

## Mathematics General Science Test Medium Mode

Sr	Questions	Answers Choice
1	The set of rational numbers between 0 and 1 is	A. Finite B. Null set C. Infinite D. None of these
2	A point of a solution regions where two of its boundary lines intersect, is called:	A. Vertex of the solution B. Feasible point C. Point of inequality D. Null point of the solution region
3	If the roots of $ax^2 - bx - c = 0$ change by the same quantity, then the expression in a, b, c that does not change is	
4	Question Image <input style="width: 100%; height: 15px;" type="text"/>	D. none of these
5	$\sin(\pi + \theta) =$ _____;	A. $\sin\theta$ B. $\cos\theta$ C. $-\sin\theta$ D. $-\cos\theta$
6	The equation of the normal to the circle $x^2 + y^2 = 25$ at (4, 3) is	A. $3x - 4y = 0$ B. $3x - 4y = 5$ C. $4x + 3y = 5$ D. $4x + 3y = 25$
7	$i =$	
8	An open sentence formed by using the sign of equality "=" is called	A. Equation B. In equation C. True sentence D. False sentence
9	The points A(3,1), B(-2,-3), C(2,2) are vertices of an (an)	A. Right triangle B. Equilateral triangle C. Isosceles triangle D. Scalene triangle
10	If $f(x) = x^3 - 2x^2 + 4x - 1$ , then $f(-2) = ?$	A. 0 B. -25 C. 5 D. 45
11	Question Image <input style="width: 100%; height: 15px;" type="text"/>	A. 0 B. 1 C. 2 D. none of these
12	What is the circular measure of the angle between the hands of a watch at 4 O'clock	
13	The equation of the chord of the circle $x^2 + y^2 - 4x = 0$ whose mid-point is (1, 0) is	A. $y = 2$ B. $y = 1$ C. $x = 2$ D. $x = 1$
14	Question Image <input style="width: 100%; height: 15px;" type="text"/>	D. none of these
15	The parabola $y^2 = 4ax$ open up if	A. $a < 0$ B. $a \neq 0$ C. $a > 0$ D. All are incorrect
16	Question Image <input style="width: 100%; height: 15px;" type="text"/>	
17	$2\pi + \theta$ will have terminal side in Quad	A. I B. II C. III D. IV
18	The third term of a G.P. is the square of first term. If the second term is 8, then the 6th term is	A. 120 B. 124 C. 128 D. 132

19 If the sum of even coefficients in the expansion of  $(1+x)^n$  is 128 then

- A.  $n=7$
- B.  $n=9$
- C.  $n=8$
- D. None

20 A matrix with a single row is called a

- A. Column matrix
- B. Row matrix
- C. Null matrix
- D. Identity matrix