## Exam 3 Review <br> CARA STEPHENS

## Externalities

CHAPTER 5
HOMEWORK 14

## Terms

- Externality
- Negative externality
- Possible solutions
- Positive externality
- Free Rider


## Major Events/Stories/Videos

- River of Waste-Eastern Oklahoma
- Bridesmaids
- Cuyahoga River
- Fracking


## General Theory of Prices

CHAPTER 6
HOMEWORK 14
HOMEWORK 15
HOMEWORK 16

## Terms

- Opportunity Cost
- Value
- Utilities
- Time
- Form
- Place
- Possession


## Major Events/Stories/Videos

- Fig Prices in Ancient Athens
- Todd Margaret
- Individually wrapped bananas
- Homer's doughnuts
- Ticketmaster


## Equations

- FV = future value
- PV = present value
- $\mathrm{r}=$ interest rate
- $\mathrm{t}=$ time

$$
F V=P V(1+r)^{t}
$$

$$
P V=F V(1+r)^{-t}
$$

## Graphs/Tables

The table below illustrates the rate at which a particular species of tree will grow if allowed to age. Assume that each ton of wood harvested yields a profit of \$0.15 per ton per acre. Also assume that money may be invested safely at an interest rate of $3 \%$, and any money from harvesting trees would be invested at this rate. Fill in the cells in Columns C and D with with the proper numerical value, and then indicate the optimal harvest age for the tree stand. Use two decimal places every where. Hint: allow trees to grow another year so long as that makes more money than harvesting now and investing the money for one year.

| Column A: <br> Age of <br> stand in <br> years | Column B: <br> Tons per Acre <br> harvested <br> from stand | Column C: <br> Accounting Profits if <br> harvested that year | Column D: <br> Accounting profits if <br> harvested last year <br> and invested |
| :--- | :--- | :--- | :--- |
| 28 | 12000 |  |  |
| 29 | 14800 |  |  |
| 30 | 16000 |  |  |
| 31 | 16800 |  |  |
| 32 | 17000 |  |  |

## Supply and Demand

CHAPTER 7
HOMEWORK 17
HOMEWORK 18

## Terms

- Supply curve
- Demand curve
- Equilibrium Price \& Quantity


## Equations

- B is y intercept
- M is the slope (rise over run) $\quad Y=b+m x$
- X and Y are a point on the graph


## Graphs

- Know how to draw a graph by using calculations (if slope is a number like o.oo011)
- Know how to calculate equilibrium price and quantity from equations only
- Know effects if price or quantity are not at equilibrium
- Know how to shift demand and supply curves if given and increase or decrease
- Know how to give me an equation by looking at a graph
- Know what it means if I say "the slope becomes a larger number" also if I say "the intercept becomes a larger number
- Know how to tell me the curve moved if I tell you what the change in equilibrium price and quantity were

