941. International Business Research Issues

Spring of odd years. 3(3-0) P: MSC 940. R: Open only to Ph.D. students.

Scientific methods of research on international business. Topics include cultural bias and organizing multi-country studies.

SA: ML 941, MTA 941

990. Independent Study

Fall, Spring. 1 to 3 credits. A student may earn a maximum of 6 credits in all enrollments for this course. R: Open only to Ph.D. students.

Intensive reading and research on a marketing topic of mutual interest to a faculty member and a Ph.D. student.

SA: ML 924, MTA 924

Directed Research Paper

Fall, Spring, Summer. 1(1-0) R: Open only to Ph.D. students in the Department of Marketing and Supply Chain Management.

Production of research paper under the direction of a senior faculty member.

SA: ML 995, MTA 995

Doctoral Dissertation Research 999.

Fall, Spring, Summer. 1 to 24 credits. A student may earn a maximum of 99 credits in all enrollments for this course. R: Open only to Ph.D. students in the Department of Marketing and Supply Chain Management. Approval of department. SA: ML 999, MTA 999

MASTER OF BUSINESS ADMINISTRATION **MBA**

The Eli Broad College of Business and The Eli Broad Graduate School of Management

800. The Global Organization and the Firm's Strategic Position

Fall, Spring. 3(3-0) R: Open only to MBA students.

Organizational goals, design, and control of the global business enterprise. Strategies for implementing new organizational forms. Defining the value chain, competitive positioning, and sustainable competitive advantage.

Accounting and Financial Strategies

Fall, Spring. 5(5-0) R: Open only to MBA students.

Financial accounting model, valuation, and reporting concepts and uses. Time value of money, interest rates, valuing securities, financial statement analysis, and cash flows. Budgeting, decision analyses, cost estimation and accumulation, capital budgeting, and international financial concepts.

Applied Data Analysis for Managers

Fall, Spring. 2(2-0) P: STT 315. R: Open only to MBA students. Not open to students with credit in

Analysis of business and economic data to support managerial decision-making. Building, interpreting, and applying regression models. Time series and forecasting. Offered half of se-

806. **Business Ethics and Critical** Thinking Concepts

Fall, Spring. 1(1-0) R: Open only to MBA students

Creating a critical thinking approach to business problem solving. Developing a framework for identifying, analyzing, and resolving ethical dilemmas in business. Offered half of semester.

814. Applied Economics

Fall, Spring. 2(2-0) R: Open only to MBA stu-

The economic view of the firm. Modeling market mechanics in supply and demand, marginal concepts, elasticity, market characteristics, pricing with market power, and strategic behavior. Applications to business problems and situations. Principal-agent relationships and wealth maximization. Offered half of semester.

816. **Business Presentations**

Fall, Spring. 1(1-1) R: Open only to MBA students.

Development of effective interpersonal communications skills. Emphasis is on oral communications in business settings.

Managing the Firm's Value Chain Spring, Summer. 5(5-0) P: MBA 800. R: Open only to MBA students.

Integration of product innovations, marketing strategies, supply chain strategies, and regulatory environment. Global marketing strategies and consumer behaviors. Coordination of purchasing, manufacturing, operations, and logistics to enhance competitiveness.

Financial Management

Spring, Summer. 2(2-0) P: MBA 802. R: Open only to MBA students.

Investment decisions by firms. Value creation, risk and return, pricing models, and financial markets. Financing alternatives, market efficiency, capital budgeting, and leverage and risk relationships. Optimizing firm value. Agency problems and effects on investment and financing decisions. Offered half of semester.

824. Managing the Workforce

Spring, Summer. 3(3-0) R: Open only to MBA students.

Role of workforce management in carrying out the goals and mission of the organization. Theories and applications of management principles to acquiring, motivating, and rewarding employees and structuring their work. Legal, domestic, and internationalissues in the workplace.

826. International, Comparative, and **Cross-Cultural Business**

Spring, Summer. 2(2-0) R: Open only to MBA students

Defining international businesses' approaches to global markets, economic trade issues, methods of entry, and organizational alternatives. Crosscultural differences and their impacts on business practices. Trade agreements, strategic alliances, negotiations, and cultural consequences. Offered half of semester.

840. Applied Business Experience

Fall, Summer. 3(0-9) R: Open only to MBA students.

Student teams work on projects in organizations identified by a company sponsor and approved by a faculty adviser.

850. Integrative Case Experience and Future Global Strategies

Fall, Spring. 2(2-0) R: Open only to MBA students

Future trends in management. Strategic positioning of organizations for success. An integrative case experience focusing on a specific corporate situation. Use of library and computer network sources. Case presentation to faculty and business managers.

MBA Internship Experience

Fall, Spring, Summer. 1 credit. A student may earn a maximum of 2 credits in all enrollments for this course. P: Completion of at least one semester in the MBA program. R: Open to to MBA students except students in the Advanced Management Program or Program in Integrative Management.

Internship in business organizations; application of business knowledge and management techniques in a work environment.

MATERIALS SCIENCE AND MECHANICS **MSM**

Department of Materials Science and Mechanics College of Engineering

Engineering Communications Fall, Spring. 3(2-3) P: (MTH 116 or concurrently)

or (LBS 117 or concurrently) or (MTH 132) or (MTH 103 and MTH 104)

Computer-aided design and drafting. Freehand sketching. Two and three dimensional visualization. Preparation of spread sheets and technical reports.

Statics

Fall, Spring. 3(3-0) P: (MTH 132 or LBS 118) Vector description of forces and moments. Two and three dimensional equilibrium of particles and rigid bodies. Analysis of trusses, frames and machines. Coulomb friction.

Mechanics of Deformable Solids

Fall, Spring. 3(3-2) P: (MSM 205) and (MTH 133 or concurrently or LBS 119 or concurrently) Tension compression and shear stresses. Axially loaded bars. Torsion of circular shafts. Beam theory. Combined stresses. Mohr's circles. Columns.

250. Materials Science and Engineering

Fall, Spring. 3(3-2) P: (CEM 141 or CEM 151 or LBS 165)

Structure of metals, ceramics and polymers. Phase diagrams, thermomechanical treatments, physical and mechanical properties, diffusion, microstructure studies, environmental effects.

306 **Dynamics**

Fall, Spring. 3(3-0) P: (MSM 205) and (MTH 235 or LBS 220) R: Open only to students in the College of Engineering.

Kinematics of particles, rigid bodies, and mass moments of inertia. Kinetics of particles and rigid bodies. Energy and momentum principles.