Artificial Intelligence for Robotics – Lab

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SUBMISSION RULES:

- All results have to be submitted in a single PDF-file.
- Please use the following naming convention for that file: YYYYMMDD_<LastNamesOfGroupMembers>_AI<AssignmentNr>.pdf (where YYYYMMDD denotes the date of the deadline).
- Sourcecode has to be submitted in an extra folder along with all necessary files to run the code.
- Members of teams have to be stated clearly in an additional file members.txt, one line per team member.
- Please submit your files in an archive using the following naming convention: YYYYMMDD_<LastNamesOfGroupMembers>_AI<AssignmentNr>.tar.gz
- Late submissions will not be regarded.

Assignment 10

Due Date: Sunday, 11.6.2017, 23:59

1. Implement a simple Connect 4 game to demonstrate the use of adversarial search for deterministic, fully observable, two player turn-taking zero-sum games.

For the adversarial search problem, implement a minmax and alpha-beta pruning agent that allows you to play against the computer.

Compare these two approaches based on their search time, space requirement and other information that you think is important.

You need not implement a nice GUI. A simple console interface is sufficient.