MAT 0012C
Practice for Exam Chapter 8(v3)

Name: $\qquad$
Date:
Section:

1. Fill in the following chart:

Write your answers in simplest form.
(round your answers to the nearest hundredth)

| Fraction | Decimal | Percent |
| :--- | :--- | :--- |
| $7 / 16$ |  |  |
|  | 0.384 |  |
|  |  | $24 \%$ |
|  | 2.68 |  |

2. Solve each equation:
a) $58 \%$ of 32 is what number? $\qquad$
b) 17 is what percent of 68?
c) 2.5 is $75 \%$ of what number?
d) 15 is $150 \%$ of what number?
3. Sixty five students are in math class today. If one hundred fifty students are enrolled in the class, what percentage of the students are in class today?
4. A real estate agent receives a commission of $3 \%$ on the sale of each house. How much commission will the agent receive if a house sells for \$300,000?
5. The enrollment at a community college increased by $26 \%$. The enrollment was 3500 students after the increase. Find the starting enrollment at the community college. (Round your answer to the nearest student.)
6. A jacket that sold for $\$ 150.00$ is on sale for $\$ 85.00$. What is the percent decrease in price?
7. The bill at a restaurant is $\$ 36.59$. If a $6.5 \%$ sales tax is added, what is the total bill?
8. If $28 \%$ of Jack's salary is withheld for taxes and retirement, how much is withheld from a salary check of $\$ 950.00$ ?
9. If you invest $\$ 9500.00$ in a retirement account that earns $14 \%$ interest (APR) compounded daily (4 pts each)
a) what is the value of the account after 20 years?
b) what is the total amount of interest earned?
10. Sam wants to purchase a car for $\$ 28,500$. If he puts a $30 \%$ down payment on the car, how much money does he have to borrow from the bank?

## BONUS PROBLEM 2 points per part

The purchase price of a house is $\$ 180,500$.
a) If the buyer puts a $10 \%$ down payment on the house, how much money is that down payment?
b) What is the mortgage (amount borrowed)?
c) If a loan is taken out on that property for 30 years at $9 \%$ interest (APR), what is the minimum principal and interest house payment?
d) How much will the purchasers have paid the bank for that house after 30 years?

