

ECAT Pre General Science Mathematics Online Test

Sr	Questions	Answers Choice
1	$\sin 90^\circ = \underline{\hspace{2cm}}$	A. -1 B. 0 C. 1 D. Undefined
2	$\cos 0^\circ = \underline{\hspace{2cm}}$	A. -1 B. 0 C. 1 D. Undefined
3	$\cos 60^\circ = \underline{\hspace{2cm}}$	A. 1 B. 2 C. 1/2 D. 3
4	$\operatorname{cosec} 60^\circ = \underline{\hspace{2cm}}$	
5	$\tan 30^\circ = \underline{\hspace{2cm}}$	
6	$\sec 30^\circ = \underline{\hspace{2cm}}$	
7	$\cot 45^\circ = \underline{\hspace{2cm}}$	
8	$\sin 45^\circ = \underline{\hspace{2cm}}$	
9	Question Image 	A. I quadrant B. II quadrant C. III quadrant D. IV quadrant
10	Question Image 	A. I quadrant B. II quadrant C. III quadrant D. IV quadrant
11	Question Image 	A. I quadrant B. II quadrant C. III quadrant D. IV quadrant
12	Question Image 	A. I quadrant B. II quadrant C. III quadrant D. IV quadrant
13	Question Image 	
14	Question Image 	A. -1 B. 0 C. 1 D. None of these
15	Question Image 	A. -1 B. 0 C. 1 D. None of these
16	Question Image 	
17	The equation of the circle with centre (5, -2) and radius 4 is	A. $(x-5)^2 + (y+2)^2 = 16$ B. $(x-5)^2 + (y+2)^2 = 4$ C. $(x-5)^2 + (y-2)^2 = 16$ D. $(x-5)^2 + (y-2)^2 = 4$
18	The equation of the circle with centre (-3, 5) and radius 7 is	A. $(x-3)^2 + (y+5)^2 = 49$ B. $(x-3)^2 + (y-5)^2 = 49$ C. $(x+3)^2 + (y+5)^2 = 49$ D. $(x+3)^2 + (y-5)^2 = 49$

D. $(x+3)^2 + (y-5)^2 = 7^2$

19 The equation of the circle with centre origin and radius r is

- A. $x^2 + y^2 = 1$
 - B. $x^2 + y^2 = r^2$
 - C. $x^2 + y^2 = 0$
 - D. $x^2 - y^2 = r^2$
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20 The equation of the circle with centre $(-h, -k)$ and radius r is

- A. $(x+h)^2 + (y+k)^2 = r^2$
 - B. $(x+h)^2 + (y-k)^2 = r^2$
 - C. $(x-h)^2 + (y+k)^2 = r^2$
 - D. $(x-h)^2 + (y-k)^2 = r^2$
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21 Question Image

- A. 0
 - B. 1
 - C. -1
 - D. 2
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23 Question Image

- A. $(x+h)^2 + (y+k)^2 = r^2$
 - B. $(x+h)^2 + (y-k)^2 = r^2$
 - C. $(x-h)^2 + (y+k)^2 = r^2$
 - D. $(x-h)^2 + (y-k)^2 = r^2$
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24 The equation of the circle with centre (h, k) and radius r is

- A. radius of the circle
 - B. secant of the circle
 - C. chord of the circle
 - D. diameter of the circle
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25 The constant distance of all points of the circle from its centre is called the

- A. chord of the circle
 - B. centre of the circle
 - C. diameter of the circle
 - D. radius of the circle
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27 Question Image

- A. an ellipse
 - B. a hyperbola
 - C. a circle
 - D. a parabola
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28 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. I and II quadrants
 - B. I and III quadrants
 - C. II and III quadrants
 - D. II and IV quadrants
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29 Question Image

- A. an ellipse
 - B. a hyperbola
 - C. a circle
 - D. a parabola
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30 If the intersecting plane is parallel to a generator of the cone, but intersects its one nappe only, the curve obtained is