

EMAD-EXECUTIVE MBA AEROSPACE & DEFENSE

EMAD 5302 Accounting in Aerospace and Defense 2 Credit Hours

Prerequisite: Graduate standing, departmental permission, majors only, and admission to the Executive Management in Aerospace/Defense graduate certificate program. This course will create a foundation for understanding accounting and financial management in the Aerospace and Defense (A&D) industry, including performance measurement and budgeting. This course is intended to provide students with a working knowledge of A&D financial statements, including preparation and analysis. This course includes an in-person class at the Gene Rainbolt Graduate School of Business in Oklahoma City. (Irreg.)

EMAD 5312 Information Technology and Cyber Security in Aerospace and Defense 2 Credit Hours

Prerequisite: Graduate standing, departmental permission, and admission to the Executive Management in Aerospace/Defense graduate certificate program. Information technology and cyber security are crucial in managing a business in the aerospace and defense (A&D) industry. This course will provide a basic understanding of the technical and management aspects of data communications, networking infrastructure, and cyber security concepts for A&D. (Irreg.)

EMAD 5322 Managing Supply Chain and Logistics in Aerospace and Defense 2 Credit Hours

Prerequisite: Graduate standing, departmental permission, and admission to the Executive Management in Aerospace/Defense graduate certificate program. Supply chain and logistics are crucial in the aerospace and defense industry. A&D firms are attempting to improve their competitive positions by managing the flow of raw materials, work-in-process inventories, and finished goods. This course covers managing the supply chain that plans, sources, makes, and delivers an A&D organization's goods and/or services, from suppliers of raw materials to customer. (Irreg.)

EMAD 5332 Legal Environment for Aerospace and Defense 2 Credit Hours

Prerequisite: Graduate standing, departmental permission, and admission to the Executive Management in Aerospace/Defense graduate certificate program. This course examines the A&D industry contract vehicles, contract performance management, and regulation management and federal statutory law. Students will learn the legal and ethical environment of A&D business. The course provides necessary background on traditional A&D business law topics, including A&D contracting. This course includes an in-person class at the Gene Rainbolt Graduate School of Business in Oklahoma City. (Irreg.)

EMAD 5342 Project Management for Aerospace and Defense 2 Credit Hours

Prerequisite: Graduate standing, departmental permission, and admission to the Executive Management in Aerospace/Defense graduate certificate program. This course develops the knowledge, skills, tools, and techniques to initiate, plan, execute, monitor, and control activities related to meeting A&D project requirements. It focuses on the theoretical foundations and practical applications of project management along with the IT tools to support project planning, budgeting, scheduling, cost analysis, resource leveling/control, and human resource management in A&D organizations. (Irreg.)

EMAD 5352 Global Aerospace and Defense Strategy 2 Credit Hours

Prerequisite: Graduate standing, departmental permission, and admission to the Executive Management in Aerospace/Defense graduate certificate program. This course develops an innovative mindset to deal with global complexity, barriers to international trade, and human resource challenges. Students are provided with the evidence, concepts, and models for understanding company performance in a global world and the issues facing executives in the early 21st century. (Irreg.)

EMAD 5362 Field Project in Aerospace & Defense (Analysis) 2 Credit Hours

Prerequisite: Graduate standing, departmental permission, and admission to the Executive Management in Aerospace/Defense graduate certificate program. This course provides experiential learning in the aerospace and defense industry by having students apply knowledge from the classroom and work experience to analyzing problems facing A&D organizations. Field projects will deal with scoping the problem under study, structured analysis of the problem including data collection from internal and external sources, and development of recommendations, solutions, and timeline for implementation. (Irreg.)

EMAD 5372 Field Project in Aerospace & Defense (Implementation) 2 Credit Hours

Prerequisite: Graduate standing, departmental permission, admission to the Executive Management in Aerospace/Defense graduate certificate program, and B AD 5362. This course provides experiential learning in the aerospace and defense industry by having students apply their knowledge from the classroom and their work experience to implement solutions and recommendations developed in B AD 5362 or those provided by the client organization. They will also include the development of a prototype, a pilot implementation of the solutions, and outcome testing. (Irreg.)

EMAD 5382 Quantitative Methods & Models for Aerospace & Defense 2 Credit Hours

Prerequisite: Graduate standing and departmental permission, or admission into the Executive Master of Business Administration in Aerospace & Defense program. This course focuses on understanding and applying quantitative methods and models in the context of Aerospace & Defense (A&D). The course content is organized around three modules: summarizing quantitative data, relating and comparing data, and predicting outcomes based on sample data. The topics covered in these modules include descriptive statistics, associative statistics, regression, multiple regression, and inferential statistics. (Irreg.)

EMAD 5392 Organizational Behavior in Aerospace & Defense Organizations 2 Credit Hours

Prerequisite: Graduate standing and departmental permission, or admission to the Executive Master of Business Administration in Aerospace & Defense program. This course deals with the need for managers to understand behavior in organizations and the challenges they face. It discusses individual differences, employee motivation, and effective job design, and how organizations should select, retain, and evaluate employees. The course discusses group dynamics, team management, effective communication, managing conflict, employee stress, and career management issues. (Irreg.)

EMAD 5402 Aerospace and Defense Marketing Fundamentals 2 Credit Hours

Prerequisite: Graduate standing and departmental permission, or admission into the Executive Master of Business Administration in Aerospace & Defense program. The traditional role of marketing management is enlarged to include the development, implementation, and control of marketing strategies in the aerospace/defense organization. Emphasis is on the strategic marketing process in the dynamic aerospace/defense business environment. Strategic marketing decisions, analysis, and issues are integrated with the goal of achieving customer satisfaction to gain a sustainable competitive advantage within the aviation industry. (Irreg.)

EMAD 5412 Innovation and Entrepreneurship in Aerospace & Defense 2 Credit Hours

Prerequisite: Graduate standing and departmental permission, or admission into the Executive Master of Business Administration in Aerospace & Defense program. This course introduces skills and techniques that enable the development of innovative and entrepreneurial strategies in aerospace and defense. We also evaluate approaches to developing an innovative, entrepreneurial culture in environments where science- and technology-related activities are critical for effective operations. The course will analyze the challenges posed by complex organizations and highlight methods to deal with them. (Irreg.)

EMAD 5422 Lean Six Sigma Tools for Aerospace & Defense 2 Credit Hours

Prerequisite: Graduate standing and departmental permission, or admission to the Executive Master of Business Administration in Aerospace & Defense program. The course introduces the fundamental Lean Six Sigma concepts within a business organization. It covers the basic concepts within Six Sigma and Lean techniques, and introduces tools for measurement and process improvement metrics in organizations through the DMAIC process. The course has a strategic foundation in which we review the strategic use of techniques, ensuring a positive result upon implementation. (Irreg.)

EMAD 5432 Advanced Financial Management in Aerospace & Defense 2 Credit Hours

Prerequisite: Graduate standing, EMAD 5302 and departmental permission, or admission into the Executive Master of Business Administration in Aerospace & Defense program. This is a comprehensive course in corporate financial management and analysis. The course builds on the main concepts of the core Accounting course (EMAD 5302). The primary objective is to develop the skills necessary to value firms and optimize a corporation's capital structure in the Aerospace and Defense Industry using varying finance methods. (Irreg.)

EMAD 5442 Mergers and Acquisitions in Aerospace and Defense 2 Credit Hours

Prerequisite: Graduate standing and departmental permission, or admission into the Executive Master of Business Administration in Aerospace & Defense program. This course studies the design and valuation of deals to acquire or divest corporate assets. We study M&A transactions, applying them to the aerospace and defense industry through case-based methods. We explore how the legal system, accounting rules, and tax incentives affect outcomes of M&A transactions. We analyze types of M&A transactions, their motivations, and their effects on corporate value. (Irreg.)

EMAD 5452 Managing Aerospace & Defense Government Contracts 2 Credit Hours

Prerequisite: Graduate standing and departmental permission, or admission into the Executive Master of Business Administration in Aerospace & Defense program. This course introduces the procurement and contracting processes used in the aerospace and defense (A&D) industry. Students will gain an understanding of best practices from both government and industry perspectives, including subcontracting. The course will navigate the highly complex federal acquisition process including governance and operational roles. The course emphasizes government contracting but also discusses private sector contracting in A&D. (Irreg.)

EMAD 5472 Data Management and Security in Aerospace & Defense 2 Credit Hours

Prerequisite: Graduate standing and departmental permission, or admission to the Executive Master of Business Administration in Aerospace & Defense program. Every organization is concerned with data management. Data must be stored effectively and securely so it can be retrieved to support decision making. These issues are particularly relevant for the A&D industry, an environment where extra measures must be taken in all aspects of security. The objective is to provide a basic understanding of data management and security. (Irreg.)

EMAD 5482 Data Analytics for Aerospace & Defense 2 Credit Hours

Prerequisite: Graduate standing and departmental permission, or admission to the Executive Master of Business Administration in Aerospace & Defense program. Data analytics is becoming increasingly important for every industry, and it is especially important in the aerospace and defense (A&D) industry. The objective of this course is to provide a basic understanding of data analytics in A&D. (Irreg.)

EMAD 5602 The Future of Space 2 Credit Hours

Prerequisite: Graduate Standing and Departmental Permission. This course focuses on the future of a commercial space application, the history of manned and unmanned space flight, and recent commercial ventures in space along with new innovations in the realm of possibility as space travel and launches are becoming more accessible. The course will also look at political developments and the current business climate for space. (Irreg.)

EMAD 5622 Space and Small Business: Business Opportunities in the Space Economy 2 Credit Hours

Prerequisite: Graduate Standing, Majors Only, and Departmental Permission. This course examines the current status and evolving nature of business opportunities in the expanding commercial space sector. Once the domain of governments and large aerospace and communications corporations, the space economy is now ripe with opportunities for new entrants. The course will survey the large-scale trends and dynamics driving this renaissance. (Irreg.)

EMAD 5642 Private Equity and Investment in Space 2 Credit Hours

Prerequisite: Graduate Standing and Departmental Permission. With the declining cost of sending payload into lower orbit, many new startups are forming around the concept of commercializing space. This course reviews the basics of setting up term sheets for new ventures and presents real opportunities to pitch their new venture to tap into this new market. (Irreg.)

EMAD 5960 Directed Readings 1-3 Credit Hours

1 to 3 hours. Prerequisite: graduate standing and permission of department. May be repeated; maximum credit twelve hours. Directed readings and/or literature reviews under the direction of a faculty member. (F, Sp, Su)