# WIL Impacts Framework Innovation Capacities Module



### In this Module:

This Module explains the Innovation Capacities domain and provides detail regarding its two subdomains: organizational innovation and macro-innovation. Tools for measuring impacts are included, with survey questions for host organizations and post-secondary institutions as well as interview questions.

### What are innovation capacities?

While innovation capacity can refer to an organization's capacity to engage in innovation (i.e., to introduce new processes or ideas), the innovation capacities domain refers to the contribution of WIL experiences to the development of innovation at the organizational and macro level. The following subdomains categorize and differentiate between different types of impacts within this broad domain.

## Why innovation capacities?

Impacts on innovation capacities for host organizations are particularly relevant when working with organizations that are interested in the ways that WIL programs can improve ideas and creative thinking at their organizations, create and diffuse knowledge to and from their organization, and help them approach societal challenges in new and creative ways.

# **Sub-domains of impact**

### **Organizational innovation**

This subdomain includes indicators related to workplace innovation.

Subdomain/Factor	Indicator	Detail	Associated literature
Organizational innovation	Workplace innovation	Achieved exposure to new ideas and creative thinking thanks to the interaction with WIL students	Braunstein et al., 2011; Crump & Johnsson, 2011; Fleming et al., 2016; Sattler & Peters, 2012)

### **Macro-innovation**

This subdomain includes indicators of creation and diffusion of knowledge, new approaches to socio-economic challenges, and development of entrepreneurial mindsets and intentions to innovate.

Subdomain/Factor	Indicator	Detail	Associated literature	
<b>Macro-innovation</b>	Creation of knowledge	How have WIL programs contributed to the creation of new knowledge?	Primary data	
	Diffusion of knowledge	How have WIL programs contributed to the diffusion of knowledge? (from the PSIs to the community and vice versa)	Primary data	
	New ways to address economic challenges and skills shortages	Contribution of WIL programs to driving the economy of the future and as a mechanism to address economic challenges and skill shortages	(Government of Ontario, 2018; Patrick et al., 2008)	
	Developing an entrepreneurial mindset	How do WIL programs influence the development of entrepreneurialism	(Pretti et al., 2020)	
	Emergence of students' intentions to innovate	How do WIL programs influence the emergence of students' intentions to innovate	(Selznick et al., 2021)	

# How to measure innovation capacities WIL Impacts

This section will cover the different possible approaches to measuring impacts in this particular domain. It will provide tools to gather data and analytic best practices when implementing this innovation capacities module.

The tools described below can be used as the main method of data collection to measure the indicators included in the above subdomains.

These tools are intended to be used by your WIL program to collect data from (1) your WIL host organizations (e.g., employers and community partners) and from (2) within your PSI (e.g., WIL offices, faculty, etc.)

### **Quantitative data tools**

These tools will facilitate the collection of data that are quantifiable and comparable. They are constructed using the literature as a basis for operationalizing various innovation capacities criteria.

Measurements are based on Likert scale ratings: these scales measure attitudes, knowledge, perceptions, values, behavioral changes, among other concepts. A respondent will answer a Likert scale question by selecting from a series of statements that are ordered from most positive to least positive; e.g., strongly agree to strongly disagree, extremely important to not at all important, or always to never.

While Likert scales can range in the number of items in between the two extreme options, a four-point scale was selected for this tool to have a more marked division between positive and less positive responses by removing a middle or neutral option.

This section contains two series of questions: one for host organizations and one for PSIs. The two questionnaires are intended to be used together for comparison of findings. A questionnaire for host organizations and a questionnaire for PSIs are <u>available as part of this module</u>. Some recommendations on implementation and analysis are included in the <u>Analytic Best Practices</u> module.

### **Host organization metrics**

**Question**: In general, thinking about your experiences with students from work-integrated learning programs, please rate how impactful these experiences were in:

	Very impactful (1)	Somewhat impactful (2)	Not very impactful (3)	Not at all impactful (4)	I do not know (5)	Not applicable (6)
Increasing exposure to new ideas and creative thinking	0	0	0	0	0	0
Creating new knowledge	0	0	0	0	0	0
Diffusing knowledge (from academia to your organization or vice versa)	0	0	0	0	0	0
Addressing economic challenges and skills shortages in innovative ways	0	0	0	0	0	0
Other:	0	0	0	0	0	0

### **PSI** metrics

**Question**: In general, thinking about the WIL programs at your PSI, please rate how impactful these programs were in:

	Very impactful (1)	Somewhat impactful (2)	Not very impactful (3)	Not at all impactful (4)	I do not know (5)	Not applicable (6)
Creating new knowledge	0	0	0	0	0	0
Translating knowledge (from academia to the host organization or vice versa)	0	0	0	0	0	0
Addressing economic challenges and skills shortages in innovative ways	0	0	0	0	0	0
Influencing the development of entrepreneurialism	0	0	0	0	0	0
Influencing the emergence of students' intentions to innovate	0	0	0	0	0	0
Other:	0	0	0	0	0	0

### **Qualitative data tools**

These tools will facilitate the collection of data that are open-ended and provide a more nuanced description that is not achievable through the quantitative tools.

The following questions can be used as part of a one-on-one interview or as part of a focus group discussion. These questions can be complemented with additional and follow-up questions based on the specific objectives of the data gathering as well as on the responses and conversations that emerge during interviews/focus groups.

These are considered semi-structured interviews in that there is a set series of questions that cover key research questions, while being open to emergent follow-up questions and themes that can arise through a given interview or focus group session.

#### Host organization interview guide

These questions are a starting point for conducting an interview to build on the quantitative data tool. Note that interviews are meant to be conversations and the interviewer should adapt questions based on the interviewee's responses and on the topics that emerge in each particular interview.

Additionally, and if multiple interviews/focus groups are being implemented, you can use rolling interview guides where the previous interview or focus group sessions inform changes to the questionnaires used for upcoming sessions. This is particularly useful if you want to follow up on emergent themes that are not initially included in your first interview guide.

Additional analytic best practices can be found <u>here</u>.

- 1. Please share with us how your recent WIL experiences have impacted the development of innovation capacities at your organization or outside of it.
  - → Probe: think about exposure to new ideas and creative thinking; creation and diffusion of knowledge; new approaches to addressing socio-economic challenges
- 2. Why do you think these WIL experiences had this kind of impact?
- 3. How would you measure these impacts?
- 4. What are some ways in which WIL programs could contribute to help with your organizational needs in this area?