

# Problem Specification

Graduated Tax

## 1 PROBLEM DESCRIPTION

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Write code that determines the amount of tax owed according to the following tax brackets

<u>Tax Rate</u>	<u>Income</u>
10%	\$0 to \$20,000
12%	\$20,001 to \$50,000
22%	\$50,001 or more

For example, the lowest possible tax rate of 10 percent is applied to the first \$20,000 of your income. The portion of your income between \$20,001 and \$50,000 is subject to a rate of 12%. The portion of your income above \$50,000 is subject to a 22% tax rate. Here are a few examples of the calculation your code is to perform.

**Example: \$10,768**

If you earned \$10,768 you owe \$1,076.80 in taxes.

Bracket Rate	Amount Earned in that bracket	Tax owed
10%	\$10,768	\$1,076.80
	<b>Total Tax Owed</b>	\$1,076.80

**Example: \$38,050**

If you earned \$38,050 you owe \$4,166 in taxes.

Bracket Rate	Amount Earned in that bracket	Tax owed
10%	\$20,000	\$2,000
12%	\$38,050-\$20,000=\$18,050	\$2,166
	<b>Total Tax Owed</b>	\$4,166

**Example: \$113,247**

If you earned \$113,247 you owe \$19,514.34 in taxes.

Bracket Rate	Amount Earned in that bracket	Tax owed
10%	\$20,000	\$2,000
12%	\$50,000-\$20,000=\$30,000	\$3,600
22%	\$113,247-\$50,000=\$63,247	\$13,914.34
	<b>Total Tax Owed</b>	\$19,514.34

## 2 INPUT DESCRIPTION

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The user shall input an integer income value in the console. Include an appropriate prompt for the user.

## 3 OUTPUT DESCRIPTION

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Your code shall print a line of text such as:

*You made \$38,050. You owe \$4,166 in taxes.*

Replace the monetary values as appropriate to your unique test cases.

## 4 WHAT TO TURN IN

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- Your code
- Documented test cases