

# Phil De Luna

**Highlights** | 2019 Forbes Top 30 Under 30 – Energy  
Carbontech Co-founder & Finalist (1 of 10 globally) in \$20M Carbon XPRIZE  
Youngest director in the history of the National Research Council Canada  
39 publications in high-impact journals with multiple in *Nature* and *Science*  
Over 7 years of experience in research and development of clean energy technologies

**Education** | 2015 – 2018 University of Toronto PhD Materials Science & Engineering  
2017 University of California, Berkeley Visiting Scholar  
2013 – 2015 University of Ottawa MSc Chemistry  
2009 – 2013 University of Windsor BSc [H] Chemistry

**Experience** | **Program Director at National Research Council Canada**  
*Feb 2019 – Present*

- Built and led a \$57M collaborative research program on Canada-made energy materials to decarbonize the oil & gas/petrochemical industry.
- Manages a team of 40 FTE in three thrusts – CO<sub>2</sub> recycling, H<sub>2</sub> technology, and AI for materials discovery.
- Member of the OECD Advanced Materials Steering Committee on collaborative research.

**Member of the Board of Directors at Carbon Management Canada**  
*Sep 2019 – Present*

- Providing strategic direction and assessing the health of a non-profit that accelerates the development and testing of GHG-reducing technologies to market. Oversaw hiring of firm's latest CEO.

**Mentor at Creative Destruction Labs**  
*May 2020 – Present*

- Helping early stage founders change the world by building massive and scalable technology companies. Specialization in advanced materials and founding mentor of the Matter stream.

**Co-Founder & Finalist at Carbon XPRIZE**  
*Sep 2016 – Mar 2019*

- Finalist (1 of 10 globally) and raised \$2.0M in non-dilutive funding.
- Led a team to scale up CO<sub>2</sub> conversion technology from bench to prototype.
- 2019 Creative Destruction Lab – Energy cohort, a highly competitive startup accelerator.

**Researcher at University of Toronto**  
*Sep 2015 – Jan 2019*

- Pioneering contributions to the fields of CO<sub>2</sub> recycling, artificial intelligence for materials discovery, artificial photosynthesis, and hydrogen technologies. Governor General Gold Medalist.
- Brokered funded research projects to oil and gas/ petrochemical corporations such as Total, Suncor, and Dow. More than \$5M in awarded funds and partnerships.

**Research Scientist at Toyota Research Institute**  
*Jun 2018 – Sep 2018*

- Developed machine learning models and descriptors for accelerated discovery of fuel cell and battery materials for next-generation electric vehicles. Provided technical feedback for venture reviews.

**Research Scientist at IBM TJ Watson Research Center**  
*May 2016 – Sep 2016*

- Performed large scale computational simulations on supercomputers for point-of-care biosensing materials.

**Awards** | 2020 Mission Innovation Champion | 2019 Forbes Top 30 Under 30 | 2019 GreenBiz Top 30 Under 30 | Governor General of Canada Gold Medal | NSERC Canada Graduate Scholar | Massey College Junior Fellow | CIFAR Bio-Inspired Solar Energy Graduate Fellow |