

6. [Large Number \times, \div]

Skill 6.1 Multiplying a large number by a power of 10.

MMBlue 1 1 2 2 3 3 4 4
MMGreen 1 1 2 2 3 3 4 4

When the multiplication is displayed in a **horizontal line**:

- Add the same number of zeros at the end of the given number as there are zeros in the power of 10.

When the multiplication is displayed in a **vertical algorithm**:

- Move each digit of the given number as many places to the left as there are zeros in the power of 10.
- Add zeros as place holders in the vacated places.

Q. $376 \times 1000 =$

A. $376 \times 1000 = 376,000$ Add 3 zeros

Move 3, 7, 6 three places left

$$\begin{array}{r} 376 \\ \times 1000 \\ \hline 376000 \end{array}$$
Add 3 zeros at the end of 376

a) $318 \times 10 =$

3180

b) $2040 \times 10 =$

20400

c) $9080 \times 10 =$

90800

$$\begin{array}{r} 318 \\ \times 10 \\ \hline 3180 \end{array}$$
Add 1 zero

$$\begin{array}{r} 2040 \\ \times 10 \\ \hline 20400 \end{array}$$

$$\begin{array}{r} 9080 \\ \times 10 \\ \hline 90800 \end{array}$$

d) $238 \times 100 =$

23800

e) $7015 \times 100 =$

701500

f) $4619 \times 100 =$

461900

$$\begin{array}{r} 238 \\ \times 100 \\ \hline 23800 \end{array}$$
Add 2 zeros

$$\begin{array}{r} 7015 \\ \times 100 \\ \hline 701500 \end{array}$$

$$\begin{array}{r} 4619 \\ \times 100 \\ \hline 461900 \end{array}$$

g) $179 \times 1000 =$

179000

h) $412 \times 1000 =$

412000

i) $905 \times 1000 =$

905000

$$\begin{array}{r} 179 \\ \times 1000 \\ \hline 179000 \end{array}$$

$$\begin{array}{r} 412 \\ \times 1000 \\ \hline 412000 \end{array}$$

$$\begin{array}{r} 905 \\ \times 1000 \\ \hline 905000 \end{array}$$

j) $506 \times 1000 =$

506000

k) $803 \times 1000 =$

803000

l) $248 \times 1000 =$

248000

$$\begin{array}{r} 506 \\ \times 1000 \\ \hline 506000 \end{array}$$

$$\begin{array}{r} 803 \\ \times 1000 \\ \hline 803000 \end{array}$$

$$\begin{array}{r} 248 \\ \times 1000 \\ \hline 248000 \end{array}$$

Skill 6.2 Dividing a large number by a power of 10.

MMBlue 1 1 2 2 3 3 4 4
MMGreen 1 1 2 2 3 3 4 4

- Remove as many zeros from the end of the given number as there are zeros in the power of 10.

Hint: If the division is written as a fraction, simply cross off respective zeros from the top and bottom of the fraction.

Q. $850,000 \div 1000 =$

A. $850,000 \div 1000 =$
 $= 850$

OR $850,000 \div 1000$
 $= \frac{850,000}{1000}$
 $= \frac{850,000}{1000}$
 $= 850$

Any division can be written as a fraction.

Simplify by dividing both the numerator and denominator by 1000.

Cross off the respective zeros.

a) $460 \div 10 =$

$$= \frac{460}{10}$$

$$= \frac{460}{10} = \boxed{46}$$

b) $280 \div 10 =$

$$= \frac{280}{10}$$

$$= \quad = \boxed{\quad}$$

c) $5020 \div 10 =$

$$=$$

$$= \quad = \boxed{\quad}$$

d) $8900 \div 100 =$

$$= \frac{8900}{100}$$

$$= \frac{8900}{100} = \boxed{\quad}$$

e) $1500 \div 100 =$

$$=$$

$$= \quad = \boxed{\quad}$$

f) $37,000 \div 100 =$

$$=$$

$$= \quad = \boxed{\quad}$$

g) $23,000 \div 100 =$

$$=$$

$$= \quad = \boxed{\quad}$$

h) $480,000 \div 100 =$

$$=$$

$$= \quad = \boxed{\quad}$$

i) $200,500 \div 100 =$

$$=$$

$$= \quad = \boxed{\quad}$$

j) $570,000 \div 1000 =$

$$=$$

$$= \quad = \boxed{\quad}$$

k) $706,000 \div 1000 =$

$$=$$

$$= \quad = \boxed{\quad}$$

l) $309,000 \div 1000 =$

$$=$$

$$= \quad = \boxed{\quad}$$

Skill 6.3 Multiplying a large number by a single digit.

- Multiply the number by the single digit working from right to left.
- If there is a 'carry over': First multiply.
Then add on the carry over.

Q. $4019 \times 7 =$

A. $4019 \times 7 = 28,133$

Units: $7 \times 9 = 63$

63 units = 6 tens and 3 units \Rightarrow 3 units
Carry the 6 tens to the next column.

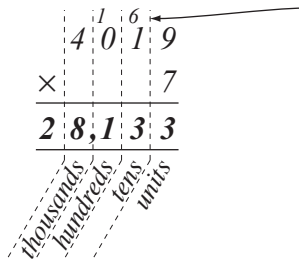
Tens: $7 \times 1 = 7, 7 + 6 = 13$

13 tens = 1 hundred and 3 tens \Rightarrow 3 tens
Carry the 1 hundred to the next column.

Hundreds: $7 \times 0 = 0$

$0 + 1 = 1 \Rightarrow$ 1 hundred

Thousands: $7 \times 4 = 28 \Rightarrow$ 28 thousand

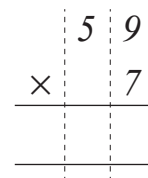
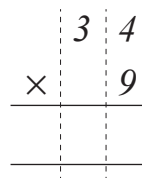
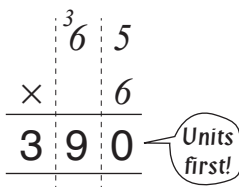


a) $65 \times 6 =$

390

b) $34 \times 9 =$

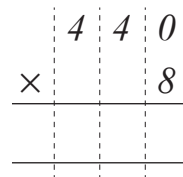
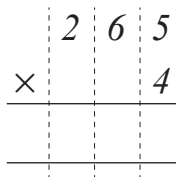
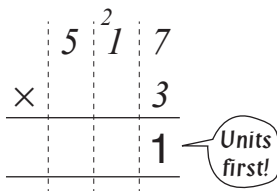
c) $59 \times 7 =$



d) $517 \times 3 =$

e) $265 \times 4 =$

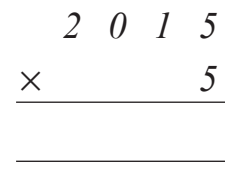
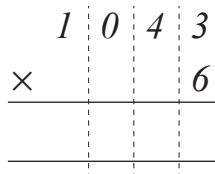
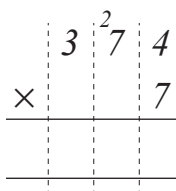
f) $440 \times 8 =$



g) $374 \times 7 =$

h) $1043 \times 6 =$

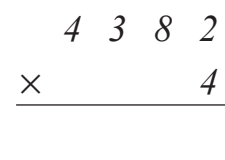
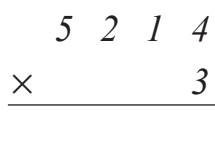
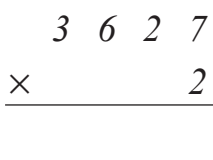
i) $2015 \times 5 =$



j) $3627 \times 2 =$

k) $5214 \times 3 =$

l) $4382 \times 4 =$



Skill 6.4 Dividing a large number by a single digit.

MMBlue 1 1 2 2 3 3 4 4
MMGreen 1 1 2 2 3 3 4 4

- Divide from left to right across the digits one at a time.
- If any result is less than 1: Cross off the number being divided into. 'Carry over' this amount to the next column. Add on the carry. Then try dividing again.

Q. $7168 \div 8 =$

A. $7168 \div 8 = 896$ Divide 8 into 7.

$$\begin{array}{r} 896 \\ 8 \overline{) 7168} \end{array}$$

8 doesn't divide into 7, so 'carry over' the 7 groups of 1000 and make 71 groups of 100.

8 divides into 71 eight times with 7 remainder. Write an 8 above the 1 and carry the remaining 7 groups of 100 to the tens column to make 76 tens.

Divide 8 into 76.

8 divides into 76 nine times and 4 remainder. Write a 9 above the 6 and carry the remaining 4 groups of tens to the units column to make 48 units.

Divide 8 into 48.

8 divides into 48 six times and 0 remainder. Write a 6 above the 8.

Read as: 7168 divided by 8

OR How many times can 8 be taken from 7168?

OR How many 8's go into 7168?

a) $468 \div 3 =$

$$\begin{array}{r} 156 \\ 3 \overline{) 468} \end{array}$$

b) $356 \div 4 =$

$$\begin{array}{r} 8 \\ 4 \overline{) 356} \end{array}$$

c) $475 \div 5 =$

$$\begin{array}{r} \\ 5 \overline{) 475} \end{array}$$

d) $546 \div 6 =$

$$\begin{array}{r} \\ 6 \overline{) 546} \end{array}$$

e) $296 \div 8 =$

$$\begin{array}{r} \\ 8 \overline{) 296} \end{array}$$

f) $387 \div 9 =$

$$\begin{array}{r} \\ 9 \overline{) 387} \end{array}$$

g) $2214 \div 3 =$

$$\begin{array}{r} 738 \\ 3 \overline{) 2214} \end{array}$$

h) $2046 \div 6 =$

$$\begin{array}{r} \\ 6 \overline{) 2046} \end{array}$$

i) $4085 \div 5 =$

$$\begin{array}{r} \\ 5 \overline{) 4085} \end{array}$$

j) $2364 \div 4 =$

$$\begin{array}{r} \\ 4 \overline{) 2364} \end{array}$$

k) $4347 \div 7 =$

$$\begin{array}{r} \\ 7 \overline{) 4347} \end{array}$$

l) $2392 \div 8 =$

$$\begin{array}{r} \\ 8 \overline{) 2392} \end{array}$$

m) $3608 \div 4 =$

$$\begin{array}{r} \\ 4 \overline{) 3608} \end{array}$$

n) $3725 \div 5 =$

$$\begin{array}{r} \\ 5 \overline{) 3725} \end{array}$$

o) $2268 \div 9 =$

$$\begin{array}{r} \\ 9 \overline{) 2268} \end{array}$$

Skill 6.6 Dividing a large number by a multiple of 10.

MMBlue 1 1 2 2 3 3 4 4
MMGreen 1 1 2 2 3 3 4 4

- Remove as many zeros from the end of the given number as there are zeros in the multiple of 10.
- Divide by the remaining digit working from left to right.

Q. $2280 \div 60 =$

A. $2280 \div 60 =$

$$= \frac{228\cancel{0} \div 10}{6\cancel{0} \div 10}$$

$$= 38$$

$$\begin{array}{r} 38 \\ 6 \overline{) 2280} \\ \underline{18} \\ 48 \\ \underline{48} \\ 0 \end{array}$$

Divide both numbers by 10, by crossing off the zeros.

Complete the division $228 \div 6$
6 divides into 22 three times and 4 remainder.
Write a 3 above the 2 and carry the remaining 4 groups of tens to the units column to make 48 units.

6 divides into 48 eight times and 0 remainder.
Write an 8 above the 8.

a) $5600 \div 20 =$

$$= \frac{560\cancel{0} \div 10}{2\cancel{0} \div 10} = \boxed{280}$$

$$\begin{array}{r} 280 \\ 2 \overline{) 5600} \\ \underline{10} \\ 16 \\ \underline{14} \\ 20 \\ \underline{20} \\ 0 \end{array}$$

b) $4800 \div 30 =$

$$= \frac{ \div 10}{ \div 10} = \boxed{}$$

$$\begin{array}{r} \\ 3 \overline{) 4800} \\ \underline{3} \\ 18 \\ \underline{18} \\ 0 \end{array}$$

c) $8160 \div 40 =$

$$= \frac{ \div 10}{ \div 10} = \boxed{}$$

$$\begin{array}{r} \\ 4 \overline{) 8160} \\ \underline{8} \\ 16 \\ \underline{16} \\ 0 \end{array}$$

d) $7350 \div 50 =$

$$= \frac{ \div 10}{ \div 10} = \boxed{}$$

$$\begin{array}{r} \\ 5 \overline{) 7350} \\ \underline{5} \\ 23 \\ \underline{20} \\ 35 \\ \underline{35} \\ 0 \end{array}$$

e) $9660 \div 60 =$

$$= \frac{ \div 10}{ \div 10} = \boxed{}$$

$$\begin{array}{r} \\ 6 \overline{) 9660} \\ \underline{6} \\ 36 \\ \underline{36} \\ 0 \end{array}$$

f) $5240 \div 40 =$

$$= \frac{ \div 10}{ \div 10} = \boxed{}$$

$$\begin{array}{r} \\ \overline{) 5240} \\ \\ \end{array}$$

g) $18,000 \div 400 =$

$$= \frac{ \div 100}{ \div 100} = \boxed{}$$

$$\begin{array}{r} \\ 4 \overline{) 1800} \\ \underline{12} \\ 60 \\ \underline{60} \\ 0 \end{array}$$

h) $22,000 \div 500 =$

$$= \frac{ \div 100}{ \div 100} = \boxed{}$$

$$\begin{array}{r} \\ 5 \overline{) 2200} \\ \underline{20} \\ 20 \\ \underline{20} \\ 0 \end{array}$$

i) $31,000 \div 200 =$

$$= \frac{ \div 100}{ \div 100} = \boxed{}$$

$$\begin{array}{r} \\ \overline{) 3100} \\ \\ \end{array}$$

j) $40,500 \div 300 =$

$$= \frac{ \div 100}{ \div 100} = \boxed{}$$

$$\begin{array}{r} \\ 3 \overline{) 40500} \\ \underline{3} \\ 10 \\ \underline{9} \\ 15 \\ \underline{15} \\ 0 \end{array}$$

k) $20,400 \div 600 =$

$$= \frac{ \div 100}{ \div 100} = \boxed{}$$

$$\begin{array}{r} \\ 6 \overline{) 20400} \\ \underline{12} \\ 84 \\ \underline{84} \\ 0 \end{array}$$

l) $98,700 \div 700 =$

$$= \frac{ \div 100}{ \div 100} = \boxed{}$$

$$\begin{array}{r} \\ \overline{) 98700} \\ \\ \end{array}$$

Skill 6.7 Multiplying a large number by a two-digit number (1).

- Multiply by the unit digit first, working from right to left.
Reminder: Put a zero in the units place before you start multiplying by the tens.
- Then multiply by the ten digit, working from right to left.
- Add the results last.

Q. $1426 \times 37 =$

A. $1426 \times 37 = 52,762$

Multiply 1426 by 7.

Then multiply 1426 by 30.
Remember: Put a 0 in the units place.

Add these results.

The question can be thought of as:

$$\begin{array}{r}
 \begin{array}{r}
 \overset{2}{1} \overset{1}{4} \overset{4}{2} \overset{1}{6} \\
 \times \quad \quad \quad 37 \\
 \hline
 \overset{1}{9} \overset{1}{9} \overset{1}{8} \overset{1}{2} \\
 + \quad \overset{1}{4} \overset{1}{2} \overset{1}{7} \overset{1}{8} \overset{1}{0} \\
 \hline
 \overset{1}{5} \overset{1}{2} \overset{1}{7} \overset{1}{6} \overset{1}{2}
 \end{array} \\
 + \left(\begin{array}{l}
 \text{1426} \times 7 = 9982 \\
 \text{1426} \times 30 = 42,780
 \end{array} \right)
 \end{array}$$

$$\begin{array}{r}
 \begin{array}{r}
 \overset{2}{1} \overset{1}{4} \overset{4}{2} \overset{1}{6} \\
 \times \quad \quad \quad 7 \\
 \hline
 \overset{1}{9} \overset{1}{9} \overset{1}{8} \overset{1}{2}
 \end{array}
 \text{ plus }
 \begin{array}{r}
 \overset{1}{1} \overset{1}{4} \overset{1}{2} \overset{1}{6} \\
 \times \quad \quad \quad 30 \\
 \hline
 \overset{1}{4} \overset{1}{2} \overset{1}{7} \overset{1}{8} \overset{1}{0}
 \end{array}
 = 52,762$$

a) $57 \times 82 =$

4674

b) $64 \times 93 =$

c) $35 \times 46 =$

$$\begin{array}{r}
 \begin{array}{r}
 \overset{1}{5} \overset{1}{7} \\
 \times \quad \quad 82 \\
 \hline
 \quad \quad 114 \\
 + \quad \quad \quad 4560 \\
 \hline
 \quad \quad 4674
 \end{array} \\
 + \left(\text{0 as place holder} \right)
 \end{array}$$

$$\begin{array}{r}
 \begin{array}{r}
 \overset{1}{6} \overset{1}{4} \\
 \times \quad \quad 93 \\
 \hline
 \quad \quad 92 \\
 \quad \quad \quad 0 \\
 \hline
 \quad \quad \quad \quad
 \end{array}
 \end{array}$$

$$\begin{array}{r}
 \begin{array}{r}
 \quad \quad 35 \\
 \times \quad \quad 46 \\
 \hline
 \quad \quad \quad \quad
 \end{array}
 \end{array}$$

d) $715 \times 17 =$

e) $809 \times 23 =$

f) $648 \times 34 =$

$$\begin{array}{r}
 \begin{array}{r}
 \overset{1}{7} \overset{3}{1} \overset{1}{5} \\
 \times \quad \quad 17 \\
 \hline
 \quad \quad 5005 \\
 + \quad \quad \quad 7150 \\
 \hline
 \quad \quad \quad \quad
 \end{array}
 \end{array}$$

$$\begin{array}{r}
 \begin{array}{r}
 \quad \quad 809 \\
 \times \quad \quad 23 \\
 \hline
 \quad \quad \quad 27 \\
 \quad \quad \quad \quad 0 \\
 \hline
 \quad \quad \quad \quad
 \end{array}
 \end{array}$$

$$\begin{array}{r}
 \begin{array}{r}
 \quad \quad 648 \\
 \times \quad \quad 34 \\
 \hline
 \quad \quad \quad \quad
 \end{array}
 \end{array}$$

g) $416 \times 42 =$

h) $353 \times 56 =$

i) $207 \times 64 =$

$$\begin{array}{r}
 \begin{array}{r}
 \quad \quad 416 \\
 \times \quad \quad 42 \\
 \hline
 \quad \quad \quad \quad
 \end{array}
 \end{array}$$

$$\begin{array}{r}
 \begin{array}{r}
 \quad \quad 353 \\
 \times \quad \quad 56 \\
 \hline
 \quad \quad \quad \quad
 \end{array}
 \end{array}$$

$$\begin{array}{r}
 \begin{array}{r}
 \quad \quad 207 \\
 \times \quad \quad 64 \\
 \hline
 \quad \quad \quad \quad
 \end{array}
 \end{array}$$

Skill 6.7 Multiplying a large number by a two-digit number (2).

MMBlue 1 1 2 2 3 4
MMGreen 1 1 2 2 3 4

j) $804 \times 75 =$ k) $532 \times 28 =$ l) $926 \times 45 =$

$$\begin{array}{r} 804 \\ \times 75 \\ \hline \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} 532 \\ \times 28 \\ \hline \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} 926 \\ \times 45 \\ \hline \\ \hline \\ \hline \end{array}$$

m) $1602 \times 19 =$ n) $4086 \times 24 =$ o) $1903 \times 36 =$

$$\begin{array}{r} 1602 \\ \times 19 \\ \hline \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} 4086 \\ \times 24 \\ \hline \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} 1903 \\ \times 36 \\ \hline \\ \hline \\ \hline \end{array}$$

p) $3015 \times 45 =$ q) $2038 \times 87 =$ r) $5217 \times 23 =$

$$\begin{array}{r} 3015 \\ \times 45 \\ \hline \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} 2038 \\ \times 87 \\ \hline \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} 5217 \\ \times 23 \\ \hline \\ \hline \\ \hline \end{array}$$

s) $2009 \times 73 =$ t) $3014 \times 46 =$ u) $4268 \times 29 =$

$$\begin{array}{r} 2009 \\ \times 73 \\ \hline \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} 3014 \\ \times 46 \\ \hline \\ \hline \\ \hline \end{array}$$

$$\begin{array}{r} 4268 \\ \times 29 \\ \hline \\ \hline \\ \hline \end{array}$$

Skill 6.8 Dividing a large number by a two-digit number (1).

MMBlue 1 1 2 2 3 3 4 4
MMGreen 1 1 2 2 3 3 4 4

- Work from left to right.
- Break down the division into smaller divisions by dividing into only as many digits as you need to get an answer greater than 1.
- It may be difficult, so guess the number of divisions and multiply your guess to check.
- Subtract your answer from the original number to get the remainder, which must be less than the number you are dividing by.
- Continue in this way by bringing down the next digit to make the next number to divide into.
- Repeat until the result of the subtraction is zero.

Q. $9690 \div 15 =$

A. $9690 \div 15 = 646$

$$\begin{array}{r}
 \overset{\times}{6} \overset{4}{4} \overset{6}{6} \\
 15 \overline{) 9690} \\
 \underline{90} \\
 69 \\
 \underline{60} \\
 90 \\
 \underline{90} \\
 0
 \end{array}$$

Start at the left.

9 is too small to divide 15 into, so consider 96.

Divide $96 \div 15 = ?$

6 is a good guess.

Check by multiplying $6 \times 15 = 90$

Subtract $96 - 90 = 6$

Write 6 above the 6.

Bring down the 9.

Divide $69 \div 15 = ?$ (Guess 4)

Check by multiplying $4 \times 15 = 60$

Subtract $69 - 60 = 9$

Write 4 above the 9.

Bring down the 0.

Divide $90 \div 15 = 6$ (No remainder)

Write 6 above the 0.

$$\begin{array}{r}
 \overset{\times}{6} \overset{4}{4} \overset{6}{6} \\
 15 \overline{) 9690} \\
 \underline{90} \\
 69 \\
 \underline{ 60} \\
 90 \\
 \underline{ 90} \\
 0
 \end{array}$$

OR Work as a short division.

a) $725 \div 25 =$

$$\begin{array}{r}
 \overset{\times}{2} \overset{9}{9} \\
 25 \overline{) 725} \\
 \underline{50} \\
 225 \\
 \underline{225} \\
 0
 \end{array}$$

b) $912 \div 16 =$

$$\begin{array}{r}
 \overset{\times}{5} \\
 16 \overline{) 912} \\
 \underline{80} \\
 112 \\
 \underline{112} \\
 0
 \end{array}$$

c) $948 \div 12 =$

$$\begin{array}{r}
 \\
 12 \overline{) 948} \\
 \\
 \\
 \\

 \end{array}$$

d) $2607 \div 11 =$

$$\begin{array}{r}
 \overset{\times}{2} \overset{3}{3} \overset{7}{7} \\
 11 \overline{) 2607} \\
 \underline{22} \\
 40 \\
 \underline{33} \\
 77 \\
 \underline{77} \\
 0
 \end{array}$$

e) $3682 \div 14 =$

$$\begin{array}{r}
 \\
 14 \overline{) 3682} \\
 \underline{28} \\
 88 \\
 \underline{84} \\
 42 \\
 \underline{42} \\
 0
 \end{array}$$

f) $4368 \div 12 =$

$$\begin{array}{r}
 \\
 12 \overline{) 4368} \\
 \\
 \\
 \\

 \end{array}$$

Skill 6.8 Dividing a large number by a two-digit number (2).

MMBlue 1 1 2 2 3 3 4 4
MMGreen 1 1 2 2 3 3 4 4

g) $5550 \div 15 =$

$$\begin{array}{r} 15 \overline{) 5550} \\ \underline{00} \\ 55 \\ \underline{00} \\ 50 \\ \underline{00} \\ 00 \end{array}$$

h) $8085 \div 11 =$

$$\begin{array}{r} 11 \overline{) 8085} \\ \underline{00} \\ 80 \\ \underline{00} \\ 88 \\ \underline{00} \\ 05 \\ \underline{00} \\ 05 \end{array}$$

i) $7680 \div 12 =$

$$\begin{array}{r} 12 \overline{) 7680} \\ \underline{00} \\ 76 \\ \underline{00} \\ 68 \\ \underline{00} \\ 80 \\ \underline{00} \\ 00 \end{array}$$

j) $7252 \div 14 =$

$$\begin{array}{r} 14 \overline{) 7252} \\ \underline{00} \\ 72 \\ \underline{00} \\ 55 \\ \underline{00} \\ 52 \\ \underline{00} \\ 00 \end{array}$$

k) $4224 \div 22 =$

$$\begin{array}{r} 22 \overline{) 4224} \\ \underline{00} \\ 42 \\ \underline{00} \\ 22 \\ \underline{00} \\ 24 \\ \underline{00} \\ 00 \end{array}$$

l) $5350 \div 25 =$

$$\begin{array}{r} 25 \overline{) 5350} \\ \underline{00} \\ 53 \\ \underline{00} \\ 35 \\ \underline{00} \\ 50 \\ \underline{00} \\ 00 \end{array}$$

m) $3570 \div 15 =$

$$\begin{array}{r} 15 \overline{) 3570} \\ \underline{00} \\ 35 \\ \underline{00} \\ 27 \\ \underline{00} \\ 70 \\ \underline{00} \\ 00 \end{array}$$

n) $9030 \div 21 =$

$$\begin{array}{r} 21 \overline{) 9030} \\ \underline{00} \\ 90 \\ \underline{00} \\ 33 \\ \underline{00} \\ 00 \end{array}$$

o) $3335 \div 23 =$

$$\begin{array}{r} 23 \overline{) 3335} \\ \underline{00} \\ 33 \\ \underline{00} \\ 33 \\ \underline{00} \\ 05 \end{array}$$

p) $36,864 \div 12 =$

$$\begin{array}{r} 12 \overline{) 36,864} \\ \underline{00} \\ 36 \\ \underline{00} \\ 86 \\ \underline{00} \\ 64 \\ \underline{00} \\ 00 \end{array}$$

q) $25,795 \div 11 =$

$$\begin{array}{r} 11 \overline{) 25,795} \\ \underline{00} \\ 25 \\ \underline{00} \\ 79 \\ \underline{00} \\ 95 \\ \underline{00} \\ 00 \end{array}$$

r) $20,650 \div 25 =$

$$\begin{array}{r} 25 \overline{) 20,650} \\ \underline{00} \\ 20 \\ \underline{00} \\ 65 \\ \underline{00} \\ 50 \\ \underline{00} \\ 00 \end{array}$$

Skill 6.10 Dividing a whole number - answer as a terminating decimal.

- Line up the decimal point in your answer.
 - Place a decimal point and more zeros at the end of the whole number.
 - Divide into the whole number and continue until you get an exact division with no remainder.
- Hint: When no decimal point is shown it is always placed on the far right of the number.*

Q. $3458 \div 8 =$

A. $3458 \div 8 = 432.25$

Start at the left.

Divide 8 into 3458.00

$$\begin{array}{r} 432.25 \\ 8 \overline{) 3458.00} \end{array}$$

Continue until you get an exact number with no remainder.

a) $1487 \div 2 =$

b) $6014 \div 4 =$

c) $2564 \div 5 =$

$$\begin{array}{r} 743.5 \\ 2 \overline{) 1487.0} \end{array}$$

$$\begin{array}{r} 1503.5 \\ 4 \overline{) 6014.0} \end{array}$$

$$\begin{array}{r} 512.8 \\ 5 \overline{) 2564.0} \end{array}$$

d) $5945 \div 4 =$

e) $3564 \div 8 =$

f) $3057 \div 2 =$

$$\begin{array}{r} 1486.25 \\ 4 \overline{) 5945.00} \end{array}$$

$$\begin{array}{r} 445.5 \\ 8 \overline{) 3564.0} \end{array}$$

$$\begin{array}{r} 1528.5 \\ 2 \overline{) 3057.0} \end{array}$$

g) $1806 \div 5 =$

h) $2732 \div 8 =$

i) $7263 \div 5 =$

$$\begin{array}{r} 361.2 \\ 5 \overline{) 1806.0} \end{array}$$

$$\begin{array}{r} 341.5 \\ 8 \overline{) 2732.0} \end{array}$$

$$\begin{array}{r} 1452.6 \\ 5 \overline{) 7263.0} \end{array}$$

j) $4026 \div 4 =$

k) $7385 \div 2 =$

l) $5862 \div 8 =$

$$\begin{array}{r} 1006.5 \\ 4 \overline{) 4026.0} \end{array}$$

$$\begin{array}{r} 3692.5 \\ 2 \overline{) 7385.0} \end{array}$$

$$\begin{array}{r} 732.75 \\ 8 \overline{) 5862.0} \end{array}$$

m) $9305 \div 2 =$

n) $2189 \div 4 =$

o) $9287 \div 5 =$

$$\begin{array}{r} 4652.5 \\ 2 \overline{) 9305.0} \end{array}$$

$$\begin{array}{r} 547.25 \\ 4 \overline{) 2189.00} \end{array}$$

$$\begin{array}{r} 1857.4 \\ 5 \overline{) 9287.0} \end{array}$$