

#### **COURSE SYLLABUS**

Course: SPCM 3623 Purchasing and Inventory Systems

Prerequisite: SPCM 3613

## **Course Description:**

Management of the purchasing function, including organization, procedures, supplier selection and development, quality control, price determination, global sourcing, and methods of inventory control.

# **Course Purpose:**

The intent of this course is to rigorously examine logistics operations associated with fulfilling the firm's raw materials requirements (inbound logistics). The primary activity of interest will be materials management – this includes determining materials requirements, sourcing and obtaining materials, and monitoring materials usage. Purchasing policies and procedures (such as the negotiation of new supply arrangements and the management of existing vendor relationships) will be considered as will other issues associated with resupply including transportation planning and inventory control.

## **Course Materials:**

Course packet (can be purchased in U of A bookstore)

#### **Course Requirements:**

Access to a laptop computer and MS Excel. Note that the laptop computer will be needed for inclass exercises. If you do not have access to a laptop, one may be checked out at the Arkansas Union GACL. Please see link for details, <a href="http://its.uark.edu/equipment">http://its.uark.edu/equipment</a> checkout.html.

## **Course Objectives:**

The objectives of this course are the development of:

- An understanding of purchasing issues that affect the firm as it attempts to accomplish its goals.
- A knowledge of various analytical techniques used to address materials management and inventory control problems.
- An ability to communicate results and recommendations stemming from the analysis of logistics systems and functions.

#### **Course Activities:**

Format: The format of the course will be lecture, discussion and collaborative spreadsheet analysis. *Students are strongly encouraged to take detailed lecture notes*. In addition, supporting materials will be made available on the course website on BlackBoard (http://learn.uark.edu/).

# **Examinations:**

There will be four examinations. They will be given on the dates indicated below (see attached schedule). Further information on the exams will be provided later in the semester. A doctor's note is required if you have to miss an exam. Unexcused absences will result in a grade of 0 points (F). Please note that only one make-up exam will be given in this class. This exam will cover ALL the material covered throughout the semester. The format of the make-up exam will be similar to that of the other exams. No further study guides or information on the composition of this exam will be provided. Failure to take the make-up exam on the specified day and time see attached schedule) will result in a grade of "F" (0 points) for the missed exam.

<b>Grading:</b>	Weight
Midterm exam 1	25%
Midterm exam 2 (Excel)	15%
Midterm exam 3	25%
Final exam	30%
Class participation:	5%

### The grading scale is defined as follows:

A = 90% and higher

B = 80% to 89%

C = 70% to 79%

D = 60 to 69%

F = less than 60%

### **Disruptive Behavior:**

Students and instructors each have an important role in maintaining a classroom environment optimal for learning, and are expected to treat each other with respect during class, using thoughtful dialogue, and keeping disruptive behaviors to a minimum. Behaviors that can be disruptive include the use of abusive language, chatting and whispering during class, the use of electronic equipment, reading the paper during class, preparing to leave before class is over, and consistently arriving late to class. Please keep these disruptions to a minimum. Repeated disruptive and/or inappropriate behavior in the classroom may result in a request to leave the class and/or a referral to the Office of Community Standards and Student Ethics and/or severe class participation grade penalties.

### **Academic Dishonesty:**

"As a core part of its mission, the University of Arkansas provides students with the opportunity to further their educational goals through programs of study and research in an environment that promotes freedom of inquiry and academic responsibility. Accomplishing this mission is only possible when intellectual honesty and individual integrity prevail."

"Each University of Arkansas student is required to be familiar with and abide by the University's 'Academic Integrity Policy' which may be found at http://provost.uark.edu/. Students with questions about how these policies apply to a particular course or assignment should immediately contact their instructor."

# **Inclement Weather:**

The University administration determines if classes are canceled due to inclement weather; I do not cancel class due to inclement weather. Therefore, you should rely on any announcement by the University administration with respect to class cancellation. The most current information regarding University closings is available from the University of Arkansas Weather Hotline (575-7000), which is updated by 6 a.m. on the day in question, and the University of Arkansas Home Page (www.uark.edu). Also, KUAF 91.3 FM, the University's public radio station, is good source for receiving information about whether the University is closed and classes are cancelled. If the University remains open, no announcement will be made through radio and television stations off campus. Should we have bad weather during this semester, I expect you to use your best judgment regarding attending class.

## **Special Needs:**

Any student with special needs should bring this to the attention of the instructor as soon as possible, but no later than the second week of class. Special testing accommodations must be requested in writing from the instructor no later than two weeks prior to the test date.

### **Schedule:**

This schedule is tentative and subject to change at the instructor's discretion. Any changes to this schedule will be announced in class and on BlackBoard.

Session # Day Date Laptop Topic

1 T 21-Aug Introduction and overview

2 TH 23-Aug Purchasing: Importance and metrics

3 T 28-Aug Purchasing: Scope of authority, organization, and strategies

4 TH 30-Aug Quality: Introduction to quality management and control

5 T 4-Sep Quality: Quality control (cont'd)

6 TH 6-Sep Quality: Quality control (cont'd)

7 T 11-Sep Quality: Quality control (cont'd)

8 TH 13-Sep Quality: Quality control (cont'd)

9 T 18-Sep Exam Review

10 TH 20-Sep Exam 1

11 T 25-Sep Introduction to inventory management

12 TH 27-Sep Inventory mgmt.: Dependent demand

13 T 2-Oct No class - CSCMP

14 TH 4-Oct Inventory mgmt.: Review of deterministic models (EOQ)

15 T 9-Oct # Inventory mgmt.: Inventory models for stochastic demand

16 TH 11-Oct # Inventory mgmt.: Inventory models for stochastic demand (cont'd)

17 T 16-Oct # Inventory mgmt.: The optimal R,Q policy

18 TH 18-Oct # Inventory mgmt.: The managerial R,Q policy

T 23-Oct # Inventory mgmt.: Risk pooling

TH 25-Oct # Inventory mgmt.: Risk pooling

19 T 30-Oct # Inventory mgmt.: The managerial R,Q policy

20 TH 1-Nov # Inventory mgmt.: Risk pooling

21 T 6-Nov # Inventory mgmt.: Newsvendor model

22 TH 8-Nov # Exam 2 (Excel)

23 T 13-Nov Inventory mgmt.: Review

- 24 TH 15-Nov Exam 3
- 25 T 20-Nov Price analysis
- 26 TH 22-Nov Thanksgiving Break
- 27 T 27-Nov Supply mgmt.: Transportation carrier selection
- 28 TH 29-Nov Supply mgmt.: Make-or-Buy
- 29 T 4-Dec Supply mgmt.: Supplier selection and relationship mgmt.
- 30 TH 6-Dec Makeup Exam
- 13-Dec Final Exam 8:00 am 10:00 am