Introduction to Artificial Intelligence

CSCE 476-876, Fall 2020

URL: www.cse.unl.edu/~cse476

URL: www.cse.unl.edu/~choueiry/F20-476-876

Berthe Y. Choueiry (Shu-we-ri)

Avery Hall, Room 360

Tel: (402)472-5444

Outline

- Overview of administrative rules
- What is AI?

• Lecture:

Mon/Wed/Fri, from 2:30 to 3:20 p.m.

Room 115, Avery Hall

I come 5 (10?) minutes earlier to answer questions
and review material from *previous* lectures

We must leave on time if another class needs to the room.

• Make-up class/recitation:

Mon, from 3:30 p.m. to 4:20 p.m. Avery Hall, Room 115

ಲು

- Always refer to the syllabus, our contract
- Frequently check the class schedule (web)

 www.cse.unl.edu/~choueiry/F20-476-876
- All communications via Piazza, please do **not** use email
- Broadcast to class, private with instructors
- Open or anonymous

Office hours:

• Instructor: Zoom room Wednesday and Friday, 3:30–4:30 p.m. or by appointment

• GTA: Minal Khatri, on Zoom room
Office hours: Monday and Friday, 12:30 P.M.-1:30 P.M.

• UTA:
No UTA this semester

• Professional attitude: respect schedule of TA

ರಾ

Books

• AIMA: Third edition.

• Lisp (LWH): Third edition.

• Common Lisp the Language (the Steele) **Second edition**.

~1

Instructor's notes #1 August 19, 2020

Topics

- 1. Lisp
- 2. Intelligent agents
- 3. Search
- 4. Constraint satisfaction
- 5. Games
- 6. Logical systems
- 7. Planning systems

If time allows:

• Uncertainty: probability and decision theory

Important warnings

- CSCE 310 is a pre-requisite.

 If you don't have it, you need to contact the instructor immediately.
- I will come to class 5 minutes ahead of schedule, can answer questions.
- Homework must be done in Python (preferable), C, or C++. To use **Allegro Common Lisp**, talk to instructor. All homeworl must run on on the CSE server (CSE.unl.edu)
- Beyond office hours, communicate with us on Piazza as much as possible.
- Class time is limited. **Do your required reading**.

Related courses at CSE

- Artificial Intelligence (976)
- Constraint Processing (421/821 & 921)
- Data Mining (474/874, 990)
- Machine Learning (478/878)
- Multiagent Systems (475/875)
- Deep Learning (496/896)
- Computational Game Theory (496/896)
- Logic in the Philosophy Department
- (Neural Networks & Genetic Algorithms (479/879, 974)?)

Course load

- Required and recommended reading: AIMA & LWH
- Homework: Programming, theoretical, library-search
 To be submitted **before** class, late-return policy, indicate effort
- (Surprise) Quizzes: frequent, cover class discussions & required reading, cannot be made up
- Tests: Pretest (Mon, Aug 24), midterm (Mon, Sep 28), and final (Mon, Nov 23)

General policy: closed books, cheat-sheet policy

Student's responsibility

- Account on cse (or csnt)
- No plagiarism, heavily sanctioned. Review policy of CSE
- No recording of classes without explicit, prior permission
- Always acknowledge sources, help, individuals, url, etc.
- Attendance not mandatory, however students are responsible for material covered and quizzes taken
- Professional behavior: don't miss classes

Our commitment

- We will try our very best to help you learn the material
- We will be as available as possible
- We will <u>always</u> listen to your feedback to improve the course

- Homework 30%
- Pretest 5%
- Quizzes 15%
- Midterm 25%
- Final 25%

Instructor's notes #1 August 19, 2020

- Glossary: Weekly, tested during quizzes. (Up to 8%)
- Bonus for solving occasional riddles
- Bonus for finding errors of the instructor

How well you are doing: feedback mechanisms

- Quizzes are corrected in class.
- Homework and glossaries are promptly corrected.
- Grades are listed on Canvas.
- You have 7 calendar days to claim grade adjustment. Strictly reinforced.
- Students who are not performing are contacted directly. Grades are monitored, but I cannot force you to work.
- Your suggestions for improving the course and our feedback mechanisms are *most welcome*, carefully considered, and implemented as quickly as possible.
- Please let us know what other feedback you expect.

Instructor's notes #1 August 19, 2020

Other resources

- Student's catch from the web
- Check class page under "Reference", books and online pointers
- LL collection, dictionaries, and reference books

- Scheduled for Monday, Aug 24, 2020
- One part to be completed in the class: crib sheet policy
- One part to be completed at home: collaboration, discussion strictly forbidden
- Content: basic knowledge of mathematics, logic, algorithm, data structure, complexity