Chapter 9 Grade 6 – Mathematics District Benchmark - Standards Referenced Scoring Tool

- Standards Key: 4. I exceed all skills within the standard by demonstrating more complex understanding 3. I demonstrate all skills within the standard 2. I demonstrate some skills within the standard

 - 1. With help, I can demonstrate some skills within the standard
 - 0. Even with help, I cannot demonstrate skills within the standard
 - No Score Not assessed or not yet taught

| Standard | Question Number | Score | Overall (Standard) Score |
|---|--------------------|-------|--------------------------------|
| 6.NS.5 Understand that positive & negative #s have opposite values Understand that positive and negative numbers describe quantities having opposite directions or values (e.g., temperature above/below zero, elevation above/below sea level, credits/debits, positive/negative electric charge); use positive and negative numbers to represent quantities in real-world contexts, explain the meaning of 0 in each situation. | 1 | | |
| 6.NS.6 Understand a rational number as a point on the number line | 2 | | |
| Understand a rational number as a point on the number line. Extend number line | 3a | | |
| diagrams and coordinate axes familiar from previous grades to represent points on | 3b | | |
| the line and in the plane with negative number coordinates; | 3c | | |
| a. Recognize opposite signs of numbers as indicating locations on opposite sides of 0 on the number line; Recognize that the opposite of the opposite of a number is the number itself [e.g., $-(-3) = 3$] and that 0 is its own opposite; b. Understand signs of numbers in ordered pairs as indicating locations in quadrants of the coordinate plane; recognize that when two ordered pairs differ only by signs, the locations of the points are related by reflections across one or both axes; c. Find and position integers and other rational numbers on a horizontal or vertical number line diagram; find and position pairs of integers and other rational numbers on a coordinate plane. | | | |
| 6.NS.7 Understand ordering & the absolute value of rational numbers | 4 | | |
| Understand ordering and absolute value of rational numbers; a. Interpret | 5 | | |
| statements of inequality as statements about the relative position of two numbers | 6 | | - |
| on a number line diagram. For example, interpret $-3 > -7$ as a statement that -3 is located to the right of -7 on a number line oriented from left to right; b. Write, interpret, and explain statements of order for rational numbers in real-world contexts; For example, write $-3 \text{ oC} > -7 \text{ oC}$ to express the fact that -3 oC is warmer than -7 oC ; c. Understand the absolute value of a rational number as its distance from 0 on the number line; interpret absolute value as magnitude for a positive or negative quantity in a real-world situation. For example, for an account balance of $-$ 30 dollars, write $ -30 = 30$ to describe the size of the debt in dollars; d. Distinguish comparisons of absolute value from statements about order. For example, recognize that an account balance less than -30 dollars represents a debt greater than 30 dollars; | 7. | | |
| 6.NS.8 Solve real-world & mathematical problems by graphing points | 7a | | |
| Solve real-world and mathematical problems by graphing points in all four quadrants of the coordinate plane. Include use of coordinates and absolute value to | | | |
| find distances between points with the same first coordinate or the same second coordinate. | 7b | | |
| 6.G.3 Draw polygons in the coordinate plane given coordinates for the vertices | 8 | | |
| Draw polygons in the coordinate plane given coordinates for the vertices; determine the length of a side joining the coordinates of vertices with the same first or the same second coordinate. Apply these techniques in the context of solving real-world and mathematical problems. | | | |

TRADITIONAL GRADING:

For traditional grading, each answer is worth 1 point. A question may have multiple parts thus, may be worth more than 1 point. Please read answer key for descriptions of how partial credit can be earned. Chapter 7 total points = **15**