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Career Choice and Salary Modeled with Stella

Samuel Simpson
The College at Brockport

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Name: Samuel Simpson

Grade level(s)/Subject taught: Math 7th

Objectives: Students will select a career choice and corresponding starting salary. To develop an understanding of numbers in the real world and demonstrate the concept of percent, addition, subtraction, multiplication, and division of whole numbers to complete a W2 and a 1040EZ form.

Mathematical Concept: Mathematical Reasoning – Number and Numeration 1. Students use mathematical reasoning to analyze mathematical situations, make conjectures, gather evidence, and construct an argument. Students: use models, facts, and relationships to draw conclusions about mathematics and explain their thinking. 2. Students use number sense and numeration to develop an understanding of the multiple uses of numbers in the real world, the use of numbers to communicate mathematically, and the use of numbers in the development of mathematical ideas. Students: demonstrate the concept of percent through problems related to actual situations. Operations – Modeling/Multiple Representation 3. Students use mathematical operations and relationships among them to understand mathematics. Students: add, subtract, multiply, and divide whole numbers.

Lesson Overview: Students select a career and starting salary. Based on their choice students calculate percents, by completing a W2. With the completed W2 they complete a 1040EZ modeled in excel. A future application is to that this lesson and model it in stella.

What Students will:

Know: What the starting salary is for a career of their choosing.

Understand: The relationship between starting salary and a variety of withholdings on their W2.

Be able to do: File a 1040 EZ.

Activating Learning Strategies: (Learners mentally activity): Present a 1040EZ form and instruction booklet (included) and inquire they knowledge about taxes. Allow students to read tables and charts to determine the starting salaries of a variety of careers.

Cognitive Teaching Strategies: (Distributed guided practice &/or Distributed

summarizing in pairs; graphic organizers; etc.)

- Limited lecture
- Students work alone and/or in pairs

Launch:

Students will select a career and determine the starting salary. Based on the starting salary students complete the W2 handout, which will require them to determine percents of the starting salary.

The W2 Handout will require students to:

- Wages, tips, other compensation (starting salary)
- Federal Income Tax Withheld (16% of starting salary)
- Social Security Wages (same as 1)
- Social Security Tax Withheld (6.5% of starting salary)
- Medicare Wages and Tips (same as 1)
- Nonqualified Plans (4% of starting salary)
- Other Health (5% of starting salary)
- State Wages, Tips, etc. (same as 1)
- State Income Tax (3% of starting salary)

Students can confirm their answers by unhiding columns in the excel spread sheet.

The answers are used to complete a W2. This data and information from a rate table in the 1040 ez is used to model the 1040ez form modeled in excel.

Summarizing Strategies:

1. What is the tax based on your adjusted gross income?
2. Complete 1040 EZ worksheet.

Material: Excel, calculators, Income Various Careers handout, What a Degree is Worth handout, W2 and W2 Worksheet, 1040 EZ form and Instructions.

Name: _____

Date: _____

W2 - Worksheet:

A. Select a career and the corresponding starting salary from the “Income Various Careers” handout.

a. Career: _____

b. Starting Salary: _____

B. Complete the W2. Complete the following categories on the W2:

General Information:

c. Employers name , address, and ZIP Code (Identify an employer and address for the career you selected)

d. Your social security number (Make up a 9-digit number)

e. Your name, address, and ZIP Code

Financial Information:

1 Wages, tips, other compensation (starting salary) \$ _____

2 Federal Income Tax Withheld (16% of starting salary) \$ _____

3 Social Security Wages (same as 1) \$ _____

4 Social Security Tax Withheld (6.5% of starting salary) \$ _____

5 Medicare Wages and Tips (same as 1) \$ _____

11 Nonqualified Plans (4% of starting salary) \$ _____

14 Other Health (5% of starting salary) \$ _____

14 State Wages, Tips, etc. (same as 1) \$ _____

17 State Income Tax (3% of starting salary) \$ _____

Name: _____

Date: _____

1040EZ

Complete the 1040ez as outlined in the excel file 1040ez and answer the following question.

1. What is your tax (line 10), based on your *adjusted gross income*?
2. Do you owe money or will you receive a refund?
3. Name an item that can increase your refund?
4. If you are married and your household income is the same will your tax rate will be Higher or lower?
5. Would unemployment compensation increase or decrease your refund.
6. If you owe taxes what can you do to reduce the taxes that are due?