MILLIONAIRE

What are the prime factors of 30?

2, 3, 5

1, 2, 3, 5

2, 15

3, 10

MILLIONAIRE

What is the HCF of 12 and 18 using prime factors?

6

4

9

3

MILLIONAIRE

What is the LCM of 8 and 12 using prime factors?

24

12

16

48

MILLIONAIRE

Find the HCF of 24, 36, and 48.

12

8

6

4

MILLIONAIRE

Find the LCM of 9, 15, and 20.

180

90

60

45

MILLIONAIRE

Three buckets hold 18L, 24L, and 30L. What is the largest container that can measure all capacities exactly?

6L

3L

2L

9L

MILLIONAIRE

Lights flash every 12s, 18s, and 24s. When will they next flash together?

72s

36s

48s

96s

MILLIONAIRE

What is the prime factorization of 420?

2,2,3,5,7

2,3,5,7,11

4,3,5,7

2,2,5,21

MILLIONAIRE

Find the HCF of 210 and 350.

70

35

14

105

MILLIONAIRE

The HCF of two numbers is 15. Their LCM is 90. If one number is 30, what is the other?

45

60

18

75

MILLIONAIRE

Find the HCF of $12x^3y^2$ and $18x^2y^4$ (where x,y are prime).

$6x^2y^2$

$6x^3y^4$

$12x^2y^2$

$18x^3y^4$

MILLIONAIRE

A gardener has 54 roses, 72 daisies, and 90 tulips. What's the greatest number of identical bunches they can make without leftovers?

18

9

6

12

MILLIONAIRE

Find the LCM of $8x^2y^3$ and $12x^4y$ (where x,y are prime).

$24x^4y^3$

$24x^2y$

$12x^4y^3$

$8x^4y^3$

MILLIONAIRE

The HCF of two numbers is 24. Their LCM is 144. If one number is 48, what is the other?

72

36

96

60

MILLIONAIRE

The prime factorizations of A and B are: A = 2 × 2 × 3 × 3 × 5 × 7, B = 2 × 3 × 3 × 3 × 5 × 5. What is their HCF?

$2 \times 3 \times 3 \times 5$

$2 \times 2 \times 3 \times 3 \times 3 \times 5 \times 5 \times 7$

$2 \times 3 \times 5$

$2 \times 2 \times 3 \times 5$