



Kenguru 2019 Ecolier  
4th ja 5th grade

NAME \_\_\_\_\_

CLASS \_\_\_\_\_

Points: \_\_\_\_\_ Kangaroo leap: \_\_\_\_\_ ID Code (teacher fills): \_\_\_\_\_

Separate this answer sheet from the test. Write your answer under each problem number.

A right answer gives 3, 4 or 5 points. Every problem has exactly one right answer.

For each wrong answer,  $\frac{1}{4}$  of the points of the problem will be deducted, for example for a 4-point problem -1 point. If you leave the answer empty, no deduction will be made.

There are two goals: to score as many points as possible or to have as many consecutive right answers as possible (Kangaroo leap).

**3 points**

PROBLEM	1	2	3	4	5	6	7
ANSWER							

**4 points**

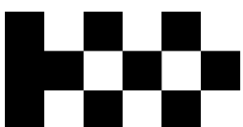
PROBLEM	8	9	10	11	12	13	14
ANSWER							

**5 points**

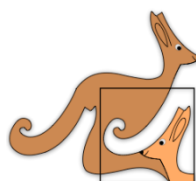
PROBLEM	15	16	17	18	19	20	21
ANSWER							

Contest not to be held before March 27th 2019.

Logo design by Samin Ahmed.



Teknologiateollisuuden  
100-vuotissäätiö

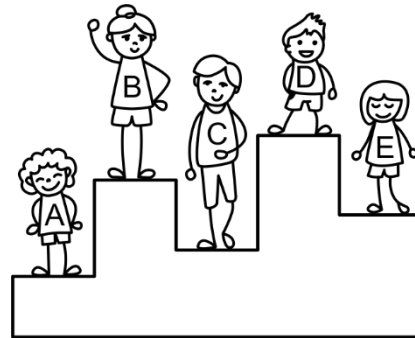


3 points

1.


The higher the step on the podium, the higher the rank of the runner.

Who finished third?








- (A) A                      (B) B                      (C) C                      (D) D                      (E) E

2.

Every circle stands for the number 1 and every line stands for the number 5. For example, this picture:  stands for number 8.

Which picture stands for 12?

- (A)                       (B)                       (C)                       (D)                       (E) 

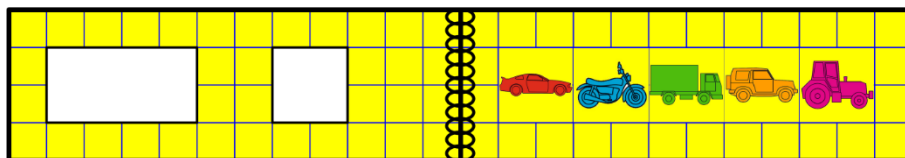
3.

Yesterday it was Sunday. What day is it tomorrow?






- (A) Tuesday                      (B) Thursday                      (C) Wednesday                      (D) Monday                      (E) Saturday

4.

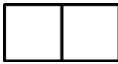
There are two holes in the book Olaf has. When the book is open, it looks like this:

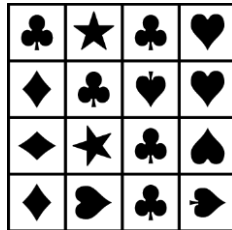


What does Olaf see when he closes the book?

- (A)  , (B)  , (C)   
 (D)  , (E) 

5.

Karina cut out a piece like this  from the figure.

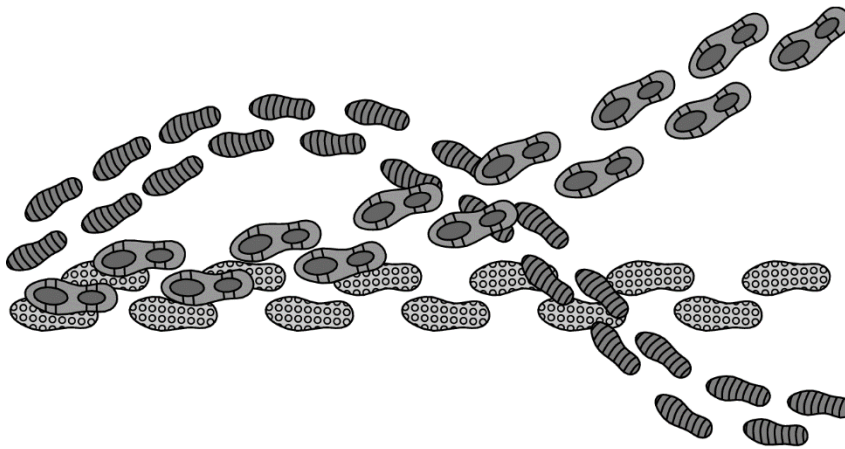


Which piece did she cut?

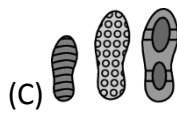
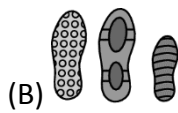


6.

Three people walked on a snowy field. They all had mud in their shoes.

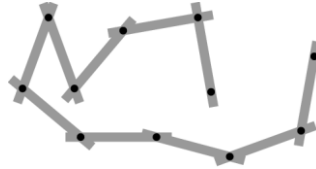


In which order did they walk?

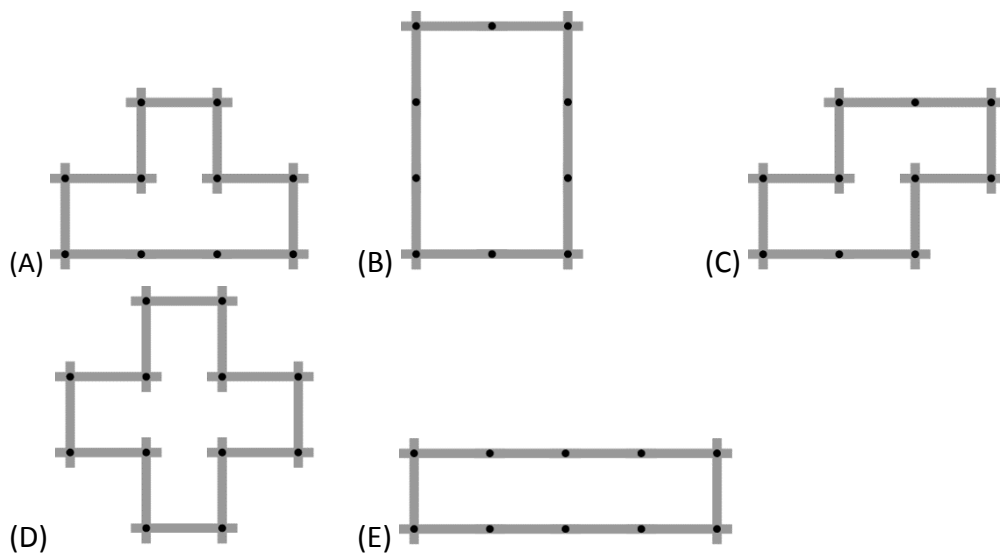


7.

Pia is playing with sticks that are attached together:



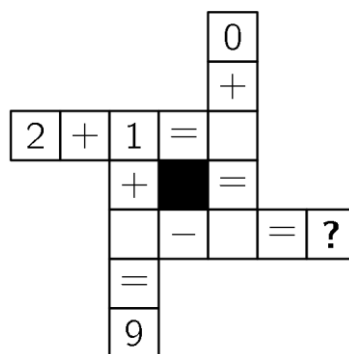
For which pattern does she need more sticks?



4 points

8.

What number should replace the question mark when all the calculations are completed correctly?



(A) 4

(B) 5

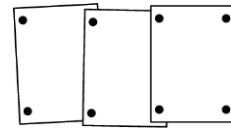
(C) 6

(D) 7

(E) 8

9.

Linda pinned up 3 photos in a row on a cork board using 8 pins.



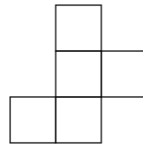
Peter wants to pin up 7 photos in the same way.

How many pins does he need?

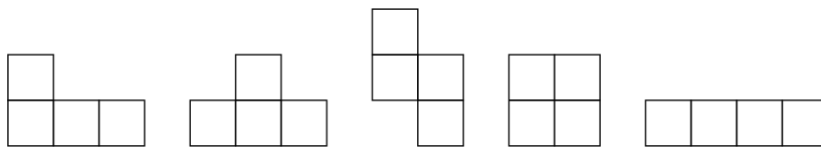
- (A) 14                      (B) 16                      (C) 18                      (D) 22                      (E) 26

10.

Dennis wants to remove one cell from the shape



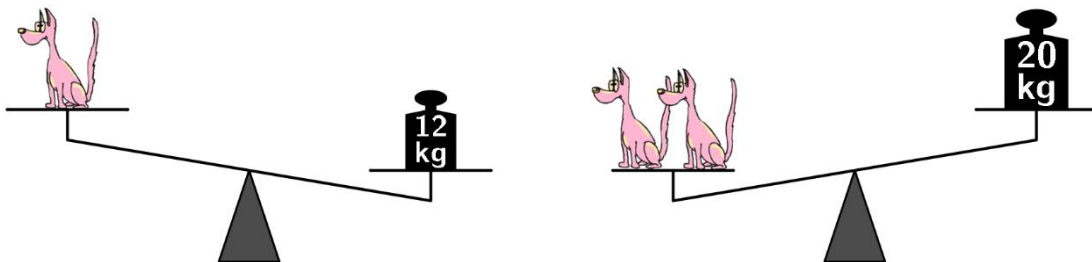
and turn the remaining shape a little. How many of the following shapes are possible for him to get in this way?



- (A) 1                      (B) 2                      (C) 3                      (D) 4                      (E) 5

11.

The weight of a dog is a whole number. How much does one dog weigh?



- (A) 7 kg                      (B) 8 kg                      (C) 9 kg                      (D) 10 kg                      (E) 11 kg

12.

Sara has 16 blue marbles. She can trade marbles in two ways:

3 blue marbles for 1 red marble **or**

2 red marbles for 5 green marbles.

What is the maximum number of green marbles she can get?

- (A) 5                      (B) 10                      (C) 13                      (D) 15                      (E) 20

13.

Seppo wants to write the numbers 2, 0, 1 and 9, one in each box. This way he gets a sum of a three-digit number and of a one-digit number.

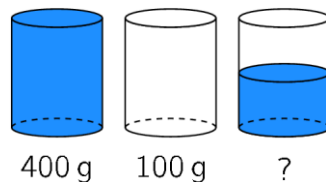
$$\square \square \square + \square ?$$

Seppo wants the sum to be as great as possible. What could he write in the place of the question mark?

- (A) 0 or 1      (B) 0 or 2      (C) Only 0      (D) Only 1      (E) Only 2

14.

A full glass of water weighs 400 grams. An empty glass weighs 100 grams.

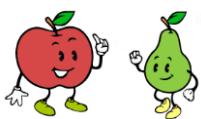


How many grams does a half-full glass of water weigh?

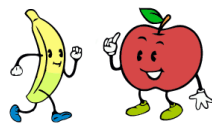
- (A) 150 g      (B) 200 g      (C) 225 g      (D) 250 g      (E) 275 g

5 points

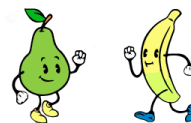
15.



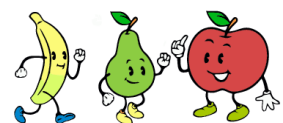
Together we cost  
5 cents.



Together we cost  
7 cents.



Together we cost  
10 cents.



How much  
do we cost  
together?

- (A) 8 cents      (B) 9 cents      (C) 10 cents      (D) 11 cents      (E) 12 cents

16.

Every shape below stands for a number. The sum of each row is displayed on the right.

			15
			12
			16

Which number does stand for?

- (A) 2                      (B) 3                      (C) 4                      (D) 5                      (E) 6

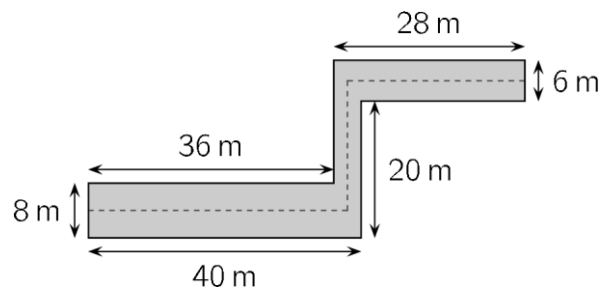
17.

The pages of a book are numbered 1, 2, 3, 4, 5 and so on. The digit 5 appears exactly 16 times in the page numbers. How many pages can the book have at most?

- (A) 49                      (B) 64                      (C) 66                      (D) 74                      (E) 80

18.

In the picture, the measurements of a hallway are shown. A cat walks on the dashed line along the middle of the hallway.



What is the length of the path the cat walks?

- (A) 63 m                      (B) 68 m                      (C) 69 m                      (D) 71 m                      (E) 83 m

19.

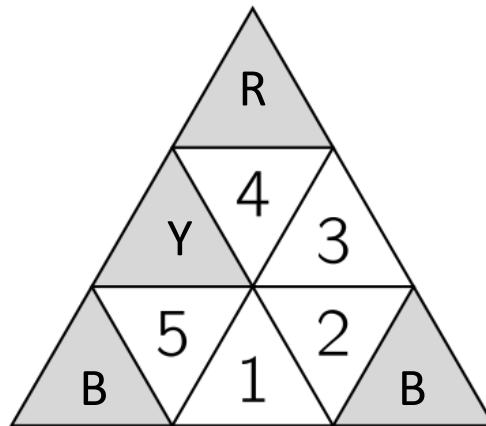
There are 15 animals in the park: cows, cats and kangaroos. Exactly 10 of the animals are not cows, and exactly 8 of the animals are not cats. How many kangaroos are there in the park?

- (A) 2                      (B) 3                      (C) 4                      (D) 8                      (E) 10

**20.**

Mari has 9 small triangles: 3 red (R), 3 yellow (Y) and 3 blue (B).

She wants to build a big triangle out of the small ones so that no triangles next to each other have the same colour. Mari places some of the triangles as shown and numbers the rest.



What is true when the big triangle is finished?

- (A) 1 is yellow and 3 is red.
- (B) 1 is blue and 2 is red.
- (C) 1 and 3 are red.
- (D) 5 is red and 2 is yellow.
- (E) 1 and 3 are yellow.

**21.**

Five children are named Alek, Bartek, Czarek, Darek and Edek. Only one of them has eaten a cookie.

Alek says: "I did not eat a cookie."

Bartek says: "I ate a cookie."

Czarek says: "Edek did not eat a cookie."

Darek says: "I did not eat a cookie."

Edek says: "Alek ate a cookie."

Only one of the children is lying. Who ate a cookie?

- (A) Alek
- (B) Bartek
- (C) Czarek
- (D) Darek
- (E) Edek