Name:_____ Date:_____

Section 3.5 Dividing Rational Numbers

1. Multiply the following. Keep your answers as a fraction in simplest form. No calculators:

a) $\frac{3}{4} \div \frac{9}{12}$	b) $\frac{3}{7} \div \frac{21}{14}$	c) $\frac{18}{13} \div \frac{27}{39}$	d) $\frac{21}{8} \div 1\frac{3}{4}$
e) $\frac{32}{22} \div \frac{16}{33}$	f) $\frac{24}{15} \div \left(-1\frac{3}{5}\right)$	g) $\frac{24}{55} \div \frac{36}{25} \div \frac{35}{81}$	h) $2\frac{8}{21} \div \frac{70}{27} \div 2\frac{6}{27}$
i) $2.25 \div 1.25$	j) $2\frac{2}{3} \div 0.\overline{888}$	k) $0.3 \div 0.\overline{555}$	L) $1.\overline{66} \div 0.\overline{25}$
m) $3.20 \div -0.4$	n) $-12.80 \div 0.4$	o) $0.75 \div 0.875$	p) $0.021 \div -0.03$
q) $0.8 \div (-0.4) \div (0.75)$	r) $\frac{12}{25} \div \frac{42}{125} \div \frac{-15}{48}$	s) $0.875 \div 0.75 \div 0.8$	t) $0.\overline{25} \div 8.\overline{33} \div 0.6$

2. Determine the missing number in the box so that the expression will be true:

a) $\frac{2}{4} \div \square = \frac{4}{5}$	b) $0.4 \div \square = 1.\overline{333}$	c) $1.25 \div \square = 1.\overline{666}$
d) $-1.26 \div \square = 0.2$	e) $-1.4 \div \square = 1.\overline{777}$	f) $\square \div 1.2 = 2.25$

3. Jason has 14.70 in his wallet. He wants to buy candies that cost $0.35 each. How many can he purchase?

4. A plant grew $1.25 inches$ every day. How many days will it require the plant to grow 36.5 inches?

5. David owns 40 shares of Apple stocks and the value dropped $2250.25. What was the drop of each share?

6. At 9pm, the temperature was $14.6°$ and at 3am, the temperature was $-5.3°$. What was the mean change in temperature? (ie: change in temperature each hour)

7. Evaluate without a calculator: $\left(\frac{1.\overline{428571} \div 1.4}{0.\overline{777} \times 0.\overline{333}}\right)^2$