

Supply Chain

- "is a group of independent organizations connected to each other through the product or services that they separately and /or jointly add value on in order to deliver them to the end consumer"
- extended concept of an organization
- earliest appearance of the term "supply chain management" was in 1982 in Financial Times in an article; rapid developments started in 1990's
- · characteristics of supply chains:
 - can be formed only if more than one participating companies
 - participating companies within a SC normally do not belong to same business
 - involved companies are interconnected with the common goal of adding value to the product running through the supply chain
- the degree of how well a supply chain serves its end consumer establishes the competitive edge in the market

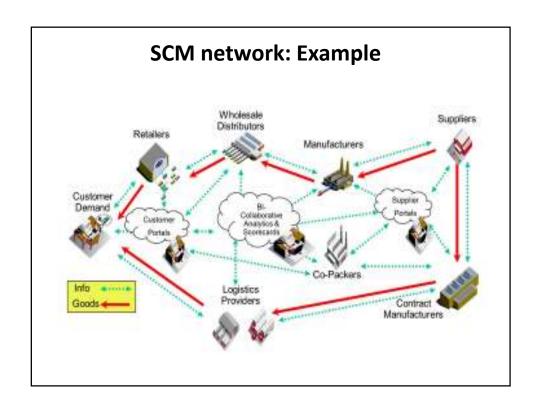
Supply Chain Example: Oil



http://www.dwasolutions.com/DWA/DWT raining Options.htm

Supply Chain

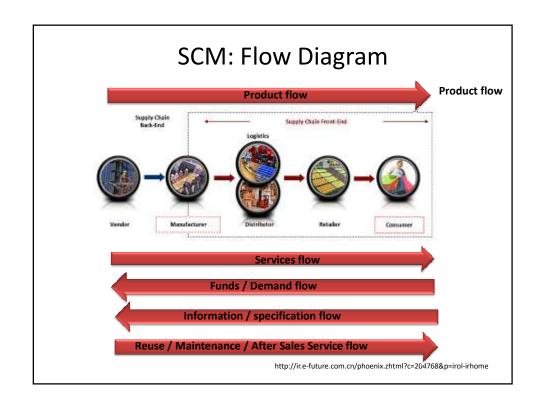
- more like a "network" rather than chain with multiple suppliers and multiple customers for each participating company in the chain
- also possible to have nested chains within chain
 - example: an engine manufacturing supply chain is a nested supply chain with the connected automobile manufacturing chain
- a chain with value adding services is called "value chain"
 - Inbound Logistics, Operations, Outbound Logistics, Marketing and Sales and Service are categorized as primary activities.
 - Secondary activities include Procurement, Human Resource management, Technological Development and Infrastructure
- a chain with continuous demands from consumer to the upstream suppliers is called "demand chain"



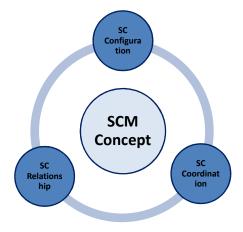
Supply Chain Management: Introduction

- comprises of planning and management of all activities involved in sourcing and procurement, conversion, and all logistics management activities
- also includes coordination and collaboration with channel partners, which can be suppliers, intermediaries, third-party service providers, and customers
- integrates supply and demand management within and across companies
- includes all of the logistics management activities as well as manufacturing operations, and it drives coordination of processes and activities with and across marketing, sales, product design, finance and information technology
- set of approaches to efficiently integrate suppliers, manufacturers, warehouses, and stores, so that goods are produced and distributed at the *right quantities*, to the *right locations*, and at the *right time*, in order to minimize system wide costs while satisfying service level requirements

Council of Supply Chain Management Professionals (CSCMP)



Supply Chain: Conceptual Model Supply Chain Configuration



- how a SC is constructed from all participating firms
- includes how big is the supply base of "original equipment manufacturer"; extent of vertical integration and outsourcing;
- also known as "supply chain architecture"
- strategic decision taken by higher level of management

· Supply Chain Relationship

- about inter-firm relationship across SC
- at "arms' length" if only volume and price is exchanged; "close partnership" if vision, planning and financial details are also exchanged
- its decision is both strategic and operational

· Supply Chain Coordination

refers to inter-firm operational coordination

Minor Exam 1

- problem 1
 - · online inspection
 - · operation time
 - Hollier method
 - Ford
 - 2->1->3
- problem 2
 - F, T, T, F, F
- problem 3
 - Opitz, Composite part, U-type, Integration of operations, Programmable

- Discussion of other question and resolution of doubts regarding the exam
- Mid-semester feedback given