Vermont Grade Level Expectations & Essential Skills Math Software

This document outlines the correlations between the Grade 1 Vermont Grade Level Expectations and the Essential Skills math programs. The specific curriculum outcomes are noted on the left and are matched with the relevant Essential Skills program on the right. Where correlations are not exact, the difference is noted in brackets. **Essential Skills programs correlate with 93% of the Grade 1 Vermont Grade Level Expectations.**

Vermont Grade Level Expectations	Essential Skills Software CORRELATING PROGRAMS
Standard 7.6: Arithmetic, Number, and Operation Concepts	
M1: 1 - Demonstrates conceptual understanding of rational numbers with respect to whole numbers from 0 to 100 using place value (a grouping system wherein a digit's place in a number denotes its value; e.g., in 34, 3 represents 3 tens, or 30); by applying the concepts of equivalency in composing or decomposing numbers (e.g., 12 = 7 + 5); and in expanded notation (e.g., 41 = 4 tens + 1 one or 41 = 40 + 1) using models, explanations, or other representations. Shows correct sequence of ordinal and cardinal numbers and compares cardinal numbers and positive fractional numbers (benchmark fractions: a/2, a/3, or a/4 where a is a whole number greater than 0 and less than or equal to the denominator) as part/whole relationships of benchmark fractions with models, diagrams, or written or verbal/scribed response.	**Mastering Numeration 1** **Mastering Numeration 2** (ordinals & fractions)
M1: 2 - Demonstrates understanding of the relative magnitude of numbers from 0 to 100 by ordering whole numbers; by comparing whole numbers to each other or to benchmark numbers (10, 25, 50); by showing the relationship between whole numbers (1 more, 1 less; 10 more, 10 less); or by connecting number words and numerals to the quantities they represent using models, representations, or number lines.	**Mastering Numeration 1**
M1: 3 - Demonstrates conceptual understanding of mathematical operations involving addition and subtraction by solving problems involving situations in which one adds to, takes from, puts together, and takes apart, or adds.	**Mastering Numeration 1**

Vermont Grade Level Expectations	Essential Skills Software CORRELATING PROGRAMS
M1: 4 - Accurately solves problems in and out of context involving addition and subtraction using whole numbers.	**Mastering Numeration 1**
M1: 5 - Demonstrates understanding of monetary value of coins and adds coins together to a value no greater than $1.00.	**Mastering Numeration 1** **Measurement 1**
M1: 6 - Mentally adds and subtracts whole-number facts through ten with accuracy.	**Mastering Numeration 1**
M1: 7 - Estimates and evaluates the reasonableness of solutions appropriate to grade level.	
M1: 8 - Applies properties of numbers (odd, even, composition/decomposition [5 is the same as 2 + 3]) and operations (commutative, identity) to solve problems and to simplify computations involving whole numbers.	**Mastering Numeration 1**
Standard 7.7: Geometry and Measurement Concepts	
M1: 9 Uses attributes, composition, or decomposition to sort or classify polygons (triangles, squares, rectangles, rhombi, trapezoids, and hexagons) or objects by a combination of two nonmeasurable or measurable attributes. Recognizes and names polygons and circles in their environment.	**Patterning, Geometry & Data Management 1**
M1: 11 - Identifies objects in the environment given an example of a three-dimensional shape (e.g., show a wooden cylinder and students identify common objects of the same shape).	
M1: 15 - Selects an appropriate tool with which to measure length, temperature, weight, and volume, and uses nonstandard units for linear measurement and weight.	**Measurement 1** **Measurement 2**
M1: 16 - Determines elapsed and accrued time as it relates to the patterns of days of the week, yesterday, today, tomorrow and tells time to the half hour.	**Measurement 1**
M1: 18 - Find and name locations with simple relationships (i.e., near, far, above, below, next to, up, down, right, left).	**Patterning, Geometry & Data Management 1**
Standard 7.8: Functions and Algebra Concepts	

Vermont Grade Level Expectations	Essential Skills Software CORRELATING PROGRAMS
M1: 19 - Identifies and extends to specific cases a variety of patterns including sequences of shapes, sounds, movement, colors, letters, and numbers by extending the pattern to the next one, two, or three elements.	**Patterning, Geometry & Data Management 1**
M1: 20 - Demonstrates a conceptual understanding of linear relationships (y = kx) as a constant rate of change qualitatively (growth—student growing taller) and quantitatively (measurable growth—2 inches each year).	
M1: 22 - Demonstrates conceptual understanding of equality by showing equivalence between two expressions (4+1=5; 2+3=5) by solving one-step equations involving whole number addition or subtraction using models, verbal explanations, or written equations.	**Mastering Numeration 1**
Standard 7.9: Data, Statistics, and Probability Concepts	
M1: 23 - Interprets a given representation (models, tally charts, pictographs with one-to-one correspondence, and tables) through written or verbal/scribed response to answer questions related to the data, or to analyze the data to formulate conclusions.	**Patterning, Geometry & Data Management 1**
M1: 24 - Analyzes patterns, trends, or distributions in data in a variety of contexts using “more,” “less,” or “equal.”	
M1: 25 - Organizes and displays data using diagrams, models, or tally charts through written or verbal/scribed response to answer questions related to the data, to analyze the data to formulate conclusions.	
M1: 27 - For a probability event in which the sample space may or may not contain equally likely outcomes, uses experimental probability to describe the likelihood or chance of an event (using “more likely,” “less likely”).	
M1: 28 - In response to a teacher - or student-generated question or hypothesis, collects appropriate data to answer the question or hypothesis being tested through written or verbal/scribed response.	
Standard 2.5: Mathematical Dimensions, Standard 7.10: Mathematical Problem Solving and Reasoning—Applications	

Vermont Grade Level Expectations	Essential Skills Software CORRELATING PROGRAMS
Theoretical Problem Solving and Reasoning techniques are addressed throughout ESS programs.	