AGEC - AGRICULTURAL ECONOMICS (AGEC)

AGEC 101 Concepts in Agricultural Economics - First Year Experience
Credits 3. 3 Lecture Hours. Discussion-based learning designed to connect first-year AGEC and AGBL students with peers, faculty and staff while providing an overview of the experiential learning and high impact opportunities available in these majors; highlights key issues at Texas A&M University, in agriculture and in the field of Agricultural Economics.

AGEC 105 Introduction to Agricultural Economics
Credits 3. 3 Lecture Hours. An introductory seminar in the Department of Agricultural Economics. Characteristic of our economic system and basic economic concepts; survey of the farm and ranch firm and its organization and management; structure and operation of the marketing system; functional and institutional aspects of agricultural finance; government farm programs.

AGEC 117 Critical Thinking and Decision Making in Agricultural Economics
Credits 1. 1 Other Hour. An introductory seminar in the Department of Agricultural Economics; emphasis on writing as a critical communication skill. Prerequisite: AGEC 105, ECON 203, or grade of C or better in ECON 202; ENGL 103 or ENGL 104; Agricultural Economics and Agribusiness majors.

AGEC 216 Fundamentals of the AgriFood Sales Industry
Credit 1. 1 Lecture Hour. Fundamentals of professional business to business sales in AgriFood firms; opportunities to interact with successful salespeople in AgriFood firms; focus on career development, exploration of undergraduate internships in professional sales and identification of basic sales theories currently in use in AgriFood firms; learning to network extensively with AgriFood industry professionals and developing a mentor relationship.

AGEC 217 Fundamentals of Agricultural Economics Analysis
Credits 3. 2 Lecture Hours, 2 Lab Hours. Relates contemporary agribusiness issues to economic and financial management, illustrating their integration toward pragmatic applications in the agricultural industry; lab focuses on the integration of mathematics and economics with computer skills directed toward spreadsheets, databases, web pages, and communications software. Prerequisites: AGEC 105; ENGL 103 or ENGL 104; MATH 141 or MATH 168 or MATH 140 and MATH 142; sophomore or junior agricultural economics or agribusiness majors; or approval of department head.

AGEC 223 Establishing Agribusiness Entrepreneurship Networks I
Credit 1. 1 Lecture Hour. Introduction to successful entrepreneurs and other professionals, identifying suggested strategies and tactics in starting and sustaining viable rural and metropolitan business ventures; emphasis on importance of and how to develop relationships with a broad spectrum of mentors. Prerequisite: Open to all majors.

AGEC 285 Directed Studies
Credits 0 to 4. 0 to 4 Other Hours. Directed study of selected problems in agricultural economics. Prerequisite: AGEC 105 or concurrent enrollment; freshmen or sophomore classification in agricultural economics, agribusiness, or approval of instructor and department head; 2.5 GPR in major, overall, and CBK courses, if applicable; see an academic advisor in Room 214 AGLS.

AGEC 289 Special Topics in...
Credits 1 to 4. 1 to 4 Lecture Hours. Selected topics in an identified area of agricultural economics. May be repeated for credit. Prerequisites: Freshman or sophomore classification and approval of department head.

AGEC 291 Research
Credits 0 to 4. 0 to 4 Other Hours. Research conducted under the direction of faculty member in agricultural economics. May be repeated 3 times for credit. Prerequisites: Freshman or sophomore classification and approval of department head; see an academic advisor in Room 214 AGLS.

AGEC 314 Marketing Agricultural and Food Products
Credits 3. 3 Lecture Hours. Operations involved in movement of agricultural commodities from farmer to consumer via several intermediaries; functions involve buying, selling, transportation, storage, financing, grading, pricing and risk bearing; agricultural supply chain or value chain is studied in detail; marketing aspects of commodities and differentiated goods. Prerequisites: AGEC 105 or 3 hours of economics; and junior or senior classification.

AGEC 315 Food and Agricultural Sales
Credits 3. 3 Lecture Hours. Principles of professional sales techniques used in food and agricultural firms; develop a professional sales presentation; study current agribusiness industry professional salespersons. Prerequisite: Junior or senior classification.

AGEC 316 Building Customer Relationships in AgriFood Selling
Credits 3. 3 Lecture Hours. Use of emotional intelligence factors in developing business-to-business customer relationships for AgriFood, real estate, finance and other industrial products and services; developing customer relationships with regard to the unique aspects of technical products and services in these industries. Prerequisite: Grade of C or better in AGEC 315; junior or senior classification; approval of instructor.
AGEC 317 Economic Analysis for Agribusiness Management
Credits 3. 3 Lecture Hours. Quantitative methods used to address managerial problems, specifically calculus-based optimization, marginal analysis, elasticities, statistical and forecasting techniques, linear programming, and risk analysis; emphasis on theoretical aspects and applied analysis of managerial problems faced by agricultural firms. Prerequisites: AGEC 217; ECON 323; BUSN 203 for agribusiness majors or STAT 301, 302, or 303 for agricultural economics majors; junior or senior classification; agricultural economics, agribusiness majors only; or approval of department head.

AGEC 324 Agribusiness Entrepreneurship – Budgeting
Credits 3. 2 Lecture Hours. 2 Lab Hours. Case study approach to demonstrate a process for evaluating the economic feasibility of a single-enterprise rural or metropolitan business venture; relevant production, marketing and financing costs, in combination with capital ownership and overhead costs; computer spreadsheets including attention to deterministic sensitivity analyses; computer capabilities are essential. Prerequisites: AGEC 105 or ECON 202; ACCT 209 or ACCT 210 or ACCT 229 or ACCT 230 or AGEC 330 or FINC 341; junior or senior classification or approval of instructor.

AGEC 325 Principles of Farm and Ranch Management
Credits 3. 2 Lecture Hours. 2 Lab Hours. Agribusiness managerial decision making and analysis in different market environments; emphasis is on profit maximization; lab focuses on using computerized methods for evaluating management alternatives for farming and ranching problem situations. Prerequisites: AGEC 105 or ECON 202; junior or senior classification; knowledge of Excel.

AGEC 330 Financial Management in Agriculture
Credits 3. 3 Lecture Hours. Principles of financial management of farms, ranches, and other agribusiness firms; financial statements, financial statement analysis, time value of money, investment analysis, firm growth, risk management, credit analysis and best business management practices. Prerequisites: AGEC 105 or 3 hours of economics; ACCT 209 or ACCT 229; junior or senior classification.

AGEC 340 Agribusiness Management
Credits 3. 3 Lecture Hours. Survey of management practices using case studies to evaluate management issues in agribusiness firms in the context of the four functions of management such as planning, organizing, leading and controlling; emphasis on best practices throughout the food marketing chain; examination of how businesses and business executives succeed; application of previously learned knowledge in making business decisions similar to those encountered in professional careers. Prerequisites: AGEC 105 or 3 hours of economics; and junior or senior classification.

AGEC 344 Food and Agricultural Law
Credits 3. 3 Lecture Hours. Legal principles relevant to the farm family and business; characteristics of legal decisions and rules on property rights, and fencing laws; analysis of global, national, state, and local legal issues in contracts, torts, water, pollution, and natural resources. Prerequisite: Junior or senior classification.

AGEC 350 Environmental and Natural Resource Economics
Credits 3. 3 Lecture Hours. Inspection of issues such as environmental degradation, population growth, recycling, water use and depletion, natural habitat protection, water and air pollution, acid deposition, fishery management, and global warming using economically derived principles and tools. Prerequisite: Junior or senior classification.

AGEC 401 Global Agri-Industries and Markets - Study Abroad
Credits 3. 3 Lecture Hours. Understanding agriindustries and markets; analysis of production; importing, exporting; provides classroom experience with an exposure to a variety of global cultures in an international setting. May be taken three times for credit. Prerequisites: AGEC 105 or 3 hours of economics; junior or senior classification or approval of department head.

AGEC 402 Survey of International Agricultural Economics: Study Abroad
Credits 3. 3 Lecture Hours. Examine, from an international setting, the shape of international agriculture; how culture, history, politics and geography in foreign countries affect the production and management of agricultural products; agricultural policy formation; countries' natural resources and competitive strategies; may be taken 3 times for credit. Prerequisites: AGEC 105 or 3 hours of economics; junior or senior classification or approval of department head.

AGEC 408 Economics of Foreign Intervention, Conflict and Development
Credits 3. 3 Lecture Hours. Economic models of conflict and development; dynamic socio-political models of conflict; conflict and vulnerable groups; quantitative techniques and methods in conflict and development research; interaction between poverty, natural resources and conflict in developing countries; role of multilateral, bilateral, and strategic stakeholders in conflict resolution and promotion of economic development. Prerequisites: AGEC 105 or ECON 202 or equivalent; ENGL 104; or approval of instructor.

AGEC 413 Agricultural Cooperatives
Credits 3. 3 Lecture Hours. Historical development and principles of cooperative associations in our economic system; organizational and operational aspects of cooperatives; legal considerations, financing, management, and member relations; and future role of cooperatives. Prerequisites: AGEC 105; AGEC 314; and junior or senior classification.

AGEC 414 Agribusiness and Food Market Analysis
Credits 3. 3 Lecture Hours. Application of economic and marketing principles to contemporary food and agribusiness marketing; practical marketing management for agribusiness firms; market analysis; and marketing strategy and planning as related to the emerging trends in the global food and agribusiness sector of the economy. Prerequisites: AGEC 317; FINC 341; MKTG 321; and junior or senior agribusiness majors only.
AGEC 415 Food and Agribusiness Strategic Market Planning  
**Credits 3. 3 Lecture Hours.** Development of a market plan targeting the food and agribusiness market sector; market analysis; business propositions; action plans for executing the 4 P’s (Product, Price, Place, Promotion); monitoring and measurement. **Prerequisites:** AGEC 314 or MKTG 321 or MKTG 409; AGEC 315; junior or senior classification or approval of instructor.

AGEC 416 Sales Management and Advanced Techniques in Professional Technical Selling for AgriFood Firms  
**Credits 3. 3 Lecture Hours.** Principles and practices of sales management in food and agricultural firms; focus on business-to-business selling situations, theoretical and practical information about sales management for AgriFood firms; application of principles. **Prerequisite:** AGEC 315.

AGEC 420 Food Security, Climate and Conflict  
**Credits 3. 3 Lecture Hours.** Economic models of food production and consumption in conflict regimes; the micro-economics of violence; the dynamic relationships of climate and agricultural production; potential impacts of climate change on food and socio-political security; food security among insurgent groups; conflict resistant food systems; and the shifting relationships between poor and rich nations in relationship to climate, food and conflict. **Prerequisites:** AGEC 105 or ECON 202, junior or senior classification, or approval of instructor.

AGEC 422 Land Economics  
**Credits 3. 3 Lecture Hours.** Economic, institutional, and physical factors involved in the use and control of natural resources; includes elements of introductory land economics as a discipline, economic foundations of land economics, institutional influences on land use, and the effects of public policy on land use. **Prerequisites:** AGEC 105 or 3 hours economics; junior or senior classification.

AGEC 423 Establishing Agribusiness Entrepreneurship Networks II  
**Credit 1. 1 Lecture Hour.** Engagement opportunities with successful agri/metropolitan entrepreneurs and other professionals, focusing on strategies and tactics for starting and sustaining viable rural and metropolitan business ventures; emphasis on importance of, and how to, develop relationships with a broad spectrum of mentors. **Prerequisites:** AGEC 424 or concurrent enrollment; junior or senior classification or approval of instructor. May not enroll in AGEC 223 and AGEC 423 during the same semester.

AGEC 424 Agribusiness Entrepreneurship – Economic Analysis  
**Credits 3. 2 Lecture Hours. 2 Lab Hours.** Strategic planning regarding economic feasibility of a single-enterprise rural or metropolitan business venture; emphasis on processes for developing a comprehensive enterprise budget and construction and evaluation of risk management alternatives; exchanges with “real-world” entrepreneurs, financial experts and other management personnel; computer capabilities essential. **Prerequisites:** AGEC 105 or ECON 202; ACCT 209 or ACCT 210 or ACCT 229 or ACCT 230 or AGEC 324 or AGEC 330 or FINC 341 or FINC 409; junior or senior classification or approval of instructor.

AGEC 425 Agribusiness Entrepreneurship – Financial Analysis  
**Credits 3. 2 Lecture Hours. 2 Lab Hours.** Strategic planning regarding rural and metropolitan business ventures; emphasis on processes for developing comprehensive economics and financial prospectuses, including enterprise budgets, risk management planning, cash flow budgeting, net worth statements, income budgets, reconciliation statements and shock analysis; mentoring exchanges with “real-world” entrepreneurs, financial experts and other management personnel. **Prerequisites:** AGEC 424; and junior or senior classification.

AGEC 429 Agricultural Policy  
**Credits 3. 3 Lecture Hours.** Analysis of the causes, nature, and effects of government participation in agriculture; and interrelationship of the American agriculture and agribusiness sector with the political and economic system, public administration, and interest group representation. **Prerequisites:** AGEC 105, ECON 202 or ECON 203; ENGL 103 or ENGL 104; and junior or senior classification.

AGEC 430 Macroeconomics of Agriculture  
**Credits 3. 3 Lecture Hours.** Basic functioning of U.S. economy and relationship to agriculture; the differential effects of macroeconomic policy on disposable income, interest rates, unemployment, inflation and exchange rates; impact on agricultural commodity prices, farm input costs, net farm income, farmland values and key financial indicators. **Prerequisites:** AGEC 105 or 3 hours of economics; AGEC 317 or concurrent enrollment; AGEC 429; AGEC 330 or FINC 341 or FINC 409; and junior or senior classification.

AGEC 431 Cases in Agribusiness Finance  
**Credits 3. 3 Lecture Hours.** Financial management of agribusiness firms; advanced topics in financial statement analysis, liquidity management, investment analysis, and capital structure illustrated through examination of agribusiness cases. **Prerequisites:** AGEC 317; AGEC 340; FINC 341; and junior or senior agribusiness majors only.

AGEC 432 Rural Real Estate and Financial Analysis  
**Credits 3. 3 Lecture Hours.** Advanced topics in investment analysis; financial intermediation in agriculture; real estate markets and market analysis; and appraisal valuation. **Prerequisites:** AGEC 317 (waived for nonmajors); AGEC 330 or FINC 341 or FINC 409; AGEC 422; ACCT 210 or ACCT 230; and junior or senior classification.

AGEC 434 Rural Financial Markets and Financial Planning  
**Credits 3. 3 Lecture Hours.** Organization, structure, conduct and regulation of lending institutions serving commercial agriculture and rural borrowers; borrower financial statement analysis, business forecasting, investment analysis and loan application process; lender credit application underwriting standards, credit scoring and loan decision making process; agricultural loan portfolio analysis. **Prerequisites:** ACCT 209 or ACCT 229; ACCT 210 or ACCT 230; AGEC 330 or FINC 341 or FINC 409; junior or senior classification.
**AGEC 440 Agribusiness Strategic Analysis**  
**Credits 3. 3 Lecture Hours.** Strategic management and economic principles for the agribusiness system; problem recognition and applied managerial/economic decision making with related considerations in marketing, production, or finance for agribusiness firms. **Prerequisites:** AGEC 317; AGEC 340; FINC 341; MGMT 363; MKTG 321; and junior or senior agribusiness majors only.

**AGEC 447 Food and Agricultural Price Analysis**  
**Credits 3. 3 Lecture Hours.** Factors influencing the level of food and agricultural prices; price trends and seasonal variation; methods of forecasting demands and prices; and futures trading. **Prerequisites:** AGEC 314; AGEC 317; and junior or senior classification.

**AGEC 448 Agricultural Commodity Futures**  
**Credits 3. 3 Lecture Hours.** Activities of commodity futures exchanges; the mechanics of trading futures contracts; the use of futures trading for hedging and forward pricing; and options, basis behavior, and hedging strategies for selected commodities. **Prerequisites:** AGEC 105 or 3 hours of economics; AGEC 314; AGEC 317 or concurrent enrollment; and junior or senior classification;

**AGEC 449 International Trade and Agriculture**  
**Credits 3. 3 Lecture Hours.** Changing role of U.S. agriculture in a dynamic world economy; national and international policies and institutions affecting agriculture; and exchange rates, tariffs, and non-tariff barriers. **Prerequisites:** AGEC 105 or 3 hours of economics; and junior or senior classification.

**AGEC 453 International Agribusiness Marketing**  
**Credits 3. 3 Lecture Hours.** Basic competencies in international marketing of agri-foods; and market entry, pricing, payment, finance, and promotion. **Prerequisites:** AGEC 105 or 3 hours of economics; and junior or senior classification.

**AGEC 460 Cross-Cutting Issues in Agricultural Economics**  
**Credits 3. 3 Lecture Hours.** Examination of economic theory and its history; emphasis on the areas of agricultural business, finance, macroeconomics, management, marketing, microeconomics, quantitative analysis, resources, and economics policy; emphasis on the ability to properly analyze economic problems. **Prerequisites:** AGEC 317; AGEC 314 or MKTG 321 or MKTG 409; AGEC 330 or FINC 341 or FINC 409; AGEC 429; agricultural economics and agribusiness majors only; junior or senior classification or approval of instructor.

**AGEC 481 Ethics in Agribusiness and Agricultural Economics**  
**Credit 1. 1 Lecture Hour.** Examination of the principals of ethical business behavior; context created through assigned readings, guest speakers from various law enforcement branches and private industry; written reports about personal experiences relative to this context; attention given to establishing personal principles for an ethical business career. **Prerequisites:** AGEC 217; senior classification; agricultural economics or agribusiness majors only.

**AGEC 484 Internship**  
**Credits 0 to 6. 0 to 6 Other Hours.** Supervised experience program conducted in the area of the student’s interest in agricultural economics and agribusiness. May be taken two times. **Prerequisite:** See an advisor in Room 214 AGLS Building.

**AGEC 485 Directed Studies**  
**Credits 0 to 6. 0 to 6 Other Hours.** Special problems not covered by other courses. Content will depend upon problem studied. **Prerequisite:** See an advisor in Room 214 AGLS Building.

**AGEC 489 Special Topics in...**  
**Credits 1 to 4. 1 to 4 Lecture Hours.** Selected topics in an identified area of agricultural economics. May be repeated for credit. **Prerequisite:** Junior or senior classification.

**AGEC 491 Research**  
**Credits 0 to 6. 0 to 6 Other Hours.** Research conducted under the direction of faculty member in agricultural economics. May be repeated 3 times for credit. Registration in multiple sections of this course are possible within a given semester provided that the per semester credit hour limit is not exceeded. **Prerequisites:** Junior or senior classification and approval of department head; see an advisor in Room 214 AGLS Building.

**AGEC 495 International Agribusiness and Industry Practices**  
**Credits 0 to 3. 0 to 3 Lecture Hours.** Exposure to agribusiness operations in an international cross-cultural context and production operations, marketing and distribution of agriculture products from around the world; quantitative methods used for engaging in critical thinking about issues confronting the agribusiness industry. **Prerequisite:** AGEC 105 and junior classification.