

Calculus III, Math 201
Fall 2012, Term 121

Quiz 2 Section 09

Name: _____

SID: _____

Serial Number: _____

Instructions: Show Your Work!

- (2^{pts}) **1.** Find an equation of the sphere that passes through the origin and whose center is $(2, -6, 3)$.
- (5^{pts}) **2.** Draw the vectors $\vec{a} = \langle 2, 3 \rangle$, $\vec{b} = \langle -1, 2 \rangle$ and $\vec{c} = \langle 1, 7 \rangle$ and find the scalars s and t , if they exist, such that $\vec{c} = s\vec{a} + t\vec{b}$.
- (3^{pts}) **3.** Find the angle between a diagonal of a cube and one of its edges ?