

2034 NANUKU SANGAM SCHOOL
LESSON NOTES
WORKSHEET 3 -2021

Subject: Mathematics

Year: 7

Name: _____

LESSON NOTES:

FACTORS

What is a "Factor"?
Factors are numbers you multiply together to get another number:

$2 \times 3 = 6$

Factor Factor Product

In the problem $2 \times 3 = 6$, 2 and 3 are factors and 6 is the product. Factors are either composite numbers or prime numbers (except that 0 and 1 are neither prime nor composite). There can be many factors of a number.
Example: All the factors of 12 are $2 \times 6 = 12$, but also $3 \times 4 = 12$, and of course $1 \times 12 = 12$.

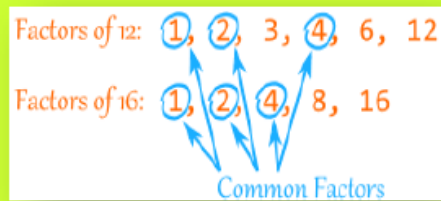
So 1, 2, 3, 4, 6 and 12 are factors of 12

Highest Common Factor [H.C.F.]

The highest number that divides exactly into two or more numbers.

For example: Find the highest common factor of 12 and 16

1. Find the factors of both numbers
2. Circle the common factors
3. Choose the *Highest Common Factor* for 12 and 16



QUESTIONS

1. Find the HCF of 6 and 8
 - a. $F\{6\} = \{1, 2, 3, 6\}$
 - b. $F\{8\} = \{1, 2, 4, 8\}$
 - c. $F\{6\} \cap F\{8\} = \{1, 2\}$
 - d. H.C.F of 6 and 8 = 2

2. Find the HCF of 15 and 20
 - $F\{15\} = \{1, 3, 5, 15\}$
 - $F\{20\} = \{1, 2, 4, 5, 10, 20\}$
 - $F\{15\} \cap F\{20\} = \{1, 5\}$
 - H.C.F of 15 and 20 = 5