## General Algebra II Worksheet \#9 Unit 12 page 1

Solve the following problems. Show your process neatly organized. Round your answers to the nearest tenth of a year.

1. $\$ 1000$ is invested in an account that pays interest at an annual rate of $\mathbf{6 \%}$ compounded monthly. How long will it take for the value of the account to double?
2. $\$ 700$ is invested in an account that pays interest at an annual rate of $\mathbf{4 \%}$ compounded daily. How long will it take for the value of the account to double?
3. $\$ 600$ is invested in an account that pays interest at an annual rate of $\mathbf{7 \%}$ compounded continuously. How long will it take for the value of the account to double?

## General Algebra II Worksheet \#9 Unit 12 page 2

Solve the following problems. Show your process neatly organized. Round your answers to the nearest tenth of a year.
4. $\$ 800$ is invested in an account that pays interest at an annual rate of $5 \%$ compounded monthly. How long will it take for the value of the account to reach $\$ 2000$ ?
5. $\$ 600$ is invested in an account that pays interest at an annual rate of $\mathbf{7 \%}$ compounded quarterly. How long will it take for the value of the account to reach $\mathbf{\$ 2 0 0 0}$ ?
6. $\$ 1000$ is invested in an account that pays interest at an annual rate of $\mathbf{2 . 5 \%}$ compounded continuously. How long will it take for the value of the account to reach $\$ 2500$ ?

## General Algebra II Worksheet \#9 Unit 12 page 3

Solve the following problems. Show your process neatly organized. Round your answers to the nearest tenth of a year.
7. Money is invested in an account that pays interest at an annual rate of $6 \%$ compounded monthly. How long will it take for the value of the account to double?
8. Money is invested in an account that pays interest at an annual rate of $4 \%$ compounded daily. How long will it take for the value of the account to double?
9. Money is invested in an account that pays interest at an annual rate of 5\% compounded continuously. How long will it take for the value of the account to double?

