Math 201	Quiz # 1(a)	Time: 20 minutes		Date: 28-2-201
Name	ID #	Sr #	Sec. 7	Marks:- $/7$

Q 1. Find area of the surface generated by revolving the curve: $x = \cos t, y = 1 + \sin t, \ (0 \le t \le \pi/2)$ about the x- axis.

Q2. Sketch the polar curve: $r = 3 \cos 3\theta$. Is this curve symmetric about the origin?

Math 201	Quiz # 1(b)	Time: 20 minutes		Date: 28-2-2017	
Name	ID #		Sr #	Sec. 7	Marks:- /7

Q 1. Find the length of the curve: $C : x = \cos t + t \sin t$, $y = \sin t - t \cos t$, $-\frac{\pi}{2} \le t \le \frac{\pi}{2}$.

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Q2. Graph the set of points whose polar coordinates (r, θ) satisfy the conditions:

(i) $\theta = -\frac{\pi}{4}, -3 \le r \le 3$ (ii) $\frac{\pi}{3} \le \theta \le \frac{2\pi}{3}, \ -2 \le r \le 0.$

Q1 Find the slope of the curve C: $x = \sqrt{3 - \sqrt{t}}$, $y = yt - \sqrt{t}$ at $t = 4$.

Q2. Sketch the polar curve $r = -2\cos\theta$. Is the curve symmetric about the axes?

Math 201	Quiz # 1(d)	Time: 20 minutes		Date: 28-2-2017	
Name	ID #	Sr #	Sec. 13	Marks:- $/7$	

Q 1. Find points on the polar curve $r = 1 + \sin\theta$ at which the tangent line is horizontal.

Q2. Replace the polar equation: $r\sin\left(\theta + \frac{\pi}{6}\right) = 2$, by an equivalent Cartesian equation and sketch it.