ANNUAL EXAMINATION - 2077

Grade: VI   **Full Marks: 50**
Subject: Compulsory Mathematics   **Pass Marks: 20**
Time: 1 hour 30 minutes

Group A [20 * 1 = 20]

1. Choose the correct answers.

a) What are the prime factors of 45?

   i) 2, 3, 5, 7   ii) 3, 3, 5   iii) 1, 3, 3, 5

b) Find the product of 7 and sum of 4 and 5.

   i) 63   ii) 53   iii) 43

c) What is the product of $(-3) \times (+9) \times (-2)$?

   i) (-52)   ii) (-54)   iii) (+54)

d) What is the quotient of $(-72) \div (+9)$?

   i) (+8)   ii) (-8)   iii) -64

e) Which one is the square number in the following numbers?

   i) 8   ii) 27   iii) 36

f) What is the cube root of 64?

   i) 4   ii) 8   iii) 12

g) Which of the following number is exactly divisible by 3.

   i) 256   ii) 441   iii) 455

h) What is the L. C. M. of 12 and 15?

   i) 45   ii) 55   iii) 60

i) If the L.C.M. of 6 and 7 is 42, then its H.C.F. will be:

   i) 1   ii) 6   iii) 7

j) A fraction with numerator less than the denominator is called:

   i) Mixed number   ii) Proper fraction   iii) improper fraction

k) The fraction equivalent to $\frac{5}{6}$ is:

   i) $\frac{8}{9}$ ii) $\frac{10}{12}$ iii) $\frac{14}{16}$

l) What is the difference of 8.72 and 0.872?

      i) 0   ii) 78.48   iii) 7.848

m) What should be added to 64.35 to make 100?

      i) 35.65   ii) 53.55   iii) 36.75

n) What is the value of $\frac{5}{6}$ of 360?

      i) 450   ii) 300   iii) 250

o) What is the value of 25% of 60?

      i) 15   ii) 20   iii) 25

p) If $x = 2$ and $y = 3$, what is the value of $3(x + Y)$?

      i) 18   ii) 15   iii) 10

q) What should be added to 9x to get 15x?

      i) 12x   ii) 8x   iii) 6x

r) What is the product of $(-5ab) \times (-2abc) \times bc$.

      i) $-10a^2b^2c^2$ ii) $10a^2b^3c^2$ iii) $-10a^2b^3c^2$

s) What is the measurement of Straight angle?

      i) 180^0 ii) 270^0 iii) 360^0

t) If x^0 and 40^0 make a right angle, What is the value of x^0.

      i) 60^0 ii) 50^0 iii) 40^0

Group B [10 * 1 = 10]

2. Fill in the blank.

a) The numbers that cannot be divided by 2 are called ------------------numbers.

b) A number divisible by both 2 and 3 is also divisible by -------------------.

c) If the unit cost of a book is Rs 150, then the cost of 6 books = -----------------.

d) The expanded forms of 0.74=------------- -+- -------------------.

e) The product of two integers of opposite sign is a ------------------- integer.

f) The quotient of $12p^6 \div 4p^3 =$ -----------------.

g) If $x = 2$ and $y = 3$, then $4x =$ -----------,$5y =$ -------------

h) If the sum of two angles is equal to 90°, they are called -----------------.

i) The angle made by circle is-------------------.

j) If x^o and 110° are co-interior angles, then the size of x^o is -----------------.

3) Simplify: $2\dfrac{1}{2} + \dfrac{1}{4} \times \dfrac{2}{5} \div \dfrac{3}{10} - \dfrac{1}{6}$.

4) Mr. Ramesh bought a pen drive for Rs 1500 and sold it for Rs 1575. Find his profit and profit percent.
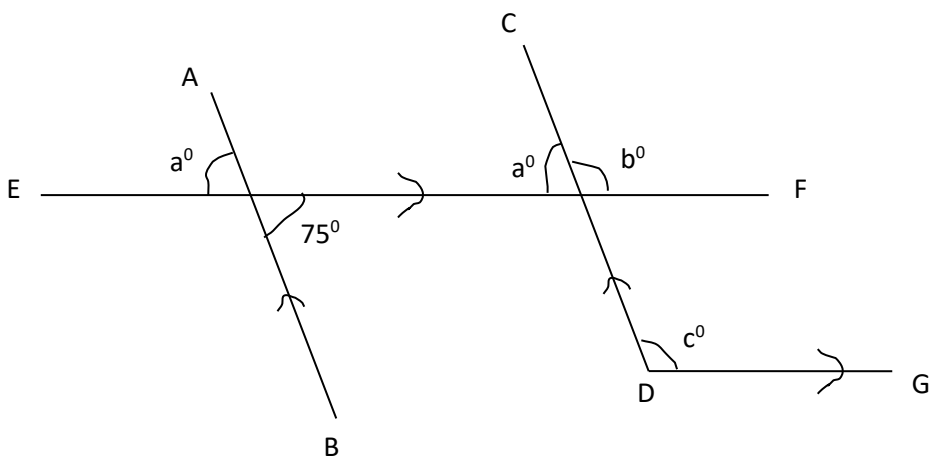
5) There are 360 students in a school 198 of them are boys.

a) Find the percentage of the boys.

b) Find the percentage of the girls.

6) Multiply: $(2x + 3y)(x + y + 5)$

7) Find the size of unknown angles

Best Wishes!!!