

MATH 1A – QUIZ 5

PEYAM RYAN TABRIZIAN

Name: _____

Instructions: You have 12 minutes to take this quiz, for a total of 10 points. Good luck, and may the Chen Lou be with you! :)

(1) (5 points, 1 point each) In each question, find y' . Do **NOT** simplify your answers (unless otherwise specified)!

(a) $x^y = y^x$

(b) $y = \sin^{-1}(\cos(x))$ (Simplify!)

(c) $y = (\ln(x))^{\ln(x)}$ (yo dawg...)

(d) $Pe^{yam} = x$ (P, a, m are constants. Write your answer without using y)

(TURN PAGE!!!)

Date: Friday, October 11th, 2013.

(e) The equation of the tangent line to the curve $y^2(y^2 - 4) = x^2(x^2 - 5)$ at the point $(0, -2)$

(2) (5 points) Show that the sum of the x -intercept and the y -intercept of any tangent line to the curve $\sqrt{x} + \sqrt{y} = \sqrt{c}$ is equal to c