Wyoming Department of Education Required Virtual Education Course Syllabus

Platte County School District #1

Program Name:	Peak High School VE Program	Content Area	MA
Course Number:	O200121	Grade Level	Grades 9-12
Course Name:	Financial Math	# of Credits	1.0
SCED Code:	02155G1.0011	Curriculum Type	Edgenuity Online

COURSE DESCRIPTION

A two-semester course designed for high school students, this course focuses on the applications of mathematics in both personal and business settings. This course contains 15 major topics encompassing many aspects of financial math: personal financial planning, income, budgeting and wise spending, banking, paying taxes, the importance of insurance, long-term investing, buying a house, consumer loans, consumer credit, consumer debt, economic principles, traveling abroad, starting a business, and analyzing business data. Students apply various math skills such as percents, proportions, probability, data analysis, linear systems, exponential functions and formulas to real life situations.

WYOMING CONTENT AND PERFORMANCE STANDARDS

STANDARD#	BENCHMARK (Standard/Indicator) Use the Standards and Benchmarks as Spreadsheets
S-ID.6(b)	Summarize, represent, and interpret data on two categorical and quantitative variables. Represent data on two quantitative variables on a scatter plot, and describe how the variables are related.
A-SSE.3(c)	Use the properties of exponents to transform expressions for exponential functions.
F-LE.1(c)	Recognize situations in which a quantity grows or decays by a constant percent rate per unit interval relative to another.*
F-IF.8(b)	Use the properties of exponents to interpret expressions for exponential functions.
F-LE.1(a)	Prove that linear functions grow by equal differences over equal intervals and that exponential functions grow by equal factors over equal intervals.
S-ID.5.	Summarize, represent, and interpret data on two categorical and quantitative variables. Summarize categorical data for two categories in two-way frequency tables. Interpret relative frequencies in the context of the data (including joint, marginal, and conditional relative frequencies). Recognize possible associations and trends in the data.
A-CED.2.	Create equations that describe numbers or relationship. Create equations in two or more variables to represent relationships between quantities; graph equations on coordinate axes with labels and scales.
F-IF.4.	Interpret functions that arise in applications in terms of the context. For a function that models a relationship between two quantities, interpret key features of graphs and tables in terms of the quantities, and sketch graphs showing key features given a verbal description of the relationship. Key features include: intercepts; intervals where the function is increasing, decreasing, positive, or negative; relative maximums and minimums; symmetries; end behavior; and periodicity.
A-REI.11.	Represent and solve equations and inequalities graphically. Explain why the x-coordinates of the points where the graphs of the equations y = f(x) and y = g(x) intersect are the solutions of the equation f(x) = g(x); find the solutions approximately, e.g., using technology to graph the functions, make tables of values, or find successive approximations. Include cases where f(x) and/or g(x) are linear, polynomial, rational, absolute value, exponential, and logarithmic functions.

A-REI.6.	Solve systems of equations. Solve systems of linear equations exactly and approximately (e.g., with graphs), focusing on pairs of linear equations in two variables.
N-Q.1.	Reason quantitatively and use units to solve problems. 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.
S-MD.7.	Use probability to evaluate outcomes of decisions. Analyze decisions and strategies using probability concepts.
S-CP.2.	Understand independence and conditional probability and use them to interpret data. Understand that two events A and B are independent if the probability of A and B occurring together is the product of their probabilities, and use this characterization to determine if they are independent.
S-CP.8.	Use the rules of probability to compute probabilities of compound events in a uniform probability model. Apply the general Multiplication Rule in a uniform probability model, P(A and B) = [P(A)]x[P(B|A)] =[P(B)]x[P(A|B)], and interpret the answer in terms of the model.
S-CP.9.	Use the rules of probability to compute probabilities of compound events in a uniform probability model. Use permutations and combinations to compute probabilities of compound events and solve problems.
S-IC.2.	Understand and evaluate random processes underlying statistical experiments. Decide if a specified model is consistent with results from a given data-generating process, e.g., using simulation.
S-MD.6.	Use probability to evaluate outcomes of decisions. Use probabilities to make fair decisions.

SCOPE AND SEQUENCE		
UNIT OUTLINE	STANDARD#	OUTCOMES OBJECTIVES/STUDENT
Personal Financial Planning Income Budgeting and Wise Spending	S-ID.6(b)	TSW: Apply the basics of personal finance to real-world situations
Banking		Making wise consumer banking decisions
Paying Taxes	A-SSE.3(c) F-LE.1(a) F-IF.8(b) F-LE.1(c)	Understand the rules and
The Imporatnce of Insurance		
Long Term Investing	A-SSE.3(c) F-IF.8(b) F-LE.1(a)	Planning for retirement and personal wealth, calculating return on various forms of investments
Buying a House		Distinguish between various

Consumer Loans	S-ID.5.	forms of debt and credit and analyze each
Consumer Credit		
Consumer Debt	A-SSE.3(c)	
Economic Principles	A-CED.2. F-IF.4. A-REI.11.	Understanding econcomics from a global and small business standpoint
Traveling Abroad		
Starting a Business	A-SSE.3(c) F-IF.8(b) F-LE.1(a) F-LE.1(c) A-REI.11. A-REI.6.	Understanding the principles of business ownership and financial obligations of business ownership including breakeven analysis
Analyzing Business Data	N-Q.1.	Analyzing data to meet business needs. Reading and interpreting data in various formats. Calculating measures of central tendency.
	S-MD.7.	
	S-CP.2.	
	S-CP.8.	
	S-CP.9.	
	S-IC.2.	
	S-MD.6.	