Managerial Accounting

Creating Value in a Dynamic Business Environment

Ronald W. Hilton . David E. Platt











TENTH EDITION

Managerial Accounting

Creating Value in a Dynamic Business Environment

Tenth Edition

Ronald W. Hilton *Cornell University*

David E. Platt University of Texas at Austin





MANAGERIAL ACCOUNTING: CREATING VALUE IN A DYNAMIC BUSINESS ENVIRONMENT, TENTH EDITION

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www.mhhe.com

Ronald W. Hilton: To Meg, Brad, Tim, Kerry, and Liliana.

David E. Platt: To Nancy, Evan, and Hannah. This page intentionally left blank

Praise for MANAGERIAL ACCOUNTING

"Extremely comprehensive, easy to read managerial accounting textbook that provides well-designed integrated examples along with coverage of service-based companies."

-Angela Sandberg, Jacksonville State University

"I am loving the book, and I see the students learning the concepts a lot quicker than my previous experience." — Patti Brown, The University of Texas at Austin

"I would describe it as the Cadillac of core management accounting textbooks."

-Bill Wempe, Texas Christian University

"This is an excellent text—well balanced, well organized, and up to date with current topics, including service industries and state-of-the-art manufacturing environments. I highly recommend it also for the excellent examples and illustrations through focus companies and contrasting companies."

-John C. Anderson, San Diego State University

"I've been using this text since its second edition, and it gets better each year with continuous improvement." —Steve G. Green, United States Air Force Academy

"Well written with good explanations of the 'why' and 'how'"

-Christa Morgan, Georgia Perimeter College

"Major strength is how it relates managerial accounting to the general management function and reveals the managerial accountant as an important member of the management team."

-Linda C. Bowen, University of North Carolina-Chapel Hill

"The book goes beyond covering the basics and organizes and integrates contemporary topics nicely." —Harrison McCraw, State University of West Georgia

"Well written, well organized and excellent end of chapter problems."

- Kathleen Sevigny, Boston College

"The technology supplements and instructor resources are top-notch and very appropriate for our students." — Marilyn Okleshen, Minnesota State University–Mankato

"The book is very thorough, well written, and still remains student-friendly. The supplements are outstanding." — Ben Baker, Davidson College

"A solid, well-written, user-friendly book; can't go wrong with it!"

Rochelle Greenberg, Florida State University

After Nine Editions of Innovation and Excellence, Hilton *Managerial Accounting* becomes Hilton & Platt.



Keeping pace with the speed of modern business, the authors combine their experience and expertise to make sure *Managerial Accounting* is the most relevant, accurate, and up-to-date textbook in the field.

About the Authors



Ronald W. Hilton is a Professor of Accounting at Cornell University. With bachelor's and master's degrees in accounting from The Pennsylvania State University, he received his PhD from The Ohio State University.

A Cornell faculty member since 1977, Professor Hilton also has taught accounting at Ohio State and the University of Florida, where he held the position of Walter J. Matherly Professor of Accounting. Prior to pursuing his doctoral studies, Hilton worked for Peat, Marwick, Mitchell and Company and served as an officer in the United States Air Force.

Professor Hilton is a member of the Institute of Management Accountants and has been active in the American Accounting Association. He has served as associate editor of *The Accounting Review*

and as a member of its editorial board. Hilton also has served on the editorial board of the *Journal of Management Accounting Research.* He has been a member of the resident faculties of both the Doctoral Consortium and the New Faculty Consortium sponsored by the American Accounting Association.

With wide-ranging research interests, Hilton has published articles in many journals, including the Journal of Accounting Research, The Accounting Review, Management Science, Decision Sciences, the Journal of Economic Behavior and Organization, Contemporary Accounting Research, and the Journal of Mathematical Psychology. He also has published a monograph in the AAA Studies in Accounting Research series, and he is a co-author of Cost Management: Strategies for Business Decisions, Budgeting: Profit Planning and Control, and Cost Accounting: Concepts and Managerial Applications. Professor Hilton's current research interests focus on contemporary cost management systems and international issues in managerial accounting. In recent years, he has toured manufacturing facilities and consulted with practicing managerial accountants in North America, Europe, Asia, and Australia.



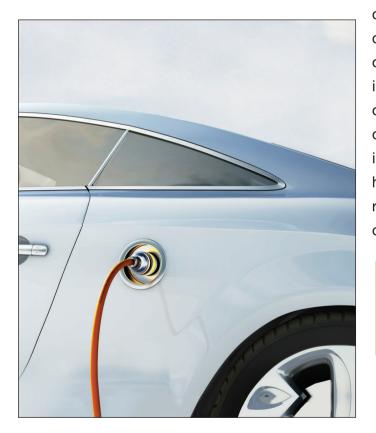
David E. Platt is the Associate Dean for Undergraduate Programs at the McCombs School of Business, University of Texas at Austin. He earned his BS in Economics from the Wharton School at the University of Pennsylvania, his MBA in Marketing from Syracuse University, and his PhD in Accounting from Cornell University. He received his CPA while working for Pricewaterhouse Coopers, followed by several years doing financial and product management in a supply chain systems integrator. Professor Platt has taught in the McCombs School of Business BBA, MPA, MBA and Executive MBA programs, receiving teaching awards at both the undergraduate and graduate levels. From 2000 until 2012, he directed UT-Austin's Center for International Business Education and Research (CIBER) and has served as chairman of the Partnership in International Management, a

consortium of leading graduate business schools with 57 member schools in 35 countries. He has been a visiting lecturer at the Sorbonne Graduate Business School, and has delivered training for Dell and other companies in the U.S., Europe, Latin America, and China. Preface

How Does Hilton & Platt 10e Prepare Students for the Businesses of Today and Tomorrow?

Managerial Accounting.

Business is changing dramatically, with a global marketplace for goods and services, a worldwide supply chain, and dramatic increases in technological innovation. To keep up, managers must be able to interpret the rapid flow of information and make the right decisions. Assisted by the tools of managerial accounting, and by managerial accounting professionals, managers will work side by side in global cross-functional teams to make the complex decisions that today's dynamic business environment requires of them. The goal of *Managerial Accounting* is to acquaint students of business with the fundamental tools of managerial accounting and to promote their understanding of the



dramatic ways in which business is changing. The emphasis throughout the text is on using accounting information to help manage an organization. Students should not only be able to produce accounting information, but also understand how managers are likely to use and react to the information in a range of businesses.

"It is a well-written book with numerous well-selected cases, allowing students to see the contemporary business operations and practices in the real world."

-Dennis Hwang, Bloomsburg University

Relevant.

Focus Companies provide a powerful strategy for fostering learning, and the integration of Focus Companies throughout the Hilton & Platt text is unmatched by any other managerial accounting book. Each chapter introduces important managerial accounting topics within the context of a realistic company. Students see the immediate impact of managerial accounting decisions on companies and gain exposure to different types of organizations.

Balanced.

Hilton & Platt *Managerial Accounting* offers the most balanced coverage of service and manufacturing companies. The authors recognize that students will be working in a great variety of business environments and will benefit from exposure to diverse types of companies. A wide variety of examples from retail, service, manufacturing, and nonprofit organizations are included.

Contemporary.

Hilton & Platt continues to be the leader in presenting the most contemporary coverage of managerial accounting topics. The traditional tools of managerial accounting such as budgeting and product costing have been updated with current approaches. Emerging topics such as environmental cost management, monetizing the Internet, and capacity management are also covered. "The company story acts as a hook to get students interested in the chapter material." —Michele Matherly, University of North Carolina at Charlotte

"I like the mix of company types."

-Barbara Durham, University of Central Florida

"Balanced, time-proven approach to managerial accounting."

-Michael Flores, Wichita State University

"A nice intro textbook, with multiple perspectives on the behavioral aspects of managerial accounting. Touches many modern issues facing the field." Theodore Rodgers, Emory University

"Perhaps what sets Hilton & Platt apart from the competition is its recognition that the world consists of more than manufacturing firms and that managerial accounting plays a significant role in service and not-for-profit organizations."

- Lanny Solomon, University of Missouri-Kansas City

"Very current with managerial accounting topics (bar codes, RFID, ..., ABC, outsourcing, decision making)." —Maggie Houston, Wright State University

Flexible.

Managerial Accounting is written in a modular format allowing topics to be covered in the order you want. For example, some instructors prefer to cover contribution-margin approaches to decision making and/or relevant costs early in the course. So Chapter 6 (cost behavior and estimation), Chapter 7 (CVP), and Chapter 14 (relevant costs) are written so they can be covered immediately after Chapter 2, which introduces basic cost concepts. A table showing the text's flexibility is in the Introduction to the Instructor's Manual.

Preface

How Does Hilton & Platt 10e Help Students Learn Managerial Accounting in the Context of Business?

FOCUS COMPANIES

Students need to see the relevance of managerial accounting information in order to actively engage in learning the material. Ron Hilton and Dave Platt use Focus Companies to illustrate concepts, and students immediately see the significance of the material and become excited about the content.

Whenever the Focus Company is presented in the chapter, its logo is shown so the student sees its application to the text topic.

"I like the 'Focus on the Company' at the beginning of each chapter and this type of boxed info throughout each chapter". —Anna Cianci, Drexel University

CONTRAST COMPANIES

A Contrast Company is also introduced in each chapter. In most cases these highlight an industry different from that of the Focus Company. This feature allows even greater emphasis on service-industry firms and other nonmanufacturing environments. The complete list of Focus Companies and Contrast Companies is featured on the inside back cover.

The Changing Role of Managerial Accounting in a Dynamic Business Environment

OCUS COMPANY >>



THIS CHAPTER'S FOCUS COMPANY is The Walt Disney Company. This Walt Disney Company is a giant in the industry with theme parks, Walt Disney Company feature film studios, animation studios, television broadcasting, hotels and resorts, and retail stores. Using The Walt Disney Company as an illustration, we will introduce the field of managerial accounting and its major themes. Some of you are excited about studying accounting? I'm not going to be an accountant!" That is a good question. We will explore we managerial accounting that is apod question. We will explore how managerial accountants work in partnership with managers to add value to the organization, and how managers also use managerial accounting tools to make their decisions.

Eard reliapter is bouit around a focus company, in which mile chapter's key points are inustration. This chapter's focus is on The Walf Disney Company. The focus companies in subsequent chapters are not real companies, but they are realistic scenarios built on actual company practices. Whenever the focus company is discussed in the chapter, the company loag operars in the margin.



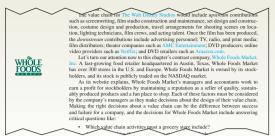


In contrast to the entertainment services setting of The Walt Disney Company, we will turn our attention to Whole Foods Market, Inc. This fast-growing foo retailer has over 300 stores around North America and Europe. A leader in the area of corporate social responsibility. Whole Foods Market is frequently faced with challenging decisions that require them to balance the need to run a profitable business and satisfy their investors against the cost of their much-publicized commitment to organic foods and sustainable production. We will explore managerial accounting's contribution to Whole Foods Market's efforts to sell products that are more costly to produce in a competitive market while still achieving appropriate returns for investors.

Each chapter also includes a contrast company. In most cases, the contrast company will present a key chapteren topic in an industry that is different from that of the focus company. In this chapter, the focus company (Walt Down is an entertainment services company, whereas the contrast company (Whole Toods Markhi is a food retailer.



Preface



"Great graphics, exhibits and illustrations to keep the computer generation interested."

-Kathy Sevigny, Boston University

D of Exm several plausible on teams formed to address a variety of hypothetical business problems at The Walt Disney Company. Notice that each of these teams pulls together individuals from a variety of specialities, such as marketing, operations, general management, customer relations, and the general counsel's office (legal sizeus). Given Disney's overall business strategy, creative talent is almost always present in these cross-functional teams; moreover, managerial accountants play an important role as well.

Physical Location

function

*Most of the people . . . are decentralized and actually

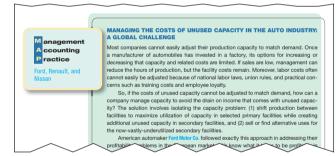
are co-located with the

eonle that they support That's our approach and we're moving more and more toward that and less and less toward a

central group that provide:

formation." (1)

Finally, where do managerial accountants actually do their work? The answer is "just about everywhere." As Panel C of Exhibit 1-4 highlights, managerial accountants are not sequestered in some remote corner of the business. To the contrary, they are located in every part of an enterprise, from corporate headquarters to the locations where goods and services are being produced. At Dissey, for compare readquares to the rocatoris where goods and services are being produced. At Dissey, for example, managerial accountants would be present on location when a feature film is being produced, near the ESPN production studio when decisions are made about devices and the location of the services of vould various ev hotel



"Good extras within chapters—ethics at the end of each chapter, MAPs throughout chapter, the Focus vs. In Contrast real world examples."

-Mike Thomas, Humboldt State University

Focus on Ethics

DID BOEING EXPLOIT ACCOUNTING RULES TO CONCEAL COST OVERRUNS AND PRODUCTION CONCEAL SNAFUS?

SNAFUS? Arcraft manufacturers use job-order costing to determine the cost of an airpiane. As this chapter discusses, sup-ply chain management and production control are also important tools used by manufacturers to manage pro-duction costs. As *BainisesWeet* reports, however, things don't always go according to plen. For three years, *Baining's* top management had been seeking a merger with McDennell-Douglac Corpor-ties, whose bacord of directors was reluctant to approve the deal. Finally, the deal went through, and the world's largest aeroscase company was born—"the first

largest aerospace company was born-"the first manufacturer ever with the ability to build everything that flies, from helicopters and fighter jets to space

Boeing

EING EXPLOIT ACCOUNTING RULES TO AL COST OVERRUNS AND PRODUCTION ALL COST OVERRUNS AND PRODUCTION and a Cost over the second In May of 2002, Business Week reported the re

Real-World Examples

The Hilton & Platt text provides a variety of thought-provoking, real-world examples to focus students on managerial accounting as an essential part of the management process. Featured organizations include Amazon.com, Ford Motor Company, Southwest Airlines, Whole Foods Market, General Electric, FedEx, and many others. These companies are highlighted in blue in the text.

In Their Own Words

Quotes from both practicing managers and managerial accountants are included in the margins throughout the text. These actual quotes show how the field of management accounting is changing, emphasize how the concepts are actually used, and demonstrate that management accountants are key players in most companies' management teams.

Management Accounting Practice

The managerial accounting practices of wellknown, real-world organizations are highlighted in these boxes. They stimulate student interest and provide a springboard for classroom discussion.

Focus on Ethics

This feature is included in most chapters. Focus on Ethics poses an ethical dilemma, then asks tough questions that underscore the importance of ethical management. Some of these are based on real-world incidents while others are fictional but based on wellestablished anecdotal evidence.

How Can My Students Use Hilton & Platt 10e to Master the Concepts of Managerial Accounting?

End-of-Chapter Assignment Material

Each chapter includes an extensive selection of assignment material, including Review Questions, Exercises, Problems, and Cases. Our problem and case material conforms to AECC and AACSB recommendations and facilitates class discussions and projects.

Review Problems present both a problem and a complete solution, allowing students to review the entire problem-solving process.

Key Terms are bolded in the text and repeated at the end of the chapter with page references. The book also includes a complete Glossary of Key Terms.

Review Questions, Exercises, Problems, and Cases are

comprehensive in covering the points in the chapter. They exhibit a wide range of difficulty, and the Instructor's Manual provides guidance for the instructor on the difficulty level and time required for each problem. Numerous adapted CMA and CPA problems are included.

"Best selection of problems of any text: a large number of problems, problems at all levels, including many interesting, different problems that challenge students, and often interesting real world applications."

-Lynda Thoman, Purdue University

Review Problems on Cost Classifications

Several costs incurred by Myrtle Beach Golf Equipment, Inc. are listed below. For each cost, indicate which of the following classifications best describe the cost. More than one classification may apply to the same cost item. For example, a cost may be both a variable cost *and* a product cost.

Cost Classifications

- b. Fixed
- c. Period
- d. Producte. Administrative
- f. Selling

Key Terms For each term's definition refer to the indicated page, or turn to the glossary at the end of the text.

activity base, 88 actual costing, 100 actual manufacturing overhead, 94 applied manufacturing overhead, 93 bill of materials, 86 cost distribution (sometimes called cost allocation), 102 cost of goods manufactured, 97	departmental overhead centers, 102 departmental overhead rate, 102 job-cost record, 84 job-order costing, 83 material requisition form, 85 normal costing, 98 overhead, 96 overhead application (or absorption), 87	predetermined overhead rate, 88 process-costing system, 84 product-costing system, 80 proration, 96 schedule of cost of goods manufactured, 97 schedule of cost of goods sold, 97 service department cost allocation, 102 service dena¤tments, 102	supply chain, 86 throughput time, 101 time record, 87 two-stage cost allocation, 102 underapplied overhead, 95 volume-based cost driver, 88
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Review Questions

- 2-1. Distinguish between product costs and period costs.
- 2-2. Why are product costs also called inventoriable costs?2-3. What is the most important difference between a manu-
- facturing firm and a service industry firm, with regard to the classification of costs as product costs or period costs?
- 2-4. List several product costs incurred in the production of a backpack.2-5. List, describe, and give an example of each of the four
- different types of production processes. 2–6. Why is the cost of idle time treated as manufacturing
- overhead? 2–7. Explain why an overtime premium is included in manu-
- factor bead
- 2-14. Would each of the following characteristics be a volume-based or an operations-based cost driver in a college: (a) number of students, (b) number of discipline offered for study, and (c) urban versus rural location?
 2-15. List three direct costs of the food and beverage depart-
- ment in a hotel. List three indirect costs of the department2–16. List three costs that are likely to be controllable by a city's airport manager. List three costs that are likely to
- be uncontrollable by the manager.
 2-17. Which of the following costs are likely to be controllable by the chief of nursing in a hospital?
 a. Cost of medication administered.

errors

b. Cost of overtime paid to nurses due to scheduling

Preface

EXCEL Spreadsheets Spreadsheet applications are essential to contemporary accounting practice. Students must recognize the power of spreadsheets and know how accounting data are presented in them. Excel applications are discussed where appropriate in the text.

Actual manufacturing overhead:	
Depreciation	\$225,00
Property taxes	
Indirect labor	
Supervisory salaries	
Utilities	
Insurance	
Rental of space	
Indirect material (see data below	
Indirect material:	
Beginning inventory, January 1	
Purchases during the year	
Ending inventory, December 31	

- Compute the firm's predetermined overhead rate, which is based on direct-labor hours. Calculate the overapplied or underapplied overhead for the year. Prepare a journal entry to close out the Manufacturing Overhead account into Cost of Goods Sold. Figure a journet entry to construct a first maintaining of thread account of the and the solution with Build a spreadtheet. Construct an Excel spreadtheet to solve requirements (1) and (2) above. Show how the solution will change if the following data change: budgeted manufacturing overhead was \$990,000, property taxes were \$25,000, and purchases of indirect material amounted to 4 \$97.004

All applicable Problems are available with McGraw-Hill's Connect Accounting®. Problems Vermont Clock Works manufactures fine, handcrafted clocks. The firm uses a job-order cosing sys-tem, and manufacturing overhead is applied on the basis of direct-labor hours. Estimated manufacturing overhead for the year is \$260,000. The firm employs 10 master clockmaters, who constitute the direct-labor force. Each of these employes is expected to work 2,000 hours during the year, which represents each employee's practical capacity. The following events occurred during October. Problem 3-42 Journal Entries (L0 3-4, 3-5) Predetermined c rate: \$13 per hour a. The firm purchased 2,900 board feet of mahogany veneer at \$12 per board foot. b. Twenty brass counterweights were requisitioned for production. Each weight cost \$27 c. Five gallons of glue were requisitioned for production. The glue cost \$25 per gallon. Glue is treated as an indirect material. d. Depreciation on the clockworks building for October was \$7,000.
e. A \$300 utility bill was paid in cash. f. Time cards showed the following usage of labor: Job number G60: 12 grandfather's clocks, 950 hours of direct labor Job number C81: 15 cuckoo clocks, 500 hours of direct labor The master clockmakers (direct-labor personnel) earn \$22 per hour The October property tas bill for \$580 was received but not yet paid in cash.
 The firm employs laborers who perform various tasks such as material handling and shop cleanup. Their wages for October amounted to \$3,100.
 Job number G60, which was started in July, was finished in October. The total cost of the job was \$15,100 j. Nine of the grandfather's clocks from job number G60 were sold in October for \$1,600 each

Several exercises and problems in each chapter include an optional requirement for students to Build a Spreadsheet to develop the solution.

"Use of spreadsheets [is a strength]." -Ralph Greenberg, Temple University

Many problems can be solved using the Excel spreadsheet templates found on the text's website. An Excel logo appears in the margin next to these problems for easy identification.

"Good description of managerial accounting tools. Easy to read and understand. Strength is *in the end-of-chapter problems—good variety* and lots of them."

-Priscilla Wisner, Thunderbird, the Garvin School of International Management

Icons identify key business areas in the Problems and Cases in each chapter:



Ethical Issues



Group Work



Internet Research



International Setting



Business Communication



Excel Template

Preface

What's New in the Tenth Edition?

New and Updated Focus Companies

Chapter 9, which covers budgeting, features an all new focus company, Snowcap Music Festivals. This company produces and manages destination music events worldwide. Chapter 8, which covers absorption and variable costing, also has a new focus company, FitDat.com. This firm produces fitness monitors. Several other focus companies have been updated to make them more current and relevant than ever.

New Contrast Companies

Several chapters include new contrast companies, which provide a balance in each chapter between different industries. Among the new contrast companies are Whole Foods Market (retail grocery chain) and FestiChair.com (outdoor chair manufacturer).

Updated Pedagogy

Many chapters include revisions of pedagogy, streamlined and condensed explanations, and the addition of more current examples and references from the popular business press. For example, in Chapter 9 we now first present the budget in a nonmanufacturing context for a simpler view of the overall flow of budget schedules. Then, using the chapter's contrast company, we turn to a manufacturing example with the added complexity of inventory costs and schedules.

End-of-Chapter Assignment Material

The end-of-chapter assignment material has been very heavily revised. Virtually all of the quantitative exercises, problems, and cases contain data different from that used in the ninth edition. In addition, the authors updated many of the products and services produced by the companies featured both in the text and in the assignment material.

Build a Spreadsheet

This popular feature has been completely revised for the tenth edition. Several exercises and problems in each chapter include an optional requirement to build an Excel spreadsheet to solve the problem.

Service Industry Examples

As the service industry plays a significant role in the economy, even greater emphasis has been devoted to providing examples throughout the text on real-world service-industry firms using managerial accounting information.

In Their Own Words

Many of the quotations in this popular feature are new in this edition. These quotes from practicing managers and managerial accountants portray the important role managerial accounting plays in today's dynamic business environment.

Management Accounting Practice

Many of these real-world examples have been revised and updated to make them more current, and several new examples have been added.

Your feedback is crucial in improving each new edition of *Managerial Accounting*. In response to your suggestions, you will find revised coverage of key topical areas, new pedagogy for the most challenging topics, and new assignment material in the tenth edition, as well as several key

CHAPTER-BY-CHAPTER CHANGES

Chapter 1: This chapter now features Whole Foods Market as the contrast company. In addition, the focus company example, Walt Disney Company, has been substantially updated to reflect changes in the company structure and to include recognizable subsidiaries like ESPN. A new *Management Accounting Practice* (**MAP**) piece has been added and the chapter streamlined to focus on how companies operate.

Chapter 2: The classification of manufacturing operations has been revised, and a new **MAP** has been added.

Chapter 3: New material is included on the use of technology in managerial accounting for manufacturing operations.

Chapter 5: The material on just-in-time (JIT) production and inventory management has been moved to the Inventory Management appendix at the end of the book.

Chapter 8: In order to better balance chapter length and the organization of topics, two sections previously located in Chapter 12 have been moved to this chapter and expanded: Costs of Assuring Quality (formerly Total Quality Management) and Costs of Environmental Sustainability (formerly Environmental Cost Management).

Chapter 9: Completely revised for this edition, budgeting is now illustrated with a new focus company, Snowcap Music Festivals, that will resonate with students. A new contrast company, FestiChair.com, is then introduced to show the incremental budget schedules required to address the manufacturing environment. A new **MAP** is also added. Chapter 9 also places Chapters 9 through 11 in a broad Financial Planning and Analysis (FP&A) context.

Chapter 10: In this edition, we introduce the usage-based direct-material price variance to allow for a complete decomposition of the difference between actual and standard costs. (The purchased-quantity version is maintained for comparison.) The sections on Operational Performance Measures and the Balanced Scorecard are moved to Chapter 12, where they fit comfortably with other performance measurement material.

Chapter 11: The application of overhead is now discussed in terms of *activity level*, rather than the more restrictive *process hours*.

Chapter 14: A new **MAP** has been added discussing the decision that some companies are now making to insource key business processes and return to onshoring of production operations.

Chapter 15: The MAP on Internet pricing has been revised.

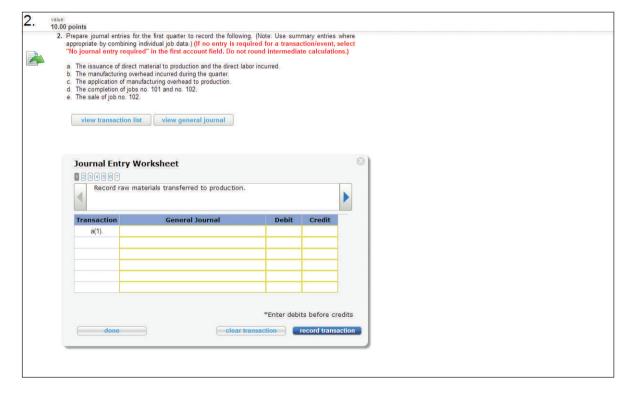
Preface

How Can Technology Help Improve Student Success?



McGraw-Hill Connect[®] Accounting

McGraw-Hill Connect Accounting is an online assignment and assessment solution that connects students with the tools and resources necessary to achieve success through faster learning, more efficient studying, and higher retention of knowledge. Intelligent Response Technology (IRT) IRT is a redesigned student interface for our endof-chapter assessment content. The benefits include improved answer acceptance to reduce students' frustration with formatting issues (such as rounding) and select questions that have been redesigned to test students' knowledge more fully. They now include tables for students to work through rather than requiring that all calculations be done offline.



Online Assignments McGraw-Hill *Connect Accounting* helps students learn more efficiently by providing feedback and practice material when and where they need it. *Connect Accounting* grades homework automatically and students benefit from the immediate feedback that they receive, particularly on any questions they may have missed. Furthermore, algorithmic questions provide students with unlimited opportunities for practice.

	Mana			
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XVII

Student Library The *Connect Accounting* Student Library gives students access to additional resources such as recorded lectures, online practice materials, and a searchable, mediarich eBook. Using this resource, students can highlight and take and share notes, and study assets from the Online Learning Center, all from one convenient location.



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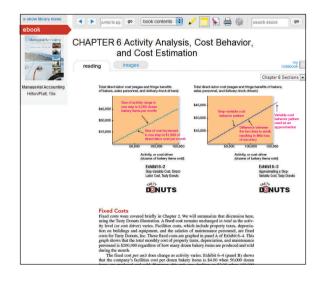


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Managerial Accounting

Creating Value in a Dynamic Business Environment

The Changing Role of Managerial Accounting in a Dynamic Business Environment

FOCUS COMPANY >>>

THIS CHAPTER'S FOCUS COMPANY is The Walt Disney Company. This entertainment services company is a giant in the industry with theme parks, feature film studios, animation studios, television broadcasting, hotels and resorts, and retail stores. Using The Walt Disney Company as an illustration, we will introduce the field of managerial



accounting and its major themes. Some of you are excited about studying accounting. But even more of you are asking, "Why do I need to study managerial accounting? I'm not going to be an accountant!" That is a good question. We will explore how managerial accountants work in partnership with managers to add value to the organization, and how managers also use managerial accounting tools to make their decisions.

Each chapter is built around a focus company, in which the chapter's key points are illustrated. This chapter's focus is on The Walt Disney Company. The focus companies in subsequent chapters are not real companies, but they are realistic scenarios built on actual company practices. Whenever the focus company is discussed in the chapter, the company logo appears in the margin.





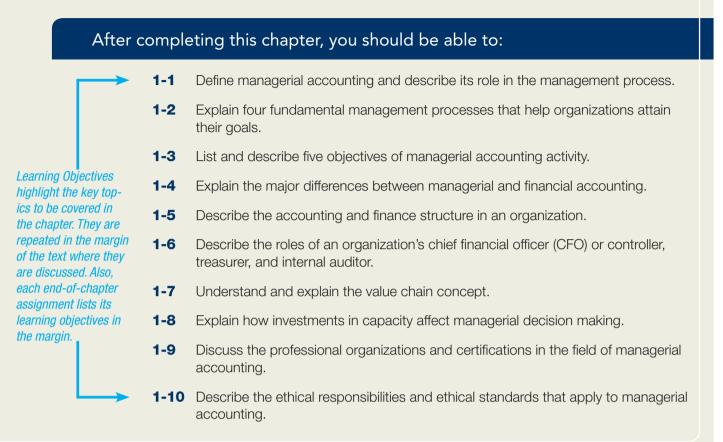
<<< IN CONTRAST

In contrast to the entertainment services setting of The Walt Disney Company, we will turn our attention to Whole Foods Market, Inc. This fast-growing food retailer has over 300 stores around North America and Europe. A leader in the area of corporate social responsibility, Whole Foods Market is frequently faced with challenging decisions that require them to balance the need to run a profitable business and satisfy their investors against the cost of their much-publicized commitment to organic foods and sustainable production. We will explore managerial accounting's contribution to Whole Foods Market's efforts to sell products that are more costly to produce in a competitive market while still achieving appropriate returns for investors.

Each chapter also includes a contrast company. In most cases, the contrast company will present a key chapter topic in an industry that is different from that of the focus company. In this chapter, the focus company (Walt Disney) is an entertainment services company, whereas the contrast company (Whole Foods Market) is a food retailer.







Many different kinds of organizations affect our daily lives. Manufacturers, retailers, service industry firms, agribusiness companies, nonprofit organizations, and government agencies provide us with a vast array of goods and services. All of these organizations have two things in common. First, every organization has a set of *goals* or objectives. An airline, such as Quantas or Southwest Airlines, might specify profitability and customer service as its goals. The New York Police Department's goals would include public safety and security coupled with cost minimization. Second, in pursuing an organization's goals, managers need *information*. The information needs of management range across financial, production, marketing, legal, and environmental issues. Generally, the larger the organization is, the greater is management's need for information.

Learning Objective 1-1

Define managerial accounting and describe its role in the management process. **Managerial accounting** is the process of identifying, measuring, analyzing, interpreting, and communicating information in pursuit of an organization's goals. Managerial accounting is an integral part of the management process, and managerial accountants are important strategic partners in an organization's management team. But note that the actions listed above are not done just by accountants: all managers use the tools of managerial accounting. That is why you are here—even if you are not planning to be an accountant!

In this chapter, we will explore the role of managerial accounting within the overall management process. In the remaining chapters, we will expand our study by exploring the many concepts and tools used in managerial accounting.

Managerial Accounting: A Business Partnership with Management

An organization's management team seeks to create value for the organization by managing resources, activities, and people to achieve the organization's goals effectively. Managerial accounting provides tools and perspectives that help managers accomplish this, and for that reason it is important that every business student should study it.

Managerial accountants are specialists in using the tools of managerial accounting to help the organization and its managers run the operation effectively. Their knowledge builds from the material in this textbook to include advanced tools as well as knowledge and techniques specific to a company and its industry.

The role of managerial accounting is very different now than it was years ago. In the past, managerial accountants were organized into support departments, often physically separated from the managers for whom they provided reports and information. Now, rather than isolate managerial accountants in a separate department, companies usually locate them in the operating departments where they are working with other managers to make decisions and resolve operational problems. Managerial accountants, often carrying the job title of "analyst," take on leadership roles on their teams and are sought out for the valuable information they provide. The role of the accountant in leading-edge companies "has been transformed from number cruncher and financial historian to being business partner and trusted advisor."² And the tools of managerial accounting are used by all managers.

business advisors, more than just accountants, and that has a lot to do with the additional analysis and the forward-looking goals we are setting." (1a)¹ Caterpillar

"We are looked upon as

Managing Resources, Activities, and People

The owners, directors, or trustees of an organization set its goals, generally with the help of management. For example, The Walt Disney Company's goals are set by its board of directors, who are elected by the company's stockholders. The overall goal of The Walt Disney Company, according to a recent annual report, may be expressed as a commitment to creative excellence and corporate citizenship coupled with strict financial discipline in order to maximize value to the company's shareholders.³

In pursuing its goals, an organization acquires *resources* (for example, funding, patents, and buildings), hires *people*, and then engages in an organized set of *activities*. It is up to the management team to make the best use of the organization's resources, activities, and people in achieving the organization's goals. The day-to-day work of the management team comprises four activities:

Decision making

• Directing operational activities

Planning

Controlling

²Gary Siegel, "The Image of Corporate Accountants," Strategic Finance 82, no. 2 (August 2000), p. 71.

Walt Disney Company

Learning Objective 1-2

Explain four fundamental management processes that help organizations attain their goals.

¹*In Their Own Words* Throughout the text, you will find these quotes from both practicing managers and managerial accountants. Collectively they portray the important role managerial accounting plays in today's dynamic business environment. The references for these quotes appear at the end of the text, beginning on page 781. The references are organized by chapter; thus reference (1a) relates to the first quote in Chapter 1, and so forth.

³The Walt Disney Company, which is discussed in this chapter, is, of course, a real company. However, the subsequent focus organizations around which chapters are built are not real organizations. They are, however, realistic settings in which to discuss business and managerial accounting issues. In most cases, they are based on real organizations. Similarly, each chapter includes a discussion of a contrast company. Some of these contrast companies, such as food retailer Whole Foods Market, Inc., in this chapter, are real companies. Others, however, are fictitious companies that are based on real organizations. These realistic illustrations and scenarios are intended to help students connect the business and managerial accounting issues discussed in this book to everyday life.

Decision Making

Several years ago, Disney's board of directors decided as one of the company's growth objectives to expand its theme park operations in Florida. It was not immediately clear, however, what would be the best way to accomplish that goal. Would it be best to expand one of the company's three existing theme parks—the Magic Kingdom, Epcot, or Disney's Hollywood Studios? Or should the company branch out in an entirely new direction with a brand new theme park attraction? How would each of these alternative courses of action mesh with the company's other goals of bringing the best in creative entertainment to its customers and maintaining sound financial discipline? Disney's top management team had to *make a decision* about the best way to expand the company's Florida operations, which entailed *choosing among the available alternatives*.

Planning

Disney's top management team decided to expand the company's Florida operations by building an entirely new theme park named Disney's Animal Kingdom. Created and designed by Walt Disney's Imagineering Division, this 500-acre theme park would offer guests wide-ranging adventures and tell the fascinating stories of all animals—ancient and present-day, real and imagined. Now the detailed planning phase began. How would the Animal Kingdom's many attractions designed by the Imagineering Division be laid out and organized? What food and beverage operations would be appropriate? How many employees would be needed on a day-to-day basis? What supplies would be required to run the park? How much would electricity and other utilities cost? How much would running the park during a typical year cost? Finally, how should the park's admission be priced given predicted attendance? Disney's management team had to *plan* for running the Animal Kingdom, which meant *developing a detailed financial and operational description of anticipated operations*.

Directing Operational Activities

Now the theme park has been built, equipped, and staffed. How many cashiers should be on duty on Saturday morning? How much food should be ordered each day? How much cash will be needed to meet the payroll, pay the utility bills, and buy maintenance supplies next month? All of these questions fall under the general heading of *directing operational activities*, which means *running the organization on a day-to-day basis*.

Controlling

The theme park has operated for several years now. Is the company's goal being accomplished? More specifically, have the theme park's operations adhered to the plans developed by management for achieving the goal? In seeking to answer these questions, management is engaged in *control*, which means *ensuring that the organization operates in the intended manner and achieves its goals*.

How Managerial Accounting Adds Value to the Organization

Managers need information for all of the managerial activities described in the preceding section. That information comes from a variety of sources, including economists, financial experts, marketing and production personnel, accountants, and the organization's managerial accounting system.

"The accounting people are expected to do things that are much more strategic and much more forward looking than [they] have been expected to do in the past." (1b) Caterpillar

In Their Own Words These quotes are from practicing managers or managerial accountants. The quotes show how various managerial accounting concepts are actually used and that managerial accountants are key players in most companies.

Objectives of Managerial Accounting Activity

Managerial accounting activity comprises a set of tools, systems and perspectives that add value to an organization by supporting five major objectives:

- **1.** Providing information for decision making and planning.
- 2. Assisting managers in directing and controlling operational activities.
- 3. Motivating managers and other employees toward the organization's goals.
- 4. Measuring the performance of activities, subunits, managers, and other employees within the organization.
- 5. Assessing the organization's competitive position, and working with other managers to ensure the organization's long-run competitiveness in its industry.

Although financial data make up a large part of the inputs and outputs of a managerial accounting system, there is a strong trend toward the presentation of nonfinancial data as well. Managerial accounting systems supply all kinds of information to management in support of management's role in directing the organization's activities. Measuring, managing, and continually improving operational activities are critical to an organization's success. As we will see in subsequent chapters, contemporary managerial accounting systems are focusing more and more on the activities that occur at all levels of the organization.

To illustrate the objectives of managerial accounting activity, let us continue with the example of Disney's Animal Kingdom.

Providing Information for Decision Making and Planning For virtually all major decisions, Disney's management team would rely heavily on managerial accounting information. For example, the *decision* to establish the new theme park would be influenced by estimates of the costs of building the Animal Kingdom and maintaining it throughout its life. The theme park's managers also would rely on managerial accounting data in formulating plans for the park's operations. Prominent in those *plans* would be a budget detailing the projected revenues and costs of providing entertainment.

Because of the complexity and importance of this decision, Disney's managerial accountants were key participants in the management team as decisions were made and plans formulated for the theme park's operations.

Assisting Managers in Directing and Controlling Operational Activities Directing and controlling day-to-day operations require a variety of data about the process of providing entertainment services. For example, in *directing* operational activities, the park's management team would need data about customer food-service demand patterns in order to make sure appropriate staffing was provided in the theme park's various food venues. In *controlling* operations, management would compare actual costs incurred with those specified in the budget.

Managerial accounting information often assists management through its **attentiondirecting function.** Managerial accounting reports rarely solve a decision problem. However, managerial accounting information often directs managers' attention to an issue that requires their skills. To illustrate, suppose Disney's Animal Kingdom incurred electricity costs that significantly exceeded the budget. This fact does not explain why the budget was exceeded, nor does it tell management what action to take, but it does direct management's attention to the situation. Suppose that upon further investigation, the accounting records reveal that Disney's electric rates have increased substantially. This information will help management in framing the decision problem. Should steps be taken to conserve electricity? Should they seek out a different electric power provider? Perhaps management should consider investing in a more sophisticated air conditioning system to manage the Florida heat. Learning Objective 1-3

List and describe five objectives of managerial accounting activity.

"In five years [we will become] even more strategic. Really understanding the ins and outs of all the organizations, and really trying to be visionary understanding what is happening to our business." (1c) Hewlett-Packard

What we're seeing is less transactional and more decision support type of work. More analytical, more . . . option analysis. Looking at the whole spectrum of options in helping management make decisions." (1d) Facebook, Walmart, Amazon.com, Coursera, and edX

The managerial accounting practices of wellknown, real-world organizations are highlighted in these boxes. You'll see how topics in the chapter are actually used. Actual companies are indicated in blue whenever they are referenced.

USING MANAGERIAL ACCOUNTING TO MONETIZE THE INTERNET

Monetizing the Internet means finding a way to generate revenues from users in order to make a profit after the costs of providing the Internet service or content. Creating a successful revenue model is one of the biggest challenges faced by Internet companies. Here are some examples of how companies are using managerial accounting to try to monetize the Internet.

Facebook

Four months after **Facebook**'s initial public offering (IPO) of its stock on May 18, 2012, with its shares trading more than 50% below their \$38 per share initial offering price, investors were demanding answers to a question they had begun asking soon after the IPO: "How will [Facebook] continue to monetize its more than 900 million users on a consistent basis?"⁴ Many changes in Facebook's site during the following months were intended to do exactly that, with managerial accountants analyzing the costs and benefits of different courses of action. For example, design changes in March 2013 were intended to "help the company increase monetization by improving its ability to target content to users with increased precision based on 'likes."⁵⁵

Walmart

Walmart was slow to embrace internet sales because of their investment in bricks-andmortar stores. But now they use it in conjunction with their stores to provide what competitor Amazon.com cannot. "Customers who buy some of the more than 1.5 million products on Walmart.com can have them shipped free to a local Walmart, where new service desks at the front of some stores make it easier for customers to retrieve their stuff."⁶ A managerial accounting cost analysis showed the initiative to be profitable, so Walmart is now experimenting with other innovations to take advantage of their retail infrastructure. For example, "Pay with Cash" allows customers to pay at the store when the merchandise is picked up. "30% of these customers are new to WalMart.com . . . [which] suggests a lot of Wal-Mart customers are still concerned about using credit and debit cards online."⁷ *The payoff:* Walmart.com is now one of the top e-commerce sites.

Higher Education

Many view the Internet as the solution to the high cost of higher education, and companies like **Coursera** and **edX** have sprung up to deliver MOOCs (massive open online courses). While their effectiveness is yet to be proven, their efficiency in bringing content to thousands of users appeals to many. But there is one unsolved problem: even if it proves to be effective, no one has yet figured out how to monetize MOOCs! "All of this could well add up to the future of higher education—if anyone can figure out how to make money."⁸

Motivating Managers and Other Employees Toward the Organization's Goals Organizations have goals. However, organizations also are made up of people who have goals of their own. The goals of individuals are diverse, and they do not always match those of the organization. A key purpose of managerial accounting is to motivate managers and

⁴Steven Russolillo and Kaitlyn Kiernan, "MarketBeat: Facebook Shares Fall Below \$30," *Wall Street Journal*, May 29, 2012.

⁵Andrew Tonner, "What Does Facebook's Redesign Mean for Investors?" *The Motley Fool*, March 7, 2013, http://www.fool.com/investing/general/2013/03/07/what-does-facebooks-redesign-mean-for-investors.aspx.

⁶M. Bustillo and G. A. Fowler, "Wal-Mart Uses Its Stores To Get an Edge Online," *The Wall Street Journal*, December 15, 2009, p. B1.

 ⁷Alistair Barr, "Wal-Mart Sees Sales Lift from Pay With Cash, Search," *Reuters.com*, June 6, 2012.
 ⁸Tamar Lewin, "Students Rush to Web Classes, But Profits May Be Much Later," *New York Times*, January 7, 2013, p. A1.

other employees to direct their efforts toward achieving the organization's goals. One means of achieving this purpose is through budgeting. In establishing a budget for Disney's Animal Kingdom, top management indicates how resources are to be allocated and what activities are to be emphasized. When actual operations do not conform to the budget, the managerial accounting system will highlight the deviation from plan, and managerial accounting tools will help the theme park's managers to analyze and explain the reasons for the deviation.

Measuring the Performance of Activities, Subunits, Managers, and Other Employees Within the Organization One means of motivating people toward the organization's goals is to measure their performance in achieving those goals. Such measurements then can be used as the basis for rewarding performance through positive feedback, promotions, and pay raises. For example, most large corporations compensate their executives, in part, on the basis of the profit achieved by the subunits they manage. In other organizations, managers are rewarded on the basis of operational measures, such as product quality, sales, or on-time delivery. At Disney's Animal Kingdom, for example, management could be rewarded, in part, on the basis of growth in attendance at the theme park.

In addition to measuring the performance of people, the managerial accounting system measures the performance of an organization's subunits, such as divisions, product lines, geographical territories, and departments. These measurements help the subunits' managers obtain the highest possible performance level in their units. Such measurements also help top management decide whether a particular subunit is a viable economic investment. For example, it may turn out that a particular attraction at Disney's Animal Kingdom is too costly an activity to continue, despite the efforts of a skilled management team.

Assessing the Organization's Competitive Position, and Working with Other Managers to Ensure the Organization's Long-Run Competitiveness in Its Industry The business environment often changes very rapidly. These changes result from global competition, rapidly advancing technology, and improved communication systems, such as social media. The activities that make an enterprise successful today may no longer be sufficient next year. A crucial role of managerial accounting is to continually assess how an organization stacks up against the competition, with an eye toward continuously improving. Among the questions asked in assessing an organization's competitive position are the following:

- How well is the organization doing in its internal operations and business processes?
- How well is the organization doing in the eyes of its customers? Are their needs being served as well as possible?
- How well is the organization doing from the standpoint of innovation, learning, and continuously improving operations? Is the organization a trendsetter that embraces new products, new services, and new technology? Or is it falling behind?
- How well is the organization doing financially? Is the enterprise viable as a continuing entity?

The Balanced Scorecard

One example of a managerial accounting tool that is used to assess competitive position and ensure long-run competitiveness is a management framework called the *balanced scorecard*.⁹ Depicted in Exhibit 1–1 for The Walt Disney Company, the **balanced scorecard** is a model of business performance evaluation that includes several types of financial and non-financial performance measures. You want to be on the team. You want to be the business consultant. You want to be thought of as a value-adding department versus just someone who closes the books." (1e)

(now part of CenturyLink)

Owest

⁹The balanced scorecard concept was developed by Robert S. Kaplan and David P. Norton. See Robert S. Kaplan and David P. Norton, *The Strategy-Focused Organization: How Balanced Scorecard Companies Thrive in the New Business Environment* (Boston: Harvard Business School Press, 2001).