

## Mathematics General Science Test Medium Mode

Sr	Questions	Answers Choice
1	The domain of an infinite sequence is a	A. Set of natural numbers B. R C. Subset of N D. None of the above
2	Question Image	
3	A - B = _____	
4	Question Image	A. Principle of equality of fractions B. Rule for product of fractions C. Golden rule for fractions D. Rule for quotient of fractions
5	$\forall a \in \mathbb{R} \exists o \in \mathbb{R}$ such that $a + v = 0 + a = a$ is property of	A. Commutative law of addition B. Associative law of addition C. Additive identity D. Additive inverse
6	Question Image	
7	The first three terms in the expansion of $(1 - x)^{-3}$ are	A. $1 + 3x + 6x^2$ B. $1 - 3x + 6x^2$ C. $-3 - 3x - 6x^2$ D. $1 - 3x - 6x^2$
8	The 10th common term between the series $3+7+11+\dots$ and $1 + 6 + 11 + \dots$ is	A. 191 B. 193 C. 211 D. None of these
9	The value of $\sin^{-1} \frac{5}{13}$ is equal to	A. $\cos \frac{5}{13}$ B. $\tan^{-1} \frac{5}{12}$ C. $\cos^{-1} \frac{5}{12}$ D. $2 \cos^{-1} \frac{4}{5}$
10	Question Image	A. 0 B. 1
11	The distance of the point (a, b) from x-axis is	A. a B. b C. a + b
12	Question Image	
13	The principal value of $\sin^{-1}[-\frac{\sqrt{3}}{2}]$ is	A. $\frac{5\pi}{3}$ B. $-\frac{2\pi}{3}$ C.  D. $\frac{\pi}{3}$
14	If S is a sample space and event set $E = \Phi$ then $P(E)$ is	A. $>0$ B. 1 C. $<1$ D. 0
15	Question Image	
16	Area of $\triangle ABC =$	A. $ab \sin \alpha$ B. $\frac{1}{2} ab \sin \alpha$ C. $\frac{1}{2} ac \sin \alpha$ D. $\frac{1}{2} ac \sin \beta$
		A. $P(A) < 0$

17 If A is an event then which of the following is true  
B.  $0 \leq P(A) \leq 1$   
C.  $P(A) > 0$   
D. None

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19 Area of the triangle whose vertices are (2,3), (0,1), (0,0) is  
A. 6  
B. 2  
C. 4  
D. 1

20 If A is a skew-symmetric matrix of order n and P, any square matrix of order n. prove that  $P^T A P$  is  
A. Skew-symmetric  
B. Symmetric  
C. Null  
D. Diagonal