

Mathematics General Science Test Medium Mode

Sr	Questions	Answers Choice
1	The Domain of $y = \sin x$ is _____	A. Set of real numbers B. Rational C. Irrational no. D. None of above
2	The equation of the directrix of the parabola $x^2 = 4ay$ is	A. $x + a = 0$ B. $x - a = 0$ C. $y + a = 0$ D. $y - a = 0$
3	1 degree = _____	A. 0.00175 rad B. 0.175 rad C. 0.0175 rad D. 1.75 rad
4	Question Image	A. Associate law of addition B. Commutative law of addition C. Additive identity D. Closure law of addition
5	The transport of a rectangular matrix is a	A. Square matrix B. Rectangular matrix C. Row matrix D. Column matrix
6	The identity elements with respect to subtraction is	A. 0 B. 1 C. -1 D. Does not exist
7	Which of the following has the same value as i^{113}	A. i B. -1 C. $-i$ D. 1
8	$\cos 315^\circ =$ _____	
9	Z is the set of integers (\mathbb{Z}) is a group with $a * b = a + b + 1$, $a, b \in G$. then inverse of a is	A. $-a$ B. $a + 1$ C. $-1 - a$ D. None of these
10	Geometrically the modulus of a complex number represents its distance from the	A. Point (1,0) B. Point (0,1) C. Point (1,1) D. Point (0,0)
11	If two balls are drawn from a bag containing 3 white, 4 black and 5 red balls. Then the probability that the drawn balls are of different colours is	A. $1/66$ B. $3/66$ C. $19/66$ D. $47/66$
12	The period of $2 \cos x$ is	A. 30π B. 7π C. 5π D. 2π
13	Question Image	
14	Question Image	
15	If $z_1 = 2 + 6i$ and $z_2 = 3 + 7i$, then which expression defines the product of z_1 and z_2 ?	A. $36 + (-32)i$ B. $-36 + 32i$ C. $6 + (-11)i$ D. $0, +(-12)i$
16	If $f(x) = x^3 - 2x^2 + 4x - 1$ then $f(0)$ is	A. 0 B. 1 C. -1 D. none of these
17	$[i, j, k]$	A. 0 B. 2 C. 1 D. -1

D. -2

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Question Image

- A. Imaginary
- B. Rational
- C. Irrational
- D. Real numbers

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Question Image

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A relation in which the equality is true for all values of the unknown is called _____

- A. An identity
- B. An equation
- C. A polynomial
- D. None of these