Four Operations: Common Factors and Multiples Knowledge Organiser

Key Vocabulary

Common	Something that is shared by something else.
Division	Separating numbers into equal portions
Factors	Numbers which divide equally into another number.
HCF	Highest common factor
LCM	Lowest common multiple
Multiples	Product of 2 numbers multiplied together.
Multiplication	Combining numbers together by timesing.
Product	Answer when multiplying 2 or ore numbers together.
Systematic	Working methodically.

Key Information

1	A factor is a number which divides exactly into another number.
2	Common factors are factors that 2 or more different numbers share.
3	Multiples are products created from multiplying one number by another.
4	Common multiples are multiples that 2 or more numbers share.

Prior Knowledge

Y2	Know division facts for 2, 5s and 10s
Y3	Know division facts for 3s, 4s and 8s.
Y4	Know division facts up to 12 x 12.
Y4	Know that factor pairs can be uses commutatively and can help support our mental calculations.
Y5	Know that factors come in pairs as these numbers are used to multiply together to achieve an answer.

Worked Examples

Decide if these statements are true of false.

5 is a factor of both 95 and 75

3 is a common factor of 45 and 54

4 is not a common factor of 56 and 80 🚫

Write one number in each box.

	Factor of 6	Not a factor of 6
Factor of 9	3	9
Not a factor of 9	2	5

Name three common multiples of 4 and 3

12 24

36

Worked Examples

Write the numbers into the diagram

12 18 40 6 48 24 16 42 56 54 30

multiples of 6   multiples of 8

12 18
54 30
6
42

48
24

40
48
16
56