CPSC 322: Intro to Artificial Intelligence
Term 1, 2020

Assignment 0

Due: **Before class**, 15 September 2020

Collaboration Policy and References

This assignment is to be done groups of 1, 2 or 3. You may discuss this assignment with other students, but do not describe the same application as other groups you discuss with. You must cite all references you use, including web pages, papers, books, and personal correspondence. All of the phrasing must be your own. If you want to copy a phrase or a sentence, put it in quotations and give a reference (including page numbers) where we can find it. Not doing this is a form of plagiarism and academic misconduct.

Submission

Please post your solution on the Canvas discussion board in the appropriate thread. If you would prefer to not post it to Canvas, please upload the assignment in pdf.

The aim of this assignment is to learn about what AI applications exist, and to think about what intelligence could mean. We will discuss the applications during the class of September 10. Please be prepared to play your part in the discussion and talk about the applications you found.

The Assignment

Find out about one application of AI, not a class of applications but a specific system. Write at most one page (less than 300 words) that describes the application you found. Use proper sentences. You should try cover as many of the questions below as possible, but it is most imprtant that it is a readable narrative.

1. What does the application do? (e.g., control a spacecraft, perform medical diagnoses, provide intelligent help for computer users, shop on eBay, play Warcraft). Tell us something interesting about the system.

2. What actions does it perform?

3. What goals / preferences does the application embody? Is the goal implicit or explicit?

4. What prior knowledge is incorpored?

5. What past experiences (if any) does it use to learn?

6. What stimuli does it receives from the environment ?

7. What AI technologies does the application use (e.g., belief networks, Markov models, knowledge graphs, heuristic search, constraint satisfaction, planning, neural networks)?

8. Why is it intelligent? Which aspects make it an intelligent system?

9. Is it an experimental system or a fielded system (i.e., used in a real world setting)? If it is a fielded system, in what context is it used and how many users does it have? If it is an experimental system, do the authors mention how much more work would be required to turn it into a fielded application? What impact on the world could such a system potentially have?

10. Is evidence provided on how well the application performs? If yes, describe this evidence; is it convincing? If not, describe how convincing evidence could be collected.

11. References: where did you get the information about the application? What books, articles, or web pages would be useful references for others wanting to learn more about this application?

You'll receive a partipation mark if you contribute to the discussion in class or for being the first to post on a particular application.