

COURSE DETAIL

PROGRAMMING: TECHNIQUES, THEORY, AND MULTIDISCIPLINARY APPLICATIONS

Country

Netherlands

Host Institution

Utrecht University - University College Utrecht

Program(s)

University College Utrecht

UCEAP Course Level

Lower Division

UCEAP Subject Area(s)

Computer Science

UCEAP Course Number

10

UCEAP Course Suffix**UCEAP Official Title**

PROGRAMMING: TECHNIQUES, THEORY, AND MULTIDISCIPLINARY APPLICATIONS

UCEAP Transcript Title

PROG: TECH THRY APP

UCEAP Quarter Units

6.00

UCEAP Semester Units

4.00

Course Description

This course teaches practical programming skills relevant for students in any discipline (science, social science, or humanities), emphasizing its broad application in diverse academic contexts. Being grounded in foundational programming techniques and theory, the course builds a strong basis for understanding computational advancements and challenges in our contemporary world. Furthermore, it provides hands-on experience with diverse applications, enabling you to apply your programming skills throughout your (academic) career. Our course provides a comprehensive, hands-on introduction to the fundamentals of programming, progressing from basics like statements and variables, to programming patterns and development techniques. Beyond experience with these skills, the course provides relevant theoretical and historical context on the development of computers and programming languages, to help gain a deeper understanding of the skills you are applying. After mastering the primary competencies, the course displays the broad applicability of programming within academia. In groups, apply a selection of modern and academically relevant programming techniques such as simulation, text analysis, database programming, and experiment programming, within the context of academic problems across disciplines. These techniques showcase the inter- and multidisciplinary nature of computational methods and equip you with the tools and understanding to use programming in your own field of interest.

Language(s) of Instruction

English

Host Institution Course Number

UCACCMET14

Host Institution Course Title

PROGRAMMING: TECHNIQUES, THEORY, AND MULTIDISCIPLINARY APPLICATIONS

Host Institution Course Details

<https://cursusplanner.uu.nl/Curriculum>

Host Institution Campus

Utrecht University

Host Institution Faculty

University College Utrecht

Host Institution Degree**Host Institution Department****Course Last Reviewed**

2025-2026

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