Answer Key

HSA Item Number	Answer	Indicators Assessed
1	C	**1.1.1** The student will recognize, describe, and/or extend patterns and functional relationships that are expressed numerically, algebraically, and/or geometrically.
2	F	**1.1.3** The student will apply addition, subtraction, multiplication, and/or division of algebraic expressions to mathematical and real-world problems.
3	A	**1.1.2** The student will represent patterns and/or functional relationships in a table, as a graph, and/or by mathematical expression.
4	H	**1.1.4** The student will describe the graph of a non-linear function and discuss its appearance in terms of the basic concepts of maxima and minima, zeros (roots), rate of change, domain and range, and continuity.
5	D	**1.2.5** The student will apply formulas and/or use matrices (arrays of numbers) to solve real-world problems.
6	BCR	**3.1.2** The student will use the measures of central tendency and/or variability to make informed conclusions.
7	B	**1.2.3** The student will solve and describe using numbers, symbols, and/or graphs if and where two straight lines intersect.
8	F	**1.2.2** The student will solve linear inequalities and describe the solutions using numbers, symbols, and/or graphs.
9	C	**1.1.1** The student will recognize, describe, and/or extend patterns and functional relationships that are expressed numerically, algebraically, and/or geometrically.
10	H	**1.1.4** The student will describe the graph of a non-linear function and discuss its appearance in terms of the basic concepts of maxima and minima, zeros (roots), rate of change, domain and range, and continuity.
11	D	**3.2.1** The student will make informed decisions and predictions based upon the results of simulations and data from research.
12	ECR	**1.1.1** The student will recognize, describe, and/or extend patterns and functional relationships that are expressed numerically, algebraically, and/or geometrically. **1.1.2** The student will represent patterns and/or functional relationships in a table, as a graph, and/or by mathematical expression. **3.1.3** The student will calculate theoretical probability or use

13	.37 .375 .38 .4	simulations or statistical inference from data to estimate the probability of an event.
14	14	**1.2.1** The student will determine the equation for a line, solve linear equations, and/or describe the solutions using numbers, symbols, and/or graphs.
15	Range 0.6 to 0.6143	**3.1.3** The student will calculate theoretical probability or use simulations or statistical inference from data to estimate the probability of an event.
16	BCR	**3.2.2** The student will interpret data and/or make predictions by finding and using a line of best fit and by using a given curve of best fit.
17	C	**3.2.3** The student will communicate the use and misuse of statistics.
18	G	**1.1.2** The student will represent patterns and/or functional relationships in a table, as a graph, and/or by mathematical expression.
19	C	**1.2.4** The student will describe how the graphical model of a non-linear function represents a given problem and will estimate the solution.
20	J	**3.1.3** The student will calculate theoretical probability or use simulations or statistical inference from data to estimate the probability of an event.
21	ECR	**1.2.1** The student will determine the equation for a line, solve linear equations, and/or describe the solutions using numbers, symbols, and/or graphs. **1.2.2** The student will solve linear inequalities and describe the solutions using numbers, symbols, and/or graphs.
22	J	**1.2.4** The student will describe how the graphical model of a non-linear function represents a given problem and will estimate the solution.
23	B	**1.2.1** The student will determine the equation for a line, solve linear equations, and/or describe the solutions using numbers, symbols, and/or graphs.
24	F	**1.1.3** The student will apply addition, subtraction, multiplication, and/or division of algebraic expressions to mathematical and real-world problems.
25	D	**1.2.3** The student will solve and describe using numbers, symbols, and/or graphs if and where two straight lines intersect.
26	J	**1.2.2** The student will solve linear inequalities and describe the solutions using numbers, symbols, and/or graphs.
27	A	**3.1.1** The student will design and/or conduct an investigation that uses statistical methods to analyze data and communicate results.
28	H	**1.2.5** The student will apply formulas and/or use matrices (arrays of numbers) to solve real-world problems.

29	A	**3.2.2** The student will interpret data and/or make predictions by finding and using a line of best fit and by using a given curve of best fit.
30	ECR	**3.2.1** The student will make informed decisions and predictions based upon the results of simulations and data from research. **3.2.3** The student will communicate the use and misuse of statistics.
31	C	**3.1.2** The student will use the measures of central tendency and/or variability to make informed conclusions.
32	J	**3.2.1** The student will make informed decisions and predictions based upon the results of simulations and data from research.
33	B	**1.2.1** The student will determine the equation for a line, solve linear equations, and/or describe the solutions using numbers, symbols, and/or graphs.
34	F	**3.1.2** The student will use the measures of central tendency and/or variability to make informed conclusions.
35	BCR	**3.1.1** The student will design and/or conduct an investigation that uses statistical methods to analyze data and communicate results.
36	840	**1.2.5** The student will apply formulas and/or use matrices (arrays of numbers) to solve real-world problems.
37	2.5	**1.2.3** The student will solve and describe using numbers, symbols, and/or graphs if and where two straight lines intersect.
38	15.25	**1.1.1** The student will recognize, describe, and/or extend patterns and functional relationships that are expressed numerically, algebraically, and/or geometrically.

Student responses to Constructed Response items can be found in the scoring section of the mdk12.org site.

How do we test what students have learned in grades 3-12? Other assessments