

Mathematics General Science Test Medium Mode

Sr	Questions	Answers Choice
1	There is no integer n for which $3n$ is	A. Even B. Prime C. Odd D. Real
2	Question Image	A. 1 B. 2 C. $3/2$ D. $5/2$
3	$\sin h x =$ _____	
4	How many signals can be given by 5 flags of different colours, using 3 flags at a time	A. 120 B. 60 C. 24 D. 15
5	If $E = \{ \}$, then $P(E)$	A. \emptyset B. $\{ \}$ C. $\{(2),(4),(6)...\}$ D. (\emptyset)
6	The Domain of $y = \sin x$ is _____	A. Set of real numbers B. Rational C. Irrational no. D. None of above
7	If $y=f(x)$ is a function then x is called	A. dependent variable B. independent variable C. constant D. none of these
8	Optimal solution is found by evaluation the objective function at	A. All point of feasible region B. Corner point C. Origin D. None
9	The coefficient of the second term of $(a+b)^4$ is	A. 1 B. 9 C. 3 D. 5
10	A line joining two distinct points on a parabola is called a _____ of the parabola.	A. Chord B. Tangent C. Latus rectum D. directrix
11	Question Image	
12	If α, β are the roots of $ax^2+bx+c=0$, the equation whose roots are doubled is	A. $ay^2 + 2by+c=0$ B. $ay^2+2by+4c=0$ C. $ay^2+2by+c=0$ D. $ay^2+by+4c=0$
13	Let a_1, a_2, a_3, a_4 and a_5 be such that $a_1, a_2,$ and a_3 are in A.P., a_2, a_3 and a_4 are in G.P and a_3, a_4 and a_5 are in H.P. Then, a_1, a_3 and a_5 are in	A. G.P. B. A.P. C. H.P. D. None of these
14	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

A. \sin

 $\cos \alpha$

 $\cos \beta$

 $\sin \alpha$

15 $\sin(\alpha - \beta) =$

$\sin(\alpha - \beta) = \sin\alpha \cos\beta - \cos\alpha \sin\beta$
 B. $\sin\alpha \cos\beta - \cos\alpha \sin\beta$
 C. $\sin\alpha \cos\beta + \cos\alpha \sin\beta$
 D. $\sin\alpha \cos\beta + \cos\alpha \sin\beta$

16 Question Image

- A. $2x^2$
- B. $2x \ln x$
- C. $2x^2 \ln 2$

17 The middle term(s) of $(a+x)^{11}$ is

- A. 6th term
- B. 6th or 7th
- C. 7th term
- D. 6th and 7th

18 Question Image

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

19 Question Image

20 Period of $3 \sin x$ is _____