

Mathematics General Science Test Medium Mode

Sr	Questions	Answers Choice
1	Question Image	
2	$f(x) = x $ is a/an	A. Injective function B. Bijective function C. Surjective function D. Implicit function
3	In R, the multiplicative inverse of a is	A. 0 B. 1 C. -a D. $1/a$
4	Question Image	
5	Question Image	A. 0 B. 1
6	Question Image	
7	Question Image	
8	For trival solution $ A $ is	A. A B. $ A $ is non zero C. $A = 0$ D. None of these
9	In one hour the minute hand of a clock turns through	
10	Number of selections of n different things out of n	A. 1 B. nPr C. $n!$ D. nPr
11	The equation of line passing through intersection of line $x = 0$ and $y = 0$ and the point (2,2) is	A. $y = x$ B. $y = x - 1$ C. $y = x + 1$ D. $y = x + 1$
12	Question Image	A. $x^3 - x^2 + x + c$ B. $6x - 2 + c$ C. $x^3 - 2x + c$
13	The slope of the normal at $(5 \cos \theta, 5 \sin \theta)$ to the circle. $x^2 + y^2 = 25$ is:	A. $\tan \theta$ B. $\cos \theta / \sin \theta$ C. $-\cot \theta$ D. $-\tan \theta$
14	Matrices $A = [a_{ij}]_{2 \times 3}$ and $B = [b_{ij}]_{3 \times 2}$ are suitable for	A. BA B. A^2 C. AB D. B^2
15	0 is _____	A. A positive integer B. A negative integer C. A natural number D. An integer
16	Question Image	A. $4 \cos \alpha \sin \beta$ B. $2 \cos \alpha \sin \beta$

17 $\sin(\alpha + \beta) - \sin(\alpha - \beta) =$

$2 \cos \alpha \sin \beta$
C. $4 \cos \alpha \cos \beta$
D. $4 \sin \alpha \sin \beta$

18 If $(1+x)^n = C_0 + C_1x + C_2x^2 + \dots + C_nx^n$ then $C_0C_2 + C_1C_3 + C_2C_4 + \dots + C_{n-2}C_n =$

- A. $c = 0$
- B. $c = -1$
- C. $c = -2$
- D. $c = 1$

19 If the circle $x^2 + y^2 + 2gx + 2fy + c = 0$ passes through the origin then

20 Question Image