Name _____ Class: _____ Date: _____

Teach to ONE

(TDP) (Wage Inequality) (RUBRIC)

Skill Focus: I will know how ratios work and express ratios in different forms using ratio language. I will determine percents from ratios.

		Review Rubric: **Wage Inequality**	
Level	**Mathematical Precision**	**Evidence and Reasoning**	**Communication**
Above & Beyond You show extra effort. You show excellent understanding and go beyond the standards.	I correctly found ratios and percents from ratios. I correctly answered all questions.	I gave accurate, clear, highly-detailed explanations using math language for all problems. I showed all of my work neatly and my explanations are clear.	I shared my plan to combat wage inequality clearly and with enthusiasm. I led a discussion about the task skills.
At the Top It looks like you put effort into this. You show clear understanding and meet the standards.	I mostly correctly found ratios and percents from ratios. I answered all questions mostly correctly.	I gave accurate, clear, detailed explanations for all problems. I showed all of my work.	I shared my plan to combat wage inequality clearly. I participated well in a discussion about the task skills.
On My Way It looks like you tried. It looks like your understanding isn't clear.	I attempted to find ratios and percents from ratios. I tried to answer all questions, but struggled to do so accurately.	My explanations were sometimes accurate, but they often lacked clarity or detail. I did not always show all my work.	I had some trouble sharing plan to combat wage inequality. I participated somewhat in a discussion about the task skills.
Not Yet It doesn't look like you tried very much. It looks like you don't really understand.	I did not find ratios or percents from ratios. I did not respond to the questions correctly.	My explanations were incomplete and inaccurate. They lacked clarity and detail. I did not show my work.	I did not share my plan to combat wage inequality clearly and effectively. I did not participate in a discussion about the task skills.

Teacher Comments:

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TDP   Wage Inequality   Math Write-Up

Your job is to use 2 or 3 of the following information pages and come up with a possible solution for addressing wage inequality. You can chose from the following list of solutions or come up with your own.

☐ Increase funding for scholarships and apprenticeship programs so people have more access to training and education
☐ Rework tax system so the wealthy are taxed at a higher percentage than the non-wealthy
☐ Increase restrictions on companies to limit wages for executives
☐ Increase the minimum wage so that all workers start at a higher pay
☐ Implement affirmative action policies to balance the challenges faced by disadvantaged groups
☐ A combination of solutions

Make sure your solution includes the following:

o Who benefits from your possible solution
o How the plan benefits these people
o Both ratios and percentages from the given information pages you've completed that supports your thinking

Use the following space and any additional paper to write notes that you will use to present your plan.

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Look at the bi-weekly paychecks of a cashier at a supermarket and the CEO of the supermarket chain. Use the information to answer the questions below.

Fresh Food Grocery	Check # 1234
	Date: May 5,20XX
Pay to the order of Ima Cashier	$ 890.00
eight hundred ninety	dollars
Memo 2 week paycheck	Signature

Employee Name: Ima Cashier   **Employee# 4891**
                             Date: May 5, 20XX

Total Gross Pay: $890.00

Payroll taxes:
     Social Security tax   55.18
     Medicare tax   12.91

Other taxes:
     Federal income tax   133.50
     State income tax   35.60
            Total Taxes: 237.19

Total Net Pay (after taxes): $652.81

Fresh Food Grocery	Check # 1235
	Date: May 5,20XX
Pay to the order of Ida CEO	$ 4,050.00
four thousand fifty	dollars
Memo 2 week paycheck	Signature

Employee Name: Ida CEO   **Employee# 1256**
                             Date: May 5, 20XX

Total Gross Pay: $4,050.00

Payroll taxes:
     Social Security tax   251.10
     Medicare tax   50.63

Other taxes:
     Federal income tax   1,134.00
     State income tax   327.21
            Total Taxes: 1,762.94

Total Net Pay (after taxes): $2287.06

Write a ratio in all three ways that compares the cashier's total net pay to the CEO's total net pay.

With a colon	As a fraction	In a sentence

Write the ratios and percentages that compare payroll deductions to total pay for both the cashier and the CEO.

	Federal Income Tax to Gross Pay		Total Taxes to Gross Pay		Net Pay to Gross Pay	
	ratio	percentage	ratio	percentage	ratio	percentage
Cashier						
	ratio	percentage	ratio	percentage	ratio	percentage
CEO						

Commented [MK4]: ANSWERS:
652.81:2287.06, 652.81/2287.06, 652.81 to 2287.06

Fed Income tax to Gross Pay
Cashier: 133.50/890, 15%
CEO: 1134/4050, 28%

Total Taxes to Gross Pay
Cashier: 237.19/890, ≈27%
CEO: 1762.94/4050, ≈44%

Net Pay to Gross Pay
Cashier: 652.81/890, ≈73%
CEO: 2287.06/4050, ≈56%

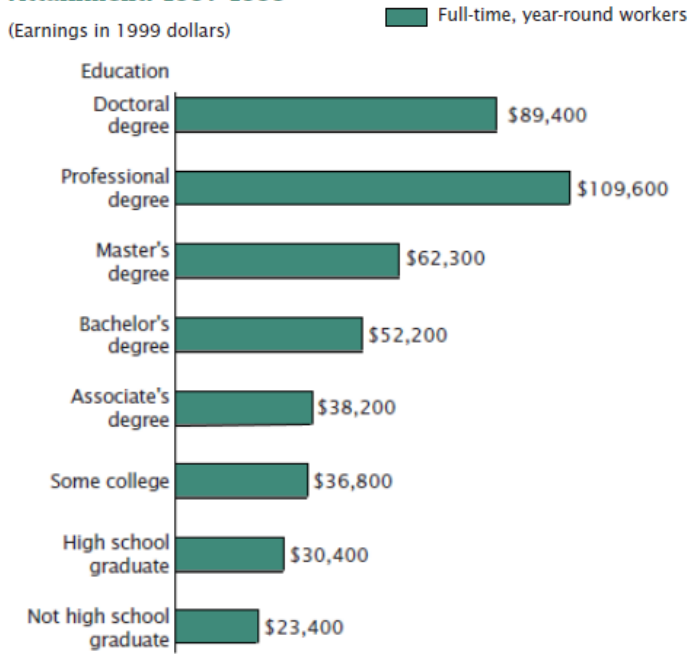Name _____ Class: _____ Date: _____

Teach to ONE

(TDP) (Wage Inequality) (Math Write-Up)

Use the data about income and education below to make comparisons.

Work Experience and Average Annual Earnings of Workers 25 to 64 Years Old by Educational Attainment: 1997-1999

(Earnings in 1999 dollars)

■ Full-time, year-round workers

Education

Education	Earnings
Doctoral degree	$89,400
Professional degree	$109,600
Master's degree	$62,300
Bachelor's degree	$52,200
Associate's degree	$38,200
Some college	$36,800
High school graduate	$30,400
Not high school graduate	$23,400

Source: U.S. Census Bureau, Current Population Surveys, March 1998, 1999, and 2000.

Pick 2 different educational levels. Compare those two salaries and write the ratio three different ways.

With a colon
level 1 _____
level 2 _____

:

As a fraction
level 1 _____
level 2 _____

_____

With "to"
level 1 _____
level 2 _____

_____
_____

Compare the average annual earnings of a high school graduate to multiple other education levels. Express your comparison as a ratio and as a percentage.

High school Graduate compared to:
level _____

Ratio	percentage

High school Graduate compared to:
level _____

Ratio	percentage

High school Graduate compared to:
level _____

Ratio	percentage

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Teach to ONE

TDP | Wage Inequality | Math Write-Up

The graph below shows how much women make for every dollar a man makes in different occupational fields.

Pay Disparity

Average weekly earnings for full-time female workers as a comparison to $1.00 of male earnings in the same occupation

Occupation	Amount
Construction	$0.91
Food preparation	$0.90
Registered nurses	$0.90
Arts, entertainment, sports and media	$0.85
All full-time workers	$0.83
Education, training and library	$0.79
Retail salespersons	$0.70
Chief executives	$0.70
Legal	$0.57

Source: Labor Department | WSJ.com

Write a ratio that compares women's wages to men's wages in different fields.

Field _____ Ratio with a colon	Field _____ Ratio as a fraction	Field _____ Ratio with to	Field _____ Ratio as your choice
:	_____	_____ _____	

Across all fields, women make an average of $0.83 to every $1.00 that men make. Show the ratio and calculate the percentage of what women make in relation to men in different fields to this amount (**$0.83**).

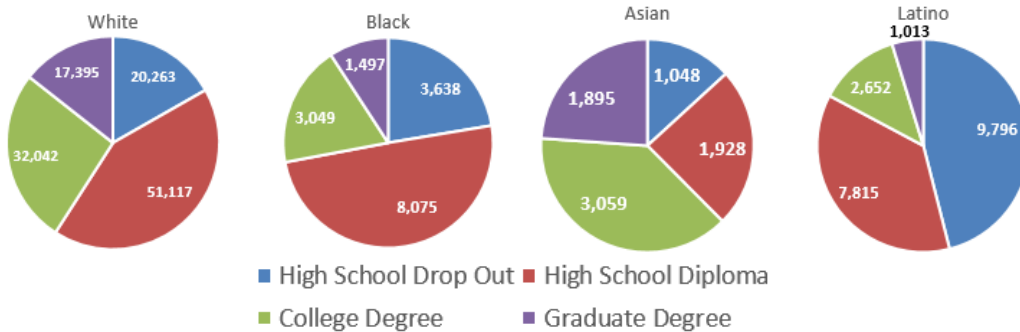| Field _____ Ratio Percentage	Field _____ Ratio Percentage
Field _____ Ratio Percentage	Field _____ Ratio Percentage

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Teach to ONE

TDP   **Wage Inequality**   **Math Write-Up**

The graphs below compare educational attainment of people of various ethnic groups in the United States over the age of 18 (all numbers are in thousands).

White
17,395 20,263
32,042
51,117

Black
1,497 3,638
3,049
8,075

Asian
1,048
1,895
1,928
3,059

Latino
1,013
2,652
9,796
7,815

■ High School Drop Out ■ High School Diploma
■ College Degree ■ Graduate Degree

For each ethnic group, write a part-to-whole ratio that compares the number of college graduates to the total number of people older than 18 in that ethnic group.

White	**Black**
College degree: 32,042 Write the ratio with a colon	College degree: 3,049 Write the ratio as a fraction

Asian	**Latino**
College degree: 3,059 Write the ratio as a sentence	College degree: 2,652 Write the ratio as your choice

Pick one ethnic group. Write ratios and percentages comparing each education level to the total number of people in that ethnic group.

	Ratio	**Percentage**
High School Drop Out	_____	_____
High School Diploma	_____	_____
College Degree	_____	_____
Graduate Degree	_____	_____