Mathematics General Science Test Medium Mode

Sr	Questions	Answers Choice
1	$\text{Sec}^{-1}x =$	A. $\text{Cos}^{-1}1/x$ B. $\text{cosec}^{-1}1/x$ C. $\text{Cos}^{-1}(-x)$ D. $\text{Tan}^{-1}x$
2	Question Image	
3	The sum of the focal distance from any point on the ellipse $9x^2 +16y^2 =144$ is	A. 32 B. 16 C. 18 D. 8
4	Question Image	
5	The centre fo the circle $x^2+ y^2+ 12x -10 = 0$ is	A. (12, -10) B. (6, -5) C. (-12, 10) D. (-6, 5)
6	The maximum value of $\sin\theta\cos\theta$ is	A. 1 B. 1/2 C. 1/4 D. 1/6
7	1/3 is _____	A. A prime number B. An integer C. A rational number D. An irrational number
8	Two circles are said to be concentric if they have	A. same radius B. same chord C. same centre D. same diameter
9	$\cos^{-1}(\cos x) =$	A. x B. cos x C. x = 1/x D. $\cos^{-2} x$
10	For any set B, $B \cup B'$ is	A. Is set B B. Set B' C. Universal set
11	If θ= 60° then	A. $\sin\theta = 1/2$ B. $\tan\theta = \cot 30°$ C. $\theta = \pi/4$ D. $\sec\theta = 4$
12	The solution set of the equation 1 + Cos x = 0 is _____	D. none of these

13	Question Image	
14	The range of inequality x + 2 > 4 is	A. (-1, 2) B. (-2, 2) C. (1, ∞) D. None
15	The straight line passing through the focus and perpendicular to the directrix of the conic is known as its	A. Tangent B. axis C. Focal chord D. major or manor axis
16	If Z_1= 1 + i, Z_2= 2+3i, then $|Z_1 - Z_2|$ = ?	
17	Which of the following is a scalar	A. weight B. force C. speed D. momentum
18	Question Image	A. Biconditional B. Implication C. Antecedent D. Hypothesis
19	A conditional "if p then q" is denoted by	
20	$\sqrt{2}$ is a number	A. Rational B. Irrational C. Even D. Odd