

## Mathematics General Science Test Medium Mode

Sr	Questions	Answers Choice
1	The minimum value of the quadratic function $f(x) = x^2 + 6x - 2$ , is	A. 11 B. 6 C. -11 D. 13
2	If one end of the diameter of the circle $x^2 + y^2 - 5x = 3y - 22 = 0$ is (3,4) the other end is:	A. (2,7) B. (-2,-7) C. (-2,7) D. (2,-7)
3	if the value of the sphere, $v = 4/3\pi r^2$ , then the which of the following statement is true?	A. r is the function of v B. v is the function of r C. $\pi$ is independent variable D. None of these
4	The three noncollinear points through which a circle passes are known, then we can find the:	A. Variables x and y B. Value of x and c C. three constants f, g and c D. inverse of the circle
5	Archimedes approximate the function by horizontal function and the area under f by the sum of small	A. Parallelograms B. Squares C. Rectangles D. Polygons
6	The probability of getting a number between 1 and 100 which is divisible by 1 and itself if only is	A. 1 / 4 B. 1 / 2 C. 3 / 4 D. 25 / 98
7	Two cards are drawn at random from a well shuffled pack of cards. The probability that at least one of them is a face card is	A. 3 / 17 B. 5 / 17 C. 7 / 17 D. 9 / 17
8	The angles with some initial and terminal sides are called	A. Quadrantal angles B. Coterminal angles C. Allied angles D. None
9	The set of all positive even integers is	A. Not a group B. A group w.r.t subtraction C. A group w.r.t division D. A group w.r.t multiplication
10	Domain of cosec x is _____	
11	The set $\{1, -1, i, -i\}$	A. Form a group w.r.t addition B. Form a group w.r.t multiplication C. Does not form a group w.r.t multiplication D. Not closed under multiplication
12	For all points (x,y) on x-axis	A. x is positive B. x is negative C. y = 0 D. y is negative
13	Which term of the A.P 5,8,11,24.....is 320	A. 104th B. 106th C. 105th D. 64th
14	If (0, 0) and (0, -1) are end points of a diameter, then the equation of the circle is	
15	$i =$	A. $\sqrt{1}$ B. $\sqrt{2}$ C. $\sqrt{-2}$ D. $\sqrt{-1}$
16	Three integers are chosen at random from the first 20 integers. Then probability that their product is even, is	A. 2 / 19 B. 3 / 29 C. 17 / 19 D. 4 / 19

17	The set $\{ \{a,b\} \}$ is	A. Infinite set B. Singleton set C. Two points set D. Empty set
18	Question Image <input type="text"/>	A. An upper triangular matrix B. A lower triangular matrix C. A diagonal matrix D. A null matrix
19	Question Image <input type="text"/>	
20	If $A = \{2m/m^3 = 8, m \in \mathbb{Z}\}$ then $A =$ <input type="text"/>	A. $\{1,8,27\}$ B. $\{4\}$ C. $\{2,4,6\}$ D. $\{2,16,54\}$