

Complete the following steps for each problem:

- a. Estimate the quotient.
- b. Use the division algorithm to solve.
- c. Show a model that supports your work with the division algorithm.
- d. Check your work.

1. $3,312 \div 48$

2. $3,125 \div 25$

3. $1,344 \div 14$

1. Estimate the quotient: $1,908 \div 36$.

$$2,000 \div 40 = 50$$

2. Use the division algorithm and your estimate to find the quotient: $1,908 \div 36$.

$$\begin{array}{r} 53 \\ 36 \overline{) 1908} \\ \underline{-1800} \\ 108 \\ \underline{-108} \\ 0 \end{array}$$

3. Use estimation to determine if $8,580 \div 78$ has a quotient in the 10s, 100s, or 1000s.

I would round 8,580 to 8,800 and 78 to 80. $8,800 \div 80 = 110$. I know that the quotient should be in the 100s.

Complete the following steps for each problem:

- Estimate the quotient.
- Use the division algorithm to solve.
- Show a model that supports your work with the division algorithm.
- Check your work.

1. $3,312 \div 48$

$$3,500 \div 50 = 70$$

$$\begin{array}{r} 69 \\ 48 \overline{) 3312} \\ \underline{-2880} \\ 432 \\ \underline{-432} \\ 0 \end{array}$$

	48	
60		2880
9		432

$$48 \times 69 = 3,312$$

2. $3,125 \div 25$

$3,000 \div 30 = 100$

$$\begin{array}{r} 125 \\ 25 \overline{) 3125} \\ \underline{-2500} \\ 625 \\ \underline{-500} \\ 125 \\ \underline{-125} \\ 0 \end{array}$$

	25
100	2500
20	500
5	125

$25 \times 125 = 3,125$

3. $1,344 \div 14$

$1,400 \div 14 = 100$

$$\begin{array}{r} 96 \\ 14 \overline{) 1344} \\ \underline{-1260} \\ 84 \\ \underline{-84} \\ 0 \end{array}$$

	14
90	1260
6	84

$14 \times 96 = 1,344$