

ECAT Mathematics MCQ's Test For Full Book

Sr	Questions	Answers Choice
1	To draw conclusions from premises believed to be true, this way of reasoning is called	A. deduction B. induction C. implication D. disjunction
2	Question Image <input style="width: 500px; height: 20px;" type="text"/>	A. Diagonal matrix B. Scalar matrix C. Triangular matrix D. Identity matrix
3	$n!/(n-1)! =$	A. n B. n! C. (n-1)! D. 0!
4	A sequence whose reciprocal is an A.P is called	A. Oscillator B. H.P C. G.P D. None of these
5	Question Image <input style="width: 500px; height: 20px;" type="text"/>	A. 0 B. 1 C. -1 D. 2
6	Question Image <input style="width: 500px; height: 20px;" type="text"/>	
7	The square root of $2i - 20i$ is	A. $\pm(5 - 2i)$ B. $\pm(5 + 2i)$ C. $(5 - 2i)$ D. None of these
8	The complement of set A relative to universal set U is the set	
9	Question Image <input style="width: 500px; height: 20px;" type="text"/>	A. Addition B. Multiplication C. Division D. Both addition and multiplication
10	If $\sin 6\theta + \sin 4\theta + \sin 2\theta$, then $\theta =$	
11	If $2 \tan^{-1}(\cos x) = \tan^{-1}(\operatorname{cosec}^2 x)$, then x is equal to	A. <math>\pi/3</math> B. <math>\pi/2</math> C. <math>\pi/6</math> D. <math>\pi</math>
12	The symbol \ni stand for	A. Such that B. There exist C. For all D. Belongs to
13	Question Image <input style="width: 500px; height: 20px;" type="text"/>	A. A variable B. A constant C. 0 D. ...

D. None of these

14 Question Image

15 Fifteen girls compete in a race. The first three places can be taken by them in

- A. 3! ways
- B. 12! ways
- C. 15 x 14 x 13 ways
- D. 42 ways

16 Question Image

- A. K/6
- B. 2K
- C. 3K
- D. 6K

17 Question Image

18 Question Image

- A. 0
- B. 1
- C. 2
- D. 4

19 If $\forall a, b \in R$, then $a + b \in R$ is a property

- A. Closure law of addition
- B. Associative law of addition
- C. Additive inverse
- D. Additive identity

20 If $|a| = |b| = |a + b| = 1$, then $|a + b| = 5$, then $|a - b| =$

- A. 4
- B. 6
- C. 5
- D. 3