Lesson 11.5 Practice: Slope-Intercept Form and Direct Variation

School Launch · Pre-Algebra · Unit 11: The Coordinate Plane and Graphing · Worksheet A

No calculator

Name _____ Date _____ Score _____ / 10

Show your work under each problem, one step per line, and check your answer. Word problems: name the unknown, write the equation, solve, and answer in a sentence with units.

1. Write the equation of the line with slope -6 and y-intercept -5. Then find y when $x = 3$. EASY

2. y varies directly with x, and $y = 24$ when $x = 4$. Find the constant of variation k and write the equation. EASY

3. Write the equation of the line with slope 3 and y-intercept -7. Then find y when $x = 3$. EASY

4. The cost of fabric varies directly with its length. Isaac paid \$20 for 8 yards. How much would 9 yards cost? MEDIUM

5. Write, in slope-intercept form, the line through $(-4, -1)$ and $(4, -9)$. MEDIUM

6. The cost of fabric varies directly with its length. Hannah paid \$56 for 8 yards. How much would 25 yards cost? MEDIUM

7. Write, in slope-intercept form, the line through $(-2, -2)$ and $(-6, 22)$. MEDIUM

8. The cost of fabric varies directly with its length. Henry paid \$84 for 12 yards. How much would 14 yards cost? HARD

9. Write, in slope-intercept form, the line through $(4, -4)$ and $(7, -9)$. HARD

10. The cost of fabric varies directly with its length. Abigail paid \$36 for 6 yards. How much would 28 yards cost? HARD