Parent/Guardian Community E-Bulletin



Markville Secondary School E-Bulletin

1000 Carlton Road, Markham ON L3P 7P5

Phone: (905) 940-8840 **Fax:** (905) 940-8895 **E-mail:** markville.ss@yrdsb.ca Principal: Anthony Hu Vice-Principal: Barbara Caravella (A-Lin) Vice-Principal: Mark Melnyk (Ling-Z)



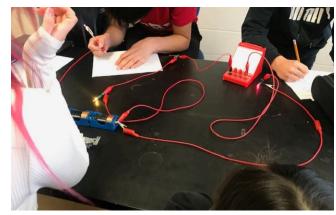
January 12th, 2024

Please keep in mind any information provided in this bulletin is subject to change and is accurate at the time of distribution.

Science Spotlight

Science students at Markville continue to be actively engaged in learning through various interactive activities that promote critical thinking and foster passion for scientific inquiry. A plethora of activities, demonstrations and lab experiments across all science classrooms have been getting students to explore, question and acquire the curriculum in different ways. Below are some highlights of this semester.

For the electricity unit in grade 9, students applied their knowledge of series and parallel connections to build and analyze a series of different circuits. For the ecology unit, students combined their creativity, knowledge of ecological principles and coding to build self-watering vertical farms which detected the need for watering with micro:bits.

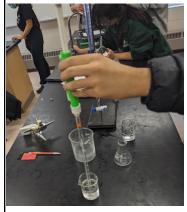




One of the strands in grade 10 science is biology. In the biology unit, students conducted a hands-on frog dissection in class. Students were asked to identify specific parts of the frog and explore different organ systems. Climate change is also a strand in the grade 10 course. Students used micro:bits and to build seed planters to address issues related to deforestation in different biomes.



In grade 11 chemistry, students were introduced to the technique of acid-base titration. They were asked to make a certain concentration of base which they then standardized and used to determine an unknown concentration of acid. Students' laboratory techniques and understanding and application of solution stoichiometry





was strengthened through this laboratory investigation.



For the energy unit in grade 11 physics, students performed an experiment to determine the specific heat capacity of an unknown metal to determine its identity. In the electromagnetism unit, students participated in an immersive escape room experience. They put their knowledge about electricity and magnetism to collaboratively solve problems and puzzles together. A field trip to the Ontario Science Centre further allowed students to extend their learning of physics concepts. Students visited an exhibit featuring metal dinosaur sculptures and discovered the physics behind those kinetic creations. They also watched the inspiring and heartfelt I-Max film Dream Big: Engineering Our World.



For the molecular genetics unit in grade 12 biology, students created models of DNA to illustrate their understanding of its structure. They conducted investigations to extract DNA from a banana. For the biotechnology unit, students performed electrophoresis, a common biotechnological method used in the health sector, to separate DNA fragments. Students experimented with chromatography to separate the accessory pigments in spinach leaves, not normally not visible to the human eye, in the metabolic processes unit.



Beyond the classroom, the science department provides many opportunities to motivate, enhance and enrich science learning. Science club, Physics club, EcoClub, Chemistry and Neuroscience club and Kids Are Scientists (Kast) Club are the science

related clubs at Markville. There is a rolling entry for clubs at Markville and students are always encouraged to sign up and get involved.



In addition, there are many current and upcoming competitions and contests. Students in Health Occupations Students of America (HOSA) worked hard and prepared themselves for the Fall Leadership Conference. They continue to practice for the Spring Leadership Conference. Guest speakers were invited to give a talk about medical related careers, more specifically neuroscience and artificial intelligence. Envirothon, an authentic and interactive competition about the environment, will also occur in the spring. As the year progresses, the science department will continue to provide students with updated information regarding science contests such as the University of Toronto's National Biology Competition, the University of Waterloo's Chem 13 News and Avogadro Chemistry Contests, as well as the University of Waterloo's Sir Isaac Newton (SIN) and University of Toronto and the Ontario Association of Physics Teachers OAPT physics contests.

The science department wishes semester one students great success on their final tasks and looks forward to a new group of science students in semester two.

Message from Guidance

POST-SECONDARY INFORMATION

Reminder that **Applications to OUAC are due January 15th** (NEXT WEEK!) for equal consideration, and **Applications to OCAS are due February 1st**.

COURSE SELECTION

Course Selection will be open for submission on **February 15, closing on February 24, 2024**. Students can enter courses at any point now, but MUST be locked in by February 24th. There is <u>no advantage</u> to submitting early, so please make your selection carefully, as elective changes (unless pathway changes) can be incredibly challenging. **IMPORTANT:** Students in **Grade 10 and 11** should be exploring Post-Secondary interests to review program requirements, so as to be able to choose potentially required Grade 11&12 pre-requisite courses in February for next year's **Course Selection**. It is recommended to take time, where possible, to do this over the Break, if students have not done so already. Course selection options/information can be found here on the Guidance website, as well as reviewing post-secondary information and links here.

FAMILY NIGHT WEBINAR SERIES

The next Family Webinar evening will be on **January 24th @ 6:30**, where Markville staff will present information on Markville's *Specialty Programs*. This webinar will include information on *Co-operative Education (Co-op), Dual Credit, Specialist High Skills Major (SHSM) and Advanced Placement (Pre-AP & AP)* and is strategically placed prior to February's Course Selection timelines. It is most beneficial for families of students going into Gr 11 & 12 next year. Additionally, the following Family Night presentation will occur on **February 7th**, to support families in *Course Selection*. Students will receive Course Selection information during school hours. Links will be posted in the **FN Agenda**.

Have a great weekend! Your Guidance Team~



Health Resource

This is a mental health resource that will appear in the E-Bulletin weekly that was created by past and present Markville students.

https://drive.google.com/file/d/1zxvp0ngpV22ikM7Fow2FNIMxX2wErCF5/view?usp=sharing

Markville Guidance Website Wellness Page: https://sites.google.com/gapps.yrdsb.ca/markvilleguidance/wellness

School Notices

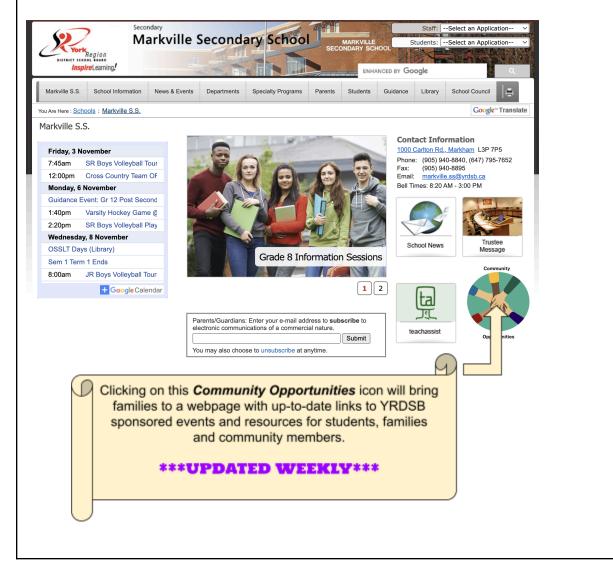
Upcoming Dates

January 18/19	Math EQAO
January 24	Guidance Family Presentation

January 25-31	Exams (communication will go out to families soon)
February 1	Exam Review Day
February 2	PA Day (school closed to students)
February 5	Semester 2 begins

Community Opportunities Site!

We would like to remind you of our <u>Community Opportunities Site</u> linked to our school home page where students, families and all community members can access up-to-date information about workshops, seminars, scholarships and more.



Message from Peer Tutoring and Student Success

Are you stressed about tests and assignments? Are you looking for extra help with your courses? Maybe you need help with your homework, or studying before a test? Don't worry, Markville's **Peer Tutoring Club** is back and ready to support YOU!

Peer Tutoring will start **MONDAY**, **NOVEMBER 6**. Sessions will be offered during **lunch** and **after school**. Students can drop-in as needed and/or request a weekly 1-on-1 peer tutor. **No application form is needed for** <u>drop-in</u> students.

To request a <u>weekly 1-on-1 tutor</u>, **submit an application** at <u>*bit.ly/msspeertutee2023*</u>. Look for the Peer Tutoring posters around school and follow <u>msspeertutoring</u> on IG for updates!



YRDSB Communications

Parent/caregiver series supporting learning about mental health.

The YRDSB Central Mental Health Team is proud to be offering the *Learning about Mental Health Presentation Series (LAMPS).* The objective of the series is to promote and enhance mental health literacy. The first session is "Anxiety in School-Aged Youth, a Presentation for Parents and Caregivers" and will occur virtually on February 28 from 6 - 7 p.m. The presentation will focus on the characteristics of anxiety, and some general strategies that may be beneficial in supporting your children and their anxiety.

These sessions are offered to any parent/guardian. Translation will be provided in a limited number of languages. If your preferred language is not offered, we recommend watching with a friend or family member who is able to translate.

To register please visit this link.

Please Register by February 27, 2024