

Number and Place Value

Knowledge Organiser

Key Vocabulary

hundreds

tens

ones

zero

place value

greater than

less than

order

more

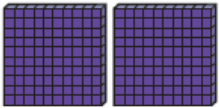
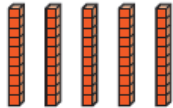

less

partition

digit

3-Digit Numbers

256

two hundred	fifty	six
		
200	50	6

Counting in 4s and 8s

0	4	8	12	16	20	24	28	32	36	40
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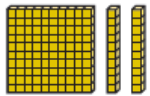
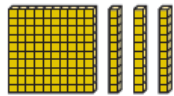
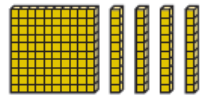
0	8	16	24	32	40	48	56	64	72	80
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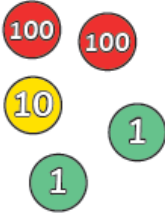
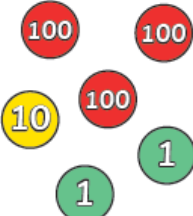
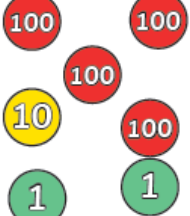
Counting in 50s and 100s

0	50	100	150	200	250	300	350	400	450	500
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0	100	200	300	400	500	600	700	800	900	1000
---	-----	-----	-----	-----	-----	-----	-----	-----	-----	------

10 and 100 More or Less

Ten Less		Ten More
		
120	130	140

One Hundred Less		One Hundred More
		
212	312	412

Key Vocabulary

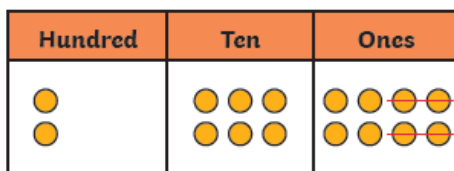
add
total
plus
sum
more
altogether
difference
subtract
less
minus
take away
column addition
column subtraction
exchange
estimate
inverse operation
solve problems
number facts
place value

Addition and Subtraction Methods

3-digit and 1-digit numbers

Not crossing 10s

$$268 - 4 = 264$$



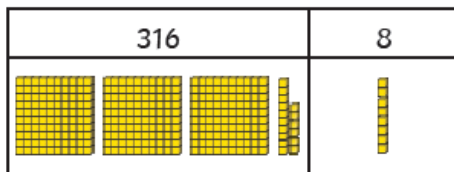
$$343 + 6 = 349$$



Crossing 10s **(Regrouping)**



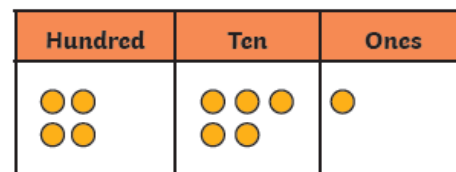
$$316 + 8 = 324$$



$$324 - 8 = 316$$

3-digit and 2-digit numbers

Add and subtract tens



$$451 + 3 \text{ tens} = 481 \quad (5 + 3 = 8)$$

$$451 - 4 \text{ tens} = 411 \quad (5 - 4 = 1)$$

Crossing 10s **(Regrouping)**

$$258 + 80 = 338$$

- Column method
- Count in 10s mentally
- Add 100, subtract 20

Crossing 10 and 100

$$\begin{array}{r} 368 \\ +73 \\ \hline 1 \\ 1 \end{array} \quad \begin{array}{r} 368 \\ +73 \\ \hline 41 \\ 11 \end{array} \quad \begin{array}{r} 368 \\ +73 \\ \hline 441 \\ 11 \end{array}$$

$$\begin{array}{r} 3131 \\ 441 \\ -73 \\ \hline 8 \\ 68 \\ 368 \end{array} \quad \begin{array}{r} 3131 \\ 441 \\ -73 \\ \hline 68 \\ 368 \end{array} \quad \begin{array}{r} 3131 \\ 441 \\ -73 \\ \hline 368 \\ 368 \end{array}$$

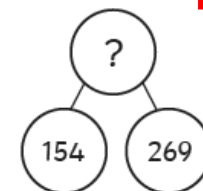
3-digit numbers

Not crossing

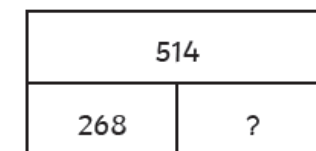
$$679 - 351 = 328$$



Crossing 10s **(Regrouping)**



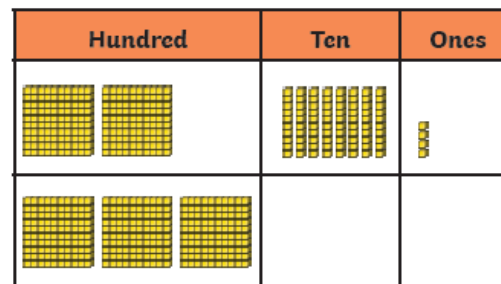
$$\begin{array}{r} 269 \\ +154 \\ \hline 423 \\ 11 \end{array}$$



$$\begin{array}{r} 4101 \\ 514 \\ -268 \\ \hline 246 \end{array}$$

Add and Subtract 100s

$$284 + 300 = 584$$



Key Vocabulary

Multiplication and Division Facts (3, 4 and 8 multiplication tables)

times tables

multiply by

divide by

array

fact families

regrouping

x	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

3 x Tables

$$1 \times 3 = 3$$

$$2 \times 3 = 6$$

$$3 \times 3 = 9$$

$$4 \times 3 = 12$$

$$5 \times 3 = 15$$

$$6 \times 3 = 18$$

$$7 \times 3 = 21$$

$$8 \times 3 = 24$$

$$9 \times 3 = 27$$

$$10 \times 3 = 30$$

$$11 \times 3 = 33$$

$$12 \times 3 = 36$$

$$3 \div 3 = 1$$

$$6 \div 3 = 2$$

$$9 \div 3 = 3$$

$$12 \div 3 = 4$$

$$15 \div 3 = 5$$

$$18 \div 3 = 6$$

$$21 \div 3 = 7$$

$$24 \div 3 = 8$$

$$27 \div 3 = 9$$

$$30 \div 3 = 10$$

$$33 \div 3 = 11$$

$$36 \div 3 = 12$$

4 x Tables

$$1 \times 4 = 4$$

$$2 \times 4 = 8$$

$$3 \times 4 = 12$$

$$4 \times 4 = 16$$

$$5 \times 4 = 20$$

$$6 \times 4 = 24$$

$$7 \times 4 = 28$$

$$8 \times 4 = 32$$

$$9 \times 4 = 36$$

$$10 \times 4 = 40$$

$$11 \times 4 = 44$$

$$12 \times 4 = 48$$

$$4 \div 4 = 1$$

$$8 \div 4 = 2$$

$$12 \div 4 = 3$$

$$16 \div 4 = 4$$

$$20 \div 4 = 5$$

$$24 \div 4 = 6$$

$$28 \div 4 = 7$$

$$32 \div 4 = 8$$

$$36 \div 4 = 9$$

$$40 \div 4 = 10$$

$$44 \div 4 = 11$$

$$48 \div 4 = 12$$

8 x Tables

$$1 \times 8 = 8$$

$$2 \times 8 = 16$$

$$3 \times 8 = 24$$

$$4 \times 8 = 32$$

$$5 \times 8 = 40$$

$$6 \times 8 = 48$$

$$7 \times 8 = 56$$

$$8 \times 8 = 64$$

$$9 \times 8 = 72$$

$$10 \times 8 = 80$$

$$11 \times 8 = 88$$

$$12 \times 8 = 96$$

$$8 \div 8 = 1$$

$$16 \div 8 = 2$$

$$24 \div 8 = 3$$

$$32 \div 8 = 4$$

$$40 \div 8 = 5$$

$$48 \div 8 = 6$$

$$56 \div 8 = 7$$

$$64 \div 8 = 8$$

$$72 \div 8 = 9$$

$$80 \div 8 = 10$$

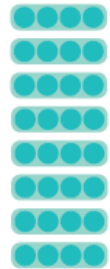
$$88 \div 8 = 11$$

$$96 \div 8 = 12$$

Write and Calculate Mathematical Statements

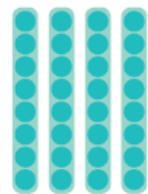
$$4 \times 8 = 32$$

$$32 \div 8 = 4$$



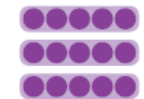
$$8 \times 4 = 32$$

$$32 \div 4 = 8$$



$$5 \times 3 = 15$$

$$15 \div 3 = 5$$



$$3 \times 5 = 15$$

$$15 \div 5 = 3$$



Related Calculations

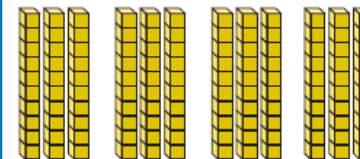
$$3 \times 4 = 12$$



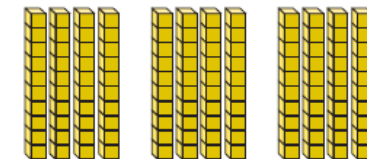
$$4 \times 3 = 12$$



$$30 \times 4 = 120$$



$$40 \times 3 = 120$$



Writing Mat Expected Year 3

Punctuation Power!	
A	Capital letters for the start of sentences, names and places.
.	A full stop at the end of a sentence.
!	Exclamation marks for exclamations or surprise.
?	Question marks for questions.
'	Apostrophes for showing something belongs to someone and to mark missing letters in contracted words, e.g. didn't.
,	Commas to separate items on a list.
“”	Inverted commas to show direct speech.

Fantastic Ways to Show Time, Place and Cause in Your Sentences		
Subordinating Conjunctions		
when	before	because
after	while	
Prepositions		
in	during	because of
over	near	until
above	behind	
Adverbs		
next	soon	then
therefore		

Can you squeeze in some co-ordinating conjunctions?	
F	for
A	and
N	nor
B	but
O	or
Y	yet
S	so

Know your Prefixes
un- means not
pre- means before
mis- means wrong
super- means above
re- means again
sub- means under
inter- means between
anti- means against
auto- means self
im/ir/in/il- mean not

Which is Witch? Don't Muddle Your Homophones
there/their/they're
our/are
two/too/to
your/you're
here/hear

Super Spellings... I need to know most of these:					
accident	centre	experience	important	ordinary	reign
accidentally	century	experiment	interest	particular	remember
actual	certain	extreme	island	peculiar	sentence
actually	circle	famous	knowledge	perhaps	separate
address	complete	favourite	learn	popular	special
although	consider	February	length	position	straight
answer	continue	forwards	library	possess	strange
appear	decide	fruit	material	possession	strength
arrive	describe	grammar	medicine	possible	suppose
believe	different	group	mention	potatoes	surprise
bicycle	difficult	guard	minute	pressure	therefore
breath	disappear	guide	natural	probably	though
breathe	early	heard	naughty	promise	thought
build	earth	heart	notice	purpose	through
busy	eight	height	occasion	quarter	various
business	eighth	history	occasionally	question	weight
calendar	enough	imagine	often	recent	woman
caught	exercise	increase	opposite	regular	women

Don't forget to organise your writing into **paragraphs**. Each one needs a few sentences linked to the same theme.

Knowledge organiser

Within living memory...

Masato Sagawa (1943-)



Creator of the strongest permanent magnet.

Beyond living memory...

Leonardi Da Vinci (1452-1519)



Inventor who investigated forces and friction.

Vocabulary

Tier 2: push, pull, surface, movement, magnet, attract, repel, north/south pole, metal, iron, steel, nickel

Tier 3: contact/non-contact force, friction, resistance, gravity, magnetic field, magnetism, horseshoe/bar/ring magnet

Disciplinary: observe, identify, method, fair test, variable, conclusion, predict, record, data

Magnetic Materials

Iron	Nickel	Steel	Stainless steel
			





Knowledge Organiser- Spatial Sense (Geography Year 3)

Key Vocabulary	Definition
Eight-point compass	A tool used for navigation, shows the following directions; north, north-east, east, south-east, south, south west, west and north west.
Grid reference	A set of information (often a letter and a number) that locates a place on a map.
Symbols	Small simple pictures that represent different things on a map.
Key	A key gives information about the symbols included on a map.
Human features	Man-made features of an area, for example, buildings, bridges and roads.
Physical features	Natural features of an area, for example, rivers, hills, valleys.

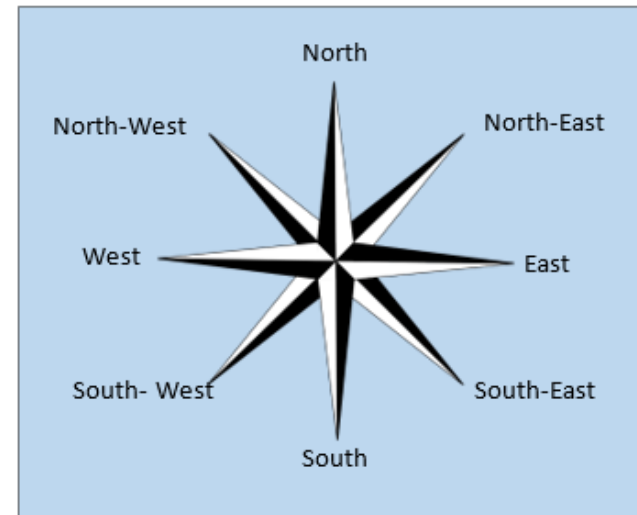
Map of the Local Area



Contrasting Physical Geography

Naples - Italy	Hildenborough - UK
<p>Map of Italy showing major volcanoes in red. Labels include Campi Flegrei, Vesuvius, Panarea, Stromboli, Etna, and Vulcano. The map also shows the Tyrrhenian Sea, Adriatic Sea, and Mediterranean Sea.</p>	<p>Topographic map of the United Kingdom showing elevation contours and major cities.</p>

Eight Point Compass



Spanish - Greetings with puppets

¡Hola!

Kapow
Primary



¡Hola!

Hello!



buenos días

good morning



buenas tardes

good afternoon



buenas noches

good night



adiós

goodbye



¿Cómo te llamas?

What is your name?



Me llamo...

My name is...



¿Y tú?

And you?



¿Qué tal?

How are you?



bien

good



muy bien

very good



fantástico

fantastic



mal

bad



muy mal

very bad



sí

yes



no

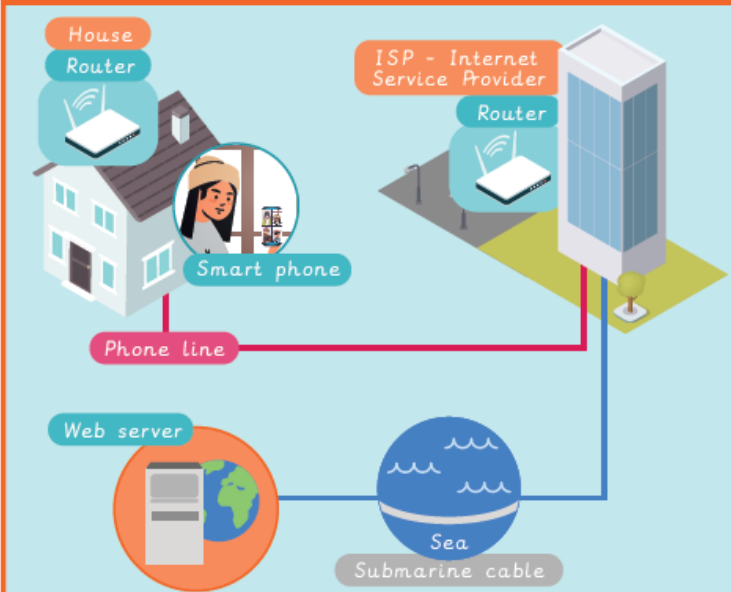
no

Networks and the internet

Device	Equipment created for a certain purpose or job.
DSL	Digital Subscriber Line. An internet connection for rural areas, where wired services are not available. It uses communication satellites to send and receive data and is a slower internet connection than wired connections.
File	An item on a computer that can keep data in various forms such as images, music and documents.
Internet	A worldwide network, enabling tens of millions of computers around the globe to share vast amounts of information, and communicate with other online users across the globe.
Network	When more than one electronic device is connected in a network through the internet or a local connection in order to share files and information.
Network map	A diagram that shows what type of and how many devices are on a network. It also shows how they are connected to each other.
Network switch	A device that deals with the movement of network information.
Router	The main device responsible for providing internet access to a network, and can be connected to through a wired connection or WiFi.
Server	A computer or computer program that provides data and information to other computing devices.
Submarine cables	Cables that run under the sea to allow information to be accessed and (shared around the world or across continents.)
The Cloud	Refers to data and files that are stored and accessed on servers via the internet.
WiFi	When you have, or can connect to a network that is wireless.
Wired	An electronic device is considered 'wired' when it is connected to the network through cables.
Wireless	An electronic device is considered 'wireless' when it is connected to the network through signals.
Wireless access point	A device that enables other electronic items to connect wirelessly to the internet.

Key facts

Network map:

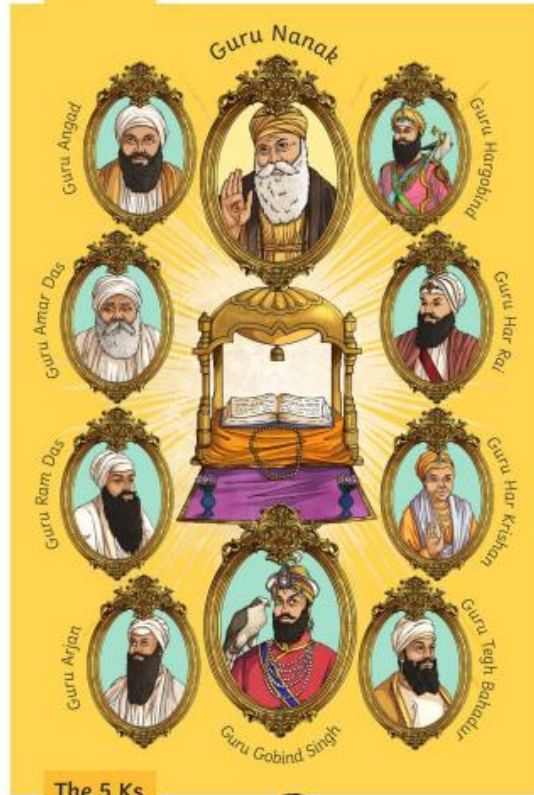


The internet can be used for:

- Communicating (email, video call, voice call etc.)
- File sharing
- Websites
- Uploading and downloading files
- Streaming media (videos, music etc.)
- Playing online games

Sikhism

gurus



symbols



festivals



The 5 Ks

