

Economics EOC Overview and Study Guide

The Economics EOC is 20% of your grade, and it is based on the Georgia Standards of Excellence for Economics. The test is divided into 2 parts and takes 1-2 days. The test is a mix of traditional multiple choice questions with one most correct answer and questions that require the student to pick multiple correct answers.

The test is covers 5 domains:

1. Fundamentals of Economics
2. Microeconomics
3. Macroeconomics
4. International Economics
5. Personal Finance

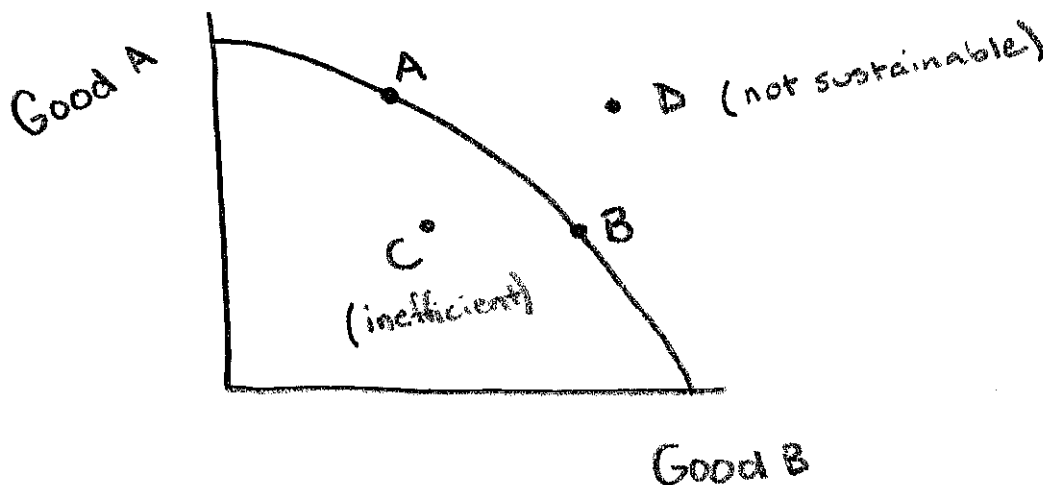
Fundamentals of Economics

- I. **Scarcity** is the basic problem of economics (unlimited needs and wants and limited resources)
 - a. Scarcity forces us to make choices or **trade-offs**. Economics is the study of how we **allocate** or distribute scarce resources to meet wants and needs.
 - i. Possible ways to allocate resources include price system, majority rule, contests, force, sharing, lottery, first come first served, and personal characteristics.
 - b. Our **opportunity cost** is what we give up when we make a choice. It is the loss of next best alternative given up when we make a choice. For example, I must choose between going to a football game and going to see a movie. I choose to go to the football game, so my opportunity cost is not being able to go to the movie.
- II. Rational choices are made by the process of **marginal analysis**. We weigh **marginal benefits** and **marginal costs** when we make choices and we will do something and continue to do it as long as the marginal benefit is greater than the marginal cost until they equal each other.
- III. **Factors of production** are our resources or inputs that we use to create outputs that satisfy our wants and needs.
 - a. **Labor**
 - i. **Human Capital** is skills, education, and health of workers. Investing in this will improve productivity and create economic growth.
 - b. **Capital**
 - c. **Land**
 - d. **Entrepreneurial ability or ideas**
- IV. People and countries use **specialization** according to their **comparative advantage** to increase their productivity and trade to get the goods they cannot or do not produce.
- V. **Three basic questions**
 - a. **What to produce?**
 - b. **How to produce?**
 - c. **For whom to produce?**
- VI. **Broad Social Goals**
 - a. **Economics Efficiency** refers to how well scarce productive resources are allocated to produce the goods and services people want and how well inputs are used in the production process to keep production costs as low as possible.
 - b. **Economic Equity** means what is "fair." Economic actions and policies must be evaluated in terms of what people think is right or wrong. This usually deals with questions of income and wealth.
 - c. **Economic Freedom** refers to things such as the freedom for consumers to decide how to spend and save their incomes, the freedom of workers to change jobs and join unions, and the freedom of individuals to establish new businesses and close old ones.
 - d. **Economics Growth** refers to increasing the production of goods and services over time.
 - e. **Economic Security** refers to protecting consumers, producers, and resource owners from risks that exist in society. Each society must decide from which uncertainties individuals can and should be protected and whether individuals, employers, or the government should pay for this protection.

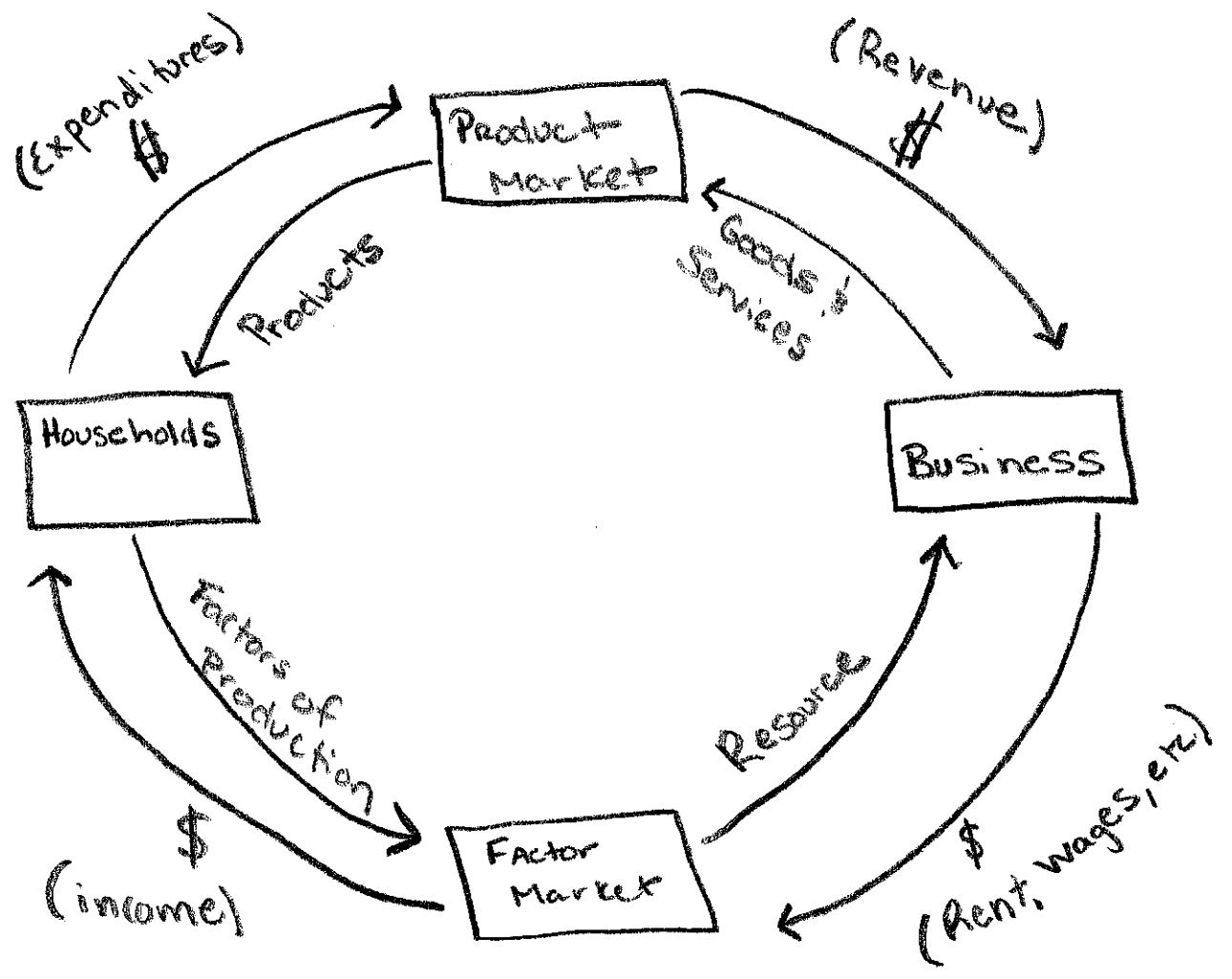
- f. **Economic Stability** means getting smooth and steady growth over time with low unemployment and inflation.
- VII. 4 types of economic systems
- Traditional** answers the three basic questions through established customs that are passed down.
 - Command** uses the government to answer the three basic questions.
 - Market** or **capitalism** allows individuals to answer the three basic questions.
 - Mixed** allows individuals to answer most questions, but the government will answer some.
 - Mixed and market systems are efficient. They involve competition among buyers and sellers to establish prices, voluntary exchange, private property, limited government involvement, and profit motive.
 - Role of government in a market or mixed system
 - To facilitate the market by providing regulations, enforcing contracts, printing money, protect consumers, produce public goods like roads and schools that the private sector cannot provide because it is not profitable, correct market failures, stabilize the economy to reduce unemployment and inflation, provide a safety net such as social security, food stamps, welfare benefits, and unemployment insurance.
 - The more government gets involved the greater inefficiency will be because of increased costs of government regulation and taxes.

VIII. **GRAPHS and DIAGRAMS**

- Production possibilities curve** or **production possibilities frontier** is a graph that shows the possible combinations of two goods that can be produced given the resources available.
 - The curve shifts when the number of resources or productivity of those resources changes.
 - We operate inside the curve when resources are not fully employed, or we are being inefficient with our resources
 - We can operate outside the curve temporarily, but it is not sustainable.
 - We operate on the curve when all resources are fully employed.

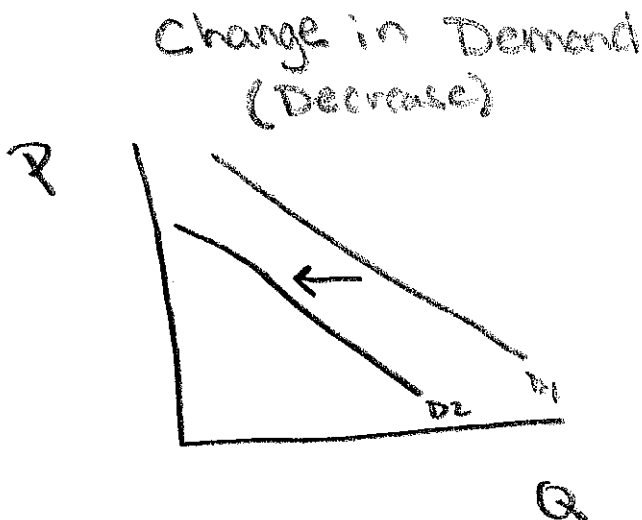
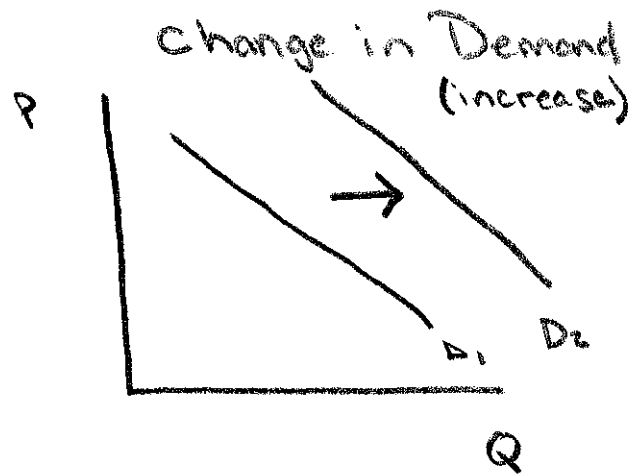
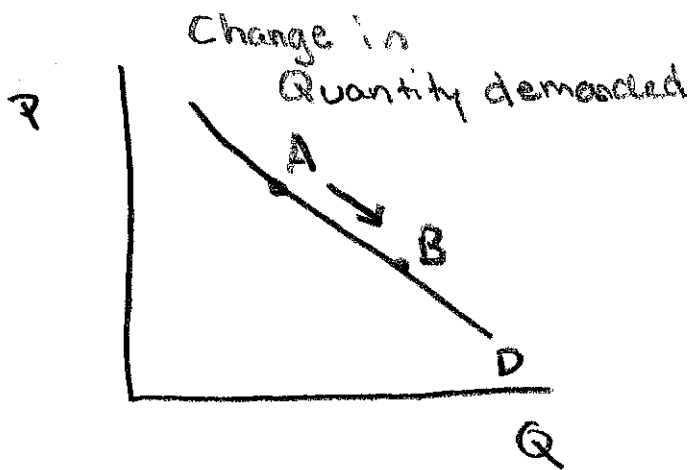


b. Circular Flow Diagram shows the flow of goods, services, resources, and money through an economy.

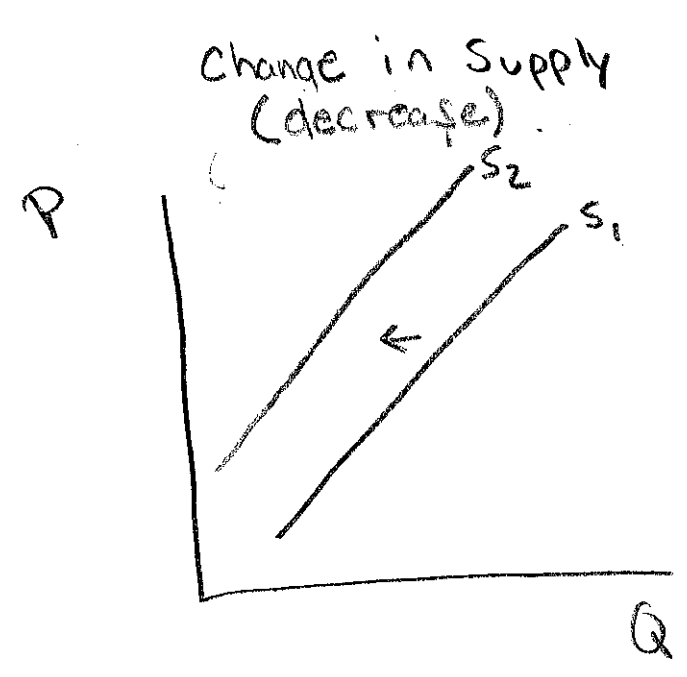
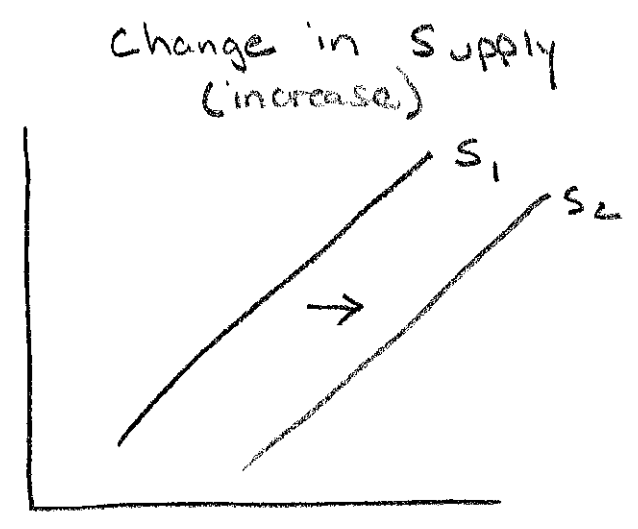
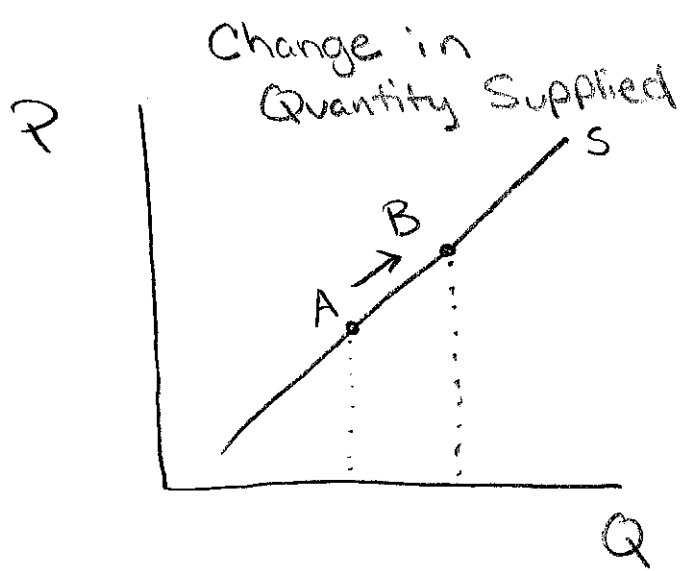


Microeconomics

- I. **Microeconomics** is the study of the behaviors of individuals, firms, and industries in the market place. Micro means small so microeconomics is the small picture.
- II. Prices act as signals to the value of a good or service. Competition among buyers to purchase a good drive the price up, and competition among producers to sell a good drive the price down.
- III. **Demand** is the amount of goods that consumers are willing and able to purchase at every possible price. Series of values.
- IV. **Quantity Demanded** is the amount of a good consumers are willing and able to purchase at a specific price. One specific value.
- V. **Law of Demand** states there is an inverse relationship between price and quantity demanded.
- VI. **Changes in demand** are caused by the following:
 - a. **Number of consumers**
 - b. **Income of consumers**
 - i. **Normal goods** are goods that consumers buy more of when their incomes increase.
 - ii. **Inferior goods** are goods that consumers buy more of when their incomes decrease.
 - c. **Complement price changes**
 - d. **Expectations of consumers about price**
 - e. **Substitute price changes**
 - f. **Tastes of consumers**

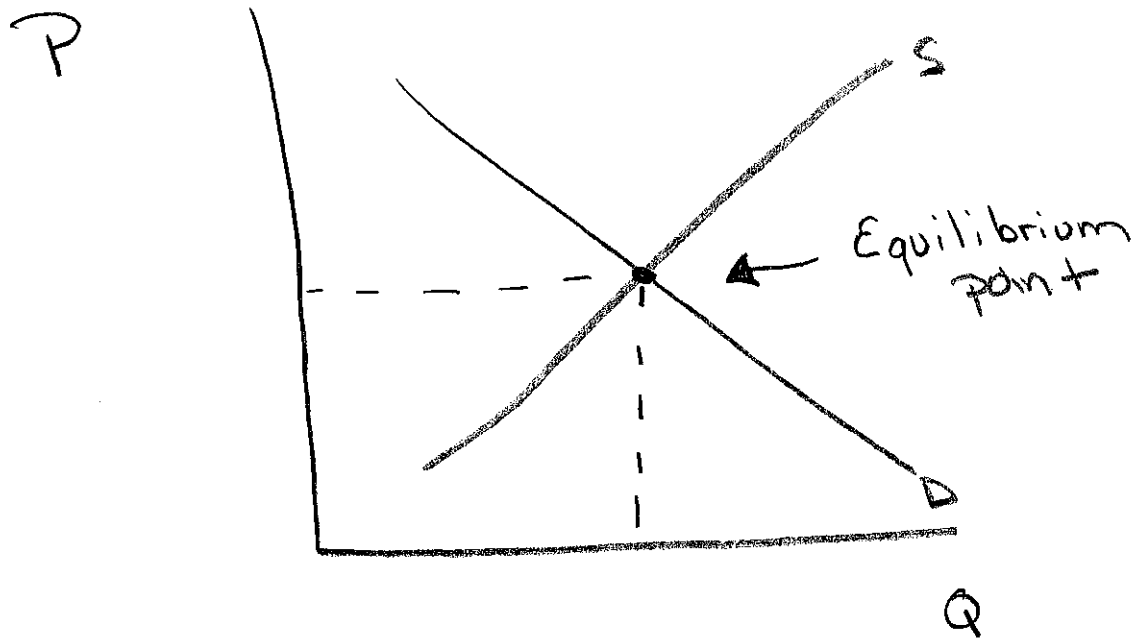


- VII. **Supply** is amount of goods that sellers are willing and able to sell every possible price. Series of values.
- VIII. **Quantity Supplied** is the amount of a good sellers are willing and able to purchase at a specific price. One specific value.
- IX. **Law of Supply** states there is a positive relationship between price and quantity supplied.
- X. **Changes in supply** are caused by the following:
 - a. Resource price changes
 - b. Expectations of sellers about price
 - c. Number of sellers
 - d. Technology changes
 - e. Government action
 - i. Taxes
 - ii. Subsidies
 - iii. Regulations
 - f. Other goods prices

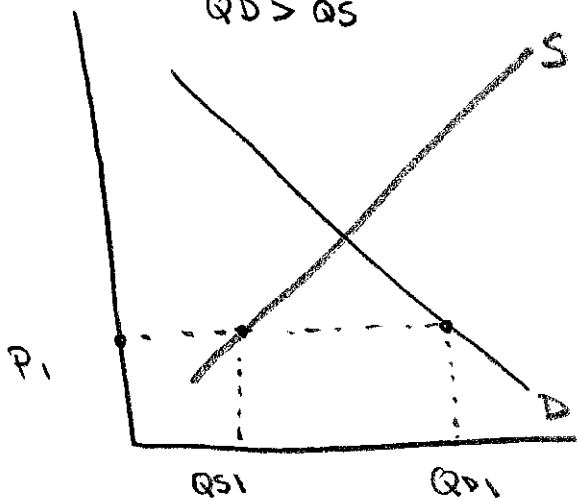


XI. **Equilibrium** is where quantity supplied and quantity demanded equal each other.

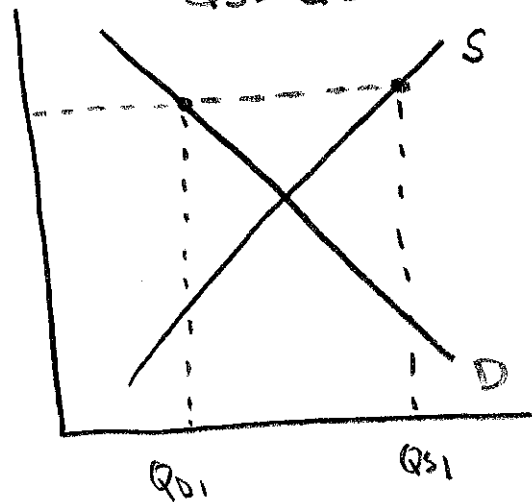
- a. **Shortage** is when the price is below equilibrium and quantity demanded is greater than quantity supplied. This puts upward pressure on price and moves it toward equilibrium.
- b. **Surplus** is when the price is above equilibrium and quantity demanded is less than quantity supplied. This puts downward pressure on price and moves it toward equilibrium.



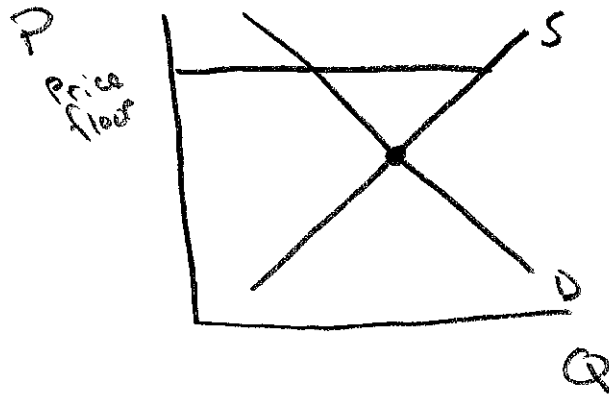
Shortage
 $Q_D > Q_S$



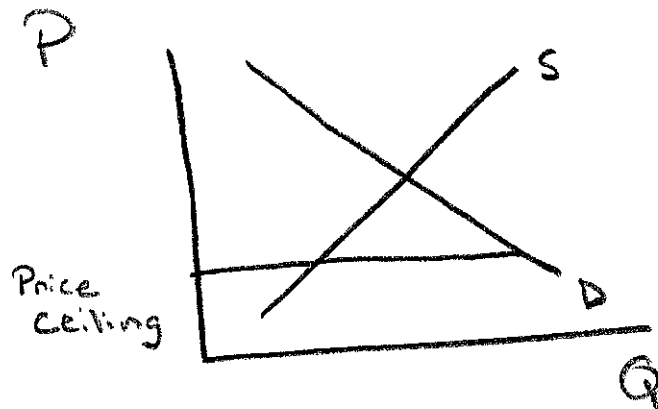
SURPLUS
 $Q_S > Q_D$



- XII. **Price floor** is a minimum price that a good can be sold. It is meant to help producers by raising price. It must be set above equilibrium in order to be effective, and it causes a surplus.



- XIII. **Price ceiling** is a maximum price that a good can be sold. It is meant to help consumers by lowering price. It must be set below equilibrium in order to be effective, and it causes a shortage.



XIV. **3 types of business organizations**

- a. **Sole Proprietorship** is a business owned by a single individual.
 - i. Benefit is that it is easy to start, the owner has total control, and there are fewer taxes.
 - ii. Cost is that it is risky because of **unlimited liability** which means that the owner is personally liable for all business debts, and it is more difficult to grow because it is harder to raise money.
- b. **Partnership** is a business owned by two or more people.
 - i. Benefit is that it is easy to start, and specialization is easier since there are multiple owners.
 - ii. Cost is that there is a potential for conflict, unlimited liability is still an issue, and each owner is responsible for all owners' actions.
- c. **Corporation** is a business owned by stockholders.

- i. Benefit is that it has limited liability, so owners are not personally responsible for business debt. It is easier to raise money through bonds or sales of stock.
- ii. Cost is that it is more heavily regulated by the government, faces more taxes, and owners (stockholders) do not have a say in the day to day operation of the company.

XV. **Market Structures:** as you go down the list below: you are going from most competitive market structure to least competitive market structure; you get worse for the buyer and better for the seller; prices and profits tend to rise for the sellers.

a. **Pure or Perfect Competition**

- i. Many buyers and sellers
- ii. Identical or homogeneous products
- iii. Few or no barriers to entering or leaving the market
- iv. Buyers and sellers are relatively well informed about the product, so they can tell the difference between a good and bad product.
- v. Buyers and sellers act independently of each other.
- vi. Difficult to make a profit
- vii. Buyers and sellers are price takers, so they must take the market price as given.
- viii. Examples: farming and agricultural raw materials

b. **Monopolistic Competition**

- i. Many buyers and sellers
- ii. Few or no barriers to entering or leaving the market
- iii. Differentiated products
- iv. Brand names and advertising are important
- v. Examples: shoes, small restaurants and hotels, and clothing

c. **Oligopoly**

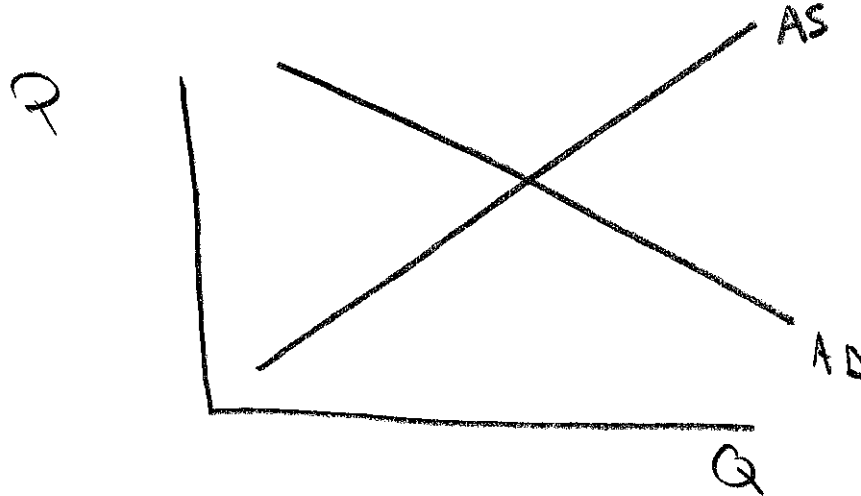
- i. Few large sellers
- ii. Barriers to entry prevent many from entering.
- iii. Identical or differentiated products
- iv. Advertising is very important
- v. Can lead to collusion
- vi. Try not to compete on price, because they all lose profit
- vii. Examples: airlines, automobiles, soft drinks, and cereal

d. **Monopoly**

- i. Single seller
- ii. Barriers to entry prevent competition.
- iii. Examples: Technological monopoly (due to patents or copyrights) such as certain cancer drugs, geographic monopoly (due to location) such as a gas station in the middle of nowhere, and natural monopoly (where one company produces at a lower cost than a bunch of smaller companies) such as Georgia Power.

Macroeconomics

- I. **Macroeconomic** is the study of the entire economy and how and why it changes.
- II. **Aggregate Demand** is the demand for everything in the economy combined.
- III. **Aggregate Supply** is the supply of everything in the economy combined.



- IV. **Gross Domestic Product (GDP)** is the dollar value of all goods and services produced in the economy.
 - a. What is not included:
 - i. Illegal activities
 - ii. Used products (secondhand sales)
 - iii. Intermediate goods, which are goods that a part of a larger product such as a button on a shirt.
 - iv. Purely financial transactions such as buying and selling stocks and transfer payments which is when wealth is transferred from one group to another group without any good or service in exchange. Examples include a cash from your parent for your birthday or social security payments from the government.
 - v. Doing things yourself such as cutting your own grass.
 - b. Formula: $GDP = Consumption (C) + Investment (I) + Government Spending (G) + Net Exports (Exports - Imports)$
- V. **Business Cycle** is the cycle between good economic times (expansions/recovery) and bad economic times (recessions/contractions)
 - a. **Recession** or **contraction** is declining GDP for 6 months. Typically, unemployment is rising.
 - b. **Depression** is a severe recession.
 - c. **Expansion** or **recovery** is increasing GDP. Typically, unemployment is falling.

- VI. Enemies of the Economy: Unemployment and Inflation
- a. Typically, high unemployment and high inflation do not happen at the same time.
 - b. **Stagflation** is having high unemployment and high inflation at the same time.
 - c. **Unemployment** is not having a job AND actively looking for a job.
 - d. 4 Types of Unemployment
 - i. **Structural** is when your skills do not match the jobs available. This can happen when your job is replaced by a machine, your employer moves the business to another country (outsourcing), demand for the product you make declines such as the demand for typewriter factory workers.
 - ii. **Seasonal** is when you are unemployed during certain times of the year such as lifeguards in January.
 - iii. **Cyclical** is when you lose your job due to a recession in the business cycle.
 - iv. **Frictional** is the time you are unemployed between leaving a job and taking another job such as a college graduate getting her first job or when someone wants to move to a different city, so he quits his job to find something somewhere else.
 - e. **Unemployment Rate** is the percentage of the civilian labor force that does not have a job.
 - i. **Civilian Labor Force** is men and women 16 and up, not in the military, or institutionalized who are working or actively looking for a job.
 - ii. **Discourage workers** are workers who have given up looking for a job. They are not counted as unemployed and are not a part of civilian labor force.
 - iii. Part time workers are underemployed BUT they are not unemployed.
 - iv. $\text{Unemployment Rate} = \left(\frac{\# \text{ Unemployed}}{\# \text{ Civilian Labor Force}} \right) \times 100$
 - f. **Inflation** is an increase in average price level. It is a monetary phenomenon, which means that it occurs when money is losing value.
 - g. 2 Types of inflation
 - i. **Cost Push** is when a really important factor of production like oil or labor becomes more expensive, causing production prices to rise and reducing aggregate supply.
 - ii. **Demand Pull** is when the economy is doing well so income rising causes aggregate demand to increase.

- h. Inflation helps people who borrow money at fixed interest rates. It makes the value of the money they owe go down.
 - i. Inflation hurts people who lend money, savers, and people on fixed incomes, because the value of the money they receive is decreasing.
 - j. Inflation is measured using the **consumer price index (CPI)**, which is based on a market basket of goods that the typical consumer buys.
 - i. By comparing this year's CPI to a previous year, we can calculate inflation
 - ii. $\text{Inflation Rate} = \frac{(\text{Year 2 CPI} - \text{Year 1 CPI})}{(\text{Year 1 CPI})} \times 100$
- VII. **Fiscal Policy** is government taxing and spending decisions.
- a. Slow and political. Congress and the President control it.
 - b. Taxes
 - i. **Proportional** is a tax that is the same percentage on all incomes. Example: flat tax
 - ii. **Regressive** is a tax that is higher percentage on lower incomes. Example: sales tax
 - iii. **Progressive** is a tax that is higher percentage on higher incomes. Example: income tax
 - c. **Budget Deficit** is when the government spends more than it brings in tax revenue for 1 year.
 - d. **Debt** is all deficits combined, so the total amount the federal government owes.
 - e. If unemployment is a problem in the economy and we are in recession, the government can use **expansionary fiscal policy** (decrease taxes and raise government spending) to solve the problem.
 - f. If inflation is a problem in the economy and we are in expansion, the government can use **contractionary fiscal policy** (raise taxes and lower government spending) to solve the problem.
- VIII. **Federal Reserve Bank (Fed)** is the US central bank.
- a. Functions of the Fed
 - i. Conducts monetary policy
 - ii. Issues new currency to replace old currency
 - iii. Holds money for banks (it is a bank's bank)
 - iv. Clears checks
 - v. Regulates banks
 - vi. Lends money to banks
 - vii. US government's bank
 - b. Structure of the Fed
 - i. 12 district banks (6th district is based in Atlanta)
 - 1. Meant to decentralize it and spread power over the US and make it less sensitive to political pressure in Washington DC.
 - ii. **Board of Governors**
 - 1. 7 members that each serve a 14 year terms
 - 2. Each member is nominated by the President and confirmed by the Senate
 - 3. 1 member is the Chairperson (currently Jerome Powell)
 - 4. Primary policy making organ of the Fed
 - iii. **Federal Open Market Committee (FOMC)**
 - 1. 12 members
 - 2. Sets monetary policy

iv. **Federal Advisory Council**

1. 12 members
2. Offers advice to the FOMC and Board of Governors about what they think should be done.

IX. **Monetary Policy** is the Federal Reserve Bank (Fed) controlling the money supply.

a. **Expansionary Policy (Easy Money Policy)**

- i. Increasing the money supply and creating inflation. Do this to put more money in people's pockets to encourage them to spend more in order to fight unemployment.

b. **Contractionary Policy (Tight Money Policy)**

- i. Decreasing the money supply and decreasing inflation. Do this to take money out of economy to discourage spending in order to fight inflation.

c. **4 Tools**

i. **Paying Interest on Banks Reserves**

1. Expansionary policy would lower the interest rate paid on reserves to encourage banks to deposit less money at the Fed and increase the number of loans.
2. Contractionary policy would raise the interest rate paid on reserves to encourage banks to deposit more money at the Fed and lower the number of loans.

ii. **Open Market Operations** is the Fed buying and selling government bonds to influence the **Fed Funds Rate**. **Fed Funds Rate** is the interest rate the banks charge each other for loans to meet the reserve requirement.

1. Expansionary policy would be for the Fed to buy bonds to lower the Fed Funds Rate and other interest rates to increase the number of loans.
2. Contractionary policy would be for the Fed to sell bonds to raise the Fed Funds Rate and other interest rates to decrease the number of loans.

iii. **Reserve Requirement** is the percentage of deposits that banks must keep as reserves and are not allowed to loan.

1. Expansionary policy would be to lower the reserve requirement to allow banks to loan more money.
2. Contractionary policy would be to raise the reserve requirement to all banks to loan less money.

iv. **Discount Rate** is the interest rate the Fed charges banks to get a loan from the Fed.

1. Expansionary policy would be to lower the discount rate to lower overall interest rates and allow banks to loan more money.
2. Contractionary policy would be to raise the discount rate to raise overall interest rates and allow banks to loan less money.

International Economics

- I. Why do countries trade?
 - a. To get things they cannot make themselves due to a lack of specific resources.
 - b. To be able to specialize in things they make more efficiently
 - c. To get things at a lower opportunity cost
- II. How do we know when to trade?
 - a. **Absolute advantage** means you make more of something.
 - b. **Comparative advantage** means you make something at a lower opportunity cost.
 - c. **You always produce the thing you can make at lower opportunity cost and trade to get the other product.**

	Cars	Robots	C:R
US	10	30	1:3
UK	5	10	1:2

In the above scenario above the US has an absolute advantage in both products. The UK has a comparative advantage in cars, because it gives up fewer robots to make 1 car. The US has a comparative advantage in robots. Therefore, the UK will make cars, and the US will make robots, and they will trade with each other to get the other product.

- III. **Free trade** is trading without any barriers between countries.
- IV. Why do trade barriers (protectionism) exist?
 - a. To protect domestic jobs
 - b. To protect national security
 - c. To protect infant industries
 - d. To protect safety and the environment through safety and pollution standards
- V. Types of trade barriers
 - a. **Tariff** is a tax on imports
 - b. **Embargo** is refusing to trade for political reasons
 - c. **Quota** is a limit on a quantity that can be imported
 - d. **Subsidies** are money paid to domestic producers
 - e. **Standards** are regulations to protect safety or the environment
 - f. **Voluntary Export Restraint** is when a country voluntarily lowers its exports to another country
- VI. **Trade blocks** eliminate barriers among the countries that are members of the block.
 - a. **North American Free Trade Agreement (NAFTA)** is between the US, Mexico, and Canada
 - b. **European Union (EU)** is among western European countries
 - c. **Association of Southeast Asian Nation (ASEAN)** is countries in SE Asia
- VII. **Exchange Rate** is the value of one country's currency relative to another country's currency.
 - a. Countries **Floating Exchange Rates**, which means they are determined by supply and demand of the currency on the **Foreign Exchange Market**.
 - b. **Appreciating** currency is increasing in value. (Strong currency)
 - i. Increased demand or decreased supply of a currency causes it to appreciate.

- ii. If the dollar appreciates it makes foreign goods cheaper for Americans, so our imports will increase. It also makes American goods more expensive for foreigners, so our exports will decrease.
 - c. **Depreciating** currency is decreasing in value. (Weak currency)
 - i. Decreased demand or increased supply of a currency causes it to depreciate.
 - ii. If the dollar depreciates it makes foreign goods more expensive for Americans, so our imports will decrease. It also makes American goods cheaper for foreigners, so our exports will increase.
 - d. Currency conversion
 - i. If $\$1 = 20 \text{ Yen}$ then $1 \text{ Yen} = \$0.05$
- VIII. **Balance of trade** is the difference between our exports and imports.
 - a. **Trade surplus** means our exports are greater than our imports.
 - b. **Trade deficit** means our imports are greater than our exports.

Personal Finance

- I. More education increases your earning potential by increasing your human capital.
- II. **Budget** is a spending plan that allows someone to adjust their spending to their income and save over time.
 - a. Everyone has expenses they must pay such as rent or a mortgage, utilities, loan payments, and insurance.
 - b. Saving placed in financial institutions or markets earn interest.
 - i. Examples include savings accounts, bonds, stocks, retirement accounts, mutual funds, and certificates of deposit.
 - ii. The greater the risk, the greater the interest rate return for these options.
- III. Types of financial institutions
 - a. **Banks** take depositors' money and lend it to borrowers. The banks charge borrowers interest, keep a portion of the interest for profit, and pay the rest to depositors.
 - b. **Credit Unions** are similar to banks, but are not for profit, so they often charge lower interest rates to borrowers and give more interest to depositors.
 - c. **Payday loan companies** give customers an advance on their pay. Basically, they give them a loan that the customer will pay when he or she gets paid. These are very high interest loans and should be avoided.
 - d. **Title pawn companies** give customers loans in exchange for **collateral** (tell the lender if you do not pay them back, they can take the property). These are also typically very high interest loans and should be avoided.
- IV. Borrowing money: the interest rate you will pay on a loan and whether the bank will give you the loan is based on your income, current debt, payment history of past debt, and your credit score.
- V. **Simple interest** savings accounts only pay you interest on your initial deposit. Simple interest loans make you pay interest on the value of the original loan. This means that as your **principal** is paid down for a loan, or grows for a savings account, you do not earn or pay interest on the value of the principal.
 - a. Example: If you deposit \$100 in the bank earning 5% simple interest per year, you will earn \$5 every year.
 - b. Example: If you get a loan for \$100 paying 5% simple interest per year, you will pay \$5 every year.
- VI. **Compound interest** savings accounts pay you extra interest on the interest you have already earned. Compound interest loans make you pay interest on the remaining balance of the loan as you pay it back.
 - a. Example: If you deposit \$100 in the bank earning 5% compound interest per year, you will earn 5% of your new balance. At the end of year 1 you would have \$105. At the end of year 2 you would have \$105.25. At the end of year 3 you would have \$110.51.
 - b. Example: If you get a loan for \$100 paying 5% simple interest per year, you will pay 5% of whatever is left to pay, so the amount you pay in interest will decrease as you pay off the loan.
- VII. Insurance
 - a. Types

- i. **Life** pays to a benefactor when you die. Used to pay off debts you left, help with funeral costs, or help your relatives afford to keep their lifestyle if you were to suddenly die.
 - ii. **Health** pays for doctor visits, prescription drugs, major health events.
 - iii. **Home or Renters or Property** pays for damage to you home from a storm, fire, or burglary. It covers property inside the house or an apartment. It also covers if someone gets hurt on your property.
 - iv. **Automobile** covers damage to other cars and drivers/passengers if the accident is your fault. If you have full coverage it will also cover your car's damage.
 - v. **Disability** covers extra expenses that come from a sudden accident and allows you to get paid even when you are not working due to the disability.
- b. **Premium** is the cost to be covered by insurance. The cost of the premium is determined by how risky you are to be insured. In other words, what is the likelihood that the insurance company will have to pay for you? It is also determined by how much coverage you want to buy. More coverage means higher premiums.
- c. **Deductible** is what you have to pay before the insurance covers the rest.