
Supply Chain Management and Technology

Professor: Jorge Fernández García
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Objectives

The course objectives are the following ones:

- > Understand what is Supply Chain Management, including:
 - its materials, information and capital flows,
 - the 3 levels of Supply Chain,
 - Supply Chain Models.
- > Understand major challenges to effective Supply Chain Management, including:
 - empowerment of Corporate Strategy,
 - information technology,
 - international issues,
 - reverse logistics,
 - demand variability,
 - time compression and
 - financial issues.
- > Develop Supply Chain practices that can be implemented within organizations.
- > Develop an understanding of the use of Technologies to manage, empower and add value to Supply Chain Management.

Description

Supply Chain Management is considered one of today's "hottest" business topics. This course is designed to help you understand how to design Supply Chain Strategies as well as the fundamentals of managing Supply Chains with emphasis on Technologies.

The goal is to cover the following key areas: the strategic role of the supply chain; key drivers of supply chain performance; analytical tools and techniques for supply chain analysis; and the use of technologies as a facilitator, planning and control with a complex supply chain.

Contents

Master Class 1: Introduction to Supply Chain Management

Master Class 2: Supply Chain Strategy

Master Class 3: Tactical Supply Chain Management

Master Class 4: Operational supply Chain Management

Master Class 5: Technology and Supply Chain Management: Software Packages

Master Class 6: Supply Chain Management Risk and Security Management

Master Class 7: Supply Chain Management Sustainability. Globalization and International Challenges to Supply Chain Management.

Master Class 8: Presentation of a leader Software Solution: SLIM4 from SLIMSTOCK.

Master Class 9: Presentation of a leader Software Solution.

Master Class 10: Supply Chain Management 2.0 and new trends.

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Methodology

The methodology proposed is based on relevant theoretical material with a selection of applied cases and exercises to practice theory. These ones will be doing either in the class or in groups at home. Some reading material will be distributed before some sessions. Students are expected to read the assigned materials before coming to class.

There is no textbook for this course. Instead, in the bibliography of the master classes there is a variety of suggested reference books to review, detail and enhance concepts developed during the course.

Real presentations and demonstrations of leader SCM software vendors will be performed in class by their key consultants. The students will analyze those solutions as part of their final case study (in groups).

This is:

- > Lectures / Master Classes.
- > Case discussions.
- > Exercises.
- > Demonstrations of Supply Chain Software Solutions.
- > Group Projects.

Evaluation criteria

This course is graded from 0 to 100 points, and its evaluation will be determined on the following basis:

- > 6 Case Reports (in teams) 30%
- > 1 Case Study (in teams) 15%
- > Session 10: Attendance 5%
- > Class Participation 10%
- > Final Exam 40%

To pass the subject: Final Exam should be passed (more than 50 p./100) and global score must be over 60%.

Class Participation

Class participation is required. Effective class participation requires you to:

- > Prepare the assigned materials before the class session.
- > Quality of participation is what counts: If you do not have a response, say so.
- > Regularity in participation is expected. Aim at participating in every case or exercise.
- > Attending class is a necessary, but not a sufficient condition for participation credit.
- > Come in on time and stay in the same seats (if possible) through the semester.

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Homework Assignments

An assignment composed by questions about the business case discussed in class will be required for every class (preparation works and reports). These assignments will be required to be done alone and discussed in groups in class. Questions for every assignment will be posted during the class as well as date to deliver it. As a general rule every assignment will be returned to the professor one week after assignment questions were posted.

Your homework assignments will be graded only on whether they are turned in on time.

Final Case Study

Students will have to complete and present (in the last session) a complete Case Study in teams, applying on it the acquired knowledge along the course (concepts, methods and techniques). The Case Study will be based on a Software SCM Evaluation and Recommendation as to be presented to a Managerial Board. The company must be chosen by each group and approved by the professor.

Final Exam

A final exam will be done to evaluate how students have followed and understand the course. Final exam will have two parts, a theoretical and a practical one based on contents developed at class as well as logical conclusions derived by contents.

IMPORTANT

"Students are required to attend 80% of classes. Failing to do so without justified reason can have important consequences in your final grade.

As with all courses taught at the UPF Barcelona School of Management, students who fail the course during regular evaluation will be allowed ONE re-take of the examination/evaluation. If the course is again failed after the re-take, students may have to register again for the course the following year.

Plagiarism is to use of another's work and to present it as one's own without attributing the sources in the correct way. All essays, reports or projects handed in by a student must be original work completed by the student. By enrolling at a Barcelona School of Management Master of Science and signing the "Honour Code," students acknowledge that they understand the Barcelona School of Management's policy on plagiarism and certify that all course assignments will be their own work, except where indicated by correct referencing. Failing to do so may result in automatic expulsion from the program."

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Bio of the professor

Education

- > Degree, Physics (specialty in Theoretical Physics), 1983–1988 (University of Barcelona).
- > Post-degree, Course/Certification of Teaching Abilities, 1987–1988 (Polytechnic University of Catalonia).
- > Post-degree, Executive Development Program (PDD), 1994–1995 (IESE Business School - University of Navarra).

Experience

Strategy consultant, specialist in Leading, Defining, Designing and Implementing Deep Strategic Business, Corporate and Operational Transformations and Business Models in multiple sectors, applying the last discoveries in Neuroscience (NeuronStrategy) at all levels (from Top Strategy -Mission, Vision, Values and Strategic Objectives of the Company- to any specific area in the organization or any Top Management support).

Jorge founded its own strategic consultancy in 2007, Kernel Business Consulting. The key issue to maximize Effectiveness, Business Results and Scope is its NeuronStrategy Methodology. It's unique and multiplies the capabilities to impact and obtain Benefits in our Clients with the Highest Effectiveness, unreachable those under any other Business or Consulting Model, through the application of the last discoveries in Neuroscience to Innovation (disruptive), to Best Practices in Top Strategic Consulting and to KERNEL BC's Services and Knowledge Management Models.

At the same time, his experience in Top Management and his Consulting Projects background gives KERNEL BC a unique approach to business and operational issues: "From Managers to Managers", KERNEL consultants acting as Leaders or helping to guarantee that all projects and all participants are always aimed and aligned with the same Strategic Objectives and are obtaining the Proper Business Goals within Schedule and Budget.

Specialties

- > Strategic Business and Operational Planning Definition, Design and Implementation applying the last discoveries in Neuroscience (NeuronStrategy).
- > Disruptive Innovation (Neuro-Innovation) Strategy and Management.
- > Change Management.
- > CRM (Collaborative, Analytic and Operational / Commercial Processes).
- > ERP Strategic Definition, Selection and Implementation Management.
- > Internationalization.
- > Corporate Performance Management (CPM).
- > Balance Scorecard (BSC) Definition, Design and Implementation.
- > Alignment with Business Strategy in IT Governance.
- > Lean Cost Reduction.
- > Consulting and Adding Value in Corporate Finance.

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Other merits

Three books and more than thirty articles published (1983-1990) -most of them about his own research activities (in Special and General Relativity)-, Book published (1993) by the UB (University of Barcelona) used as text of reference in the 5th course of Physics Degree.

Several projects considered "Best Practices" and "Success Stories" by ESADE, IESE, Siebel, SAP, Deloitte, Arthur Andersen.

He is interviewed in the book "Personajes de Cataluña" published by the prestigious journalist César Liesa (2010).

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