



Managing Operations Across the Supply Chain, 4th edition

Swink, Melnyk, Hartley, and Cooper

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New in the 4th edition

In this major revision of *Managing Operations Across the Supply Chain*, the key objective has been to integrate and highlight the role of digital technologies throughout all aspects of supply chain operations management. Efforts have been made to make all of the content more concise and crisp. Many of the opening vignettes and Get Real stories throughout the book, along with other changes, which are summarized below, have been updated or replaced.

Chapter-by-Chapter Changes

Chapter 1: Introduction to Managing Operations Across the Supply Chain

- Introduced digital theme with examples illustrating how technologies are changing operational processes.
- Replaced example (now a restaurant supply chain) of functional relationships across the supply chain.
- Added new Cemex Digital Transformation case

Chapter 2: Operations and Supply Chain Strategy

- New opening vignette on Redbubble.

- Added a case on Lil Me, a manufacturer of customized dolls that look like their owner.
- Additional discussion questions and problems.

Chapter 3 and 3S: Managing Processes and Capacity

- Included a better focus on the notion of process thinking.
- Additional discussion questions and problems.

Chapter 4: Product/Process Innovation

- Introduced new concepts including product service platforms, servitization, and augmented/virtual reality (VR).
- Added new example for modular design.
- New Get Real describing Lockheed's application of VR.

Chapter 5: Manufacturing and Service Process Structures

- Revised Table 5-1 to show inputs, transformation, outputs, and examples.
- New Get Real explaining how Adidas uses digital technologies to customize shoes.
- Moved service blueprinting to Chapter 3S.
- Added figure to illustrate market orientation.
- Updated the section Capability Enabling Technologies to reflect advances in digital technologies.
- New Get Real on Amazon Go explaining how digital technologies are changing retailing..
- Updated and added a discussion question.

Chapter 6: Managing Quality

- Updated the Hyundai story to include awards and changes within the last 3 years.
- Updated Get Real on food safety.
- Dropped discussion of Malcolm Baldrige award.
- Additional problems.

Chapter 6 Supplement: Quality Improvement Tools

- Additional discussion questions and problems.

Chapter 7: Managing Inventories

- Added discussion of customization and customer service aspects of inventory location decisions.
- Additional problems applying square root law.
- Added discussion of IoT and inventory visibility in the supply chain.
- Added fuller discussion of choice between using P and Q inventory models.
- New Case: Dexter's Chicken

Chapter 8: Lean Systems

- Additional discussion questions and problems.

Chapter 9: Customer Service Management

- New opening vignette on the "Amazon Effect."
- New discussion of digital enhancement of customer service including omnichannel service, product platforms, and crowdsourcing service.
- New discussion of social (millennials) and global impacts on customers' service expectations.
- New Get Real on service delivery failures.
- New section on service information.

Chapter 10: Sourcing and Supply Management

- Updated the opening vignette on sourcing and supply management at Chipotle to reflect challenges with food safety.
- New Get Real on Resilinc and supply chain risk management.
- Updated the Get Real box on Takata airbags.

- New Get Real showing how Boeing is doing more insourcing.
- Added a section on Supply Category Management.
- Revised the Examining the Sourcing Process.
- New Get Real showing the importance of supplier innovation in self-driving vehicles.
- Updated the discussion of information sharing to reflect new digital technologies such as blockchain.
- Additional discussion questions.
- Added new sourcing case.

Chapter 11: Logistics Management

- Updated opening vignette about Amazon's innovations in delivery.
- Moved cost management discussion to Logistics Network Design.
- Changed Warehouse Management to Distribution and Fulfillment Management.
- New Get Real on Walmart's delivery policy.
- Added discussion of electronic logging devices (ELDS).
- Added discussion of last mile delivery.
- New Get Real explaining how logistics network design caused a chicken shortage for KFC.
- Updated and added discussion questions.

Chapter 12: Demand Planning: Forecasting and Demand Management

- New opening vignette on how Walmart uses weather, social media, and other data to forecast sales.
- Get Real on how Lennox uses artificial intelligence to improve demand planning.
- Enhanced discussion of artificial intelligence.
- New discussions of social media and dynamic pricing in demand management.

Chapter 13: Sales and Operations Planning

- Additional discussion questions and problems.

Chapter 14: Materials and Resource Requirements Planning

- Updated opening vignette on Blue Apron, a home meal delivery service.
- Updated the Advances in Planning Systems to reflect digital technologies.
- New Get Real showing how MOD Pizza using a cloud-based ERP system for planning.

Chapter 15 and 15S: Project Management

- Updated opening Pixar vignette.
- More in-depth discussion of stages in project life cycle.
- New discussion of agile project management.
- New Get Real on Spray-N-Wash project.
- Deeper discussion of project management software.
- New example of a business case for a proposed project.

Chapter 16: Sustainable Operations Management—Preparing for the Future

- Updated Unilever vignette with achievements of zero landfill waste.
- New Get Real on Patagonia's sustainability efforts.
- Discussion of Starbucks Reserve, a new experiential coffee store in Seattle aimed at making the experience of brewing and enjoying a unique cup of coffee critical and attractive.
- Discussion of how the Internet of Things (IoT) is affecting not only the supply chain but also the business model.
- New case: "Sourcing Outside the Cage."