

NATIONAL UNIVERSITY OF SINGAPORE
School of Business
Department of Decision Sciences

DSC3202 Purchasing and Materials Management

Lecturer: Keith B. Carter

Session: Semester I, 2015/2016

Curriculum for Purchasing and Materials Management (P&MM)

Best-in-class Purchasing and Materials Management (P&MM) functions support corporate performance by delivering the appropriate balance of Cost, Quality and Speed-To-Market. The function can include sourcing, costing, supplier relations, logistics, and goods storage.

While organizations buy varying combinations and amounts of raw materials, manufactured parts/components, and services, they all have to perform this procurement function efficiently and effectively. In many organizations, the value of purchased goods and services could account for more than 80% of their total spending. Therefore, P&MM represents a significant area for generating competitive advantage by improving Cost of Goods Sold (COGS) and SG&A (Sales and General Administration).

Students will learn about supply chain strategy, and then align the P&MM strategy and tactics. Negotiations, supplier relationship management (SRM), contract performance management, and Actionable Intelligence are foundational elements in the class.

Each class session is run as a business meeting with regular coaching on how to be prepared for the business environment including: ideation sessions, making persuasive arguments, and delivering business cases.

The class also has speakers from industry to discuss real-world situations.

In this course students will learn how to deliver best-in-class P&MM results by:

- Studying P&MM strategy, tactics and capabilities used by corporations today
- Practicing negotiations in-class
- Delivering senior management level presentations with cost/benefits of recommended strategies and tactics

By the end of the course, students will be ready to be active and contributing members of a P&MM function. They will have the foundational knowledge to support senior management in strategy development and building cases for tactical improvements in People, Processes, and Technology.

Assessment Methods

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| Individual Assignments | 15% |
| Class Participation | 5% |
| Midterm | 20% |
| Group Activity | 20% |
| Final Group Project | 40% |

Course Schedule & Contents

| Session | Lecture Topics | Readings and Learning Outcomes |
|---------|---|---|
| 1 | <p>Overview of Purchasing and Materials Management Course:</p> <p>Class Activity: Introductions</p> | <p>Readings: None</p> <p>Learning Outcomes: Challenging what you thought you knew about purchasing</p> <p>Overview of the course</p> |
| 2 | <p>Supply Chain and Procurement Organization and Strategy</p> | <p>Reading: Introductions to Procurement (short readings)</p> <p>Learning Outcomes: How does corporate strategy drive purchasing? Link the type of procurement with the strategy? What are the key drivers of purchasing? What are the basic measurements for success? What are the responsibilities for purchasing managers?</p> |
| 3 | <p>Typical Day in the Life of a Procurement professional</p> <p>Class Activity: Try out procurement software as part of the purchasing workflow</p> | <p>Readings: Ch 6: Purchasing Procedures and Supporting Tools Ch 7: Supplier relationships</p> <p>Learning Outcomes: What does a purchasing professional do? What systems do they use? Work on actual purchasing documents.</p> |
| 4 | <p>Managing Procurement Data and Measuring Success</p> <p>Class Activity: Practice procurement processing</p> | <p>Readings: Ch 11 Sourcing and management of suppliers Ch 12 Managing purchase prices</p> <p>Learning Outcomes: Understand what "good" looks like in procurement How do we measure suppliers, buyers, and linkage with the company performance, ABC, VRR, GQMS</p> |

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| 5 | <p>Linking Procurement with Finance</p> <p>Class Activity:</p> <p>Supply/demand matching process</p> | <p>Readings: EVA / SCOR Impact Article Ch 10 Matching Supply with Demand Ch 14 Buying from Overseas Ch 16 Support tools</p> <p>Learning Outcomes: How can we show that procurement helps the balance sheet, P&L statement and cashflow? Learn how to leverage INCO terms, low-cost location, leadtimes, taxes and currencies. Use Newsvendor, EOQ and more</p> |
| 6 | <p>Procter & Gamble In Class Discussion on Purchasing</p> | <p>Read: P&G Preparation materials</p> <p>Learning Outcomes: P&G procurement practices. Supplier Selection and benchmarking.</p> |
| | RECESS WEEK | |
| 7 | In Class Midterm | Demonstrate knowledge learned so far in the course |
| 8 | Best practices in Procurement | <p>Read : Article - Designing for Supply Chain Ch 8 Purchasing: product innovation Ch 9 Specifying and managing product quality</p> <p>Learning Outcomes: Kaizen, TQM, use Qlikview Decide how to help a company with their procurement situation</p> |
| 9 | Continuing a Day In The Life of a Purchasing Professional: Being Prepared to Win the Negotiation | <p>Read: Negotiation Concepts Resources Ch 15: Negotiation</p> <p>Learning Outcomes: Performing negotiations</p> |
| 10 | Negotiation and Simulation | <p>Read: Ch 13: Contrasting Approaches to Supply</p> <p>Learning Outcomes: Practice with more complex negotiations</p> |
| 11 | <p>Warehouse Visit (Date may be Changed)</p> <p>Or Supply Chain Simulation Activity</p> | <p>Reading: 3rd Party Logistics background material</p> <p>Learning Outcomes: What should be considered when buying services? What are the key benefits of outsourcing logistics? Knowledge of the warehouse operation and key functions.</p> |
| 12 | Final Case Reviews & Poster Contest | <p>Learning Outcomes: Demonstrate how all learnings fit together</p> |
| 13 | Final Case Reviews & Poster Contest | <p>Learning Outcomes: Demonstrate how all learnings fit together</p> |