INDIAN SCHOOL MUSCAT – MIDDLE SECTION – SUMMATIVE ASSESSMENT :02 (2016 – 17)



DATE : 02.03.2017 CLASS : 7

SUB: MATHEMATICS TIME : 2HRS



MAX.MARKS :60 INSTRUCTIONS: ANSWER ALL THE QUESTIONS ON SEPARATE ANSWER SHEET

Q.NO:0	1						
S.NO	MCQ (1 MARK EACH)						
(a)	The terms of the expression !	5x ² + 4y are	a) 5x & 4y	b)5x ² & 4	c) 5x²& 4y	d) 5& 4y²	
(b)	If 6:5 = 30: X then X =	a) 25		b) 35	c) 11	d) 150	
(c)	Perimeter of a square is 32 cr	n then its area i	s a) 64 cı	m² b) 16cm²	c) 128 cm ²	d) 8cm²	
(d)	The range of the set of observations 15 , 10, 12 ,5, 8 is						
	a) 10	b)12			c) 7	d) 8	
(e)	Two angles of a triangle are 70° and 60°, then the third angle						
	a) 130°	b) 50°			c) 40°	d) 30°	
(f)	The number of altitudes in a triangle is						
	a) 3	b) 1			c) 2	d) 4	
(g)	Δ ABC $\cong \Delta$ XYZ and AB = XY, BC = YZ then additional condition needed for SAS congruency is						
	(a) CA = ZX	(b) <u>/B</u> = /	<u>'Y</u>	(c) <u>/</u> A	= <u>/X</u>	(d) BC = YZ	

S.NO	FILL IN THE BLANKS (1 MARK EACH)			
(6)	The numerical coefficient of vin 2v IF is			
(n)				
(i)	20% of 600 km is			
	An exterior angle of a triangle is 120° and one of the interior opposite angle is 65°, then the measure			
(j)	of the other interior opposite angle is			
(k)	Two angles are congruent if they have the same			
(I)	The area of a parallelogram with base 12 cm and altitude 4.5 cm is			
(m)	The mode of the set of values 2,3,2,5,2,3,4,3,3 is			
(n)	The median of the data 2,3, 6, 4,12,10,6,8,7 is			

Q.NO '2' TO '12' – ('2' MARKS EACH)				
S.NO	QUESTIONS			
2	Simplify and find the value of $3x - 16 + 2x - 6$ when $x = 2$			
3	Subtract $(x^2 + 2xy + y^2)$ from $(2x^2 + 4y^2 - 3xy)$			
4	Solve : 2 (x +5) = 14			
5	Solve : $\frac{2x+1}{x-2} = \frac{2}{3}$			

S.NO	QUESTIONS
	A man bought a computer for Rs 30000 and due to defect had to sell it for Rs 25500. Find the profit
6	or loss percent.
7	Write if 3cm, 5cm, 7cm can be the sides of a triangle. (show working)
8	If \triangle ABC $\cong \triangle$ DEF, write parts of triangle DEF that corresponds to AB, CA , <u>/B</u> and <u>/C</u>
9	Draw a line parallel to a given line m at a distance of 5.5 cm.
10	The area of a triangle is 36cm ² . If the height is 6cm, find the base of the triangle.
11	Find the diameter of a circular plot whose circumference is 440 m. (Take Π = $\frac{22}{7}$)
12	Find the mean of the following data 25,30,22,27,and 26

Q.NO '13' TO '20' –('3' MARKS EACH)							
S.NO	QUESTIONS						
13	The sum of three consecutive even numbers is 54. Find the numbers.						
	Rs 8000 is borrowed at 9% interest p.a. Find the simple interest and amount to be paid after 4						
14	years. The two sides of right angled triangle are 12 cm and 9 cm. Find the length of the hypotenuse. Also						
15	find the perimeter of the triangle.						
16 17	Are the triangles are congruent? If so write the matching parts and congruence condition used. Is AB = XY? $A = \frac{A}{30^{\circ} 40}$ C $Y = \frac{X}{30^{\circ} 40}$ Z $S = \frac{X}{5 \text{ cm}}$ Construct Δ PQR given that PQ = 6.2cm, QR = 4.8 cm and PR = 5.5cm.						
10	Construct $\Delta \mathbf{A}$	BC given that B	SC = 6 cm , <u>/B</u>	= 60° and $\underline{/C}$ =	40°		
18	(use ruler and compass to construct special angles)						ftha
19	From a square sheet of side 40 cm, a circle of radius 14cm is removed. Find the area of the remaining sheet.						
	Draw a bar graph showing the average rainfall recorded in the month of June to November in a city.						
20	Months	June	July	August	September	October	November
	Rainfall	20cm	30cm	40cm	25cm	15cm	10cm