

Name: _____

Math 32, Spring 2010, Section 101
Quiz 8

(1) (3 pts) If $\sin t = \sqrt{3}/4$ and $5\pi/2 < t < 3\pi$, compute $\tan t$.

(2) (4 pts) A wheel of radius 12cm spins at 6 revolutions per second. (a) Find the angular speed of the wheel in radians/second. (b) Find the linear speed, in units of cm/sec, of a point halfway between the center of the wheel and the circumference.

(3) (3 pts) The following figure shows a sector with central angle α (in radians) in a circle of radius r . Find a formula for the area of the shaded region in terms of α and r .

