



Chapter 1

Foundations of Public Economics

I think of the state as an association of individuals engaged in a cooperative venture, formed to resolve problems of coexistence and to do so in a democratic and fair manner.

Richard Musgrave

Government and the State ♦ General Functions of Government ♦ Economic Functions of Government ♦ Historical Perspective ♦ Public Policy and Principles of Economic Analysis.

In his entertaining economic history of the world from 3000 BC to the present, *Road to Riches or the Wealth of Man*, Peter Jay (2000) observes that ‘economic success requires good government, but all government breeds misgovernment and misgovernment destroys prosperity’. Indeed it is so. A good government supplies essential public services, including law and order, economic infrastructure, and basic health and education services. It assists the poor and protects the vulnerable. It provides the institutions and rules that allow markets to flourish, effort to be rewarded, and people to lead prosperous and healthy lives. On the other hand, governments often act arbitrarily and oppressively, levy taxes in excess of the value of services supplied, engage in corrupt activities, rule over stagnating or declining economies, and increase rather than reduce the divisions in society.

Both the successes and failures of government reflect its power over a wide range of activities within the territory it governs. Government must have this power to defend the community from external aggression, to provide internal security, to provide and enforce the laws necessary for economic activities, and indeed to provide the basic public goods that a society needs. Moreover it must have the power to fund these collective activities. As John Stuart Mill remarked¹, there is ‘in almost all forms of government agency, one thing which is compulsory: the provision of the pecuniary means. These are derived from taxation’.

It may be observed that nearly all economies are ‘mixed economies’ in which most goods are supplied by firms and individuals operating in markets and by individuals in the non-market household sector. But firms, households and government are not equal partners. Government makes the rules. Government determines monetary policy, regulates markets, determines tax rates, influences whether individuals work in the market or household sector, and redistributes income generated

¹ Mill (1848), *Principles of Political Economy*, p. 944 in W.J. Ashley (ed.), 1909.

by markets. Unless government rules are found to be unconstitutional, they are binding on all members of the community.

Given these wide-ranging powers, when and how should government intervene in the economy? To answer this question, we must first ask an even more fundamental question: what are the objectives and roles of government? We can evaluate the economic functions of government only if we determine first the purpose of government itself.

Accordingly in this opening chapter we start by discussing the relationships between the government, the state and the individuals who make up the state. We then move on to examine the main economic functions of government. The last part of the chapter outlines some of the major principles of economics that we will draw on throughout the book to analyse government policies and actions.

Government and the State

In political science, government is commonly defined as 'the governing power of the state'. It is the agency that directs the affairs of the state and the vehicle for collective action. Because the government is the agent for the state, it exercises the sovereignty powers of the state. However, in a democratic state, the exercise of this power is subject to the periodic consent of the people in national elections. The relationship between government and state is described more fully in Box 1.1.

The nature of government is revealed more pragmatically in the institutions of government. As shown in Figure 1.1, in a democracy, government generally consists of three branches: the legislature, executive and judiciary. The **legislature** makes the laws; the **executive** develops government policy and carries out the business of government; the **judiciary** interprets and applies the laws. The legislature often consists of two houses of parliament: one house initiates legislation and the other reviews it.² The executive branch includes public administration and services, the armed forces and police, statutory authorities, and public trading enterprises. The judicial branch generally comprises a hierarchy of courts.

Government services can also be divided into budget and non-budget sectors, based on the sources of finance. The **budget sector** consists of all activities that are financed wholly or substantially out of the annual government budget. This includes most government services, the military and the police, and the courts. It also includes statutory authorities such as universities and public broadcasting authorities. These authorities are usually established by legislation and have separate legal identity and some autonomy. However, their autonomy is constrained by their statutory responsibilities, their reliance on government funding through the budget, and government's power (subject to the governing legislation) to appoint and dismiss directors.

² There are exceptions, such as New Zealand, where the legislature consists of only one house.

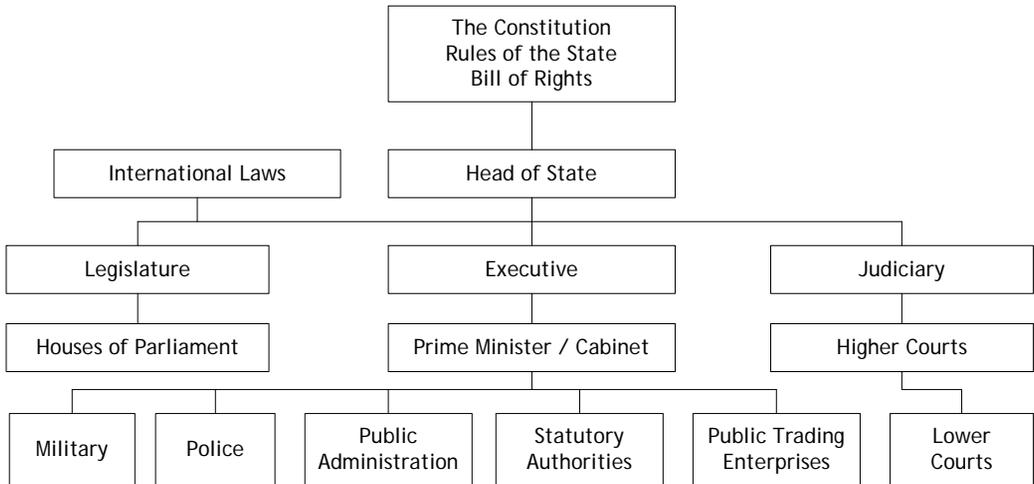


Figure 1.1 Typical institutions of government in a democracy

Box 1.1 Government and State

Government and state are often described by reference to each other. A government is the governing power of the state. On the other hand, a state cannot exist without a government. How then are government and state distinguished?

The state represents the political organisation of society. It is the way in which the members of a society associate and organise under one government for the purpose of reaching and implementing collective decisions. The primary purpose of the state is to maintain order and security, which it does by a system of law backed by force. The principal characteristics of the state are sovereignty and a defined geographical area within which the state is sovereign. In this area, the state has supreme and exclusive authority. The government is the practical embodiment of this authority.

The word 'state' is also used to describe some politically organised communities that are not sovereign states. Examples are the states of the United States of America and the Commonwealth of Australia, which are members of a federal union. In these countries, the federal union is the sovereign state. It alone has the authority to make treaties with for-

ign states and international bodies. Also it usually has the superior authority in internal affairs.

Because government acts for the state, it has many of the state's characteristics, including its sovereignty powers. Government has a monopoly on the legitimate use of force through the military forces and the police. It has the power to compel all residents of the state (not only citizens) to obey the rules it makes on behalf of the state.

But there are important differences between the state and the government. All citizens are members of a state, not of government. States go to war; governments declare and conduct war. The head of the state may be different from the head of the government. The state, not government, owns public resources. A state has a high measure of continuity, although not necessarily permanence; governments can change regularly. Opposing the state is widely regarded as treason, but citizens can oppose the government. In democracies, the government's power of sovereignty is subject to the periodic consent of the people.

The **non-budget sector** consists of public trading enterprises (PTEs) that finance all or most of their activities by trade revenues. Typically PTEs are wholly owned by the state, but in some cases the state owns a majority share. The revenues generated by PTEs give them some autonomy. However, government generally controls the board of directors and major investment and pricing decisions.

So what, then, is government? In popular discussion, the term 'government' usually refers to the agencies of government that 'govern the state'—the agencies which make rules and policies and provide the main civilian administrative services. Teachers and broadcasters do not usually think of themselves as part of the government. However, when discussing economic issues, such as government expenditure, the term 'government' generally applies to all budget-sector services, including the armed forces, statutory authorities and courts. More broadly still, the **public sector** includes PTEs as well as budget-sector services. In this book we will discuss both the role of government and the broader economic issues of the whole public sector.

Constraints on government

The basis of government in nearly all states is a written constitution.³ The **constitution** represents a superior law that defines the basic institutions and rules of the state, and the methods of appointment and powers of the head of state and the government. The constitution is a critical legal constraint on government actions. Constitutions are generally hard to change, with change requiring a high degree of public assent. In Australia, a change to the constitution requires the support of the majority of all voters and the support of the majority of voters in at least four of the six states. Along with a constitution, most countries also have a bill of rights that provides individuals with legal protection against oppressive government action. Australia is one of the few countries in the world that does not have such protection of individual liberties.

A related constraint on the power of government is the **separation of powers** between its three main branches. This separation has long been viewed as essential for the avoidance of tyranny by government.⁴ The independence of the judiciary is especially important. This independence enables it to strike down laws that are contrary to the constitution and to punish members of the executive for actions contrary to law, including illegal use of power against citizens. The separation of powers has been adopted most fully in presidential forms of government, as in the United States and France. In these countries, the legislature and the head of the executive branch (the President) are elected in separate elections. Members of the legislature are not normally members of the executive. By contrast, in a parliamentary system, as in the United Kingdom and Australia, members of the executive are generally members of the legislature. The governing party controls both the legislature and the executive arm of government. However, this control is rarely absolute. When the legislature consists of two chambers, the second chamber usually has some legislative power and the executive branch of government may not control both chambers. Also, the executive branch is often divided at political and bureaucratic levels. Although departments sometimes collude in the exercise of power, they also fight fiercely over policy control and administrative territory.

³ All countries, except Israel, New Zealand and the United Kingdom, have a written constitution.

⁴ See Montesquieu, *De L'esprit des Loix*, (1748, *The Spirit of the Laws*).

A federal form of government is a further important constraint on the power of central government. In a federation, such as the United States and Australia, power is shared between the central government and the states that make up the federation, with the powers of the states supported by the constitutions of the respective countries. The federal structure of government dilutes the power of the centre, encourages competition between government authorities, and sets up more checks and balances within the overall government structure. In a unitary state, like France and the United Kingdom, the central legislature has supreme authority to make laws for the whole country.⁵

Finally, national governments are constrained increasingly by international laws. It is true that governments are obliged to follow only those laws to which they are a signatory. However, whether for reasons of good international governance or self interest, because the expected benefits of signing exceed the costs, governments are increasingly signing international agreements, including agreements on economic issues such as trade, the use of the environment, and labour conditions. For example, Australia's import and export laws are derived almost entirely from treaties entered into through the General Agreement on Trade and Tariffs.

General Functions of Government

Views on the general functions of government depend critically on (i) how people regard the relationship between the individual and the state and (ii) how people view the relative effectiveness of markets and government.

Historically there have been two main views of the nature of the state: the organic and the mechanistic. In the **organic view**, society is a natural organism like a human body. Each individual is a part of this organism, but the body has an existence in its own right. The organic model implies that the state has an underlying being and value. It is not simply a collection of individuals or individual interests. Thus, Aristotle (c.340 BC) wrote that 'the city or state has priority over the household and over any individual among us. For the whole must be prior to the parts... It is clear that the state is both natural and prior to the individual.'⁶ It follows that government should act in the interest of the state as well as for individuals. However, in the 20th century, these views were associated with the fascist regimes in Germany and Italy and the totalitarian regimes of Stalinist Russia and Maoist China and became discredited. In these countries, government viewed itself as synonymous with the state. Opposition to government was viewed as opposition to the state. There were few constraints on government power and individual interests were sacrificed to the supposed interests of the state.

The **mechanistic model** of the state is more democratic. In this model, individuals form a nation for the purpose of making collective decisions. The state is a mechanism for improving individual welfare. Government is an instrument of the people who make up the state and a means that enables collective actions to happen. The government is subject to law. There is no independent public interest. Government actions and social outcomes are judged solely by their effects on the welfare of individual members of society. In the words of Mill (1859), 'the worth of the State, in the long run, is the worth of the individuals comprising it'.

⁵ The UK government has recently devolved significant executive powers to local parliaments for Scotland and Wales, but it has retained major taxation and monetary controls.

⁶ Aristotle, *The Politics*, Penguin Classics, 1962, p.29.

As described in Box 1.2, leading political writers have advocated a mechanistic model of the state for over three hundred years. Today, it is the dominant model. Most countries have a constitution that embodies two key principles—the sovereignty of the people and respect for human rights. The state is designed to serve the people, not the converse. This model of the state is also the basis for most economic analysis. Government actions are judged by whether they enhance the welfare of individuals. This is the approach adopted in this book.

However, the organic view of the state is not solely of historic significance. Some Islamic states may be regarded as current versions of an organic society. Even in secular states, many citizens view society as more than the individuals that comprise it and consider a strictly individualistic approach to collective issues an unattractive view of society. Also, as we will see in Chapter 5, some economists argue that social relationships are important for economic prosperity.

Box 1.2 Origins of the mechanistic state

Thomas Hobbes (1651) was one of the first writers to articulate a mechanistic model of the state in his famous book, *Leviathan*. Writing in turbulent times in England, Hobbes argued that, because men are largely selfish and competitive, the natural condition of mankind is 'war of every man against every man' in which there is 'continual fear, and danger of violent death; and the life of man, solitary, poor, nasty, brutish, and short'.⁷ A state ruled by a sovereign (man or assembly) with absolute authority is the only way to avoid anarchy. In accepting the benefits of the state, citizens were deemed to give up their natural rights and to be under an obligation of obedience to the sovereign. However, men give up their natural rights only for an implicit 'covenant' with the sovereign for protection. If the sovereign fails to provide protection, men are not obliged to continue to obey the sovereign.

John Locke (1690), in *The Second Treatise of Government*, produced a more attractive model of the state. Locke held that man has three main natural rights: to life, liberty and property. Men establish a state whose function is to protect these rights. He argued, moreover, that the state rests on an implied social contract. The government is entrusted with power to protect these natural rights,

but its powers are limited broadly to these responsibilities. If the Government fails to protect man's natural rights or oversteps its responsibilities, the citizens are entitled to establish a different government. While Locke was writing, the British Parliament established by legislation that the executive (King William II) could not tax without its consent. Thus was born the fundamental democratic principle that no man can be taxed without his consent or that of his representative.

Nearly 100 years later, the authors of the American Declaration of Independence (1776) declared in ringing tones that all men are endowed with:

certain inalienable rights, that amongst these are life, liberty and the pursuit of happiness; that to secure these rights, governments are instituted among men, *deriving their just powers from the consent of the governed*; that whenever any form of government becomes destructive of these ends, it is the right of the people to alter or abolish it... ' (author's italics).

Shortly afterwards, the French *Declaration of the Rights of Man and of the Citizen* (1789) declared likewise that the purpose of political association is to preserve the natural rights of man.⁸

⁷ Hobbes (1651), *Leviathan*, pp.88-89, R.Tuck (ed.), 1991.

⁸ Rousseau's *The Social Contract* (1762) was a major influence on the *Declaration*. But Rousseau viewed man's rights as social not natural. He argued that sovereignty resides in the people and that laws should reflect the general will of the people.

Alternative views of the role of government

Within the dominant mechanistic model of the state, there is a wide range of views about the appropriate role of government. These views depend on judgements about the effectiveness of markets and government and on beliefs about individual freedom and social justice.

At one end of the political spectrum, **libertarians** strongly support private property and advocate very limited government control over private exchanges. Libertarians draw on moral and empirical arguments. For example, Nozick (1974) defends private property on moral grounds. He argues that people have natural rights, liberty is the ultimate political good, and state intervention is morally wrong except in very limited circumstances to protect natural rights. Empirical libertarians, such as Hayek and Friedman, argue that economic power should be decentralised so as to constrain the concentration of power in government. They argue that markets are efficient and that state intervention will generally reduce total welfare. They criticise the provision of needs above subsistence because the resulting institutions, notably taxation, achieve little justice and reduce economic efficiency. In *Free to Choose*, Friedman and Friedman (1980, p.158) conclude that welfare programs “weaken the family; reduce the incentive to work, save and innovate; reduce the accumulation of capital; and limit our freedom”...

At the other end of the spectrum, **socialists** advocate a command and control economy. Socialists see the distribution of rewards in market systems as highly unequal and unjust. They view private markets as instruments of exploitation rather than as voluntary exchanges. Owners of capital exploit labour and resources are used to meet the demands of the rich. In their view, government allocates resources to meet social needs more efficiently and fairly than do markets. Socialists generally support strong executive government, with fewer constraints imposed by the separation of powers within government.

Between these extremes, there are many views about the role of government that cannot be readily classified. Simplifying considerably, we distinguish two further groups: conservatives and social democrats. **Conservatives**, like libertarians, regard markets as generally efficient. They question active government macroeconomic policies and government provision of goods. They generally favour constitutional constraints on an activist government and the separation of powers. Because of the element of compulsion in government action, conservatives usually consider that the burden of proof is on government intervention rather than on laissez-faire policy. However, they are more inclined than libertarians to acknowledge that government can do some things more effectively than the private sector. They also consider that the state has an obligation to support the poorer groups in society and that it is in the state's interest to do so to avoid civil disorder.

Social democrats accept that markets are often productive, but place more emphasis on the failure of markets to allocate resources efficiently and on the unequal outcomes of many markets. They view public ownership and private property as pragmatic issues. Government should adopt the ownership mix that best meets society's goals. Private property is viewed as a means towards achieving social goals rather than as an end in itself. The social democratic tradition emphasises equity. Redistribution is viewed as an appropriate and desirable function of the state. For example, in *A Theory of Justice* John Rawls (1971) argues that government has a responsibility not just to relieve poverty, but also to achieve a 'just' distribution of income. Many well-known economists such as Atkinson, Sen, Solow and Tobin, hold a similar view.

Table 1.1 Summary of views of the role of government

Political classification	Freedom	Markets	Equity	Role of government
Libertarians	Government a major threat to freedom	Markets are very efficient	Government often fails to improve equity	Very limited
Conservatives	Government may infringe freedom	Markets are generally efficient	Government should alleviate poverty	Moderate
Social democrats	Government can enhance freedom of less well-off	Markets are often inefficient	Government should ensure minimum income for all and reduce inequality	Considerable
Socialists	Government frees people from want	Markets are very inefficient	Government should provide full equity	Very high

Table 1.1 summarises the views of each of these groups. Much of the debate in public economics about the role of government revolves around these views of the efficiency and fairness of markets and government.

Economic Functions of Government

In order to discuss the economic functions of government, it is useful to start with a simple model of the economy. As shown in Figure 1.2, resources are transformed into goods and services via two interacting sets of markets, namely factor and product markets. Product markets drive the demand for factors of production. On the other hand, incomes generated in factor markets drive the demand for products. Goods may also be produced in the public or household sectors. Factors of production and goods may also be imported or exported. However, what matters ultimately is individual welfare. This depends not only on the quantity of goods produced, but also on income distribution, non-market goods, and political freedoms.

Evidently, government can intervene in the economic process in various ways. It can regulate any factor or product market, regulate international trade, and produce goods in lieu of, or in addition to, market output. It can redistribute the ownership of resources and it can redistribute incomes earned in factor markets.

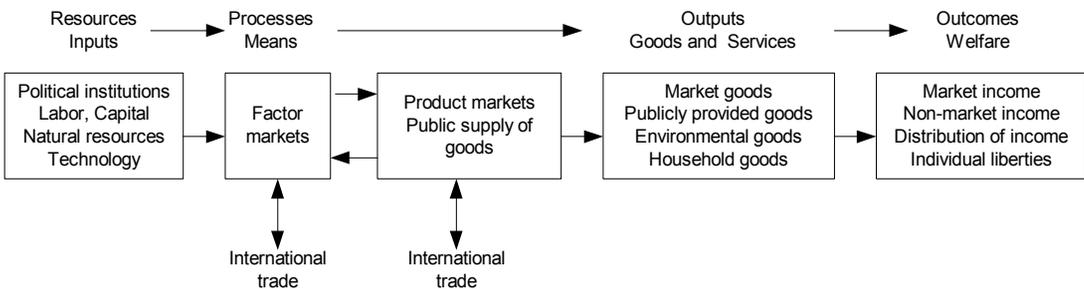


Figure 1.2 The economic process

The starting point for any discussion of these roles is that government must establish the institutions and rules that make markets work. In simple economies, people may be able to produce and trade without formal rules governing property rights and exchange. In a more complex economy, markets require an established foundation of law and an effective system of property rights. Property rights include the right to use an asset, to allow or exclude its use by others, to collect the income generated by the asset, and to sell or otherwise dispose of the asset. In the words of the World Bank (1996, pp.48-9)

Property rights are at the heart of the incentive structure of market economies. They determine who bears risk and who gains or loses from transactions. In so doing they spur worthwhile investment, encourage careful monitoring and supervision, and create a constituency for enforceable contracts. In short, fully specified property rights reward effort and good judgement, thereby assisting economic growth and wealth creation.

Laws are required to define and protect property rights; to set rules for exchanging these rights; and to enforce contracts. They are also required to establish market structures and behaviour and to establish rules for entry into and exit out of markets. Enforcement of these laws requires a fair and predictable judicial process.

Recent international experience has shown the importance of the rule of law for market operations. In the 1980s and early 1990s international agencies such as the World Bank routinely prescribed structural reform and competitive markets as the cure for underdevelopment, especially in then command and control economies, for example in Eastern Europe. They encouraged governments to sell off state-owned businesses, to allow new firms to set up, and to deregulate prices. Ten years later, real incomes in many of these countries were even lower than before. These policies failed because the basic institutions and laws were inadequate and, in many cases, public corruption was rampant. By the mid-1990s, the policy emphasis was on first getting these institutions and laws into place.

Given that markets are operating under a functioning political and legal system, what economic services should government provide? The common approach in economic analysis is to assess which goods are supplied inefficiently by markets and might therefore be provided by government. This may appear a biased approach. Why not ask which services government can supply efficiently and leave the rest to the markets? There are two main answers.

First, if individuals can achieve their goals through voluntary trades in decentralised markets, government direction of individuals or firms is unnecessary. In voluntary trades, all parties expect to benefit. Collective action that simply replicates the actions of free individuals serves no purpose. When compulsion exists, it is always possible that someone is coerced into something against her will. Thus, the general function of government is to accomplish things by collective action that individuals find difficult or impossible to accomplish separately.

Second, competitive markets are very good at producing the goods that people want. Markets coordinate decentralised decisions by generating price signals that reflect demands and relative scarcities without the need for a central planner estimating all these prices. As Adam Smith observed: 'It is not from the benevolence of the butcher, the brewer, or the baker that we expect our dinner, but from their regard to their own interest.'⁹ Moreover, it does not matter that each individual

⁹ Smith (1776), *The Wealth of Nations*. p.14 in E.Cannan (ed.), 1937.

neither intends to promote the public interest, nor knows how much he is promoting it.... He intends only his own gain, and he is in this, as in many other cases, led by *an invisible hand* to promote an end which was no part of his intention ... Nor is it always the worse for the society that it was no part of it. By pursuing his own interest he frequently promotes that of society more effectually than when he really intends to promote it. ¹⁰ (Authors' italics).

Smith's famous metaphor of the invisible hand guiding the competitive economy has now been formalised by economists into the First Theorem of Welfare Economics (see Chapter 3). This theorem states that economies with perfectly competitive markets produce the highest possible level of output and welfare, given the resources and technology available. Although few markets are perfectly competitive, markets generally do quite a good job at producing the goods that people want.

Three weaknesses of markets. Despite the invisible hand, markets have three main weaknesses. (i) Market failures: under certain conditions markets allocate resources inefficiently and fail to supply goods that consumers want. (ii) Income inequality: markets often result in inequitable distribution of income. (iii) Macroeconomic instability: markets may not produce full employment and price stability.

There are four main forms of **market failure**: public goods, externalities, imperfect competition, and information failures. Markets undersupply public goods, such as national security, health and education, which have widespread community benefits. Typically firms cannot charge for all the benefits that accrue from providing these goods. On the other hand, markets oversupply goods that have damaging side effects on firms or individuals who are not involved directly in the exchange, as occurs with environmental damages. Without regulation, markets produce excessive levels of pollution. Third, many markets are not competitive. As Adam Smith famously observed: 'People of the same trade seldom meet together, even for merriment and diversion, but the conversation ends in a conspiracy against the public, or in some contrivance to raise prices'.¹¹ When markets are not competitive, firms tend to charge excessive prices, restrict output, and use excessive resources. Fourth, efficient trading requires that the trading parties are well informed. When poorly informed, one or other party may be made worse off by the trade.

Turning to **income distribution**, in competitive markets, workers receive approximately the value of their marginal product. However, because of differences in abilities or opportunities, or simply from accident, the value of the marginal products and therefore the income of individuals vary greatly. All markets, competitive or otherwise, tend to produce an unequal distribution of income. Nor is there any guarantee that markets will provide everyone with an adequate living to avoid destitution.

Macroeconomic instability typically manifests itself price or employment instability. In the words of Walter Bagehot over 100 years ago, 'Money does not control itself'.¹² Nor do markets automatically produce full employment. Shortfalls in private investment may create inadequate demand and underemployment. Keynes (1936) pointed out that, even if wages were to fall in flexible labour markets, lower wages will not produce full employment in the short run if the aggregate demand

¹⁰ Smith (*ibid.* p.423).

¹¹ Smith (*ibid.*p.128).

¹² Source: Musgrave and Musgrave (1989, p.12).

for goods is deficient. Generally, markets may produce inefficient fluctuations in economic activity over business cycles.

Three potential government functions. These three forms of market weakness provide three potential economic functions for government—allocation, redistribution and stabilisation functions.¹³ The allocation function requires government to provide public goods, to regulate externalities, to promote competitive markets or regulate market power, and to protect individuals from information failures. The redistribution function requires government to alleviate poverty and reduce income inequality. The stabilisation function involves management of aggregate demand to achieve price stability and high levels of employment and to reduce fluctuations in output over the business cycle.¹⁴

However, the extent to which government should carry out any economic role depends not only on the weaknesses of markets but also on the ability of government to deliver improved outcomes. Government actions may be costly or unfair. Government has limited information, is not always efficient, and has limited control over private responses to its actions. The key issue is therefore whether government intervention, on balance, increases social welfare.

Determining whether government actions increase social welfare is complicated because the aims of government are often in conflict. In particular, efficient use of resources may increase income inequality. On the other hand, government actions to redistribute income may reduce the total income available. Attempting to resolve the trade-off between social objectives is a major issue in public economics.

Historical Perspective

Economists' views of the economic functions of government, like popular views, have turned almost full circle in the last two centuries. For much of the nineteenth century, most economists advocated a limited role for government. Then, for some 100 years from about 1870 to 1975, economists advocated that government should exercise an increasing role in economic management. In the last quarter of the 20th century, economists reversed and argued for a reduced role of government.¹⁵

Mill, perhaps the most influential economist in the nineteenth century, held that:

Restricting to the narrowest compass the intervention of a public authority in the business of the community... *laissez-faire*, in short, should be the general practice: every departure from it, unless required by some great good is a certain evil.¹⁶
...The great majority of things are worse done by the intervention of government, than the individuals most interested in the matter would do them, or cause them to be done, if left to themselves because government has one great disadvantage: an inferior interest in the result.¹⁷

Notwithstanding his advocacy for limited government, Mill agreed with all Adam Smith's proposed government functions (Box 1.3). He regarded the provi-

¹³ Following Musgrave (1959), government is often described as having three economic branches: an allocation branch, a distribution branch, and a stabilisation branch.

¹⁴ As noted in the Preface, the stabilisation role is the subject of macroeconomic texts and is not discussed in detail in this book.

¹⁵ These are of course generalisations. Many exceptions can be found.

¹⁶ Mill, (1848), p.950 in 1909 edition.

¹⁷ Mill, *ibid.* p.947.

sion of security, the general rule of law, and the specific laws of property and contracts as vital for capital accumulation and economic growth.¹⁸ He supported government provision of a wide range of public goods, either because of the general expediency and efficiency of collective action or because private providers could not be remunerated by user fees. These goods included the coining of money, prescribing standard weights and measures, surveying and mapping, raising dykes to keep out the sea or banks to stop rivers flooding, irrigation works, street paving and lighting, roads, canals and harbours, hospitals and support for scientific exploration and research academies. Nor did the role of government stop there. Mill acknowledged that the principle of consumer sovereignty could not apply without many

Box 1.3 Adam Smith's views on the functions of government

Adam Smith's famous book, *The Wealth of Nations*, published in 1776, was an intense reaction against the policies of the 'mercantilists', who then dominated economic thinking. Mercantilists argued that the government should control trade. They called on government to promote industry and exports and to protect the economy from imported goods. Smith strongly opposed these protectionist policies foisted upon a 'venal parliament by rapacious merchants and manufacturers' along with the complex apparatus of controls that these commercial interest groups imposed on other individuals, including widespread limitations on apprenticeships which were a direct restraint on trade. Smith believed that competitive markets would produce most of the goods that people want along with the invention and capital accumulation to create a steady increase in wealth. However, he held no illusions about the actual nature of markets. 'Whoever imagines that masters rarely combine is as ignorant of the world as of the subject. Masters are always and every where in a sort of tacit, but constant and uniform combination, not to raise the wages of labour above their actual rate.'¹⁹

It was the government's job to provide an appropriate institutional structure for markets and to remove any restrictions on competition and trade.

Smith held that government has three other main duties. First, to protect society from external threats and violence. Second, to administer justice and to protect every member of society from internal injustice or oppression, including commercial injustices. Third, to erect and maintain 'certain public works and certain public institutions, which it can never be for the interest of any individual, or small number of individuals, to erect and maintain; because the profit could never repay the expense of any individual, or small number of individuals, though it may frequently do much more than repay it to a great society.'²⁰ Although Smith thought that transport infrastructure (such as roads, bridges, canals and harbours) could fairly be paid for by users, he opposed private provision because monopolists with private turnpikes would abuse the system. He also supported substantial public expenditure on education for youth and for persons 'of all ages'.²¹ This was necessary for a stable and strong country, the understanding and acceptance of law, and the wellbeing of society as a whole.

¹⁸ Mill (*ibid.* p.881). There needs to be certainty that 'those who produce shall consume and that those who spare to-day will enjoy to-morrow'.

¹⁹ Smith (*ibid.* pp.66-7).

²⁰ Smith (*ibid.* p.651).

²¹ Smith (*ibid.*, pp739-40).

exceptions.²² Government should look after those who cannot protect themselves or who fail to choose wisely in life. Moreover, Mill strongly supported public provision of public education. All society suffers from the consequences of the ignorance and want of education in their fellow citizens.

Marx (1867) took a more complex view of government. He held that the governments of the day were partly responsible for the exploitation of the working classes. However, by taking industry into public ownership, government could radically change property relationships and emancipate the working classes. This was necessary not only to stop the exploitation of labour but also because capitalism would collapse as the rate of return on capital declined. This occurs, in Marx's analysis, because capital increases faster than labour, which is the source of surplus value. As the return on capital falls, unemployment rises. State ownership and control of resources and the means of production are necessary to maintain capital investment and ensure full employment of labour.

Increasing the role of government. During the first three-quarters of the twentieth century, there was increasing public and intellectual support for larger government. The widening of the popular vote to full adult suffrage in many countries increased the legitimacy of government. It also increased the groups in society who could make claims directly on government. Wars were important. In both the First and Second World Wars, many governments, generally with public support and some success, controlled a high proportion of their country's economic resources including labour and allocated it in accordance with national priorities, introduced extensive price controls and rationing, and substantially expanded the tax base.

In 1920, the first major work devoted to welfare economics, Pigou's *Economics of Welfare*, was published. Pigou was concerned not only with poverty and inequality, but also with market misallocations of resources. He identified as major problems negative externalities, such as industrial pollution, and the misuse of natural resources such as fisheries, forests, and farming land. He also argued that people consume too much in the present and save too little. He advocated that government should tax negative externalities, protect the environment, and support long-term public projects such as water supply and afforestation.

In the 1930s, the Great Depression had a major impact on views of market economies. In the United States, by far the world's largest capitalist economy, unemployment reached 25 percent and national output fell by 30 per cent from its peak in 1929. These falls in employment and output were widely attributed to capitalist speculation and banking failures (Galbraith, 1955). On the other hand, the recovery in the late 1930s was attributed to government expenditures in both democratic states like the United States and fascist states like Germany. President Roosevelt introduced a raft of public works and social welfare programs, known as the 'New Deal', to alleviate poverty, unemployment, sickness and old age. Keynes (1936) provided the intellectual support for increased public expenditure. With the collapse of private consumption and the lack of response of private investment to lower interest rates, only increased public expenditure would lift aggregate demand sufficiently to drive the economy back to full employment. The Depression scarred public attitudes towards capitalism. In 1943, Schumpeter wrote:

²² Mill (*ibid.*, p.575) 'The proposition that the consumer is a competent judge of the commodity can be admitted with only numerous abatements and exceptions.'

The public mind has by now so thoroughly grown out of humour with it as to make condemnation of capitalism and all its works a foregone conclusion - almost a requirement of the etiquette of discussion. Whatever his political preference, every writer or speaker hastens to conform to this code and to emphasise his critical attitude, his freedom from “complacency”, his belief in the inadequacies of capitalist achievement, his aversion to capitalism and his sympathy for anti-capitalist interests.²³

After the Second World War, three developments increased the economic role of government. First, many states increased their control over production. China and most Eastern European countries followed the then Soviet Union and became command and control economies. Also, governments in many mixed economies took over ownership of major industries, such as coal, steel, railways, and power generation. Control of these basic industries was thought necessary to secure capital investment, full employment and growth, to protect workers, and to control the prices of necessities.

Second, the welfare state developed in mixed economies. A **welfare state** actively promotes social justice and welfare. It takes substantial responsibility not only for providing the basic necessities of life—food and shelter—but also for basic income, education, health care and other welfare services. The Beveridge Report (1942), named after its author, which argued that governments should establish a social security fund to provide for the unemployed, the sick and the elderly, was highly influential in the United Kingdom where it was produced and elsewhere. For the next 30 years, governments around the world steadily expanded the suite of welfare services provided to their citizens.

Third, the 1950s and 1960s were a period of decolonisation and independence for many developing countries. Many newly independent governments, which as opposition parties had led the fight for freedom, now saw their role in development as pre-eminent. The state would mobilise and direct resources and eliminate social injustices. Markets were part of the discredited colonial system that enriched the coloniser and impoverished the colonised. Prebisch (1970), head of the Economic Commission for Latin America, articulated a popular economic school of thought—development would be built on government-owned and supported industries, constructed around high import tariffs and quotas. Many countries followed the Indian model, with its centrally planned development within a democratic framework.

By the late 1970s, as government spending in many countries exceeded 40 per cent of gross domestic product (GDP), and transfers of income between individuals often accounted for over half of tax revenues, attitudes towards government spending and taxes started to change. Increased public expenditure appeared to reduce rather than increase rates of economic growth. And all could observe that the command and control economies of the Soviet Union, Eastern Europe and elsewhere were performing poorly. US Presidents Reagan and Bush (1981-93) and the UK Conservative government (1979-97) were strongly committed to smaller government and lower taxes. Reagan’s aphorism that ‘the government is the problem—not the solution’²⁴ expressed a widely held view. Even some Labour governments, such as the 1983-96 Australian governments and (initially at least) the

²³ Schumpeter (1943, p.63).

²⁴ Reported in the *Washington Post*, 20 April 1976.

Blair government elected in 1997 in the United Kingdom, were committed not to increase government spending as a proportion of GDP.

Reducing the role of government. The development of public choice theory provided strong support for the revival of critical views of government. **Public choice theory** views government, not as an abstract benevolent entity that automatically pursues the public interest, but as an agency run by individuals who pursue their own interests subject to constraints of elections and various governmental processes. Arrow's Impossibility Theorem (Arrow, 1951) showed that all methods of making collective decisions, typically by voting, fail quite mild tests for satisfactory process or outcome. Downs (1957) described how elected representatives may pursue their own objectives and make public decisions contrary to the interests of the governed. Niskanen (1971) showed how the private interests of public servants may expand and bias public output. In the last 50 years, public choice theory has been greatly extended and used increasingly to interpret government behaviour (see Chapters 9 and 10).

Moreover, in the last 20 years, **globalisation**, the worldwide integration of economies, has reduced the capacity of governments to control their economies. Most economies are strongly influenced by global flows of capital, technology, trade and labour. Accordingly, government taxes, investment rules, and economic policies must be sensitive to these global market forces. Moreover, international treaties dealing with cross-national issues are increasingly binding on individual governments. The Universal Declaration of Human Rights adopted by the United Nations in 1948, though not binding on member states, inspired many conventions dealing with employment, education, the environment and so on, which have obligatory force. The rulings of the World Trade Organisation, the International Labour Organisation and other international bodies significantly constrain government decisions.

The experiences of the last 50 years have led to more cautious views about the economic role of government. What governments should do depends on what they can achieve and on how they actually behave. At the same time, it is generally recognised that effective government is essential for economic prosperity. In the late 1990s the crash of Asian exchange rates and stock exchanges, and the flight of international capital from the local economies, reflected a crisis of governance at least as much as one of capitalism. Corrupt government dealings with the private sector and weak prudential regulations were the main causes of major corporate failures in Asia. In the words of the World Bank

An effective state is vital for the provision of goods and services and the rules and institutions that allow markets to flourish and people to lead healthier happier lives... The state is central to economic and social development, not as a direct provider of growth, but as a partner, catalyst and facilitator.²⁵

What matters is not only what government does, but also how well it does these things.

²⁵ World Bank (1997, p.1)

Public Policy and Principles of Economic Analysis

Finally in this introduction to public economics we consider how economic analysis can contribute to public policy making. The issues are diverse. They may involve, among others, how much to spend on hospitals and roads, whether and how to regulate markets, the assistance to provide to different groups in society, or how to raise revenue. But, whatever the issue, four main questions must nearly always be answered.

- What are the policy objectives?
- What are the options for achieving these objectives?
- What are the implications of each option?
- Which is the preferred option?

There is an important difference between these questions or at least between the types of answers that may be given. Understanding this difference is a crucial theme of public economics.

Questions 1 and 4 involve value judgments. The answers require judgements about what is desirable: judgments that society would be better off with one objective or outcome than with another. Judgments of desirability, of good and bad, are ethical or moral judgements. Such judgements are not true or false—they are matters of personal opinion. Economic analysis that requires moral judgements is known as **normative economics**. On the other hand, questions 2 and 3 deal with facts, with how an economy works. Question 2 deals with how objectives can be achieved. Question 3 deals with the consequences of government policies. These are empirical questions and the answers are true or false (although establishing truth or falsehood may not be easy). Economic analysis that deals with facts is described as **positive economics**.

The branch of economics known as welfare economics provides a powerful framework for identifying social objectives and a consistent method for evaluating social choices (see Chapters 6 to 8). However, economists have no special expertise or authority to make moral judgments and we must distinguish carefully between matters that require such judgements and matters of fact.

However, economic analysis is nearly always required to identify the means available to achieve desired social objectives and the implications of these measures. Economic analysis is needed even when government plans to redistribute income, for example to the unemployed or the elderly. In such cases, estimates of the costs and consequences of the options are generally required.

Some applications of economic principles to the public sector

Although economic principles were developed mainly to explain behaviour and outcomes in markets, most of these principles apply also to the public sector. In particular microeconomic analysis—the principles of demand and supply and the role of markets—is essential for developing and assessing public policy. Some examples are highlighted here. Many more arise in later chapters.

First, all economics is concerned with scarcity, choice and opportunity cost. Scarcity implies choice and choice implies opportunity cost. A consumer chooses a good because its value exceeds that of the good foregone (the opportunity cost). Nearly all public policy involves an opportunity cost. Public expenditure on one service reduces it on another. Regulations to protect the environment almost al-

ways involve foregoing some other good. The concept, and estimation, of opportunity cost are fundamental to public policy.

Second, trade is the basic means of extracting gains from markets. When individuals engage in trade in factor or product markets, both parties to the trade expect to gain. Similar gains occur in inter-regional or international trade. Trade between regions or between countries can make each region or each country better off and thus the households in each region and country on average better off.

Third, incentives matter in the public sector as they do in the private. Consider Smith's description of university teaching two hundred years ago.

It is in the interest of every man to live at much as ease as he can; and if his emoluments are to be precisely the same, whether he does or does not perform some very laborious duty, it is certainly his interest ... either to neglect it altogether, or if he is subject to some authority which will not suffer him to do this, to perform it in as careless and slovenly manner as the authority will permit.²⁶

The economic analysis of government is based on the assumption that politicians and public servants are guided by private motives as well as by social ideals.

Fourth, the principles of price theory apply to many public sector activities, including to non-marketed goods. When there is no price, there is almost always excess demand, as occurs for most health care services and urban roads. On the other hand, the supply of factors of production generally falls with lower prices. Thus taxes that reduce take-home income usually reduce labour supply. But price theory also tells us that all price changes can be decomposed into a substitution (relative price) effect and an income effect and that these may have opposite effects on labour supply. The analysis of taxation requires an understanding of how individuals react to changes in prices.

Fifth, the principles of efficient production apply to public production as to private. The efficient use of factors of production requires that they be employed up to the point where the value of their marginal product equals their marginal cost. Also, the division of labour (specialisation) generally increases efficiency. These principles should inform public methods of production as they do private methods.

Sixth, and most generally, governments should usually work with markets rather than against them. Markets usually represent powerful forces of demand and supply. Government attempts to control interest rates are a classic example of futile attempts to repeal the law of markets. As Smith observed:

In some countries the interest of money has been prohibited by law... This regulation, instead of preventing, has been found from experience to increase the evil of usury; the debtor being obliged to pay not only for the use of money, but for the risk which his creditor runs by accepting compensation for that use. He is obliged... to insure his creditors from the penalties of usury... No law can reduce the common rate of interest below the lowest ordinary market rate.²⁷

In more recent times, many governments have paid a high price attempting to defend their currency against international capital movements. More positively, governments can use market instruments, notably taxes and subsidies, to bring about desired policy outcomes, for example to control pollution or to encourage private health insurance. Market instruments often achieve desired policy outcomes more effectively than regulations (see for example Chapter 13).

²⁶ Smith (*ibid.* p.718).

²⁷ Smith (*ibid.* pp.339-40).

It is true, and indeed fundamental, that determining public policy is considerably more complex than explaining private actions. To explain private decisions, economists assume that individuals aim to maximise their utility and that firms maximise profits. In assessing public policy, the objective is assumed to be to maximise social welfare, which is in turn assumed to depend in some complex way on the welfare of all individuals in the community. The objective of maximising social welfare in one or other form underlies all economic evaluation of public policy (see Chapters 7 and 8).

However, rational decision making in the public sphere, as in the private, requires that decisions be based on marginal benefit and cost. Firms maximise profits by producing up to the point where marginal revenue equals marginal cost. Consumers maximise welfare by consuming goods up to the point where marginal private benefit equals marginal cost. In the public sector, as an optimising principle, government should act so as to ensure that the marginal social benefit equals marginal social cost. When this is not achieved, it is always possible to make at least one person better off without making anyone else worse off.

In summary, most principles of economics apply to the public sector as strongly as to the private. In particular, the principles of choice, opportunity cost and trade, the role of prices in determining demand and supply, the effects of incentives on behaviour, the principles of efficient production, and the power of markets apply equally in the public sector as in the private.

Summary

- Government exercises the sovereignty powers of the state and can control, by regulation or taxation, the activities of firms and individuals within the territory it governs. However, the mechanistic (democratic) view of government implies that government is expected to act in the interests of the citizens.
- In economic terms, government includes all services financed by the government budget. The public sector includes public trading enterprises as well as budget-sector services.
- The major economic functions of government include establishing the institutions and rules that allow markets to function, the allocation of resources when markets are inefficient, income redistribution, and macroeconomic management.
- In the first three-quarters of the twentieth century, government expenditure and regulations grew substantially. Today there is more criticism of the role and effectiveness of government. What matters is not only what government should do, but also how well it does these things.
- In economic analysis, the aim of public policy is typically to maximise social welfare, which is a function of the welfare of all individuals in the community. This requires normative and positive economics. Normative economics deals with what is desirable, which depends on moral judgements. Positive economics explains how social objectives can be achieved and the implications of public policies.
- The major principles of economics apply in the public sector as in the private. In particular, the concepts of scarcity and opportunity cost, the role of trade and prices, the role of incentives, the principles of efficient production, and the power of markets have powerful applications in the public sector.

Questions

1. What is the difference between the state and the government?
2. Why is the rule of law not necessarily the same as the rule of government?
3. Is the rule of law inconsistent with laws and regulations that are retrospective?
4. Why are property rights essential to well-functioning economies? Explain why legal enforcement of property rights may be viewed as a public good.
5. What is the invisible hand? And, how does it work?
6. What are the main economic functions of government? What is the basis for these functions?
7. Suppose, as economists often do, that the aim of public policy is to maximise social welfare, what would be the main components of social welfare? Should the welfare of non-citizen residents have the same weight in a welfare function as citizens of a country?
8. Which of the following are normative statements? Why?
 - Full employment is a desirable policy.
 - Reducing unemployment will increase the rate of inflation.
 - Lower interest rates will reduce the number of unemployed persons.
 - Redistributing income from the rich to the poor increases social welfare.
 - Economists should not make normative statements.
9. Rational decision making implies that decisions should be based on marginal considerations. Can this principle be applied to the public sector? If so, how?
10. Give some examples of how price theory may apply to public decisions.
11. What arguments can be put for government subsidies for university students? Are these positive or normative arguments?

Further reading

Buchanan, J.M. and R.A. Musgrave, 1999, *Public Finance and Public Choice: Two Contrasting Visions of the State*, MIT Press, Cambridge, MA.

Hillman, A.L., 2003, *Public Finance and Public Policy*, Chapter 1, 'Markets and Property', Cambridge University Press, Cambridge, UK.

Holcombe, R.G., 1998, 'The Foundation of Normative Public Finance', pp.1-42, in F.Thompson and M.T.Green (eds.), *Handbook of Public Finance*, Marcel Dekkar, New York.

Mill, J. S. 1848, *Principles of Political Economy*, Book 5, Chapters 1, 5-8, (pp 159-166, 256-367), ed: J. Riley, 1994, Oxford World Classics, Oxford University Press, Oxford.

Musgrave, R.A., 1985, 'A Brief History of Fiscal Doctrine', pp.1-60 in A.J. Auerbach and M. Feldstein, eds: *Handbook of Public Economics*, Vol. 1. North Holland, Amsterdam.