



# Medical Careers Exploration Program Visits the RBC Youth BIOLab Jeunesse

This year, the RBC Youth BIOLab worked with over 4,900 students from 120 schools in over 250 sessions. Beyond the many half-day field trip sessions that we typically run, we also ran several special multi-day project-based learning sessions for diverse groups of students from around the province.

In May 2019, students from the Medical Careers Exploration Program (MCEP) at Windsor Park Collegiate spent five days at the RBC Youth BIOLab exploring how medical research is a significant part of

healthcare. The MCEP, developed by the Winnipeg Health Region and the Winnipeg School Division, was designed to give students exposure to a wide variety of healthcare jobs throughout high school, challenging them with intensive placements in a health care setting while they maintain their core school studies. The program was established in the Louis Riel School Division this year with the intent of helping students to launch careers in healthcare.

*“I learned so much about cells including things like how they develop, how they can grow back and multiply. I learned that vape extract doesn’t affect the reproduction of cells unless it’s high levels of extraction. I really enjoyed how fun they made it and how they included all our ideas and made sure we knew what we were doing. They were one of my favourite placements,” Windsor Park Collegiate student.*

The RBC Youth BIOlab was pleased to work with the Windsor Park Collegiate students enrolled in the MCEP program to help serve as their introduction to St. Boniface Hospital. For five afternoons, eight grade 10 MCEP students created and executed their own experiments in the BIOlab. They isolated stem cells from rat bone marrow and designed experiments to test electronic cigarette vapour extract or alcohol on cell behavior and survival. They were able to use a variety of cellular biology techniques to explore sophisticated health concepts

and learn something about health issues that are important to them.

Projects like these are a great example of the successful evolution of the BI0lab since it opened in 2013. Working with community partners, the RBC Youth BI0lab makes it possible to meet the diverse needs of youth in ways that hold meaning for them and their futures.



Students from the Medical Careers Exploration Program working with Youth BI0lab instructor Meghan Kynoch, practicing techniques required for their experimental treatments of stem cells with electronic cigarette vapour extract.

**More impressions from participants at the RBC Youth BI0lab Jeunesse at St. Boniface Hospital Research**

*“The science and research was interesting to learn about because you don’t really hear about that section of the medical careers. I loved learning about cells and it was fun seeing what happens to them – I learned a lot about stem cells.”*

*“What I enjoyed at St. Boniface Hospital was learning about stem cells and I am going to think of this when I am applying for University/College.”*

*“Overall the experience at St. Boniface Hospital was fun. We learned new things and gained experience we will never forget. I think the research is interesting because they are the ones that do all of the background work that the doctors and nurses don’t do, so I really appreciate all the work they do. I really want to come back next year.”*