

NAME: _____

1. Give the coordinates of two points that could be on a line with slope of -2 .
2. Does the line passing through $(5, 6)$ and $(-3, 8)$ have a slope of $\frac{-3-5}{8-6}$? Explain.
3. Is the statement “A line with slope of -1 passes through the origin” true or false? Explain.
4. Find the slope of each line containing the origin and $\left(5, \frac{1}{n}\right)$ for $n = 1, 2, 3, \dots, 10$. Graph your results in terms of ordered pairs (n, slope) . Will the line ever be horizontal?

[1] Answers may vary. Sample: (3, 7) and (2, 9)

No, the slope is the vertical change over the horizontal change and this ratio shows the horizontal change
[2] over the vertical change.

[3] False; for example, a line with slope -1 that passes through (0, 1) does not pass through the origin.

[4] No, the line will approach horizontal but will never have zero slope.