

BUSINESS ECONOMICS

N. GREGORY MANKIW,
MARK P. TAYLOR, ANDREW ASHWIN



THIRD EDITION

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Business Economics, Third Edition
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Publisher: Annabel Ainscow

List Manager: Abigail Coppin

Marketing Manager: Sophie Clarke

Senior Content Project Manager: Sue Povey

Manufacturing Manager: Eyvett Davis

Typesetter: MPS Limited

Cover Design: Elisabeth Heissler

Cover Image(s): Simon Long/Getty Images

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WCN: 02-300

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British Library Cataloguing-in-Publication Data

A catalogue record for this book is available
from the British Library.

ISBN: 978-1-4737-6277-0

Cengage Learning, EMEA

Cheriton House, North Way
Andover, Hampshire, SP10 5BE
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PREFACE

How much of business is economics and how much of economics is business? This is a difficult question to answer but perhaps what is at the heart of both is decision making. This book is about decision making. Alfred Marshall, the great nineteenth-century British economist, in his textbook, *Principles of Economics* published in 1890 wrote: 'Economics is a study of mankind in the ordinary business of life.' For many people, the ordinary business of life is interwoven with relationships with business. Every single day, billions of people around the world make decisions. When we make decisions, we are being economists. A great proportion of these decisions are made by people in the context of their work which in turn is part of business. So Business and Economics are very closely linked.

A study of economics in a business context will help you understand the world in which you live. There are many questions about businesses and the economy that might spark your curiosity. Why do airlines charge less for a return ticket if the traveller stays over a Saturday night? Why are movie businesses prepared to pay some actors extremely large sums to star in films, while others struggle to even get a bit part? Why are living standards so meagre in many African countries? Why do some countries have high rates of inflation while others have stable prices? Why do businesses produce many products that are so similar? Surely they succeed only in cannibalizing their market? Why is it so important to have a better understanding of how consumers behave? Why have some European countries adopted a common currency? These are just a few of the questions that a course in Business Economics will help you answer.

The second reason to study Business Economics is that it will make you a more astute participant in the economy and in business. As you go about your life, you make many economic decisions. While you are a student, you decide how many years to stay in full-time education. When you have completed your degree, you will have to decide on a career path and find a job (which may be difficult despite being highly qualified). Once you take a job, you decide how much of your income to spend, how much to save and how to invest your savings. In your daily work, you will have to make many decisions and respond to an ever-changing environment. One day you may find yourself running your own small business or a large firm, and you will decide what prices to charge for your products and what products to offer for sale. The insights developed in the coming chapters will give you a new perspective on how best to make these decisions.

A study of Business Economics will give you a better understanding of the potential and limits of economic policy and how such policy can influence business behaviour. In your business career, you may find yourself asking various questions about economics. What are the burdens associated with alternative forms of taxation? What are the effects of free trade with other countries? To what extent do businesses have a responsibility to protect the environment? How does the government budget deficit affect the economy and thus your business?

A study of Business Economics will go some way towards helping you make more sense of the world, your place in it and how business is affected and behaves as a consequence.

FOR WHOM IS THIS BOOK WRITTEN?

The book has been written for the non-specialist economist who has to embark on a course of study in economics as part of a degree in Business. Your degree might be Business Economics, it might be Business Management or it might be Sports Coaching and Management. An increasing number of degree courses will include some coverage of economic principles, and this book is designed for just such courses. We have tried to put ourselves in the position of someone seeing economics for the first time and not necessarily looking forward to the prospect. Our goal has been to emphasize the material that *students* should and do find interesting about the study of the economy and business.

One result is that this book is briefer than many books used to introduce students to economics. Throughout this book we have tried to return to applications and policy questions as often as possible. All the chapters include a case study which illustrates how the principles of economics are applied. In addition, 'In the News' boxes offer highlights from news events showing how economic ideas shed light on current issues facing

business and society, along with questions to help you apply your knowledge to new contexts – a vitally important part of learning.

Readers should note that part of this book is adapted from Greg Mankiw's best-selling US undergraduate *Principles of Economics* text. The adaptation to Professor Mankiw's text takes into account the needs of students and lecturers in the EMEA region and as such, may reflect different views to those in the original US text. Responsibility for the adaptation lies with Cengage EMEA.

LEARNING TOOLS

The purpose of this book is to help you learn the fundamental lessons of economics and to apply these lessons to a business context. Towards that end, we 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 a business context.
- *'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, we have incorporated discussions of news events including excerpts from newspaper articles from around Europe, and the wider world. These articles, together with our brief introductions, show how basic economic theory can be applied and raise important questions for discussion in business. To help further develop application skills we have included some questions at the end which can either be used as practice for self-study or as the basis for seminar or tutorial discussion.
- *'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 but which students should find useful in supplementing their knowledge and understanding.
- *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 a box in the page. This treatment is designed to help with learning and reviewing the material.
- *Pitfall Prevention boxes.* The authors have used their collective teaching wisdom to outline areas where students make frequent mistakes and which can be a cause of confusion. The Pitfall Prevention boxes alert you to the potential for these mistakes.
- *Jeopardy Problem boxes.* These are problems designed to help you think as an economist. You will be given end-points or solutions and you must think through the different ways in which the solutions or end-point given might have been arrived at using your knowledge of economics and business.
- *What if...? boxes.* Questions designed to get you thinking about different scenarios in business and economics.
- *Self-Test Questions.* After most major sections, you are offered a 'self-test' to check your comprehension of what you have just learned. If you cannot readily answer these questions, you should stop and reread material before continuing.
- *Chapter summaries.* Each chapter ends with a brief summary that reminds you of the most important lessons that you have just learned. Later in your study it offers an efficient way to revise for exams.
- *Questions for review.* At the end of each chapter are questions for review that cover the chapter's primary lessons. You can use these questions to check your comprehension and to prepare for exams.
- *Problems and applications.* Each chapter also contains a variety of problems and applications that ask you to apply the material you have learned. Some instructors may use these questions for private study assignments. Others may use them as a starting point for classroom discussions.

ACKNOWLEDGEMENTS

The authors would like to thank the following reviewers for their comments on this and previous editions:

- Andrew Abbott – *University of Hull, UK*
Dr Turner Anna – *CEU Business School, Hungary*
Emanuele Bracco – *Lancaster University, UK*
Dr Yu-Fu Chen – *Dundee University, UK*
Matthew T. Col – *University College Dublin, Ireland*
Gary Cook – *University of Liverpool, UK*
Dr John Duignan – *University of the West of Scotland, UK*
Aat van Eeden – *Zuyd University of Applied Science, Netherlands*
Robert Elliott – *University of Birmingham, UK*
John Forde – *University of Salford, UK*
Richard Godfrey – *Cardiff School of Management, UK*
Marco Gundermann – *Cardiff Metropolitan University, UK*
Dr Hala Helmi El Hadidi – *British University, Egypt*
Juan Garcia Lara – *Universidad Carlos III Madrid, Spain*
Qamarullah Bin Tariq Islam – *Rajshahi University, Bangladesh; University of Glasgow, UK*
Paul L. Latreille – *Swansea University, UK*
Paul Lovejoy – *University of Portsmouth, UK*
Dr Bobby Mackie – *University of the West of Scotland, UK*
Tim Maxfield – *University of Worcester, UK*
Pedro Martins – *Queen Mary, University of London, UK*
Fearghal J. McHugh – *Galway Mayo Institute of Technology, Ireland*
- Natalie Moore – *University of Nottingham, UK*
Yoko Nagase – *Oxford Brookes University, UK*
Adel Nemeth – *Jacobs University, Bremen*
Dr Matthew Olczak – *Aston University, UK*
Quentin Outram – *Leeds University Business School, UK*
Bruce Philp – *Nottingham Business School, UK*
Julia Planko – *Hogeschool Utrecht, Netherlands*
Robert Price – *University of Suffolk, UK*
Neil Reaich – *Economics, Business and Enterprise Association*
Jose R. Sanchez-Fung – *Kingston University London, UK*
Ulrich Schüle – *School of Business FH Mainz-University of Applied Sciences, Germany*
Cemil Selcuk – *Cardiff University, UK*
Vasilios Sogiakas – *University of Glasgow, UK*
Nicholas Spearman – *University of the Witwatersrand, South Africa*
Dr F Steffen – *University of Liverpool Management School, UK*
Michael Wood – *London South Bank University, UK*
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Gaston Yalonzky – *Leeds University Business School, UK*



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PART 1

THE ECONOMIC AND BUSINESS ENVIRONMENT

1

WHAT IS BUSINESS ECONOMICS?

LEARNING OUTCOMES

After reading this chapter you should be able to:

- Explain what businesses do and what economics studies.
- Provide a definition and example of business activity in the public and private sector.
- Define scarcity.
- Explain the idea of a trade-off and provide at least one example.
- Give a definition of opportunity cost and provide at least three examples relating to individual and business decision making.
- Explain the difference between capitalist and communist economic systems in how they answer the fundamental questions of society.
- Outline how prices direct resources to different economic activities.
- Explain why specialization and trade can improve people's choices.

WHAT IS BUSINESS ECONOMICS?

Business studies and economics are invariably taught as separate subjects in many schools prior to university. Business studies focuses on issues and problems related to business organizations of different types and includes business objectives, marketing, business organization, human resources management, accounting and finance, operations management and the influence of external factors including management of change. Economics focuses on the workings of markets, firm behaviour, market structures, factor markets (such as the market for labour and capital), international trade and the workings of the economy as a whole including growth, unemployment, inflation and exchange rates.

There is one thing, however, which connects the two discipline areas and that is decision making. People in businesses have to make decisions every day and the way in which they make these decisions and the outcome of those decisions can be informed by using the models, methods and tools of economics.

In addition, an understanding of the key concepts of economics is essential. The purpose of this book is to help you begin to think as an economist and to apply that thinking to business contexts to set you on the way to being a better decision maker. Businesses need people who understand the basic principles of business, who are flexible, can think in different ways and who are problem solvers who can cope with and confront change in a positive way. Having an understanding of the basic principles of economics will help in developing these skills.

What Is Business?

Business is an activity. It involves using inputs, which are broadly described as land, labour and capital, and turning them into some output which is then sold to customers. These outputs could be goods such as TVs, food, books, clothes, furniture, bricks, cars, glass and so on or services such as banking, insurance, accounting, tourism, repairs, medical care, entertainment, transportation, hotels, restaurants, etc. The customers who buy these outputs could be private individuals, other businesses or government bodies both from the domestic economy and from overseas. In the process of exchange of outputs, buyers pay a price to acquire the outputs and the money received by the seller represents the income of the business.

Business activity is carried out for different reasons. In some cases, the primary aim of a business is to ensure that the money received from selling outputs is greater than the cost of producing these outputs. In other words, the business is focused on making a profit and **profit** is the reward for the risk taken in carrying out business activity. Some business activity will be carried out with the primary intention of fulfilling a need, and while in most cases it is expected that the costs of providing the output must at the very least be covered by the income generated, any surplus that is generated is put back into the business or used for a good cause.

profit the reward for taking risk in carrying out business activity

Because business activity has different aims, the organizations that provide outputs are different. The **private sector** is made up of different types of businesses. Some are very small, one-person organizations and some are giants with operations in many different countries employing many thousands of people. The main aim of these businesses is to generate profit, but they will also have many other aims which might also include a recognition of their moral and ethical responsibilities to society as a whole. Other businesses in the private sector are set up with the primary aim of providing outputs or a service which meet a particular need. These businesses will include charitable organizations, carrying out voluntary work, fundraising and activities which have wider social and community benefits. This is referred to as the **third sector** or not-for-profit business.

private sector business activity which is owned, financed and organized by private individuals

third sector business activity owned, financed and organized by private individuals, but with the primary aim of providing needs and not making profit

In many countries a large amount of business activity is carried out by the government on behalf of the population as a whole. This is referred to as the **public sector**. The finance for public sector activity comes from tax payers and from the income that can be generated from the activity itself. Public sector activity is focused on providing goods and services to the public as a whole, and in doing so maximizing the opportunities for access. Balancing the cost of providing education, health, legal, welfare, emergency services, roads and transport and so on with the demand for these services is a considerable challenge to any government but, fundamentally, it might be expected that the cost of provision is at least met by the funds available.

public sector business activity owned, financed and organized by the state on behalf of the population as a whole

One of the main decisions facing businesses is what the aims of the business should be. If the primary aim is to make profit, decisions made may be different, but related to those which are made if the primary aim of the business is to provide a perceived social benefit. Public sector organizations have to make difficult decisions about the provision of services because funds may be limited.

In most business activity, decisions might include any or all of the following:

- How many people to employ.
- What each of those people will do to contribute to the business.
- How much employees get in return for their labour.
- Who should receive a bonus scheme and who should not.
- How to increase output per worker.
- How best to manage costs.
- When to invest.
- How much to invest and where best to get the funds to invest from.
- What products to produce.
- What products not to produce.
- When to stop producing products.
- When to expand.
- When to contract.
- How best to manage the sales process and customer relations.
- Whether to be environmentally friendly or whether to give the impression of being so.
- How to deal with competitors.
- Whether to charge a high price or a low price (or one in-between).

It is important to note at the outset that there are rarely simple and identifiable 'right' and 'wrong' answers in business. However meticulous the analysis carried out and data collected, ultimately judgements have to be made. When the judgements lead to positive outcomes, the decision makers are praised and may be lauded as having some special skill or insight, but when the judgement leads to negative outcomes decision makers are criticized and may find themselves out of a job.

Decision makers will seek to use many different techniques and methods to help them make better decisions, that lead to the positive outcomes desired. A knowledge of the methods, tools and models of economics may be one way in which decision makers can understand the problems and issues they face and be in a better position to make decisions as a result. It is important to emphasize, however, that having a good understanding of economics is not going to automatically lead to business success, however that success is defined.

Types of Economic System Businesses operate as part of society. Typically, business activity forms part of a society that is based on capitalist principles where resources are owned by private individuals, and trade and exchange is carried out largely for the purposes of making a profit. In some societies, resources are owned by the state and business activity is carried out for social, economic and political reasons, which may include a fundamental belief that society ought to be organized along more egalitarian lines than those which exist in capitalist societies. These are referred to as **communist economies**. Inequality is an outcome of **capitalist economies** and the gaps between the rich and poor and those who have and have not form fundamental areas of disagreement in decision making.

communist economies systems where resource inputs are largely owned by the state and exchange and trade is based on social, political and economic motives which may be primarily based on a belief of greater equality

capitalist economies systems where resource inputs are largely owned by private individuals and where the motive for exchange takes place primarily for profit

The Fundamental Questions of Society

Regardless of the economic system in place, any country has some fundamental questions to answer. These questions are:

- What products will be produced?
- How will products be produced?
- Who will get the products that are produced?

These are profound questions and have equally profound implications. In any society, human beings have wants and needs; at the most basic level these wants and needs are food, clothing and shelter. To provide for these needs, resources, which we have classified as land, labour and capital, have to be organized to generate the products that society needs to answer the first question, 'What is to be produced?'

There are many different ways in which products can be produced, and who gets access is determined by the economic system that is adopted in a country. In a capitalist system, those who own resources may get access to a far greater proportion of the products produced than those who do not, whereas in a non-capitalist system resources are owned by the state, and the state may determine a far greater degree of equality of access. Decisions made in capitalist economies will be based on different beliefs and priorities to those made in communist economies.

What Is Economics?

At its simplest, **economics** is the study of how society manages its resources. The management of society's resources is important because resources are scarce. **Scarcity** means that society has limited resources and therefore cannot produce all the products people desire. Just as a household cannot give every member everything he or she wants, a society cannot give every individual the highest standard of living to which he or she might aspire.

economics the study of how society makes decisions in managing scarce resources
scarcity the limited nature of society's resources in relation to wants and needs

In capitalist societies, the fundamental questions of what is to be produced, how products are to be produced, and who gets access to the products produced are answered through the combined actions of millions of households and firms. Economists therefore study how people make decisions: how much they work, what they buy, how much they save and how they invest their savings. Economists also study how people and people in businesses interact with one another. Economists analyse forces and trends that affect the economy as a whole, including the growth in average income, the fraction of the population that cannot find work and the rate at which prices change.

In communist societies, the fundamental questions are answered by the state, making judgements about resource use. These judgements will be based on different belief systems from those in capitalist societies. Economists study how decisions are made in these societies and the implications of these decisions. In many countries, private individuals and the state operate together in answering the fundamental questions. These are referred to as **mixed economies**. The proportion of economic activity that is carried out by the private sector and public sector varies, but there are few instances of countries where the private and public sector do not coexist in addressing the fundamental questions.

mixed economies economic systems that include elements of both private and public ownership of resources to answer the fundamental questions

In a sense, economics can be described as the science of decision making. In thinking as an economist in the context of business, there are particular concepts, models and methods that have developed within the discipline of economics. These can be applied and help in the analysis of business problems and issues.

SOME KEY IDEAS IN ECONOMICS

We use the term 'the economy' on a regular basis, but have you ever stopped to think about what the term really means? Whether we are talking about the economy of a group of countries, such as the European Union (EU) or the Middle East, or the economy of one particular country, such as South Africa or the United Kingdom (UK), or of the whole world, an economy is just a group of people interacting with one another as they go about their lives. This interaction is invariably through a process of exchange.

Whether it be an individual buying a coffee, a business buying several hundred tonnes of steel for a construction project or a government funding a higher education institution, the interaction consists of millions of individuals all making decisions and together we describe these interactions as **the economy**.

the economy the collective interaction between individuals in the process of production and exchange in a defined area

There are some fundamental ideas that are associated with economics which will appear consistently throughout our analysis in this book. These are introduced below.

Idea 1: Decision Making Involves Trade-Offs

When individuals, businesses or governments make decisions, they have to make a judgement between two or more courses of action. Each course of action will have certain benefits. If one course of action is chosen, the benefits of that action can be gained, but usually making that decision involves having to give up the benefits of the other courses of action. The benefits that have to be given up are said to be the trade-offs of a decision. Making decisions requires trading off the benefits of one action against the benefits of another.

Consider a business manager who must decide how to allocate their most valuable resource: their time. They can spend all of their time reflecting on strategy in their office which, if implemented successfully, could bring benefits to the business. Equally, they could spend all of their time walking around the premises talking to staff, gaining a better understanding of the business and motivating workers, which may bring benefits of improved productivity and efficiency; or they can divide their time between the two fields. For every hour they spend reflecting and strategizing, they give up the benefits that could be gained for an hour they could have used talking to staff.

Similarly, consider employees of this business deciding how to spend the income they receive from working at the business. They can buy food, clothing or a family holiday, each of which bring certain benefits. Or they can save some of the family income for retirement, which brings benefits in the future. If the family decide to save an extra €100 a month for retirement, then they have to trade-off the benefits this brings in the future for the benefits incurred by spending that €100 on products today.

When people are grouped into societies, they face different kinds of trade-offs. Resources devoted to consumer goods such as clothing, food, cars, washing machines and so on could also be used for producing capital goods, equipment and machinery that is used for the production of other goods. The more society spends on consumer goods that bring benefits to people, the less we can spend on capital goods that bring the benefits of raising standards of living at some point in the future.

Also important in modern society is the trade-off between a clean environment and a high level of income. Laws that require firms to reduce pollution might raise the cost of production but bring the benefit to society as a whole (and possibly to the firm in the form of good publicity). Because of the higher costs, these firms may end up earning smaller profits, paying lower wages, charging higher prices or some combination of these three. Thus, while pollution regulations give us the benefit of a cleaner environment and the improved levels of health that come with it, they reduce the benefits that higher incomes would bring to firms' owners, workers and customers.

Recognizing that people and businesses face trade-offs does not by itself tell us what decisions they will or should make. A chief executive officer (CEO) should not abandon time set aside for reflection and thinking just because doing so would increase the time available to talk to workers. Society should not stop protecting the environment just because environmental regulations reduce our material standard of living. Nevertheless, acknowledging trade-offs is important because people and businesses are likely to make good decisions only if they understand the options that they have available and can quantify them in some way to make informed decisions.

Idea 2: The Cost of Something Is What You Give Up to Get It

Because people and businesses face trade-offs, making decisions requires comparing not only the benefits but also the costs of alternative courses of action. In many cases, however, these costs and benefits are not as obvious as might first appear.

Consider the decision by a business to cease production of a product that is not selling very well. The benefit is that resources can be made available to invest in other parts of the business that are more successful. But what is the cost? To answer this question, you might be tempted to add up the money the business has to pay in redundancy to workers who may no longer be needed, to close down plant and get rid of defunct machinery and equipment. Yet this total does not truly represent what the business gives up when it ceases production of a product. First, it ignores many wider issues that the business might face as a result of its decision. How do competitors view the decision? Will they seek to use it as an example of the decline of the business? What about customers? Will they be disappointed that the product has disappeared? A number of businesses have found themselves under pressure to bring back much loved products that may not have been financially viable and have incurred disappointment from customers and possible loss of loyalty as a result. Then there is the attitude among workers. Is this closure the first of others? Does it send negative signals to the rest of the workforce resulting in a decline in motivation and increases in staff turnover as workers seek to get out before they are pushed out? Second, it does not include the lost revenue from sales of the product. It may be that sales were low and not very profitable, rather than it was not viable to continue with production, i.e. that the business was making a loss. Assuming that sales were not zero, there will have been some revenue being generated and this will now be lost. This has to be taken into consideration.

The decision, therefore, has costs far greater than pure money costs. The cost of loss of goodwill, worker and customer loyalty and bad publicity also has to be taken into consideration in assessing the costs of the decision and these may not be immediately obvious and sometimes not easy to work out.

The **opportunity cost** of an action is what you give up to pursue that course of action. When making any decision, such as whether to close down production of a product, decision makers should be aware of the opportunity costs that accompany each possible action.

opportunity cost the cost expressed in terms of the benefits sacrificed of the next best alternative

SELF TEST You may have heard the adage 'There is no such thing as a free lunch'. What do you think this means in the context of trade-offs and opportunity cost?

Idea 3: Rational People and Businesses Think at the Margin

There are many aspects of economics which are based on assumptions. One such assumption is that people behave rationally. In this context, behaving rationally means doing the best one can given the circumstances. The extent to which this is indeed the case is debatable but, in some cases, businesses and individuals do make decisions based on a rational assessment (as far as is possible) of different options. The decision by a company worker of whether to put in the extra hour at the end of the working day might be based on the perceived costs and benefits of completing a task before going home. A publisher may have to make a decision about whether to print an extra 1000 copies of a textbook when it is not certain that all these extra books will sell. Economists use the term **marginal changes** to describe small incremental adjustments to an existing plan of action. Keep in mind that 'margin' means 'edge', so marginal changes are adjustments around the edges of what you are doing. In many situations, people can make sensible decisions by thinking at the margin.

marginal changes small incremental adjustments to a plan of action

Consider an airline company deciding how much to charge passengers. Suppose that flying a 200-seat aeroplane from London to Warsaw costs the airline €50 000. In this case, the average cost of each seat is €50 000/200, which is €250. One might be tempted to conclude that the airline should never sell a ticket for less than €250. If the airline thinks at the margin, it could raise its profits. Imagine that 24 hours before

the plane is due to depart, there are still ten empty seats. Last-minute passengers accessing the booking area on the airline's website might be willing to pay €200 for a seat. Should the airline sell it to them? If the plane has empty seats, the cost of adding one more passenger is minuscule. Although the *average* cost of flying a passenger is €250, the *marginal* cost is merely the cost of the airline meal that the extra passenger will consume (which may have gone to waste in any case if it was provided) and possibly a slight increase in the amount of aircraft fuel used. As long as the late booking passengers pay more than the marginal cost, selling them a ticket can be profitable. We assume that a rational decision maker takes an action if the marginal benefit of the action exceeds the marginal cost.

CASE STUDY The Importance of Opportunity Costs

In the very early morning of 14 June 2017, a fire occurred in a tower block in West London. The fire spread very quickly and fire fighters took over 24 hours to bring it under control. 72 people died in the blaze in Grenfell Tower. In the aftermath, investigations into the reason why the first spread so quickly focused on the material used in cladding panels on the building. Grenfell Tower had been refurbished in May 2016 at a financial cost of £8.6 million. As part of that refurbishment, the building had been fitted with cladding which was meant to be fireproof. The cladding had an aluminium exterior and a polyethylene core. An alternative core can be made from fibre cement, but is more expensive and the decision to use the polyethylene core was said to have saved the Council £300 000. Building inspectors and Council officials had inspected the works and had issued the building with fire certificates at the time of the completion of the works. It was reported that the fibre cement panels had been fitted to the ground floor but not to any of the other 23 floors. Some reports noted that if the fibre cement panels had been fitted to other floors, the cost would have risen by around £1 million, not only because the panels were more expensive, but the additional weight may have meant further work was necessary to reinforce the building to cope with the extra weight.

Regardless of the right or wrongs of the issues surrounding the tragic event in June 2017, the story does highlight the challenges faced by businesses and organizations in making decisions. Local Councils face limited resources and unlimited demands. They have to make decisions about how to use limited resources, and if faced with a decision on whether to use a different cladding system which costs an additional £1 million have to ask what the opportunity cost of such a decision would be. The million pounds could be spent on improving social care for people in the area, helping the homeless, improving



Opportunity cost helps decision makers identify the true value placed on choices when making complex decisions.

education, keeping women's refuge centres open and a whole host of other demands on resources. In the case of the Grenfell Tower disaster, a public enquiry will determine whether the decisions made took account of the associated risks, why certain decisions were taken and whether decision makers should be held to account for the tragic events which unfolded. Turning the argument on its head reveals how difficult decision making can be. If the Local Council had spent an additional million pounds on the refurbishment of Grenfell Tower and as a result did not have the funds to keep open a local hospital, how would people have reacted to such a decision? What decision would you have taken in such a situation?

Idea 4: People and Businesses Respond to Incentives

If people and businesses make decisions by comparing costs and benefits, their behaviour may change when the costs or benefits change. That is, people respond to incentives. When the price of an apple rises,

for instance, people decide to eat more pears and fewer apples because the price paid to buy an apple is higher. At the same time, apple orchards decide to hire more workers and harvest more apples, because the benefit of selling an apple is also higher. The effect of price on the behaviour of buyers and sellers in a market is crucial for understanding how the economy works.

Public policy makers should never forget about incentives, because many policies change the costs or benefits that people face and, therefore, alter behaviour. A tax on fuel, for instance, encourages people to drive smaller, more fuel-efficient cars. For vehicle manufacturers this change in demand has to be accommodated. It shifts resources into the production of smaller, more fuel-efficient cars or vehicles that rely less on the use of carbon-based fuels like petrol, and away from larger, more fuel expensive cars. It also encourages people to use public transport rather than drive and to live closer to where they work. This in turn has an effect on decisions about provision of public transport, what type of transport, and housing provision. If the tax were large enough, people might explore electric cars. This requires investment by vehicle manufacturers in this technology and a host of other businesses that may be involved in setting up the infrastructure to facilitate the use of electric cars.

When policy makers fail to consider how their policies affect incentives, they often end up with results they did not intend. These are referred to as **unintended consequences**. For example, if a government decided to make the wearing of safety helmets for cyclists a legal requirement, the primary focus of the law might be to help reduce the incidents of serious head injuries for cyclists. The unintended consequences might be that people decide not to cycle in the numbers they used to because wearing a cycle helmet is unfashionable. The number of people suffering head injuries might fall because fewer people are now cycling but, in addition, society loses the positive health benefits that cycling can bring, and businesses manufacturing and servicing bicycles might see demand fall. Public transport and roads may become busier because people switch to using buses and cars rather than cycling to work.

unintended consequences the outcomes of decision making or policy changes which are not anticipated and are unforeseen

This is an example of the general principle that people respond to incentives. When analysing any policy or business decision, we must consider not only the direct effects but also the indirect effects that work through incentives. If the decision changes incentives, it will cause people to alter their behaviour.

SELF TEST The emphasis on road safety throughout Europe has increased over the last 25 years. Not only are cars packed with safety technology and devices, but roads are also designed to be safer with the use of safety barriers and better road surfaces, for example. Is there a case for believing that if people feel they are safer in their cars there is an incentive to drive faster because the marginal cost is now outweighed by the marginal benefit?

Idea 5: Trade Can Make Everyone Better Off

The Americans, South Africans and the Japanese are often mentioned in the news as being competitors to Europeans in the world economy. In some ways this is true, because American, South African and Japanese firms do produce many of the same goods as European firms. Airbus and Boeing compete for the same customers in the market for aircraft. Toyota and Citroën compete for the same customers in the market for cars. South African and American fruit growers compete in the same market as European fruit growers, and South African and American wine producers compete in the same market as French, Spanish and Italian wine makers.

Yet it is easy to be misled when thinking about competition among countries. Trade between Europe and South Africa or the USA, or between Europe and Japan, is not like a sports contest where one side wins and the other side loses (a zero-sum game). Trade between two economies can make each economy better off.

Assuming business activity in the private sector in a capitalist system, when a business produces a product it competes against other businesses that are producing similar products. Despite this competition, a business would not be better off isolating itself from all other businesses. If it did, the business would have to supply all its own raw materials and components, find its own staff, arrange its own insurance, do its own banking, arrange its own security and so on. Businesses can benefit from their ability to trade with others. Trade allows each business to specialize in the activities it does best, whether it is farming, making clothes or home building. By trading with others, businesses can buy a greater variety of goods and services at lower cost and therefore (potentially) increase efficiency.

Countries as well as businesses benefit from the ability to trade with one another. Trade allows countries to specialize in production of certain goods and services which they have developed an efficiency in for some reason. This might be because of resource endowments, for example parts of the Arab world have significant reserves of oil. It could also be because they have developed experience, infrastructure and skill in finance such as the City of London or Frankfurt. The production of these goods and services can be traded so that citizens are able to enjoy a greater variety of goods and services. The Japanese and Americans, as well as the Egyptians and Brazilians, are as much partners in the world economy as they are competitors. While trade can bring benefits it must be borne in mind that with any trade there can be winners and losers.

Idea 6: Markets Can Be a Good Way to Organize Economic Activity

Communist economic systems have central planners in the government who guide economic activity. These planners decide what goods and services are produced, how much is produced and who produces and consumes these goods and services. Those who support central planning might argue that only the government can organize economic activity in a way that promotes economic well-being for the country as a whole.

In a capitalist system, the private ownership of resources means that individuals making millions of decisions every day determine economic activity. The interaction of buyers and sellers in markets allocates resources to different uses and addresses the fundamental economic questions. In a **market economy**, firms decide who to hire and what to make; individuals supplying labour decide which firms to work for and what to buy with their incomes. These individuals (collectively referred to as households) and firms interact in the marketplace, where prices and self-interest guide their decisions. The process of exchange in market economies is facilitated by prices that provide signals to consumers and producers, and lead to resources moving to different uses all of which are based on the self-interests of firms and households. Prices reflect both the value of a good to society and the cost to society of making the good.

market economy an economy that allocates resources through the decentralized decisions of many firms and households as they interact in markets for goods and services

In a pure market economy (one with no state involvement), no individual is considering the economic well-being of society as a whole. Yet, despite self-interested decision makers, market economies have proven remarkably successful in organizing economic activity, and the vast majority of countries around the world base their economies on a market system to a greater and lesser extent. Proponents of market economies argue that they are the most effective way yet devised in allocating resources and improving standards of living. However, note the caveat in this principle. Markets *can be* a good way to organize economic activity. We emphasize *can be* because markets are not devoid of problems. The European debt crisis between 2007 and 2009 and its aftermath, which is still having an effect on millions of people, has cast doubt over a number of the models and assumptions that economists made about market systems. We will look at the reasons why markets may not work properly in later chapters.