

5 points for each question
No calculators allowed

Math 285.002
Quiz 1
September 15, 2000

Name

Do all of your work directly on this sheet, using the back for scratch if necessary. No calculators are allowed. Circle your answers.

1. If $x = 2 + \tan t$ and $y = \sin t$, find $\frac{dy}{dx}$ and $\frac{d^2y}{dx^2}$, circling your answers.

2. If $x = \sin^2 t$ and $y = \cos^2 t$ when $0 \leq t \leq \frac{\pi}{2}$, find the length of the resulting curve.