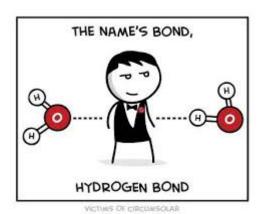
Science 8 Outline

Teacher: Ms. Richmond



Overview: The middle school science program is guided by the vision that all students have the opportunity to develop scientific literacy. The Science 8 program is an integrated science course designed to give students the opportunity to see how both science and technology help shape the world in which we live.

Text: Science Focus - McGraw-Hill Ryerson

Supplies needed:

Binder with loose leaf - Ruler - eraser
Pen and pencils - pencil crayons - Plain paper

5 duotangs - calculator (not a cell phone) - agenda (optional)

Units:

- 1. <u>Light and Optical Systems</u> Reflection, Refraction, Lenses and vision, extending Human vision, the source of colors Chapter 3 (Sept October)
- 2. <u>Mix and Flow of Matter</u> Fluidity, Mixing and dissolving, Flow rate and Viscosity, Density and Buoyancy Chapter 1 (November December)
- 3. <u>Cells and Systems</u> Living organisms, Microscopes and cells, Cell Structure, Cell Specialization, Body Systems in Humans Chapter 2 (January Feb)
- 4. <u>Mechanical Systems</u> Levers and Inclined Planes, The wheel and axle/gears and pulleys, Energy, Friction and Efficiency, Hydraulics and Pneumatics Chapter 4 (March April)
- 5. <u>Fresh and Salt Water Systems</u> Earth's Frozen Water, Fresh Water Systems, Oceans, Living in the water, Water Quality Chapter 5 (April June)

^{**}Students may be asked to complete some activities using supplies found in the home. These activities will require imagination and creativity, not money**

Each unit will take approximately 6-8 week

There will be time for review of all topics in June before the final exam.

Course Evaluation:

In Science 8 there are 5 units each worth 16% of the student's final grade. The final exam is worth 20% of the final grade.

In each unit of the 5 Units:

Assignments/Note taking - 20%

Select assignments - 0% (Assessment for Learning)

<u>Class Quizzes</u> (Entrance/Exit questions) - 10% This will include focus questions and literacy goals (vocabulary quizzes)

<u>Labs/Projects</u> - 20%

<u>Review questions</u> (End of unit review) - 10% The review questions will typically be performed the 1-2 classes preceding the Pre-test

<u>Pre-test</u> - 0 - 20% The pre test will typically be the class before the unit exam. The exam will be marked in class for immediate feedback.

- You will write the test in class like a regular exam, one to two days before the actual test. If you do well on the pre-test and it will help your final unit mark it will be worth 20% of your unit mark. If the test will hurt your overall unit mark you can count it as a select assignment and make it worth 0%
- If you miss the pre-test, you can still have it to use as a study guide, but it will not be worth a percentage of your unit mark.

<u>Unit exam</u> - 20-40% Depending on on the Pre-test.

In Science, assessment is divided into 2 types: formative assessment (assessment for learning) and summative assessment (assessment of learning). Some of the work students will complete is for practice and learning (assessment for learning). Completion of these types of assessments should help students achieve mastery of content. The summative assessments will test student mastery of content.

Expectations:

- 1. Be in class on time with all necessary materials: ready to work
- 2. Students are expected to complete work on time. Homework is due at the beginning of the class, on the assigned date. Homework assignments should be copied from the board into your agenda.
- 3. Absences. When absent it is the students responsibility to catch up on work or tests missed. Check with the teacher. If you know you are going to be absent,

- work can be given ahead of time. Tests and quizzes that are missed are usually made up at lunch or after school.
- 4. Binders are to be kept neat, organized and dated. Students are expected to show their work in answering questions.
- 5. Assignments are to be handed in on time. All assignments must be completed.
- 6. If you are having any difficulty with the course please arrange a time for extra help. Do not let yourself slip behind. Help is available, please ask before it is time for the final at the end of the year.



Cell Phone Policy: There is a time and place for the use of cell phone technology in class. The teacher will inform the student when that time is. Cell phones will be parked during class time, with the exception of times that it is required to enhance learning as dictated by the teacher. It is not to be used in replacement of a calculator or a source of music. Thank-you for your support in this area.