

## CSCI 446 Final Exam

Fall 2020

Name: \_\_\_\_\_

As discussed in class, you may bring in an 8 ½ x 11 cheat sheet, both sides, for the exam. The exam is scheduled Tuesday 11/24 from 11:30-1:30 in our regular classroom. On the day of the final, I will randomly assign a topic to each student, and you will have the exam time to answer all of the below about that topic.

- Describe this technique/approach in detail.
- What characteristics of a problem would give you reason to use this particular technique/approach?
- What are the salient features and/or characteristics of this technique/approach?
- Are there different ways of using this approach?
- What are advantages and disadvantages of this approach, and perhaps its different models?
- What are the trade-offs, if any?
- What are the relationships between your topic and others on the list?
- What are the ethical issues associated with your topic?

The topics are:

1. Search
2. Constraint Satisfaction
3. Markov Decision Processes
4. Reinforcement Learning
5. Bayes Nets and Decision Diagrams
6. Hidden Markov Models
7. Perceptrons