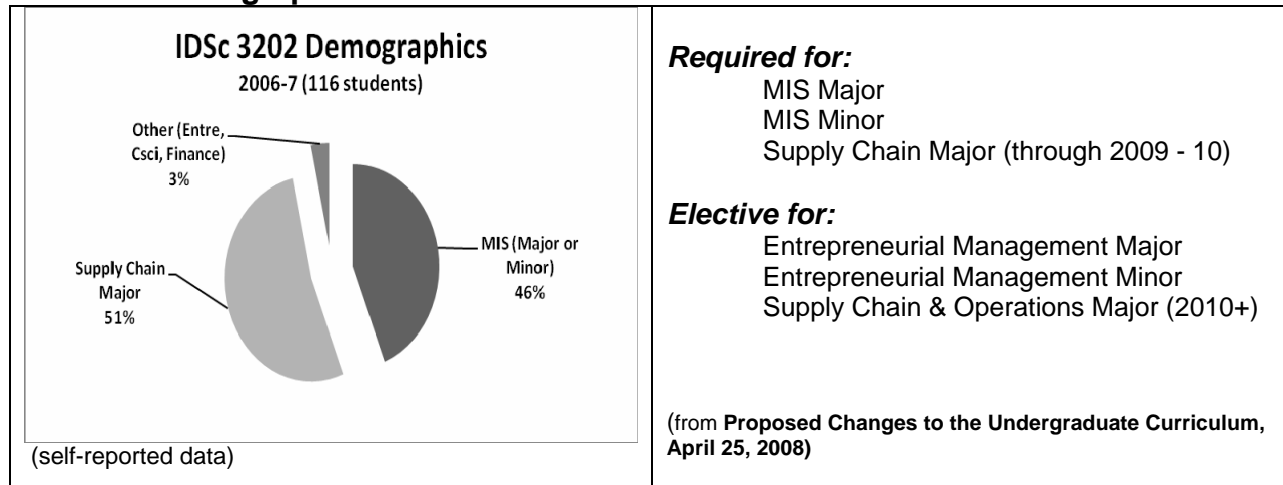


Student Demographics



Course Overview

We have all felt the increasing market pressure toward shorter product and service life cycles. This has led organizations to sharpen their abilities to optimize and automate their business processes. These process improvement projects occur:

- across all business disciplines: finance, supply chain, operations, human resources
- in all types of enterprises:
 - ✓ from Fortune 100 companies to single-person start ups
 - ✓ from international public companies to local nonprofits

However, even optimized, automated processes are only a means to an end. They produce benefits **only** when MIS and business management work together to effectively plan and design processes that support business objectives.

This class focuses on **improving and automating key business processes**. It covers critical skills for those with career goals including: business analyst, supply chain manager, operations manager, finance manager, MIS manager, project manager, and other process-oriented roles in today's enterprises.

My Perspectives

- **Importance**
- **Emphasis:** Business Analyst role (lead Analysis & Transition, monitor Design & Implementation)
- **Analyst Role:** Ambiguity -> Clarity
- **Projects :**
- **Cases:** Used to **reinforce** principles
- **Supporting Software Tools**
- **UML/ traditional approaches**

Learning Outcomes

1. **Describe the vocabularies, concepts, and frameworks** of business processes, project selection, and alternative project methodologies.
2. **Discuss and compare organizational models** for process improvement projects: MIS and business management roles.
3. **Analyze business processes** and make recommendations for automation, improvement, or re-design.
4. **Kick off business process improvement projects** by creating effective Initiation and Plan Phase documents.
5. **Diagram** business processes and data using typical business analyst tools (use cases, data flow diagrams, entity diagrams) and software (MS Visio and MS Access).
6. **Evaluate Design Phase, Implementation Phase, and Transition Phase approaches**, and describe the responsibilities of business management and of MIS in each phase.
7. **Synthesize class material** by working effectively on a cross-functional team to initiate, plan, analyze, and prototype a small business process improvement.

Course Coverage (modified Fall, 2007)

	Material Depth	Active Support (in addition to assignments)
Overview		
Business Process concepts	H	
System Analyst role, importance	H	
SDLC overview and options	H	
Supporting software tools	M	
Project Selection		
Strategic planning	L	
IT planning	H	
Feasibility studies	H	Target Corp Case & Competition 2006: RFID Rollout 2007: Global PDM Optimization
Project Initiation		
Project Manager role	L	
Charter, Deliverables, WBS	L	MS Project orientation
Analysis		
Requirements	H	
Process Modeling (Data Flow Diagrams, Use Cases, Use Case diagrams, Activity diagrams)	H	Visio orientation CSV Pharmacy Service Improvement case
Data Modeling (Analysis-level ERDs)	H	ITC eChoupal Initiative case (India)

Design		
Software acquisition strategies (buy, build, outsource, offshore)	M	Jharma Software case (outsourcing/offshoring)
Architectural infrastructural models	M	Business Intelligence Software at SYSCO case
Data strategies (data warehousing options)	M	
User Interface design	M	Access Orientation
Design techniques & oversight	L	
Implementation (Construction)		
Implementation techniques & oversight	M	Foremostco case
Transition		
Transition options	M	
Change Management	M	
Support	L	

Process Improvement & Automation Project

The project provides an opportunity to work with a client to **initiate, plan, analyze, and prototype** a small automated process improvement project. You will use the techniques and tools learned in class.

Selecting a Project

Each team (generally 3 - 5 members) selects their own process improvement project; often based on a team member's internship, volunteer work, or current job. A few examples of successful process improvement & automation prototypes have been:

- **NonProfit:** Improved ticketing process (music society); improved volunteer tracking process (YMCA)
- **Supply Chain:** Optimized system that tracks material for bar promotions (liquor distributor); improved obsolete inventory write-off process (Fortune 250 company)
- **Sales & Marketing:** Improved web reservation process (resort villas); improved Viking ticket give-away process (bank); improve Metro Transit personalization (**My Ride**, Metro Transit).
- **Education:** Streamlined computer lab access (UM computer lab); improved new material intake process (UM special collection); automate resident assistance **duty switch** process (UM dorm)
- **Accounting:** Improved timesheet processing process (local software development company); improve elementary school fundraising processes (local elementary school)
- **Technical:** Improved network IP security tracking process (Fortune 250 company)

Project Deliverables

Each team will submit progress reports throughout the term culminating in final project presentations on December 10 and 12 (we usually invite corporate executives to serve as a **real life** audience)

The team project will be graded as follows:

- Project Proposal (1 – 3 pages)
- Project Plan (5 - 8 pages)
- Project Analysis Report, including DFDs and ERDs
- Final Report, including limited prototype implementation
- Final Presentation