

## STA-301 Quiz OnlineTest

Sr	Questions	Answers Choice
1	$d/dx[\operatorname{cosec} x]$	A. $1/1+\cos^2 x$ B. $-\cos x/1-\cos^2 x$ C. $1/1-\cos^2 x$
2	The equation of the line of the form $y-y_1=m(x-x_1)$ is known as	A. Point Slope form B. Two points form C. Intercept form D. Slop intersect form
3	The graph of the equation $y=x^2-4x+5$ will represent	A. Parabola B. Single line C. Two straight line D. Ellipse
4	If $2y-y=-3$ then $dy/dx$ ?	A. 2 B. -2 C. 0 D. -3
5	$\lim_{x \rightarrow a} f(x) = \_\_\_\_\_\_$ where $f(x)=k$ ?	A. $k+2$ B. $K+1$ C. $k$
6	Chain rule is a rule for differentiating _____ of functions	A. Product B. Sum C. Composition D. Difference
7	The graph $x=y^2$ is symmetric about _____ axis?	A. X-axis B. Y-axis C. Origin
8	Suppose $f$ and $g$ are differentiable function of $x$ then $d/dx[f/g]$	A. $[g][f'] - [f][g']/g^2$ B. $[g'] [f] - [f'] [g]/g^2$ C. $[g'] [f] - [f'] [g]/f^2$
9	The set $\{x:a \leq x \leq b\}$ can be written in the form of interval ?	A. $(a,b)$ B. $(a,b)$ C. $[a,b]$
10	$\pi$ is a _____ number	A. rational B. irrational C. natural D. integer
11	If $f(x)=3x^8+2x+1$ then $f'(x)$	A. $3x^7+2$ B. $24x^7+2$ C. $3x^7+2$
12	A line is called a tangent line to the circle if it meets the circle at precisely.....	A. one point B. two point C. infinite points
13	Suppose that $f$ and $g$ are differentiable function of $x$ then $d/dx(fg)=$	A. $[f'] [g] - [f] [g']/g^2$ B. $[f'] [g]$ C. $[f'] [g] + [f] [g']$
14	$\lim_{x \rightarrow \infty} (-2x) =$	A. -2 B. 0 C. 2 D. Does not exist
15	$\tan(x)$ is continuous every where except at points	A. $\frac{\pi}{2} + k\pi$ where $k = (1, 3, 5, \dots)$ B. $\frac{\pi}{2} + k\pi$ where $k = (1, 3, 5, \dots)$ C. $\frac{\pi}{2} + k\pi$ where $k = (1, 3, 5, \dots)$ D. $\frac{\pi}{2} + k\pi$ where $k = (1, 3, 5, \dots)$

84);  $>\pi/2$  where  $k=(2,4,6,\dots)$

C.  $<\pi/2$  where  $k=(1,2,3,4,5,6,\dots)$

16	_____ is the special case of Taylor's Theorem	<p>A. Roll's theorem</p> <p>B. Picard Method</p> <p>C. Integration</p>
17	What is the length of each subinterval,if the interval [1,3]is divided into n sub interval of equal length?	<p>A. <math>1/n</math></p> <p>B. <math>2/n</math></p> <p>C. <math>3/n</math></p>
18	Which operation could not be applied on the function?	<p>A. Cross Product</p> <p>B. Sum</p> <p>C. Division</p>
19	If $f(x)=e^{-x}$ at $x=0$ be the taylor series ,then which of the following is also true?	<p>A. Arithmetic Series</p> <p>B. Maclaurin Series</p> <p>C. Geometric Series</p> <p>D. Harmonic Series</p>
20	A function f is called antiderivative of a function on a given interval if _____ =f(x),for all x in that interval	<p>A. <math>F'(x)</math></p> <p>B. <math>F(x)</math></p> <p>C. <math>f(x)</math></p> <p>D. <math>f'(x)</math></p>