ECAT Pre Engineering Entry Test

Sr	Questions	Answers Choice
1	If A is any matrix then its additive inverse is	A. A B. A⁻¹ C. A^t D. -A
2	Question Image	
3	The transport of a rectangular matrix is a	A. Square matrix B. Rectangular matrix C. Row matrix D. Column matrix
4	The transport of a square matrix is a	A. Row matrix B. Column matrix C. Square matrix D. Null matrix
5	The transport of a null matrix is	A. Row matrix B. Column matrix C. Square matrix D. Null matrix
6	Question Image	
7	Two matrices A and B are conformable for the product AB if	A. Both A and B are square B. Both A and B are symmetric C. Number of rows of A = number of columns of B D. Number of columns of A = number of rows of B
8	Question Image	A. 3 x 1 B. 1 x 3 C. 3 x 3 D. 1 x 1
9	In order of A is m x n and order of B is n x p then order of AB is	A. m x m B. n x n C. m x p D. p x m
10	Question Image	A. Square matrix B. Row matrix C. Symmetric matrix D. Null matrix
11	Question Image	A. Hermitian matrix B. Skew-hermitian matrix C. Symmetric matrix D. Identity matrix
12	Question Image	A. Identity matrix B. Diagonal matrix C. Null matrix D. Hermitian matrix
13	A square matrix A for which $A^t = -A$ is called a	A. Column matrix B. Symmetric matrix C. Skew-symmetric matrix D. Row matrix
14	A square matrix A for which $A^t = A$ is called a	A. Column matrix B. Symmetric matrix C. Skew-symmetric matrix D. Row matrix
15	Question Image	A. Scalar matrix B. Identity matrix C. Null matrix D. Symmetric matrix
16	A diagonal matrix in which the diagonal elements are equal is called a	A. Null matrix B. Identity matrix C. Scalar matrix

		D. Row matrix
17	A square matrix all of whose elements except the main diagonal are zeros is called a	A. Null matrix B. Singular matrix C. Symmetric matrix D. Diagonal matrix
18	A matrix with a single column is called	A. Column matrix B. Row matrix C. Identity matrix D. Null matrix
19	A matrix with a single row is called a	A. Column matrix B. Row matrix C. Null matrix D. Identity matrix
20	A matrix in which the number of rows is equal to the number of columns is called a	A. Diagonal matrix B. Rectangular matrix C. Square matrix D. Scalar matrix
21	A matrix in which the number of rows is not equal to the number of columns is called a	A. Diagonal matrix B. Rectangular matrix C. Square matrix D. Scalar matrix
22	Question Image	A. 2 x 2 B. 2 x 3 C. 3 x 2 D. 3 x 3
23	Question Image	A. 2 x 2 B. 2 x 3 C. 3 x 2 D. 3 x 3
24	The order of the matrix [1 2 3] is	A. 1 x 1 B. 3 x 3 C. 3 x 1 D. 1 x 3
25	If there are m rows and n columns in a matrix then its order is	A. m x n B. m x m C. n x n D. n x m
26	Question Image	
27	Question Image	A. Biconditional B. Implication C. Antecedent D. Hypothesis
28	Question Image	A. Conclusion B. Implication C. Antecedent D. Hypothesis
29	If we have a statement "if p then q" then q is called	A. Conclusion B. Implication C. Unknown D. Hypothesis
30	If p and q are two statements then their biconditional 'p if q' is denoted by	