# Idaho Alternate Assessment Math Blueprint



Grade 6

#### **IDAA MATH ITEM DISTRIBUTION ACROSS STRANDS: 40 ITEMS**

Strand	Minimum Items	Maximum Items	% of Items Per Strand
Data Analysis, Probability, & Statistics	8	10	20-25%
Geometry	4	6	10-15%
Measurement	6	8	15-20%
Number and Operations	10	12	25-30%
Patterns, Relations, & Functions	7	9	18-23%
Symbolic Expression	2	4	5-10%

# DATA ANALYSIS, PROBABILITY, & STATISTICS ITEMS ACROSS STANDARDS: 8 TO 10 ITEMS

Data Analysis, Probability, and Statistics	Minimum Items	Maximum Items
6.DPS.1a2: Identify statistical questions and make a plan for data collection	0	2
6.DPS.1c2: Collect and graph data: bar graph, line plots, dot plots, histograms	0	2
6.DPS.1d2: Solve for mean of a given data set	0	1
6.DPS.1d3: Select statement that matches mean, mode, and spread of data for 1 measure of central tendency for a given data set	0	1
6.DPS.1d4: Find the range of a given data set	0	1
6.DPS.1d5: Explain or identify what the mean represents in a set of data	0	1
6.DPS.1d6: Explain or identify what the mode represents in a set of data	0	1
6.DPS.1d7: Explain or identify what the median represents in a set of data	0	1
6.DPS.1e2: Use measures of central tendency to interpret data including overall patterns in the data	0	2

#### **GEOMETRY ITEMS ACROSS STANDARDS: 4 TO 6 ITEMS**

Geometry	Minimum Items	Maximum Items
6.GM.1c4: Locate points on a graph	0	1
6.GM.1c5: Use order pairs to graph given points	0	1
6.GM.1c6: Find coordinate values of points in the context of a situation	0	1
6.GM.1c7: Use coordinate points to draw polygons	0	1
6.GM.1c8: Use coordinate points to find the side lengths of polygons that are horizontal or vertical	0	1
6.GM.1d1: Find area of quadrilaterals	0	1
6.GM.1d2: Find area of triangles	0	1

#### **MEASUREMENT ACROSS STANDARDS: 6 TO 8 ITEMS**

Measurement	Minimum Items	Maximum Items
6.ME.1a2: Identify the appropriate formula to use when measuring for different purposes in a real-life context	0	2
6.ME.1b4: Complete a conversion table for length, mass, time, volume	0	1
6.ME.1b5: Analyze table to answer questions	0	1
6.ME.1c1: Find the area of a 2-dimensional figure and the volume of a 3-dimensional figure	0	2
6.ME.2a2: Solve one step real world measurement problems involving unit rates with ratios of whole numbers when given the unit rate	0	1
6.ME.2a3: Apply the formula to find the area of triangles	0	1
6.ME.2b3: Decompose complex shapes (polygon, trapezoid, pentagon) into simple shapes (rectangles, squares, triangles) to measure area	0	1
6.ME.2b4: Decompose complex 3-D shapes into simple 3-D shapes to measure volume	0	1

## **NUMBER AND OPERATIONS ACROSS STANDARDS: 10 TO 12 ITEMS**

Number and Operations	Minimum Items	Maximum Items
6.NO.1d1: Identify numbers as positive or negative	0	1
6.NO.1d2: Locate positive and negative numbers on a number line	0	1
6.NO.1d3: Plot positive and negative numbers on a number line	0	1
6.NO.1d4: Select the appropriate meaning of a negative number in a real-world situation	0	1
6.NO.1d5: Find given points between -10 and 10 on both axis of a coordinate plane	0	1
6.NO.1d6: Label points between -10 and 10 on both axis of a coordinate plane	0	1
6.NO.1e1: Determine the meaning of absolute value	0	1
6.NO.1f1: Find a percent of a quantity as rate per 100	0	2
6.NO.1f2: Write or select a ratio to match a given statement and representation	0	1
6.NO.1f3: Select or make a statement to interpret a given ratio	0	1
6.NO.1f4: Find a missing value for a given ratio	0	1
6.NO.1f5: Solve unit rate problems involving unit pricing	0	1
6.NO.1i1: Identify what an exponent represents	0	1
6.NO.1i2: Solve numerical expressions involving whole number exponents	0	1
6.NO.2a6: Solve problems or word problems using up to three-digit numbers and any of the four operations	0	1
6.NO.2c3: Solve one step, addition, subtraction, multiplication, or division problems with fractions or decimals	0	1
6.NO.2c4: Solve word problems involving the addition, subtraction, multiplication or division of fractions	0	1
6.NO.2c5: Divide multi-digit whole numbers	0	1
6.NO.2e1: Determine the difference between two integers using a number line	0	1

Number and Operations	Minimum Items	Maximum Items
6.NO.2e2: Compare two numbers on a number line	0	1

# PATTERNS, RELATIONS, AND FUNCTIONS ACROSS STANDARDS: 7 TO 9 ITEMS

Patterns, Relations, and Functions	Minimum Items	Maximum Items
6.PRF.1a2: Determine whether or not the quotient will increase or decrease based on the divisor	0	2
6.PRF.1c1: Describe the ratio relationship between two quantities for a given situation	0	1
6.PRF.1c2: Represent proportional relationships on a line graph	0	1
6.PRF.1d1: Solve real world single step linear equations	0	2
6.PRF.2a2: Use variables to represent numbers and write expressions when solving real-world problems	0	1
6.PRF.2a3: Use variables to represent two quantities in a real-world problem that change in relationship to one another	0	1
6.PRF.2a4: Analyze the relationship between the dependent and independent variables using graphs and tables, and relate these to the equation	0	1
6.PRF.2b3: Complete a statement that describes the ratio relationship between two quantities	0	1
6.PRF.2b4: Determine the unit rate in a variety of contextual situations	0	1
6.PRF.2b5: Use ratios and reasoning to solve real-world mathematical problems (e.g., by reasoning about tables of equivalent ratios, tape diagrams, double number line diagrams, or equations)	0	1

## **SYMBOLIC EXPRESSION ACROSS STANDARDS: 2 TO 4 ITEMS**

Symbolic Expression	Minimum Items	Maximum Items
6.SE.1a2: Given a real-world problem, write an expression using 1 set of parentheses	0	1
6.SE.1a4: Given a real-world problem, write an inequality	0	1
6.SE.1b1: Evaluate whether or not both sides of an equation are equal	0	1
6.SE.1b2: Use properties to produce equivalent expressions	0	1