

Chapter 7: Division

Balu The Bear

Wow ! I have six honey jars. I should share honey jars equally among my cubs!



Delicious!



Yum!



Hurray!



Balu, the bear, has 3 cubs. Balu has collected 6 jars of honey.

Now he wants to share honey equally among all his cubs.

So, he kept giving one jar to each cub till no jars were left with him.

Wow! Each cub got 2 jars each.

Division means dividing a given number into smaller and equal groups.

‘ \div ’ is the sign of division.

Equal Sharing or Grouping



Aunt Uma bought 12 balloons for her nephew and niece. Now, she wants to divide balloons equally among her niece and nephew.

So 12 divided by 2 is 6.

$12 \div 2$ is 6

' \div ' is the sign of division.



Exercise 7.1:

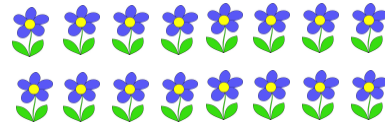
1) Divide 8 caps equally among 4 children.



2) Divide 8 marbles equally into 2 bowls.



3) Divide 16 flowers into 4 vases.



4) Divide 6 bones equally among 3 dogs.



5) Divide 10 apples equally among 5 children.



Division is repeated subtraction.

20 chocolates to be shared equally between 5 children.

$20 - 5 = 15 - 5 = 10 - 5 = 5 - 5 = 0$

①

②

③

④



5 was subtracted 4 times.

So, each child will get 4 chocolates.

Division on a number line.

Divide 15 by 3

Image

Start at 15. Take backward jumps of 3 steps each. How many jumps did we take?

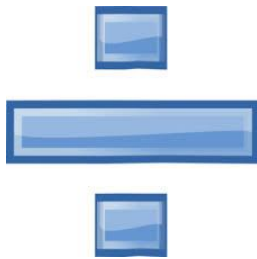
We took 5 jumps.

So, the answer is

$$15 \div 3 = \boxed{5}$$

Exercise 7.2:

Divide the following on a number line.



1) Divide 16 by 4.

2) Divide 9 by 3.

3) Divide 8 by 2.

4) Divide 12 by 6.

5) Divide 10 by 5.

Division Facts



A number divided by same number is equal to 1

For example 6 by 6 = 1

A number divided by 1 gives the same number

For example 5 by 1 = 5

'0' divided by any number is '0'

'0' by 100 = 0

Exercise 7.3:

1) Divide the following sums:

a) $18 \div 18 =$

b) $20 \div 20 =$

c) $32 \div 32 =$

d) $140 \div 140 =$

2) Divide the following sums:

a) $0 \div 10 =$

b) $0 \div 100 =$

c) $0 \div 20 =$

d) $0 \div 39 =$

3) Divide the following sums:

a) $14 \div 1 =$

b) $32 \div 1 =$

c) $16 \div 1 =$

d) $24 \div 1 =$

Correlation between Multiplication and Division

Multiplication Facts

MULTIPLICATION FACTS	DIVISION FACTS
a. $3 \times 4 =$ <input type="text"/>	<input type="text"/> $\div 4 =$ <input type="text"/> <input type="text"/> $\div 3 =$ <input type="text"/>
b. $6 \times 6 =$ <input type="text"/>	<input type="text"/> $\div 6 =$ <input type="text"/> <input type="text"/> $\div 6 =$ <input type="text"/>
c. $7 \times 5 =$ <input type="text"/>	<input type="text"/> $\div 7 =$ <input type="text"/> <input type="text"/> $\div 5 =$ <input type="text"/>
d. $9 \times 7 =$ <input type="text"/>	<input type="text"/> $\div 9 =$ <input type="text"/> <input type="text"/> $\div 7 =$ <input type="text"/>
e. $8 \times 4 =$ <input type="text"/>	<input type="text"/> $\div 4 =$ <input type="text"/> <input type="text"/> $\div 8 =$ <input type="text"/>

Terms of Division

Divisor, dividend and quotient

$$18 \div 3 = \boxed{6}$$

18 is called the dividend.

3 is called the divisor.

6 is called the quotient.

Long division method

Arrange the numbers as

$$\begin{array}{r} \text{quotient} \\ \text{divisor} \overline{) \text{dividend}} \\ \\ 3 \overline{) 18} \end{array}$$

Now we read the table of 3 until we get 18.

$$3 \times 1 = 3, 3 \times 2 = 6, 3 \times 3 = 9, 3 \times 4 = 12, 3 \times 5 = 15, 3 \times 6 = 18$$

So, the quotient is 6.

$$\begin{array}{r} 6 \\ 3 \overline{) 18} \\ \underline{18} \\ 0 \end{array}$$

Exercise 7.4:

1) Divide the following sum and write the quotient in the given boxes:

a) $6 \overline{) 24}$

b) $7 \overline{) 35}$

c) $8 \overline{) 48}$

d) $5 \overline{) 50}$

e) $3 \overline{) 24}$

f) $2 \overline{) 18}$

g) $4 \overline{) 28}$

h) $9 \overline{) 18}$

Word Problems

Example:

16 eggs were to be put in 4 baskets.

How many eggs have to be put in each basket?

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



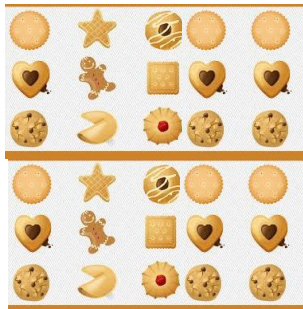
Exercise 7.4:

1) 18 crayons are to be shared equally among 3 girls. How many crayons will each girl get?



Each one will get crayons.

2) 30 biscuits are shared equally among 6 friends. How many biscuits will each one get?



Each one will get biscuits.

3) 24 prizes were won equally by 4 boys. How many prizes will each one get?



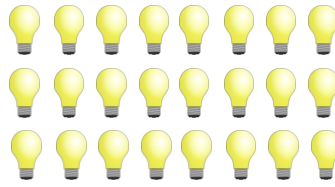
Each one will prizes.

4) There are 24 bulbs in a box.

There are 3 rows in the box.

How many bulbs will fit in each row?

Each row will fit bulbs.



5) There are 56 students who

come to school in 7 buses. How

many children come in each bus?

Each bus carries children.



Train Your Brain



a) $8 \overline{) 32}$

c) $4 \overline{) 16}$

e) $5 \overline{) 30}$

g) $20 \div 5 =$

i) $40 \div 8 =$

b) $2 \overline{) 18}$

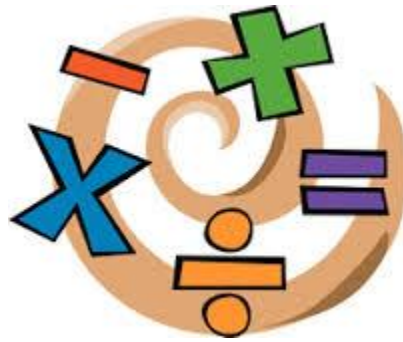
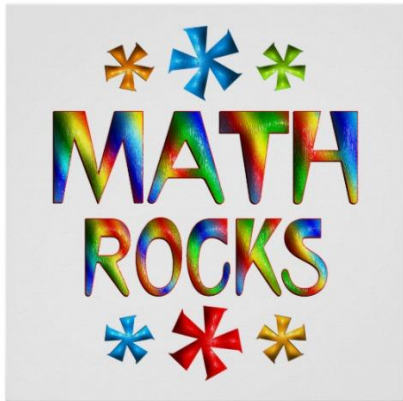
d) $7 \overline{) 28}$

f) $9 \overline{) 81}$

h) $49 \div 7 =$

j) $27 \div 9 =$

Fun with Math (Lab Activity)



1) Divide 36 rajma seeds equally among 4 children and frame the word problem on your own.



2) Divide 54 chocolates equally among 9 children and figure out the answer on your own.



Mental Ability



a) Balu, the bear, distributed 7 jars of honey

equally to 7 cubs. Each one will get



b) $18 \div 2 = 9$ if you subtract 2 from divisor and then subtract the answer with 2 you will get answer.

c) If $21 \div 3 =$

then $18 \div 3 =$

d) $18 \div 2 = 9$ then $9 \times 2 =$

e) We have divided 1000 chocolates among '0' children. How many chocolates will each one get?