Map: **AP Economics** Type: **Consensus** Grade Level: **12** School Year: **2010-2011**

Author: **Jessica Cartusciello** District/Building: **Island Trees / Island Trees High School**

Created: **06/28/2010** Last Updated: **07/22/2010**

	Essential Questions	Content	Skills	Assessments	Standards/PIs	Resources/Notes
Unit 1	How do the basic economic concepts lay the foundation for economics? How do the different economic systems answer the three questions of economics?	**Basic Economic Concepts** The role of scarcity in economic decision making The connection between scarcity and choice The concept of opportunity cost Production possibilities curve and production possibilities frontier Comparative advantage, absolute advantage, specialization, and trade. The different economic systems: market economy; planned economy; mixed economy Property rights in a market economy Incentives	Discriminates between scarcity and shortage. Examines the impact of choice on trade-offs and scarcity. Illustrates real life examples of opportunity cost Assesses the implications of an economy's production possibilities curve and production possibilities frontier. Describes the role of comparative advantage in producing a good or service. Identifies absolute advantage in an economic activity. Discusses the role of specialization. Identifies the impact of specialization on international trade. Labels the different economic systems. Explains the basic differences between a market economy and a planned economy. Locates examples of the different types of economic systems.		**SS4-K1-1B** **SS4-K1-1C** **SS4-K1-1A** **SS4-K1-1D** **SS4-K1-1E** **SS4-K1-1F** **SS4-K1-1G** **SS4-K2-1B** **SS4-K2-1C** **SS4-K2-1D**	

		Marginal analysis and marginal decisions **Vocabulary** economics, resource, scarce, opportunity cost, trade-off, marginal decision, marginal analysis, incentive, trade, specialization, equilibrium, efficient, equity, production possibility frontier, factors of production, technology, comparative advantage, absolute advantage, circular -flow, positive economics, normative economics	Appraises the importance of property rights. Recognizes the problems that arise when property rights are not assigned. Points out the ways in which incentives guide people's behavior. Expresses how marginal decisions are made in order to do a bit more or a bit less of an activity. Distinguishes between marginal decisions and marginal analysis.			
Unit 2	How do supply and demand operate in a market economy to arrive at an equilibrium? How does government intervention impact the market equilibrium?	**Supply and Demand** Market equilibrium, equilibrium price, and equilibrium quantity Demand curve and demand schedule Law of demand Supply curve and supply schedule Law of supply Supply and demand model Shifts of the demand curve and supply curve Movements along the supply curve and demand curve Sustitutes and complements	Identifies equilibrium as the economic situation where no indivudual would be better off doing something different. Constructs a demand curve using the demand schedule. Illustrates the law of demand Constructs a supply curve using the supply schedule. Illustrates the law of supply Evaluates the difference between a move along the demand curve and a shift of the demand curve. Evaluates the difference between a move along the supply curve and a shift of the supply curve. Predicts the impact of substitutes and complements.		**SS4-K1-1A** **SS4-K1-1B** **SS4-K1-1C** **SS4-K1-1D** **SS4-K2-1B** **SS4-K2-1D** **SS4-K2-1A**	

		The determinants of demand: Changes in the prices of related goods or services; Changes in income; Changes in tastes; Changes in expectations; Changes in the numbers of consumers The determinants of supply: Changes in input prices; Changes in the prices of related goods or services; Changes in technology; Changes in expectations; Changes in the number of producers Price and quantity controls: price floors and price ceilings. Creation of black markets Price elasticity of demand equation Types of elasticity of demand Price elasticity of supply equation Types of elasticity of supply	Lists the determinants of supply Lists the determinants of demand Describes the impact of the determinants on both supply and demand Predicts the effects of each determinant on both the supply and demand curves. Identifies types of price and quantity controls. Analyzes the impact of a price floor Analyzes the impact of a price ceiling Graphically represents price and quantity controls. Defines elasticity of demand Computes elasticity of demand Illustrates the different types of elasticity of demand: perfectly inelastic demand, perfectly elastic demand, elastic demand, inelastic demand, and unit-elastic demand. Defines elasticity of supply Computes elasticity of supply Illustrates the different types of elasticity of supply: perfectly inelastic supply and perfectly elastic supply			

Consumer surplus, producer surplus, and market efficiency

Tax incidence, tax rate, and deadweight loss

Tax fairness and tax efficiency

Marginal tax rate

Vocabulary

competitive market, supply and demand model, demand schedule, quantity demanded, demand curve, law of demand, substitutes, complements, normal goods, inferior goods, supply schedule, supply curve, law of supply, input, equilibrium price, equilibrium quantity, surplus, price controls, price floor, price ceiling, black market, quantity controls, elasticity of demand, elasticity of supply, total revenue, consumer surplus, producer surplus, market failure, market efficiency, excise tax, incidence, tax rate, progressive tax,

Diagrams consumer surplus

Diagrams producer surplus

Calculates total surplus

Appraises the tax incidence

Identifies the tax rate

Graphically represents the deadweight loss of a tax

Distinguishes between the benefits principle of tax fairness and the ability-to-pay principle.

Computes the marginal tax rate

		regressive tax, deadweight loss				
Unit 3	How is economic decision making unique? How do budget constraints impact consumer choice?	**Economic Decision Making and Theory of Consumer Choice** Explicit versus implicit costs; accounting profit versus economic profit The role of marginal analysis in making decisions Present Value Total utility and marginal utility The principle of diminishing marginal utility Budget constraints and optimal consumption bundles The optimal consumption rule The role of utility in the creation of demand curves The substitution effect and	Distinguishes between explicit costs and implicit costs. Explains the difference between accounting profit and economic profit. Computes marginal cost. Graphically represents marginal cost. Computes marginal benefit. Graphically represents marginal benefit. Applies the concepts of marginal cost and marginal benefit to illustrate optimal quantity Computes present value and examines its impact on borrowing, lending, and interest. Interprets present value and calculates the net present value. Appraises utility in order to predict behavior Calculuates total utility; graphically represents total utility. Calculates marginal utility; graphically represents marginal utility. Analyzes the principle of diminishing marginal utility and applies it to predict		**SS4-K1-1A** **SS4-K1-1B** **SS4-K1-1C** **SS4-K1-1C** **SS4-K1-1G** **SS4-K2-1B** **SS4-K2-1C** **SS4-K2-1D**	

		the income effect	behavior.			
			Assesses the relationship between budget constraints and consumption possibilities. Graphically represents a budget line. Interprets the consumer's consumption possiblities to predict his/her optimal consumption bundle. Calculates the marginal utility per dollar. Explains the optimal consumption rule.			
		Consumer preferences Properties of indifference curves: indifference curves never cross; the further an indifference curve lies from the origin, the higher level of utility it indicates; indifference curves slope downward; indifference curves have a convex shape.	Applies the concept of utility to illustrate the creation of the demand curve. Demonstrates the impacts of the substitution effect and the income effect.			
		The marginal rate of substitution	Analyzes consumer preferences Creates an indifference curve and an indifference curve map Compares an individual's various indifference curves			
		Vocabulary explicit cost, implicit cost, accounting profit, economic profit, capital, marginal cost, constant marginal cost, increasing marginal cost, marginal benefit, decreasing marginal benefit, optimal quantity, principle of marginal analysis, sunk cost, present value, net present value, utility, marginal utility, consumption bundle, utility function, principle of diminishing marginal utility, budget constraint, consumption possibilities, budget line, optimal consumption bundle, marginal utility per dollar, optimal consumption rule,				

		substitution effect, income effect, indifference curve, indifference curve map, diminishing marginal rate of substitution, ordinary goods, relative price, perfect substitutes.				

	Essential Questions	Content	Skills	Assessments	Standards/PIs	Resources/Notes
Unit 4	How are costs evaluated?	**Production and Costs** Components of a production function: fixed input; variable input Long run versus short run Diminishing marginal returns to an input Costs: fixed cost; variable cost; total cost; marginal cost; average cost Total cost curve Minimizing costs Returns to scale: increasing returns to scale; decreasing returns to scale; constant returns to scale **Vocabulary** production function, fixed input, variable input, long run, short run, total product curve, marginal product, diminishing returns to an input, fixed cost, variable cost, total cost, total cost curve, average total cost, average cost, U-shaped average total cost curve, average fixed cost, average variable cost, minimum-cost output, long-run average total cost curve, increasing returns to scale, decreasing returns to scale, constant	Identifies the components of a production function. Distinguishes between fixed inputs and variable inputs. Compares the long run with the short run. Graphically represents the total product curve. Calculates the marginal product of labor. Illustrates diminishing returns to an input. Differentiates between the different types of costs. Categorizes costs into fixed costs or variable costs. Calculates marginal cost. Graphically represents marginal cost. Calculates average cost. Graphically represents average variable cost, average fixed cost, and average total cost. Graphically represents total cost curve. Discovers the cost minimizing input combination. Identifies the minimum-cost output. Interprets returns to scale.		**SS4-K1-1A** **SS4-K1-1B** **SS4-K2-1B** **SS4-K2-1C** **SS4-K2-1D**	

		returns to scale.				
Unit 5	Why is perfect competition "perfect"? How do the short-run and long-run differ in perfect competition?	**Perfect Competition** Perfectly competitive market Necessary conditions for perfect competition: many producers; standardized product Free entry and exit Optimal output rule Short-run production decisions Industry supply curve: short -run and long-run **Vocabulary** price-taking producer, price-taking consumer, perfectly competitive market, perfectly competitive industry, market share, standardized product, commodity, free entry and exit, marginal revenue, optimal output rule,	Lists the properties of a perfectly competitive market. Labels perfectly competitive industries as price-takers. Explains free entry and exit in a market. Calculates total revenue, total cost, and profit. Interprets marginal revenue to make production decisions. Identifies the point at which profit is maximized by using the optimal output rule. Graphically represents when production is profitable. Identifies the shut-down price. Creates the short-run individual supply curve. Creates the short-run industry supply curve. Compares the short-run industry supply curve and the long-run industry supply curve. Evaluates the cost of production and efficiency in long-run equilibrium.		**SS4-K1-1B** **SS4-K1-1D** **SS4-K1-1G** **SS4-K2-1A** **SS4-K2-1B**	

		marginal revenue curve, break-even price, shut-down price, short-run individual supply curve, industry supply curve, short-run industry supply curve, short-run market equilibrium, long-run market equilibrium, long-run industry supply curve				
Unit 6	How is a monopoly the opposite of "perfect"? Why are monopolies viewed in a negative light?	**Monopoly** Market Power Reasons for the existence of monopolies: Control of a scarce resource; increasing returns to scale; technological superiority; government-created barriers Profit maximization Monopolist's demand curve Monopoly and public policy Inefficiency of a monopoly Price discrimination	Identifies a firm as a monopolist based on specific criteria: one producer; no substitutes; market power. Defines market power as the ability of a firm to raise prices. Explains the reasons for the existence of monopolies. Explains how increasing returns to scale leads to the formation of a natural monopoly. Explains how a patent can lead to government-created barriers. Computes a monopolist's profit maximizing level of output. Graphically represents a monopolist's profit-maximizing output and price. Identifies the level of output where marginal revenue equals marginal cost. Graphically represents a monopolist's demand curve. Compares a monopolist's demand curve with a perfectly competitive firm's demand curve. Lists the welfare effects of a		**SS4-K1-1A** **SS4-K1-1B** **SS4-K1-1D** **SS4-K2-1A** **SS4-K2-1B** **SS4-K2-1D**	Economics text book

		Vocabulary monopolist, monopoly, market power, barrier to entry, natural monopoly, patent, copyright, public ownership, price regulation, single-price monopolist, price discrimination, perfect price discrimination	monopoly: negative impact on consumers. Graphically represents the deadweight loss created by the inefficiency of a monopoly. Identifies monopoly preventing legislature as antitrust policy. Describes the role of price regulation. Discusses public ownership. Contrasts single-price monopolists with sellers who engage in price discrimination. Graphically represents the firm's benefits of implementing price discrimination. Recalls common techniques for price discrimination: advance purchase restrictions; volume discounts; two-part tariffs.				

	Essential Questions	Content	Skills	Assessments	Standards/PIs	Resources/Notes
Unit 7	How is an oligopoly similar to a monopoly? Why is monopolisic competition imperfect? How do demand curves in different market structures differ?	**Oligopoly and Monopolistic Competition** Imperfect Competition: oligopoly; duopoly Collusion and competition Game theory and the prisoners' dilemma Demand curve of an oligopoly Tacit collusion and price wars Nonprice competition: product differentiation and price leadership	Defines oligopoly. Evaluates different types of imperfect competition. Compares oligopoly and duopoly. Discriminates between price collusion and competition. Points out cartel as the strongest form of collusion. Recognizes the presence of interdependence. Analyzes game theory. Illustrates the behavior of game theory partciapants with a payoff matrix. Applies knowledge of game theory to the prisoners' dilemma. Relates the Nash equilibrium to game theory. Predicts strategic behavior. Discusses the terms of tacit collusion. Graphically represents the demand curve of an oligopoly. Compares the kinked demand curve of an oligopoly with the demand curve of perfect competition. Recalls real world examples of an oligopoly. Explains the legal constraints under which oligopolies operate in the United States. Inspects the role of antitrust policies undertaken by the government. Debates the impacts of tacit collusion and price wars. Outlines the factors that make it difficult for an industry to coordinate on		**SS4-K1-1B** **SS4-K1-1C** **SS4-K1-1D** **SS4-K1-1G** **SS4-K2-1A** **SS4-K2-1B** **SS4-K2-1D**	

			high prices: large numbers; complex products and pricing schemes; differences in interests; bargaining power of buyers.			
			Assesses the success of various forms of nonprice competition.			
		Monopolistic competition as a market structure	Defines monopolistic competition. Debates the presence of monopolistic competition. Distinguishes between monopolistic competition and perfect competition. Distinguishes between monopolisitc competition and an oligopoly.			
		Characteristics of monopolistic competition: large numbers; differentiated products; free entry and exit in the long run	Graphically represents the profit-maximizing quantity of a monopolistically competitive firm in the short run.			
		Profit maximization				
		Monopolistic competition in the short run	Graphically represents the minimum-cost output of a monopolistically competitive firm in the long run.			
		Monopolistic competition in the long run	Interprets the reasons for zero-profit equilibrium in the long run.			
		Role of advertising				
		Excess capacity	Questions the reasons for excess capacity. Analyzes the practice of failing to minimize average total cost.			
		Inefficiency of Monopolistic Competition	Examines the inefficiencies of monopolistic competition.			
			Debates the effectiveness of advertising. Explains the role of brand names.			
		Vocabulary oligopoly, imperfect competition, duopoly, collusion, cartel, noncooperative behavior, interdependence, game				

		theory, payoff, payoff matrix, prisoners' dilemma, dominant strategy, Nash equilibrium, noncooperative equilibrium, strategic behavior, tit for tat, tacit collusion, kinked demand curve, antitrust policy, price war, product differentiation, price leadership, nonprice competition, monopolistic competition, zero-profit equilibrium, excess capacity, brand name				
Unit 8	Why do markets fail? How do governments react to externalities?	**Market Failure and Externalities** Types of externalities: negative and positive Pollution as an externality: marginal social cost of pollution; marginal social benefit of pollution; socially optimal quantity of pollution External cost of pollution Inefficiency of excess pollution Private solutions to externalities: Coase theorem; transaction costs; internalizing the externality Policies towards pollution: environmental standards; emissions tax; Pigouvian tax, tradable emissions permits Private versus social benefits	Identifies externalities. Distinguishes between positive externalities and negative externalities. Recognizes pollution as an externality. Evaluates the marginal social cost of pollution. Debates the presence of a marginal social benefit of pollution. Locates the socially optimal quantitiy of pollution. Compares the costs and benefits of pollution. Interprets the external costs of pollution. Measures the inefficiency of pollution. Contrasts the various private solutions to externalities: Coase theorem; transaction cost; internalizing the externality. Concludes the most effeicient way to solve the problem of externalities in different situations. Compares the different policies towards pollution: environmental standards; emissions tax; Piguvian tax, tradable emissions permits. Contrasts the graphical representations of environmental standards versus emissions taxes.		**SS4-K1-1B** **SS4-K1-1C** **SS4-K1-1D** **SS4-K1-1F** **SS4-K1-1G** **SS4-K2-1A** **SS4-K2-1B** **SS4-K2-1D**	

		Private versus social costs Network externalities **Vocabulary** Marginal social cost of pollution, marginal social benefit of pollution, socially optimal quantity of pollution, external cost, external benefit, externalities, negative externalities, positive externalities, coase theorem, transaction costs, internalize the externality, environmental standards, emissions tax, piguvian taxes, tradable emissions permits, marginal social benefit of a good or activity, Piguvian subsidy, technology spillover, industrial policy, marginal social cost of a good or activity, network externality, positive feedback	Identifies private and social benefits. Graphically represents positive externalities and consumption. Assesses the marginal social benefit of a good or activity. Measures the effect of a Piguvian subsidy. Identifies technology spillover. Predicts the industrial policy that might be created in response to positive externalities. Identifies the private and social marginal cost of a good or activity. Demonstrates the effect of a network externality. Shows how a good subject to a netwrok externality exhibits positive feedback.			
Unit 9	Why do governments choose to provide public goods?	**Public Goods and the Welfare State** Four types of goods: private goods; artifically scarce goods; common resources; public goods Characteristics of private goods: excludable; rival in consumption Characteristics of public goods: nonexcludable; nonrival in consumption	Compares the four types of goods: private goods; artificially scarce goods; common resources; public goods. Contrasts the characteristics of private goods and public goods. Names examples of private goods. Names examples of public goods. Defines the free-rider problem. Debates solutions to the free-rider problem. Recalls examples of a common resource good. Interprets the impact of the		**SS4-K1-1A** **SS4-K1-1B** **SS4-K1-1E** **SS4-K1-1D** **SS4-K2-1D** **SS4-K2-1C** **SS4-K2-1B** **SS4-K2-1A**	

	To what extent should the government play a role in providing health care?	Free-rider problem Providing public goods Cost-benefit analysis The welfare state Trends and causes of poverty Health Care Problems with the welfare state Politics of the welfare state **Vocabulary**	problem of overuse on common resource goods. Recalls examples of artificially scarce goods. Analyzes the different means through which public goods are provided. Debates how much of a public good should be provided. Illustrates the social costs and social benefits of providing a public good with a cost-benefit analysis. Defines welfare state. Identifies the poverty threshold. Recalls examples of social insurance programs. Describes the poverty rate. Identifies the poor in the United States. Outlines the causes of poverty: lack of education; bad luck. Breaks down the income distribution in the United States by percentile. Compares mean household income with median household income. Explains the need for health insurance. Identifies the problems caused by the uninsured. Contrasts healthcare in the United States with healthcare in other countries: Canada; Britain; France. Evaluates proposals for healthcare reform. Debates the problems with the welfare state.			

		excludable, rival in consumption, private good, nonexcludable, nonrival in consumption, free-rider problem, public good, cost-benefit analysis, common resource, overuse, artificially scarce good, welfare state, government transfer, poverty program, social insurance programs, poverty threshold, poverty rate, mean household income, median household income, Gini coefficient, mean-tested, in-kind benefit, negative income tax, private health insurance, single-payer system	Examines the impact of politics on the welfare state.				

	Essential Questions	Content	Skills	Assessments	Standards/PIs	Resources/Notes
Unit 10	How does the labor market operate in the United States?	**Factor Markets** The factor distribution of income Marginal productivity and factor demand Shifts of the factor demand curve: changes in prices of goods; changes in supply of other factors; changes in technology Marginal productivity theory of income distribution: wage disparities; wage inequlaities; market power; efficiency wages; discrimination Supply of labor: work versus leisure; wages and labor supply Shifts of the labor supply curve: changes in preferences and social norms; changes in population; changes in opportunities; changes in wealth Risk Aversion Reducing risk Diversification: power versus limits	Defines the factor distribution of income. Calculates the value of the marginal product of labor. Graphically represents value of the marginal product of labor. Compares the different possible causes of shifts of the factor demand curve. Graphically represents shifts of the factor demand curve. Defines the marginal productivity theory of income distribution. Debates the truth behind the marginal productivity theory of income distribution. Graphically represents the supply of labor. Calculates time allocation: work versus leisure. Illustrates the different causes of a shift of the labor supply curve. Graphically represents a shift of the labor supply curve. Defines risk. Defines risk aversion. Calculates the expected value of a random variable. Calculates expected utility. Analyzes methods of reducing risk. Debates the positives and negatives of diversification. Summarizes the limits of diversification. Describes adverse selection. Defines moral hazard. Identifies real world examples of moral		**SS4-K1-1C** **SS4-K1-1D** **SS4-K2-1A** **SS4-K2-1B** **SS4-K2-1C** **SS4-K2-1D**	

		Adverse selection Moral hazard **Vocabulary** physical capital, human capital, factor distribution of income, value of the marginal product, rental rate, marginal productivity theory of income distribution, compensating differentials, unions, efficiency-wage model, time allocation, leisure, individual labor supply curve, random variable, expected value, risk, expected utility, premium, risk-averse, risk-neutral, efficient allocation of risk, fair insurance policy, diversification, share, pooling, positively correlated, private information, adverse selection, screening, signaling, reputation, moral hazard, deductible	hazards.			

Key to Standards used in this Map

SS4-K1-1A [6 occurences] - SS Standard 4 - Key Idea 1 [Economics i] - Performance Indicator 1A - analyze the effectiveness of varying ways societies, nations, and regions of the world attempt to satisfy their basic needs and wants by utilizing scarce resources. [Commencement]

SS4-K1-1B [9 occurences] - SS Standard 4 - Key Idea 1 [Economics i] - Performance Indicator 1B - define and apply basic economic concepts such as scarcity, supply/demand, opportunity costs, production, resources, money and banking, economic growth, markets, costs, competition, and world economic systems. [Commencement]

SS4-K1-1C [7 occurences] - SS Standard 4 - Key Idea 1 [Economics i] - Performance Indicator 1C - understand the nature of scarcity and how nations of the world make choices which involve economic and social costs and benefits. [Commencement]

SS4-K1-1D [8 occurences] - SS Standard 4 - Key Idea 1 [Economics i] - Performance Indicator 1D - describe the ideals, principles, structure, practices, accomplishments, and problems related to the United States economic system. [Commencement]

SS4-K1-1E [2 occurences] - SS Standard 4 - Key Idea 1 [Economics i] - Performance Indicator 1E - compare and contrast the United States economic system with other national economic systems, focusing on the three fundamental economic questions. [Commencement]

SS4-K1-1F [2 occurences] - SS Standard 4 - Key Idea 1 [Economics i] - Performance Indicator 1F - explain how economic decision making has become global as a result of an interdependent world economy. [Commencement]

SS4-K1-1G [5 occurences] - SS Standard 4 - Key Idea 1 [Economics i] - Performance Indicator 1G - understand the roles in the economic system of consumers, producers, workers, investors, and voters. [Commencement]

SS4-K2-1A [7 occurences] - SS Standard 4 - Key Idea 2 [Economics ii] - Performance Indicator 1A - identify, locate, and evaluate economic information from standard reference works, newspapers, periodicals, computer databases, monographs, textbooks, government publications, and other primary and secondary sources. [Commencement]

SS4-K2-1B [10 occurences] - SS Standard 4 - Key Idea 2 [Economics ii] - Performance Indicator 1B - use economic information by identifying similarities and differences in trends; inferring relationships between various elements of an economy: organizing and arranging information in charts, tables, and graphs; extrapolating and making conclusions about economic questions, issues, and problems. [Commencement]

SS4-K2-1C [5 occurences] - SS Standard 4 - Key Idea 2 [Economics ii] - Performance Indicator 1C - apply a problem-solving model to identify economic problems or issues, generate hypotheses, test hypotheses, investigate and analyze selected data, consider alternative solutions or positions, and make decisions about the best solution or position. [Commencement]

SS4-K2-1D [9 occurences] - SS Standard 4 - Key Idea 2 [Economics ii] - Performance Indicator 1D - present economic information and conclusions in different formats, including graphic representations, computer models, research reports, and oral presentations. [Commencement]