

Pre-Formatted Reports: Benchmark Test Item Analysis - New Format

Data Selections

Institution(s): Elementary School,All Schools
Benchmark Administration: 03/24/15, 2014-2015 BA2 Kindergarten Math
Trend Profile: 2014-2015
Subject: Mathematics
Test Focus: All Test Focuses
Test Level: KG
Test Category: District Benchmark
Grade: KG
Enrollment: Current

Number of questions: 21
 Number of test-taking students: 1348

Student Responses

| Question - Type | Correct | | Incorrect | Most Common Mistake | | Point Value | Points Achieved / Possible | P-Value/Item Mean | Discrimination |
|----------------------|---------|-------|------------|---------------------|-------|-------------|----------------------------|-------------------|----------------|
| | Rate | Value | Total Rate | Rate | Value | | | | |
| 1 - Multiple Choice | 74% | C | 26% | 16% | A | 1 | 997 / 1348 | 0.77 | 0.66 |
| 2 - Multiple Choice | 90% | C | 10% | 6% | A | 1 | 1209 / 1348 | 0.92 | 0.64 |
| 3 - Multiple Choice | 78% | C | 22% | 14% | B | 1 | 1049 / 1348 | 0.82 | 0.63 |
| 4 - Multiple Choice | 67% | C | 33% | 23% | B | 1 | 900 / 1348 | 0.69 | 0.61 |
| 5 - Multiple Choice | 87% | C | 13% | 9% | B | 1 | 1176 / 1348 | 0.88 | 0.62 |
| 6 - Multiple Choice | 83% | C | 17% | 13% | B | 1 | 1120 / 1348 | 0.84 | 0.62 |
| 7 - Multiple Choice | 90% | C | 10% | 6% | A | 1 | 1215 / 1348 | 0.91 | 0.65 |
| 8 - Multiple Choice | 72% | C | 28% | 26% | B | 1 | 974 / 1348 | 0.79 | 0.59 |
| 9 - Multiple Choice | 70% | C | 30% | 15% | A | 1 | 946 / 1348 | 0.79 | 0.57 |
| 10 - Multiple Choice | 73% | C | 27% | 17% | B | 1 | 989 / 1348 | 0.76 | 0.52 |
| 11 - Multiple Choice | 70% | C | 30% | 16% | B | 1 | 950 / 1348 | 0.73 | 0.62 |
| 12 - Multiple Choice | 63% | C | 37% | 25% | A | 1 | 852 / 1348 | 0.70 | 0.51 |
| 13 - Multiple Choice | 77% | C | 23% | 15% | B | 1 | 1044 / 1348 | 0.77 | 0.49 |
| 14 - Multiple Choice | 74% | C | 26% | 16% | B | 1 | 999 / 1348 | 0.76 | 0.54 |
| 15 - Multiple Choice | 84% | C | 16% | 10% | B | 1 | 1130 / 1348 | 0.86 | 0.53 |
| 16 - Multiple Choice | 86% | C | 14% | 11% | B | 1 | 1155 / 1348 | 0.87 | 0.53 |

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|----------------------|------------|---|------------|-----|---|---|--------------------|------|------|
| 17 - Multiple Choice | 69% | C | 31% | 26% | B | 1 | 928 / 1348 | 0.72 | 0.53 |
| 18 - Multiple Choice | 91% | C | 9% | 6% | B | 1 | 1220 / 1348 | 0.91 | 0.46 |
| 19 - Multiple Choice | 62% | C | 38% | 20% | B | 1 | 835 / 1348 | 0.62 | 0.52 |
| 20 - Multiple Choice | 80% | C | 20% | 16% | B | 1 | 1085 / 1348 | 0.81 | 0.59 |
| 21 - Multiple Choice | 86% | C | 14% | 8% | A | 1 | 1157 / 1348 | 0.91 | 0.38 |
| Summary | 77% | | 23% | | | | 1044 / 1348 | | |

P-value represents an item's difficulty as evaluated by dividing the total number of correct responses by the total number of students tested. P-value is calculated for true/false, multiple choice, gridded or hot spot-single response items.

Item Mean is the average score for student responses to an open response question or to a multi-part question. Item Mean is calculated for inline response, matching or hot spot-multiple selections items.

Discrimination or Item Total Score Correlation is the correlation between the question score and the overall test score and indicates the extent to which success on an item corresponds to success on the test.

Standards Alignment to Common Core State Standards

| Question | ID | Standard Description |
|-----------------------------|------------------------------------|--|
| 1 - Multiple Choice | CCSS.Math.Content.K.CC.A.1 | Count to 100 by ones and by tens. |
| 2 - Multiple Choice | CCSS.Math.Content.K.CC.A.1 | Count to 100 by ones and by tens. |
| 3 - Multiple Choice | CCSS.Math.Content.K.CC.A.2 | Count forward beginning from a given number within the known sequence (instead of having to begin at 1). |
| 4 - Multiple Choice | CCSS.Math.Content.K.CC.A.3 | Write numbers from 0 to 20. Represent a number of objects with a written numeral 0-20 (with 0 representing a count of no objects). |
| 5 - Multiple Choice | CCSS.Math.Content.K.CC.A.3 | Write numbers from 0 to 20. Represent a number of objects with a written numeral 0-20 (with 0 representing a count of no objects). |
| 6 - Multiple Choice | CCSS.Math.Content.K.CC.A.3 | Write numbers from 0 to 20. Represent a number of objects with a written numeral 0-20 (with 0 representing a count of no objects). |
| 7 - Multiple Choice | CCSS.Math.Content.K.CC.B.4 | Understand the relationship between numbers and quantities; connect counting to cardinality. |
| 8 - Multiple Choice | CCSS.Math.Content.K.CC.C.6 | Identify whether the number of objects in one group is greater than, less than, or equal to the number of objects in another group, e.g., by using matching and counting strategies. Include groups with up to ten objects. |
| 9 - Multiple Choice | CCSS.Math.Content.K.OA.A.1 | Represent addition and subtraction with objects, fingers, mental images, drawings, sounds (e.g., claps), acting out situations, verbal explanations, expressions, or equations. Drawings need not show details, but should show the mathematics in the problem. (This applies wherever drawings are mentioned in the Standards.) |
| 10 - Multiple Choice | CCSS.Math.Content.K.OA.A.3 | Decompose numbers less than or equal to 10 into pairs in more than one way, e.g., by using objects or drawings, and record each decomposition by a drawing or equation (e.g., $5 = 2 + 3$ and $5 = 4 + 1$). |
| 11 - Multiple Choice | CCSS.Math.Content.K.OA.A.4 | For any number from 1 to 9, find the number that makes 10 when added to the given number, e.g., by using objects or drawings, and record the answer with a drawing or equation. |
| 12 - Multiple Choice | CCSS.Math.Content.K.NBT.A.1 | Compose and decompose numbers from 11 to 19 into ten ones and some further ones, e.g., by using objects or drawings, and record each composition or decomposition by a drawing or equation (e.g., $18 = 10 + 8$); understand that these numbers are composed of ten ones and one, |

two, three, four, five, six, seven, eight, or nine ones.

13 - Multiple Choice CCSS.Math.Content.K.MD.A.1 Describe measurable attributes of objects, such as length or weight. Describe several measurable attributes of a single object.

14 - Multiple Choice CCSS.Math.Content.K.MD.A.2 Directly compare two objects with a measurable attribute in common, to see which object has "more of"/"less of" the attribute, and describe the difference. For example, directly compare the heights of two children and describe one child as taller/shorter.

15 - Multiple Choice CCSS.Math.Content.K.MD.B.3 Classify objects into given categories; count the numbers of objects in each category and sort the categories by count. Limit category counts to be less than or equal to 10.

16 - Multiple Choice CCSS.Math.Content.K.G.A.1 Describe objects in the environment using names of shapes, and describe the relative positions of these objects using terms such as above, below, beside, in front of, behind, and next to.

17 - Multiple Choice CCSS.Math.Content.K.G.A.2 Correctly name shapes regardless of their orientations or overall size.

18 - Multiple Choice CCSS.Math.Content.K.G.A.3 Identify shapes as two-dimensional (lying in a plane, "flat") or three-dimensional ("solid").

19 - Multiple Choice CCSS.Math.Content.K.G.B.4 Analyze and compare two- and three-dimensional shapes, in different sizes and orientations, using informal language to describe their similarities, differences, parts (e.g., number of sides and vertices/"corners") and other attributes (e.g., having sides of equal length).

20 - Multiple Choice CCSS.Math.Content.K.G.B.5 Model shapes in the world by building shapes from components (e.g., sticks and clay balls) and drawing shapes.

21 - Multiple Choice CCSS.Math.Content.K.G.B.6 Compose simple shapes to form larger shapes. For example, "Can you join these two triangles with full sides touching to make a rectangle?"
