ALMA MATER STUDIORUM
UNIVERSITÀ DI BOLOGNA | DIPARTIMENTO
DI SCIENZE GIURIDICHE

Models of Normative Risk for AI systems

Objectives

The research delves into legal, ethical and societal risks tied to the development and implementation of Artificial Intelligence (AI), in line with the European AI Act. It aims to furnish tools and methodologies for navigating this domain, ensuring responsible AI adoption. Shifting focus from merely categorizing AI risks based on system purposes to analyzing nuanced usage scenarios is crucial. This involves considering factors like the technology itself, values at risk, vulnerability of affected parties, and response mechanisms. By doing so, we can establish proportionate risk management measures that balance innovation with fundamental rights protection. Compliance with the AI Act entails various obligations throughout the AI system lifecycle. The research will also explore the implications of these obligations for public authorities, covering documentation, transparency, system registration, and strategies for mitigating social and security risks, including bias in datasets and privacy concerns. We will finally assess systemic risks and societal impacts of AI, examining the severity and likelihood of negative effects, particularly on vulnerable populations. Leveraging a socio-technical perspective, the candidate will develop risk assessment methods focusing on human intervention, data governance, transparency, social and environmental well-being, and user empowerment.

Planned Tasks:

- T1.1 – State of the art and open questions
- T1.2 – Research methods
- T1.3 – Analysis and guidelines for future research

Expected Targets:

- Scientific report on the state of the art, open questions, and research methods. **KPI**: Delivery report by 31 October 2024
- Scientific report on analysis and guidelines for future research. **KPI**: Delivery report by 31 August 2025