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# 曼 昆

(美) N. Gregory Mankiw 著



PRINCIPLES OF

# ECONOMICS

THIRD EDITION

## 经济学原理

第3版  
(英文版)



美国300所大学的标准教科书  
最令人鼓舞的经济学教科书  
最令学生亲近的经济学教科书



清华大学出版社

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(美) N. 格雷戈里·曼昆 著

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(英文版)

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**Principles of Economics, 3ed**

N. Gregory Mankiw

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为了适应经济全球化的发展趋势,满足国内广大读者了解、学习和借鉴国外先进的管理经验和掌握经济理论的前沿动态,清华大学出版社与国外著名出版公司合作影印出版一系列英文版经济管理方面的图书。我们所选择的图书,基本上是已再版多次、在国外深受欢迎、并被广泛采用的优秀教材,是该领域中较具权威性的经典之作。

曼昆教授的这本《经济学原理》,自1997年首次出版以来,已经被全世界100多万学生使用,深受学生和教师的喜爱,被翻译成多种语言。很多学生因学习这本书而深深地爱上了经济学。这本书的中文翻译版也已经在我国出版。

感谢汤姆森学习出版集团对清华大学出版社独家授予本书的影印版版权,使我们能够将这本深受读者喜爱的经济学教科书原汁原味地奉献给更多的中国读者,使读者能够既轻松地学习经济学,又感受到曼昆教授的语言魅力。在本书的审阅过程中,我们得到了清华大学经济管理学院钟笑寒老师的热心帮助和支持,在此表示感谢!

由于原作者所处国家的政治、经济和文化背景等与我国不同,对书中所持观点,敬请广大读者在阅读过程中注意加以分析和鉴别。

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## ABOUT THE AUTHOR



JORDI CABRÉ

N. Gregory Mankiw is Professor of Economics at Harvard University. As a student, he studied economics at Princeton University and MIT. As a teacher, he has taught macroeconomics, microeconomics, statistics, and principles of economics. He even spent one summer long ago as a sailing instructor on Long Beach Island.

Professor Mankiw is a prolific writer and a regular participant in academic and policy debates. His work has been published in scholarly journals, such as the *American Economic Review*, *Journal of Political Economy*, and *Quarterly Journal of Economics*, and in more popular forums, such as *The New York Times*, *The Financial Times*, *The Wall Street Journal*, and *Fortune*. He is also author of the best-selling intermediate-level textbook *Macroeconomics* (Worth Publishers). In addition to his teaching, research, and writing, Professor Mankiw is a research associate of the National Bureau of Economic Research, an adviser to the Federal Reserve Bank of Boston and the Congressional Budget Office, and a member of the ETS test development committee for the advanced placement exam in economics.

Professor Mankiw lives in Wellesley, Massachusetts, with his wife and three children.

*To Catherine, Nicholas, and Peter,  
my other contributions to the next generation*

## P R E F A C E : T O T H E I N S T R U C T O R

During my 20-year career as a student, the course that excited me most was the two-semester sequence on the principles of economics that I took during my freshman year in college. It is no exaggeration to say that it changed my life.

I had grown up in a family that often discussed politics over the dinner table. The pros and cons of various solutions to society's problems generated fervent debate. But, in school, I had been drawn to the sciences. Whereas politics seemed vague, rambling, and subjective, science was analytic, systematic, and objective. While political debate continued without end, science made progress.

My freshman course on the principles of economics opened my eyes to a new way of thinking. Economics combines the virtues of politics and science. It is, truly, a social science. Its subject matter is society—how people choose to lead their lives and how they interact with one another. But it approaches the subject with the dispassion of a science. By bringing the methods of science to the questions of politics, economics tries to make progress on the challenges that all societies face.

I was drawn to write this book in the hope that I could convey some of the excitement about economics that I felt as a student in my first economics course. Economics is a subject in which a little knowledge goes a long way. (The same cannot be said, for instance, of the study of physics or the Japanese language.) Economists have a unique way of viewing the world, much of which can be taught in one or two semesters. My goal in this book is to transmit this way of thinking to the widest possible audience and to convince readers that it illuminates much about the world around them.

I believe that everyone should study the fundamental ideas that economics has to offer. One purpose of general education is to inform people about the world and thereby make them better citizens. The study of economics, as much as any discipline, serves this goal. Writing an economics textbook is, therefore, a great honor and a great responsibility. It is one way that economists can help promote better government and a more prosperous future. As the great economist Paul Samuelson put it, "I don't care who writes a nation's laws, or crafts its advanced treaties, if I can write its economics textbooks."

### For Whom Is This Book Written?

It is tempting for a professional economist writing a textbook to take the economist's point of view and to emphasize those topics that fascinate him and other economists. I have done my best to avoid that temptation. I have tried to put myself in the position of someone seeing economics for the first time. My goal is to emphasize the material that *students* should and do find interesting about the study of the economy.

One result is that this book is briefer than many books used to introduce students to economics. As a student, I was (and unfortunately still am) a slow reader. I groaned whenever a professor gave the class a 1,000-page tome to read. Of course, my reaction was not unique. The Greek poet Callimachus put it succinctly: "Big book, big bore." Callimachus made that observation in 250 B.C., so he was probably not referring to an economics textbook, but today his sentiment is echoed around the world every semester when students first see their economics assignments. My

goal in this book is to avoid that reaction by skipping the bells, whistles, and extraneous details that distract students from the key lessons.

Another result of this student orientation is that more of this book is devoted to applications and policy—and less to formal economic theory—than is the case with many other books written for the principles course. Throughout this book I have tried to return to applications and policy questions as often as possible. Most chapters include case studies illustrating how the principles of economics are applied. In addition, “In the News” boxes (most of which are new to this edition) offer excerpts from newspaper articles showing how economic ideas shed light on current issues facing society. After students finish their first course in economics, they should think about news stories from a new perspective and with greater insight.

## What’s New in the Third Edition?

Much has happened in the world since I wrote the last edition of this book. Over the past few years, another U.S. recession, a new president, a tax cut, corporate accounting scandals, a new European currency, and terrorist attacks have all altered the economic landscape. Because the teaching of economics has to stay current with an ever-changing world, this new edition includes dozens of new case studies and boxes.

In addition to updating the book, I have also refined its coverage and pedagogy with input from many users of the previous edition. There are many changes, both large and small. For example, the basic presentation of supply and demand in Chapter 4 has been rearranged and improved. More important, this new edition contains two new chapters. A new chapter on the “Frontiers of Microeconomics” introduces students to the economics of asymmetric information, political economy, and behavioral economics. A new chapter on “The Basic Tools of Finance” develops the concepts of present value, risk management, and asset valuation. (Only the complete 36-chapter version of this book includes both of these chapters. See below for outlines of each of the five available versions.) These new chapters are optional, and instructors can skip them without loss of continuity. But adding these topics should give students a greater appreciation of the use and scope of economics.

All the changes that I made, and the many others that I considered, were evaluated in light of the benefits of brevity. Like most things that we study in economics, a student’s time is a scarce resource. I always keep in mind a dictum from the great novelist Robertson Davies: “One of the most important things about writing is to boil it down and not bore the hell out of everybody.”

## How Is This Book Organized?

To write a brief and student-friendly book, I had to consider new ways to organize familiar material. What follows is a whirlwind tour of this text. The tour will, I hope, give instructors some sense of how the pieces fit together.

### Introductory Material

Chapter 1, “Ten Principles of Economics,” introduces students to the economist’s view of the world. It previews some of the big ideas that recur throughout economics, such as opportunity cost, marginal decisionmaking, the role of incentives, the gains from trade, and the efficiency of market allocations. Throughout the book, I refer regularly to the *Ten Principles of Economics* introduced in Chapter 1 to



remind students that these ideas are the foundation for all economics. An icon in the margin calls attention to these key, interconnected principles.

Chapter 2, "Thinking Like an Economist," examines how economists approach their field of study. It discusses the role of assumptions in developing a theory and introduces the concept of an economic model. It also discusses the role of economists in making policy. The appendix to this chapter offers a brief refresher course on how graphs are used and how they can be abused.

Chapter 3, "Interdependence and the Gains from Trade," presents the theory of comparative advantage. This theory explains why individuals trade with their neighbors, as well as why nations trade with other nations. Much of economics is about how market forces coordinate many individual production and consumption decisions. As a starting point for this analysis, students see in this chapter why specialization, interdependence, and trade can benefit everyone.

### The Fundamental Tools of Supply and Demand

The next three chapters introduce the basic tools of supply and demand. Chapter 4, "The Market Forces of Supply and Demand," develops the supply curve, the demand curve, and the notion of market equilibrium. Chapter 5, "Elasticity and Its Application," introduces the concept of elasticity and uses it to analyze events in three different markets. Chapter 6, "Supply, Demand, and Government Policies," uses these tools to examine price controls, such as rent-control and minimum-wage laws, and tax incidence.

Chapter 7, "Consumers, Producers, and the Efficiency of Markets," extends the analysis of supply and demand using the concepts of consumer surplus and producer surplus. It begins by developing the link between consumers' willingness to pay and the demand curve, and the link between producers' costs of production and the supply curve. It then shows that the market equilibrium maximizes the sum of the producer and consumer surplus. Thus, students learn early about the efficiency of market allocations.

The next two chapters apply the concepts of producer and consumer surplus to questions of policy. Chapter 8, "Application: The Costs of Taxation," shows why taxation results in deadweight losses and what determines the size of those losses. Chapter 9, "Application: International Trade," considers who wins and who loses from international trade and presents the debate over protectionist trade policies.

### More Microeconomics

Having examined why market allocations are often desirable, the book then considers how the government can sometimes improve on them. Chapter 10, "Externalities," explains how external effects such as pollution can render market outcomes inefficient and discusses the possible public and private solutions to those inefficiencies. Chapter 11, "Public Goods and Common Resources," considers the problems that arise when goods, such as national defense, have no market price. Chapter 12, "The Design of the Tax System," describes how the government raises the revenue necessary to pay for public goods. It presents some institutional background about the U.S. tax system and then discusses how the goals of efficiency and equity come into play when designing a tax system.

The next five chapters examine firm behavior and industrial organization. Chapter 13, "The Costs of Production," discusses what to include in a firm's costs, and it introduces cost curves. Chapter 14, "Firms in Competitive Markets," analyzes the behavior of price-taking firms and derives the market supply curve. Chapter 15, "Monopoly," discusses the behavior of a firm that is the sole seller in its

market. It discusses the inefficiency of monopoly pricing, the possible policy responses, and the attempts by monopolies to price discriminate. Chapter 16, "Oligopoly," covers markets in which there are only a few sellers, using the prisoners' dilemma as the model for examining strategic interaction. Chapter 17, "Monopolistic Competition," looks at behavior in a market in which many sellers offer similar but differentiated products. It also discusses the debate over the effects of advertising.

The next three chapters present issues related to labor markets. Chapter 18, "The Markets for the Factors of Production," emphasizes the link between factor prices and marginal productivity. Chapter 19, "Earnings and Discrimination," discusses the determinants of equilibrium wages, including compensating differentials, human capital, and discrimination. Chapter 20, "Income Inequality and Poverty," examines the degree of inequality in U.S. society, alternative views about the government's role in changing the distribution of income, and various policies aimed at helping society's poorest members.

The next two chapters present optional material. Chapter 21, "The Theory of Consumer Choice," analyzes individual decisionmaking using budget constraints and indifference curves. Chapter 22, "Frontiers of Microeconomics," introduces the topics of asymmetric information, political economy, and behavioral economics. Many instructors may skip all or some of this material. Instructors who do cover these topics may choose to assign these chapters earlier than they are presented in the book, and I have written them to give instructors flexibility.

### Macroeconomics

My overall approach to teaching macroeconomics is to examine the economy in the long run (when prices are flexible) before examining the economy in the short run (when prices are sticky). I believe that this organization simplifies learning macroeconomics for several reasons. First, the classical assumption of price flexibility is more closely linked to the basic lessons of supply and demand, which students have already mastered. Second, the classical dichotomy allows the study of the long run to be broken up into several, easily digested pieces. Third, because the business cycle represents a transitory deviation from the economy's long-run growth path, studying the transitory deviations is more natural after the long-run equilibrium is understood. Fourth, the macroeconomic theory of the short run is more controversial among economists than the macroeconomic theory of the long run. For these reasons, most upper-level courses in macroeconomics now follow this long-run-before-short-run approach; my goal is to offer introductory students the same advantage.

Returning to the detailed organization, I start the coverage of macroeconomics with issues of measurement. Chapter 23, "Measuring the Nation's Income," discusses the meaning of gross domestic product and related statistics from the national income accounts. Chapter 24, "Measuring the Cost of Living," discusses the measurement and use of the consumer price index.

The next four chapters describe the behavior of the real economy in the long run. Chapter 25, "Production and Growth," examines the determinants of the large variation in living standards over time and across countries. Chapter 26, "Saving, Investment, and the Financial System," discusses the types of financial institutions in our economy and examines their role in allocating resources. Chapter 27, "The Basic Tools of Finance," introduces present value, risk management, and asset pricing. Chapter 28, "Unemployment and Its Natural Rate," considers the long-run determinants of the unemployment rate, including job search, minimum-wage laws, the market power of unions, and efficiency wages.

Having described the long-run behavior of the real economy, the book then turns to the long-run behavior of money and prices. Chapter 29, "The Monetary System," introduces the economist's concept of money and the role of the central bank in controlling the quantity of money. Chapter 30, "Money Growth and Inflation," develops the classical theory of inflation and discusses the costs that inflation imposes on a society.

The next two chapters present the macroeconomics of open economies, maintaining the long-run assumptions of price flexibility and full employment. Chapter 31, "Open-Economy Macroeconomics: Basic Concepts," explains the relationship among saving, investment, and the trade balance, the distinction between the nominal and real exchange rate, and the theory of purchasing-power parity. Chapter 32, "A Macroeconomic Theory of the Open Economy," presents a classical model of the international flow of goods and capital. The model sheds light on various issues, including the link between budget deficits and trade deficits and the macroeconomic effects of trade policies. Because instructors differ in their emphasis on this material, these chapters are written so they can be used in different ways. Some may choose to cover Chapter 31 but not Chapter 32; others may skip both chapters; and still others may choose to defer the analysis of open-economy macroeconomics until the end of their courses.

After developing the long-run theory of the economy in Chapters 25 through 32, the book turns to explaining short-run fluctuations around the long-run trend. This organization simplifies teaching the theory of short-run fluctuations because, at this point in the course, students have a good grounding in many basic macroeconomic concepts. Chapter 33, "Aggregate Demand and Aggregate Supply," begins with some facts about the business cycle and then introduces the model of aggregate demand and aggregate supply. Chapter 34, "The Influence of Monetary and Fiscal Policy on Aggregate Demand," explains how policymakers can use the tools at their disposal to shift the aggregate-demand curve. Chapter 35, "The Short-Run Tradeoff between Inflation and Unemployment," explains why policymakers who control aggregate demand face a tradeoff between inflation and unemployment. It examines why this tradeoff exists in the short run, why it shifts over time, and why it does not exist in the long run.

The book concludes with Chapter 36, "Five Debates over Macroeconomic Policy." This capstone chapter considers five controversial issues facing policymakers: the proper degree of policy activism in response to the business cycle; the choice between rules and discretion in the conduct of monetary policy; the desirability of reaching zero inflation; the importance of balancing the government's budget; and the need for tax reform to encourage saving. For each issue, the chapter presents both sides of the debate and encourages students to make their own judgments.

## Learning Tools

The purpose of this book is to help students learn the fundamental lessons of economics and to show how such lessons can be applied to the world in which they live. Toward that end, I have used various learning tools that recur throughout the book.

**Case Studies** Economic theory is useful and interesting only if it can be applied to understanding actual events and policies. This book, therefore, contains numerous case studies that apply the theory that has just been developed.

**"In the News" Boxes** One benefit that students gain from studying economics is a new perspective and greater understanding about news from around the world. To highlight this benefit, I have included excerpts from many newspaper articles, some of which are opinion columns written by prominent economists. These articles, together with my brief introductions, show how basic economic theory can be applied. Most of these boxes are new to this edition.

**"FYI" Boxes** These boxes provide additional material "for your information." Some of them offer a glimpse into the history of economic thought. Others clarify technical issues. Still others discuss supplementary topics that instructors might choose either to discuss or skip in their lectures.

**Definitions of Key Concepts** When key concepts are introduced in the chapter, they are presented in **bold** typeface. In addition, their definitions are placed in the margins. This treatment should aid students in learning and reviewing the material.

**Quick Quizzes** After each major section, students are offered a "quick quiz" to check their comprehension of what they have just learned. If students cannot readily answer these quizzes, they should stop and reread material before continuing.

**Chapter Summaries** Each chapter ends with a brief summary that reminds students of the most important lessons that they have just learned. Later in their study it offers an efficient way to review for exams.

**List of Key Concepts** A list of key concepts at the end of each chapter offers students a way to test their understanding of the new terms that have been introduced. Page references are included so that students can review the terms they do not understand.

**Questions for Review** At the end of each chapter are questions for review that cover the chapter's primary lessons. Students can use these questions to check their comprehension and to prepare for exams.

**Problems and Applications** Each chapter also contains a variety of problems and applications that ask students to apply the material they have learned. Some professors may use these questions for homework assignments. Others may use them as a starting point for classroom discussions.

## Supplements

South-Western offers various supplements for instructors and students who use this book. These resources make teaching the principles of economics easy for the professor and learning them easy for the student. David R. Hakes of the University of Northern Iowa, a dedicated teacher and economist, supervised the development of the supplements for this edition.

**For the Instructor** Teaching the principles of economics can be a demanding job. Often, classes are large and teaching assistants in short supply. The supplements designed for the instructor make that job less difficult and more fun.

**Instructor's Manual with Solutions Manual and Classroom Activities** For lecture preparation, the Instructor's Manual, written by Linda Ghent (Eastern Illinois University), offers a detailed outline for each chapter of the text that provides learning objectives, identifies stumbling blocks that students may face, offers helpful teaching tips, and provides suggested in-classroom activities for a more cooperative learning experience. The Instructor's Manual also includes solutions to all end-of-chapter exercises, Quick Quizzes, Questions for Review, and Problems and Applications found in the text.

**Instructor's Integrated Resource Guide** Intended for use in planning instruction, this laminated guide provides a quick reference to all of South-Western's resources for teaching a course in economic principles and makes suggestions for incorporating them into all phases of instruction.

**Test Bank** Daniel K. Biederman (University of North Dakota), Ken McCormick (University of Northern Iowa), Bryce Kanago (University of Northern Iowa), Penny Kugler (Central Missouri State University), and Andrew Parkes (University of Northern Iowa) have updated and revised the Test Bank. It consists of more than 200 questions per chapter. Every question has been checked to ensure the accuracy and clarity of the answers and painstakingly revised to address the main text revisions. Included are multiple-choice, true/false, and short-answer questions that assess students' critical thinking skills. Easy, medium, and difficult questions outline the process that students must use to arrive at their answers: recall, application, and integration. Questions are organized by text section to help instructors pick and choose their selections with ease.

**Supplemental Test Banks** In order to keep the pool of Test Bank questions fresh and relevant, an additional testing resource will be published annually.

**The "Ten Principles" Video Set** Ken Witty, a talented documentary filmmaker, has produced a video series to illustrate the *Ten Principles of Economics* introduced in Chapter 1. Instructors can show these videos as an interesting and visually appealing introduction to topics discussed throughout the textbook.

**PowerPoint Lecture and Exhibit Slides** Available only on the Web site and the IRCD are two versions of the PowerPoint presentation. Professors can save valuable time as they prepare for class using this comprehensive lecture presentation. This supplement covers all the essential topics presented in each chapter of the book. Graphs, tables, lists, and concepts are developed sequentially, much as one might develop them on a blackboard. Additional examples and applications are used to reinforce major lessons. The slides are crisp, clear, and colorful. Instructors may adapt or add slides to customize their lectures. A separate exhibit presentation provides instructors with all of the tables and graphs from the main text. The slides are all available for download at the support Web site: <http://mankiw.swlearning.com>.

**Economics: HITS on the Web, Mankiw Edition with InfoTrac** This resource booklet supports students' research efforts on the World Wide Web. This manual includes an introduction to the World Wide Web, browsing the Web, finding information on the World Wide Web, e-mail, e-mail discussion groups and newsgroups, and documenting Internet sources for research. It also provides Internet activities for each chapter of the Mankiw text as well as a list of the hottest economic sites on the Web. Each booklet provides the student with an access code for InfoTrac College Edition, a fully searchable on-line university library containing complete articles and their images. Its database allows access to hundreds of scholarly and popular publications—all reliable sources, including magazines, journals, encyclopedias, and newsletters.

**For the Student** South-Western also offers supplements for students who are studying the principles of economics. These supplements reinforce the basic lessons taught in this book and offer opportunities for additional practice and feedback.

**PowerPoint Lecture Notes** A booklet is available that contains the Lecture Presentation in PowerPoint (both the notes and the graphics) with space next to each slide for taking notes during class. This supplement allows students to focus on classroom activities by providing them with the confident knowledge that they have an excellent set of notes for future reference. Instructors who choose to customize their PowerPoint presentations and would like to do the same with their accompanying customized printed lecture notes can do so via South-Western/Thomson Learning's custom publishing program.

## Translations and Adaptations

I am delighted that versions of this book are (or will soon be) available in many of the world's languages. Currently scheduled translations include Chinese (in both standard and simple characters), Czech, French, Georgian, German, Greek, Indonesian, Italian, Japanese, Korean, Portuguese, Romanian, Russian, and Spanish. In addition, adaptations of the book for Canadian and Australian students are also available. Instructors who would like more information about these books should contact South-Western College Publishing.

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