Chapter 5

E-Business and E-Commerce

Information Technology For Management 6th Edition

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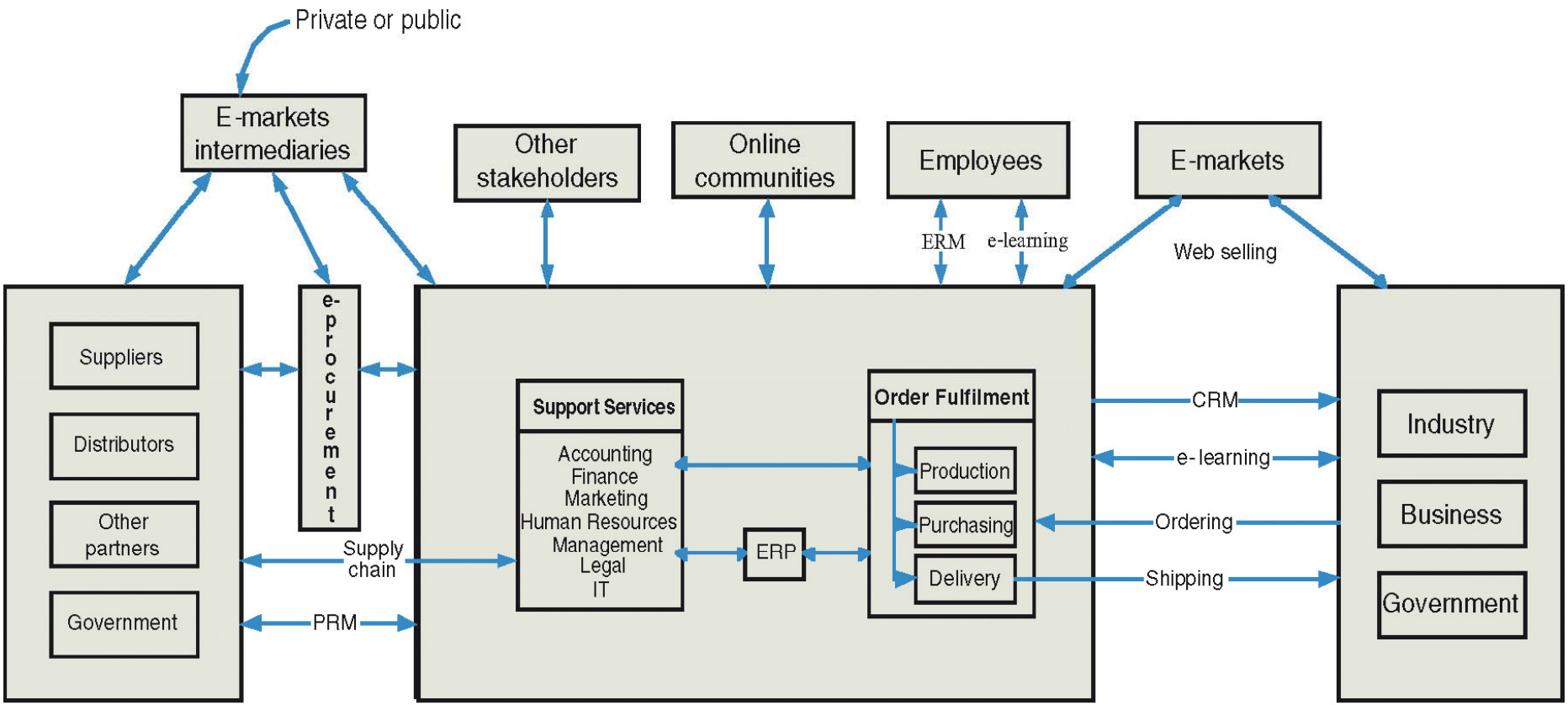
Learning Objectives

- Describe electronic commerce, its scope, benefits, limitations, and types
- Understand auctions and bartering
- Describe the major applications of business-to-consumer commerce, including service industries, and major issues faced by e-tailers
- Describe business-to-business applications
- Describe emerging EC applications such as intrabusiness and B2E commerce

Learning Objectives (Continued)

- Describe e-government activities and consumer-to-consumer e-commerce
- Describe the e-commerce support services, specifically payments and logistics
- Discuss the importance and activities of online advertising
- Discuss some ethical and legal EC issues
- Describe EC failures and strategies for success

The Structure of E-Commerce



E-Business – Transaction Medium

Most e-commerce is done over the Internet.

EC can also be conducted via:

- Private networks, such as *value-added networks* (*VANs, networks that add communication services to existing common carriers*)
- Local area networks (LANs)
- Wide area networks (WANs)

E-Business – Transaction Types

E-commerce transactions can be done between various parties.

- **Business-to-business (B2B):** Both the sellers and the buyers are business organizations
- **Collaborative commerce (c-commerce):** In c-commerce, business partners collaborate electronically
- **Business-to-consumers (B2C):** The sellers are organizations, and the buyers are individuals
- **Consumers-to-businesses (C2B):** Consumers make known a particular need for a product or service, and suppliers compete to provide it

E-Business – Transaction Types (Continued)

E-commerce transactions can be done between various parties.

- **Consumer-to-consumer (C2C):** Individuals sell products or services to other individuals
- **Intrabusiness (intraorganizational) commerce:** An organization uses EC internally to improve its operations. A special case is known as B2E (business to its employees)
- **Government-to-citizens (G2C):** A government provides services to its citizens via EC technologies
- **Mobile commerce (m-commerce):** When e-commerce is done in a wireless environment

Components of EC

The field of e-commerce is broad, and there are many of EC applications

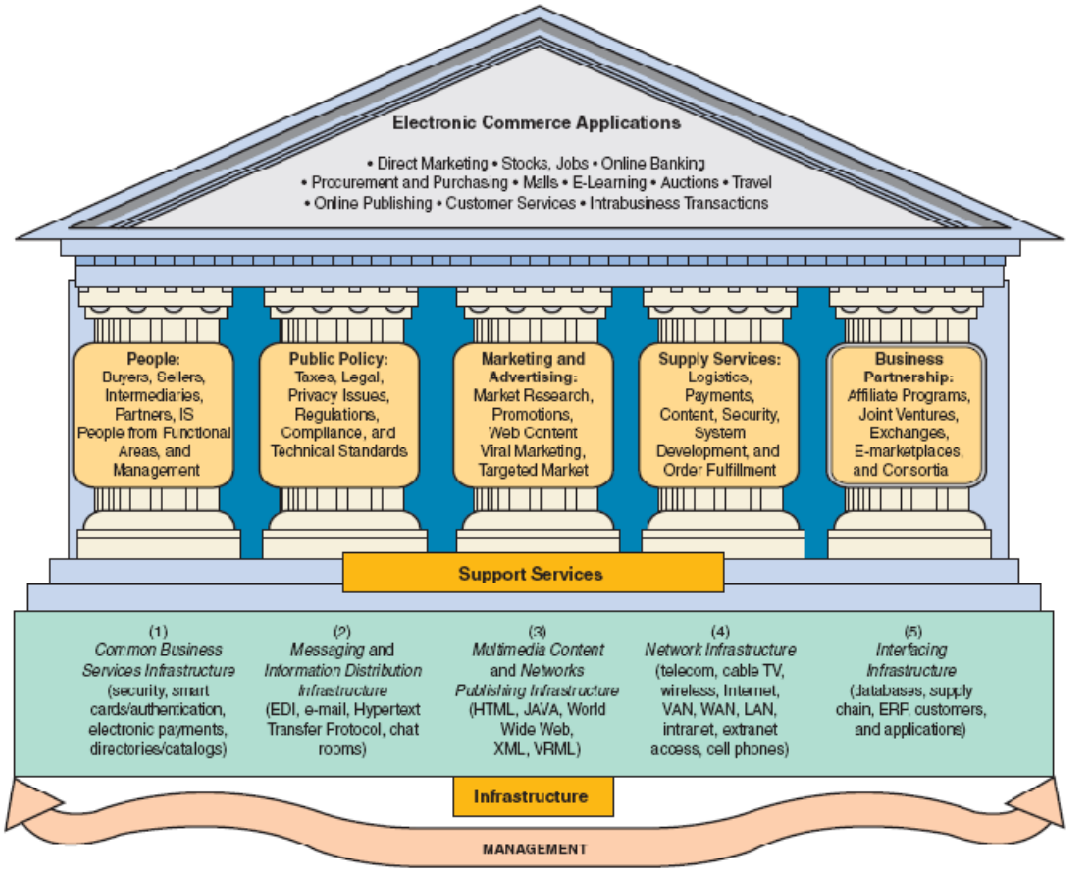


Figure 5.2 A framework for E-commerce. (*Source:* Drawn by E. Turban.)

Components of EC (Continued)

To execute these applications, companies need the right information, infrastructure, and support services. As shown:

- ***People*:** Sellers, buyers, intermediaries, information systems specialists and other employees, and any other participants
- ***Public policy*:** Legal and other policy and regulating issues, such as privacy protection and taxation
- ***Marketing and advertising*:** Like any other business, EC usually requires the support of marketing and advertising
- ***Support services*:** Many services are needed to support EC. They range from payments to order delivery and content creation
- ***Business partnerships*:** Joint ventures, e-marketplaces, and partnerships are some frequently occurring relationships in e-business

Auctions and Bartering

The major mechanism for buying and selling on the Internet is the electronic catalog. There are two common mechanisms used in its implementation: electronic auctions and bartering online

- Electronic Auctions (e-Auctions): A market mechanism by which sellers place offers and buyers make sequential bids
- Forward auctions are auctions where sellers place items at sites for auction and buyers bid continuously for the items.
- Reverse auctions, have one buyer, usually an organization, that wants to buy a product or a service. Suppliers are invited to submit bids.

Auctions are used in B2C, B2B, C2B, e-government, and C2C commerce

Auctions and Bartering (Continued)

Electronic bartering, the exchange of goods or services *without a monetary transaction*

- Individual-to-individual bartering
- Corporate e-bartering *(e.g., barterbrokers.com)*

Newcomers to the EC game

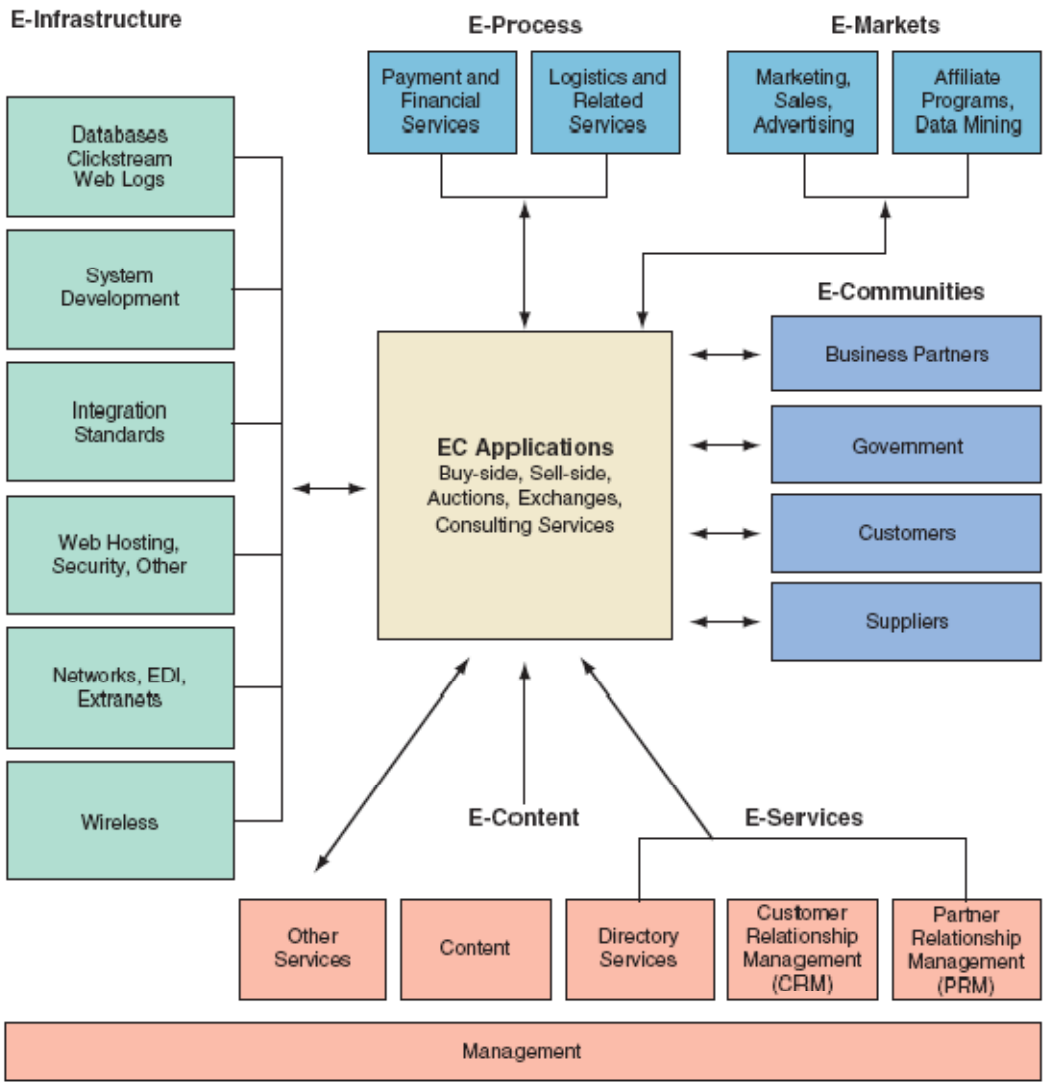
- Bloggers
- Friendster, Craigslist, MySpace, and similar social networking sites
- Pandora
- Neopets

Issues in E-Tailing Market Research – B2C

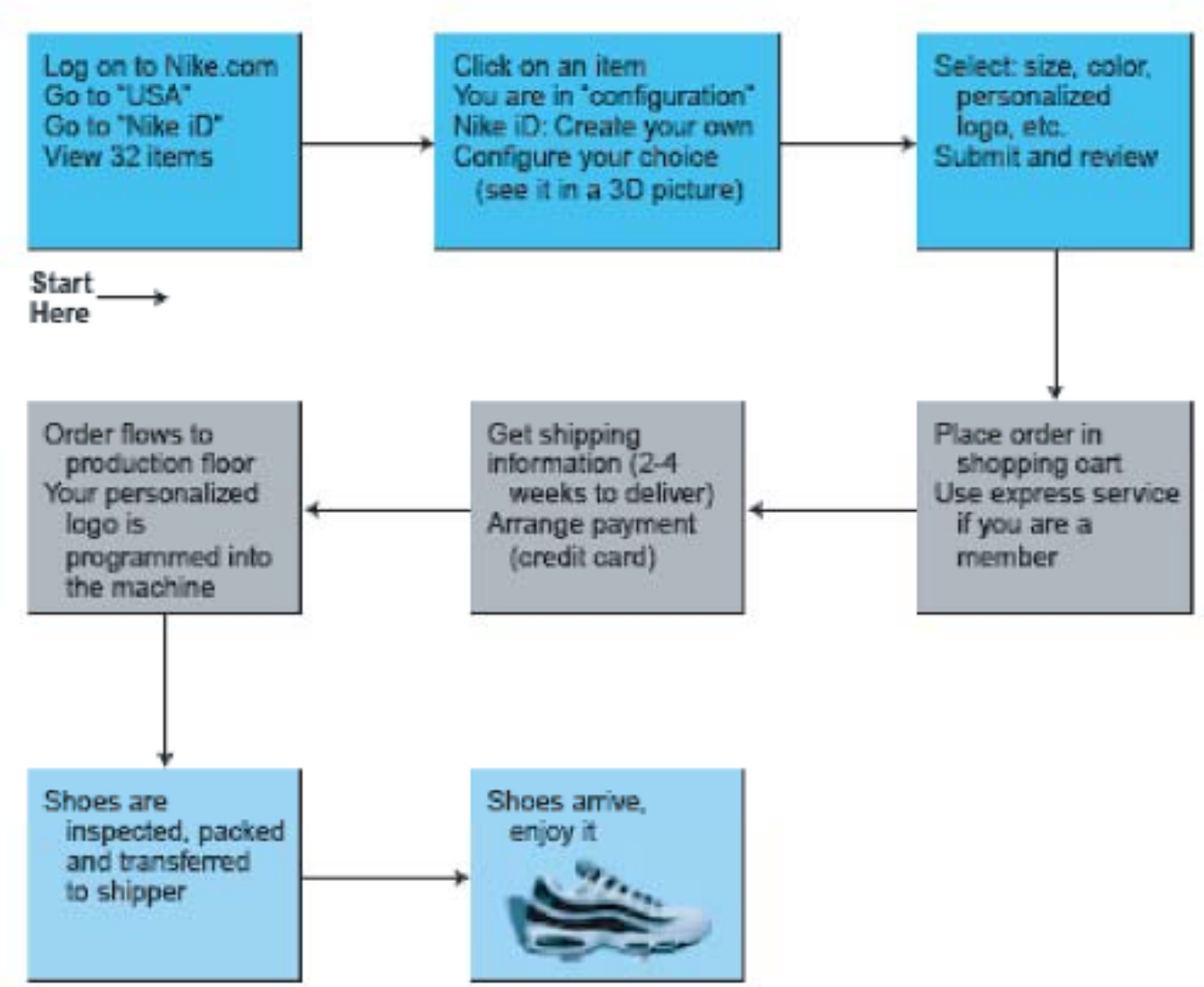
To successfully conduct electronic commerce, especially B2C, it is important to find out who are the actual and potential customers and what motivates them to buy. Finding out what specific groups of consumers want is done via **segmentation**, dividing customers into specific segments, such as age or gender.

Market researchers have tried to understand consumer behavior and develop models to help vendors understand how a consumer makes a purchasing decision. If the process is understood, a vendor may be able to influence the buyer's decision through advertising or special promotions.

E-Commerce Support Services



Customization in E-Commerce



Managerial Issues

- **Managing resistance to change.** Electronic commerce can result in a fundamental change in how business is done. Resistance to change from employees, vendors, and customers may develop. Education, training, and publicity over an extended time period offer possible solutions to the problem.
- **Integration of e-commerce into the business environment.** E-commerce needs to be integrated with the rest of the business. Integration issues involve planning, competition for corporate resources with other projects, and interfacing EC with databases, existing IT applications, and infrastructure.
- **Lack of qualified personnel and outsourcing.** Very few people have expertise in e-commerce. There are many implementation issues that require expertise, such as when to offer special promotions on the Internet, how to integrate an e-market with the information systems of buyers and sellers, and what kind of customer incentives are appropriate under what circumstances. For this reason, it may be worthwhile to outsource some e-commerce activities.

Managerial Issues (Continued)

- **Alliances.** It is not a bad idea to join an alliance or consortium of companies to explore e-commerce. Alliances can be created at any time. Some EC companies (e.g., Amazon.com) have thousands of alliances. The problem is which alliance to join, or what kind of alliance to form and with whom.
- **Implementation plan.** Because of the complexity and multifaceted nature of EC, it makes sense to prepare an implementation plan. Such a plan should include goals, budgets, timetables, and contingency plans. It should address the many legal, financial, technological, organizational, and ethical issues that can surface during implementation.
- **Choosing the company's strategy toward e-commerce.** Generally speaking there are three major options: (1) Lead: Conduct large-scale innovative e-commerce activities. (2) Watch and wait: Do nothing, but carefully watch what is going on in the field in order to determine when EC is mature enough to enter it. (3) Experiment: Start some e-commerce experimental projects (learn by doing).

Managerial Issues (Continued)

- **Privacy.** In electronic payment systems, it may be necessary to protect the identity of buyers. Other privacy issues may involve tracking of Internet user activities by intelligent agents and cookies, and in-house monitoring of employees' Web activities.
- **Justifying e-commerce by conducting a cost-benefit analysis is very difficult.** Many intangible benefits and lack of experience may produce grossly inaccurate estimates of costs and benefits. Nevertheless, a feasibility study must be done, and estimates of costs and benefits must be made.
- **Order fulfillment.** Taking orders in EC may be easier than fulfilling them.
- **Managing the impacts.** The impacts of e-commerce on organizational structure, people, marketing procedures, and profitability may be dramatic. Therefore, establishing a committee or organizational unit to develop strategy and to manage e-commerce is necessary.

Chapter 5

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