CONTENTS

Preface P-1
A Word of Thanks P-25

PART 1: Introduction

CHAPTER 1: Economics: Foundations and Models 2
Will Smart Devices Revolutionize Health Care? 3
1.1 Three Key Economic Ideas 4
People Are Rational 5
People Respond to Economic Incentives 5
Making the Connection: Does Health Insurance Give People an Incentive to Become Obese? 5
Optimal Decisions Are Made at the Margin 7
Solved Problem 1.1: OraSure Makes a Decision at the Margin 7
1.2 The Economic Problem That Every Society Must Solve 8
Making the Connection: It's Saturday Afternoon; Why Aren't You at the Game? 9
What Goods and Services Will Be Produced? 10
How Will the Goods and Services Be Produced? 10
Who Will Receive the Goods and Services Produced? 10
Centrally Planned Economies versus
Market Economies 10
The Modern "Mixed" Economy 11
Efficiency and Equity 12
1.3 Economic Models 12
The Role of Assumptions in Economic Models 13
Forming and Testing Hypotheses in Economic Models 13
Positive and Normative Analysis 14
Don't Let This Happen to You Don't Confuse Positive Analysis with Normative Analysis 15
Economics as a Social Science 15
Making the Connection: Should Medical School Be Free? 16
1.4 Microeconomics and Macroeconomics 17
1.5 A Preview of Important Economic Terms 17
Conclusion 19
An Inside Look: Smart Medical Devices—Right Before Your Very Eyes 20
*Chapter Summary and Problems 22
Key Terms, Summary, Review Questions, Problems and Applications

Appendix: Using Graphs and Formulas 27
Graphs of One Variable 28
Graphs of Two Variables 29
Slopes of Lines 30

Taking into Account More Than Two Variables on a Graph 30
Positive and Negative Relationships 32
Determining Cause and Effect 32
Are Graphs of Economic Relationships Always Straight Lines? 34
Slopes of Nonlinear Curves 34
Formulas 34
Formula for a Percentage Change 35
Formulas for the Areas of a Rectangle and a Triangle 36
Summary of Using Formulas 37
Problems and Applications 37

CHAPTER 2: Trade-offs, Comparative Advantage, and the Market System 40
Managers at Tesla Motors Face Trade-offs 41
2.1 Production Possibilities Frontiers and Opportunity Costs 42
Graphing the Production Possibilities Frontier 42
Solved Problem 2.1: Drawing a Production Possibilities Frontier for Tesla Motors 44
Increasing Marginal Opportunity Costs 46
Economic Growth 47
2.2 Comparative Advantage and Trade 48
Specialization and Gains from Trade 48
Absolute Advantage versus Comparative Advantage 50
Comparative Advantage and the Gains from Trade 51
Don't Let This Happen to You Don't Confuse Absolute Advantage and Comparative Advantage 51
Solved Problem 2.2: Comparative Advantage and the Gains from Trade 52
Making the Connection: Comparative Advantage, Opportunity Cost, and Housework 53
2.3 The Market System 54
The Circular Flow of Income 55
The Gains from Free Markets 56
The Market Mechanism 56
Making the Connection: A Story of the Market System in Action: How Do You Make an iPad? 57
The Role of the Entrepreneur in the Market System 59
The Legal Basis of a Successful Market System 59
Making the Connection: An Elementary Case of Copyright 61
Conclusion 63
An Inside Look: You're Going to Need a MUCH Bigger Charging Station 64

*These end-of-chapter resource materials repeat in all chapters. Select chapters also include Real-Time Data Exercises.
Externalities and Market Failure 150
What Causes Externalities? 151
5.2 Private Solutions to Externalities: The Coase Theorem 151
  The Economically Efficient Level of Pollution Reduction 152
  Making the Connection: The Clean Air Act: How a Government Policy Reduced Infant Mortality 152
  The Basis for Private Solutions to Externalities 154
Don’t Let This Happen to You Remember That It’s the Net Benefit That Counts 155
Don’t Let This Happen to You Don’t Confuse Inelastic with Perfectly Inelastic 189
6.2 The Determinants of the Price Elasticity of Demand and Total Revenue 191
  Availability of Close Substitutes 191
  Passage of Time 191
  Luxuries versus Necessities 191
  Definition of the Market 191
  Share of a Good in a Consumer’s Budget 192
  Some Estimated Price Elasticities of Demand 192
6.3 The Relationship between Price Elasticity of Demand and Total Revenue 193
  Elasticity and Revenue with a Linear Demand Curve 194
  Solved Problem 6.3: Price and Revenue Don’t Always Move in the Same Direction 195
  Making the Connection: Why Does Amazon Care about Price Elasticity? 196
6.4 Other Demand Elasticities 197
  Cross-Price Elasticity of Demand 197
  Income Elasticity of Demand 198
  Making the Connection: Price Elasticity, Cross-Price Elasticity, and Income Elasticity in the Market for Alcoholic Beverages 199
6.5 Using Elasticity to Analyze the Disappearing Family Farm 200
  Solved Problem 6.5: Using Price Elasticity to Analyze a Policy of Taxing Gasoline 201
6.6 The Price Elasticity of Supply and Its Measurement 202
  Measuring the Price Elasticity of Supply 202
  Determinants of the Price Elasticity of Supply 203
  Making the Connection: Why Are Oil Prices So Unstable? 203
  Polar Cases of Perfectly Elastic and Perfectly Inelastic Supply 204
  Using Price Elasticity of Supply to Predict Changes in Price 206
Conclusion 207

CHAPTER 7: The Economics of Health Care 216
How Much Will You Pay for Health Insurance? 217
7.1 The Improving Health of People in the United States 218
  Changes over Time in U.S. Health 219
  Reasons for Long-Run Improvements in U.S. Health 219
7.2 Health Care around the World 220
  The U.S. Health Care System 220
  Making the Connection: The Increasing Importance of Health Care in the U.S. Economy 222
  The Health Care Systems of Canada, Japan, and the United Kingdom 223
  Comparing Health Care Outcomes around the World 224
7.3 Information Problems and Externalities in the Market for Health Care 226
  Adverse Selection and the Market for “Lemons” 226
Asymmetric Information in the Market for Health Insurance 227

Don’t Let This Happen to You Don’t Confuse Adverse Selection with Moral Hazard 228

Externalities in the Market for Health Care 229

Should the Government Run the Health Care System? 231

7.4 The Debate over Health Care Policy in the United States 232

The Rising Cost of Health Care 232

Making the Connection: Are U.S. Firms Handicapped by Paying for Their Employees’ Health Insurance? 234

Explaining Increases in Health Care Spending 235

Solved Problem 7.4: Recent Trends in Health Care 238

The Continuing Debate over Health Care Policy 239

Making the Connection: How Much Is That MRI Scan? 241

Conclusion 243

PART 3: Firms in the Domestic and International Economies

CHAPTER 8: Firms, the Stock Market, and Corporate Governance 250

Is Twitter the Next Facebook? 251

8.1 Types of Firms 252

Who Is Liable? Limited and Unlimited Liability 252

Corporations Earn the Majority of Revenue and Profits 253

Making the Connection: Why Are Fewer Young People Starting Businesses? 254

The Structure of Corporations and the Principal–Agent Problem 255

8.2 How Firms Raise Funds 256

Sources of External Funds 256

Making the Connection: The Rating Game: Is the U.S. Treasury Likely to Default on Its Bonds? 257

Stock and Bond Markets Provide Capital—and Information 259

Don’t Let This Happen to You When Twitter Shares Are Sold, Twitter Doesn’t Get the Money 260

The Fluctuating Stock Market 260

Making the Connection: Why Are Many People Poor Stock Market Investors? 261

Solved Problem 8.2: Why Does Warren Buffett Like Mutual Funds? 262

8.3 Using Financial Statements to Evaluate a Corporation 263

The Income Statement 264

The Balance Sheet 265

8.4 Corporate Governance Policy and the Financial Crisis of 2007–2009 265

The Accounting Scandals of the Early 2000s 265

The Financial Crisis of 2007–2009 266

Did Principal–Agent Problems Help Cause the 2007–2009 Financial Crisis? 267

Solved Problem 8.4: Will Dodd-Frank Improve Corporate Governance? 268

Conclusion 269

Appendix: Tools to Analyze Firms’ Financial Information 275

Using Present Value to Make Investment Decisions 275

Solved Problem 8A.1: How to Receive Your Contest Winnings 277

Using Present Value to Calculate Bond Prices 277

Using Present Value to Calculate Stock Prices 278

A Simple Formula for Calculating Stock Prices 279

Going Deeper into Financial Statements 280

Analyzing Income Statements 280

Analyzing Balance Sheets 281

CHAPTER 9: Comparative Advantage and the Gains from International Trade 284

President Obama, Nike, and Free Trade 285

9.1 The United States in the International Economy 286

The Importance of Trade to the U.S. Economy 287

Making the Connection: Would New Balance Be Helped or Hurt by the Trans-Pacific Partnership? 287

U.S. International Trade in a World Context 288

9.2 Comparative Advantage in International Trade 289

A Brief Review of Comparative Advantage 289

Comparative Advantage and Absolute Advantage 290

9.3 How Countries Gain from International Trade 291

Increasing Consumption through Trade 291

Solved Problem 9.3: The Gains from Trade 292

Why Don’t We See Complete Specialization? 294

Does Anyone Lose as a Result of International Trade? 294

Don’t Let This Happen to You Remember That Trade Creates Both Winners and Losers 295

Where Does Comparative Advantage Come From? 295

Comparative Advantage over Time: The Rise and Fall—and Rise—of the U.S. Consumer Electronics Industry 296

9.4 Government Policies That Restrict International Trade 296

Tariffs 297

Quotas and Voluntary Export Restraints 299

Measuring the Economic Effect of the Sugar Quota 300

Solved Problem 9.4: Measuring the Economic Effect of a Quota 301

The High Cost of Preserving Jobs with Tariffs and Quotas 302

Making the Connection: Smoot-Hawley, the Politics of Tariffs, and the Price of Protecting a Vanishing Industry 302

Gains from Unilateral Elimination of Tariffs and Quotas 304

Other Barriers to Trade 304
CONTENTS

Is Zero Economic Profit Inevitable in the Long Run? 452
Solved Problem 13.3: Buffalo Wild Wings
   Increases Costs to Increase Demand 453

13.4 Comparing Monopolistic Competition
   and Perfect Competition 455
   Excess Capacity under Monopolistic Competition 455
   Is Monopolistic Competition Inefficient? 456
   How Consumers Benefit from Monopolistic
   Competition 456
   Making the Connection: Are All Cupcakes
   the Same? 456

13.5 How Marketing Differentiates Products 457
   Brand Management 457
   Advertising 458
   Defending a Brand Name 458

13.6 What Makes a Firm Successful? 458
   Making the Connection: Is Being the First Firm
   in the Market a Key to Success? 459

Conclusion 461

CHAPTER 14: Oligopoly: Firms in Less
   Competitive Markets 470

Apple, Spotify, and the Music Streaming
   Revolution 471
14.1 Oligopoly and Barriers to Entry 472
   Barriers to Entry 473
   Making the Connection: Hard Times in
   Atlantic City 475

14.2 Game Theory and Oligopoly 476
   A Duopoly Game: Price Competition between
   Two Firms 476
   Firm Behavior and the Prisoner’s Dilemma 478
   Don’t Let This Happen to You Don’t
   Misunderstand Why Each Firm Ends Up
   Charging a Price of $9.99 478
   Solved Problem 14.2: Is Same-Day
   Delivery a Prisoner’s Dilemma for Walmart
   and Amazon? 478
   Can Firms Escape the Prisoner’s Dilemma? 479
   Making the Connection: Do Airlines Collude on
   Capacity to Keep Prices High? 481
   Cartels: The Case of OPEC 482

14.3 Sequential Games and Business Strategy 484
   Deterring Entry 484
   Solved Problem 14.3: Is Deterring Entry
   Always a Good Idea? 486
   Bargaining 486

14.4 The Five Competitive Forces Model 488
   Competition from Existing Firms 488
   The Threat from Potential Entrants 488
   Competition from Substitute Goods or Services 489
   The Bargaining Power of Buyers 489
   The Bargaining Power of Suppliers 489
   Making the Connection: Can We Predict
   Which Firms Will Continue to Be Successful? 489

Conclusion 491

CHAPTER 15: Monopoly and Antitrust Policy 498
A Monopoly on Lobster Dinners in Maine? 499
15.1 Is Any Firm Ever Really a Monopoly? 500
   Making the Connection: Is the NCAA
   a Monopoly? 500

15.2 Where Do Monopolies Come From? 502
   Government Action Blocks Entry 502
   Making the Connection: Does Hasbro Have a
   Monopoly on Monopoly? 503
   Control of a Key Resource 504
   Making the Connection: Are Diamond Profits
   Forever? The De Beers Diamond Monopoly 504
   Natural Monopoly 506

15.3 How Does a Monopoly Choose Price
   and Output? 507
   Marginal Revenue Once Again 507
   Profit Maximization for a Monopolist 509
   Solved Problem 15.3: Finding the
   Profit-Maximizing Price and Output for a
   Cable Monopoly 510
   Don’t Let This Happen to You Don’t Assume
   That Charging a Higher Price Is Always More
   Profitable for a Monopolist 511

15.4 Does Monopoly Reduce Economic
   Efficiency? 511
   Comparing Monopoly and Perfect Competition
   Measuring the Efficiency Losses from Monopoly
   How Large Are the Efficiency Losses Due
   to Monopoly? 513
   Market Power and Technological Change 514

15.5 Government Policy toward Monopoly 514
   Antitrust Laws and Antitrust Enforcement 514
   Making the Connection: Did Apple Violate
   the Law in Pricing e-Books? 515
   Mergers: The Trade-off between Market Power and
   Efficiency 517
   The Department of Justice and FTC Merger
   Guidelines 518
   Regulating Natural Monopolies 520
   Solved Problem 15.5: What Should Your College
   Charge for a MOOC? 521

Conclusion 523

CHAPTER 16: Pricing Strategy 530
Walt Disney Discovers the Magic of Big Data 531
16.1 Pricing Strategy, the Law of One Price,
   and Arbitrage 532
   Arbitrage 532
   Solved Problem 16.1: Is Arbitrage
   Just a Rip-off? 533
   Why Don’t All Firms Charge the Same Price? 533

16.2 Price Discrimination: Charging Different
   Prices for the Same Product 534
   The Requirements for Successful Price
   Discrimination 534
PART 6: Labor Markets, Public Choice, and the Distribution of Income

CHAPTER 17: The Markets for Labor and Other Factors of Production 556

Rio Tinto Mines with Robots 557

17.1 The Demand for Labor 558
The Marginal Revenue Product of Labor 558

Solved Problem 17.1: Hiring Decisions by a Firm That Is a Price Maker 560
The Market Demand Curve for Labor 561
Factors That Shift the Market Demand Curve for Labor 561

17.2 The Supply of Labor 562
The Market Supply Curve of Labor 563
Factors That Shift the Market Supply Curve of Labor 563

17.3 Equilibrium in the Labor Market 564
The Effect on Equilibrium Wages of a Shift in Labor Demand 565

Making the Connection: Is Investing in a College Education a Good Idea? 565
The Effect on Equilibrium Wages of a Shift in Labor Supply 566

Making the Connection: Should You Fear the Effect of Robots on the Labor Market? 567

17.4 Explaining Differences in Wages 569

Don't Let This Happen to You Remember That Prices and Wages Are Determined at the Margin 571

Making the Connection: Technology and the Earnings of “Superstars” 571

Compensating Differentials 572
Discrimination 573

Solved Problem 17.4: Is Passing “Comparable Worth” Legislation a Good Way to Close the Gap between Men’s and Women’s Pay? 574

Making the Connection: Does Greg Have an Easier Time Finding a Job Than Jamal? 576
Labor Unions 578

17.5 Personnel Economics 579

Solved Problem 17.2: How Apple Uses Price Discrimination to Increase Profits 576

Making the Connection: Why Is the Price of a J.Crew Jacket So Much Lower at an Outlet Mall? 539
Perfect Price Discrimination 539
Price Discrimination across Time 541
Can Price Discrimination Be Illegal? 541

Making the Connection: The Internet Leaves You Open to Price Discrimination 542

16.3 Other Pricing Strategies 543

Odd Pricing: Why Is the Price $2.99 Instead of $3.00? 543
Why Do McDonald’s and Other Firms Use Cost-Plus Pricing? 544

Making the Connection: Cost-Plus Pricing in the Publishing Industry 544
How Can Using Two-Part Tariffs Increase a Firm’s Profits? 546

Conclusion 549

CHAPTER 18: Public Choice, Taxes, and the Distribution of Income 594

Should the Government Use the Tax System to Reduce Inequality? 595

18.1 Public Choice 596
How Do We Know the Public Interest? Models of Voting 596
Government Failure? 598
Is Government Regulation Necessary? 600

18.2 The Tax System 600
An Overview of the U.S. Tax System 601
Progressive and Regressive Taxes 602

Making the Connection: Which Groups Pay the Most in Federal Taxes? 603
Marginal and Average Income Tax Rates 604
The Corporate Income Tax 604
International Comparison of Corporate Income Taxes 605
Evaluating Taxes 605

18.3 Tax Incidence Revisited: The Effect of Price Elasticity 607

Don't Let This Happen to You Don’t Confuse Who Pays a Tax with Who Bears the Burden of the Tax 608

Making the Connection: Do Corporations Really Bear the Burden of the Federal Corporate Income Tax? 609

Solved Problem 18.3: The Effect of Price Elasticity on the Excess Burden of a Tax 610
18.4 Income Distribution and Poverty 611

Measuring the Income Distribution and Poverty 611

Showing the Income Distribution with a Lorenz Curve 612

Problems in Measuring Poverty and the Distribution of Income 613

Solved Problem 18.4: What's the Difference between Income Mobility and Income Inequality? 615

Explaining Income Inequality 617

Policies to Reduce Income Inequality 618

Making the Connection: Who Are the 1 Percent, and How Do They Earn Their Incomes? 620

Income Distribution and Poverty around the World 621

Conclusion 623

Glossary G-1

Company Index I-1

Subject Index I-3

Credits C-1