ECAT (Pre-Eng) Mathematics Chapter 17 Functions and Limits

Sr	Questions	Answers Choice
1	x = secθ,y = tanθ are the parametric equations of	A. Circle B. Hyperbola C. Ellipse D. parabola
2	Question Image	A. 1 B. 0 C. -2 D. 3
3	The domain of the function x/x^2 -4 is given by	A. R B. R + 2 C. [R - (<u>+</u>2) D. R-4
4	If f (x) is defined and continuous then f (x) is always	A. Rational function B. Trigonometric function C. Logarithmic function D. All are correct
5	$\pi$is the period of the function	A. |sin x| + |sin x| B. sin⁴x + cos x C. sin (sin x) + sin (cos x) D. None of these
6	The range of y=x2 + 1 is the set of non-negative real numbers except	A. 0≤ y < 1 B. 0 < y < 1 C. 0≤ y≤ 1 D. 0 < y≤1
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	The function f(x) =|x| is a/an_____function	A. Even B. Odd C. Both even as well as odd D. Neither even nor odd
9	If $f(x) = x^2$then f(0) is	A. 0 B. 1 C. 2 D. none of these
10	If $f(x) = x^2$then f(-2) is	A. -2 B. 2 C. 4 D. -4
11	f(x) = x3-x/x2+1 is :	A. an even function B. an odd function C. an even and implicit function D. neither even nor a odd
12	Question Image	A. 0 B. 1 D. -1
13	xy= 2 is:	A. a constant function B. an identity function C. an improper function D. implicit function
14	Question Image	A. 2 D. 0
15	A function f is said to be an even if f(-x) =	A. 0 B. 1 C. f(x) D. -f(x)
16	If $f(x)= x^3$ then f(-2) is	A. -2 B. -4 C. -8

		D. 8
17	Question Image	A. 0 B. 1 D. none of these
18	The value of x which is unchanged by the mapping in the function defined by f ; x $\rightarrow x^2 + 5x - 5$ for $x > 0$ is	A. 1 B. 5 C. -5 D. -1
19	Question Image	A. [0,1[B. [0, 1] C.]0, 1[D. None of these
20	Question Image	A. 2 B. 6