

# Spring Test 3

## Teacher guidance



### Skills and knowledge needed for this test:

- Addition and subtraction of two three-digit numbers crossing column boundaries
- Addition of two numbers up to four digits
- Addition and subtraction of fractions with the same denominator, within 1
- Missing number statements with all four operations
- Multiplication and division by 1, 2, 3, 4, 5, 8, 9, 10 and 11 including deriving multiples of 10
- Multiplication by 0
- Multiplication of three numbers
- Formal written method for short multiplication and short division
- Find a half, a third, a quarter, two quarters or three quarters of an amount

## New: Subtraction of two numbers up to four digits

### A teaching suggestion

**Step 1** Explain that the children are going to play the 'Pirate Game'. Display the number 5471, explaining this is the treasure. Select four children. Give one five cards with '1000' written on, the next four cards saying '100', the next seven cards saying '10' and the last one card with '1' written on. You are the pirate.

**Step 2** Underneath the 5471 write '– 2655'. Explain that this has to be 'paid' to the pirate.

**Step 3** Ask the 'ones' child for 5. They do not have it so must ask the 'tens' child to help. The 'tens' child responds: 'I'm only giving you one!' and gives one of their tens to the 'ones' child, who swaps it for 10 ones as 'ones' children cannot hold tens!

**Step 4** Alter the displayed sum to show that the 'tens' child is now holding 6 tens and the 'ones' child is holding 11 ones: The ones and tens can now be subtracted, and the answers written in. Ask the 'hundreds' child for 6, which they do not have, so they ask the 'thousands' child to help. The 'thousands' child responds: 'I'm only giving you one!' and gives one of the thousands to the 'hundreds' child, who immediately swaps it for 10 hundreds as 'hundreds' children cannot hold thousands!

**Step 5** Alter the displayed sum to show that the 'thousands' child is now holding 4 thousands and the 'hundreds' child is holding 14 hundreds:

$$\begin{array}{r} 4514 \overset{11}{\cancel{7}} \\ - 2655 \\ \hline 16 \end{array}$$

The subtraction can now be completed.

**Step 6** Play the game with different subtractions. Allow the children to be dramatic!

Question number	Question	Answer	Marks	Related test
1	$8 = \square \times 8$	1	1	Y4 Autumn Test 3, Y4 Autumn Test 6
2	$480 - 300 = \square$	180	1	Y3 Spring Test 3
3	$6 \times 0 = \square$	0	1	Y4 Autumn Test 4
4	$\square = 3 \times 9$	27	1	Y4 Spring Test 2, Y3 Spring Test 1
5	$18 \div 1 = \square$	18	1	Y4 Autumn Test 6
6	$\frac{2}{5} + \frac{2}{5} = \square$	$\frac{4}{5}$	1	Y3 Spring Test 6
7	$\square = 121 \div 11$	11	1	Y4 Autumn Test 5
8	$53 - 26 = \square$	27	1	Y3 Autumn Test 3
9	$50 \times 8 = \square$	400	1	Y3 Spring Test 2, Y3 Summer Test 3
10	$\square \times 8 = 24$	3	1	Y4 Autumn Test 3, Y3 Summer Test 3
11	$560 + \square = 590$	30	1	Y3 Autumn Test 1, Y3 Autumn Test 6
12	$72 \div 9 = \square$	8	1	Y4 Spring Test 2
13	$58 + 77 = \square$	135	1	Y3 Summer Test 2
14	$\square = 96 \div 8$	12	1	Y3 Summer Test 3
15	$76 \div 4 = \square$	19	1	Y4 Autumn Test 2, Y3 Spring Test 4
16	$3723 + 1454 = \square$	5177	1	Y4 Spring Test 1
17	$56 \times 3 = \square$	168	1	Y4 Autumn Test 1, Y3 Spring Test 1
18	$42 = 3 \times \square$	14	1	Y4 Autumn Test 2, Y4 Autumn Test 3
19	$5142 - 2536 = \square$	2606	1	Y4 Spring Test 3
20	$\square - 57 = 46$	103	1	Y3 Autumn Test 1, Y3 Summer Test 2
21	$3364 + 3777 = \square$	7141	1	Y4 Spring Test 1
22	$6325 - 1427 = \square$	4898	1	Y4 Spring Test 3
Total marks			22	