



Enabling
Drug Discovery

OPEN SCIENCE SYMPOSIUM



Montreal Neurological
Institute-Hospital

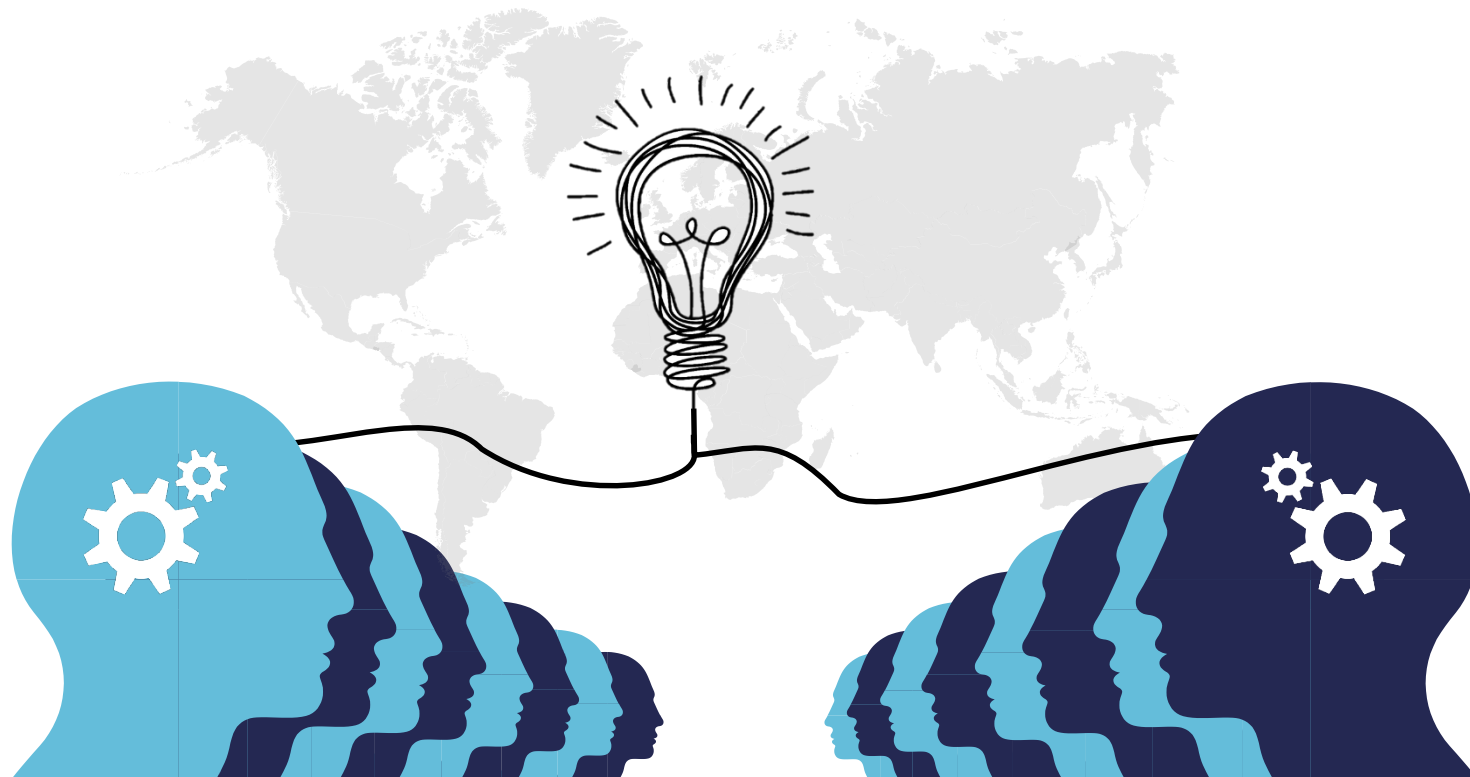


Diane Gosselin, CEO

November 18th, 2019

Breaking up the Silos to Conquer the Future

- Open Science
- Open Innovation
- Open Collaboration





CQDM: A Not-For-Profit Pharma-Led Consortium

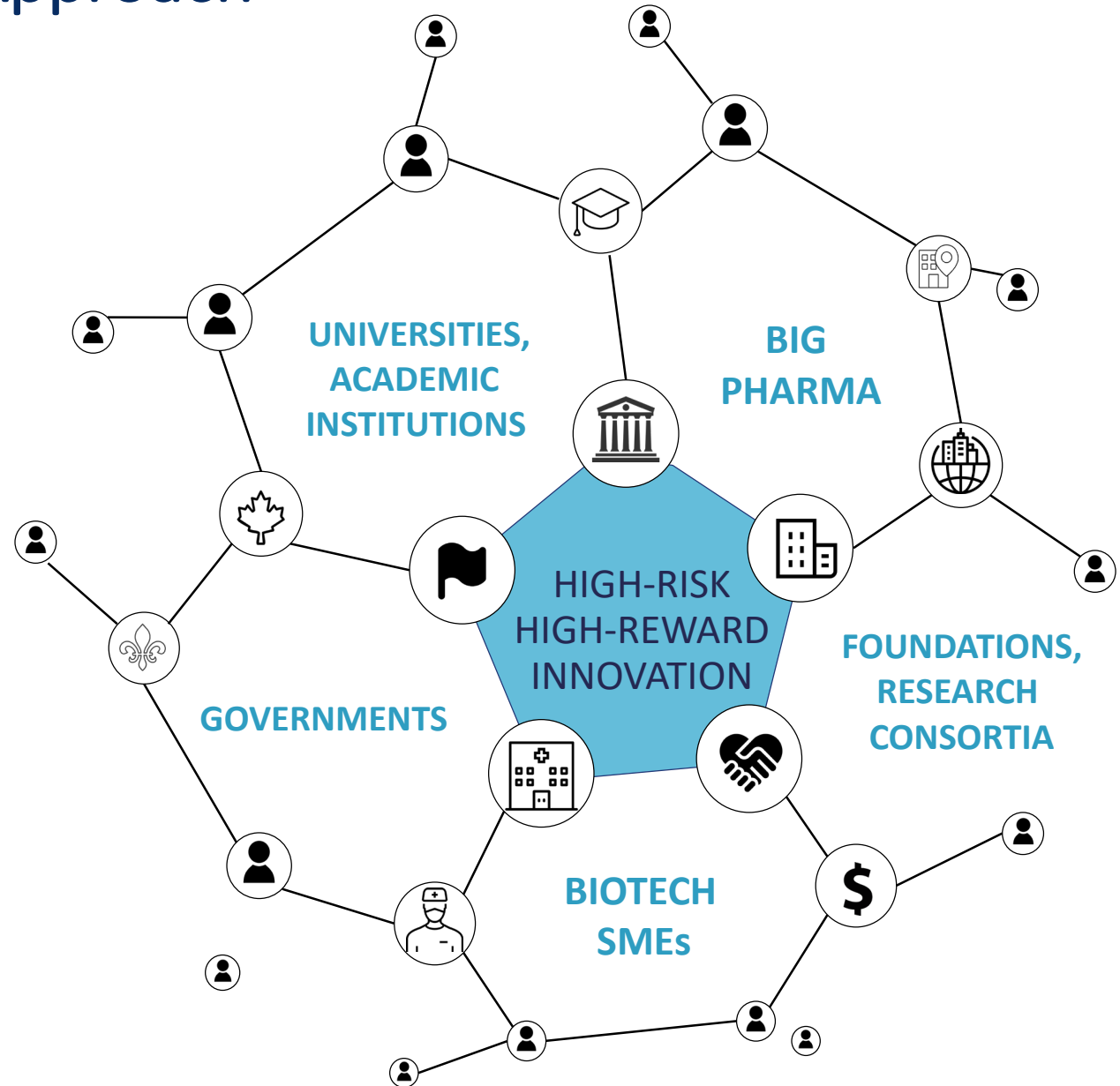


OUR MISSION

To fund and support **breakthrough technologies** that will significantly **enhance biopharmaceutical R&D** productivity and **accelerate the development** of safer and more efficacious drugs.

To create a **collaborative ground** between the academic and private sectors based on trust, creativity and **mutual benefit**.

- Multi-disciplinary
- Multi-institutional networks
- Public/private partnerships
- Collaborations between big pharma organizations



Significant Financial Leverage





CQDM Impact – Pan Canadian



Projects
funded

83

Entities
Supported

\$52 M

Engaged
in R&D

\$41 M

Co-
Funding

\$194 M

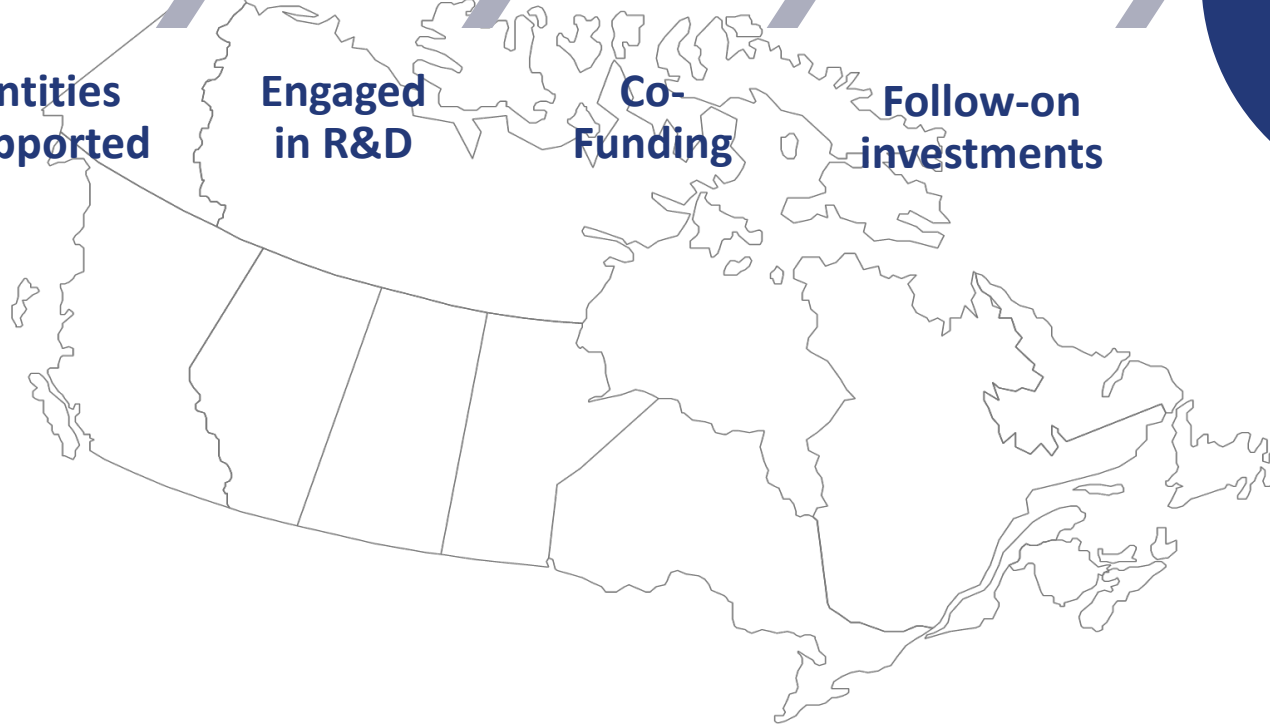
Follow-on
investments

10X

Financial
Leverage

~\$1.3 M

Average Project
size



55 PLATFORMS
300 RESEARCH TOOLS
150 THERAPEUTICS



A Collaborative Approach that Generates Mutual Benefits

PATIENTS-DERIVED HIPSC NEURONAL PLATFORM FOR DRUG DISCOVERY IN PD AND ALS

\$1.5 M
FUNDERS



Québec



Canada




RECIPIENTS

Edward Fon – Guy Rouleau – Thomas Durcan – Philippe Seguela –
Neil Cashman – Nicolas Dupré




ACCESS
TO RESULTS

- All results, cell lines and assays are in the public domain
- “First to see the results” and very close collaborations with KOL for participating Pharma


OUTCOMES

- Creation of drug screening platform
- Several candidates being validated from an open screen of 1,200 compounds
- Partnerships with InVivo AI to accelerate screening
- New investments totaling more than \$7 M (Merck, Takeda, SGC)



A Collaborative Approach that Generates Mutual Benefits

OPEN ACCESS PROTEIN DEGRADATION TOOLS FOR DRUG DISCOVERY

\$1.28 M
FUNDERS




RECIPIENTS

Cheryl Arrowsmith – Masoud Vedadi- Jinrong Min – Matthieu Schapira




ACCESS
TO RESULTS

- Research tools to characterize small molecule ligands for new E3 ligases are in the public domain
- Identity of E3 ligases of interest for participating Pharma are confidential
- “First to see the results” and very close collaborations with KOL for participating Pharma


EXPECTED
OUTCOMES

- New modalities for small molecule therapeutics through protein degradation induced by Proteolysis Targeting Chimeras
- Opportunity to create new IP for new molecules that bind the E3 ligases



A Collaborative Approach that Generates Mutual Benefits

LIBRARY OF MACROCYCLIC CHEMICAL ENTITIES TO INHIBIT PROTEIN PROTEIN INTERACTIONS

\$1.8 M
FUNDERS




RECIPIENTS

Andrei Yudin – Eric Marsault – Jeffrey Coull




ACCESS
TO RESULTS

- Non-exclusive rights for participating Pharma to screen the library
- Active mentorship from the participating Pharma
- Opportunity to co-develop lead candidates identified from the library screen


OUTCOMES

- Validation of the chemistry
- Fund raising (\$8.5 M) including from Pfizer and Takeda
- Development of 2 lead candidates for IBD by Encycle
- Acquisition by Zealand Pharma



A Collaborative Approach that Generates Mutual Benefits

INTRACELLULAR DELIVERY OF ANTIBODIES AND PEPTIDES USING THE FELDAN SHUTTLE TECHNOLOGY

\$0.6 M
FUNDERS



AMGEN®

SANOFI



Québec



RECIPIENTS

Frédéric Calon – David Guay



ACCESS
TO RESULTS

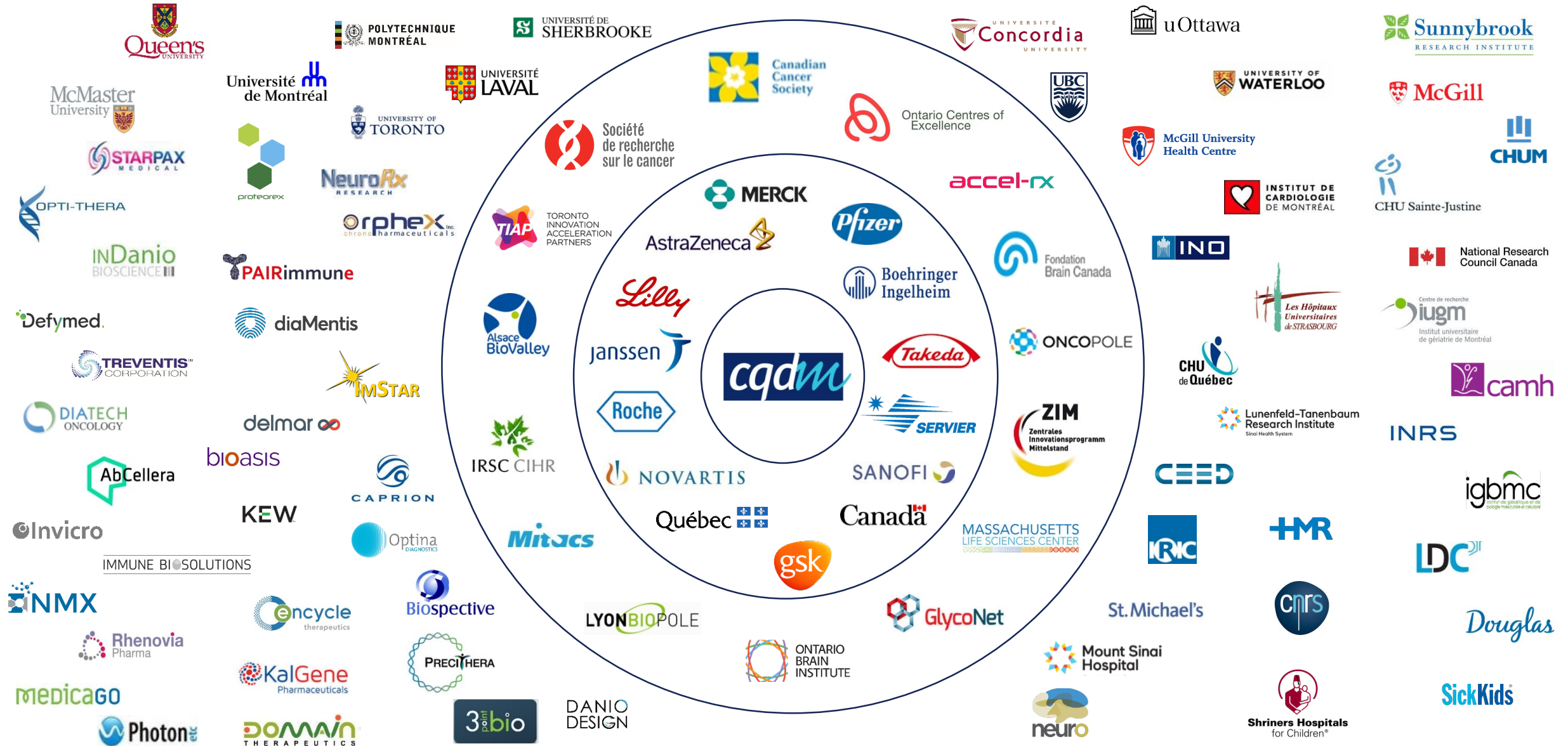
- Non-exclusive rights for participating Pharma to use the Feldan Shuttle for research purposes (for preclinical proof of concept)
- Active mentorship by the participating Pharma
- Early access to the results



EXPECTED
OUTCOMES

- Proof of concept of intracellular delivery
- Opportunity to showcase the technology to 5 leading pharma organizations
- Potential co-development deal with leading pharma organizations
- Fund raising (\$20 M to date)

An Extended Canadian and International Partner Network





CQDM
PROVIDES THE IMPULSE
for open innovation
to benefit
ALL
STAKEHOLDERS

