



Canadian Agricultural Research - Shaping the Future -

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AGRICULTURE AND AGRI-FOOD CANADA



Agriculture and
Agri-Food Canada

Agriculture et
Agroalimentaire Canada

Canada

Minister of Science: A Vision for Science



"To be successful in the highly competitive global economy, Canada must continue to strengthen its approach to performing world-leading research and generating new breakthrough ideas. In this context, the Government has an important role to play in advancing science, research and innovation, the pillars of strong economies."

-Kirsty Duncan, Minister of Science



The new Chief Science Advisor - Dr. Mona Nemer will provide advice to the Government on how to ensure that:

- government science is fully available to the public;
- scientists are able to speak freely about their work; and
- scientific analyses are considered when Government makes decisions.

Minister of Agriculture and Agri-Food: A Strong Science Mandate



- Investment in **agricultural research to support discovery science and innovation.**
- Work with all willing partners, to help the sector adjust to **climate change** and better address **water and soil conservation and development** issues.
- Support Government of Canada in making investments that will make our resource sectors world leaders in the use and development of **clean and sustainable technology and processes.**



Agri-food – One of Key Sectors in Canada

- Prime Minister’s Advisory Council on Economic Growth and Budget 2017 identified agriculture and agri-food as one of Canada’s key sectors, with significant untapped potential.
- The Innovation and Skills Plan has set an ambitious target to grow Canada’s agri-food exports to at least \$75 billion annually by 2025.

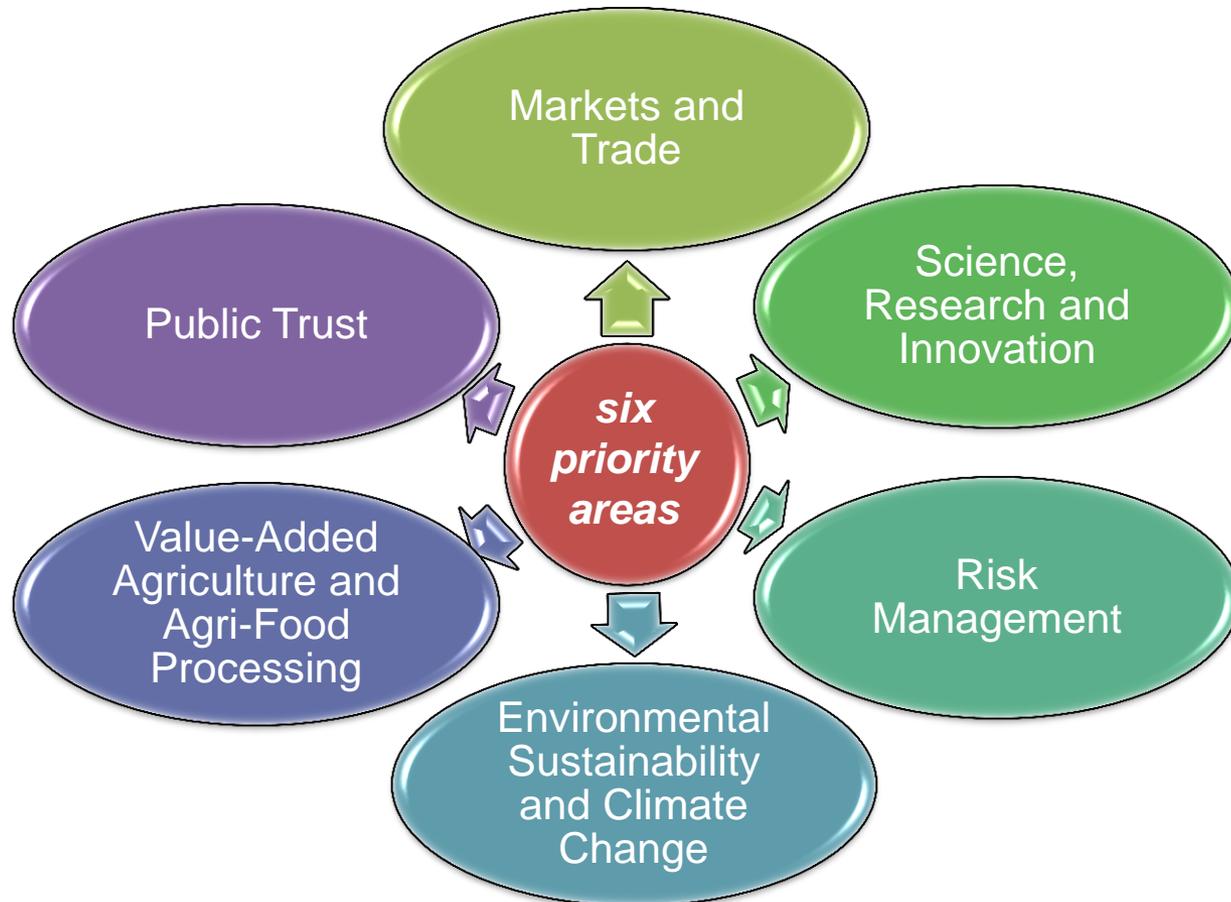
Canadian “core strength” ¹ sectors	Employment contribution Jobs	GDP contribution %	Growth CAGR (2010-15)
Agfood 	2.10 million 	6.7 	2.7%
Manufacturing 	1.70 million 	10.5 ¹ 	3.7% ²
Energy and renewables 	0.95 million 	13.7 	2.6%
Financial services 	0.78 million 	6.8 	3.5%
Tourism 	0.63 million 	2.0 	1.5%
Forestry 	0.30 million 	1.3 	3.9%
Education 	0.09 million 	0.3 	N/A
Mining 	0.06 million 	2.1 	3.7%

¹ Export-intensive sectors with strong GDP contribution and/or comparative advantages

² Automotive and aerospace manufacturing used as a proxy

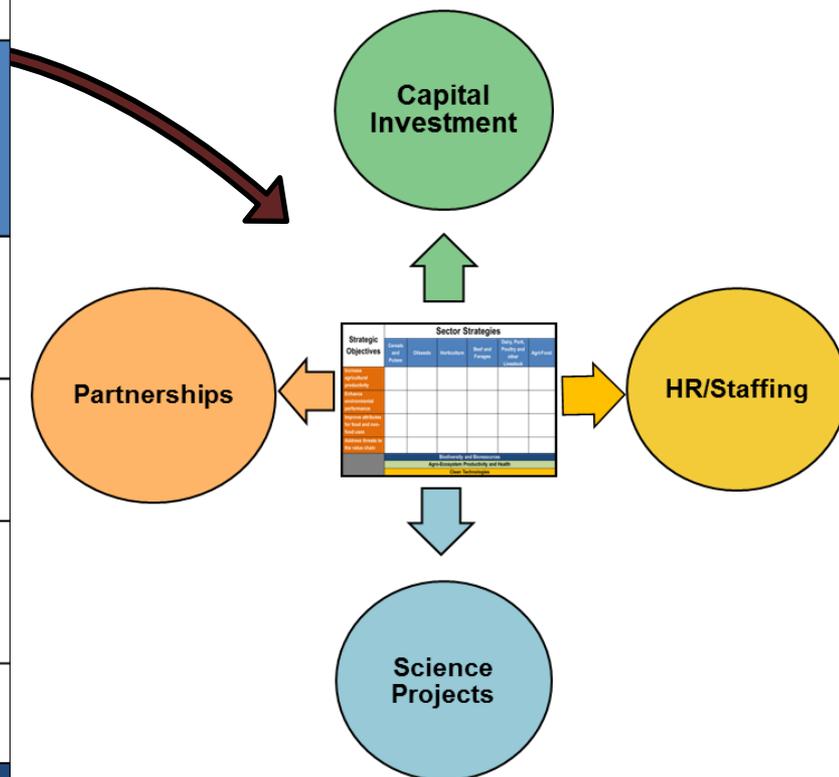
Canadian Agricultural Partnership (CAP)

- Federal, provincial, territorial (FPT) agricultural policy framework.
- Five year, \$3 billion investment aimed at strengthening the agriculture sector to ensure continued innovation, growth and prosperity.



The Strategy Matrix Guides All Our Investments

Strategic Objectives	Sector Strategies					
	Cereals and Pulses	Oilseeds	Horticulture	Beef and Forages	Dairy, Pork, Poultry and other Livestock	Agri-Food
Increase agricultural productivity						
Enhance environmental performance						
Improve attributes for food and non-food uses						
Address threats to the value chain						
	Biodiversity and Bioresources					
	Agro-Ecosystem Resilience					
	Clean Technologies					



AAFC's Capacity for Future Agriculture Innovation

- AAFC's unique network provides multiple points of regional connectivity through 20 Research and Development Centres (RDC's), supported by 34 research farms and 3 technical demonstration sites located across Canada.



AAFC Science Teams by Strategic Objective

Increasing agricultural productivity

- **≈ 40 percent of AAFC's science teams** individual commodity level and from systems perspective (such as crop rotations, and livestock and forage systems)

Enhancing environmental performance

- **≈ 20 percent of AAFC's science teams** improved nutrient utilization and mitigating greenhouse gas emissions

Improving attributes for food and non-food uses

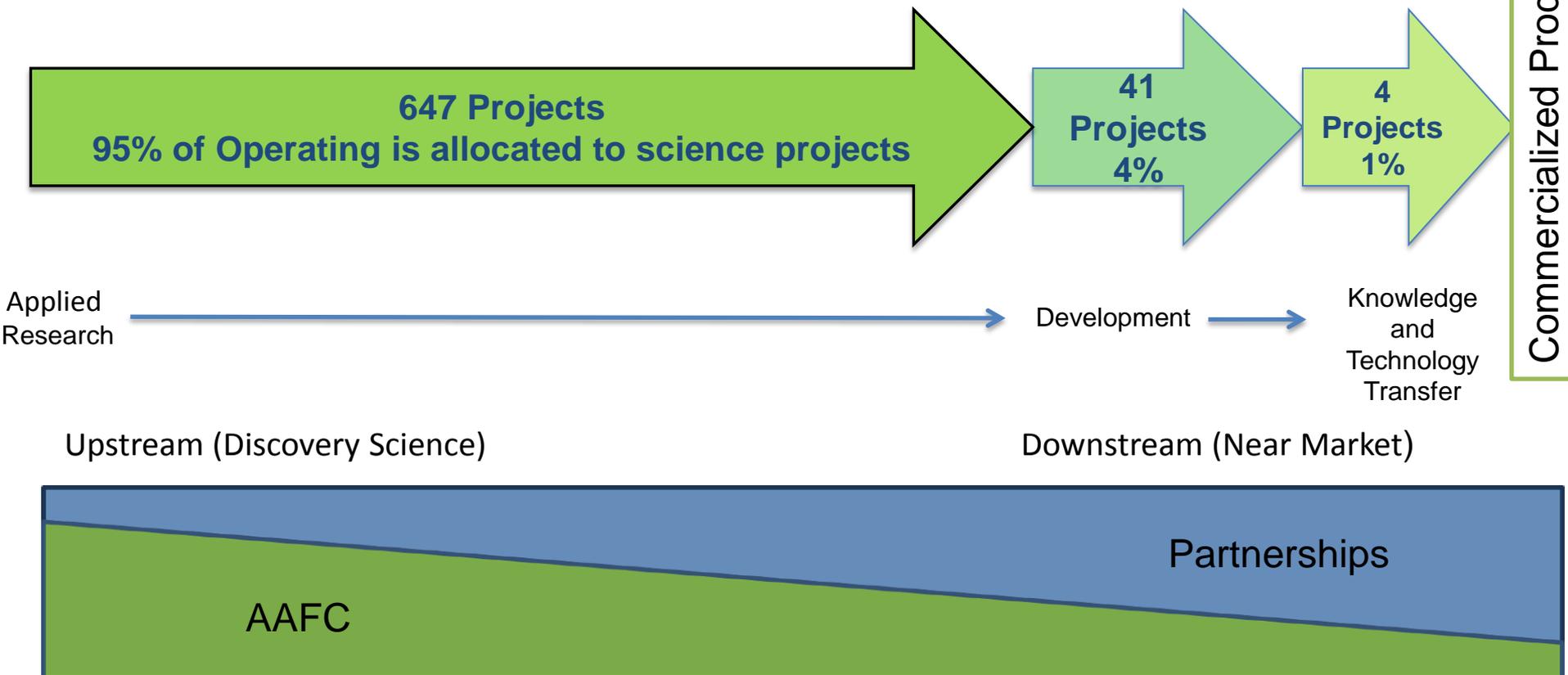
- **≈ 17 percent of AAFC's science teams** nutritional attributes, use of crops in pharmaceuticals, bio-chemicals, industrial fibre and bioenergy

Addressing threats to the agriculture and agri-food value chain

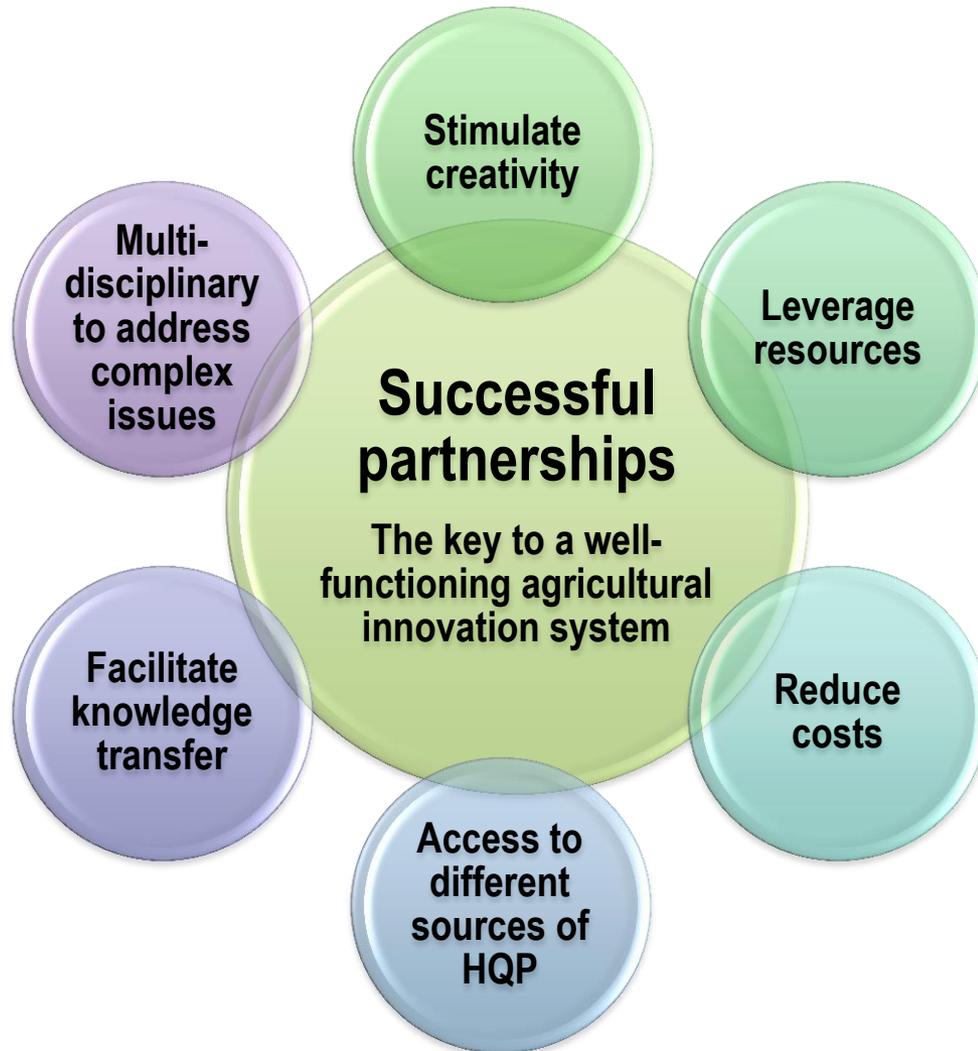
- **≈ 23 percent of AAFC's science teams** catastrophic risks associated with weeds, insects and disease; and risks to food safety

2017 – 18 AAFC Investment in Science

\$246.7M for Science and Technology Branch in 2017-18



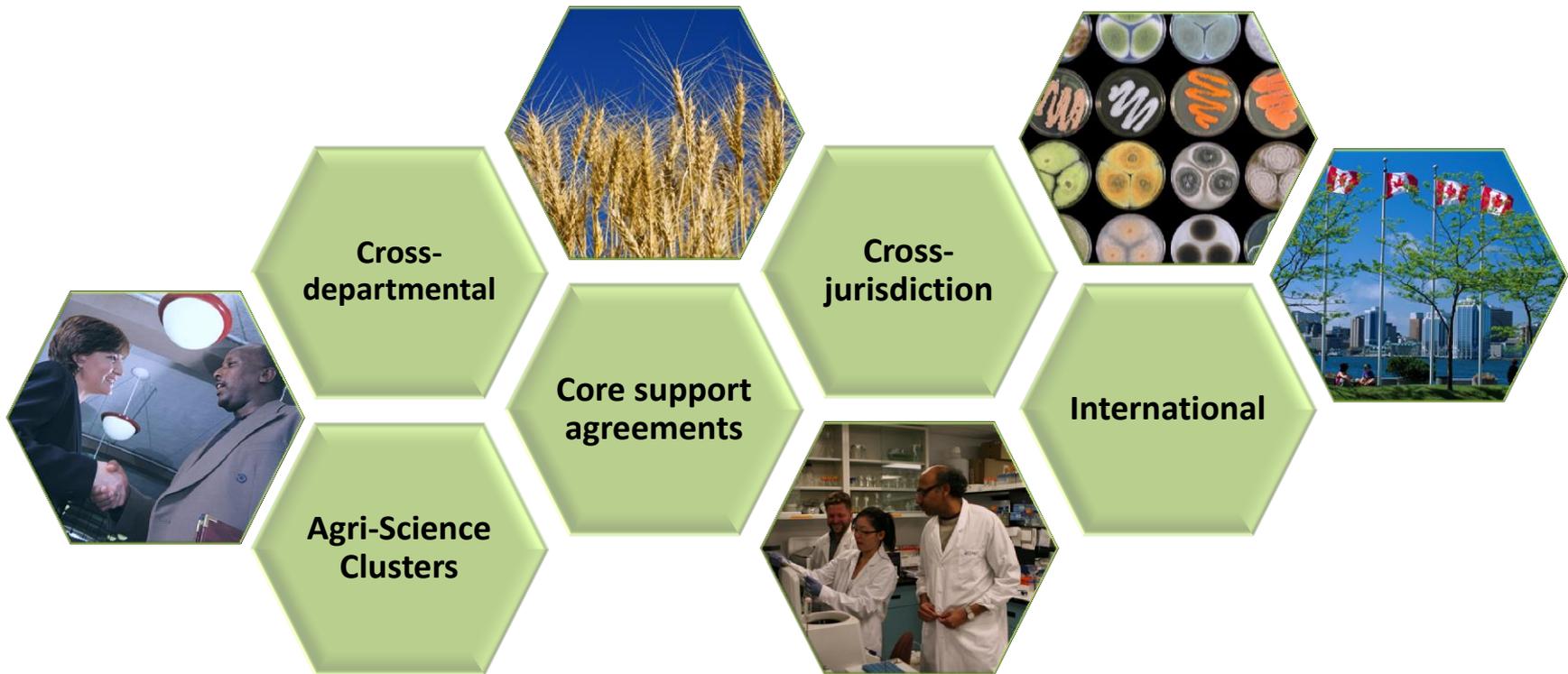
Partnerships Key to Innovation



A strong innovation agenda must involve all players



Partnerships Take Many Forms



International Partnerships

- Canada recognizes the importance of international partnerships to support agricultural innovation, research and development through:
 - Building common understanding of issues and solutions
 - Bringing more expertise and resources to address complex problems
 - Strengthening country to country relations

Types of international partnerships

Bilateral
science
cooperation

Regional
science
cooperation

Global multilateral cooperation

Complex issues

Commodity-
based initiatives

Conserving agro-
biodiversity and
sharing genetic
resources

Merci
Thank you