

Assignment 4  
Show all your work

Name: \_\_\_\_\_  
Number: \_\_\_\_\_  
Signature: \_\_\_\_\_  
Score: \_\_\_\_/10

**Problem 1:** Answer each question to two decimal place accuracy when appropriate. Write out steps for each.

a. Convert the fraction *three quarters* into a percent.

b. Find 125 % of 80.

c. What fraction of 350 is 280? Simplify to lowest terms.

d. 12 is 6 % of what number?

e. When you pay a 35-dollar monthly cellphone/data package, how much in taxes do you need to pay? Hint: We have a 5 % GST and 7 % PST.

f. The following is a quote from *Entertainment Software Association of Canada*.

In 2021, the global industry will generate over US\$176 billion in revenue, a 21% increase from 2019. The Canadian video game industry has followed a similar trajectory over the same period. In 2021, the industry generated an estimated US\$3.4 billion in revenue, having grown by 20% since 2019.

What was the revenue in the Canadian video game industry from 2019?

Score: \_\_\_\_/6

**Problem 2:** Brian’s grandmother invests \$50 000 at a rate of 4.55 % compounded monthly. Find the time in years that it takes her investment to double.

Score: \_\_\_\_/2

**Problem 3:** David needs to decide which of the following two investment options is better: an annual interest rate of 4.35 % compounded daily or an annual interest rate of 4.4 % compounded semi-annually. Show all calculation which leads to your conclusion.

Score: \_\_\_\_/2