Name _____

2.6 Writing Fractions as Decimals

MATHPOWER™ *Seven*, pp. 52–53

Fractions as Terminating Decimals

$\frac{7}{8} = 8\overline{)7.000}$ or 0.875 $1\frac{2}{5}$ $5\overline{)2.0} = 0.4$

$1\frac{2}{5} = 1.4$

Fractions as Repeating Decimals

$\frac{2}{3} = 3\overline{)2.000}$ or 0.666

$= 0.\overline{6}$

Write in decimal form.

1. $\frac{3}{10}$ _____ **2.** $\frac{29}{100}$ _____ **3.** $\frac{157}{1000}$ _____

4. $3\frac{9}{10}$ _____ **5.** $2\frac{23}{100}$ _____ **6.** $4\frac{129}{1000}$ _____

Write in decimal form.

7. $\frac{2}{5}$ _____ **8.** $\frac{11}{20}$ _____ **9.** $\frac{1}{8}$ _____

10. $3\frac{1}{2}$ _____ **11.** $11\frac{4}{5}$ _____ **12.** $7\frac{5}{8}$ _____

Write as a decimal. Round to the nearest tenth.

13. $\frac{5}{9}$ _____ **14.** $\frac{5}{11}$ _____ **15.** $6\frac{5}{7}$ _____

Write as a decimal. Round to the nearest hundredth.

16. $\frac{3}{16}$ _____ **17.** $\frac{5}{11}$ _____ **18.** $\frac{7}{13}$ _____

19. $\frac{5}{12}$ _____ **20.** $2\frac{5}{6}$ _____ **21.** $3\frac{2}{3}$ _____

Write each of the following, using bar notation.

22. 3.128 128 ... _____

23. 2.060 606 ... _____

24. 11.777 777 ... _____

25. 5.681 818 ... _____

26. 11.141 414 141 ... _____

27. 3.019 501 950 ... _____

Express each fraction as a repeating decimal, using bar notation.

28. $\frac{1}{6}$ _____ **29.** $\frac{5}{11}$ _____

30. $\frac{4}{9}$ _____ **31.** $\frac{5}{18}$ _____

32. $\frac{1}{27}$ _____ **33.** $\frac{1}{22}$ _____

34. $\frac{3}{11}$ _____ **35.** $\frac{4}{27}$ _____

36. $\frac{3}{18}$ _____ **37.** $2\frac{5}{6}$ _____

38. $1\frac{7}{11}$ _____ **39.** $3\frac{3}{22}$ _____