## **CS 491/691X – Topics: Introduction to Robotics**

**Instructor: Monica Nicolescu** 

Homework #2

Due: April 13

- **1.** [10 points] Describe the difference between robot control using a horizontal decomposition and a vertical decomposition.
- **2.** [10 points]. Describe how activities can be sequenced in the Subsumption Architecture, without using explicit communication "wires" between the task-achieving layers.
- **3.** [10 points]. Describe at least two principles of good design of a behavior-based control system.
- **4.** [10 points] . Describe briefly how Toto the robot represented a map of its environment.