

Agent Speak with Jason

This document shows how to run the Jason program that describes a food supply scenario. The original data set can be found in the folder named “restaurant”.

Dependencies

This project depends on the AgentSpeak and should be executed by Jason software. If you want to use Eclipse to run it, there would be some unexpected errors.

Running Queries

The Jason project consists of the following files

| File | Description |
|------------------|-------------------|
| restaurant.mas2j | Main Jason file |
| ResEnv.java | Jason environment |
| waiter.asl | Waiter agent |
| kitchen.asl | Kitchen agent |
| wall.asl | Wall agent |

The document named restaurant.mas2j shows the name of all agents and environments, which could be regraded as the entrance of the project. The document called ResEnv.java provides the operating environment of this project and all functions are programmed in this document. The other three agent files show all plans and their communications in the environment.

Results

There is a video file named demo that illustrates how the program works. As you can see in this video, three agents achieve the restaurant serving and avoiding specific locations via communication. And after the whole cycle is completed ten times, the waiter agent will stop because of the assumption that the kitchen does not have enough food material.