

FULL-TIME DOCTORAL POSITION (48 MONTHS)

THE LEGAL AND TECHNICAL LIMITES TO JUDICIAL PROTECTION IN LITIGATION INVOLVING ARTIFICIAL INTELLIGENCE (M/F/X)

COMPUTER SCIENCE (AND LAW)

HEC (ULiège) & JUST-AI Jean Monnet Centre of excellence (Faculty of Law, political science and criminology, U.Liège)

STARTING DATE: 1 APRIL 2026

DEADLINE FOR APPLYING: OPEN UNTIL FILLED

Located in the French-speaking part of Belgium, the University of Liège welcomes nearly 27,000 students of 123 different nationalities in a dynamic, multicultural city less than an hour away from Brussels and Cologne, two hours from Paris and three hours from London and Amsterdam. ULiège is spread across 4 campuses and boasts over 5,700 staff members, including 3,600 teachers and researchers active in all areas of the humanities and social sciences, science and technology, and health sciences.

As a key player in social change and environmental awareness, ULiège promotes ethical, transdisciplinary and open science. It contributes to the socio-economic development of its region through numerous partnerships with several institutions, including the university hospital (CHU). Given its international orientation, the University participates [in the European University of Post-Industrial Cities \(UNIC\)](#) initiative and has one of the most extensive collaborative networks in the world.

ULiège offers attractive career prospects [in a high-quality working environment](#) where well-being, diversity and equality of opportunity are promoted. Since 2011, ULiège has been proud to display the European [Human resources strategy for researchers](#) (HRS4R) label, which reflects its commitment to open, transparent and merit-based procedures. In addition, it upholds quality and diversity in line with the recommendations of the [Coalition for Advancing Research Assessment](#) (CoARA). ULiège encourages its academic staff to travel internationally and welcomes international researchers through its EURAXESS center.

ABOUT THE RESEARCH PROJECT

The successful candidate will receive funding to carry out doctoral research (full-time, 48 months) as part of the *Action de Recherche Concertée* (ARC) project '**AI Litigation and Procedural Fairness: A Needs-Based Approach to Evidence Access** ([ALPINE](#))

The PhD candidate's primary affiliation will be with [HEC/ULiège](#) and the [JUST-AI Jean Monnet Centre of Excellence](#), Faculty of Law, Political Science and Criminology, ULiège.

ALPINE is an interdisciplinary project carried out by researchers with expertise in law and computer/data science.

Focused on judicial protection in disputes involving intelligent systems, the ambition of this project is to clarify and map the procedural safeguards that human agents (programmers, deployers) should benefit from in cases where AI-related harm materializes.

Although AI procedural regulation has recently begun to emerge, namely at EU level, neither scholarship nor court practice provide definitive solutions regarding the types of evidence litigants should be legally entitled to consult, produce and explain when called upon to establish fault and causation, in judicial instances addressing AI liability issues.

The ALPINE project will fill this gap by carrying out ambitious interdisciplinary research. First (Work Package - WP1), it will map the most relevant and compelling evidence in the field of AI liability, based on a consultation with at least 140 experts (legal practitioners, courts, AI programmers, academics) selected from two European organizations (EU, Council of Europe) and five European states (Belgium, France, Netherlands, Germany and Italy).

By determining their probative value using the ANOVA method, ALPINE will create a taxonomy of evidence items which, in a second phase (Work package - WP2), will serve as a basis to formulate regulatory proposals for the creation of a new regulatory framework of procedural abilities that litigants must have, so that AI liability disputes can be effectively resolved.

The third stage (Work package - WP3) will involve creating an AI system, programmed for natural language processing (NLP) and made available on the JUST-AI Jean Monnet Centre of excellence website. The aim of this system will be to be made available to and used by stakeholders when they seek to obtain relevant information dealing with issues of harm(s) and causality involving intelligent systems.

ALPINE will thus suggest a model for a needs-based theory of procedural fairness in the field of AI liability, highlighting the procedural paths that litigants should be able to take so that the effectiveness of their jurisdictional protection can be enhanced.

JOB DESCRIPTION

The ALPINE offers a unique opportunity to work at the intersection of two fundamental subjects, with deep societal ramifications, namely AI (Computer Science) & Law.

As a PhD researcher, you will work on the development of NLP methods combined with Knowledge Engineering to develop novel AI-based methods/tools for the legal domain, promoting procedural transparency in liability cases involving AI systems.

Specifically, you will advance the current state of the art by

- 1) building a legal-technical knowledge base with information from relevant sources, e.g. national and European frameworks on evidence and fair trial safeguards, provisions on IP safeguards and confidentiality of information (e.g. trade secrets) as well as national and European caselaw on the right to access evidence, the right to defense and the equality of arms principle.
- 2) Develop and implement AI/NLP methods focusing on explainability and explicability.
- 3) Develop interoperable systems or agents to inspect and audit AI functionalities while complying with intellectual property requirements.

You will be working in close collaboration with and benefit from the expertise of legal scholars and computer scientists, under the joint supervision of Prof. Ashwin Ittoo and Ljupcho Grozdanovski. The candidate will contribute to empirical data modeling, knowledge engineering, and prototype building. Other tasks include integrating user feedback and delivering open-source tools for legal professionals.

The PhD thesis will focus on the technical and legal boundaries of evidence disclosure in high-risk AI systems, aiming to enhance access to justice through innovative, explainability-driven auditing methods.

SPECIFIC DUTIES AND ACTIVITIES

- ▶ Participate in interdisciplinary collaboration with legal experts and computer scientists working at the junction of AI&Law
- ▶ Investigate different NLP methods (incl. LLMs if applicable) to automatically learn a knowledge-graph (or ontology) from legal texts
- ▶ Define and implement ontologies.
- ▶ Develop and maintain a structured knowledge base.
 - Design and develop automated auditing tools.
 - Contribute to the open-source releases.
- ▶ Engage in testing and validation.
- ▶ Disseminate research findings in conferences and journals.
- ▶ Present research outputs.
- ▶ Write and defend a doctoral dissertation.
- ▶ Complete the doctoral program.

PROFILE

○ REQUIRED SKILLS :

- ▶ The Ph.D. candidate must hold an MSc or MEng in computer science or equivalent and meet all the requirements to enrol in the university's doctoral program. Please note that your master's degree must be equivalent to a Belgian master's degree (180 ECTS/3 years BSc or BEng, followed by 120 ECTS/2 years MSc or MEng).
- ▶ Proficiency (in Python) for machine learning, NLP, and data processing.
- ▶ Familiarity with machine learning and deep learning.

○ DESIRABLE SKILLS :

- ▶ Understanding of Explainable AI (XAI) concepts and their application.
- ▶ Knowledge of legal-tech, AI ethics, or fairness in AI.
- ▶ Experience in knowledge graphs.
- ▶ Ability to design and build structured knowledge bases and define ontologies.
- ▶ Familiarity with regulations such as GDPR and the AI Act.
- ▶ Familiarity with software development best practices, including version control using Git.

○ **HUMAN SKILLS :**

- ▶ Ability to work with legal scholars and engineers.
- ▶ Excellent written and verbal communication skills.
- ▶ Curiosity and adaptability in exploring unfamiliar legal and regulatory topics.
- ▶ Team player with a willingness to take initiative and accept feedback.
- ▶ Strong analytical thinking and attention to detail.
- ▶ Ability to manage time effectively.
- ▶ Work independently within a structured research timeline.

○ **LANGUAGES :**

- ▶ Excellent level in English (C1 level is mandatory)
- ▶ Very good/working knowledge of French is a plus

TERMS OF EMPLOYMENT

- ▶ **TYPE OF CONTRACT:** FIXED TERM
- ▶ **WORKING HOURS :** 40/WEEK (FULL TIME)
- ▶ **CONTRACT DURATION :** 48 MONTHS
- ▶ **EXPECTED START DATE :** 1 APRIL 2026

OUR OFFER

Brut Monthly Salary: 2.461,44€ (scholarship exempted from tax)

Telework is possible.

Opportunity to access a wide range of [specific training courses](#) training courses for researchers

▶ **WORK ENVIRONMENT**

HEC Liège – Management School of the University of Liège is the only comprehensive Belgian business school that holds both EQUIS and AACSB accreditations and is a member of the *Conférence des Grandes Écoles*. With 220 faculty members and researchers and more than 3,100 students, HEC Liège shapes committed, transdisciplinary, agile, and innovative leaders. Prepared to tackle the societal challenges of tomorrow's land. The success of this mission is built upon an entrepreneurial dynamic, a sustainable integration within the local economic fabric, and a strong synergy between its three pillars: Education, Research, and Service & Citizenship.

Rooted in a tradition of rigor and excellence, HEC Liège offers impactful teaching and research in management and economics. Its international mindset is reflected in its double degree programs, its focus on Asia and Africa, and its diversified partnerships across all its activities. This strategy is supported by a network of nearly 20,000 Alumni spread across more than 100 countries. Executive Education, including tailor-made training, complementary programs, and Executive MBAs also plays a key role in the international outreach of HEC Liège.

Thanks to its spirit of innovation and entrepreneurship, its transdisciplinary and cross-cutting approach, its international dimension, and its emphasis on personal development through soft skills, HEC Liège aims to become a catalyst for sustainable solutions, both nationally and internationally, while supporting its region in becoming a key economic player in societal transformations.

JUST-AI Jean Monnet Centre of Excellence. Launched in 2022 with the support of the Erasmus+ program, the **Jean Monnet Center of Excellence in Justice and AI: Effective Judicial Redress in the Rising European and Global AI Litigation (JUST-AI JMCE)** aims to become a Belgian and European center of excellence on issues related to procedural justice in the field of AI. With the participation of a network of Belgian and international experts, and with a view to reaching expert and non-expert audiences around the world, the activities developed under the Jean Monnet Center of Excellence label aim to promote innovative, multi- and interdisciplinary research, create original and interactive educational content, and raise awareness among the general public of open questions in the field of procedural justice in the age of AI. The research carried out at the Center focuses on two main areas: 1. liability arising from AI and guarantees related to fair trial, and 2. the procedural capacities of litigants in disputes involving intelligent technologies.

HOW TO APPLY?

Contact : email

Contact persons : Mr. Ljupcho Grozdanovski (lgrozdanovski@uliege.be), Mr Ashwin Ittoo (Aswhin.Ittoo@uliege.be) and Mr. Julien Cabay (cabay@uliege.be).

Documents/references to be supplied: cover letter, detailed CV, letter of recommendation and a publication in a review/journal or, if no publications are available, the candidate's Masters thesis. The application documents should include the vacancy reference ALPINE.DOC.IT.2026.

Deadline for applications: **OPEN UNTIL FILLED.**

SELECTION PROCEDURE

- ▶ The **selection committee** will include **M. Ljupcho Grozdanovski** (Assoc. Research Prof. FNRS/ULiège), **M. Ashwin Ittoo** (Prof. HEC/ULiège) and **M. Julien Cabay** (Prof. ULB/ULiège).
- ▶ Shortlisted candidates will be interviewed online on a rolling basis until the position is filled.
- ▶ The earliest contract start date is **April 1, 2026.**

Our corporate policy is based on diversity and equal opportunity. We select candidates on the basis of their skills and do not discriminate on grounds of age, sexual orientation, origin, beliefs, disability or nationality.

CONTACT DETAILS

Informal inquiries about the project are welcome. Please feel free to contact by email Mr Ljupcho Grozdanovski (lgrozdanovski@uliege.be), Mr Ashwin Ittoo (Aswhin.Ittoo@uliege.be), Mr Julien Cabay (cabay@uliege.be)

Release date: 24 February 2026

Privacy policy

Personal data collected following your application will be processed by Christophe Debruyne, Ljupcho Grozdanovski (ULiège) and Julien Cabay (ULB) for the sole purpose of recruitment.

The data will be processed within the framework of pre-contractual measures (art. 6-1, b. of the General Data Protection Regulation) and kept for up to 9 months after the publication of the vacancy. Your personal data will not be passed on to any third parties.

In accordance with the provisions of the GDPR (EU 2016/679), you may exercise your data protection rights (right of access, rectification, erasure, restriction, and portability) by contacting ULiège Data Protection Officer (dpo@uliege.be - Mr. Data Protection Officer, Bât. B9 Cellule "GDPR", Quartier Village 3, Boulevard de Colonster 2, 4000 Liège, Belgium). You may also lodge a complaint with the Data Protection Authority (<https://www.autoriteprotectiondonnees.be> , contact@apd-gba.be).