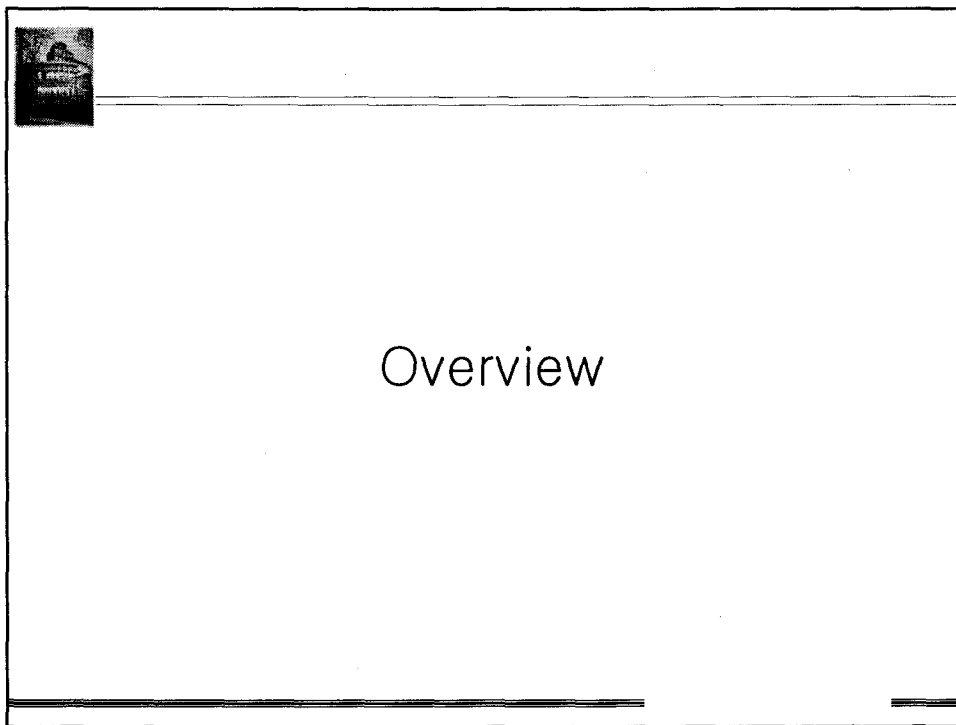


F2

Session

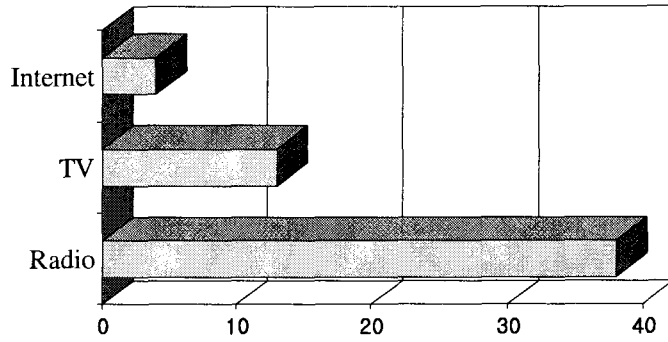
e-SCM과 경영혁신

김태현 교수 (연세대학교)





Internet의 확산 속도

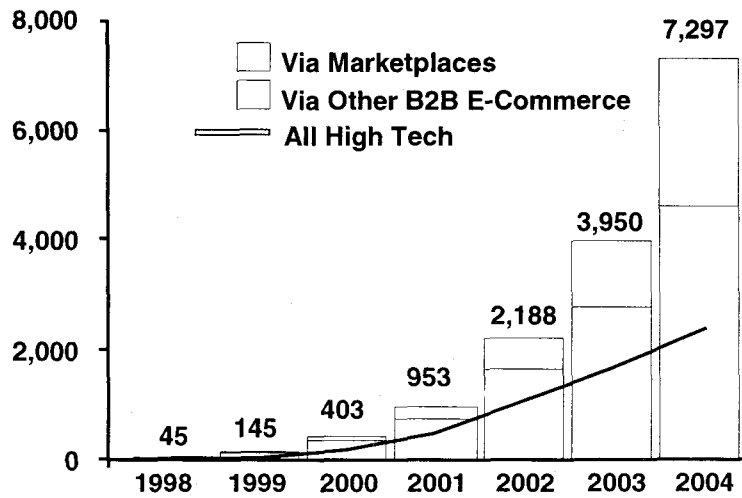


5억명의 사용자에게 도달하는데 소요되는 기간(년수)



Worldwide B2B Sales Forecast

U.S.\$ in Billions



Source: GartnerGroup

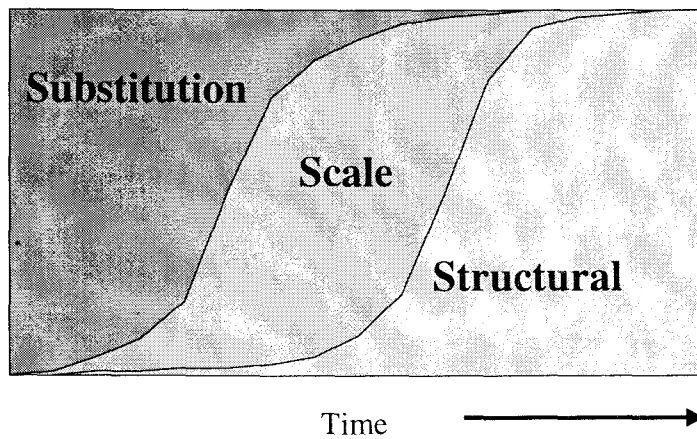


기술혁신의 진화(1)

	자동차	정보기술
Substitution Effect	Vehicles in place of horses/boats	EDI/internet in place of paper
Scale Effect	More frequent & extensive travels	More frequent orders/updates
Structural Effect	Highways, suburbs, malls	Supply chain process restructuring

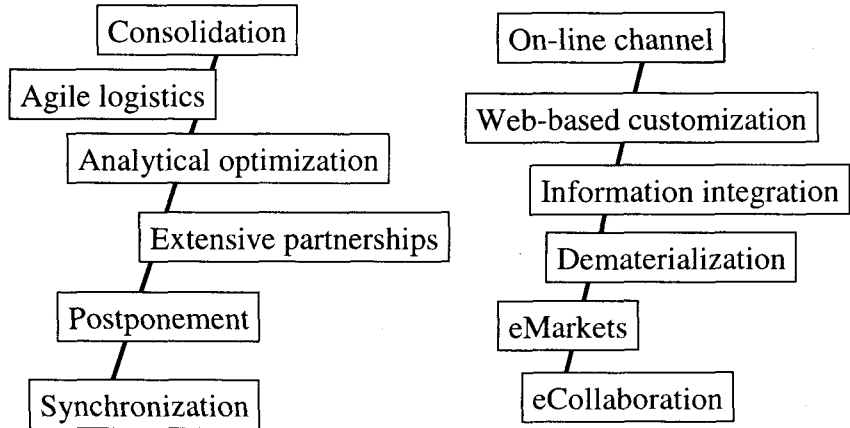


기술혁신의 진화(2)



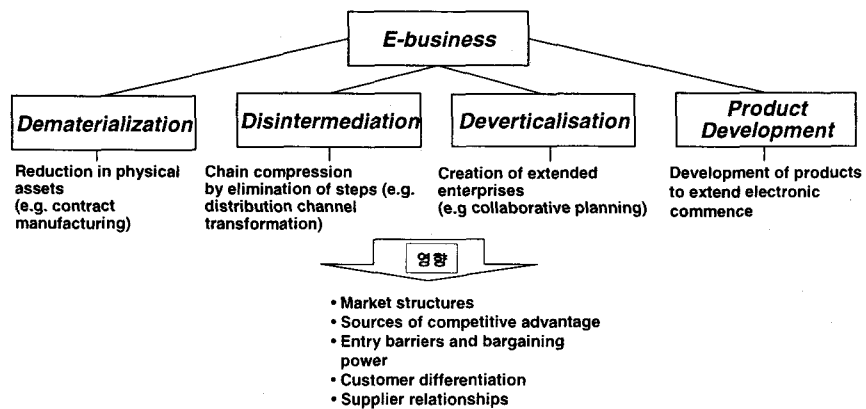


The Synergy of Supply Chain Management and eBusiness



E-Business의 경제적 효과

전자적 혁명이 가치사슬에 영향을 미치는 4가지 주요 방법



A shift that is less about actual technology but more about new commercial behaviour and different value chain possibilities.



Opportunities of eBusiness

	SC Integration	E-Markets
Substitution Effect	Workflow automation	Internet-based procurement
Scale Effect	Info-integration using standards	Aggregate buys, auctions
Structural Effect	Collaborative planning	Intelligent coordination & collaboration



RosettaNet

ROSETTANET

- An independent, self-funded, non-profit consortium to develop and deploy standard electronic commerce interfaces to align the processes between supply chain partners.
- Launched in June 1998.
- More than 60 companies representing \$600 billion in annual revenues as members in electronic components and IT industries.

IT Board:

Manufacturer: 3Com, Cisco, Compaq, HP, IBM, Intel, NEC, Quantum, Siemens, Solectron, Toshiba

Retailer/distributor: CompUSA, Computacenter, EDS, Inacom, Insight, MicroAge, Office Depot, Arrow, Avnet, CHS, Ingram Micro, Tech Data

Others: Lucent, AMEX, GSA, Microsoft, Netscape, Deutsche Financial, FedEx, UPS, GEIS, pcOrder, SAP



RosettaNet Standards

- Utilization of HTML/XML
- Common definition of standard dictionaries.
- A 14-digit Global Trade Item Number (GTIN) provides standardized product identification numbers.
- Adoption of standard e-Business process dialogs -- Partner Interface Processes (PIPs), for product management, order and inventory management, and service/support.

ROSETTANET



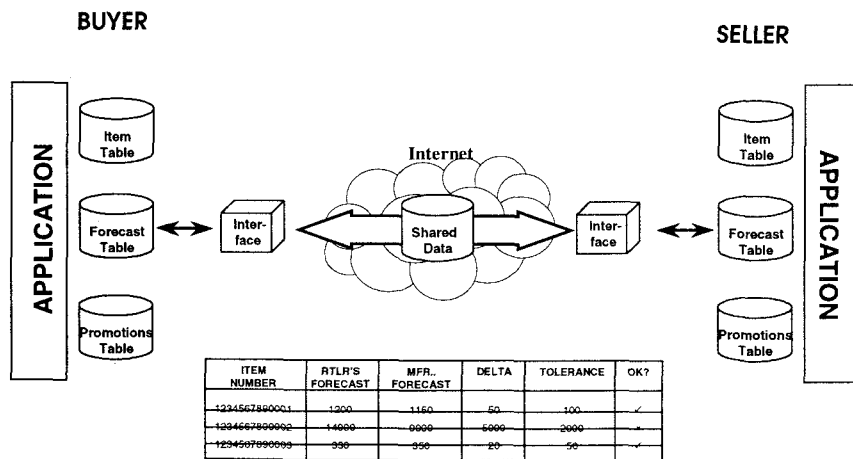
Over 100 PIPs Defined

- *Partner/Product Review*
 - partner review
 - product / service review
- *Product Introduction*
 - preparation for distribution
 - product change notification
- *Marketing Information Management*
 - lead management
 - promotion management
 - design win management
- *Order Management*
 - quote & order entry
 - transportation & distribution
 - product configuration
 - returns & finance management
- *Inventory Management*
 - price protection
 - collaborative forecasting
 - allocation & replenishment
 - inventory & sales reporting
 - ship from stock & debit/credit
- *Service & Support*
 - warranty management
 - asset management
 - technical support and services

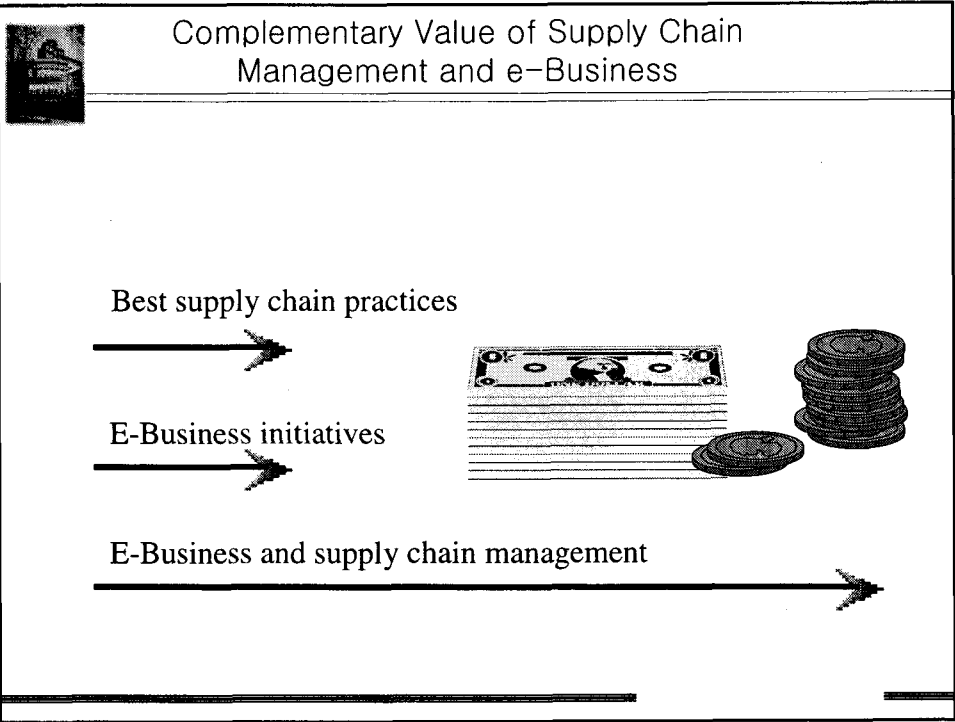
ROSETTANET



CPFR: Shared Process and Data Model



e-SCM의 사례들

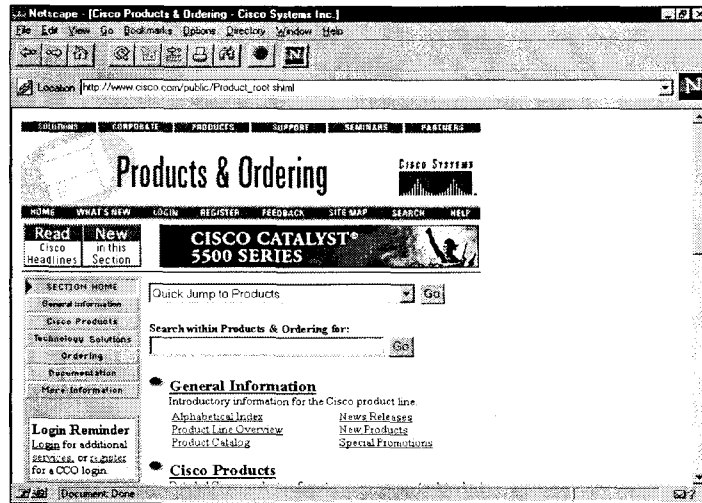


Value Propositions

<i>Initiatives</i>	<i>Drivers</i>	<i>Examples</i>
Intelligent eMarkets	Intelligence & e-commerce	Cisco Dell
eFulfillment & new products	Agile logistics	7dream.com,
Speedy new product/service	Partnership & integration	Adaptec
Mass customization	Postponement & design for SCM	WeWalk.com,



Cisco Connection Online



Power of the Internet at Cisco

- \$13.4 Billion internet sales (84% of total).
- 55% outsourced manufacturing, using a network of suppliers and contract manufacturers.
- \$825 million annual savings from use of internet.
- 25% faster time to market, LT reduced by 75%.
- No growth in overhead with rapid growth.
- 60% + Gross Margin.
- \$700K revenue per employee.



Why a Private e-marketplace?

CISCO SYSTEMS



- Cisco is a dominant player in its supply chain
- Cisco has invested significant infrastructure and automation in SCM
- Cisco's Private e-marketplace is a natural extension of existing SCM practice and capability



Cisco's New eHub

CISCO SYSTEMS



- Global B2B supply chain collaboration and optimization portal.
- Extended visibility for 2000-3000 partners
- Exception identification and alerting.
- Resolution path identification.
- Shared performance measurement & reporting.
- Robust supply planning.



eHub Solution Partners



Provides XML integration and data transportation protocols. Develop Cisco's PIPs / extracts from Oracle

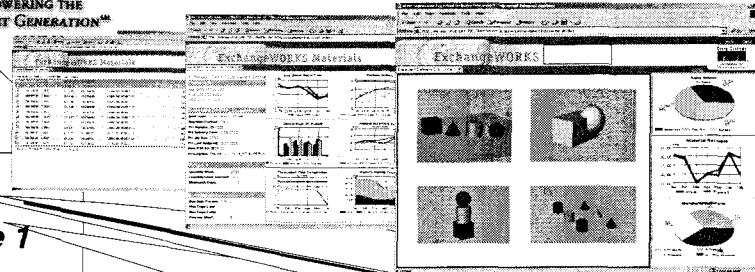


Provides rollout planning, implementation toolkit, change strategy, and communications

Provide supply chain application, workflow, analysis, reporting, and messaging capability



Evolution of eHub



Phase 1

- Infrastructure, workflow, etc.
- Common Demand Signal
- Supply Commits
- Supply Status
- Shortage Id & Alerts

Phase 2

- Constraint Based Planning
- Optimization
- Joint Capacity Planning
- e-Procurement

Phase 3

- Design Collaboration
- ECO Management
- Lifecycle Management
- Product Data Management



Expected Benefits

CISCO SYSTEMS



- Total end-to-end visibility to suppliers, contract manufacturers, distributors and Cisco.
- Single demand signal used by all.
- Better capacity planning and allocation of constrained materials.
- Shorter lead times, higher availabilities, less expediting.
- Improved partnership relationships.
- Proactive SCM as opposed to reactive SCM.

Agile

- Foundation for valuechain.dell.com
 - Next generation supplier network
- Initial rollout over 3,500 subscribers
- Internal operations and suppliers
- Promote Agile to entire supply base

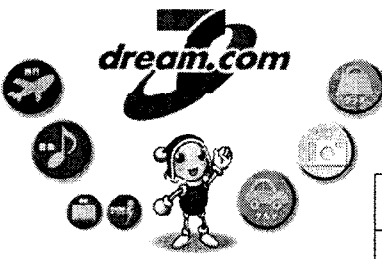



An Information-Smart Retailer: Seven-Eleven Japan



- Largest convenience store chain in Japan (\$17B annual sales) with 7,000 outlets (1,200 sq. ft each)
 - #1 in fast foods
 - #1 in battery, ladies stocking sales
 - #2 in paperback/magazine sales
- 55 Inventory turns/year
- Extensive use of information:
 - ✓ Shelf space configuration
 - ✓ Merchandising
 - ✓ New product development
- Agile logistics
 - ✓ Sharing info with suppliers
 - ✓ Frequent replenishment
 - ✓ Coordinated shipments

7Dream.com

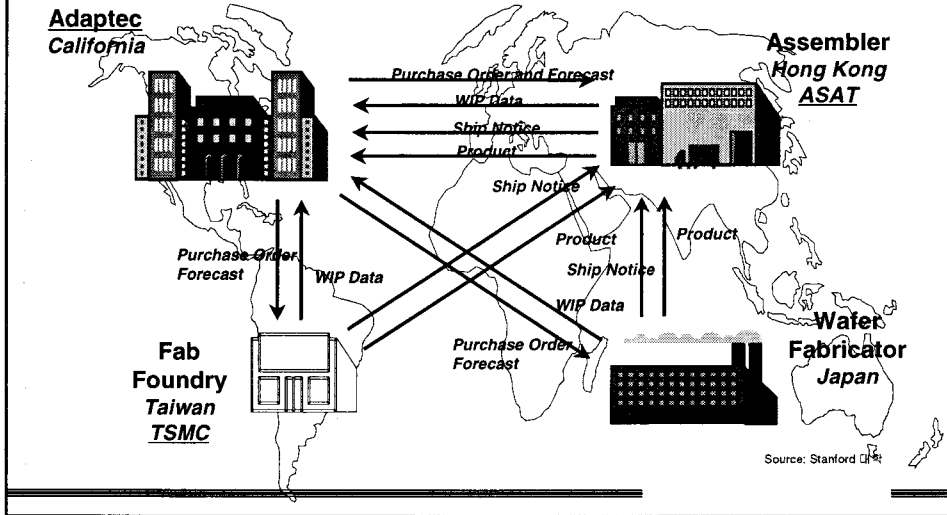
<i>Innovations</i>	<i>Implementation</i>
New order channel	Internet and Kiosk at stores
Last mile of e-Commerce	Pickup at SEJ stores, kiosks for CD burns
Leveraged resources	SEJ logistics & satellite infrastructure
Partnerships	

NEC NRI
KINOTROPE

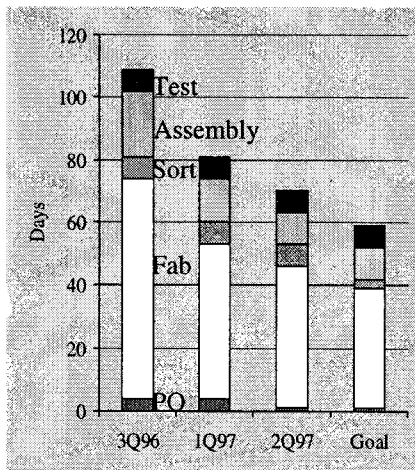


Adaptec's Virtual Corporation

Supplier들과의 Collaboration 측면에서 가치 사슬을 연계한 예는 다음과 같습니다.



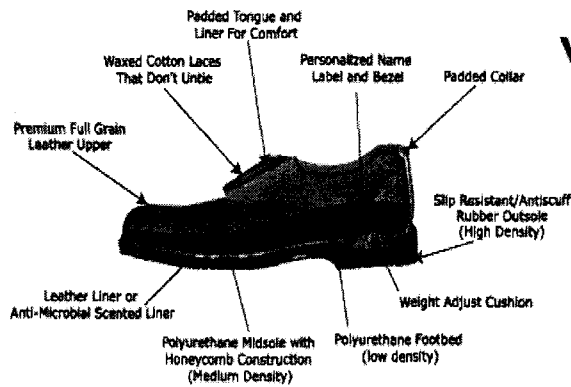
Benefits of Integration(Adaptec)



- Increased coordination among partners
- Drastic reduction in cycle time (40%) and inventory (25%)
- Ongoing savings: \$1.5M/year
- Improvement in customer satisfaction
- Shortened NPI time
- Earlier detection of quality problems
- Improved ROA & profitability
- Benefits to supplier: less "bullwhip"



WeWalk: Web-Based Mass Customization



Foam device
for imprints
of compu-
terized foot
shape and
typography.



Individualized name label, shoe style, heel shape, leather type, rear foot cushioning and insole; and accurate sizing.



Excellent SCM Practices Behind the Scene



- Target \$16B “comfort” footwear market (corporate, e.g., airlines, courier, hospitals, dept. stores, hotels; and personal, e.g., tourists, over 50’s).
- Manufacturing in Thailand: 95% shells made to stock, then personalized to order (weight adjust plug and personalized insole added).
- Disintermediated distribution model to allow high values to customers.
- Dual response with additional capacity from Mexico in 2001.



Summary

- The internet can have substitution, scale and structural impacts to this supply chain.
- Complementary values of supply chain management and e-business.
- Using sound supply chain principles with e-business initiatives can create new business propositions.
- The stakes of not moving forward are huge.