## THE STATE OF SOLIDING

#### Autumn

Place Value	Addition and Subtraction	Multiplication and	Volume
		Division	
units, ones, tens, hundreds, thousands	add, addition, more, plus,	lots of, groups of	litre, half litre, millilitre
ten thousand, hundred thousand, million, ten million	increase	times, multiply,	capacity
digit, one-, two-, three- or four-digit number,	sum, total, altogether	multiplication,	volume
numeral, 'teens' number	score	multiplied by	full
place, place value, place holder, stands for,	double, near double	multiple of, product	empty
represents, exchange	how many more to make?	once, twice, three	more than, less than
the same number as, as many as	subtract, subtraction, take	times ten times times	half full, quarter full
equal to	(away), minus, decrease	as (big, long, wide	holds, contains container, measuring
>, greater than, more than, larger than, bigger than	leave, how many are left/left	and so on)	cylinder pint, gallon
<, less than, fewer than, smaller than, greater than	over?	repeated addition	
or equal to, less than or equal to	difference between	array, row, column	
greatest, most, largest, biggest	half, halve	double, halve	
least, fewest, smallest	how many more/fewer is	share, share equally	
sequence	than?	equal groups of	
one ten one hundred one thousand more/less	how much more/less is?	divide, division, divided	
compare, order, size	equals, sign, is the same as	by, divided into	
ascending/descending order	tens boundary, hundreds	remainder	
first tenth twentieth	boundary	factor, quotient, divisible	
last, last but one, before, after, next	units boundary, tenths boundary	by by	
between, half-way between	inverse	inverse	
guess how many, estimate		decimal remainder	
nearly, roughly, close to, about the same as		highest/lowest common	
approximate, approximately, is approximately equal		factor	
to, just over, just under, exact, exactly, too many, too		prime number, square	
few, enough, not enough		number	
round (up or down), nearest		prime factor	
round to the nearest ten/hundred/thousand			
integer, positive, negative			
above/below zero, minus			



### Spring

Area and Perimeter	Fractions	Decimals
length, width, height, depth, breadth	part, equal parts	part, equal parts
long, short, tall, high, low	fraction, proper/improper fraction	fraction, proper/improper fraction
wide, narrow, deep, shallow, thick, thin	mixed number	mixed number
longer, shorter, taller, higher and so on	numerator, denominator	numerator, denominator
longest, shortest, tallest, highest and so on	equivalent, reduced to, cancel	equivalent, reduced to, cancel
far, further, furthest, near, close	one whole	one whole
distance apart/between, distance to from	half, quarter, eighth	half, quarter, eighth
edge, perimeter	third, sixth, ninth, twelfth	third, sixth, ninth, twelfth
kilometre ( $km$ ), metre ( $m$ )	fifth, tenth, twentieth, hundredth	fifth, tenth, twentieth, hundredth
centimetre ( <i>cm</i> ), millimetre ( <i>mm</i> )	proportion, ratio	proportion, ratio
mile	in every, for every	in every, for every
ruler, metre stick, tape measure	to every, as many as	to every, as many as
area, covers, surface		decimal, decimal fraction
square centimetre ( <i>cm2</i> )		decimal point, decimal place

# TOR SCHOOL

#### Summer

Fractions, Decimals and Percentages	Converting Units	Position and Direction	Statistics
part, equal parts fraction, proper/improper fraction mixed number numerator, denominator equivalent, reduced to, cancel one whole half, quarter, eighth third, sixth, ninth, twelfth fifth, tenth, twentieth, hundredth proportion, ratio in every, for every to every, as many as decimal, decimal fraction decimal point, decimal place percentage, per cent, %	length, width, height, depth, breadth long, short, tall, high, low wide, narrow, deep, shallow, thick, thin longer, shorter, taller, higher and so on longest, shortest, tallest, highest and so on far, further, furthest, near, close distance apart/between, distance to from edge, perimeter kilometre (km), metre (m) centimetre (cm), millimetre (mm) mile ruler, metre stick, tape measure mass: big, bigger, small, smaller, balances weight: heavy/light, heavier/lighter, heaviest/lightest weigh, weighs kilogram (kg), half-kilogram, gram (g) balance, scales	position over, under, underneath above, below, top, bottom, side, on, in, outside, inside, around, in front, behind, front, back, before, after, beside, next to opposite, apart, between, middle, edge, centre, corner direction, journey, route, map, plan left, right, up, down, higher, lower forwards, backwards, sideways, across, close, far, near along, through, to, from, towards, away from ascend, descend grid, row, column, origin, coordinates clockwise, anti-clockwise compass point, north, south, east, west (N, S, E, W) north-east, north-west, south-east, south-west (NE, NW, SE, SW) horizontal, vertical, diagonal movement, slide, roll whole turn, half turn, quarter turn, rotate angle,is a greater/smaller angle than right angle, degree straight line, stretch, bend ruler, set square, angle measurer, compasses	survey, questionnaire data, database graph, block graph, line graph represent group, set list, chart, bar chart, bar line chart table, frequency table Carroll diagram, Venn diagram label, title, axis, axes diagram most popular, most common least popular, least common maximum/minimum value temperature, degree, centigrade



#### Shape

shape, pattern
flat, line curved, straight
round
hollow, solid
sort make, build, construct, draw, sketch
perimeter
centre, radius, diameter
surface
angle, right-angled
congruent base, square-based
size

bigger, larger, smaller symmetry, symmetrical, symmetrical pattern, line, symmetry, reflect, reflection

axis of symmetry, reflective symmetry pattern, repeating pattern, match, regular, irregular

2D Shapes	3D Shapes
2-D, two-dimensional corner, side point, pointed rectangle (including	3-D, three-dimensional face, edge, vertex, vertices cube, cuboid
square), rectangular, oblong rectilinear circle, circular triangle, triangular	pyramid
equilateral triangle, isosceles triangle, scalene triangle pentagon, pentagonal	sphere, hemisphere, spherical cone cylinder, cylindrical prism, triangular
hexagon, hexagonal	prism
heptagon	tetrahedron, polyhedron
octagon, octagonal quadrilateral parallelogram, rhombus, trapezium	octahedron
polygon right -angled parallel, perpendicular x-axis, y-axis, quadrant	



### Mathematical Vocabulary by Term Mastery, Reasoning and Problem Solving Language

EYFS	Key Stage 1	Key Stage 2
pattern	pattern	pattern, puzzle, problem
puzzle	puzzle, problem	calculate, calculation
answer	answer, explain	mental calculation
right, wrong	right, wrong	method, known facts, degree of accuracy
what could we try next?	what could we try next?	answer, explain
how did you work it out?	how did you work it out?	right, correct, wrong
count, sort	count out, share out, left, left over	what could we try next?
group, set	number sentence	how did you work it out?
match	sign, operation	number sentence
same, different		sign, operation, symbol, equation
list		
	Year 2: calculate, calculation	USK2: strategy
	mental calculation	
How do you know?	What method did you use?	What does this represent?
Can you show me in a different way?		Can you tell me a story?
Is your partner right?	What does this represent?	Can you prove it?
What can you see?	Can you represent it differently?	True or false
Is it equal to?	Can you tell me a story?	What did this person do? How did they get there?
	Can you prove it?	What mistake did I make?
	True or false	What method did you use?
	What did this person do? How did they get there?	
	What mistake did I make?	

