UNIVERSITÀ
DEGLI STUDI DI MILANO-BICOCCA

COURSE SYLLABUS

Narrative thinking and strategic storytelling: communicating research as a citizenship project

2324-102R-15

Title

Philosophy of Artificial Intelligence and robotics

Note: The actual title of this course is "Philosophy of Artificial Intelligence and robotics". The official title could not be changed for technical reasons.

Teacher

Prof. **Edoardo Datteri**
Full professor of Logic and Philosophy of Science
Department of Human Sciences for Education
Director of the RobotiCSS Lab (roboticss.formazione.unimib.it)

Language

English

Short description

Note: The actual title of this course is “Philosophy of Artificial Intelligence and robotics”. The official title could not be changed for technical reasons.

Contemporary research in Artificial Intelligence (AI) and robotics gives rise to a large number of distinctive philosophical questions and dilemmas that, while urgent and pressing, are often sidestepped, or only superficially ad-dressed, in science and technology courses. Can artificial intelligence systems have a mind and develop forms of consciousness? What kind of knowledge can computer simulations provide about the world, and how can it be justi-fied? Can robotic models of living organisms be used as experimental tools in life sciences? What kind of explanations should explainable AI systems pro-vide? How can we trust artificial intelligence and robotic systems, how can we ethically evaluate their behavior and assign responsibility for the actions they generate? These and other questions pertain to different branches of phi-losophy, including epistemology, philosophy of science and moral philosophy, and are increasingly at the center of the public debate on artificial intelligence and robotics. They will be partially addressed in this course.

The lessons will be highly interactive and intended for doctoral students from fields other than philosophy and without a philosophical background. Philo-sophical debates will be organized and encouraged, also with the help of in-vited lectures by leading experts in the various sectors covered.

Target audience

PhD students from all the courses offered in Bicocca.

Maximum number of participans

25

Assessment method

Active participation in the discussion and in the debates organized during the lessons will be positively evaluated. No final test will be administered.

CFU / Hours

1 CFU / 12 Hours

Teaching period and mode

The lessons will be highly interactive and intended for doctoral students from fields other than philosophy and without a philosophical background. Philo-sophical debates will be organized and encouraged, also with the help of in-vited lectures by leading experts in the various sectors covered.

March 1, 2024, 16:00 – 18:00 U6-01D
Introduction: Philosophical issues in AI and robotics

March 6, 2024, 14:00 – 16:00 U6-22
Finance, AI, and Technology
With the contribution of Prof. Emiliano Ippoliti (University of Rome “La Sapi-enza”

March 15, 2024, 16:00 – 18:00 U6-33
Machine consciousness

March 22, 2024, 16:00 – 18:00 U6-23
Computer simulations in the cognitive and life sciences

April 5, 2024, 16:00 – 18:00 U6-23
Ethical issues in AI and robotics

April 19, 2024, 10:00 – 12:00 U6-33
The attribution of mental states to robots: empirical findings and philosophi-cal questions
With the contribution of Prof. Tom Ziemke (Linköping University, Sweden)

course registration on “Segreterie online”: 12/02/2024 - 26/02/2024

Sustainable Development Goals

INDUSTRY, INNOVATION AND INFRASTRUCTURE