



Colin and Coco's Daily Maths Workout



Workout 4.11

Answers

Keep-uppI (Term 4)



KPIs for Term 4

Multiply 2-digit by a 1-digit using the distributive law

Multiply 3-digit by a 1-digit using a formal written method

Divide a 3-digit by a 1-digit number

Use place value, known and derived facts to multiply and divide mentally

Identify acute and obtuse angles



Multiply Workout

Workout A

$61 \times 3 = 183$

$23 \times 7 = 161$

	4	1	3
	×		6
	2	4	7
			8

	6	5	2
	×		7
	4	5	6
			4

$63 \times 3 = 189$

$46 \times 6 = 276$

	8	7	9
	×		7
	6	1	5
			3

	7	9	8
	×		9
	7	1	8
			2

$73 \times 3 = 219$

$63 \times 9 = 567$

$71 \times 4 = 284$

$315 \times 3 = 945$

$41 \times 5 = 205$

$363 \times 3 = 1,089$

Divide Workout

Workout B

$363 \div 3 = 121$

		1	1	4
6		6	8	4

		2	8	3
3		8	4	9

		7	1
6		4	2
			6

$348 \div 3 = 116$

		1	7	3
3		5	1	9

		1	1	7
6		7	0	2

		9	4
7		6	5
			8

$675 \div 5 = 135$

$654 \div 6 = 132$

Using Known Facts (and angles) Workout

Workout C

$40 \times 3 = 120$

$300 \times 4 = 1,200$

$210 \div 3 = 70$

$1,500 \div 5 = 300$

$50 \times 5 = 250$

$500 \times 7 = 3,500$

$560 \div 7 = 80$

$7,200 \div 9 = 800$

$7 \times 80 = 560$

$7 \times 900 = 6,300$

$1,320 \div 11 = 120$

$7,200 \div 12 = 600$

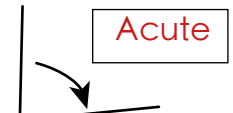
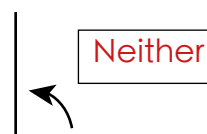
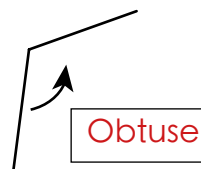
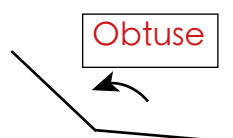
$12 \times 90 = 1,080$

$12 \times 1,100 = 13,200$

$1,440 \div 12 = 120$

$10,800 \div 12 = 900$

Acute, obtuse or neither?





Multiply and Divide Game

Workout D

You need:

Multiplying Game templates (see below for Game 1, Game 2 and Game 3)

Card Set A (print off the cards) for each player.

Card Set B (print off the cards) for each player.

To play:

Pick Game Template 1, 2 or 3

Each player shuffles Card Set A, places them face down and picks cards to create a number on the template.

Each player shuffles Card Set B, places them face down and picks cards to create a number on the template.

Both players now find the answer to their calculation.

To win:

The player who calculates the highest total wins a point.

The players then rearrange the cards to try and win a second point by calculating the lowest total.

The first player to get 10 points wins the Game.

Game 1

$$\boxed{A} \boxed{A} \times \boxed{B}$$

Game 2

$$\boxed{A} \boxed{A} \boxed{A} \times \boxed{B}$$

Game 3

$$\boxed{A} \boxed{A} \boxed{A} \div \boxed{B}$$



Multiplying and Dividing Cards

Set A

0	1	2	3	4
5	6	7	8	9

Set B

0	1	2	3	4
5	6	7	8	9



Multiply and Divide Workout

Workout E

Put digits in the empty boxes to make the calculations correct.

Complete them in several different ways, where possible.

Possible Solution

$$\boxed{8} \ 0 \times \boxed{7} = \boxed{5} \ 6 \ \boxed{0}$$

$$\begin{array}{r} 1 \ \boxed{6} \ \boxed{2} \\ \boxed{3} \overline{) \boxed{4} \ \boxed{8} \ \boxed{6}} \end{array}$$

$$\begin{array}{r} 1 \ \boxed{9} \ \boxed{7} \\ \times \quad \quad 6 \\ \hline \boxed{1} \ 1 \ \boxed{8} \ \boxed{2} \end{array}$$

Are there any boxes that it is impossible to put a 3 in? Why?

Are there any boxes that could have any of the digits in them?

Now complete it using the digits 0, 1, 2, 3, 4, 5, 6, 7, 8 and 9 at least once each.



Acute and Obtuse Angles Challenge

Workout F

Sketch the following shapes (as accurately as you can!)
One of them is not possible. Which one and how do you know?

Possible solutions

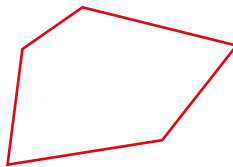
A quadrilateral with 2 obtuse angles and 2 acute angles.



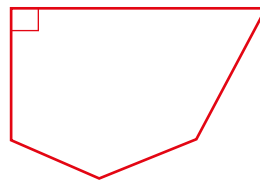
A quadrilateral with one right angle and one obtuse angle.



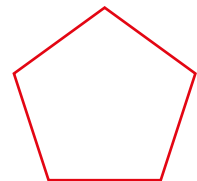
A pentagon with at least two obtuse angles and two acute angles.



A pentagon with one right angle.

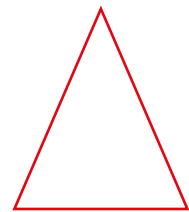


A pentagon with 5 obtuse angles.

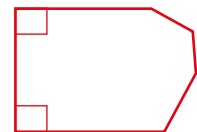


A triangle with one right angle, one acute angle and one obtuse angle. **Not possible**

A triangle with 3 acute angles.



A hexagon with 2 right angles and 4 obtuse angles.





Word Problem Workout

Workout G

1. A packet of crisp costs 60p
Coco buys 7 packets of crisps.
How much does she spend? £4.20

2. Colin packs 258 eggs into boxes.
Each box holds 6 eggs.
How many boxes does Colin need? 43

3. A bag contains 8 marbles.
Colin has 123 bags.
A box contains 6 marbles.
Coco has 167 boxes.
Who has the most marbles? How much more? Coco
18

4. Colin has 230 sticks.
What's the largest number of pentagons he can make? 46

5. Colin is making octagons using sticks.
How many sticks does he need to make 45 octagons? 360

6. Colin is buying a bike for £720.
He pays in 9 installments.
How much does he pay in each installment? £80

7. Coco earns £365 per month.
How much does she earn in 9 months? £3285

Create your own word problems



Matching Workout

Workout H

Match a number in Column A with an operation in Column B to make an answer in Column C.

Fill in the missing buddies.

60		$\times 5$		$= 375$
65		$\times 6$		$= 540$
70		$\times 7$		$= 560$
75		$\times 8$		$= 585$
80		$\times 9$		$= 595$
85		$\times 11$		$= 720$
90		$\times 12$		$= 880$

Match the calculations to their answers.

Fill in the missing buddies.

151×3		690
115×6		959
75×6		906
137×7		450
113×4		1,050
151×6		452
210×5		453

$625 \div 5$		123
$387 \div 3$		124
$512 \div 4$		125
$992 \div 8$		126
$369 \div 3$		127
$889 \div 7$		128
$756 \div 6$		129

Create your own Matching Workouts