

AI + SOCIETY 2038

STRATEGIC FORESIGHT WORKSHOP TOOLKIT

EXPERTS AND NON-EXPERTS VISIONING DESIRABLE FUTURES

WHAT AND WHY

Strategic Foresight workshop methods are useful tools for coordinating conversations about the future. This toolkit walks through one method we have expanded on—Three Horizons— to facilitate a conversation on desirable futures of Artificial Intelligence (AI) and society in Canada.

Sheila Jasanoff, “Imagined Worlds: The Politics of Future-Making in the Twenty-First Century,” in *The Politics and Science of Prevision* (Routledge, 2020), 27–44;

Sergio Urueña, Hannot Rodríguez, and Andoni Ibarra, “Foresight and Responsible Innovation: Openness and Closure in Anticipatory Heuristics,” *Futures* 134 (December 1, 2021): 102852, <https://doi.org/10.1016/j.futures.2021.102852>.

In keeping with Canadian communication policy, this project begins a long process of trying to think about futures as a policy tool to engage in policy debates.

In public policy debates and broader public conversations, technology futures tend to be taken over by large technology firms. We often lack tools to collectively discuss and develop alternative and desirable technological futures. This toolkit is the first step in addressing this need.

Access to futures-making is unevenly distributed and often inaccessible. Experts can be focused on the nuances of near-term regulation where publics can feel helpless to participate. Our workshop deliberately bridges expert and non-expert communities to collaborate in futures-making.

For our workshop we use an original, newly-adapted version of the *Strategic Foresight: Three Horizons* method, which originated primarily within corporate and governmental organizations. We ask that you [please watch this short video describing the method](#) to familiarize yourself with this sort of futures-oriented

work, keeping in mind that our workshop will take on an adapted form thereof.

The workshop touches on Canada's AI regulatory landscape, although we focus primarily on the Artificial Intelligence and Data Act (AIDA), a part of Bill C-27, the *Digital Charter Implementation Act, 2022*.

In order to get the most out of our time together and ensure a generative knowledge-sharing experience, we asked participants to come prepared to discuss AIDA and its role in the broader AI regulatory and governance landscape in Canada.

This workshop invites both students and experts to interact with Large Language Models (LLMs) chatbots such as ChatGPT.

The purpose is dual:

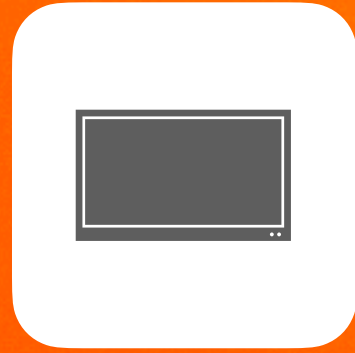
First, students were able to critically interrogate the chatbots ability to generate and reflect their ideas. The group format encouraged co-learning and frictions on how to interpret the answers generated by the chatbots. The iteration we ran within the summer school brought together multiple disciplinary backgrounds which further enriched the students discussions. From computer science to arts and from

history to business, students found limits and affordances through these exercises.

Second, we found that involving the chatbot to provide a compelling— even if imperfect— alternative to the AIDA made for a common object to ground abstract expert conversations on AI governance. The generated bill allowed us to surface specific provisions we wanted to clarify or that were bounded by the format of the law. This led experts to an interesting conversation on the principles of the law.

The following pages walk you through **HOW** to run your own iteration of this workshop.

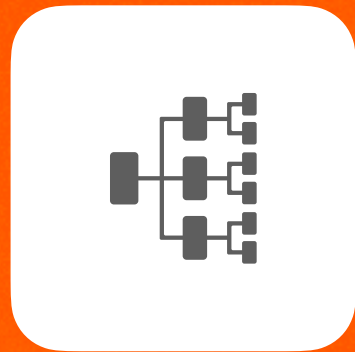
REQUIRED RESOURCES



1 A room or a digital board (e.g.: Miro, Mural)



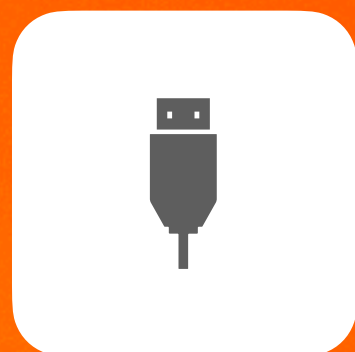
4 A printer and/or a Google docs where teams will compile found news headlines



2 Access to a Large-Language Model (LLM) Chatbot (e.g.: ChatGPT)



5 Print or recreate with post-its the implication diagram on page 7



3 Computers and internet access

DEFINITIONS

HORIZON

Horizon refers to the various 15 year futures we are visioning throughout the workshop.

FUTURE MAKING

Future making or futures literacy refer to a individual's or a group's ability to conceive of a range of different and expansive possible futures.

LLMS

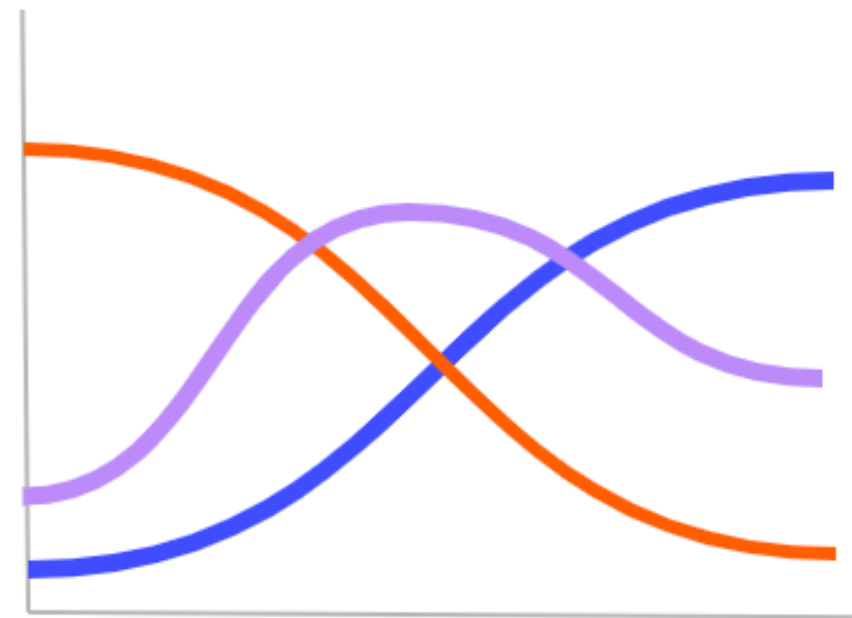
Large language models (LLMs) are a type of deep convolutional neural networks. Public use of these models through the open to the public interfaces such as Chat GPT rose to prominence in 2023.

AIDA & BILL C-27

Artificial Intelligence and Data Act (AIDA) is a part of Bill C-27, the *Digital Charter Implementation Act, 2022*.

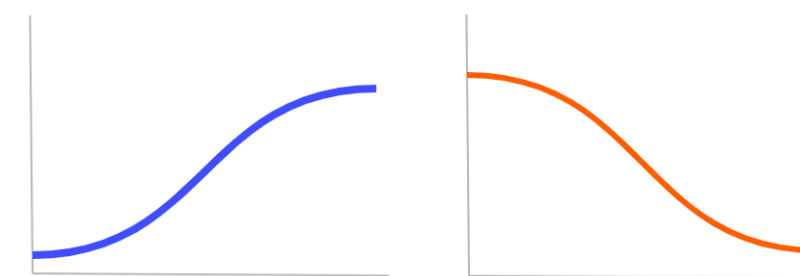
THREE HORIZONS

Strategic Foresight workshop methods offer useful tools for coordinating conversations about the future. This toolkit walks through one method we have expanded on— Three Horizons¹ — to facilitate rich conversations on desirable futures for Artificial Intelligence and society in Canada.



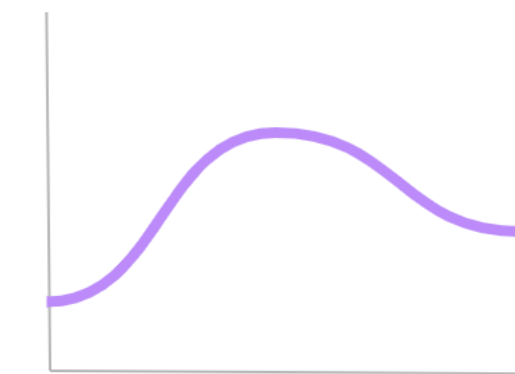
INSTRUCTIONS

1. This toolkit is organised to help facilitate a two-day set of workshops that we suggest to run together.
2. On Day 1, students (or any other group of non-expert) are responsible for imagining Horizon 1 (a business as usual future)— and Horizon 3 (an alternative, desirable future) each projected 15 years into the future.
3. On Day 2, building on students' Horizons 1 & 3, experts will be responsible for imagining Horizon 2 - which represents the necessary steps and innovations that could help bring us from Horizon 1 closer to Horizon 3.
4. Together, the two workshops provide space to collectively think and talk through technological futures in Canada, and possible meaningful points of intervention.

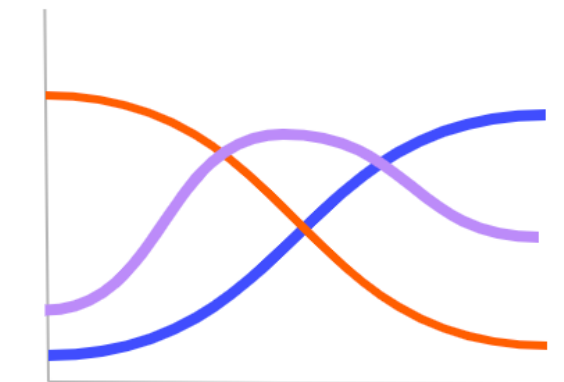


They will do so by gathering news headlines, interacting with Large Language Models chatbots such as ChatGPT, and critically interrogating the values that guide different futures.

Their visions will inform the creation of Horizon 2 which experts will be responsible for on Day 2.



Experts will achieve this by supplementing students' visions with the implications they foresee for the communities they serve and by mobilising Large Language Models chatbots such as ChatGPT to draft an alternative bill to AIDA.



¹ Sharpe, Bill. *Three horizons*. Triarchy Press, 2020.

STUDENT WORKSHOP

Day 1 — Horizons 1 & 3

Students (or any other group of non-expert) are responsible for imagining Horizon 1 (a business as usual future) — and Horizon 3 (an alternative, desirable future) each projected 15 years into the future.

Their visions will inform the creation of H2 for which experts will be responsible for on Day 2.



Make teams of 4 to 6 students



Plan between 4 - 5 hours

INSTRUCTIONS

1. Instruct students to individually write down how old they will be in 15 years and one word they hope will describe themselves. This icebreaker provides a scale of time.
2. Invite the teams to collect headlines they think represent the future of society/ humanity with/through AI in 15 years if status quo remains. The collage of collected headlines will be referred to as the ‘business-as-usual’ future.
3. Now that teams have a collage of the headlines, invite them to discuss the underlying values and principles that lead to this future.

Using the LLM chatbot of your choice, feed the selected headlines in the prompt: [“What are the values and assumptions underlying the headline: ENTER HEADLINE HERE”]

Ask students if they think the LLM picked up the values and assumptions they would have used to describe the collage of headlines.
4. Ask each team to discuss and agree on a set of alternative values that they would like to see guiding their desirable future.
5. Instruct each team to write out a short paragraph that describes the future of society and AI they would like to see, based on the alternative values they have identified.
6. Now that teams have a vision of a desirable future of AI and society, invite them to use the LLM chatbot of your choice to interrogate their vision.

Instruct them to feed their paragraph in the following prompt: [What are the values underlying this future scenario: ENTER DESIRABLE FUTURE PARAGRAPH]
7. Discuss in teams the LLM’s answer and consider how or whether it reflected back the value(s) they identified and intended?
8. Reconvene all teams and walk through the H1 and H3 they created.

EXPERT WORKSHOP

Day 2 — Horizon 2

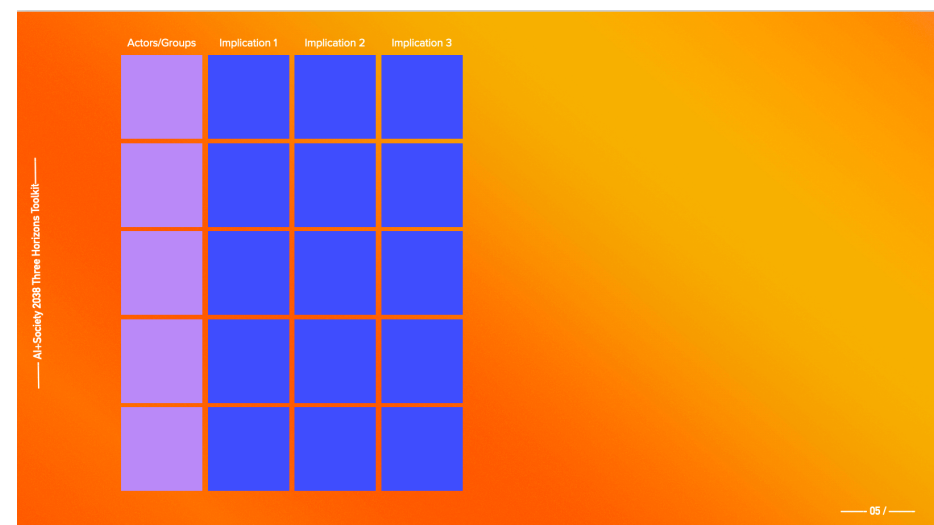
Building on students' Horizons 1 & 3, experts will be responsible for imagining a Horizon 2, which represents the necessary steps and innovations that would help take us from Horizon 1 closer to Horizon 3.



Proceed as a large group



Plan between 2 - 3 hours



INSTRUCTIONS

1. Instruct experts to individually write down how old they will be in 15 years and one word they hope will describe themselves. This icebreaker provides a time scale.
2. Instruct the experts to read the H1 and H3 students visioned on Day 1.
3. Invite the experts to supplement the H1 pictures by answering the following steps.

Identify 6-7 stakeholders on the left end side of the diagram (*see next page*) with the question: Who are the communities you serve or are part of?

Identify first order implications from the business-as-usual deployment of AI for each group with the question:

What happens to you and the communities you serve if AIDA passes?

Explore 2-3 order of implications ² for each actors or groups.

4. With these implications in mind, identify principles, provisions that should be added or modified in AIDA in order to address the implications raised for different groups and bring us closer to the desirable futures students crafted.
5. Using the LLM chatbot of your choice, feed your answers in the prompt: “Write an AI Act for Canada, in the style of Canadian legislation, with provisions in each section that secure [INSERT EXPERT’S ANSWER] principles and are based on [INSERT EXPERTS ANSWER] rights“

6. Iterate and troubleshoot by adding or prompting the LLM to change specific sections.
7. Discuss what ChatGPT generates: Is it relevant? Could it help lead us to the world we want? Is anything missing? What do you think should be left out?
8. Discuss and identify next steps experts can take collectively or respectively to materialise H2.

² (i.e., first-order implications would be immediate impacts, while second-order would be subsequent or compounded impacts, and so on).

Actors/Groups	Implication 1	Implication 2	Implication 3

Diagram

CONCLUSION

We created this toolkit to run a set of student and expert workshops on the future of AI governance in Canada.

We learned a lot facilitating these workshops and are thrilled to continue to explore how futures can be policy tools.

Please reach out if you try our toolkit, we would love to know how you worked through it.

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SHAPING AI



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