Correlation of PLATO® Course to Idaho Achievement Standards (IAS)

Mathematics

April 21, 2006

Introduction

PLATO Learning Inc. combines PLATO computer-assisted instruction into a flexible integrated learning system to enhance instructional effectiveness in education programs. This document identifies PLATO® Algebra 1 Course's instructional activities that correlate to the Idaho Achievement Standards , Mathematics. URL: http://www.sde.state.id.us/dept/standards.asp.

If PLATO Courses are not available for the specific learning expectation, the PWLN Management Tool can incorporate district supplemental materials and websites to address the objective.

The following PLATO® Course was used in this correlation report:

PLATO® Course Algebra 1, Semester A
PLATO® Course Algebra 1, Semester B

PLATO Learning, Inc. looks forward to supporting your initiatives in providing successful educational programs using PLATO® computer-based lessons.

PLATO LEARNING

ID PLATO Course Algebra I

Grade 09

Standard 3: Concepts and Language of Algebra and Functions

Goal 3.1: Use algebraic symbolism as a tool to represent mathematical relationships.

9.M.3.1.1 Represent mathematical relationships using variables, expressions, linear equations and inequalities. (350.01.a)

PLATO® Course Algebra 1, Semester A
Unit 1- Rational Numbers, Exponents, and Square Roots
Using Basic Number Ideas (Alg 1.1)

Unit 2 - Percents and Expressions
Expressions in 1 Variable (Alg 1.1)
Expressions in 2 or More Variables (Alg 1.1)

Unit 3 - Linear and Quadratic Equations
Literal Equations (Alg 1.1)
Using Linear Equations to Solve Problems (Alg 1.1)

PLATO® Course Algebra 1, Semester B
Unit 3 - Linear Equations, Linear Inequalities, and Quadratics
Solving Problems with Linear Equations in 1 Variable (Alg 1.2)

Goal 3.2: Evaluate algebraic expressions.

9.M.3.2.1 Use appropriate procedures for manipulating and simplifying algebraic expressions involving variables, integers, and rational numbers. (350.02.a)

PLATO® Course Algebra 1, Semester A
Unit 2 - Percents and Expressions
Expressions in 1 Variable (Alg 1.1)
Adding Monomials (Alg 1.1)
Subtracting Monomials (Alg 1.1)
Adding Binomials and Monomials (Alg 1.1)
Subtracting Binomials and Monomials (Alg 1.1)

PLATO® Course Algebra 1, Semester B
Unit 2 - Polynomials and Factoring
Polynomial Sum (Alg 1.2)
Polynomial Difference (Alg 1.2)
Simplifying Polynomial Expressions (Alg 1.2)

Goal 3.3: Solve algebraic equations and inequalities.

9.M.3.3.1 Use appropriate procedures to solve multi-step, first-degree equations and inequalities; such as 3(2x – 5) = 5x + 7 or 3(2x – 5) > 5x + 7. (350.03.a)

PLATO® Course Algebra 1, Semester B
Unit 3 - Linear Equations, Linear Inequalities, and Quadratics
More Difficult Linear Equations in 1 Variable (Alg 1.2)
Linear Inequalities in 1 Variable, Part 3 (Alg 1.2)
Review: Equations and Inequalities (Alg 1.2)

9.M.3.3.2 Differentiate between linear and non-linear equations and graphs.

PLATO® Course Algebra 1, Semester A
Unit 4 - Linear Relations, Systems, Functions, and Special Topics
Linear Patterns (Alg 1.1)

Goal 3.4: Solve simple linear systems of equations.

9.M.3.4.1 Use appropriate procedures to solve linear systems of equations involving two variables; such as x + y = 7 and 2x + 3y = 21. (350.04.a)

PLATO® Course Algebra 1, Semester B
Unit 3 - Linear Equations, Linear Inequalities, and Quadratics
Solving Linear Systems Using Substitution
Solving Linear Systems Using Linear Combinations

Goal 3.5: Understand the concept of functions.

9.M.3.5.1 Given graphs, charts, ordered pairs, mappings, or equations, determine whether a relation is a function.

PLATO® Course Algebra 1, Semester A
Unit 4 - Linear Relations, Systems, Functions, and Special Topics
Functions (Alg 1.1)
Determining Whether a Relation is a Function
Describing Functions with Equations, Tables, and Graphs (Alg 1.1)

9.M.3.5.2 Evaluate functions written in functional notation.

PLATO Courses are not available for this learning expectation.

9.M.3.5.3 Given a function, identify domain and range.

PLATO® Course Algebra 1, Semester A
Unit 4 - Linear Relations, Systems, Functions, and Special Topics
Finding the Domain and Range of a Function

Goal 3.6: Apply functions to a variety of problems.

9.M.3.6.1 Model and solve real-world phenomena using multi-step, first degree, single variable equations and inequalities, linear equations, and two-variable linear systems of equations. (353.01.a)

PLATO® Course Algebra 1, Semester A
Unit 3 - Linear and Quadratic Equations
Literal Equations (Alg 1.1)
Using Linear Equations to Solve Problems (Alg 1.1)
Interpreting Graphs to Solve Problems (Alg 1.1)

PLATO® Course Algebra 1, Semester B
Unit 3 - Linear Equations, Linear Inequalities, and Quadratics
More Difficult Linear Equations in 1 Variable (Alg 1.2)
Solving Problems with Linear Equations in 1 Variable (Alg 1.2)
Review: Equations and Inequalities (Alg 1.2)

9.M.3.6.2 Use graphs and sequences to represent and solve problems. (347.02.b)

PLATO® Course Algebra 1, Semester A
Unit 4 - Linear Relations, Systems, Functions, and Special Topics
Solving Systems of Linear Inequalities by Graphing
Patterns and Sequences (Alg 1.1)