Quiz 2   MAC-2312   Spring 2014   **Name:** _____

To receive credit you MUST SHOW ALL YOUR WORK.

1. (8 pts) Evaluate each integral (4 pts each):

(a) $\displaystyle\int_0^1 \frac{x}{1+x^2}\, dx$

(b) $\displaystyle\int_0^{\pi/4} \sec^2 x \sqrt{1+3\tan x}\, dx$

2. (3 pts) Find the average value of $\sin x$ on the interval $[0, \pi]$.