3.8%	14.8%	48.7%
10	Selects picture by function – distracters are pictures from same conceptual category	13.7%	4.4%	14.1%	4.4%	17.7%	45.6%
11	Answers literal 'where' question by selecting picture – distracters are pictures from same conceptual category	14.1%	4.4%	15.2%	5.5%	16.2%	44.5%
12	Selects picture named – distracters are pictures from same category in appearance	14.6%	2.5%	13.5%	5.3%	13.7%	50.4%
13	Matches identical icons – distracters are pictures	14.3%	3.0%	14.1%	5.1%	14.6%	48.9%
14	Selects related pictures – distracters are pictures from same and different conceptual categories	14.6%	4.9%	17.9%	6.8%	19.4%	36.5%
15	Matches identical complex pictures – distracters are pictures from different categories in appearance	13.9%	4.0%	11.4%	4.9%	15.0%	50.8%
16	Answers literal 'what' question by selecting picture – distracters are pictures from same conceptual category	14.1%	4.2%	18.4%	5.1%	19.2%	39.0%
17	Identifies category of picture – distracters are pictures from same and different conceptual categories	14.3%	3.6%	17.1%	4.0%	11.8%	49.2%
18	Answers literal 'who' question by selecting picture – distracters are pictures from same conceptual category	14.1%	3.8%	15.2%	4.2%	18.8%	43.9%

Appendix G: Percentages of Each Score by Item

Grade 11 Reading (cont.)

	Level A (n=474)	Percentage at Each Score					
Component #	Description	0	1	2	3	4	5
19	Selects picture by function – distracters are pictures from same conceptual category	15.2%	4.4%	16.2%	3.2%	11.6%	49.4%
20	Answers literal 'where' question by selecting picture – distracters are pictures from same conceptual category	15.2%	4.0%	14.8%	2.5%	12.4%	51.1%

Appendix G: Percentages of Each Score by Item

Grade 11 Reading (cont.)

Component #	Level B (n=584)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Selects word named in connected or disconnected array – all choices have same beginning and ending letters	4.1%	0.0%	3.3%	2.7%	6.5%	83.4%
2	Selects word by function	4.1%	0.0%	3.3%	3.3%	11.8%	77.6%
3	Reads 1 word in isolation – common sight words	5.3%	0.3%	4.6%	4.3%	2.7%	82.7%
*4	Selects picture showing 3 features named	4.3%	0.0%	3.3%	2.6%	7.5%	82.4%
5	Answers literal 'who' question – open-ended	8.7%	0.0%	26.0%	7.5%	30.1%	27.6%
6	Selects picture representing 1 word read silently from array of 4 pictures	5.0%	0.0%	2.1%	2.2%	9.1%	81.7%
7	Identifies category of a word – distracters are words from same conceptual category	4.1%	0.0%	4.3%	6.2%	17.8%	67.6%
8	Answers literal 'where' question – open-ended	5.0%	0.0%	13.4%	3.9%	15.8%	62.0%
9	Answers literal 'what' question – open-ended	7.0%	0.0%	8.6%	2.9%	10.3%	71.2%
10	Demonstrates understanding of 1-word written command	4.8%	0.2%	3.9%	7.5%	15.6%	67.9%
11	Answers literal 'when' question – open-ended	7.5%	0.0%	11.5%	6.2%	16.6%	58.2%
*12	Supplies last word missing in sentence using clue from picture	4.6%	0.0%	2.1%	2.9%	6.7%	83.7%
13	Answers literal 'why' question – open-ended	7.0%	0.2%	15.1%	5.0%	11.3%	61.5%
14	Reads 1 word in context – 3-4 letters in length and regularly decodable	4.8%	0.0%	4.1%	3.8%	2.7%	84.6%
15	Selects word named in connected or disconnected array – all choices have same beginning and ending letters	4.8%	0.2%	5.3%	3.3%	9.8%	76.7%
*16	Orders 3 pictures based on text	4.6%	0.5%	16.1%	18.0%	15.4%	45.4%
17	Selects word by function	5.5%	0.2%	1.0%	2.6%	4.5%	86.3%
18	Selects picture representing 1 word read silently from array of 4 pictures	5.0%	0.0%	2.7%	3.8%	6.0%	82.5%
19	Reads 1 word in isolation – common sight words	5.5%	0.2%	12.2%	7.5%	3.9%	70.7%
20	Answers literal 'what' question – open-ended	6.7%	0.0%	18.8%	14.4%	19.5%	40.6%
21	Selects picture to identify main event from narrative text	5.0%	0.0%	3.9%	4.1%	7.5%	79.5%
22	Answers literal 'when' question – open-ended	7.2%	0.2%	17.3%	8.2%	16.6%	50.5%
23	Reads 1 word in context – 3-4 letters in length and regularly decodable	5.8%	0.5%	19.9%	8.9%	6.7%	58.2%

Appendix G: Percentages of Each Score by Item

Grade 11 Reading (cont.)

Component #	Level C (n=489)	Percentage at Each Score					
	Description	0	1	2	3	4	5
1	Identifies synonym for word read silently	3.3%	0.2%	8.2%	6.7%	11.7%	69.9%
2	Reads 30-50 word passage silently and supplies missing word	3.1%	0.0%	22.9%	10.2%	13.1%	50.7%
3	Reads 30-50 words	3.5%	0.0%	2.0%	8.6%	35.0%	50.9%
4	Answers literal 'how' question	4.1%	0.0%	7.2%	3.9%	16.4%	68.5%
5	Answers literal 'why' question	3.5%	0.0%	4.1%	1.4%	8.4%	82.6%
6	Answers inferential 'what' question	3.7%	0.0%	16.6%	8.6%	16.8%	54.4%
7	Answers inferential 'why' question	4.5%	0.0%	17.0%	9.4%	17.4%	51.7%
8	Demonstrates understanding of 30-50 word 2-step written command	3.3%	0.4%	4.1%	9.4%	8.6%	74.2%
9	Reads 30-50 words	3.3%	0.2%	1.6%	15.1%	43.1%	36.6%
10	Names 4 facts from expository text	3.5%	0.0%	3.7%	8.0%	26.2%	58.7%
11	Reads 30-50 words	3.7%	0.4%	1.2%	7.2%	44.8%	42.7%
12	Answers inferential 'where' question	4.3%	0.0%	13.1%	9.0%	18.6%	55.0%
13	Answers literal 'when' question after hearing 3 sentences	3.7%	0.0%	4.7%	2.5%	7.2%	82.0%
14	Answers inferential 'what' question	3.5%	0.0%	4.7%	4.5%	7.6%	79.7%
15	Reads 30-50 words	3.5%	0.0%	1.2%	9.4%	46.4%	39.5%
16	Answers inferential 'when' question	4.1%	0.0%	5.1%	2.5%	7.0%	81.4%
17	Answers inferential 'who' question	3.9%	0.0%	8.2%	2.2%	12.9%	72.8%
18	Answers inferential 'how' question	4.3%	0.0%	9.2%	6.5%	17.6%	62.4%
19	Reads 30-50 words	3.3%	0.0%	1.2%	5.9%	37.4%	52.1%
20	Orders four 6-10 word combinations representing main ideas from text	3.3%	0.2%	21.1%	18.0%	14.3%	43.1%