COURSE DETAIL

AUTOMATED REASONING
Country United Kingdom - Scotland
Host Institution University of Edinburgh
Program(s) Scottish Universities,University of Edinburgh
UCEAP Course Level Upper Division
UCEAP Subject Area(s) Computer Science
UCEAP Course Number 155
UCEAP Course Suffix
UCEAP Official Title AUTOMATED REASONING
UCEAP Transcript Title AUTO REASONING
UCEAP Quarter Units 4.00
UCEAP Semester Units 2.70

Course Description
This course describes how reasoning can be modelled using computers. It provides a route into more advanced uses of theorem proving in order to solve problems in mathematics and formal verification. Major emphases are on how knowledge can be represented using propositional, first-order, and higher-order logic; how these representations can be used as the basis for reasoning; and how these reasoning processes can be guided to a successful conclusion through a variety of means ranging from fully-automated to interactive ones. Students develop a thorough understanding of modern, interactive theorem proving via lectures, tutorials, and an assignment.

Language(s) of Instruction
English

Host Institution Course Number
INFR09042

Host Institution Course Title
AUTOMATED REASONING

Host Institution Course Details

Host Institution Campus
Edinburgh

Host Institution Faculty

Host Institution Degree

Host Institution Department
Informatics

Course Last Reviewed

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