Mathematics General Science Test Medium Mode

Sr	Questions	Answers Choice
1	Question Image	A. 1 + tan²x + c B. tan x + c C. -tan x + c D. cot x + c
2	Sum of n terms of a geometric series if | r | < 1 is	
3	Which of the following is factor of x11+a11, where n is an odd integer	A. x-a B. x+a C. 2x-a D. 2x+a
4	A diagonal matrix in which the diagonal elements are equal is called a	A. Null matrix B. Identity matrix C. Scalar matrix D. Row matrix
5	The set of months in a year beginning with S.	A. {September, October, November} B. Singleton set C. Null set D. Empty set
6	The law of sines can be used to solve	A. Right angle triangle B. Isosceles triangle C. oblique triangle D. haxagon
7	The sum of infinite numbers of terms of an arithmetic series is	A. Finite B. Infinite C. May or may not finite D. None of these
8	$7^{2n}+ 3^{n-1}. 2^{3n-3}$is divisible by	A. 24 B. 25 C. 9 D. 13
9	Question Image	A. x³ B. 3x² C. 3x D. 3
10	The coordinates of a point P(x,y) referred to XY-system are	A. (x+y,y+k) B. (x-h,y-k) C. (x,y) D. (x-h,y-k)
11	Question Image	
12	Question Image	
13	Which of the following integrals can be evaluated	
14	Question Image	
15	Question Image	A. 5x^{4 + c} B. 1/6 x⁶+ c C. 5x²+ c D. 1/5 x⁶+ c
16	If $f(x) = ax^2$, and a>0, then the lowest point on the parabola is called.	A. Vertex of parabola B. Co-ordinates of parabola C. Roots of the equation D. Coefficient of the equation
17	Question Image	D. all are correct
18	I is not	A. Real number B. Natural number C. Prime Number D. Whole Number
		A. 13

19	The fifth term of the sequence $a_n = 2n + 3$ is _____	B. -13 C. 8 D. 3
20	A non-homogeneous linear system AX = B has no solution if	A. |A| = 0 B. |A|≠ 0 C. Rank (a) = no of variables D. Rank > no of variables