PART I

Chapter 1

Growth-oriented Tax Policy Reform Recommendations

L ax systems are primarily aimed at financing public expenditures. Tax systems are also used to promote other objectives, such as equity, and to address social and economic concerns. They need to be set up to minimise taxpayers' compliance costs and government's administrative cost, while also discouraging tax avoidance and evasion. But taxes also affect the decisions of households to save, supply labour and invest in human capital, the decisions of firms to produce, create jobs, invest and innovate, as well as the choice of savings channels and assets by investors. What matters for these decisions is not only the level of taxes but also the way in which different tax instruments are designed and combined to generate revenues (what this chapter will henceforth refer to as tax structures). The effects of tax levels and tax structures on agents' economic behaviour are likely to be reflected in overall living standards. Recognising this, over the past decades many OECD countries have undertaken structural reforms in their tax systems. Most of the personal income tax reforms have tried to create a fiscal environment that encourages saving, investment, entrepreneurship and provides increased work incentives. Likewise, most corporate tax reforms have been driven by the desire to promote competition and avoid tax-induced distortions. Almost all of these tax reforms can be characterised as involving rate cuts and base broadening in order to improve efficiency, while at the same time maintain tax revenues.

This report focuses on tax structures rather than levels, which is desirable because cross-country differences in overall tax levels largely reflect societal choices as to the appropriate level of public spending, an issue that is beyond the scope of tax policy analysis. Conversely, investigating how tax structures could best be designed to promote economic growth is a key issue for tax policy making. Yet, in practice, it is hard to completely separate the analysis of the overall tax burden from that of tax structure: countries that have a relatively high level of taxes may also have a tax structure that differs from that of other countries, and the response of the economy to a change in the tax structure varies across countries, depending on their tax level. Even more importantly, fully disentangling the revenue raising function of the tax system from its other objectives, e.g. equity, environmental or public health matters is difficult. In order to make the assessment of the effects of the tax structure on economic performance manageable, these objectives are not dealt with in great detail in this study, except when there is a clear trade off between them and tax reforms aimed at raising GDP per capita. Nevertheless, the ways in which governments use the tax system to achieve these other objectives have been extensively studied by the OECD (for instance, see OECD, 2005c, on equity and OECD, 2006d, on the environment).

Most of the discussion on the link between changes in the tax structure and economic performance focuses on the effects on GDP levels. This report, however, recognises that in practice it may be difficult to distinguish between effects on levels and growth rates. Indeed, any policy that raises the level of GDP will increase the growth rate of GDP because effects on GDP levels take time. Also, transitional growth may be long-lasting, and so it has not proved possible to distinguish effects on long-run growth from transitional growth

effects, although some elements of the tax system are likely to have a bearing for long-run growth. For instance, it is possible that taxes that influence innovation activities and entrepreneurship may have persistent long-run growth effects, while taxes that influence investment also can have persistent effects on growth but these will fade out in the long-run. In contrast, taxes affecting labour supply will mainly influence GDP levels. In this spirit, this report looks at consequences of taxes for both GDP per capita levels and their transitional growth rates, with a large part of the empirical analysis (see Annex B) devoted to assessing the effects of different forms of personal and corporate income taxation on total factor productivity growth.

In open economies the design of a national tax system will need to consider the design of tax systems in other countries, since countries are increasingly using their tax systems to improve their ability to compete in global markets. Globalisation may also increase the opportunities for tax avoidance and evasion especially as concerns mobile capital income tax bases. Therefore, the mobility of the tax base plays some part in the design of tax reforms at the national level, and increased international tax policy co-operation among countries may allow for efficiency gains in some areas (for a discussion on this see Box 1.1).

However, there are important issues that are addressed only cursorily. First, optimal taxation, or how to minimise the excess burden of taxation, is an important topic that is largely outside the scope of this report, although some references are made to the main insights provided by research in this area. Likewise, tax incidence, or who bears the burden of a tax, is not explicitly addressed in this work, except when it has implications for the way the tax structure affects the determinants of growth.

Second, the transition costs of tax reform are not considered in the empirical analysis. These include not only the costs to the public administration but also the costs to businesses in adapting to policy changes. In some circumstances, it might also include the costs of "grandfathering" some of the old tax provisions (or some other form of compensation) if taxpayers have made substantial investments based on the expectation that these provisions would be maintained. The existence of these costs implies that tax reform will only be attractive if it can be expected to produce offsetting gains in economic performance. These issues will be discussed in Chapter 3 of this report.

Against this background, this chapter summarizes the main findings of the OECD project on the effects of changes in tax structures on GDP per capita and its main determinants. This study was carried out jointly by the OECD's Economics Department and Centre for Tax Policy and Administration in 2008 (OECD, 2008). This study, which is included as Annex B to this report, reviewed tax structures and general trends in taxes that are particularly relevant for growth and investigated how the structure of the tax system can have an impact on GDP per capita through its components, labour utilisation and labour productivity. The study also discussed the impact on performance of each of the main categories of taxes (consumption, property, personal and corporate taxation) and drew some conclusions concerning efficient tax design in each of these areas. In the light of this discussion, the report also sketched possible reform avenues for moving towards an overall tax structure that may enhance aggregate economic performance, conditional on the specificities of each country.

Box 1.1. The role of Globalisation

Globalisation – the increased openness of economies to trade and investment combined with reduced transport costs and improve communications – has several effects that need to be taken into account in formulating tax policy:

- Taxes can affect the costs of producing goods and services, and so change the relative international competitiveness of some sectors, prompting structural changes.
- Tourism and cross-border shopping mean that even VAT and sales taxes, which do not normally apply to exports, can influence the demand of foreign residents for domestically produced goods and services.
- Personal income taxes can influence workers, particularly those who are highly paid, in the choice of the country in which they work.
- Corporate income taxes can influence the choice of location of factories and offices. The
 tax system is only one factor among many in improving countries' competitiveness
 otherwise there would have been a large outflow of capital and activities from high to
 low tax countries, but there is evidence that location decisions are becoming more
 sensitive to tax.

These factors mean that individual countries are likely to make different tax policy choices from those they would have made in the past, when there was less mobility. Also, as mobility depends on relative tax rates and is most likely to take place between nearby countries, it also means that groups of countries (such as the European Union) may be differently affected when they co-ordinate tax policy changes than would their individual member countries acting alone.

It is generally assumed that choices related to corporate taxation are most affected by globalisation because of the ease with which multinational enterprises can move the location of at least some of their activities. However, highly skilled workers are also becoming more mobile and some countries are taking this into account in designing their personal tax systems. In contrast, the taxation of lower-skilled workers and of consumption is seen as being less affected by globalisation because these tax bases are less mobile. Finally, the taxation of immovable property is seen as the least affected by globalization.

The effects of this general ranking can be seen in the discussion of taxation trends in Chapter 2, with tax rates falling most for the more mobile tax bases. The ranking can also be expected to be a major factor driving the empirical results reported in this Report, as countries that ignore the pressures of globalisation may be expected to grow more slowly. But, a shift in the tax structure from mobile income taxes to less mobile taxes, such as consumption taxes, would reduce progressivity since consumption taxes are in general less progressive than income taxes. Therefore, such tax shifts imply a trade-off between growth enhancing tax reforms and equity.

1.1. Broad policy options for reforming the overall tax mix

The tax policy changes that are most likely to increase growth in any particular country will depend on its starting point, in terms of both its current tax system and the areas (such as employment, investment or productivity growth) in which its current economic performance is relatively poor. The discussed reforms should be seen as small tax changes rather than suggesting that shifting the revenue base entirely to one particular tax instrument provides more of a growth bonus since it is probable that there are diminishing growth returns to adjusting taxes.

The analysis in this report suggests some general policy options that could be considered. The reviewed evidence and the empirical work suggests a "tax and growth

ranking" with recurrent taxes on immovable property being the least distortive tax instrument in terms of reducing long-run GDP per capita, followed by consumption taxes and other property taxes as well as environmentally-related taxes, personal income taxes and corporate income taxes.

The explanation for these findings relates to the "static" and "dynamic" efficiency² characteristics of the different taxes. Taxes that have a smaller negative impact on economic decisions of individuals and firms are less negative for economic growth. In general, income taxes have larger effects on firm and household decisions than (most) other taxes – in terms of "static" but especially in terms of "dynamic" efficiency – and therefore create larger welfare losses, ceteris paribus.

A revenue neutral growth-oriented tax reform would therefore shift part of the revenue base from income taxes to less distortive taxes. Taxes on residential property are likely to be best for growth, also because they could contribute to the usage of underdeveloped land and because most OECD countries provide various tax preferences for owner-occupied housing (such as deductibility of interest on house loans and exemptions from capital gains tax), which result in a misallocation of capital towards housing, away from other investments. In this situation, the pre-tax rate of return on housing investment is below the pre-tax rate of return on investment elsewhere in the economy. This implies that increasing recurrent taxes on immovable property will shift some investment out of housing into higher return investments and so increase the rate of growth.

Taxes on property transactions also have the benefit of shifting investment out of housing into higher-return activities. However, they have the disadvantage of discouraging housing transactions and thus the reallocation of housing to its most productive use, thus reducing growth. For example, property transaction taxes discourage people from buying and selling houses and so discourage them from moving to areas where their labour is in greater demand. Also taxes on financial transactions are highly distortionary. Net wealth taxes and especially inheritance taxes, however, are potentially less distortionary (see Section B.1.2).

The scope for switching revenue to recurrent taxes on immovable property is limited in most countries both because these taxes are currently levied by sub-national governments and because these taxes are particularly unpopular. Hence, despite the

Box 1.2. Tax and growth definitions

The following definitions are used throughout the report:

"Tax and growth" recommendations: a revenue-neutral tax reform that *a*) shift the burden of taxation from income to consumption and/or residential property, or *b*) improve the design of a tax regime by broadening the tax base and lowering the rate and/or improves its externality-correcting properties.*

Growth-oriented tax reform: a reform that is in line with the "tax and growth recommendations", but with the caveat that shifting the burden of taxation towards consumption and property taxes may only be desirable where these taxes and reform are themselves well-designed.

Fundamental tax reform: a reform that makes radical changes to a tax base and rate, or involves a significant change in the composition of the tax burden.

* The OECD "tax and growth" recommendations were first published in: OECD (2008), "Tax and economic growth", Economics Department Working Paper, No. 620. This working paper is subsumed within Part I and Annex B of this report.

advantages of drawing on an immovable tax base in a period of globalisation, few countries manage to raise substantial revenues from property taxes, with returns on housing generally taxed more lightly than returns on other assets.

In practical policy terms, a greater revenue shift could probably be achieved into consumption taxes. Consumption taxes can affect labour supply by reducing the real value of wages but are otherwise seen as neutral. For example, they do not discourage savings and investment. Also, they are normally applied on a destination basis – applied to imports and refunded/exempted on export – and so do not affect the behaviour of firms that produce internationally traded goods. They can distort the behaviour of firms producing non-traded goods if applied at non-uniform rates, but the spread of general consumption taxes, such as VAT, means that consumption taxes are more uniform now than they used to be in most OECD countries although reduced VAT rates are still common. Thus, consumption taxes can be expected to have smaller negative effects on growth, although they do not have the advantages of recurrent taxes on immovable property.

However, with consumption taxes being less progressive than personal income taxes, or even regressive, a shift in the tax structure from personal income to consumption taxes would reduce progressivity. Similarly, shifting from corporate to consumption taxation would increase share prices (by increasing the after-tax present value of the firm) and wealth inequality as well as increasing income inequality by lowering capital income taxation. Such tax shifts therefore imply a non-trivial trade-off between tax policies that enhance GDP per capita and equity, which is likely to be evaluated differently across OECD countries.

Looking within income taxes, personal income taxes are seen as more harmful to growth than consumption taxes for two reasons. First, they are generally progressive, with marginal tax rates that are higher than their average rates. This means that they discourage growth more per unit of tax revenue than consumption taxes, which are generally flat rate and not (or not very) progressive. There is evidence that flattening the tax schedule could be beneficial for GDP per capita, notably by favouring entrepreneurship (once again, this implies a trade-off between growth and equity). Second, they typically tax the return to savings (interest or dividends) in addition to taxing the income from which savings are made, thus discouraging savings. While this second effect may not harm the growth of publicly quoted companies that can raise funds overseas, it can reduce the growth financing for small and medium-sized companies.

Corporate income taxes are the most harmful for growth as they discourage the activities of firms that are most important for growth: investment in capital and productivity improvements. In addition, most corporate tax systems have a large number of provisions that create tax advantages for specific activities, typically drawing resources away from the sectors in which they can make the greatest contribution to growth. However, lowering the corporate tax rate substantially below the top personal income tax rate can jeopardize the integrity of the tax system as high-income individuals will attempt to shelter their savings within corporations.

However, changing the balance between different tax sources should not been seen as a substitute for improving the design of individual taxes. Indeed, the reform of individual taxes can complement a revenue shift. For example, broadening the base of consumption taxes is a better way of increasing their revenues than rate increases, because a broad base improves efficiency and eases administration and compliance while a high rate encourages the growth of the shadow economy. A single VAT rate could be accompanied by

specific consumption taxes in cases where they can reduce environmental change, discourage unhealthy consumption or encourage labour supply. More generally, most taxes would benefit from a combination of base broadening and rate reduction.

1.2. Possible avenues for tax reforms to enhance the performance of labour utilisation, investment and productivity

This section discusses different avenues for tax reforms that might enhance the performance of labour utilisation, investment and productivity.

Labour utilisation

Reforms of labour income taxation will generally have to differ depending on whether the aim is to raise participation or hours worked. Reducing average labour taxes – either directly through tax rate decreases or indirectly through the implementation of earned income tax credits or other "in-work benefits" policies – could be desirable for raising participation, while lowering marginal rates may be preferable for increasing hours worked. Any such reform should, however, take into account joint effects with existing benefits, which could affect the effective average and marginal tax rates, particularly for low-skilled workers or second-earners. Also, reductions in the marginal tax rate will lead to greater income inequality. Moreover, the effects of changes in labour taxes on employment are also likely to be dependent on labour market institutions, such as wage-setting mechanisms and minimum wages, which affect the pass through of taxes on to labour cost.

There may also be gains, both in the quantity and the quality of labour supply, from reducing the progressivity of the personal income tax schedule. Estimates included in Annex B point to adverse effects of highly progressive income tax schedules on GDP per capita through both lower labour utilisation and lower productivity (see below) partly reflecting lesser incentives to invest in higher education. Again, this implies a potential trade-off between growth-enhancing tax policies and distributional concerns. However, there may be win-win labour tax reforms in this area. For example, "in-work benefits" increase the income of low-income households, thus reducing inequality, and may also improve efficiency if the gain in labour force participation outweighs the adverse incentives on hours worked by job-holders (as benefits are withdrawn) and on human capital formation (as the returns from up-skilling are reduced) as well as the distortionary costs of the tax increases that are needed to finance the in-work benefits.

Investment

Reducing corporate tax rates and removing special tax relief can enhance investment in various ways.

- Especially, if the primary aim is to reduce distortions that hold back the level of domestic investment and to attract foreign direct investment, reducing the corporate tax rate may be preferable to reducing personal income taxes on dividends and capital gains.
- Evidence included in Annex B suggests that favourable tax treatment of investment in small firms may be ineffective in raising overall investment.
- Lowering the corporate tax rate and removing differential tax treatment may also improve the quality of investment by reducing possible tax-induced distortions in the choice of assets.
- Providing greater certainty and predictability in the application of corporate income taxes may lead to higher investment, which in turn, could enhance growth performance.

Productivity

There are several ways in which tax policy can influence productivity:

- One option is to reduce the top marginal statutory rate on personal income since it has an impact on productivity via entrepreneurship by affecting risk taking by individuals. While empirical research has pointed to conflicting ways in which entrepreneurship could be affected, in this report a reduction in the top marginal tax rate is found to raise productivity in industries with potentially high rates of enterprise creation. Thus reducing top marginal tax rates may help to enhance economy-wide productivity in OECD countries with a large share of such industries, though the trade off with equity objectives needs to be kept in mind. It is also possible that cutting top marginal tax rates could increase economy-wide productivity through composition effects, by increasing the share of industries with high rates of enterprise creation.
- A second option is to reform corporate taxes, as they influence productivity in several ways. Evidence included in Annex B suggests that lowering statutory corporate tax rates can lead to particularly large productivity gains in firms that are dynamic and profitable, i.e. those that can make the largest contribution to GDP growth. It also appears that corporate taxes adversely influence productivity in all firms except in young and small firms since these firms are often not very profitable. One possible implication is that tax exemptions or reduced statutory corporate tax rates for small firms might be much less effective in raising productivity than a generalised reduction in the overall statutory corporate tax rate. This reduction could be financed by scaling down exemptions granted on firm size as they may only waste resources without any substantial positive growth effects.
- A widely-used policy avenue to improve productivity is to stimulate private-sector innovative activity by giving tax incentives to R&D expenditure. This report (see Annex B) finds that the effect of these tax incentives on productivity appears to be relatively modest, although it is larger for industries that are structurally more R&D intensive. Nonetheless, tax incentives have been found to have a stronger effect on R&D expenditure than direct funding.
- Lower corporate and labour taxes may also encourage inbound foreign direct investment, which has been found to increase productivity of resident firms. In addition, multinational enterprises are attracted by tax systems that are stable and predictable, and which are administered in an efficient and transparent manner.

Again, it needs to be emphasised that policy makers will need to examine very carefully the trade-off between these growth-enhancing proposals and other objectives of tax systems – particularly equity. These trade-offs will be discussed in more detail in Chapters 3 and 4 of this report.

Notes

- 1. This first chapter draws on OECD (2008), "Tax and economic growth", Economics Department Working Paper, No. 620 as well as on C. Heady, A. Johansson, J. Arnold, B. Brys and L. Vartia (2009), "Tax policy for economic recovery and growth".
- 2. "Static" efficiency refers to the short run; it requires that the economy operates as efficiently as possible within a given production process defined by the available technology and organisational systems. "Dynamic" efficiency looks at the longer term, referring to the rate at which the economy's capacity to produce outputs improves over time. Dynamic efficiency implies being efficient in terms of innovation, investment in human capital, entrepreneurship, etc.