



**CIFAR SOLUTION NETWORKS**

# DESIGN SOLUTIONS

**FOR RESPONSIBLE AI**



REQUEST FOR EXPRESSIONS OF INTEREST  
**THEME: AI AND GOVERNANCE IN  
LOW-MIDDLE INCOME COUNTRIES**

**CIFAR**

 **IDRC | CRDI**

**CIFAR** is a Canadian-based global research organization that convenes extraordinary minds to address the most important questions facing science and humanity.

Part of Canada's foreign affairs and development efforts, **IDRC** invests in knowledge, innovation, and solutions to improve the lives of people in the developing world.

CIFAR is supported by the governments of Canada, Alberta, British Columbia, Ontario, and Quebec as well as international partner organizations, individuals, foundations, and corporations.

Charitable Registration Number: 11921 9251 RR0001



# REQUEST FOR EXPRESSIONS OF INTEREST

## THEME: AI AND GOVERNANCE IN LOW-MIDDLE INCOME COUNTRIES

<b>CALL FOR</b>	Expressions of Interest
<b>PROGRAM</b>	CIFAR Solution Networks
<b>TOPIC</b>	AI and Governance in the Low-Middle Income Countries
<b>DEADLINE</b>	November 2, 2020
<b>REGION(S) OF PROJECT FOCUS:</b>	Low-Middle Income Countries (as defined by The World Bank), excluding: Eastern Europe, Cairo, Iran, Iraq, North Korea (Democratic People's Republic of), and Yemen.
<b>FUNDED BY</b>	CIFAR and IDRC
<b>BUDGET</b>	\$840,000 over 3 years plus financial support for meetings
<b>FUNDING DURATION</b>	36 months (upon acceptance)
<b>CONTACT</b>	<a href="mailto:solutionnetworks@cifar.ca">solutionnetworks@cifar.ca</a>

# BACKGROUND

---

Artificial intelligence (AI) is becoming increasingly integrated in sectors of society, from finance, to health care to transportation. AI poses significant implications to our lives, as well as to communities and countries around the world. While AI has the power to drive positive societal benefit, it also has the potential to impact society negatively, and cause harm through the misuse and sometimes unpredictable behaviour of the technology. This has triggered the need to explore strategies for how to design and govern AI in an ethical, accountable, and transparent way.

Low-Middle Income Countries (LMIC) face unique socio-political and economic challenges. Disease outbreaks, natural disasters, shortages of food and water, and lack of adequate medical supplies and services are among some of the major crises faced by people in these regions, in addition to considerable inequality due to gender, race and sexual orientation. AI-enabled technologies that are supported by a strong governance framework could provide solutions that are sustainable and inclusive, and have the power to transform the lives of citizens in these countries.

CIFAR's AI & Society Program, a key pillar of the [CIFAR Pan-Canadian AI Strategy](#), develops global thought leadership on the economic, ethical, political and legal implications of advances in AI. The Program brings together international experts from across academia, civil society, government, industry and health care to facilitate in-depth discussions on a range of issues - from the role of AI as an amplifier of inequality for vulnerable populations, to the use of AI in addressing the climate crisis. Since that time, a larger global conversation around the societal

implications of AI algorithms and data has emerged, leading to the development of important theoretical and conceptual frameworks and principles. This points to the need for the AI community to move beyond analytical dialogue and into sector-specific practice and action by developing and implementing solutions in the deployment of responsible AI.

Building on the [15 workshops](#) held since 2018, CIFAR's [AI & Society program](#) has developed a new program that reflects CIFAR's unique interdisciplinary, cross-sector and international approach to knowledge mobilization. The Solution Networks is a collaborative initiative for international teams led by a core group of up to six individuals. Each team works together to develop approaches and applications to current challenges and opportunities to support implementation of beneficial and responsible AI (i.e., inclusion by design, ethical by design, green by design). The solution could apply to any sector, including government, industry, health care and civil society, and will focus on the development of defined practices and tools.

# ABOUT THIS CALL

---

CIFAR, in partnership with the [International Development Research Centre \(IDRC\)](#) is launching a call for a CIFAR Solution Network centered on the theme *AI & Governance in Low-Middle Income Countries (LMIC)*. CIFAR will provide sustained support to a global interdisciplinary research and development network to develop imaginative new governance approaches to a pivotal and urgent problem in the implementation of responsible AI in low-middle income countries.

Urgent action is needed. AI has the potential to bring both profound positive and negative effects, given the pre-existing gender and socio-economic inequalities. On the one hand, AI-enabled technologies have the potential to positively impact regions: to spur innovation and drive positive economic development, improve access to education, and increase productivity in a number of core areas such as health care, agriculture, and

transportation. On the other hand, AI could increase the social, economic and cultural divide, and threaten important foundations to successful societies such as democratic processes, human rights and privacy.

The deployment of responsible AI in LMIC is critical to ensuring that countries with low-resources experience the benefits of AI while reducing risks and unintended consequences. While there has been a growing interest in responsible governance of AI systems, the issue has since become even more urgent in light of the COVID-19 pandemic. The negative implications of AI are often amplified in crisis situations given the rapid uptake and speed of technological innovation. The need for stakeholders and experts to come together, from across sectors around the world, to develop appropriate governance mechanisms for managing AI-enabled innovations has never been more critical.

# SCOPE AND FOCUS OF THIS CALL

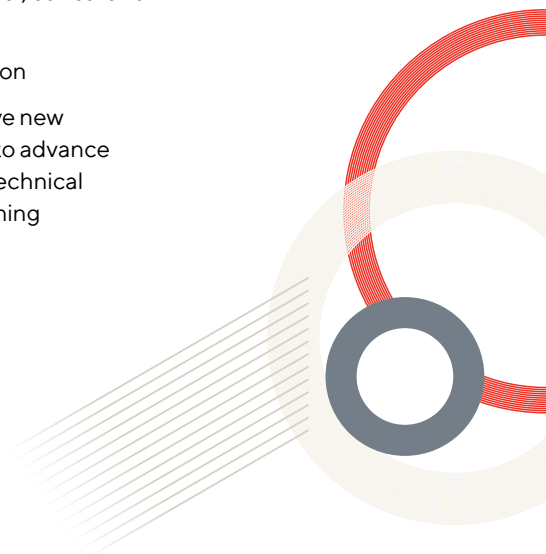
---

The purpose of this call is to support a solution-driven network of international, cross-sectoral and interdisciplinary experts to develop governance solutions that could have a transformative impact on the deployment of responsible AI in LMIC. The solution could apply to any sector, including in government, industry, health care, agriculture, education and civil society, and will focus on the development of defined prototypes, practices, and tools in governing AI. The Solution Network funded through this call should:

- Apply leading research and practice insights in the development of novel interventions, to respond to current gaps in governing AI systems;

- Test prototypes to ensure uptake, including a community consultation within the first 18 months of the project (if not already completed at the time the Network is funded);
- Inform policies or practices that support and build trust in AI and mitigate potential social, ethical and economic harms; and
- Initiate efforts to scale the intervention

Proposals whose primary goal is to drive new knowledge or understanding in order to advance a field of study or that focus solely on technical solutions (e.g. improving machine learning algorithms) will not be considered.



# FUNDING AND DURATION

---

CIFAR is a Canadian-based global research organization that convenes extraordinary minds to address the most important questions facing science and humanity.

CIFAR supports complex challenges that transcend disciplinary boundaries and geographic borders. We are not regarded as a traditional funder of research but rather a global convener of experts across research and practice. We support synergy and collaborative investigation into important questions and challenges through sustained interactions between members within a network.

For this call, CIFAR and IDRC will provide dedicated, flexible funding support for eligible research and development (R&D) activities for one successful Solution Network over three years to design, develop

and implement a novel governance solution. The successful Solution Network will receive:

- \$60,000 Cdn. per year for each co-director (up to two) and \$25,000 Cdn. per year for each core team member (up to four) to support R&D related to the Network.
- Up to \$60,000 Cdn. for each year to support collaborative efforts directly associated with advancing the network's activities.
- Financial and logistical support to enable bi-annual interactions (in-person or virtually) between members of the Network and external experts.

Funds will be disbursed and administered by CIFAR on behalf of the partnership.

---

# ELIGIBILITY CRITERIA

---

The Solution Network should be made up of an international, cross-sectoral (public, private and/or non-profit) team and should:

- be led by two co-directors and composed of up to four additional members.
- have at least one member based in Canada, and at least one member based in the setting where the solution will be applied ([low-middle income country](#)).
- include at least one faculty member of a post-secondary institution (specializing in data science, AI ethics, law, or relevant social science)
- include at least one member from one of the following:
  - Non-profit;
  - Government organization; or
  - Public sector
- consider equity, diversity and inclusion in the team composition.

CIFAR is committed to equity, diversity and inclusion. We recognize that bringing together individuals from multiple backgrounds, perspectives and experiences is integral to advancing excellence and increasing the impact of our organization. Ensuring that every

person feels valued and welcome is vital to achieving our mission, and embodies our values of diversity, excellence, respect and collaboration.

The solution funded through this call should be focused on a LMIC as defined by [The World Bank](#). Solutions focused in these regions/countries will not be accepted: Eastern Europe, Cairo, Iran, Iraq, North Korea (Democratic People's Republic of), and Yemen.

Note: IDRC has scientific and technical cooperation agreements with a number of governments of recipient countries, establishing cooperation frameworks and defining the rights and obligations of both IDRC and those governments. Any Solution Network member (and/or their institution) selected to receive funding may be required to obtain country approval to undertake the project in accordance with these agreements prior to receiving funding from IDRC. In particular, all applicants from India require clearance through the Foreign Contribution Regulation Act (FCRA). Please note that applicants submitting proposals for the solution in India will need to provide a copy of the FCRA approval. The FCRA approval must also be attached for any other organization receiving IDRC funds based in India.

# HOW TO APPLY AND TIMELINES

---

- All EOIs must be submitted through the online application system by Monday, November 2, 2020, at 11:59 pm EST. Applications received after the submission deadline will not be considered.
- Acknowledgement of receipt will be sent to all applicants whose EOI was received before the deadline.
- Applications (EOIs and Full proposals) can be submitted in either English or French.
- Applicants that have been invited to submit full proposals will be notified by Wednesday, November 18, 2020, 11:59 pm EST. Evaluation and review criteria of full proposals will be provided at this time.
- Full proposals must be submitted through the online application system by **Sunday, January 17, 2021, at 11:59 pm EST**. Proposals received after the submission deadline will not be considered.
- The International Expert Review Panel will invite select finalists to present their full proposal at an in-person (or virtual, if needed) review panel meeting. The finalists will be notified by **Friday, February 26, 2021, 11:59 pm EST**.
- The review panel meeting will be held in March 2021. The successful Network will be selected following the review panel meeting.
- The successful Network will be notified by **Wednesday, March 31, 2021, at 11:59 pm EST**.

---

## EXPRESSION OF INTEREST REQUIREMENTS

---

Submissions must include the following information:

### ADMINISTRATIVE INFORMATION:

- Project title
- Region/country or countries where the Solution will be focused
- Names, affiliations, and full addresses of all individuals that will be part of the Network team

### SOLUTION:

#### RATIONALE

CIFAR convenes the world's best minds around the most complex and difficult questions of our times. Proposals should describe the current context and cultural logic in which the solution is being developed and the gap and challenges that the proposed solution will respond to. Proposals should articulate how this solution differs from others that have been attempted in the region or more broadly.

#### IMPACT

Proposed solutions should aim to move beyond the advancement of knowledge and the development of principles and frameworks for AI governance. Successful proposals will aim to make a transformative impact within

a specific sector within society and should articulate how the solution proposed will drive positive change, what that will look like, and the intended cultural impacts including who will benefit.

#### METHODOLOGY

Proposals should articulate the methodology by which the Network will implement the solution, including experts the Network plans to engage during development and implementation. Engaging the public or potential regional stakeholders will be important so that the solution takes into account, and is appropriate for, the specific limitations and possibilities of that region. Proposals should include a plan to address equity, diversity, inclusion and sustainability in the project design and implementation. Applicants are encouraged to have their proposals evaluated according to the requirements of their institutional ethics review process.

#### RISK ASSESSMENT

Applicants should describe any potential risks they foresee in implementation of their solution. Please include any cultural, political or societal factors that may hinder success of the solution. Applicants should articulate how they plan to mitigate these risks.

## SOLUTION NETWORK:

### POTENTIAL LEADERSHIP

CIFAR's experience is that leadership plays a crucial role in the success of a given project. The EOI applicants are expected to describe the potential leadership of the proposed project. The two potential co-directors should be selected not only for their influence within their given area but also for their openness to disruptive thinking, ability to drive deep collaboration across disciplines, geographies and sectors, and their commitment to impact. The proposal should make clear why these two individuals are best suited to lead this team and solution.

### EXCELLENCE OF TEAM

CIFAR creates global communities of exceptional experts dedicated to open, sustained collaboration, exploration and impact creation. Potential team members should be experts in their communities. Applicants should demonstrate the excellence of proposed team members and make clear how the team members reflect the necessary expertise required to support the solution proposed.

# REVIEW PROCESS AND EVALUATION CRITERIA

## EOI

The review process for the expressions of interest will consist of the following steps:

1. Completeness of application and verification of eligibility requirements: CIFAR and IDRC will review all submitted EOIs to ensure they are complete and meet eligibility requirements. Incomplete EOIs or those that do not meet the requirements will not be considered.
2. Review and ranking of expressions of interest: CIFAR and IDRC will review eligible EOIs using the evaluation criteria below. Each EOI will be reviewed by at least three staff members. Expressions of interest will be ranked on the basis of scoring and subsequent discussion.
3. Shortlisting expressions of interest: On the basis of scoring, those applications that show the most promise for impact, will be invited to submit a full proposal.

EOIs will be evaluated on the following criteria:

### Solution Quality & Relevance (40%)

- Clarity of the project rationale and objectives (10 %)
- Extent to which the project aligns with the call objectives (10 %)
- Originality and significance of the anticipated impact (10 %)
- Demonstrates added value of CIFAR model (10 %)

### Solution Methodology (15 %)

- Appropriateness of the scope and size of planned activities and methodologies to achieve expected outcomes (10 %)
- Project demonstrates that equity, diversity, inclusion and sustainability have been appropriately considered in project design and implementation (5 %)

### Risk (5%)

- Outlines implementation risks and identifies appropriate mitigation strategies

### Leadership (20 %)

- Demonstrated excellence and appropriateness of the identified co-directors to lead the project; evidence of their ability to lead, drive collaboration and disruptive thinking

### Team (20 %)

- Demonstrated excellence and appropriateness of the project team members to achieve the intended outcomes; leveraging of different types of experts and the integration of their unique perspectives and knowledge in the project is appropriate (15 %)
- Clarity of project team member's roles in the project (5 %)



## FULL PROPOSALS

The review process for the full proposals will consist of the following steps:

1. **Review of full proposals:** Full proposals will be reviewed by an International Expert Review Panel (IERP) consisting of notable scientific, organizational and community leaders.
2. **Shortlisting full proposals:** The IERP will then identify a shortlist of finalists who will be invited to present their proposal at a review panel meeting, either in person or virtually, in order to identify the successful applicant. The shortlist of finalists will be selected based on scoring on evaluation criteria and subsequent discussion of review panel members.
3. **Review panel meeting and final selection:** Finalists will be asked to prepare a proposal presentation for review panel members, which will be followed by a question period. The IERP will select the successful network based on performance assessment and subsequent discussion.

---

## INTELLECTUAL PROPERTY

Neither CIFAR nor IDRC will make no claim to the intellectual property associated with solutions developed as a result of this call. In addition, all project outputs must be made available to the public on an Open Access basis.

**CIFAR SOLUTION NETWORKS**

**DESIGN  
SOLUTIONS**

**FOR RESPONSIBLE AI**

**CIFAR**



**IDRC | CRDI**

MaRS Centre, West Tower  
661 University Ave., Suite 505  
Toronto, ON M5G 1M1 Canada

[solutionnetworks@cifar.ca](mailto:solutionnetworks@cifar.ca)

[www.cifar.ca/ai/ai-society/solutionnetworks](http://www.cifar.ca/ai/ai-society/solutionnetworks)