

MIT9904-05 A Framework for Automation Using Networked
Information Appliances

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Project Overview

- Targeting automation of many information-intensive tasks
- Automation requires the synergistic use of sensors, standard hardware interfaces, intelligent software and adaptive algorithms
 - Sensors provide audio, image, pressure or position input
 - Software controls actuators within appliances and also interface with other appliances
- We are building a framework that allows for rapid deployment of information-automation solutions



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Progress Through June 2000

- Interface to speech server SLS-Lite to recognize specified set of voice commands
- Appliance Request Broker (ARB) infrastructure to provide a platform for networked information appliances
- Communication layer underneath the ARB based on digital RF to send information from one appliance to another
- Automation layer on top of the ARB to allow a script, i.e., a sequence of commands for appliances, to be easily written



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Research Plan for the Next Six Months

- Create automation scripts that will sequence through specific combinations of commands to objects
 - Determine best route taking into account traffic conditions
 - Fast search for information across web-sites and databases