

Match the following:

S/no	Column A	Column B
1	47	$2 \times 2 \times 11 \times 2$
2	18	$2 \times 2 \times 5 \times 3$
3	46	$2 \times 5 \times 2 \times 5$
4	55	$2 \times 2 \times 2 \times 2 \times 2 \times 3$
5	60	$2 \times 3 \times 3$
6	100	$2 \times 23$
7	88	$47 \times 1$
8	96	$11 \times 5$

Answer the following questions:

- 1) Expressing a number as product of prime numbers is \_\_\_\_\_.
- 2) The numbers that have only \_\_\_\_\_ factors are prime numbers.
- 3) If the numbers have more than two factors ,they are \_\_\_\_\_ numbers.
- 4) Choose the prime factors of 20 10, 2, 5, 1 .
- 5) The non – prime factors of 30 are \_\_\_\_\_.

- 6) The prime factors of number 50 are 2 and 5. True/false?
- 7) What is the purpose of prime factorization? Why do we need to do prime factorization?

Fill in the blank:

- 1)  $2 \times 2 \times 2$  is the PF of \_\_\_\_\_.
- 2) A number is expressed as  $3 \times 4 \times 2 \times 2$ . Is this expressed in correct format. Justify
- 3) The prime factorization of 100 can be given in methods: True or False. Justify
- 4) A prime factorization is :- giving only the prime factors of the number. Correct or Wrong. Justify.

5) If your answer is correct for Q4, then prime factorization of 20 is  $2 \times 5$ . Is this true? Why ?

6) Choose the correct prime factorization for 30: ( Give your explanation whether it is right or wrong)

a)  $2 \times 15 \times 1$  :

b)  $3 \times 2 \times 5$  :