Multiplication and division facts and skills

Recap

Multiplication squares show us that division is the *inverse* of multiplication.

So, we can say:
8 × 9 = 72
9 × 8 = 72

72 ÷ 9 = 8
72 ÷ 8 = 9

×	1	2	3	4	5	6	7	8	9	10	11	12
1	1	2	3	4	5	6	7	8	9	10	11	12
2	2	4	6	8	10	12	14	16	18	20	22	24
3	3	6	9	12	15	18	21	24	27	30	33	36
4	4	8	12	16	20	24	28	32	36	40	44	48
5	5	10	15	20	25	30	35	40	45	50	55	60
6	6	12	18	24	30	36	42	48	54	60	66	72
7	7	14	21	28	35	42	49	56	63	70	77	84
8	8	16	24	32	40	48	56	64	72	80	88	96
9	9	18	27	36	45	54	63	72	81	90	99	108
10	10	20	30	40	50	60	70	80	90	100	110	120
11	11	22	33	44	55	66	77	88	99	110	121	132
12	12	24	36	48	60	72	84	96	108	120	132	144

Revise

You already know some square and cube number facts, and you can calculate others.

Five squared = 5^2 = 5 × 5 = 25

Five cubed = 5^3 = 5 × 5 × 5 = 125

Remember the inverses: 25 ÷ 5 = 5, 125 ÷ 5 = 25

Also, you should now be able to multiply and divide by **powers of 10**.

Operation	Fact	Example
×10	Move one place left	65 × 10 = 650
÷10	Move one place right	65 ÷ 10 = 6.5
×1000	Move three places left	65 × 1000 = 65,000
÷1000	Move three places right	65 ÷ 1000 = 0.065
×1,000,000	Move six places left	65 × 1,000,000 = 65,000,000
÷1,000,000	Move six places right	65 ÷ 1,000,000 = 0.000065

Tips

When multiplying by larger numbers, we can separate the powers of 10, for example:

7 × 12,000 is the same as 7 × 12 × 1000 = 84 × 1000 = 84,000

Or

for 24,000 ÷ 6, just do 24 ÷ 6 = 4, then times by 1000 = 4 × 1000 = 4000