

Math 2673

Special Assignment 5
(20 points)

Name:

Evaluate the triple integrals $\iiint_R x^2 + y^2 dV$ and $\iiint_R z dV$, where R is the region bounded above by the sphere $x^2 + y^2 + z^2 = 4$, below by the cone $z^2 = 3(x^2 + y^2)$, and such that $x \geq 0$.