

Wyoming Department of Education Required Virtual Education Course Syllabus

BIG HORN COUNTY SCHOOL DISTRICT #1

Program Name	WYCA	Content Area	Mathematics
Course ID	CAMA79676	Grade Level	9, 10, 11, 12
Course Name	Consumer Math A	# of Credits	0.5
SCED Code	02157G0.5012	Curriculum Type	Connections Academy

COURSE DESCRIPTION

This is the first of two courses that comprise Consumer Math. In this course, the student will learn that money is lost or gained depending upon the information a consumer has to help him make informed decisions. Retailers, banks, and credit card companies may not provide consumers with all the information they need to make good decisions. By the end of this course, the student will understand the history of money, define fixed costs and discretionary spending, understand the importance of savings, and recognize the dangers of debt. This course will ask the student to look hard at his financial choices including spending patterns, purchasing motivations, and how to make some difficult decisions.

WYOMING CONTENT AND PERFORMANCE STANDARDS

STANDARD#	BENCHMARK
N.Q.1	Use units as a way to understand problems and to guide the solution of multi-step problems; choose and interpret units consistently in formulas; choose and interpret the scale and the origin in graphs and data displays.*
N.Q.2	Define appropriate quantities for the purpose of descriptive modeling.*
N.Q.3	Choose a level of accuracy appropriate to limitations on measurement when reporting quantities.*
A.SSE.1	Interpret expressions that represent a quantity in terms of its context.*
A.SSE.3	Choose and produce an equivalent form of an expression to reveal and explain properties of the quantity represented by the expression.*
A.CED.1	Create equations and inequalities in one variable and use them to solve problems. Include equations arising from linear and quadratic functions, and simple rational and exponential functions.*
A.CED.4	Rearrange formulas to highlight a quantity of interest, using the same reasoning as in solving equations. For example, rearrange Ohm's law $V = IR$ to highlight resistance R .*
A.REI.3	Solve linear equations and inequalities in one variable, including equations with coefficients represented by letters.
S.IC.6	Evaluate reports based on data.*

SCOPE AND SEQUENCE

UNIT OUTLINE	STANDARD#	OUTCOMES
<p>Unit 1: Money and Spending As you work through the unit, you will explore the history of currency and how it has changed over time. You will calculate discount, sales tax, and the cost of single items using many real-world situations. You will learn how to estimate expenses before going to the register at a store or receiving a check at a restaurant. You will analyze the information on an invoice and examine the different methods of payment. Finally, you will explore the fundamentals of creating a budget by estimating your expenses and saving money.</p>	<p>N.Q.1; N.Q.2; N.Q.3; A.SSE.1; A.SSE.3; A.CED.1; A.CED.4; A.REI.3</p>	<ul style="list-style-type: none"> •Compute basic money exchange problems •Calculate how to save money by using discounts and sales •Use multiplication to quickly calculate a total •Use a percentage discount to calculate savings •Use various methods of discounting to compare savings
<p>Unit 2: Controlling Expenses This unit focuses on calculating total expenses using addition and subtraction of decimals, multiplication and division of decimals, and percentages of numbers. You will learn to read tables with specific situational data including time and money to determine the best plan for using electricity and telephones. You will also learn how to make estimations when shopping and then use those estimations to calculate the total bill at a restaurant including sales tax and tip. Then, you will complete activities to keep track of your expenses and checking balance. Lastly, you will perform computations involving wage earnings in order to determine how many work hours a purchase requires</p>	<p>N.Q.1; N.Q.2; N.Q.3; A.SSE.1; A.SSE.3; A.CED.1; A.CED.4; A.REI.3</p>	<ul style="list-style-type: none"> •Use estimation to calculate the total bill •Examine different ways of paying for something •Calculate purchases including discounts and sales tax •Use steps for calculating a bill in order to pay by check •Compare plans and determine the best choice for a given situation

<p>Unit 3: Finances: Income and Debt</p> <p>Interest, earnings, and savings are the key concepts in this unit. You will solve problems involving the formula for simple interest to determine various earnings on savings. You will learn the difference between involuntary and voluntary pay deductions and use a percentage of a number to determine net income. You will also have an opportunity to explore the effects of compounding interest on a traditional savings over a long period of time as compared to a simple interest computation over the same period of time. By the end of the unit, you will have a greater understanding of how credit cards have an impact on your financial health by completing problems using interest calculations and late fees. Through these calculations, you will compare the final cost of these credit card purchases, which may change your mind about purchasing items that are wants (luxuries) rather than needs (necessities).</p>	<p>N.Q.1; N.Q.2; N.Q.3; A.SSE.1; A.SSE.3; A.CED.1; A.CED.4; A.REI.4;</p>	<ul style="list-style-type: none"> • Explain the differences between gross pay and net income • Explore the importance of savings in planning a healthy financial future • Calculate savings based on income and expenses • Compute interest on savings using online CD calculators • Identify the long-term benefits of following a savings plan
<p>Unit 4: Dealing with Debt</p> <p>Debt is an inevitable part of your financial life and this unit focuses on different types of debt and the mathematical computations involved. You differentiate between fixed expenses and discretionary expenses, then calculate your total fixed expenses using addition, subtraction, multiplication, and division of decimals, and finally determine how much of your gross pay is allowed for housing and fixed expenses using percentage of a number. You complete decimal computations again when paying off credit card debt over a long period of time. Finally, you explore the methods used to calculate your credit score and your credit scores impact on interest rates involving debt and savings. You will interpret a data table to complete your calculations, and then compare outcomes based on several situations.</p>	<p>N.Q.1; N.Q.2; N.Q.3; A.SSE.1; A.SSE.3; A.CED.1; A.CED.4; A.REI.3; S.IC.6</p>	<ul style="list-style-type: none"> • Calculate how to increase savings by reducing expenses • Compute different interest amounts due based on different principal amounts due • Compute interest on credit cards • Compare the impact on principal reduction of changes in monthly payments • Explain what your credit score means and how it is developed
<p>Unit 5: Review</p> <p>This unit reviews the information taught in Units 1 – 4 in preparation for the course final. You review key concepts from Unit 1 such as bartering, exchange rates, and purchasing goods from grocery and departments stores. You use decimal computations to calculate final costs and then comparing of decimals to make recommendations on purchases. Unit 2's review continues the theme of decimal computations but expands to include controlling your expenses and keeping track of income through utilization of a checking account. Unit 3 focused on tabulating interest using the $I=Prt$ simple interest formula and the impact long periods of time can have on savings growth. You also review calculating gross pay, deductions, and net income. Finally for Unit 4's review, you complete comparisons involving credit card debt versus savings lost, the impact of various payments of paying off debt, the work hours cost of purchases, and the effects of different credit scores on interest rates.</p>		<ul style="list-style-type: none"> • Review concepts presented in Unit 1: Money and Spending • Review concepts presented in Unit 2: Controlling Expenses • Review concepts presented in Unit 3: Finances: Income and Debt • Review concepts presented in Unit 4: Dealing with Debt <p>Study for the final exam</p>
<p>Unit 6: Final Exam</p> <p>In this unit, you will take the final exam. The final exam may include any material that has been presented throughout the semester. Since this is a comprehensive exam, it may be helpful to organize your notes before you begin to review.</p>		<ul style="list-style-type: none"> • Identify strategies that you will use to prepare for your exam • Organize your time and study materials • Review your notes, answers to lesson questions, and key vocabulary terms