

Social simulation course 2019

Individual Project

Download and install NetLogo from <http://ccl.northwestern.edu/netlogo/index.shtml>

Open the segregation model included in the model library (Social science/segregation).

Based on this model make the following three changes and report about the results of each of them.

Not more than 1-2 A4 for each part. Also, include the model for each of the three parts separately.

Do not build one extension or change in top of the other, but start from the basic model with each part again.

1. The find-new-spot procedure has the agents move locally until they find a spot. Rewrite this procedure so the agents move directly to an appropriate new spot. How does this affect the simulation?
2. Incorporate social networks into this model. I.e. unhappy agents decide on a new location based on information about what a neighborhood is like from other agents in their network. Their network can consist of 8, 16 or 32 other agents that can just tell the number of agents of a certain color around them. The network keeps the same throughout the simulation. How does this change the segregation?
3. In the standard model all agents have the same similarity preference. Change this to a uniform distribution over the global preference. What is the effect on the segregation?

Deadline for submission: May 2, 2019, 18:00