

ECAT (Pre-Eng) Mathematics Chapter 22 Circle

Sr	Questions	Answers Choice
1	Question Image	
2	If the cutting plane is parallel to the axis of the cone and intersects both of its nappes, then the curve of intersection is	A. an ellipse B. a circle C. a parabola D. a hyperbola
3	Question Image	D. None of these
4	If the intersecting plane is parallel to a generator of the cone, but intersects its one nappe only, the curve of intersection is	A. a circle B. an ellipse C. a parabola D. a hyperbola
5	The equation: $x^2 + y^2 + 2gx + 2fy + c = 0$, represents	A. pair of lines B. a circle C. a general second degree equation D. a hyperbola
6	The equation of the circle whose centre is (-3, 5) and having radius 7 is	A. $(x-3)^2 + (y+5)^2 = 7^2$ B. $(x-3)^2 + (y+5)^2 = 7$ C. $(x-3)^2 + (y-5)^2 = 7$ D. $x^2 + y^2 + 6x - 10y - 15 = 0$
7	If three non-collinear points through which a circle passes are known, then we can find the	A. variables x and y B. value of x and c C. three constant f, g and c D. inverse of the circle
8	If the cone is cut by a plane perpendicular to the axis of the cone, then the section is a	A. circle B. ellipse C. hyperbola D. parabola
9	Apollonius was a	A. rocket B. Muslim scientist C. Greek mathematicians D. method of finding conics
10	A second degree equation in which coefficients of x^2 and y^2 are equal and there is no product term xy represents	A. a parabola B. a circle C. an ellipse D. a pair of lines
11	Question Image	
12	The fixed point which lies on the axis of the cone is called its	A. axis B. apex C. nappes D. axis
13	The set of all points in the plane that are equally distant from a fixed point is called a	A. parabola B. ellipse C. hyperbola D. circle
14	Question Image	
15	Question Image	
16	If a plane passes through the vertex of the cone, then the intersection is	A. an ellipse B. a parabola C. a hyperbola D. a point circle
17	If the centre of the circle is the origin, then equation of the circle is	A. $x^2 + y^2 = 0$ B. $2gx + 2fy - c = 0$ C. $x^2 + y^2 = r^2$

$$r^2 + z^2 = 0$$

18 The vertex of the cone is also called

- A. nappes
- B. axis
- C. rulings
- D. apex

19 Question Image

- A. 1
- B. 2
- C. 0
- D. None of these

20 The equation of the circle with centre at (5, -2) and radius 4 is