

## Mathematics General Science Test Medium Mode

Sr	Questions	Answers Choice
1	Question Image	
2	Question Image	C. 16 D. None of these
3	Question Image	A. 2 B. -3/2 C. 1 D. 0
4	Question Image	A. <span style='color: rgb(34, 34, 34); font-family: "Times New Roman"; font-size: 24px; text-align: center; background-color: rgb(255, 255, 224); padding: 2px;'>π</span> B. <span style="text-align: center;">2π</span> C. <span style="text-align: center;">π/2</span> D. None of these
5	For all points (x,y) in third quadrant	A. $x > 0, y < 0$ B. $x > 0, y > 0$ C. $x < 0, y < 0$ D. $x < 0, y > 0$
6	Question Image	
7	Domain of $y = \cot x =$ _____	
8	Question Image	A. 3, -3, 11 B. 3, 3, 11 C. -3, 3, -11 D. -3, -3, 11
9	The equation $x^2 + y^2 + 2g + 2fy + c = 0$ represents a circle whose centre is :	A. (g,f) B. (-g,-f) C. (2g ,2f) D. (-2f ,-2g)
10	Question Image	
11	Under multiplication, solution set of is	A. Groupoid B. Abelian group C. Semi group D. All of these
12	The value of $\sin^2 20^\circ + \sin^2 70^\circ$ is equal to	A. 1 B. 2 C. -1 D. 1/2
13	Question Image	
14	$\sin(\sin^{-1}(1/2)) =$	A. 0 B. 2 C. ∞ D. 1/2
15	Question Image	
16	Question Image	A. 0 B. U C. u/2 D. log u
17	If <u>a</u> and <u>b</u> are two vectors then $a+b =$	A. $b + a$ B. $b - a$ C. $ab$ D. $a^b$
18	A chimney is such that on walking towards it 50 m in a horizontal line through its base the	

	angular elevation of its top changes from $30^\circ$ to $45^\circ$ . The height of the chimney is	
19	$i^3 =$	A. -1 B. i C. -i D. 1
20	The velocity of a particle moving along a straight line is given by $v = 3t + t^2$ . The acceleration of the particle after 4 seconds from the start is	A. 4 B. 11 C. 26 D. None