



ANSWERS & MARK SCHEME

Year 6 Arithmetic Practice Paper 1

40 marks. Each row states what earns the mark for that question — where equivalents are acceptable (a fraction in another form, or the matching decimal) the notes say so. An answer written outside the box that is clearly the child's final answer still earns the mark.

Q	Answer	Marks	Notes
1	5,548	1	
2	4,493	1	
3	144	1	
4	11,866	1	
5	9	1	
6	66,000	1	
7	1,806	1	
8	$\frac{5}{9}$	1	
9	13.1	1	
10	6.13	1	
11	121	1	
12	6,645	1	
13	3,252	1	
14	198	1	
15	922	1	
16	80	1	
17	386	1	
18	$1\frac{5}{12}$	1	Accept $\frac{17}{12}$.



Q	Answer	Marks	Notes
19	22	1	
20	22,195	1	
21	88,155	2	2 marks for the correct answer; 1 mark for a correct formal method with one arithmetic error.
22	$\frac{1}{8}$	1	Accept 0.125.
23	3.62	1	
24	$\frac{5}{24}$	1	
25	$3\frac{5}{8}$	1	Accept $\frac{29}{8}$ or 3.625.
26	86	2	2 marks for the correct answer; 1 mark for a correct formal method with one arithmetic error.
27	180	1	
28	134	1	
29	$\frac{5}{24}$	1	
30	30.38	1	
31	142,623	2	2 marks for the correct answer; 1 mark for a correct formal method with one arithmetic error.
32	$\frac{5}{24}$	1	
33	120	1	
34	3,815	1	
35	58	2	2 marks for the correct answer; 1 mark for a correct formal method with one arithmetic error.
36	$1\frac{7}{12}$	1	Accept $\frac{19}{12}$.



HOW TO WORK THEM OUT

8 $\frac{2}{9} + \frac{3}{9} = \frac{5}{9}$

Add the fractions on one bar

$\frac{2}{9}$ (coral) + $\frac{3}{9}$ (teal) = $\frac{5}{9}$



Answer: $\frac{5}{9}$

14 $\frac{1}{4}$ of 792 = 198

Fraction of an amount as a bar model

792 split into 4 equal parts
each part = $792 \div 4 = 198$



1 part shaded = 198

16 $248 - 28 \times 6 = 80$

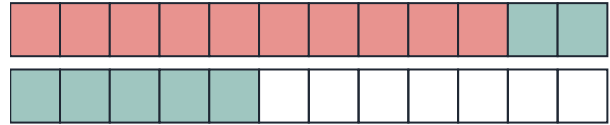
Order of operations

Brackets, then $\times$ and $\div$, then $+$ and $-$. Answer: **80**.

18 $\frac{5}{6} + \frac{7}{12} = 1\frac{5}{12}$

Add the fractions on one bar

$\frac{5}{6} = \frac{10}{12}$ (coral) $\frac{7}{12} = \frac{7}{12}$ (teal) $\rightarrow \frac{17}{12}$ altogether



Answer: **$1\frac{5}{12}$**



19 $25\% \text{ of } 88 = 22$

Percentages from 10% and 1% chunks

whole bar = 88, each section = $10\% = 8.8$



25% = 22

$$2 \times 10\% + 5 \times 1\% = 2 \times 8.8 + 5 \times 0.88 = 22$$

21 $3,265 \times 27 = 88,155$

Long multiplication, shown as partial products

Split 27 into $20 + 7$:

$$3,265 \times 7 = 22,855$$

$$3,265 \times 20 = 65,300$$

$$\text{add them} = 88,155$$

Award 1 of the 2 marks for a correct formal method with a single arithmetic slip.

26 $2,494 \div 29 = 86$

Long division, shown as chunks of the divisor

$$29 \times 80 = 2,320 \quad \text{leaves } 174$$

$$29 \times 6 = 174 \quad \text{leaves } 0$$

$$80 + 6 = 86$$

Award 1 of the 2 marks for a correct formal method with a single arithmetic slip.

27 $45\% \text{ of } 400 = 180$

Percentages from 10% and 1% chunks

whole bar = 400, each section = $10\% = 40$



45% = 180

$$4 \times 10\% + 5 \times 1\% = 4 \times 40 + 5 \times 4 = 180$$



28 $127 + (20 + 15) \div 5 = 134$

Order of operations

Brackets, then $\times$ and $\div$, then $+$ and $-$. Answer: **134**.

31 $3,657 \times 39 = 142,623$

Long multiplication, shown as partial products

Split 39 into $30 + 9$:

$$3,657 \times 9 = 32,913$$

$$3,657 \times 30 = 109,710$$

$$\text{add them} = \mathbf{142,623}$$

Award 1 of the 2 marks for a correct formal method with a single arithmetic slip.

33 $24\% \text{ of } 500 = 120$

Percentages from 10% and 1% chunks

whole bar = 500, each section = $10\% = 50$



24% = 120

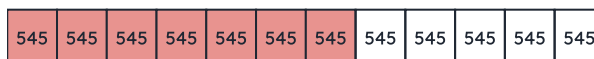
$$2 \times 10\% + 4 \times 1\% = 2 \times 50 + 4 \times 5 = \mathbf{120}$$

34 $\frac{7}{12} \text{ of } 6,540 = 3,815$

Fraction of an amount as a bar model

6,540 split into 12 equal parts

each part = $6,540 \div 12 = 545$



7 parts shaded = 3,815



35 $2,552 \div 44 = 58$

Long division, shown as chunks of the divisor

$$44 \times 50 = 2,200 \quad \text{leaves } 352$$

$$44 \times 8 = 352 \quad \text{leaves } 0$$

$$50 + 8 = 58$$

Award 1 of the 2 marks for a correct formal method with a single arithmetic slip.

36 $3 \frac{1}{4} - 1 \frac{2}{3} = 1 \frac{7}{12}$

Subtracting mixed numbers: improper fractions first

$$\begin{array}{rcl} 3 \frac{1}{4} & = & \frac{39}{12} \\ 1 \frac{2}{3} & = & \frac{20}{12} \end{array} \quad \text{common denominator 12}$$

$$\frac{39}{12} - \frac{20}{12} = \frac{19}{12} = 1 \frac{7}{12}$$