**Foundations of Mathematics 110**

Course Outline1

Bonar Law Memorial School

2021-2022

### C. Wilson

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**Required Supplies**

* Foundations of Mathematics 11 (Nelson 2011)
* Pencils, erasers, loose-leaf and graph paper
* A **scientific calculator**
* A positive attitude about math!

**Units of Study**

**Unit 1** – **Relations and Functions (RF)**

RF1 – Model and solve problems that involve systems of linear inequalities in two variables.

RF2 – Demonstrate an understanding of the characteristics of quadratic functions, including vertex, intercepts, domain and range, axis of symmetry.

**Unit 2** – **Geometry (G)**

G2 – Solve problems that involve the properties of angles and triangles.

G3 – Solve problems that involve the cosine law and sine law.

**Unit 3** – **Number (N)**

N1 – Analyze costs and benefits of renting, leasing and buying.

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# **Unit 4** – **Logical Reasoning (LR)** (included throughout semester)

# LR1 – Analyze and prove conjectures using logical reasoning, to solve problems.

# LR2 – Analyze puzzles and games that involve numerical reasoning, using problem–solving strategies.

**Evaluation**

Students will be assessed both formally (tests, quizzes, and assignments) and informally (class participation, observation).

The semester mark will be broken into four sections:

* Relations and Functions – 60%
* Geometry – 28%
* Number Sense – 7%
* Logical Reasoning – 5%

A final examination will be valued according to the exam incentive, detailed below.

**Exam Incentive**

All students attending school and registered in courses with a final exam will be required to write that exam at a value of 30% unless otherwise directed by the district. The only exception will be when a student has met the requirements for the Academic Incentive.

To reach this Academic Incentive, a student must meet the following criteria:

If a student has an 85% in any given subject AND is in good standing (nothing owing for assignments, projects, etc.), the subject teacher may apply one of the three following options to the student’s advantage:

15% Final Exam, 85% class mark

30% Final Exam, 70% class mark

50% Final Exam, 50% class mark

It is understood this policy does NOT apply to any District or Provincial assessments where the exam is determined by those authorities.

**Late Policy**

It is important that work is completed on time. If a student is absent on a due date, a written excuse from a parent or guardian must be presented upon the student’s return, unless work is submitted online (and on time).

Incomplete or missing work is to be completed during lunch hour extra-help sessions or study block.

Due date extensions **may** be offered on a case-to-case basis. However, it is important that these are negotiated **in advance** of the due date.

**Our Classroom Values**

**Grit** – Work harder than you think you need to. Don’t give up! Don’t be afraid to re-set and try again.

**Empathy** – Listen to others. Really listen. Go out of your way to help someone in need, especially if you see them struggling. If you think a student is too shy to speak up, advocate for them.

**Accountability** – Own your successes and failures. Arrange extra help if you need it. If you think you need more time with an assignment, ask for an extension before the due date. Bring your materials to class and be prepared.

**Respect** – Respect other students, the teacher and course materials. We are all in this together, so let’s enjoy our time together.



**Good luck and have fun!**

1Course outline subject to change