NAME _____ DATE _____ PERIOD _____

5-2 Skills Practice

Dividing Polynomials

Use synthetic division to find

9. $(n^2 + 7n + 10) \div (n + 5)$

10. $(d^2 + 4d + 3) \div (d + 1)$

11. $(2t^2 + 13t + 15) \div (t + 5)$

14. $(2x^2 - 5x - 4) \div (x - 3)$

15. $\dfrac{u^2 + 5u - 12}{u - 3}$

17. $(3v^2 - 7v - 10)(v - 4)^{-1}$

19. $\dfrac{y^3 - y^2 - 6}{y + 2}$

21. $(4p^3 - 3p^2 + 2p) \div (p - 1)$

23. GEOMETRY The area of a rectangle is $x^3 + 8x^2 + 13x - 12$ square units. The width of the rectangle is $x + 4$ units. What is the length of the rectangle?