



Strategic Framework 2022 – 2027

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1 EXECUTIVE SUMMARY

In January 2022, Results Driven Agriculture Research (RDAR) invited you on a journey to the future of agriculture research.

We identified challenges of climate change, increased input costs, labour shortages, and trade barriers.

For 2023, this update reflects the further industry issues arising in 2022:

- increasing inflation, cost of commodities, and all farming inputs;
- disruption in world grain markets caused by the war in Ukraine;
- continued interest in plant-based and cultured proteins;
- increased adoption of technology for precision agriculture and autonomous farm management; and, on the other hand
- hesitancy among producers, ranchers, and processors to adopt new technologies and practices; and
- continued focus on adopting management practices to manage climate change (i.e., cover cropping, water/nitrogen management, GHG reduction; rotational grazing).

RDAR considered these changes as it completed its strategic review and prepared for fiscal 2023-24 year, the second year of RDAR's 5-year Strategic Framework.

The RDAR Strategic Framework outlines the organization's actions to anticipate and respond to macro trends shaping a new reality for agriculture, food, and agribusinesses. It also details how RDAR will scale its impact while delivering on Alberta's objectives and producer outcomes: increased farm cash receipts; increased export revenues; growing agri-sector employment, including jobs beyond farms and ranches; and expanding the value-added Sector. We will meet these demands by placing the outcomes of results-driven research into the hands of farmers, ranchers, and processors.

Our research investments focus on outcomes that drive profitability, productivity, competitiveness, and sustainability – the cornerstones to a more robust industry aligned with RDAR's Mandate, Vision, and Values.

Mandate	To target strategic investments in producer-led, results-driven agriculture research to power the competitiveness, profitability, productivity, and sustainability of agriculture in Alberta				
Vision	Alberta's agriculture sector is achieving its full potential through the acceleration and adoption of results-driven research				
Values	Integrity	Collaboration	Innovation	Legacy	Courage

RDAR's leading differentiators lie in applying the discipline of systems thinking to urgent and emergent matters that challenge Alberta's producers and processors, coupled with our capacity to develop and manage T4P¹ networks.

¹ *T4P refers to a transdisciplinary partnership of producers with the public, and private sector researchers and processors. Expertise from several disciplines is mobilized to work together and seek to collaboratively reach one set of conclusions.*

The focus for 2023 is the following:

1. initiation of Sector Research Tables
2. initiation of the Industry Sector Clusters
3. increase in Final Mile™ projects and project deliveries

RDAR continues championing the industry, connecting, powering, and driving innovation. Our future is bright. We will continue to strive to be a globally respected model for results-driven agriculture research, and above all, we will deliver on our mandate.

2 OUR BUSINESS MODEL IS THE DELIVERY OF RESEARCH DRIVEN OUTCOMES

RDAR is accountable to its investors, trustees, and Members. Following strict governance protocols, we are transparent and responsible for accounting for public monies invested in research. The Board and Administration work together to manage a portfolio of initiatives delivered by research performers to benefit Alberta's producers and the entire food value chain.

2.1 Accelerating Results with Portfolio Management

RDAR takes a portfolio management approach to help set priorities and ensure that the industry benefits from research investment.

RDAR's investment portfolio is balanced and multi-dimensional. It focuses on commodities, assets, regional representation, research priorities, and, most importantly, the outcomes achieved. We will monitor and adjust the portfolio to best represent the industry's needs, delivering the greatest benefit and accelerating the uptake of new products and practices.

Proposals are assessed by relevance to producers, T4P collaboration, and technology readiness level (TRL), and then the submissions are reviewed by subject matter experts and market specialists.

In making research investments, we look to engage co-funders, e.g., the Agriculture Funding Consortium (AFC), other government programs, and the broader industry.

We are not risk-averse and recognize the need for risk-benefit analyses to point to disruptive change.

The portfolio will also be balanced against statistically significant economic impact, such as beef, the four major crops (wheat, barley, canola, and pulses), pork, and poultry. To strengthen this work, RDAR is launching advisory Sector Research Tables (SRT) in 2023 to create a common approach to the specific industry's most pressing issues—more about the SRTs in section 3.3.

2.2 RDAR's Research Priorities

RDAR's portfolio is aligned with its producer-designated research pillars, set in the summer of 2020 by 60 Advisory Committee members. Fifty-one members represent a specific producer group; the other nine are

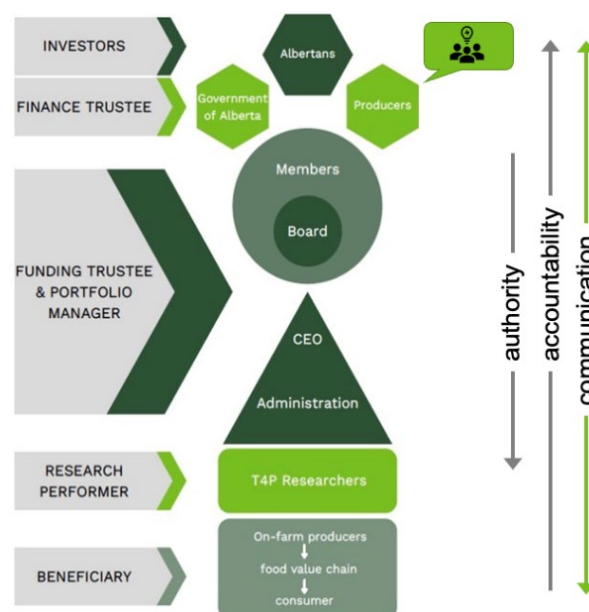


Figure 1: RDAR's Governance Model

post-secondary institutes with agriculture programs. RDAR's research pillars are shown in the Table below.

Enhanced productivity, profitability, and competitiveness	Sustainable and responsible agricultural production
<ul style="list-style-type: none"> • Improved animal and crop health • Production efficiency • Feed utilization • Enhanced pest and disease management • Genetic improvements 	<ul style="list-style-type: none"> • Water efficiency and quality • Soil health • Input / output utilization • Greenhouse gas (GHG) emissions • Climate variability and adaptation • Antimicrobial resistance (AMR) • Animal Welfare
Market demand: food safety, quality, value-added products, and diversification	The Final Mile™: knowledge transfer and translation
<ul style="list-style-type: none"> • Improved food safety, quality, and nutrition • New value-added products • Alternative agriculture products • Interaction of animal, human and environment (One Health) • Pathogen control and reduction 	<ul style="list-style-type: none"> • Knowledge translation and transfer (KTT) to Alberta's producers • Demonstration and feasibility analysis • Adoption of beneficial management practices (BMPs)

A thorough review process ensures that RDAR-funded proposals meet producers' needs and can positively affect production. A further distinctive characteristic of RDAR is the capacity to rapidly respond to urgent and emergent issues with special research calls-for-proposals. For example, RDAR did this in 2021 with an urgent call for proposals to manage drought.

2.3 Target Market: Engaging the Willing

RDAR recognizes that producers' willingness to adopt transformational practices and research products to capture better outcomes will drive the industry. As RDAR's portfolio evolves, producers who innovate or adopt research outcomes early will benefit first. Others seeing the benefits will follow. In conversations with stakeholders, RDAR hears that practices are adopted when producers hear about and see innovation in action from their neighbours and learn about a good return on investment (ROI).

It may be years before the majority connects with early adopters. RDAR aims to accelerate the speed at which innovation is adopted, adapted, and scaled.

RDAR builds its portfolio by acting as a connector and catalyst. RDAR works to bring the right players to the table and is focused on building secure relationships that spark conversations and initiatives that will serve Albertans.

3 OBJECTIVES

By 2027, RDAR will be an esteemed model for agriculture research funding by:

Investing in outcome-driven projects that, over five (5) years, will have contributed to an increase in farm cash receipts, value-added investment and jobs, and an increase in exports.	Accelerating the adoption of SMART, sustainable environmental practices, and science-based management approaches to increase profitability and productivity.	Fostering transdisciplinary partnerships to create opportunities, resolve issues and generate innovations that benefit people, plants, animals, and the environment.
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RDAR will achieve these outcomes through four objectives:

- 1) Profitability, Productivity, and Competitiveness
- 2) Sustainability
- 3) Partnership and Results
- 4) Exemplary Governance

3.1 Objective 1: Profitability, Productivity, and Competitiveness

Goals

- Generate direct economic benefits throughout the value chain.
- Incrementally add to the value of agri-food products and exports.

Objectives

RDAR's mandate emphasizes profitability, productivity, and competitiveness as producers' priorities. These will improve agricultural prosperity, a vital component of Alberta's economic diversification strategy [E ESG – a strong economy driving environment, social, and governance objectives.]

Profitability requires monetization of each step along the value chain, with each player receiving a fair return for their part. Moreover, each player in the value chain must understand both upstream and downstream requirements to gain the greatest value.

Increased competitiveness and profitability mean ensuring Alberta is an attractive place for value-added investment. Alberta boasts many advantages to attract investment. These include a skilled labour force; climate-friendly power sources (e.g., clean, renewable, blue H₂ or emission-mitigated carbon); water; and a supportive policy environment with investment credits and favourable tax rates.

3.2 Objective 2: Sustainability

Goals

- Foster a self-sufficient, resilient industry.
- On-farm adoption of research and best management practices (BMPs) that drive environmental benefits and support market and customer demands.

Objectives

Alberta producers have long recognized that managing diseases, reducing potentially harmful inputs, and protecting soil and water leads to healthier plants and animals, resulting in a healthier environment

and humans. Sustainable practices increase consumer trust, raise public interest and support, and have the potential to attract new talent.

To be sustainable, the agriculture industry must also attract new entrants. Newcomers will replace retiring producers and contribute to growing rural economies. New skills and technological competencies are required to support the farm of the 21st century and changes in practices to sustain agriculture and the environment.

Agriculture has an opportunity to lead, powering the industry to gain a better-than-neutral carbon footprint by generating carbon credits for sale on carbon trading markets.

The *Federal Agriculture and Agri-Food Canada Strategic Plan for Science* emphasizes sustainability, increasing focus on mitigating climate change as one of its mission areas. Currently, 27% of RDAR's project investments have been aligned with sustainability objectives.

With the introduction of the federally funded On-Farm Climate Action Fund (OFCAF) investments, RDAR expects much more interest and potential projects to be financed for adopting agricultural climate solutions.

Delivering On-Farm Climate Action Fund Program (OFCAF)

In 2022, Agriculture and Agri-Food Canada announced that RDAR was one of twelve (12) national delivery partners for the OFCAF Program, granted \$37M to distribute from 2022 – June 2024.

OFCAF provides financial support to producers to accelerate their adoption and implementation of on-farm Beneficial Management Practices (BMPs) to lower Greenhouse Gas (GHG) emissions and support production efficiency, sustainability, and resiliency on their farm operations.²

To assist producers with their adoption of new BMPs, the program will offer producers resources to support BMP implementation in three areas:

- 1) Improving nitrogen management
- 2) Increasing adoption of cover cropping
- 3) Expanding the adoption of rotational grazing.

Through the first few months of the program (August – January), RDAR had approved 639 projects, totalling \$12.3M:

- 1) \$4.2 M for nitrogen management projects
- 2) \$0.8M for increased cover cropping and
- 3) \$4.7M in expanding rotational grazing practices
- 4) \$2.6M for multiple BMP

² OFCAF - RDAR. <https://rdar.ca/ofcaf/>

Objective 3: Partnership and Results

Goals

- Advance transdisciplinary partnerships for impact
- Maintain research capacity in Post-Secondary Institutes with highly qualified personnel
- Ensure that projects reach the "Final Mile™" meaning that project outcomes are adopted at the farm gate.

Objectives

Establish Transdisciplinary Partnerships (T4P)

RDAR's focus on partnerships, T4Ps, will maximize innovation and scale our impact. RDAR's funded projects will require a demonstrated commitment to partnership development. Applicants' proposals must show evidence of the following:

- *Established partnerships*: engaging a willing producer, who must be a full (4P) partner;
- *Leverage*: there are other parties contributing funds or in-kind investment;
- *Adoption*: demonstrate how the practices / research will be adopted; and
- *Benefit*: how adopted results create quantifiable industry benefits.

RDAR works with the funder network to leverage investment, invest at an appropriate time and Technology Readiness Level (TRL), and ensure that a project receives funding for idea development through implementation.

To strengthen T4P approaches to understanding priorities and creating projects, RDAR is creating Sector Research Tables (SRT). The SRTs will enhance the focus and research recommendations developed previously by the Advisory Committee.

Establish Sector Research Tables

The SRTs aim to accelerate sector-specific result delivery to the farm – from understanding priority and market issues to delivering results on the farm. Results are achieved by engaging all corners of the agriculture industry, including producer boards and commissions, producers and processors across the value chain, and leaders from academia and fields such as technology, sustainability, supply chain and consumer research.

The SRT's recommendations for priorities are intended to focus RDAR's work on the areas that will drive the greatest impact and accelerate the adoption of results to drive the greatest benefit to producers and the economy. Identified priorities will be demand-driven, meaning there will be an identified need and willingness to adopt research aligned with recommended priorities.

Maintain Capacity

In 2020, Alberta Agriculture and Irrigation (AGI) transitioned eleven senior Principal Investigator (PI) positions to post-secondary institutes (PSIs). The scientists were offered three (3) year contracts during which their programs would be relocated and time granted to re-establish their research and seek further funding to support their research in the long term.

The transferred PIs have been identified as leaders in their field, managing research and extension programs that are producer-led, outcome-driven, and industry-supported, filling a much-needed gap in the agri-food research ecosystem.

RDAR evaluated the strategic capacity to accelerate innovation and profitability of Alberta producers and the agriculture industry to determine which PIs should continue to receive program funding. After a thorough evaluation of new grants awarded and the research results achieved, RDAR committed \$6.8M in 2023 - 2024 to fund RDAR professors for 1-5 years.

These RDAR scientists will be accountable for delivering on producer, industry and RDAR priorities, including completing the final mile.

The Final Mile™

Benefits will not be achieved unless results from research projects are adopted on the farm – reaching the *Final Mile™*. The results of previously funded research projects have not reached the farm, where they could change practices and achieve positive outcomes. RDAR is working to change this narrative by bridging gaps and mandating connections when it reviews project proposals.

RDAR will strengthen the requirement for research project proposals to have a clear plan to complete the "final mile" from the laboratory to the farm so that producers adopt new practices.

3.3 Objective 4 - Exemplary Governance

Goals

RDAR is publicly funded and therefore is accountable to the public's trustee, the government of Alberta, and all Albertans. To that end, RDAR must show exemplary governance in two ways:

- Stakeholders trust RDAR's investment decisions, effective research portfolio management, and industry capacity management.
- RDAR is governed with a commitment to transparency and integrity.

Objectives

RDAR will achieve its objectives through the informed selection of projects within a balanced investment portfolio. A thorough external expert review process, audited approval levels, and adherence to RDAR's *Code of Conduct* and *Conflict of Interest Policy* to ensure the portfolio is built equitably. Developing and maintaining a balanced portfolio requires the following:

- an understanding of market opportunities and issues;
- identification of gaps in the current project portfolio in Sector, scope or outcomes;
- designing a targeted call to fill gaps;
- mentoring applicants, guiding the creation of a high-quality research proposal; and
- monitoring projects to ensure T4P engagement and the development of transferable outcomes.

Transparency

RDAR provides stakeholders with regular updates through press releases, annual and quarterly reports, and semi-annual events. Its ongoing stakeholder engagement activities. We maintain open communication with the broader funding community, including the Government of Alberta and Agriculture and Agri-Food Canada (AAFC), which funds the OFCAF program.

In 2022, RDAR hired an objective third party to conduct a governance review, completed in the context of the fiduciary responsibilities and best practices of governance boards in Canada. The review found that RDAR has a robust governance structure, especially for an organization established two years ago. The Board and management are not complacent; continual improvement of review, research and stakeholder engagement practices will continue.

4 PERFORMANCE MEASURES

RDAR submits an Annual Report to Alberta Agriculture and Irrigation to monitor progress toward contracted objectives. These measures support RDAR's targets:

- 1) Farm profitability increase (through farm cash receipts)
- 2) Exports increase
- 3) Value-added percentage of products processed before leaving Alberta

Priority	Measure
Profitability, Productivity, and Competitiveness	Number of new practices and / or technologies adopted
	Number of projects increasing private investment in Alberta
	Number of new jobs created through projects
Sustainability	Number of new crop varieties seeded
	Percentage GHG emissions reduction
	Percentage increase in water use efficiency
Partnership and Results	Number of new products marketed
	Percentage investments leveraged and percentage leverage
	Number of policies influenced to improve conformance to practice
Exemplary Governance	Class A Member Satisfaction
	The total value of the managed portfolio (\$) and percentage of revenues invested

5 FINANCIAL POSITION

Although RDAR is an independent not-for-profit, all revenues are granted via agreements with provincial or federal governments. These grants bind RDAR to specific terms and conditions while allowing RDAR to invest in impactful projects and leverage investments with others – matching cash or in-kind contributions.

Category	Actual (\$M)	Budget (\$M)				
	2022/23	2023/24	2024/25	2025/26	2026/27	Total through Mar 31, 2027
Agriculture and Irrigation: Funding Agreement						
Revenue	26.2	27.9	26.9	26.9	26.9	134.8
Committed Funds	19.2	18.5	6.6	3.3	1.6	49.2
Uncommitted	8.7	12.0	23.4	23.4	23.4	90.9
CAP/Sustainable Canadian Agriculture Program (S-CAP)						
Revenue	14.9	11.6	11.6	11.6	11.6	61.3
Committed Funds	11.5	3.2				
Uncommitted		10.8	10.8	10.8	10.8	43.2
On-Farm Climate Action Fund						
Revenue	19.5	14.9				34.4
Committed Funds	13.3	16.2				29.5
Uncommitted						
Administration Expense	3.4	5.0	3.1	3.1	3.1	17.7

6 2023-2024 ROADMAP

Initiative	Q1 2023	Q2 2023	Q3 2023	Q4 2024
	Apr – Jun	Jul - Sept	Oct - Dec	Jan - Mar
Launch Sector Research Tables: define 3-5 year priority recommendations				
	<i>Beef</i>		<i>Deliverables to Board for decision</i>	
		<i>Feed and Forage</i>		
				<i>Irrigation</i>
Assemble Industry Clusters: develop projects; submit proposals; reach the Final Mile™				
	<i>Beef and Dairy: increase value-added development, CH₄ reduction, AMR, efficiency, etc.</i>			
		<i>Irrigation: H₂O conservation, distribution; sustainable practices; power mgt</i>		
	<i>Soil health: nutrient mgt; C sequestration; increased organic matter</i>			
Portfolio Reviews: select projects to accelerate results				
	<i>Process and format</i>	<i>Integrate into project review practice</i>	<i>Strategy review</i>	<i>Revise calls</i>
The Final Mile™: ensure research findings reach the farm gate				
	<i>Parameters and data requirement</i>	<i>Learn from recipients</i>	<i>Coach applicants</i>	<i>Adjust calls</i>

6.1 Of note: Sector Research Tables vs Industry Sector Clusters

The Sector Clusters deliver producer / user-ready solutions into the hands of farmers, ranchers, processors, and processing partners. Sector Clusters promote T4P collaborations on coordinated projects connected to specific research areas.

These Sector Clusters "do" the work through projects and generate results. In contrast, the SRTs are intended to take an annual, strategic 3–5-year view into what priorities will drive work across the industry, including the Sector Clusters.

These initiatives are interrelated, with common outcomes, as shown in Figure 2.

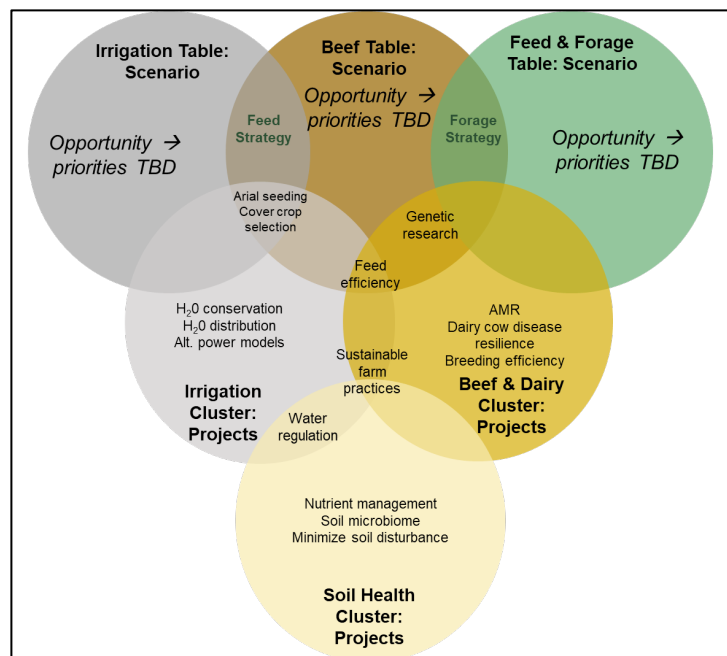


Figure 2: Interplay of Clusters and SRT

SUPPLEMENTARY: RDAR GLOSSARY

TERM	DEFINITION
Agriculture 4.0 / SMART Agriculture	A term for the <i>next big trends</i> facing the industry, including a greater focus on precision agriculture, the Internet of Things (IoT) and the use of big data to drive business efficiencies. In 2018, the World Government Summit published its report titled Agriculture 4.0 - The Future of Farming Technology.
Best Management Practice (BMP)	A method or technique that is determined to be more effective, more affordable, and more practicable than other means of achieving optimal outcomes.
Carbon Negative and Carbon Neutral	<p>Carbon negative means a net emissions basis to capture or sequester more carbon dioxide and carbon dioxide equivalent (CO₂e) greenhouse gases than emitted. Agriculture is one industry with an opportunity to lead, driving a 'net negative carbon footprint without carbon credits.</p> <p>Carbon neutral means a net emissions basis emitting no more carbon dioxide and carbon dioxide equivalent (CO₂e) greenhouse gases than captured or offset by acquiring carbon credits from Carbon Negative sources.</p>
[Agricultural] Extension	<p><i>Extension</i> is used non-specifically to capture a broad range of agricultural activities without specificity and often with confusing interchangeable definitions.</p> <p>Specific forms of extension are agriculture research, training, and advisory services (see below).</p>
Extension - Research	<p>The delivery of research outcomes down the Final Mile™, placing research outcomes into the hands of users, and assisting adoption and optimization.</p> <p>This includes getting research into production, knowledge, and technology transfer (KTT), <i>plot 2 farm</i>, <i>field to farm</i>, scale-up and pilot processing, BMP adoption and assessment</p>
Extension Education	The delivery of accredited training. Includes micro-credentialing, post-graduate learning, and continuing education.
Extension Services	These include pest monitoring and general agricultural advice
Identity Preserved	Identity-preserved marketing systems include labelling that identifies how a product was produced and by whom.
Living Lab	A transdisciplinary approach involving producers, scientists and other interested partners in co-designing, monitoring, and evaluating new and existing practices



TERM	DEFINITION
	and technologies assessed within working agricultural landscapes to improve practice effectiveness and early adoption.
Market demand	The demand for a given product and the customers who want to purchase it. As market demand increases, so do prices. When demand decreases, prices decrease respectively.
Portfolio	A group of projects and RDAR's process of selecting and managing the projects to advance organizational goals.
Private Sector	As used in this document, the Private Sector is the segment of a national economy controlled and managed by private individuals or enterprises. It encompasses all for-profit businesses not owned or operated by the government.
Processing	The changing of the physical state or form of the product, through which value is added.
Public Sector	As this document uses, the Public Sector refers to government and not-for-profit enterprises and academic institutions, e.g., universities and colleges.
Supply Chain	A supply chain is a complex relationship between a company and its suppliers required to get products to the customer: from supplying raw materials to producing and distributing a specific product or service. Supply chains are multidisciplinary and highly collaborative, bringing great benefits to a company through integrated and diversified resources, reduced logistics costs, improved logistics efficiency, and high quality of the overall product or service.
Technology Readiness Level	Technology readiness levels (TRLs) are a method for estimating the maturity of a technology. The use of TRLs enables consistent discussions of technical maturity across different types of technology. A technology's TRL is determined during a Technology Readiness Assessment (TRA), which examines program concepts, technology requirements, and demonstrated technology capabilities. TRLs are based on a scale from 1 to 9, with 9 being the most mature technology.



TERM	DEFINITION
	<p>TRL Stage Definitions (EU)³:</p> <ul style="list-style-type: none"> • TRL 1 - basic principles observed, • TRL 2 - technology concept formulated, • TRL 3 - experimental proof of concept, • TRL 4 - technology validated in lab, • TRL 5 - technology validated in relevant environment (industrially relevant environment in the case of key enabling technologies), • TRL 6 - technology demonstrated in relevant environment (industrially relevant environment in the case of key enabling technologies), • TRL 7 - system prototype demonstration in an operational environment, • TRL 8 - system complete and qualified, • TRL 9 - system is proven in an operating environment (competitive manufacturing in the case of key enabling technologies).
Transdisciplinary teams and/or research Transdisciplinary Partnership (T4P)	<p>T4P refers to a transdisciplinary partnership of producers, processors, and public sectors.</p> <p>Expertise from several disciplines is mobilized to work together and seek to collaboratively reach one set of conclusions. Scientific partners and producers engage directly in formulating and performing science and innovation activities. As compared with interdisciplinary: Expertise from several disciplines is mobilized. Each discipline works separately to reach conclusions, which may be considered and integrated to varying degrees.</p>
Traceability	<p>Food traceability is the ability to follow the movement of a food product and its ingredients through all steps in the supply chain, both backward and forward. Traceability involves documenting and linking food products and production, processing, and distribution of ingredients. On July 13, 2020, the FDA released the Blueprint for the <i>New Era of Smarter Food Safety</i>. The blueprint outlines the FDA's vision to enhance traceability, improve predictive analytics, respond rapidly to outbreaks, address new business models, reduce food contamination, and foster stronger food safety cultures.</p>
Value-Added	<p>There is no formal definition of value-added agriculture used by the federal government in Canada. However, the <i>United States Department of Agriculture, Rural Business Development</i> uses a definition that illustrates these traditional as well as emergent aspects of value-added.</p> <p><i>Value-added: The incremental value that the producer realizes from an agricultural commodity or product as the result of a change in its physical state, differentiated production or marketing, as demonstrated in a business plan, or product segregation. Producers may realize incrementally higher value due to either an increase in value to buyers or the expansion of the overall market for the product. Examples include milling wheat into flour,</i></p>

³ G. Technology readiness levels (TRL) - European Commission.
https://ec.europa.eu/research/participants/data/ref/h2020/wp/2014_2015/annexes/h2020-wp1415-annex-g-trl_en.pdf



TERM	DEFINITION
	<p><i>slaughtering livestock, making strawberries into jam, marketing organic products, using an identity-preserved marketing system, using wind or solar power produced on farmed land and collecting and converting methane from methane animal waste to generate energy. Identity-preserved marketing systems include labelling that identifies how the product was made and by whom. Source: U.S. Code of Federal Regulations, Regulations of the Department of Agriculture.</i></p>
Value chain	<p>A value chain is a set of linked activities that add value to a product; it consists of actors and actions that improve a product while linking commodity producers to processors and markets. A profitable value chain requires connections between what consumers demand and what a company produces. Simply put, the connection or sequence in the value chain originates from the customer's request, moves through the value chain process, and finally ends at the finished product. Value chains focus significantly on product testing, innovation, research and development, and marketing. [source: Porter 1985 <i>Competitive Advantage: Creating and Sustaining Superior Performance</i>]. A value chain consists of five (5) steps: inbound logistics, operations, outbound logistics, and marketing and sales.</p>