

ECAT (Pre-Eng) Mathematics Chapter 15 Inverse Trigonometric Functions

Sr	Questions	Answers Choice
1	The Principal value of $\sin^{-1}(-1/1/2)$	<p>A. $\pi/2$</p> <p>B. $-\pi/2$</p> <p>C. π</p> <p>D. $-\pi$</p>
2	What is the value of $\cos^{-1}(1/2)$?	<p>A. $\pi/3$</p> <p>B. $\pi/4$</p> <p>C. $3\pi/2$</p> <p>D. $\pi/6$</p>
3	$\tan^{-1}(1/4) + \tan^{-1}(2/9)$ is equal to	<p>A. $\frac{1}{2} \cos^{-1}(3/5)$</p> <p>B. $\frac{1}{2} \sin^{-1}(3/5)$</p> <p>C. $\frac{1}{2} \tan^{-1}(3/5)$</p> <p>D. $\tan^{-1}1/2$</p>
4	Question Image	
5	Question Image	
6	$\cos^{-1}(-x) =$	<p>A. $-x$</p> <p>B. $1/x$</p> <p>C. $\tan^{-1} x$</p> <p>D. $\pi - \cos^{-1} x$</p>
7	$\sin^{-1} x =$	<p>A. $\tan^{-1} x$</p> <p>B. $\operatorname{cosec}^{-1} x$</p> <p>C. $\operatorname{Cosec} x$</p> <p>D. $\operatorname{cosec}^{-1}(1/x)$</p>
8	The range of the principal sine function is	
9	Question Image	
10	Question Image	
11	Question Image	
12	The domain of the principle sine function is	
13	$\sin^{-1}[-1/2] =$ _____	
14	Question Image	<p>A. $\pi/3$</p> <p>B. $\pi/4$</p> <p>C. $\pi/2$</p> <p>D. π</p>
15	$\sin^{-1}(\sin 2\pi/3) =$	<p>A. $\pi/2$</p> <p>B. $2\pi/3$</p> <p>C. $-3\pi/2$</p> <p>D. $\pi/3$</p>
16	In the interval $0 \leq x \leq \pi$, the sine is	<p>A. Not a function</p> <p>B. Not defined</p> <p>C. Infinity</p> <p>D. Not one-to-one function</p>

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Question Image

B. ><i>π</i>/ 3

C. ><i>π</i>/ 4

D. ><i>π</i>

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Question Image

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Question Image

20

Question Image