

ECAT Pre Engineering Entry Test

Sr	Questions	Answers Choice
1	Question Image	A. 12 B. 13 C. 14 D. 15
2	Question Image	A. 15/23 B. 7/15 C. 7/8 D. 15/7
3	If x, y, z are the p th, q th, r th terms of an A.P. and also of G.P., then $x^y \cdot y^z \cdot z^x$ equals	A. xyz B. 0 C. 1 D. None of these
4	Let S_n denote the sum of the first n terms of an A.P. If $S_{2n} = 3 S_n$, S_n is equal to	A. 4 B. 6 C. 8 D. 10
5	If p, q, r are in A.P., a is G.M. between p and q and b is G.M. between q and r , then a^2, q^2, b^2 are in	A. A.P. B. G.P. C. H.P. D. None of these
6	The A.M. of two numbers is 34 and G.M. is 16, the numbers are	A. 2 and 64 B. 64 and 3 C. 64 and 4 D. None of these
7	If $a^x = b^y = c^z$ and a, b, c are in G.P. then x, y, z are in	A. A.P. B. G.P. C. H.P. D. None of these
8	If S_r denotes the sum of the first r terms of a G.P., then $S_n, S_{2n} - S_n, S_{3n} - S_{2n}$ are in	A. A.P. B. G.P. C. H.P. D. None of these
9	Given two numbers a and b . Let A denote the single A.M. between these and S denote the sum of n A.M.'s between them. Then S/A depends upon	A. n, a, b B. n, a C. n, b D. n
10	The third term of a G.P. is 4, The product of first five terms is	A. 43 B. 45 C. 46 D. None of these
11	5th term of a G.P. is 2, then the product of first 9 terms is	A. 256 B. 128 C. 512 D. None of these
12	An A.P. consists of n (odd terms) and its middle term is m . then the sum of the A.P. is	A. $2mn$ B. $\frac{1}{2}mn$ C. mn D. $mn \times 2$
13	If a, b, c, d, e, f are in A.P., then $e - c$ is equal to	A. $2(c - a)$ B. $2(f - d)$ C. $2(d - c)$ D. $d - c$
14	If a, b, c are in A.P., then $3^a, 3^b, 3^c$ are in	A. A.P. B. G.P. C. H.P. D. None of these
15	The next term of the sequence 1, 2, 4, 7, 11, is.	A. 15 B. 16 C. 17 D. 18

16	Question Image	
17	A relation in which the equality is true only for some values of the unknown is called	A. An identity B. An equation C. A polynomial D. None
18	A fraction in which the degree of the numerator is less the degree of the denominator is called	A. Polynomial B. Proper fraction C. Rational fraction D. None
19	Question Image	
20	$x^2 + x - 5 = 0$ is	A. A polynomial B. An inequality C. An identity D. None
21	$(x + 2)^2 = x^2 + 4x + 4$ is	A. A linear equation B. A cubic equation C. A quadratic equation D. None
22	Question Image	
23	Question Image	A. $A = x, B = 1$ B. $A = 0, B = 2$ C. $A = -1, B = 1$ D. $A = x - 1, B = x + 1$
24	Which is a proper rational fraction	
25	Question Image	
26	There are _____ types of rational fraction	A. Three B. Four C. Five D. Two
27	Question Image	A. Rational fraction B. Proper fraction C. Improper rational fraction D. None of these
28	Question Image	A. Proper fraction B. Improper fraction C. Rational fraction D. None of these
29	Question Image	A. Improper rational fraction B. Rational fraction C. Proper rational fraction D. None of above
30	The symbol _____ shall be used both for equation and identity	A.