

$$a \times 4 = 40$$

$$a + 10 = 20$$

$$a - 10 = 0$$

$$a \div 2 = 5$$

$$3a = 30$$

$$a \div 5 = 2$$

$$a \overset{50}{\times} 5 + 3 = 53$$

$$3a - 1 = 29$$

$$(a \overset{13}{+} 3) \times 2 = 26$$

What is the output when 10 is substituted for  $a$  in these equations.

a) Complete the table.

Number of weeks	1	2	3	5	10
Number of days	7	14	21	325	70

b) Complete the formula to show the relationship between days ( $d$ ) and weeks ( $w$ ).

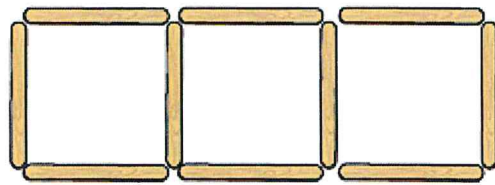
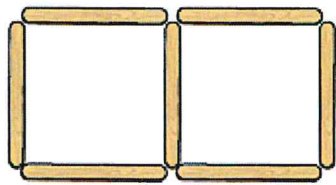
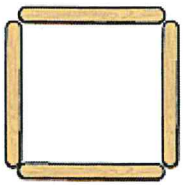
$$d = w \times 7$$

$$d = 7w$$

c) How many days are there in 32 weeks? 224

$$\begin{array}{r} 32 \\ \times 7 \\ \hline 224 \\ \hline \end{array}$$

Dora makes a square pattern using lolly sticks.



She records the number of squares and sticks in a table.

Continue the pattern and complete the table.

Number of squares, $s$	1	2	3	4	5
Number of lolly sticks, $l$	4	7	10	13	16

~~Circle~~ <sup>Write</sup> the formula that describes the pattern.

$$L = 3s + 1$$

Complete the table.

$x$	$5x$	$5x - 1$
2	10	9
10	50	49
12	60	59
5	25	24
7	35	34
20	100	99

The Wooden Letter Company sells wooden letters for £2 each, plus £1.50 for delivery of each order.



a) Whitney places an order for the letters to spell out her name.

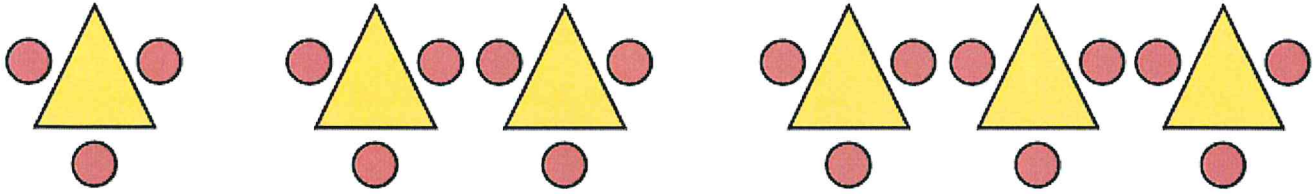
↗ How much does it cost? £15.50

$$7 \times 2 = 14 + 1.50$$

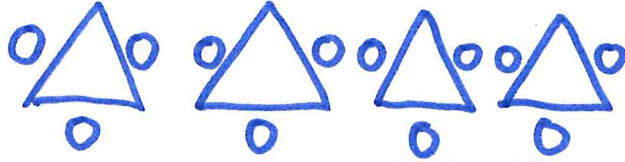
b) Write a formula to show the cost ( $c$ ) for the number of letters ( $n$ ).

$$c = 2n + 1.5$$

Scott builds a pattern using triangles and circles.



a) Draw the next diagram in the pattern.



b) Scott records the number of triangles and circles in a table.

Complete the table.

Number of triangles	1	2	3	4	5
Number of circles	3	6	9	12	15

a) Complete the table.

Number of weeks	1	2	3	5	10
Number of days	7	14	21	35	70

b) Complete the formula to show the relationship between days ( $d$ ) and weeks ( $w$ ).

$$d = \boxed{7} w$$

c) How many days are there in 32 weeks?

$$\begin{array}{r} 32 \\ \times 7 \\ \hline 224 \end{array} = 224 \text{ days}$$