Number Sense Maths

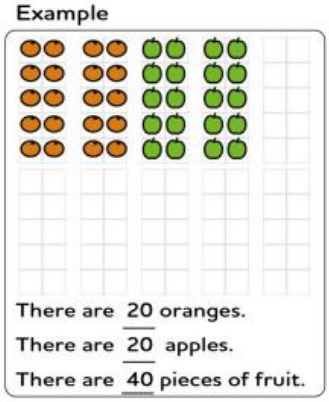
Summer 2 – Year 2

Y2 Week 1

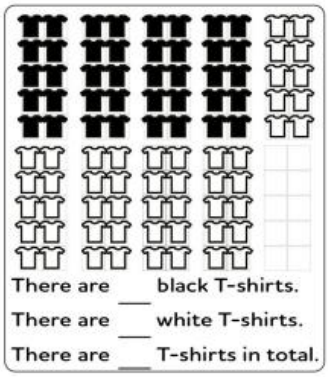
Calculating with Multiples of 10	This book teaches children to count in multiples of 10, to write multiples of 10 in numerals (20, 30, 40, 50, 60, 70, 80, 90 and 100), and to "read and write" these numbers as multiples of 10 e.g., six tens. With this understanding secure, children are then taught to apply the addition and subtraction facts within 10 that they know, to add and subtract groups of 10. For example, we know 2 + 6 = 8 so 2 tens + 6 tens = 8 tens. 20 + 60 = 80.

Fill in the missing numbers.

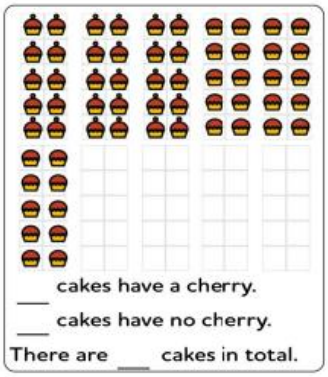
Example



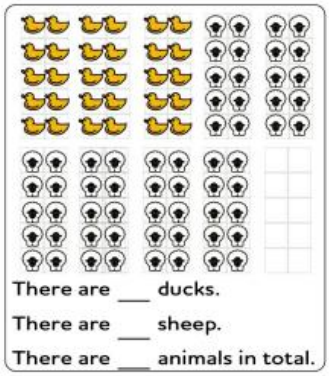
There are 20 oranges.
There are 20 apples.
There are 40 pieces of fruit.



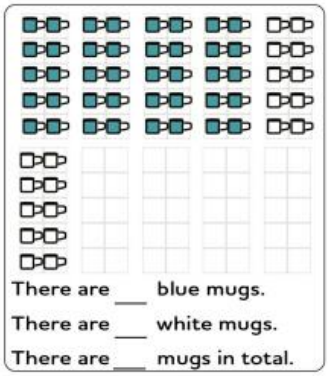
There are ___ black T-shirts.
There are ___ white T-shirts.
There are ___ T-shirts in total.



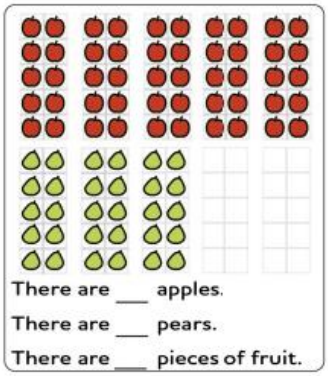
___ cakes have a cherry.
___ cakes have no cherry.
There are ___ cakes in total.



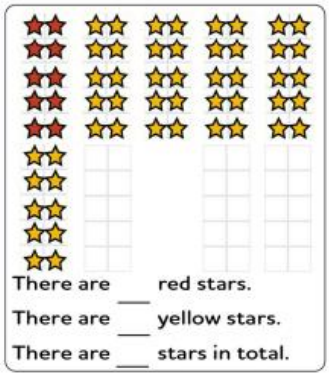
There are ___ ducks.
There are ___ sheep.
There are ___ animals in total.



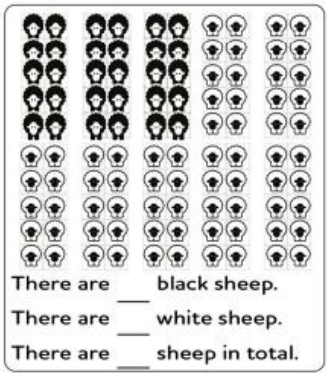
There are ___ blue mugs.
There are ___ white mugs.
There are ___ mugs in total.



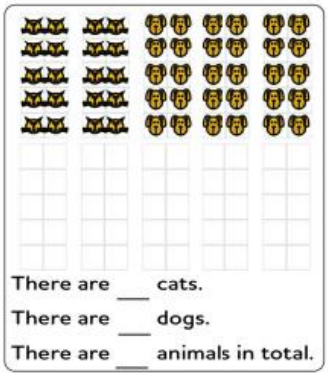
There are ___ apples.
There are ___ pears.
There are ___ pieces of fruit.



There are ___ red stars.
There are ___ yellow stars.
There are ___ stars in total.



There are ___ black sheep.
There are ___ white sheep.
There are ___ sheep in total.



There are ___ cats.
There are ___ dogs.
There are ___ animals in total.

Talking Tip

The focus of this exercise is on describing two parts and a whole, where both parts are multiples of 10. Encourage your child to subitise (see without counting) the number of each item, e.g. "We can see that there are two groups of 10 oranges, so 20 oranges. We can see that there are two groups of 10 apples, so 20 apples. Altogether we can see that there are 40 pieces of fruit."

Stage 6 Book 1

Two-Digit Numbers: Calculating with Ones	By now, children should be confident partitioning two-digit numbers into a tens part and a ones part. This book builds on this understanding to teach children to apply the their addition and subtraction facts within 10 when adding or subtracting ones to a two-digit number. For example, using the knowledge that 5+3=8 to help solve 25+3.

Complete the addition fact and use it to solve the second equation.

Example

Ones		Ones		Ones
1	+	4	=	5

Tens	Ones		Ones		Tens	Ones
3	1	+	4	=	3	5

Ones		Ones		Ones
2	+	7	=	

Tens	Ones		Ones		Tens	Ones
6	2	+	7	=		

Ones		Ones		Ones
5	+	2	=	

Tens	Ones		Ones		Tens	Ones
8	5	+	2	=		

Ones		Ones		Ones
5	+	3	=	

Tens	Ones		Ones		Tens	Ones
1	5	+	3	=		

Ones		Ones		Ones
4	+	4	=	

Tens	Ones		Ones		Tens	Ones
5	4	+	4	=		

Ones		Ones		Ones
1	+	8	=	

Tens	Ones		Ones		Tens	Ones
7	1	+	8	=		

Ones		Ones		Ones
3	+	6	=	

Tens	Ones		Ones		Tens	Ones
2	3	+	6	=		

Ones		Ones		Ones
3	+	3	=	

Tens	Ones		Ones		Tens	Ones
4	3	+	3	=		

Ones		Ones		Ones
4	+	5	=	

Tens	Ones		Ones		Tens	Ones
9	4	+	5	=		

Ones		Ones		Ones
2	+	6	=	

Tens	Ones		Ones		Tens	Ones
3	2	+	6	=		

Talking Tip

The focus of this exercise is using addition facts within 10 to add ones where one number is a two-digit number. Place value tables are used to support here.

Help children to see how they can use the first calculation to solve the second one. "We know that 1 + 4 = 5. In 31 + 4 we just have 3 extra tens. We still calculate 1 + 4, which is 5, and when we combine it with the 3 tens, we have 35."

Two-Digit Numbers: Calculating with Tens	This book teaches children to apply their addition and subtraction facts within 10 when adding or subtracting multiples of 10 to a two-digit number. For example, using knowledge that 3+2=5, and 9+0=9 to solve 39+20.

Complete the first addition and use it to solve the second.

Example

Tens	Ones		Tens	Ones	=	Tens	Ones
2	0	+	3	0	=	5	0
2	7	+	3	0	=	5	7

Tens	Ones		Tens	Ones	=	Tens	Ones
3	0	+	4	0	=		
3	9	+	4	0	=		

Tens	Ones		Tens	Ones	=	Tens	Ones
1	0	+	5	0	=		
1	2	+	5	0	=		

Tens	Ones		Tens	Ones	=	Tens	Ones
5	0	+	3	0	=		
5	1	+	3	0	=		

Tens	Ones		Tens	Ones	=	Tens	Ones
6	0	+	3	0	=		
6	4	+	3	0	=		

Tens	Ones		Tens	Ones	=	Tens	Ones
2	0	+	7	0	=		
2	8	+	7	0	=		

Tens	Ones		Tens	Ones	=	Tens	Ones
4	0	+	4	0	=		
4	5	+	4	0	=		

Tens	Ones		Tens	Ones	=	Tens	Ones
3	0	+	3	0	=		
3	6	+	3	0	=		

Tens	Ones		Tens	Ones	=	Tens	Ones
2	0	+	6	0	=		
2	3	+	6	0	=		

Tens	Ones		Tens	Ones	=	Tens	Ones
4	0	+	5	0	=		
4	7	+	5	0	=		

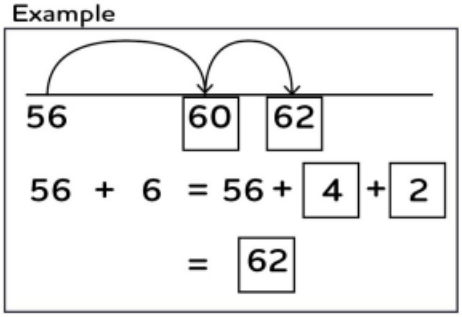
Talking Tip

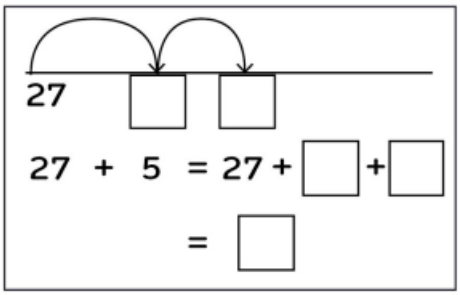
The focus of this exercise is using knowledge of adding multiples of 10, to add a multiple of 10 to another two-digit number. Place value tables are used here for support. Help children to see how they can use the first calculation to solve the second one. "We know that 20 + 30 = 50. In 27 + 30 we just have 7 extra ones. We still calculate 20 + 30, which is 50, and when we combine it with the 7 ones, we have 57."

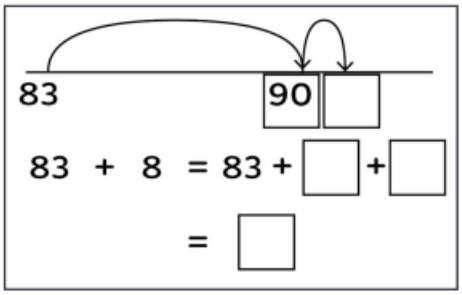
Make the Next Ten and Then: Addition	This book builds on the "Make 10 and Then" strategy for addition taught in Stage 5 Book 1. Children are taught to extend the strategy when they add across a multiple of 10. First they must make the "next 10" and then they add the rest. For example, 56+6 can be thought of as 56+4+2. The children are taught to use this approach to partition the single digit addend even when it occurs first. For example, 3+49 should be thought of as 49+1+2.

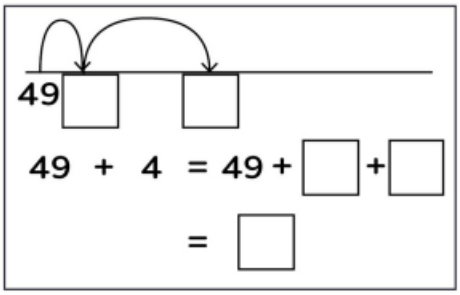
Solve the equation in two steps. Make the next ten and then the rest.

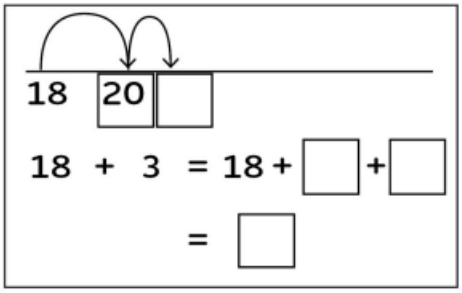
Example

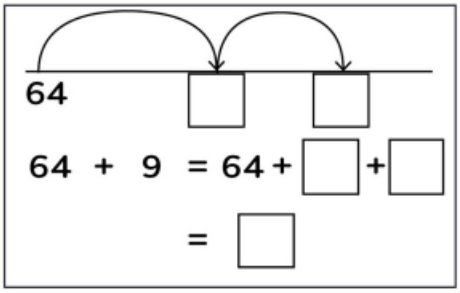


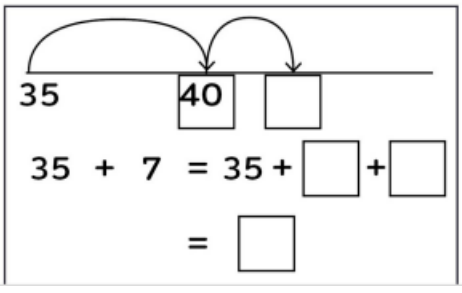


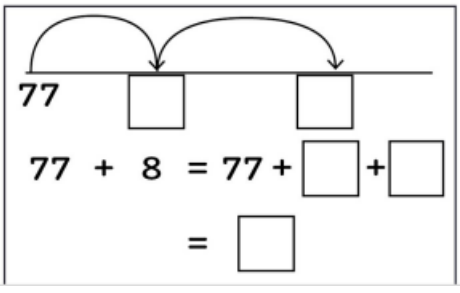












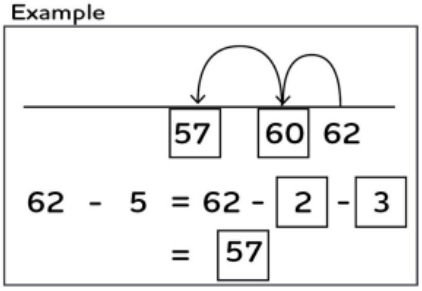
Talking Tip

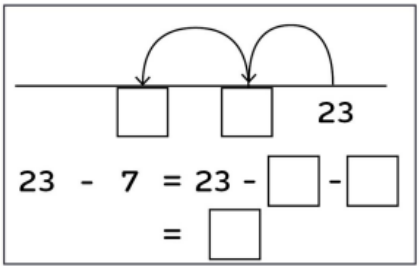
The focus of this exercise is using knowledge of making the next 10, to add across a multiple of 10. Use your language to help your child see that they should break the calculation into two steps in order to 'make the next ten and then'. "The calculation is 56 + 6. First we make the next 10. 56 + **4** makes 60. Then we add on the other 2. The answer is 62." Record the steps on the number line, and in the two part calculation underneath, and help your child relate the two to one another.

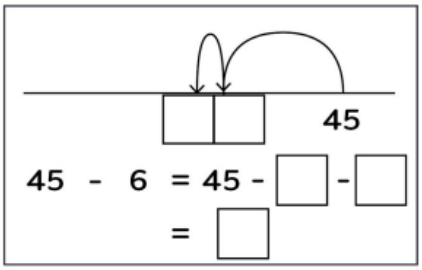
Make the Previous Ten and Then: Subtraction	This book builds on the "Make 10 and Then" strategy for subtraction taught in Stage 5 Book 2. First children are taught to extend their knowledge of subtracting from 10 to work out subtraction of a single digit number from a multiple of 10. Children are then taught to extend the "Make 10 and then" strategy when they subtract across a multiple of 10. First they must make the "previous 10" and then they subtract the rest. For example, 62-5 can be thought of as 62-2-3.

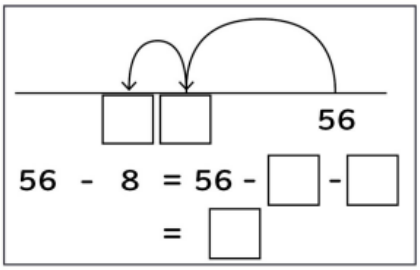
Solve the equation in two steps. Make the next ten and then subtract the rest.

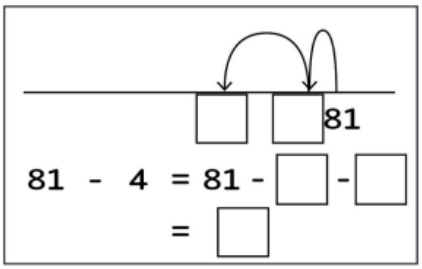
Example

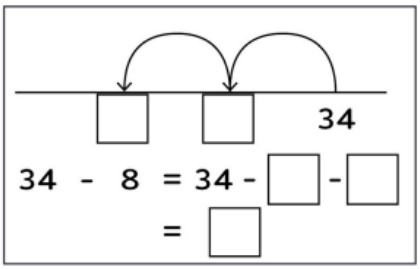


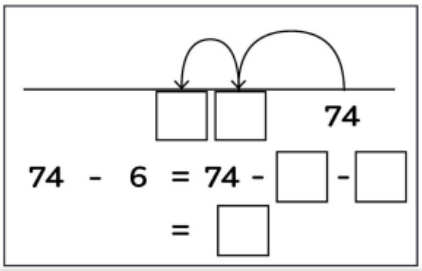


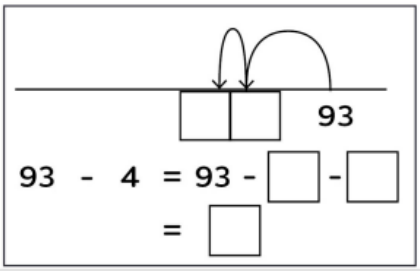












Talking Tip

The focus of this exercise is using knowledge of subtracting by making 10 and then, to subtract across a multiple of 10. Explain to your child that they should break the calculation into two steps in order to 'make the previous ten and then'. "The calculation is 62 - 5. First we make the previous 10. 62 - 2 makes 60. Then we subtract the remaining 3. The answer is 57." Record the steps on the number line, and in the two part calculation underneath, and help your child relate the two to one another.

Number Sense Maths

Summer 2 – Year 2