KOTHARI INTERNATIONAL SCHOOL, NOIDA
TERM END ASSESSMENT, 2023-2024
GRADE 6: SUBJECT: MATHEMATICS
SET-B
SECTION B (SUBJECTIVE QUESTIONS)

DAY & DATE: MONDAY, 11 MARCH, 2024 **TIME ALLOWED: 2.5 HOURS**

**NAME: _____** **MAXIMUM MARKS: 60**

GRADE/SEC: _____

GENERAL INSTRUCTIONS:

1. This question paper consists of 3 pages and 22 questions.

2. It is compulsory to attempt all the questions.

3. Show steps/working wherever necessary.

Do as directed-

1) The perimeter of a square piece of cardboard is 80 cm. Find its area. (2M)

2) The first, third and fourth terms of a proportion are 6, 12 and 36. What is the second term? (2M)

3) An isosceles triangle has equal sides of 18 cm each. Find the third side if the perimeter of the triangle is 50 cm. (2M)

4) Find the difference between the shaded parts if shaded parts are expressed in fractions? (2M)
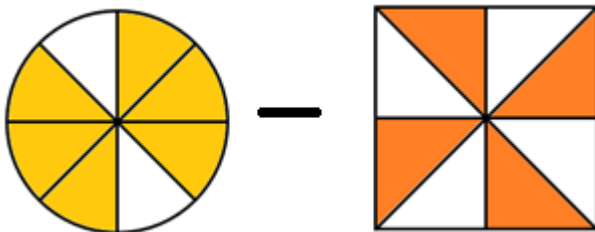
5) What is the sum of the largest 4-digit positive integer and smallest 3-digit negative integer? (2M)

6) Determine whether the following ratios are in proportion. If they are in proportion, write the middle term and extreme term. (2M)

2 kg : 70 kg and 30 sec : 5 minutes

7) A rope of length 5.36 m is attached to another rope of length 3.69 m. What length of rope will be left if 2.72 m is used up for packing a box? (2M)

8) Give expressions for the following: (2M)
   a) 'X' is multiplied by - 3 and 2 added to the product.
   b) 'P' is subtracted from 5 and 4 is added to the result.

9) Mr. Rajan got a job at the age of 24 years and he retired from the job at the age of 60 years. What fraction of his age till retirement was he in the job? (2M)

10) The circumference of three tyres are 40 , 50 and 70 cm. If they are moving simultaneously, then what is the least distance they should cover before they make one revolution? (2M)

11) Solve using a number line: 3 less than - 8 (2M)

12) What number should be added to the sum of 247 and - 67 to make it equal to the smallest 3 - digit number? (3M)

13) Vinita jogged a rectangular field 4 times. If the rectangular field was 135 m long and 78 m wide, how far did Vinita jog? (3M)

OR

A piece of string is 48 cm long. What is the length of each side if the string is used to form:
   (a) a rhombus   (b) a regular hexagon

14) A shopkeeper buys two bags of tea containing $3\frac{3}{4}$ kg and $24\frac{1}{4}$ kg respectively. He mixed the tea together. What is the total weight of the tea? (3M)

15) A motorbike travels 260 km in 5 hours. How far will it travel in 15 hours 30 minutes? (3M)
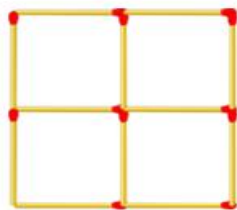
OR

A total of 280 marbles is to be divided among three boys Arun, Harshit and Krish respectively in the ratio 2:5:7. Find the difference in the marbles between Krish and Arun. (3M)
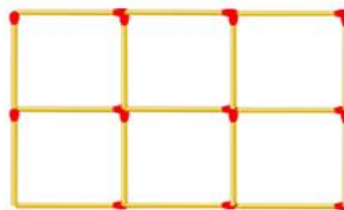
16) Shweta has made a chart on 'Elementary shapes'. She develops a pattern for the border using sticks as follows: (3M)
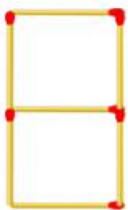
Find a rule that helps her find the number of sticks.

17) Mr. Ranjan purchased 16.500 kg rice, 23.700 kg flour and 5.250 kg sugar. Find the total weight of his purchases. Is it 50 kg or less? If less, how much less ? (3M)

OR

 What do we get when we subtract the difference of 15.13 and 9.7 from their sum?

18) A string, $36\frac{1}{3}$ m long, was cut into three parts measuring $12\frac{2}{5}$ m , $13\frac{1}{2}$ m and $5\frac{4}{15}$ m. What was the length of the remaining string? (4M)

19) Find the greatest number that divides 229, 158 and 391 leaving remainders 5, 6, and 7, respectively. (4M)

Find the least number of five digits that is exactly divisible by 16, 18, 24 and 30. (4M)

20) **The side of a square tile is 10 cm. How many tiles can be fixed on one side of a wall which is 2.5 m long and 2 m high?** (4M)

21) **Out of 1800 students present in a school, 750 students opted for basketball, 800 students opted for cricket, and the remaining students opted for table tennis. If a student can choose only one single game, then find the ratio of :** (4M)
(i) Number of students who opted for the sport basketball to the number of students who chose the sport table tennis.

(ii) Number of students who opted for the sport cricket to the number of students opting for the sport basketball.

(iii) Number of students who opted for the sport basketball to the total number of students.

22) **CASE STUDY- Answer the questions that follow -** (4M)

> **When we subtract a negative integer we get a greater integer. Consider it in another way. We know that additive inverse of (-2) is 2. Thus, it appears that adding the additive inverse of -2 to 6 is the same as subtracting (-2) from 6.**

    i) We will get a _____ integer whenever we subtract a negative integer.
      a) Greater   b) Smaller
    ii) What will be the additive inverse of (-6) ?
      a) - 6   b) 6
    iii) 6 + (-2) = _____
      a) 4   b) 8
    iv) - 6 + (-2) = _____
      a) - 4   b) - 8