

ARITHMETIC

1, 3, 5, 7, ...

0, 2, 4, 6, ...

Odd numbers,
Even numbers

$n : 2$

$$n = 2q + 0$$

$$n = 2q + 1$$

Parity

6^2

6^{15}

Perfect square (square
number), Perfect power

2, 3, 5, 7, ...

Prime numbers

$2, 2^2, 2^3, \dots$

$3, 3^2, 3^3, \dots$

...

Prime powers

$$12 = 2^2 \times 3$$

Prime factorization,
to factor

$$12 = 2^2 \times 3$$

2, 3

1, 2, 3, 4, 6, 12

Prime factors,
Divisors (factors)

$2^2, 3^2, 5^2, \dots$

$$15 = 3 \times 5$$

Square-free

12 20

4

Greatest common
divisor (gcd)

$$8 \times 2 \quad +$$

$$5 \times (-3) =$$

1

Relatively prime numbers
(coprime numbers)

12 20

60

Least common
multiple (lcm)

$$3 + 7 = 10$$

3 7

Numbers
bond to 10

ALGEBRA