

EXAM BASED REVISION 1

Instruction :

1. This question paper consists of 2 sections: Section A and Section B
2. Answer all the questions in Section A, Section B.
3. Click at the chosen for section A and type all your answers in the space provided in section B
4. The diagram in the questions provided are not drawn to scale unless stated.
5. You may use a non-programmable scientific calculator.

Name: _____

Class: _____

Section A

[20 marks]

Answer all the questions.

1. Which of the following groups of fractions is arranged in descending order?

A. $\frac{1}{6}, \frac{2}{5}, \frac{2}{3}$

C. $\frac{2}{9}, \frac{3}{9}, \frac{1}{3}$

B. $\frac{1}{2}, \frac{1}{3}, \frac{1}{4}$

D. $\frac{2}{5}, \frac{3}{10}, \frac{3}{5}$

2. State all the prime factors of 156.

A. 2, 3, 7

C. 2, 13, 19

B. 2, 3, 13

D. 3, 7, 29

3. Express 0.0000215 in standard form

A 2.15×10^{-5}

C. 2.15×10^4

B 2.15×10^{-4}

D. 2.15×10^5

4. In Diagram 1, PQRS, YXWV and WUT are straight lines.

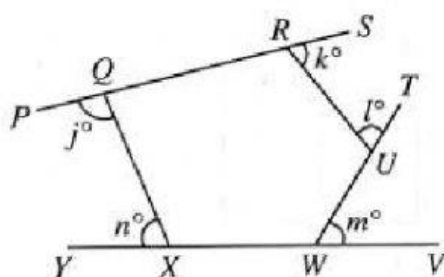


Diagram 1

Find the value of $j + k + l + m + n$

A. 180

C. 540

B. 360

D. 720

5. If $10^{x-1} = \frac{1}{10000}$, Find the value of 10^x

A. 10^2

C. $\frac{1}{10^2}$

B. 10^3

D. $\frac{1}{10^3}$

6. Find the value of $17.5 + 0.236 \times 38$, and round off correct to three significant figures.

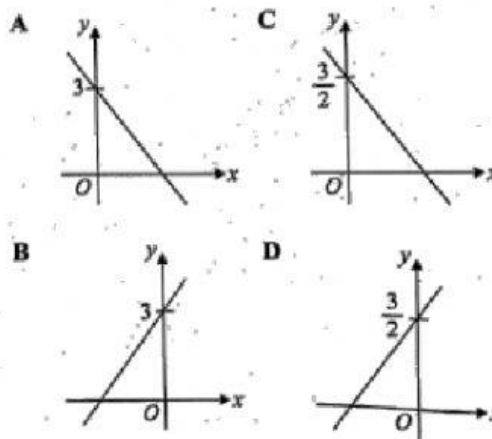
A. 26.4

C. 26.6

B. 26.5

D. 26.7

7. Which of the following graphs represent $2y + 4x = 3$?



8. Puan Lim has deposited RM4000 in a bank and the interest is compounded twice a year at 6%. How much money does Puan Lim have at the end of the year?

A. RM4120.00

C. RM4243.60

B. RM4240.00

D. RM4494.40

9. In Diagram 2, $\sin \theta = \frac{5}{13}$ and QRS is a straight line. Find the length of RS in cm.

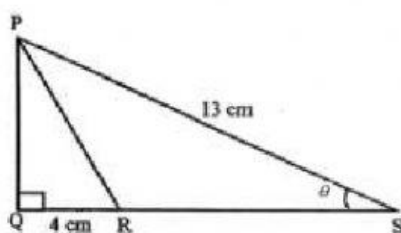


Diagram 2

- A. 6
B. 7
C. 8
D. 9
10. Given that $\frac{7}{3p+q} = 2$ express p in term of q

- A. $\frac{5-q}{3}$
B. $\frac{14-q}{3}$
C. $\frac{7-q}{6}$
D. $\frac{7-2q}{6}$

11. Diagram 3 shows a Venn Diagram

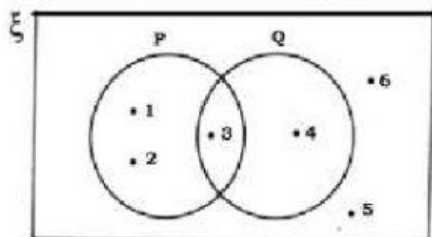


Diagram 3

List the elements for P' .

- A. 3, 4
B. 4, 5, 6
C. 3, 4, 5
D. 3, 4, 5, 6

12. In the Diagram 4, MJK and KLM are isosceles triangles.

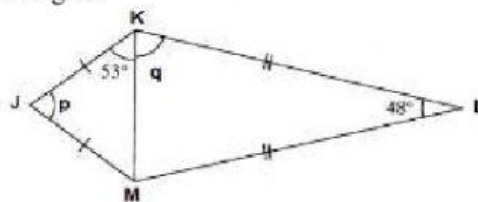


Diagram 4

Find the value of $p + q$

- A. 140
B. 142
C. 144
D. 146

13. The diagram shows a hollow concrete cylinder with an external diameter of 7 m and an internal diameter of 4 m. Calculate the volume of concrete needed to make the cylinder.

[Use $\pi = \frac{22}{7}$]

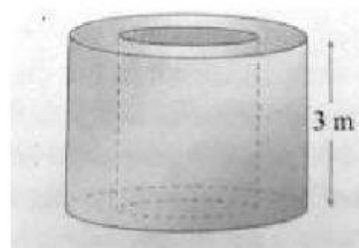


Diagram 5

- A. 77.79 m³
B. 78.79 m³
C. 79.79 m³
D. 80.79 m³

14. Diagram 6 shows the plan of composite shape made up of solid P and a solid Q.

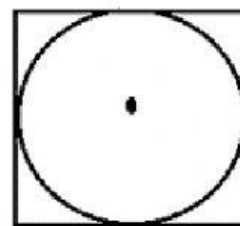


Diagram 6

Determine the possible solids P and Q

	Solid P	Solid Q
A.	Cuboid	Cylinder
B.	Cuboid	Cone
C.	Cube	Prism
D.	Cube	Cylinder

15. Which of the following expressed in simplest form?

- A. $2x + 3 - 4y + 1$
- B. $4x + 7y - 2y - 3$
- C. $4xy + 3z - 5$
- D. $3x^2 \times x \times 2xy$

16. Diagram 7 shows a hexagonal card divided into six equal triangles.

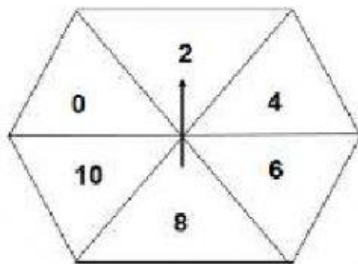


Diagram 7

The pointer is spun. Find the probability of the pointer stops at prime number.

- A. 0
- B. $\frac{1}{6}$
- C. $\frac{1}{2}$
- D. 1

17. A car moves at a speed of 120 km h^{-1} . Find the distance, in km, travelled by the car in 90 minutes.

- A. 80
- B. 120
- C. 170
- D. 180

18. Diagram 8 is a bar chart showing the number of boys and girls in four sport houses in a school.

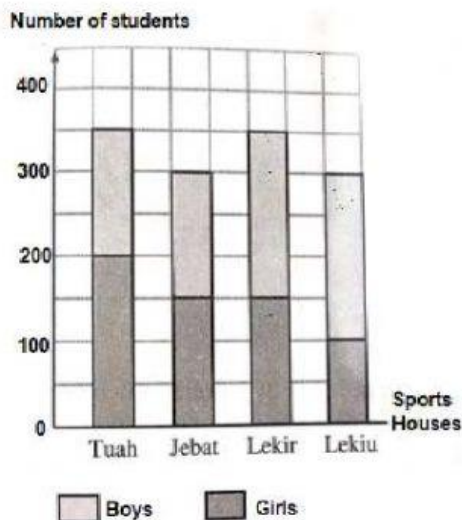


Diagram 8

Which statement is correct based on this bar chart?

- A. The total number of girls is more than the total numbers of boys.
- B. Two sport houses have more girls than boys.
- C. Three sports houses have more boys than girls.
- D. Only one sports house has an equal number of boys and girls

19. Find the solution for $-2x \leq 2(x + 8)$

- A. $x \geq -4$
- B. $x \leq -4$
- C. $x \geq -16$
- D. $x \leq -16$

20. Diagram 9 is drawn on a grid of equal squares.

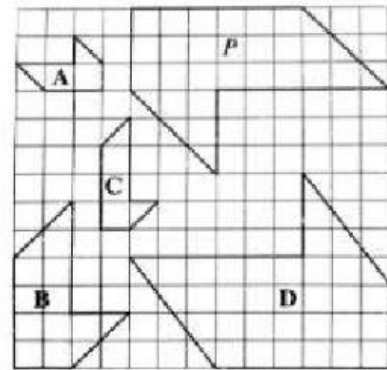


Diagram 9

Which of the polygons, A, B, C or D is the scale drawing of P using the scale of 1: 3?

Section B
[20 marks]
Answer all the equations.

1. a) Determine whether each of the following statements is 'True' or 'False'

- i) 5 is a prime factor of 20
- ii) 3 is a prime factor of 29
- iii) 4 is a prime factor of 16

[3 marks]

2. a) Complete the table in the answers space.

Single number	Standard form
0.000742	X
	3.6×10^5
5879	X

[3 marks]

b) Diagram 10 shows an irregular polygon

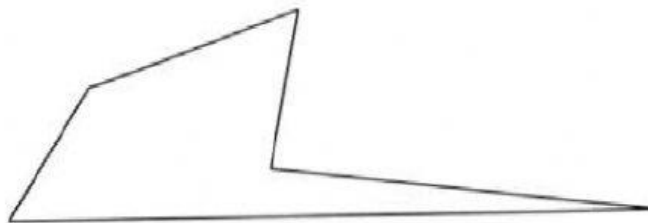


Diagram 10

Determine the sum of exterior angles and the sum of interior angles of the polygon.

Sum of exterior angles	
Sum of interior angles	

[2 marks]

b) Given $\xi = \{\text{letter in the word 'B A D M I N T O N'}\}$ and $P = \{\text{vowels}\}$. Complete the table in the answer space.

Number of elements in ξ	
Complement of set P	

[2 marks]

3. a) Match the equations with the correct gradient.

$$y = \frac{1}{4}x - 5$$

$$2y = -x - \frac{1}{6}$$

$$\frac{3x}{2} + \frac{y}{6} = 1$$

$$-9$$

$$-\frac{1}{2}$$

$$\frac{1}{4}$$

[3 marks]