

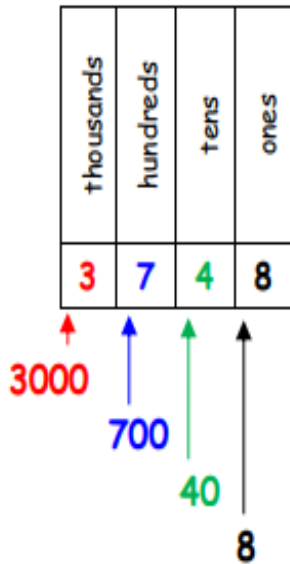
Numeracy Key Facts Booklet



St Bernard's Primary School
Primary 5

Quick Recall Facts

Place value



Round to nearest 10, 100, 1000.

Example 1- Round 4279 to the nearest 1000

- Step 1 - Find the 'round-off digit' - 4
- Step 2 - Look one digit to the right of 4 - 2

5 or more? NO - leave 'round off digit' unchanged
- Replace following digits with zeros

ANSWER - 4000

Example 2- Round 4279 to the nearest 10

- Step 1 - Find the 'round-off digit' - 7
- Step 2 - Look one digit to the right of 7 - 9

5 or more? YES - Add one to the 'round off digit'
- Replace following digits with zeros

ANSWER - 4280

I know number bonds to 100

By the end of this half term, children should know the following facts. The aim is for them to recall these facts **instantly**.

Some examples:

$60 + 40 = 100$	$37 + 63 = 100$
$40 + 60 = 100$	$63 + 37 = 100$
$100 - 40 = 60$	$100 - 37 = 63$
$100 - 60 = 40$	$100 - 63 = 37$
$75 + 25 = 100$	$48 + 52 = 100$
$25 + 75 = 100$	$52 + 48 = 100$
$100 - 25 = 75$	$100 - 52 = 48$
$100 - 75 = 25$	$100 - 48 = 52$

This list includes some examples of facts that children should know. They should be able to answer questions including missing number questions. e.g. $49 + \square = 100$ or $100 - \square = 72$

Key Vocabulary

What do I **add** to 65 to make 100?

What is 100 **take away** 6?

What is 13 **less than** 100?

How many more than 98 is 100?

Multiplication tables

Times Table - 12x12												
	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

Remember:

$$7 \times 8 = 56 \quad 8 \times 7 = 56$$

Pupils must know all corresponding division facts

$$56 \div 7 = 8 \quad 56 \div 8 = 7$$

Count in Multiples

Skip - Count by Multiples

2, 4, 6, 8, 10, 12, 14, 16, 18

3, 6, 9, 12, 15, 18, 21, 24, 27

4, 8, 12, 16, 20, 24, 28, 32, 36

5, 10, 15, 20, 25, 30, 35, 40, 45

6, 12, 18, 24, 30, 36, 42, 48, 54

7, 14, 21, 28, 35, 42, 49, 56, 64

8, 16, 24, 32, 40, 48, 56, 64, 72

9, 18, 27, 36, 45, 54, 63, 72, 81

10, 20, 30, 40, 50, 60, 70, 80, 90

11, 22, 33, 44, 55, 66, 77, 88, 99

12, 24, 36, 48, 60, 72, 84, 96, 108

Pupils must be able to count forwards and backwards using the multiples up to x12

Factors

Pupils must be able to recall factor pairs for all multiples within their times tables.

4/10 Factor pairs

The number 12 can be made from these factor pairs

1×12
 2×6
 3×4
 4×3
 6×2
 12×1

From these factor pairs we can see that the factors of 12 are: 1, 2, 3, 4, 6, 12

Finding 1,10,100,1000 more than/less than

thousands	hundreds	tens	ones
4	5	6	7

To increase or decrease by 1000 this is the digit that changes.

4567 has increased by 1000 to **5**567

thousands	hundreds	tens	ones
5	5	6	7

4567 has decreased by 1000 to **3**567

thousands	hundreds	tens	ones
3	5	6	7

Multiplying & Dividing by 10 & 100

$$7 \times 10 = 70$$

$$10 \times 7 = 70$$

$$70 \div 7 = 10$$

$$70 \div 10 = 7$$

$$30 \times 10 = 300$$

$$10 \times 30 = 300$$

$$300 \div 30 = 10$$

$$300 \div 10 = 30$$

$$6 \times 100 = 600$$

$$100 \times 6 = 600$$

$$600 \div 6 = 100$$

$$600 \div 100 = 6$$

$$40 \times 100 = 4000$$

$$100 \times 40 = 4000$$

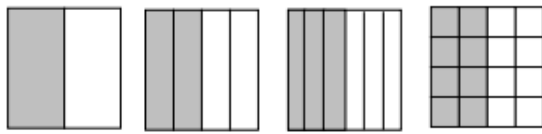
$$4000 \div 40 = 100$$

$$4000 \div 100 = 40$$

Common equivalent fractions

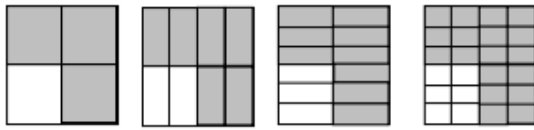
- The same fraction can be expressed in different ways

ALL THESE ARE $\frac{1}{2}$



$$\frac{1}{2} = \frac{2}{4} = \frac{3}{6} = \frac{8}{16}$$

ALL THESE ARE $\frac{3}{4}$



$$\frac{3}{4} = \frac{6}{8} = \frac{9}{12} = \frac{18}{24}$$

Add & subtract fractions

- To add and subtract fractions

When the denominators are the same

$$\frac{5}{8} + \frac{3}{8} = \frac{8}{8} = 1$$

Do not add
the denominators

$$\frac{5}{8} - \frac{1}{8} = \frac{4}{8}$$

Do not subtract
the denominators

Decimal Tenths

- $1/10 = 0.1 = 10\%$
 $2/10 = 0.2 = 20\%$
 $3/10 = 0.3 = 30\%$
 $4/10 = 0.4 = 40\%$
 $5/10 = 0.5 = 50\%$
 $6/10 = 0.6 = 60\%$
 $7/10 = 0.7 = 70\%$
 $8/10 = 0.8 = 80\%$
 $9/10 = 0.9 = 90\%$
 $10/10 = 1.0 = 100\%$ (1 whole)

- 1 whole and $1/10 = 1.1$
 1 whole and $2/10 = 1.2$
 1 and $3/10 = 1.3$
 1 and $4/10 = 1.4$

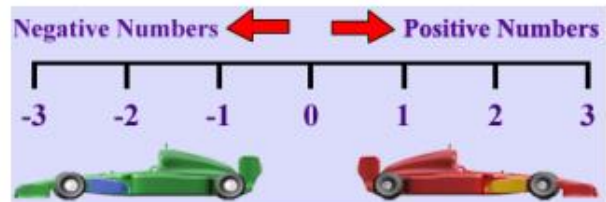
And so on

Negative numbers

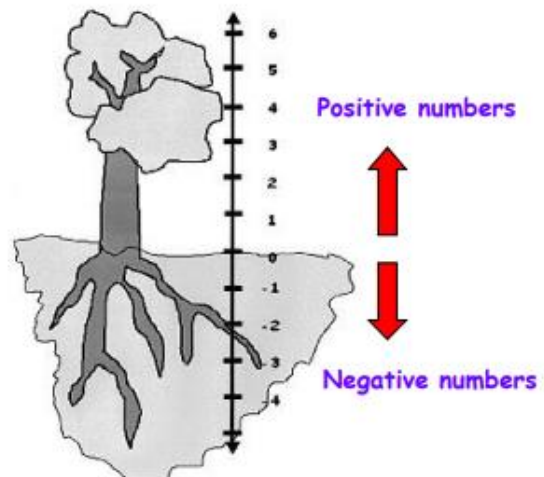
Negative numbers are numbers BELOW ZERO

Think of a number line

- Horizontal number line



- Vertical number line













Key Words in Problem Solving

<p>ADDITION</p> <p>add plus and total</p> <p>+</p> <p>increase more sum together</p>	<p>SUBTRACTION</p> <p>take away minus less reduce remain</p> <p>-</p> <p>take from fewer take difference how many more</p>
<p>MULTIPLICATION</p> <p>multiply times product multiplied by</p> <p>×</p> <p>groups of lots of doubled times tables</p>	<p>DIVISION</p> <p>divided by share divide divide into</p> <p>÷</p> <p>divisible by group each share equally</p>

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





Properties of 2D Shapes

2D Shapes

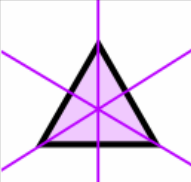
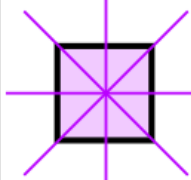

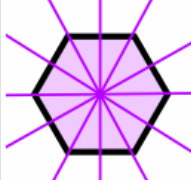
Name	Sides	Vertices
triangle 	3	3
circle 	1	0
square 	4	4
rectangle 	4	4
pentagon 	5	5
hexagon 	6	6
oval 	1	0
rhombus 	4	4
trapezium 	4	4
parallelogram 	4	4

Properties of 3D Shapes

3D Shapes

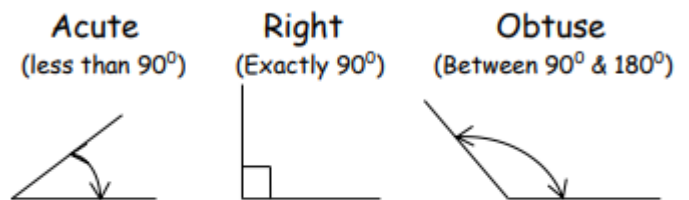
Name	Surfaces		Edges		Vertices	Picture
	Flat	Curved	Flat	Curved		
sphere 	0	1	0	0	0	
cube 	6	0	12	0	8	
cuboid 	6	0	12	0	8	
cone 	1	1	0	1	0	
cylinder 	2	1	0	2	0	
square-based pyramid 	5	0	8	0	5	
tetrahedron 	4	0	6	0	4	
triangular prism 	5	0	9	0	6	

Lines of Symmetry in 2D shapes

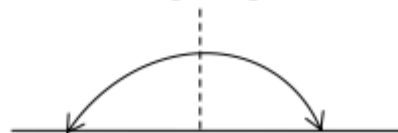
	An Equilateral Triangle (3 sides) has 3 Lines of Symmetry
	A Square (4 sides) has 4 Lines of Symmetry
	A Regular Pentagon (5 sides) has 5 Lines of Symmetry
	A Regular Hexagon (6 sides) has 6 Lines of Symmetry

Angles in Shapes

Types of angles

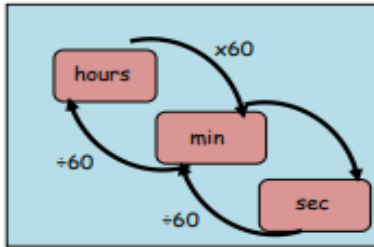
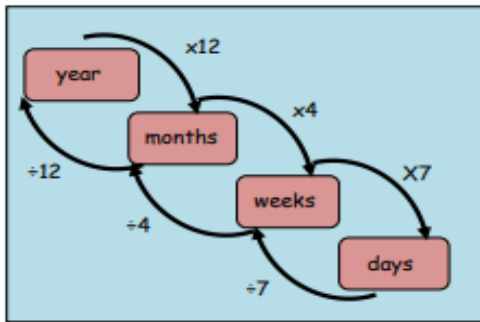


Straight line (180° or two right angles)

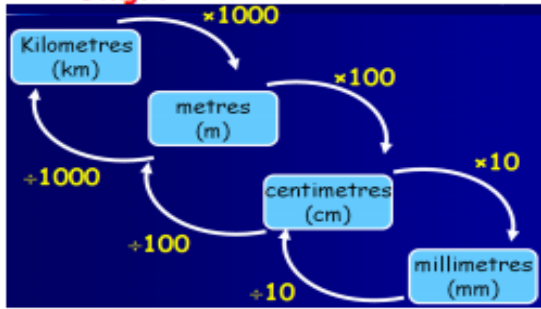


4 Convert between units of measure

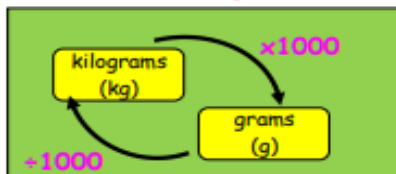
• Time



• Length



• Mass or weight



• Capacity or volume



12-hour time

12 a.m. (midnight)

1 a.m.

2 a.m.

3 a.m.

4 a.m.

5 a.m.

6 a.m.

7 a.m.

8 a.m.

9 a.m.

10 a.m.

11 a.m.

12 p.m. (noon)

1 p.m.

2 p.m.

3 p.m.

4 p.m.

5 p.m.

6 p.m.

7 p.m.

8 p.m.

9 p.m.

10 p.m.

11 p.m.

