Math 150 Quiz 4 Fall 2010

Name: _____

NON-GRAPHING CALCULATORS ALLOWED

1. [10 points] Suppose $x^2y + \tan(xy) = 7$. Find y' in terms of x and y.

2. [10 points] Let $z^2 = x^2 + y^2$. Suppose z, x, and y are functions of t. It is given that $dx/dt = 2$ and $dy/dt = 3$. Find dz/dt at the moment when $x = 5$ and $y = 12$.