

## Semester Two Timetable 2020-2021

Period 1	Financial and Workplace Math 120 Visual Arts 110 Introduction to Applied Technology 110 Financial and Workplace Math 110 English 112 Reading Tutor 120
Period 2	Law 120 Introduction to Environmental Science 120 Metals Processing 120 Calculus 120 History 112
Period 3	Indigenous Studies 120 Media Studies 120 Outdoor Pursuits 110 Culinary Technology 120 Biology 122
Period 4	Theatre Arts 120 Mill and Cabinet Work 120 Pre-Calculus 110 English 113 Information Technology 120
Period 5	Introductory Mi'kmaq 110 Economics 120 Tune-up and Emissions 120 History 113 Chemistry 122

### Course Descriptions

#### Period 1

##### ***Financial and Workplace Math 120***

This is the second of two courses in the Financial and Workplace pathway designed for entry into post-secondary trades and technical programs, or for direct entry into the work force. Students explore the limitations of measuring instruments, and solve problems using sine and cosine laws and the properties of triangles, quadrilateral, and regular polygons as they relate to construction, industrial, commercial and artistic applications. Transformations of 2-D and 3-D shapes are identified, drawn with and without technology, and used to create, analyze and describe designs and to solve contextual problems. The viability of small business options is explored including expenses, feasibility, and factors that could effect on profitability. Linear relations are studied, including patterns and trends, graphing, creating tables of values, writing equations, interpolating and extrapolating, and solving problems. Students gain an understanding of mean, weighted and trimmed mean, median and mode, and explore the impact of outliers. They also compare percent and percentile and explore probability. Opportunity is given to research and present an historical event or an area of interest that

involves mathematics. Financial and Workplace Mathematics 110 or Foundations of Mathematics 110 can serve as a pre-requisite for this course. Financial and Workplace Mathematics 120 completes the Financial and Workplace pathway

### ***Visual Arts 110***

Visual Arts 110 builds on the experience and knowledge gained in Visual Arts 9/10. The studio work remains in the areas of drawing, painting, printmaking and 3-dimensional work and stresses personal expression and the development of individual imagery and there are further requirements in art criticism and art history.

### ***Introduction to Applied Technology 110***

Students will complete a series of projects from the areas of Woodworking, Motor Mechanics, Plumbing, Drywall Repair, Electrical, Manufacturing and Construction.

### ***Financial and Workplace Math 110***

This course is the first of two courses designed for entry into many trades and technical programs, and for direct entry into the work force. Concepts of right triangles, trigonometry, and angles of elevation and depression are applied to contextual problems. Scale models and drawings of 2-D and 3-D objects are constructed from various views and perspectives. Students are challenged to solve problems that involve numerical reasoning. Costs and benefits of renting, leasing and buying are explored, investment portfolios analyzed, and personal budgets developed. Students manipulate and apply formulas in a variety of ways and solve problems using proportional reasoning and unit analysis. Students have a choice of this course or Foundations of Mathematics 110 to complete graduation requirements. This is a pre-requisite for Financial and Workplace Mathematics 120.

### ***English 112***

English 112 and 122 are courses appropriate for students intending to pursue studies at a post-secondary institution. Each of the English courses will provide a wide variety of experiences in speaking and listening, reading and viewing, writing and other ways of representing. English 112 will focus on information and media literacy, encouraging students' expansion and control of their own use of language. Significant literary pieces from the past plus those of contemporary and personal interest should be among the print and visual texts students encounter. English 122 will concentrate on critical and personal response to Canadian and world literature.

### ***Reading Tutor 120***

Reading Tutor 120 pairs senior student tutors with younger struggling readers. The tutors receive a course credit while the readers receive assistance meeting the outcomes for English Language Arts. The teachers of this course co-ordinate the program and provide the tutor training; oversee the activities of the partners and offer guidance and support to both the tutors and the readers. The tutors select the reading materials and plan and implement the daily activities for their readers. Readers who take the course improve their reading and writing skills and often increase their motivation and interest in school while the tutors acquire valuable reading/writing tutoring skills and develop useful interpersonal, organizational, planning and problem-solving skills.

## **Period 2**

### ***Law 120***

This course is designed to give students knowledge of the law, the courts' changing trends, and the major changes the constitution has brought about. Areas of study include the origins of the Canadian legal system, criminal law, civil and human rights, torts/civil law, and contracts. Actual case studies are used to illustrate situations within these areas of law.

### ***Introduction to Environmental Science 120***

The objective of this introductory course is for students to develop the knowledge base and skills for investigating and analyzing environmental issues and for communicating their knowledge and analysis to others. Students will investigate population growth and resource limitations, ecology of natural systems, historical and current approaches to the environment from various worldviews, and sustainability of natural environments. They will explore the interconnectedness of natural ecosystems and human dependence and impact on these systems. They will recognize the importance of considering environmental, social, cultural and economic aspects of an issue to find solutions. Students will complete a research project on a current issue and present their findings and will further explore this and other environmental issues through various methods of inquiry.

### ***Metals Processing 120***

This course allows students to continue to explore the processes used in the manufacture of metal products. (Pre-requisite: Metal Processing 110)

### ***Calculus 120***

This is the last course offered in the Pre-Calculus Pathway and follows Pre-Calculus B 120. This course develops the concepts of average and instantaneous rates of change. Derivatives are determined by applying the definition of a derivative and the derivative rules including the Chain Rule and are determined for trigonometric functions. Limits and derivatives of exponential and logarithmic functions are found. Calculus techniques are used to sketch graphs of functions and to solve optimization problems. Problems are solved involving inverse trigonometric functions, related rates, and the application of the integral of a function from a variety of fields. The definite integral and the anti-derivative of a function are determined. This course is recommended for students interested in post-secondary programs in science, engineering and mathematics, though it may not be a required entrance requirement. Students should check entrance requirements for the specific program and institution in which they are interested. Pre-Calculus A120 and Pre-Calculus B120 are pre-requisites for this course.

### ***History 112***

Modern History 112 is a rigorous study of the evolution of the peoples of the west during the nineteenth and twentieth century and their widening involvements in global issues. The course describes the rise of nationalist and socialist movements, the international connections growing out of the World Wars and the Cold War era, and the widening global contacts of the contemporary world.

## **Period 3**

### ***Indigenous Studies 120***

This course covers topics such as Treaties, Residential Schools, New Brunswick First Nation Communities, Legislation and Policy Impacting First Nations, Post-Colonization: De-mythologizing Popular Culture; Reconciliation: National Inquiries in Canada; The UN Declaration of Indigenous Rights: Calls for Action; First Nations and Global Conflicts. There will be one project per term- one will focus on Contemporary Issues- the other on a First Nations Soldier Biography.

### ***Media Studies 120***

Media Studies 120 offers an introduction to the evolution and impact of mass media on the individual and society. The television/video unit is compulsory, accompanied by a choice of three additional units on advertising, film, print and electronic journalism, photography, drama, radio/sound communication, as local circumstances permit. The primary purpose of the course is to have students learn through experiment and exploration; the course is practical, and activity based. Students enrolled in Media Studies 120 must be mature enough to meet the high level of independence, reliability and responsibility required of them.

### ***Outdoor Pursuits 110***

The course will develop personal outdoor recreation skills based on environmental ethics. Students must satisfy a requirement to complete a series of out-trips that may be daytrips, overnight excursions or extended trips. The course will take advantage of local outdoor access and could include camping, hiking, canoeing and other outdoor adventure activities. Students must be prepared to plan, lead and evaluate out-trip experiences from personal and group dynamics perspectives. Physical Education 9/10 is a prerequisite for Outdoor Pursuits 110.

### ***Culinary Technology 120***

The Culinary Technology Program is designed to prepare students for employment and/or future education in the food service industry. This technology-driven and skill-oriented program involves not only the "how and why" of food service preparation but focuses on the development of personal skills and knowledge that can be applied to the food service industry. Laboratory experimentation, food preparation and service are an integral part of the program. It gives students life-long learning skills that may be transferable to future training and/or food services employment. Culinary Technology 110 is a prerequisite for Culinary Technology 120.

### ***Biology 122***

Biology 122 is a challenging one-semester course. Previous Chemistry courses are not required but would provide good preparation for this course. Laboratory and/or demonstration periods are an integral part of this course. Major topics covered are systems regulating change in human and other organisms, reproduction and development, chromosomes, genes, DNA; and change in populations, communities and species.

## **Period 4**

### ***Theatre Arts 120***

Theatre Arts 120 is a course that assumes an enhanced level of theatrical experience. In collaboration with their teacher and peers, students are encouraged to direct their learning and decide how to demonstrate the acquisition of skills.

### ***Mill and Cabinet Work 120***

This is a finish woodworking course in which students will develop the necessary skills, knowledge and work habits required to construct cabinets and other miscellaneous mill work typically found in residential dwellings. Students, through a series of projects, will be involved with all aspects of mill work including planning, estimating, operation of woodworking equipment and machines and finish operations. This course will be of benefit to those students interested in entering the construction or woodworking occupations as well as for those with a general interest in woodworking.

### ***Pre-Calculus 110***

This course, followed by later courses in Pre-Calculus and Calculus, is designed for entry into post-secondary programs requiring Pre-Calculus. Students demonstrate an understanding of absolute value of real numbers, and solve problems that involve radicals, radical expressions, radical equations. Students determine equivalent forms, simplify rational expressions, and solve problems that involve rational equations. They develop an understanding of angles in standard position ( ) and solve problems for these angles using the three primary trigonometric ratios. Polynomial expressions are factored, and absolute value functions and quadratic functions are analyzed and graphed. Students solve problems that involve quadratic equations and solve, algebraically and graphically, problems that involve systems of linear-quadratic and quadratic-quadratic equations in two variables. They also solve problems that involve linear and quadratic inequalities in two variables, and quadratic inequalities in one variable. This course is a pre-requisite for Pre-Calculus A120.

### ***English 113***

English 113 and 123 are courses intended for students who do not plan to attend academic post-secondary institutions. These English courses provide a variety of experiences with language and texts to develop students' competencies in speaking, listening, reading, viewing, writing, and other ways of representing. English level 3 courses may differ in terms of pace, scope, emphasis and resources from level 2, but all students in all levels will work toward achieving the same English outcomes. High priority is given to student development of reading and viewing comprehension and to effective oral and written and other communication. Students will concentrate on improving strategies for learning from literary, technical and media texts; practical and personal writing is stressed.

### ***Information Technology 120***

This course prepares students for the electronic office by teaching the manipulation of applications software. Data base management, spreadsheets, file handling, printer manipulation, word processing, electronic accounting, and electronic storage and dissemination of information are included.

## **Period 5**

### ***Introductory Mi'kmaq 110***

This is a beginner's level language course with an emphasis on conversational skills. Students will learn and practice language through conversations, games and written assignments. By the end of this course, students will have a general understanding of the nature and function of the Mi'kmaq language that will enable them to communicate using the language. Students will also develop an understanding and appreciation of the Mi'kmaq language as an expression of a distinctive culture.

### ***Economics 120***

Economics 120 provides a basic understanding of our economic system and how it works. The role of Canada's major economic institutions and how they interact is examined. It is designed to develop an understanding of the concepts and techniques needed in making economic decisions and to develop an awareness of the major economic problems and issues of the day.

### ***Tune-up and Emissions 120***

This course is designed to provide students with a practical approach to diagnosing, servicing, and repairing of automobile fuel and emission systems and to performing engine tune-ups.

### ***History 113***

Modern History 113 is designed to provide an understanding of the main events of the twentieth century, as well as some familiarity with basic skills used to interpret historical accounts. A survey approach is given to the following topics: Basic World Geography, Industrialization, Life in the 1920's and 30's, World War I, World War II, and the Cold War.

### ***Chemistry 122***

Chemistry 122 emphasizes learning chemistry using the scientific method. The experiments are designed so that students make observations and draw conclusions, which lead directly to important chemical principles. Topics include organic chemistry, thermo-chemical changes, equilibrium, acids and bases, and electrochemical changes.