DOCTORAL RESEARCH SCHOLARSHIPS

IVADO R3AI Research Cluster on Supply Chains and Mobility Systems

Objective

Provide a supplement of financial support to PhD students who are undertaking high impact research on topics related to the development and/or application of AI methods in supply chains or mobility systems. The main research objectives of our cluster are to integrate and improve modern optimization and machine learning methods to improve the efficiency and resilience of supply chains and mobility systems, while reducing their environmental footprint. These scholarships are designed to stimulate research that aligns with the R3AI Research Cluster Program R9 on Supply Chains and Mobility Systems, which is structured around the following five themes:

- Axis 1: Complex uncertainty quantification
- Axis 2: Integrating prediction and optimization
- Axis 3: Accelerating the solution of multi-stage stochastic decision problems
- Axis 4: Developing decision-aware end-to-end optimization
- Axis 5: Integrating endogeneity in decision models

More specifically, the cluster's research program is organized around five main axes that are further explained in the proposal (R9 Supply Chains and Mobility Systems 2024-2026).

The research supported through this call should combine methodological approaches from machine learning and operations research to serve applications in supply chain and mobility systems. Projects are expected to make a significant contribution to the overall program and may align with any of the five thematic axes.

Calendar

- Opening of the competition: March 1st, 2026
- Application deadline: March 31st, 2026, 11:59 p.m. EST
- Expected results notification date: April 15, 2026
- Funding start date: As soon as possible.

Conditions of funding, eligible costs and funds available

Each scholarship will provide $10 000 for one year, non-renewable.

The funds must be committed and spent no later than March 31, 2027, with no possibility of extension.

Eligibility criteria

- The supervisor must be a faculty member at Université de Montréal, Polytechnique Montréal, HEC Montréal, McGill University, or Université Laval
- The applicant must be enrolled full-time in a doctoral program at one of the aforementioned institutions at the time of application and at least until December 2026

Submitting an application

The application must be submitted by the student, and the package must include:

- The R9 application file
- A motivation letter (*1 page*)
- A description of the research project including recent progress such as preliminary results, where applicable (*1 page*)
- An official university transcript
- A detailed curriculum vitae of the student
- A letter of recommendation from the supervisor or co-supervisor describing the alignment with the cluster's research program and the significance of the anticipated impact *(maximum of 2 pages*)

The application file containing all documents must be sent to the R9 research advisor: **Danielle Maia de Souza,** danielle.maia.de.souza@umontreal.ca.

Evaluation of applications

Administrative screening

Applications will go through an administrative screening, and will be rejected if:

- The application form is incomplete
- The description of the research project exceeds one page
- The application is not supported by an eligible professor

Evaluation criteria

Research project

- Clarity of the project and its objectives
- Relevance of the proposed methodology
- **Alignment with the cluster's research program**
- **Significance of the expected impacts, research excellence, originality**

Academic track record

- Official transcript
- Academic progress and standing

Selection process

Carefully considering the evaluation criteria and the complementarity of the submitted proposals, the final selection of the projects will be made by the coleaders of the R^3AI Cluster 9 on Supply Chains and Mobility Systems (Yossiri Adulyasak, Jean-François Cordeau, Erick Delage, and Emma Frejinger).