

# NUMERACY NON-CALCULATOR



YEAR 7 2013

**SESSION 2** 

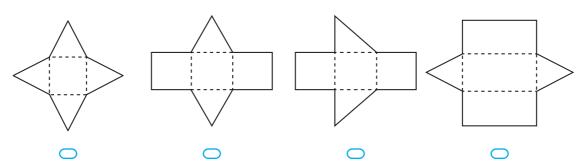
0:40

Time available for students to complete test: 40 minutes





Which of these nets will fold to make a pyramid?

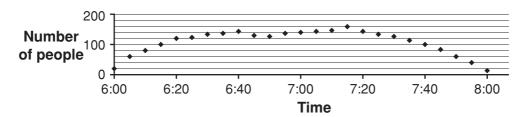


This spreadsheet shows the names of students in three teams.

	Α	В	С	D
1	Team 1	Team 2	Team 3	
2	Tom	Amy	Bob	
3	Kate	Jack	Raj	
4	Meg	Chris	Nina	
5				

Which student's name is in cell B3?

This graph shows the number of people in a school hall at 5-minute intervals over 2 hours.



At which of these times was the greatest number of people in the hall?

6:40

7:00

7:15

7:20



Billy had \$4.30. He bought a meat pie that cost \$3.95.

How much money does he have left?

\$0.35

\$1.45

\$1.65

\$8.25

 $\bigcirc$ 

0

**5** This fence has five sections of equal length.



Three of the sections have been painted black.

What percentage of the whole fence has been painted black?

3%

18%

30%

40%

60%

0

Matt painted the letter T on a paper square.

He folded the paper square along the dotted line while the paint was still wet.



He then unfolded the paper square.

What was on the square?





0



0

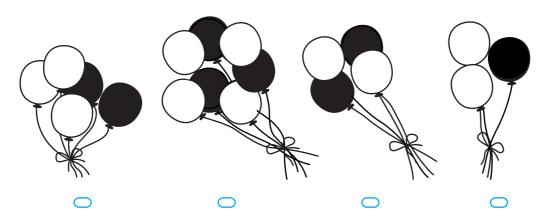


© ACARA 2013



Zac closes his eyes and takes one balloon from a bunch.

Which of these bunches gives Zac the best chance of taking a black balloon?



At a ski resort the morning temperature was –11°C.

In the afternoon the temperature was 5°C.

What was the change in temperature from the morning to the afternoon?

decrease of 16°C decrease of 6°C increase of 6°C increase of 16°C

Which of these has the same value as  $97 \times 2 + 3$ ?

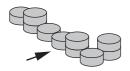
200 – 6

97 + 100

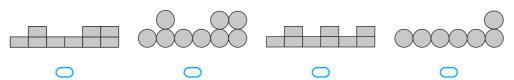
 $100 \times 2 + 9$ 

97 × 5

Alice looked in the direction of the arrow towards this stack of cans.

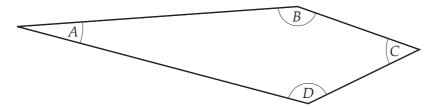


Which is Alice's view of the cans?





This shape has 4 angles marked.



Which angle is closest in size to 45°?

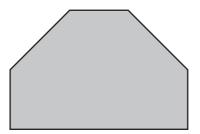
A

В

C

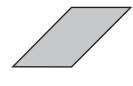
D

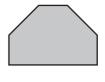
This paper shape was cut into several identical pieces with no paper left over.



Which of these could be the shape of the pieces?







Abby went to sleep at 9:40 pm.

She woke at 7:15 am.

How long did Abby sleep?

- 2 hours 25 minutes
- 9 hours 35 minutes
- 9 hours 55 minutes
- 10 hours 35 minutes



Ten people share a prize of \$8750.

They keep \$850 each and give the rest to a charity.

How much money in total do they give to the charity?

\$7900

\$790

\$250

\$25

 $\bigcirc$ 

Joe has four notes in his wallet.

The total value of the notes is \$75.

Which type of note is **not** in Joe's wallet?

\$5

\$10

\$20

\$50

0

An ant can carry a leaf with a mass of up to 0.55 grams. Which of these is the **heaviest** leaf that the ant can carry?



0.35 grams



0.4 grams



0.6 grams



1.1 grams



2 grams

There were 23 958 people at a football match.

One-third of the people at the match supported the away team.

Which of these is closest to the number of people at the match who supported the away team?

700

800

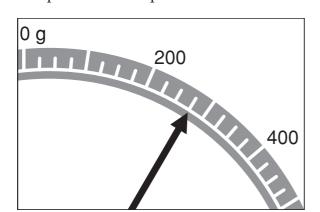
7000

8000

0

**18** 37.5 ÷ = 3.75

Finn put some flour on his kitchen scales. 19 The picture shows part of the dial.



How many grams of flour did Finn put on the scales?

230

260

275

280

325

20

In 2012, the population of sheep producing wool in Australia was 79 million.

The amount of wool produced in 2012 was 350 million kilograms.

The average amount of wool produced by one sheep in 2012 was closest to

- 0.4 kilograms.
- 4 kilograms.
- 40 kilograms.
- 400 kilograms.

Max has 3.98 litres of lemonade in bottles. 21

The bottles come in three sizes: 1.5 litres, 650 millilitres, 330 millilitres. All the bottles are full.

How many bottles does Max have?

6

10

12



The Sydney Harbour Bridge is approximately 1200 metres long. A model of the bridge is built with a scale of 1:6000.

What is the length of the model?

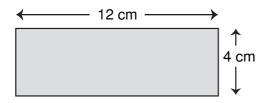
 $5\,cm$ 

20 cm

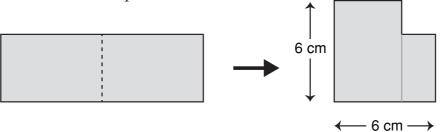
200 cm

720 cm

Luke starts with this paper rectangle.



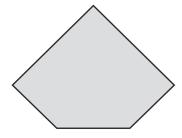
He cuts the rectangle in half as shown and places one half over the other to make a new shape.



What is the perimeter of Luke's new shape?

centimetres

This is one face of a prism.



How many edges does this prism have?





25

$$\frac{7}{8} + \frac{5}{6} =$$
?

 $1\,\frac{17}{24}$ 

 $\frac{12}{14}$ 

 $1\,\frac{19}{24}$ 

 $\frac{1}{4}$ 

0

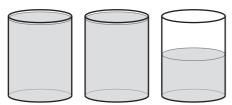
0

26

Sara has 1 litre of water in a jug.

She pours water into 3 glasses as shown.

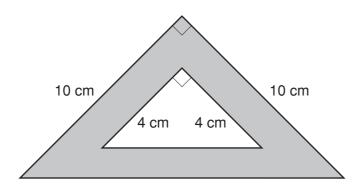
Each full glass holds 250 millilitres.



How much water does Sara have left in the jug?

- about a quarter of a glass
- about three-quarters of a glass
- about one whole glass
- more than one whole glass

**27** 



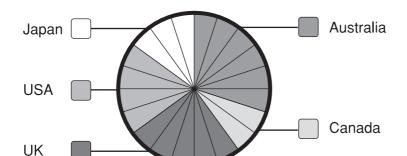
What is the area of the grey part of the shape?

square centimetres



Emma collected data on the TV programs she watched last month.

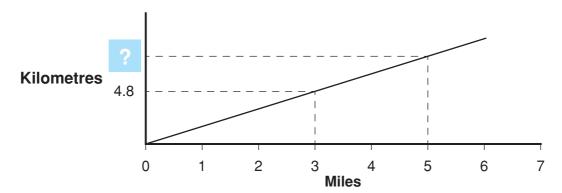
This graph shows how many programs were made in each country.



Emma watched 9 more Australian programs than Japanese programs.

How many programs did she watch in total?

This graph can be used to approximately convert miles to kilometres.



Using the graph, a distance of 5 miles is closest to

- 6.3 kilometres.
- 6.8 kilometres.
- 7.2 kilometres.
- 8.0 kilometres.



30

In this number sentence, both triangles represent the same number.

$$32 - \bigwedge = \bigwedge - 8$$

What number does  $\triangle$  represent?



31

Grace is sticking tiles along a wall. She uses three white tiles for every four black tiles as shown.



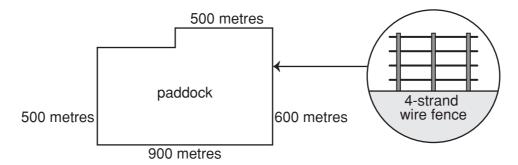
She uses a total of 147 tiles.

How many white tiles does she use?

32

A new fence is to be built around the perimeter of this paddock.

The fence is to have 4 strands of wire as shown.



How many kilometres of wire are needed?

kilometres

#### STOP - END OF TEST