

Assessment and recommendations

While sustainable development has provided the main policy framework for promoting integration of economic, social and environmental policies, Austria has launched several initiatives related to green growth. They have mostly focused on the environmental goods and services (EGS) sector, “green jobs” and the links between economic growth and well-being. At the same time, there have been changes in the use of instruments related to green growth.

While regulations, standards and environmentally motivated subsidies remain at the core of Austrian environmental policy mix, the use of economic instruments has been extended. This has helped improve pricing of environmental externalities, although the potential gains of environmentally related taxes and charges have not been fully realised. There is scope to restructure and extend the use of taxes and charges, and to reform environmentally perverse subsidies. This could form part of a broader “socio-ecological tax reform” to reduce the relatively high taxes on labour, promote growth and employment, and contribute to the government’s fiscal consolidation programme.

Revenue from environmentally related taxes has increased significantly over the last decade, and now accounts for a larger share of GDP and total tax receipts than on average in the OECD. However, tax rates on petrol and diesel are below the EU average, making transport fuel prices lower than those applied in some neighbouring countries. This price differential has contributed to extensive purchasing in Austria of fuel that is consumed abroad, especially by freight haulers. In turn, this has contributed to increasing emissions of greenhouse gases (GHGs) from the transport sector. While the government has removed some tax rebates on fuel use, other exemptions apply, which can reduce incentives to use energy efficiently. Much of this support favours energy-intensive industry. As in other

countries, when energy duties are converted in terms of the carbon content of fuels, they vary greatly among fuels and users. For example, diesel is taxed at a lower rate than petrol. This has contributed to diesel vehicles dominating the vehicle fleet and to increased NO_x emissions. Like all EU countries, Austria needs to efficiently combine energy taxation and the EU Emissions Trading System to provide a consistent carbon price signal across the economy.

In 2008, the car purchase tax was partly restructured on the basis of CO₂, NO_x and particle emission levels, which helped improve the carbon efficiency of the car fleet. However, the bulk of vehicle taxes is levied on the annual car insurance, which is based on engine power. On the other hand, there is some evidence that road tolls for freight vehicles, differentiated by emission category, have helped reduce distance travelled on Austrian highways and have encouraged the uptake of low-emission heavy goods vehicles. However, these tolls do not apply to passenger cars and light commercial vehicles, which account for a significant share of freight traffic, nor to the secondary road network. Other forms of road pricing, such as pollution and congestion charges, are not applied. The favourable tax treatment of company cars, subsidies for commuting to and from work, and free parking for employees, as well as sizeable housing subsidies, encourage private car use, long-

distance commuting by car and urban sprawl. They result in increased fuel consumption and GHG emissions, as well as higher emissions of local air pollutants and greater risk of noise, congestion and accidents. In addition to having negative environmental effects and being a cost to the public budget, these forms of subsidy are regressive, as they favour higher income earners.

Subsidies and capital transfers have also been widely used to reach environmental policy objectives. This is linked to the need to find consensus with the social partners, and to provide incentives for the *Länder* and local authorities to take action in areas under their responsibility. In 2011, environmentally motivated subsidies accounted for more than 40% of general government expenditure on environment, more than four times the average for the euro area. Over time, subsidies' focus has shifted from support for public infrastructure, particularly in the water sector, to leveraging business investment in sectors like renewables and energy efficiency. Generation of electricity from renewables is also supported by feed-in tariffs, whose cost is passed on to final electricity customers. While these support policies have encouraged environment-friendly investment, questions remain about the extent to which such investment would have been made anyway, as well as potential windfall profits, technology lock-in and rebound effects. Fragmented responsibilities between levels of government and lack of co-ordination are also a potential source of inefficiency. This suggests that the overall environmental support policy would benefit from a comprehensive assessment of its cost-effectiveness.

Environmental protection expenditure continued to grow in the 2000s to reach 3.8% of GDP, which is high by international standards. Despite increased climate-related investment, expenditure for waste and wastewater management remains dominant. Pay-as-you-throw charging systems for municipal waste are used countrywide and broadly allow recovery of service costs. Waste charges, extended producer responsibility programmes and a landfill/incineration tax have helped increase recycling rates, reduce disposal in landfills and extend private participation in the waste sector. However, charges appear to be too low to provide sufficient incentives for waste prevention in households. Charges are also widely used in the water sector. However, the level of cost recovery is relatively low, particularly for water used in industry and agriculture, partly due to their relatively low use of public water supply and wastewater treatment infrastructure. The level of private sector participation is limited, and water supply and wastewater treatment infrastructure is largely publicly financed.

The combination of a robust environmental policy framework and substantial financial assistance has fostered the development of a strong, innovative EGS sector. In 2011, the sector accounted for 10.8% of GDP and 4.8% of total employment. In recent years, exports of environmental technology have grown faster than manufacturing exports as a whole. There is some evidence that the EGS sector has contributed positively to job creation. In 2010, the environment ministry launched the Masterplan Green Jobs with the goal of creating 100 000 additional jobs in the sector by 2020. Austria should take account of the structural changes involved in greening its economy, and broaden the policy focus from promoting green jobs to enhancing labour market capacity in this transition. In part this would involve co-ordinating environmental and labour market policies so that new entrants to the labour market, and workers leaving declining industries, have the skills needed to work in a greening economy.

The strength of Austria's EGS sector is also linked to good eco-innovation performance. Indicators of innovation in environment- and climate-related technologies have been particularly impressive in recent years, and put Austria among the most eco-innovative countries. As in many countries, there has been a shift in focus from environmental management to climate- and energy-related technologies. The eco-innovation policy mix largely relies on supply-side measures, including support to research and development. However, demand-side instruments, including standards, labelling and green public procurement, have played an increasing role. Further progress is dependent on addressing a number of issues, some of which are embedded in the general framework for innovation policy. These include a fragmented governance structure, the multiplicity and potential duplication of financing mechanisms, and the resource and financial obstacles facing small and medium-sized enterprises.

Austria's net official development assistance (ODA) dropped significantly in the late 2000s. In 2012, it was equivalent to 0.28% of gross national income, well below the EU intermediate target of 0.51% for 2010. Budget cuts make it unlikely that the 2015 international target of 0.7% will be met. Despite declining ODA flows, bilateral aid for environment, renewables, and water and sanitation grew markedly over the last decade, indicating a strong commitment to the environment within development assistance. However, environment-related programmes accounted for 11.5% of total sector-allocable ODA in 2010-11, which is low compared to many other members of the OECD Development Assistance Committee. The 2009 Strategic Guidelines on Environment and Development provide the reference framework for mainstreaming environmental objectives in development co-operation at the federal level. Project screening is the main tool used to

ensure mainstreaming. However, environmental impact assessment and strategic environmental assessment have not been consistently undertaken. Staff and expertise for dealing with environment- and climate-related issues remain limited in Austria's development co-operation system, underlying the importance of focusing on a limited number of priorities to ensure aid effectiveness.

Recommendations

- Extend the use of environmentally related taxes in the framework of a comprehensive "socio-ecological tax reform" that i) establishes an effective carbon tax on fuel used in the sectors not covered by the EU Emissions Trading System; ii) further restructures vehicle taxes so that they better reflect the environmental cost of vehicle use; iii) ensures that other, non-carbon-related externalities are adequately priced; and iv) reduces the tax burden on labour.
- Analyse the potentially negative environmental impacts of existing subsidies and tax benefits, possibly in the context of the annual government review of budgetary support; reform environmentally harmful subsidies such as housing subsidies and energy tax exemptions granted to energy-intensive industry.
- Reduce perverse incentives for car use by revising the tax treatment of company cars and the commuting allowance; consider extending the distance-based road toll system to light commercial vehicles and passenger cars, and to the secondary road network; consider implementing pollution and/or congestion charges in cities suffering from high concentrations of traffic-related emissions.

- Systematically evaluate the cost-effectiveness of environmental support measures at the federal and subnational levels; streamline the financing mechanisms that support environment- and climate-related investment (including renewables feed-in tariffs) with a view to reducing overlaps and potential windfall profits.
- Strengthen the incentive function of municipal waste charges so that they better encourage waste prevention at household level; gradually increase the contribution of agriculture and industry in recovering the costs of providing water services.
- Continue to promote eco innovation by means of a balanced mix of public support for R&D, demand-side measures (e.g. innovation-oriented standards and economic incentives) and partnership with the private sector; improve co-operation between federal and subnational governments, academic institutions and businesses in implementing eco-innovation policy, including in developing education and training programmes needed in the transition to green growth.
- Further strengthen the environmental component of official development assistance, while progressively expanding total aid in line with EU and international commitment; reinforce the effectiveness of environment-related aid by focusing on a few priorities in line with partner countries' needs and Austria's comparative advantage (e.g. climate change adaptation); apply environmental and strategic impact assessment procedures more systematically.

2. Greening the tax system

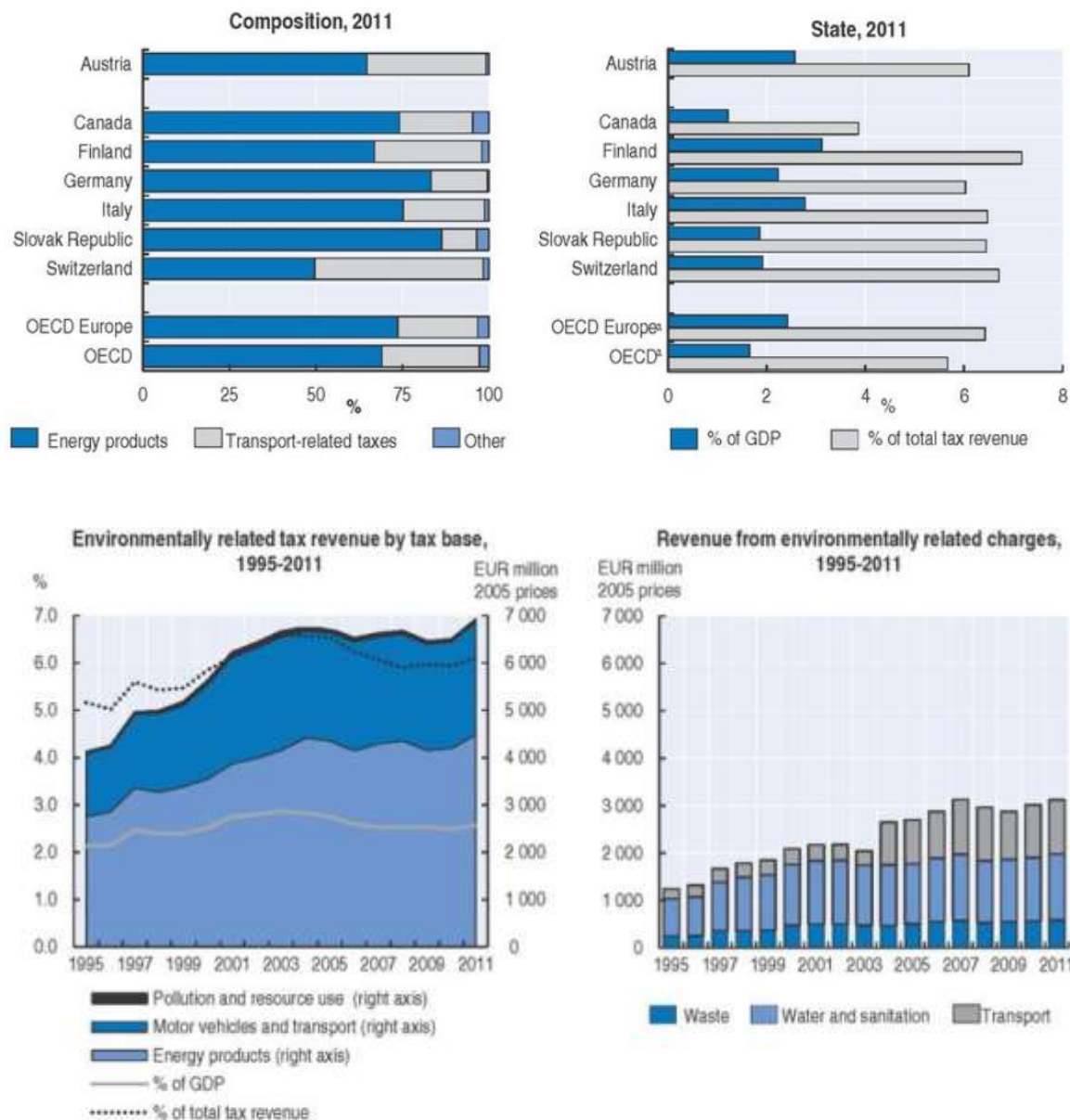
2.1. Overview

Successive tax reforms have helped Austria reduce its tax burden over the past decade. Nevertheless, the tax revenue to GDP ratio (42% in 2011) remains well above the OECD average (33.8%). Compared to the tax mix of many other countries, Austria's is skewed towards labour, notably because of higher than average taxation of individual income and social security contributions (OECD, 2013a). The *Länder* collect the lowest proportion of total tax revenue among the EU countries with federal systems: less than 10% in Austria compared with around 20% in Belgium, Germany and Spain. Local governments receive nearly 12% of tax revenue, which is slightly above the EU average (Eurostat, 2012). The *Länder* and local governments are still far from having effective fiscal autonomy, as they do not have full decision-making powers in regard to most local taxes, and heavily rely on transfers and subsidies from the federal budget.

Revenue from environmentally related taxes increased in real terms by 23% between 2000 and 2011. It stood at 2.6% of GDP and 6.1% of total tax receipts in 2011, higher than the corresponding shares in OECD as a whole. Revenue from these taxes stabilised in the second half of the 2000s, both in absolute terms and as a share of GDP and total tax receipts (Figure 3.1). This was largely due to the declining fuel consumption and energy intensity of the economy, and to a change in the composition of vehicle sales and stock towards smaller vehicles, which are taxed at lower rates (Section 2.3). Rising fuel prices since 2003, and more recent fuel tax hikes, have contributed to the revenue stabilisation by stimulating the shift to smaller, more fuel-efficient vehicles and mitigating transport demand, transit traffic and fuel tourism.

As in all other OECD countries, environmentally related taxes are chiefly taxes on energy products and vehicles (Figure 3.1). At the *Land* and municipal levels, Austria also levies taxes on disposal and treatment of waste (landfill/incineration tax), on hunting and fishing licences and on landscape and nature protection (an example is the tree protection levy in Vienna). However, resource and pollution taxes account for a minor share of revenue from environmentally related taxes (less than 1% in 2011). The landfill/incineration tax provides more than 80% of the revenue from resource and pollution taxes. It is levied per tonne of waste treated or disposed of, at a rate differentiated by waste type

Figure 3.1. **Environmentally related taxes and charges**



a) Weighted average.

Source: OECD/EEA (2013), *OECD/EEA Database on instruments for environmental policy and natural resources management*; OECD (2012), *OECD Economic Outlook No. 91* (database); Petrović, B. (2012).

(it is lowest for construction and demolition waste) and management method (it is higher for landfilling than for incineration) (EC, 2012a). Biological treatment, recycling and reuse are not taxed. The revenue from the landfill/incineration tax is earmarked for pollution prevention and remediation of contaminated sites. There is evidence that a gradual increase of the tax rate, together with the introduction of a landfill ban for untreated waste, stimulated a shift to thermal treatment of waste (Chapter 1).

Austria extensively applies charges for environmental services such as waste collection, wastewater treatment and water supply, and for the use of roads. Revenue from these charges increased considerably in the last decade, reaching 1.2% of GDP in 2011

(Petrović, 2012). The introduction of a distance-based road toll for heavy goods vehicles in 2004 was the main contributing factor. The role of transport-related charges increased from 16% of charge revenue in 2000 to 37% in 2011. Waste charges account for 19% and water charges for 44%.

Austria should consider further extending the use of environmentally related taxes and charges, possibly in the context of a broader tax reform. The possibility of a “socio-ecological tax reform” has been long debated (OECD, 2003). The Austrian Institute of Economic Research estimated that raising the oil tax, adding a CO₂ tax on all fossil fuels at EUR 30/tonne of CO₂ and increasing the electricity levy could each generate additional revenue of between EUR 0.5 billion and EUR 1 billion per year, depending on the extent of exemptions granted to industries and households (Böheim et al., 2010). Experience in other countries shows that environmentally related taxes can make the tax system more growth-friendly if revenue is used to reduce more distortionary taxes such as those on labour and businesses. The potential gains from this type of approach are significant for Austria in light of its above-average tax burden on labour and the need to finance its strong but costly public sector (OECD, 2013a). More generally, increasing revenue from environmentally related taxes could contribute to the government’s fiscal consolidation programme. Measures were taken in this direction in 2011 with the introduction of a flight tax, further adjustment of the car registration tax to reflect vehicles’ CO₂ emission levels, an increase in transport fuel excise duties and the removal of fuel tax exemptions.

3. Removing environmentally perverse incentives

Austria spends large amounts on subsidies and transfers to households and businesses. For example, federal spending on business subsidies and capital transfers accounted for 5.9% of GDP in 2011, more than twice the average in the euro area (2.5% of GDP). This share has barely changed since 2000. It remains above average even considering that more than half of the business subsidies go to public enterprises such as the rail company, hospitals and municipal utilities (Pitlik et al., 2010). Extensive use of subsidies and grants is entrenched in Austria's policy-making environment, which is characterised by a need to reach consensus within the social partnership and to stimulate subnational authorities to take action in the areas under their responsibility (Chapter 2).

There is no comprehensive information on subsidies and tax expenditure that could be environmentally harmful. A pilot study by Statistik Austria estimated that potentially

environmentally harmful subsidies and tax expenditure amounted to EUR 4.9 billion in 2007, or about 1.7% of GDP (Baud, 2009). However, this study has not been followed up. The Ministry of Finance reviews budgetary support annually, but the reports do not assess the potential environmental impact of subsidies. In 2013, the ministry launched an online subsidy database ("transparency database") with the aims of eliminating overlaps of funds and improving transparency, targeting and effectiveness of public transfers. At the time of writing, the database covered only EU-funded support to agriculture and fishing and environment-related funds under the BMLFUW's responsibility (Section 4). Austria could build on the annual reporting and subsidy database to establish a process for the systematic review of environmentally harmful subsidies. This would further improve the transparency of the tax and public expenditure system and could be the basis for subsequent reforms of subsidies and special tax treatment that are not justified on economic, social and environmental grounds.

3.1. Tax concessions on energy use

Austria has made progress in removing tax exemptions and rebates on fuels used in some sectors. The energy tax exemption for liquefied petroleum gas (LPG) used in local public transport, the energy tax relief for diesel used in rail transport and the rebate to diesel used in agriculture expired at the end of 2012.

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Other exemptions still apply, however, which lower end-use prices and can reduce incentives to use energy efficiently. They include exemptions on kerosene for non-transport purposes; LPG used to produce electricity; and fuel used in combined heat and power plants, commercial aircrafts and vessels operating on some routes, and in energy-intensive industrial facilities. The energy tax refund to energy-intensive industries was introduced in 1996 and remains the main form of support to fossil fuel use (Table 3.1). It allows businesses to get refunds on taxes on energy use in excess of 0.5% of company value added (businesses have to pay at least the minimum rates stipulated by the energy tax directive). Since 2011, the service sector is no longer entitled to these refunds. In addition, electricity-intensive users are partially shielded from the electricity surcharge associated with the renewables feed-in tariffs (Section 5).

Table 3.1. Support to fossil fuel consumption

EUR million

	2005	2006	2007	2008	2009	2010	2011 ^a
Energy tax refund to energy-intensive industries	329	379	312	310	374	329	329
Energy tax exemption for LPG used in public transport ^b	4	4	4	4	4	4	4
Energy tax relief for diesel used by trains of the Austrian railways ^b	18	13	15	15	15	10	10
Rebates for diesel used in agriculture ^b	39	39	44	44	49	49	49
Total	390	435	375	373	442	392	392
% of GDP	0.2	0.2	0.1	0.1	0.2	0.1	0.1
% of energy tax revenue	9.0	10.3	8.4	8.1	9.9	8.6	7.8

a) Preliminary.

b) Phased out at the end of 2012.

Source: OECD (2013c), *Inventory of Estimated Budgetary Support and Tax Expenditures for Fossil Fuels 2013*.

The OECD (2013c) has estimated that special tax provisions on fossil fuel cost the public budget some EUR 400 million per year between 2005 and 2011. This was the equivalent of nearly 8% of energy tax revenue and 0.1% of GDP in 2011 (Table 3.1). The

amount is expected to decrease due to the removal of some exemptions. For example, the Ministry of Finance has estimated that the exclusion of the service sector from the energy tax refund will result in savings of about EUR 100 million per year.

3.2. Perverse incentives to vehicle use

Austria provides favourable tax treatment of company cars and subsidises for travelling to and from work. Company cars used for private purposes increase an employee's taxable income by 18% of the vehicle acquisition cost, independent of car emission standards. A ceiling of EUR 7 200 per year on the maximum increase in the tax base results in higher benefits for bigger, more expensive cars. Fuel costs paid by companies are not taken into account in calculating the employee's tax base. As a result, employees have no incentive to choose more fuel-efficient cars and to limit the use of company cars. The average annual subsidy is estimated at EUR 1 342, which makes it attractive for employees to be paid part of their salary in the form of cars. The number of company cars has risen rapidly over the past decade: over half of newly registered cars are company cars. The revenue loss attributable to this favourable tax treatment was estimated at EUR 609 million or 0.2% of GDP in 2012 (OECD, 2012a).

Employees travelling to work benefit from a tax deduction to compensate for commuting expenses. In 2011, the federal allowance was increased and vehicle taxes reduced to compensate for the latest fuel tax rises. The deduction increases with distance travelled and is higher if public transport is not accessible,³ which rewards commuters living in areas with bad public transport connections, discourages the use of public transport and encourages workers to live further away from their place of work. It is estimated that the federal commuting allowance overcompensates the real costs of

commuting by EUR 80 million. Lost revenue is estimated between EUR 250 million and EUR 320 million per year (Withana et al., 2012). Most *Länder* also make commuting tax breaks available, above and beyond the federal allowance.

In addition to the cost for the public budget, both the tax treatment of company cars and the commuting allowance are likely to have adverse distributional consequences. Company cars are typically provided to middle and higher income earners. Almost half the tax benefit related to the commuting allowance accrues to people with annual income above EUR 35 000, and 10% of beneficiaries have a gross annual income above EUR 70 000 (Withana et al., 2012).

From an environmental perspective, these measures tend to encourage private car use, long-distance commuting and urban sprawl. They result in increased fuel consumption and GHG emissions, as well as higher emissions of local air pollutants and greater noise, congestion and risk of accidents. Estimates for EU countries indicate that company car tax treatment results in an average 4-8% increase in fuel consumption and GHG emissions (Copenhagen Economics, 2010). The OECD (2013d) estimates that the OECD average for environmental impacts of undertaxation of company cars is EUR 112 billion per year. In addition, free parking lots provided by employers raise employees' taxable income by a very limited amount, increasing the incentive to drive to work (mainly at rush hour and to/from particularly congested locations) and exacerbating congestion and environmental problems.

Austrian housing subsidy policy has also contributed to urban sprawl and to increasing land take for settlement and transport infrastructure (Chapter 1), with negative

consequences for resource and energy use and traffic flows. This runs counter to the objective in the Austrian Sustainable Development Strategy of reducing land sealing. In particular, the housing assistance programme (*Wohnbauförderung*), managed by the *Länder*, provides direct subsidies to new homeowners for purchasing or building their home. More than 40% of new homeowners benefit from these funds, which cover a considerable share of the primary residence purchase price. There is evidence that these direct subsidies benefit higher income earners more than those with lower income, who are generally less likely to invest in home ownership (Albacete and Wagner, 2009).

Overall, Austria should consider revising this mix of distorting subsidies, particularly to strengthen the incentive function of road pricing and fuel taxes. As from 2013, employees using a company car for private purposes are no longer entitled to commuting allowances, which is a welcome step. However, the company car treatment should be made less advantageous and possibly linked to vehicles' emission levels, as is done in the United Kingdom. The commuting allowance should no longer be conditional on distance driven and/or should be linked to environmental criteria (e.g. car fuel efficiency) or revised in a way that rewards the use of public transport. Housing subsidies could also be adjusted. While they take environmental considerations such as energy efficiency into account in some *Länder*, subsidies could be made conditional on other parameters such as use of existing buildings and built-up areas and access to public transport. Property taxes, which are relatively low by international standards, could be adjusted to reflect the same considerations. Special fees for land use currently in place in some *Länder* (e.g. Styria) could be extended and set at higher rates for the conversion of undeveloped land.

4. Better targeting environmentally motivated subsidies

Austria has long used public funds to support and stimulate environment-related investment. Extensive use of subsidies and capital transfers is common to most policy areas (Section 3). In 2011, subsidies and capital transfers for environmental protection amounted to a minor share of GDP and to 3.6% of total government subsidies and capital transfers. Nonetheless, they appear to be a major policy tool for reaching environmental objectives: they accounted for more than 40% of general government expenditure for environmental protection in 2011, compared with 9% in the euro area and 12% of total general government expenditure in Austria. This pattern has been relatively stable since 2000.

Similarly, subsidies and capital grants account for 56% of general government expenditure on agriculture, forestry and fishing. A large and growing share of these transfers has targeted more environment-friendly agricultural practices, such as organic farming, mainly through agri-environmental programmes. In 2011, the 2007-13 agri-environmental programme (ÖPUL) disbursed nearly EUR 550 million, equivalent to 70% of public subsidies and capital transfers to agriculture, forestry and fishery. ÖPUL applies countrywide rather than focusing on environmentally sensitive areas. As of 2011, 74% of agricultural holdings, corresponding to nearly 90% of the utilised agricultural area, participated in ÖPUL, a large share by international standards. This subsidy policy has stimulated the uptake of more environment-friendly agricultural practices, helped Austria become an organic farming leader and ultimately resulted in reduced impacts of agriculture on biodiversity, land and water (Chapter 1).

The main budgetary support to environmental investment is the Environmental Support Act. It dates back to 1993, although it has been amended several times. It consolidated a range of subsidy programmes and established a framework for federal environmental support under

what is now the BMLFUW. It also provided for regular monitoring and evaluation of the financial assistance programmes and reporting to the parliament.

The act provides for direct financial assistance to local authorities, industries, farmers and households for investment mainly related to renewable energy and energy efficiency, water management, contaminated sites, transport and mobility (Box 3.2). The operating principle of the act is that support is necessary to stimulate certain environmental investments where the applicant cannot afford the entire investment and needs assistance to close the gap between the basic financing (e.g. secured through commercial loans, co-financing) and that needed to realise the environmental investment; or where the environmental investment is not economically viable because less environmentally sound solutions are cheaper. In the latter case the support is used to tip the balance in favour of the environmental investment (OECD, 2003).

Box 3.2. Budgetary support to environmental investment

The subsidy programmes under the 1993 Environmental Support Act provide support for:

- remediation of contaminated sites and groundwater bodies (e.g. former production facilities, landfill sites) and related research projects;
- industrial wastewater management in enterprises;
- municipal water management, including water supply and wastewater treatment projects by local authorities, water associations and co-operatives, groundwater protection, and related research projects;
- “water ecology” investment by local authorities and operators of hydropower plants to restore the continuity of freshwater bodies and upgrade the hydromorphological

conditions of the water network;

- environmental investment by private enterprises (*Umweltförderung im Inland*), mainly related to climate change (renewable energy and energy efficiency), air pollution control, noise abatement and the reduction of hazardous waste.

Other environment-related support mechanisms include:

- the thermal building retrofitting initiative, launched in 2011; with an annual budget of EUR 100 million in 2011-16, it supports thermal building renovation projects in the residential and commercial sector;
- the klima:aktiv Mobil subsidy programme, launched in 2007 as part of the broader klima:aktiv programme (Box 2.2); it finances measures by local and provincial authorities, tourism operators and providers of cycling facilities to promote cycling, walking, use of public transport, renewal of vehicle fleets towards cleaner vehicles and implementation of mobility management systems;
- the Climate and Energy Fund, established in 2007, to support projects in energy efficiency, renewables and other measures to reduce GHG emissions in businesses and households.

Kommunalkredit Public Consulting (KPC), a subsidiary of a state-owned investment bank, manages the federal subsidy programmes, the EU funds allocated to environmental investment and rural development, and some *Land* support programmes, mainly targeting climate- and energy-related investment. KPC serves as a one-stop shop to which potential investors can apply for several, though not all, subsidy programmes at federal and *Land* levels.

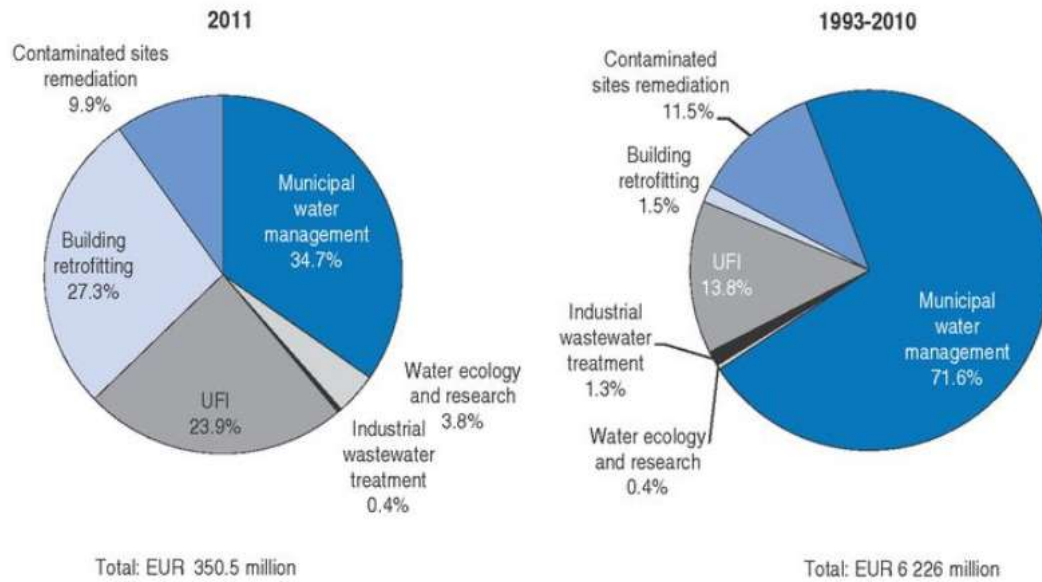
Source: KPC (2011).

The subsidy programmes under the Environmental Support Act provide grants calculated either as a fraction of total investment costs or as a lump sum. The subsidisation rates range between 15% and 30% of investment costs depending on the type of projects. The average subsidy rate has declined over time, with both the revision of the funding guidelines, which reduced the assistance rate per project, and a shift towards smaller projects that benefit from lower financing rate (BMLFUW, 2011).⁴

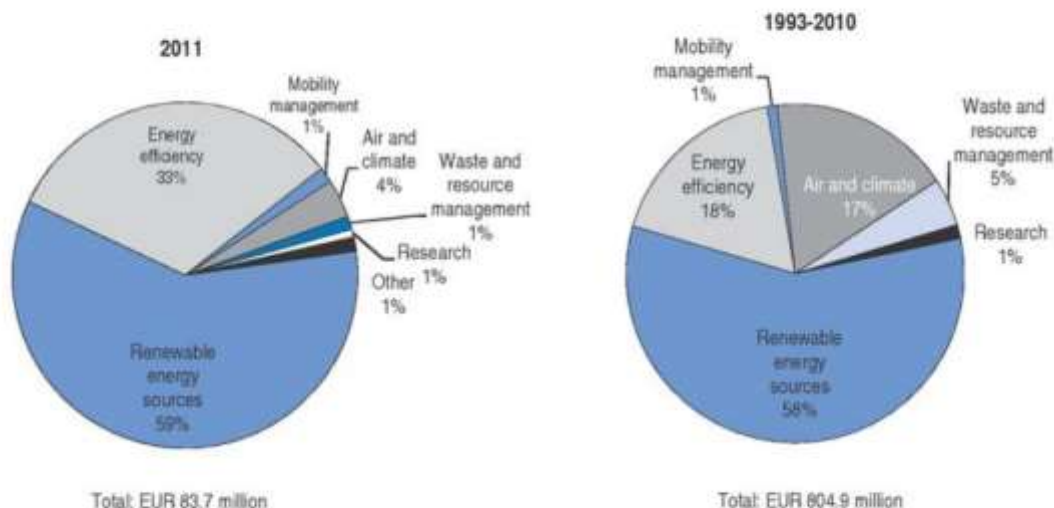
In 2011, funds provided under the act included EUR 350.5 million in subsidies and supported EUR 2 billion in investment, mostly related to municipal water management, thermal retrofitting of buildings and environmental investment by private enterprises. Over time, the focus of support has shifted from infrastructure development, particularly water infrastructure, to stimulating environment-related investment in the private sector (Figure 3.4).

Figure 3.4. Budgetary support for environmental investment

Subsidy programmes under the 1993 Environmental Support Act



Umweltförderung im Inland – UFI^{a)}



a) UFI: environmental investment by private enterprises.
Source: BMLFUW (2011); OECD calculations.

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About 24% of the grants were disbursed through Umweltförderung im Inland (UFI), which targets private businesses. UFI supported nearly EUR 580 million in investment in 2011, nearly three times as much as in 2000 (BMLFUW, 2011). The vast majority of financed projects were related to renewable energy and energy efficiency, indicating a shift of business investment from air pollution control and waste management to climate-related projects (Figure 3.4). Renewables and energy-efficient and climate-friendly transport projects absorbed an additional EUR 100 million allocated by the Climate and Energy Fund (Box 3.2).

Overall, the federal subsidies programmes listed in Box 3.2 leveraged about EUR 2.5 billion investment in 2011 (KPC, 2011), equivalent to 3.6% of Austria's gross capital formation.⁵ Estimates indicate that the financed projects resulted in substantial reductions in resource use, emissions and pollution. In particular, they helped reduce CO₂ emissions by some 12 Mt over the technical life of the investment (KPC, 2011). Most of the CO₂ abatement is attributable to investment in renewables (BMLFUW, 2011). Analyses also indicate that in 2011 the UFI and the thermal retrofitting initiative resulted in GDP growth and employment opportunities that would have not been generated if the funded investment had not been made (Table 3.2). In addition, the cost of the subsidies to the public budget was largely offset by additional tax revenue and savings in labour market support expenditure (BMLFUW, 2011; Kletzan-Slamanig and Steininger, 2010).

Table 3.2. Economic effects of federal environmental support programmes in 2011

	Unit	UFI	Building retrofitting initiative
Investment volume	EUR million	578.8	802.5
Financial assistance	EUR million	83.7	95.7
Subsidy rate	%	14%	12%
CO ₂ reduction (over investment lifetime)	Mt CO ₂	7.8	4.3
Subsidy per avoided tonne of CO ₂ emissions	EUR/t CO ₂	10.7	22.3
GDP annual change	%	0.14	0.19
Employment effect	Units	8 600	12 038
Additional tax revenue	EUR million	360	503.1
Savings in labour market expenditure	EUR million	110	165.3

Source: BMLFUW (2011); OECD calculations.

These funding mechanisms have been effective in encouraging public and private operators and households to make environment-friendly investment, mainly by lowering upfront costs and making the environmental investment economically viable. However, in addition to being a cost to the budget, subsidies are generally not the most cost-effective instrument to achieve environmental objectives. Taxes that directly incorporate the cost of environmental damage into market prices are generally more efficient to tip the balance in favour of environmental investment, and credit support (e.g. loan guarantee) is more appropriate to address capital market failures (OECD, 2012b). A key problem with government financial assistance is that many beneficiaries would make the investment even without the support. As determining the exact subsidy amount needed to stimulate changes in investment decisions is difficult, subsidy programmes may result in extensive windfall benefits. In addition, by targeting a limited range of “cleaner” technologies or activities, subsidy-based measures encourage firms and consumers to adopt the subsidised solutions even when other options would be more effective. Therefore, they

tend to generate technology lock-in. Finally, as subsidies make the supported activity cheaper, they may perversely increase activity levels and, therefore, use of energy and natural resources and pollution (rebound effect) (OECD, 2012b).

In general, Austria's subsidy policy presents some inefficiency due to fragmented responsibilities between levels of government, lack of co-operation between them and insufficient reporting, especially at subnational level. The OECD (2011b) concluded that "many long-established spending programmes absorb large resources on a routine basis, with constituencies built up with vested interests in their continuation irrespective of social benefit and costs". This is valid for environment-related subsidies, which also potentially overlap. For example, investment in renewables and energy efficiency can be funded by UFI and the Climate and Energy Fund, although co-ordination mechanisms are in place to avoid double funding. Subnational programmes add to this multiplicity of funds. Pitlik et al. (2010) estimated that cutting all-purpose business subsidies and improving their management framework would help save up to EUR 5 billion per year in the long term. While federal funds under the Environmental Support Act are subject to regular monitoring and reporting, the overall environmental support policy would benefit from a thorough evaluation of its cost-effectiveness. This review should include funds disbursed at both the federal and subnational levels. It should consider the extent to which the actual outcomes of subsidised investment projects meet expectations (or desired outcomes) and at what cost.

5. Investing in the environment to promote green growth

5.1. Environment-related components of the fiscal stimulus packages

Responding to the global financial and economic crisis of 2008-09, Austria rapidly introduced sizeable stimulus packages at the federal and *Land* levels. The federal packages approved in 2009 and 2010 amounted to about 3.5% of GDP (Breuss et al., 2009). Environment-related measures were estimated at nearly 8% of the total stimulus, or 0.3% of GDP. They mostly involved investment in rail infrastructure and energy efficiency in public buildings (Table 3.3). These measures targeted sectors that were particularly affected by the recession, including vehicles, infrastructure and construction, and helped mitigate the decline in construction investment (EC, 2011a).

Table 3.3. Environment-related components of the fiscal stimulus packages

Measure	Description	Budget
Thermal retrofitting (private)	Funding for thermal retrofitting of buildings in the residential and commercial sector	EUR 100 million
Thermal retrofitting (public)	Funding for thermal retrofitting of public buildings owned by the Federal Real Estate Agency (schools, universities, public administration buildings) ^a	EUR 292 million
Car scrapping programme	Contribution of EUR 1 500 for purchasing a new car, minimum Euro 4, and scrapping a vehicle more than 13 years old	EUR 22.5 million
Railway infrastructure investment	Investment in addition to the regular ÖBB Rail Investment Framework Programme 2009-14	EUR 350 million
Broadband infrastructure		EUR 10 million
Total		EUR 774.5 million

a) Assumes that one-third of the budget allocated to the Federal Real Estate Agency (EUR 875 million) was to be used for energy efficiency retrofitting.

Source: Breuss et al. (2009); IHS Global Insight (2010).

Kletzan-Slamanig and Steininger (2010) estimated that thermal retrofitting leveraged EUR 584 million in investment and generated a net increase of about 1 100 jobs. On the basis of these results, the government extended the initiative to 2016. The primary purpose of the scrapping programme was to sustain car sales, although it also helped renew the fleet with more fuel efficient cars. The only environmental requirement, in addition to the scrapped vehicle's age, was that the purchased vehicle had to comply with the Euro 4 emission standard, mandatory in the EU since 2005. The scrapped vehicles were older and more carbon-intensive than on average in European countries that implemented similar programmes, and the average carbon efficiency of newly registered cars reached 150.7 g CO₂/km compared to 154.2 g CO₂/km in a business-as-usual scenario (IHS, 2010). In general, car scrapping programmes are not a cost-effective way to meet environmental objectives such as reducing GHG emissions. In addition, as in many other countries, Austria's stimulus packages included measures that could have negative environmental impacts, such as investment in road construction.

5.2. Expenditure for environmental protection and water supply

Environmental protection expenditure⁶ grew by 60% in real terms between 2000 and 2009 to reach 3.8% of GDP, which is high by international standards. Expenditure grew in all environmental domains, but especially in air and climate protection, soil protection, and biodiversity conservation, albeit from relatively low levels. These three sectors have acquired a progressively larger role, accounting for about 26% of expenditure in 2009 (Figure 3.5). Waste and wastewater management accounted for half of environmental expenditure in 2009. This is down from more than two-thirds at the beginning of the decade, but remains the main item of expenditure. Growth in expenditure was mainly due to an increase in current expenditure. The share of investment in total expenditure

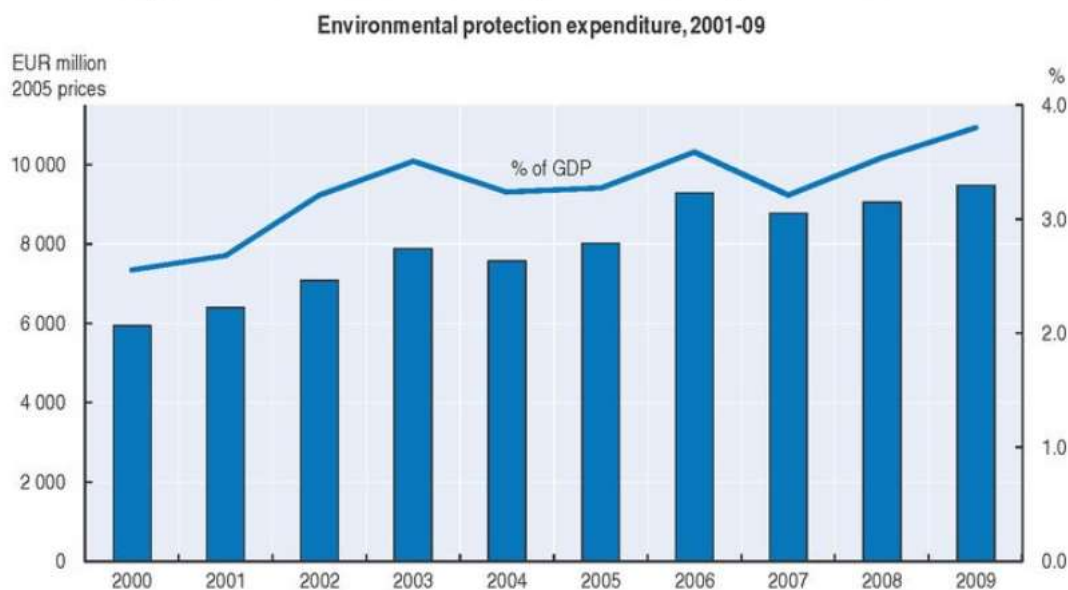
declined from 26% in 2000 to 14% in 2009. As in most other developed countries, this trend reflects a rise in spending on operation and maintenance of infrastructure built in the past.

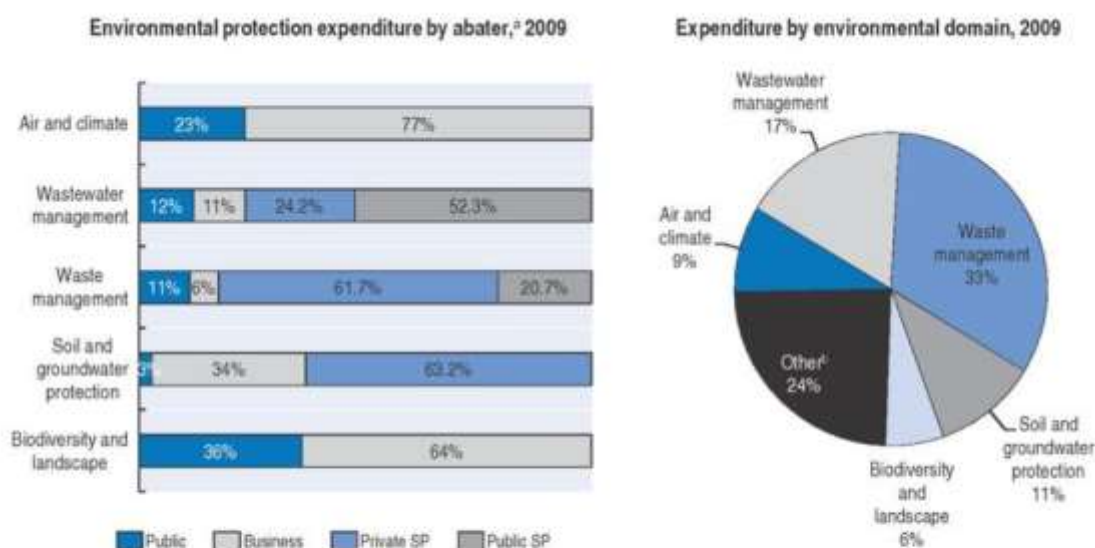
The public sector is responsible for a minor share of environmental protection expenditure (11% in 2009). As in most OECD countries, subnational governments account for the vast majority of government environmental expenditure: local governments about 60% and the *Länder* 14% in 2009. Public and private specialised producers, i.e. entities specialised in the provision of environmental services,⁷ accounted for about two-thirds of environmental expenditure on average during the 2000s, followed by the business sector (20%) and the public sector (12%).⁸ Specialised producers carried out most of the expenditure in the waste and water sectors and their expenditure increased especially in the second half of the decade (Figure 3.5). This rise reflects growing use of subcontractors to provide environmental services, especially related to waste. As in many European countries, businesses have spent increasing amounts on air and climate protection, carrying out most of the expenditure in this area as a result of a policy focus shift from traditional pollution issues to climate change mitigation.

Waste and water infrastructure and services

Waste treatment infrastructure is well developed and available throughout the country. Private operators are dominant in the waste management industry, accounting for more than 60% of expenditure (Figure 3.5) and 80% of turnover. The *Länder* have responsibility for municipal waste management and charging policies. Austria is among the few EU countries in which pay-as-you-throw charging systems are used countrywide

Figure 3.5. Environmental protection expenditure





a) Expenses related to activities directly executed by an economic sector (public sector, business sector, public and private specialised producers (SP) of environmental protection services).

b) Other includes services to buildings and landscape activities and other activities related to engineering consulting, construction, and financial services.

Source: OECD (2013) *OECD Environment Statistics* (database); OECD (2012), *OECD Economic Outlook No. 91* (database).

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(EC, 2012a). In general, charges are based on the size of a household's waste bin and the frequency of collection, and are designed to cover the costs of waste collection and treatment. According to government surveys, cost recovery is generally assured: about 60% of municipalities cover at least 95% of all waste service costs. Extended producer responsibility systems are in place for other waste streams, such as packaging waste, end-of-life vehicles and waste electronic and electrical equipment.⁹ Austria is among the few EU countries in which producers cover all or most of the costs of managing such waste. Extended producer responsibility programmes and waste charges have helped increase

recycling rates and reduce disposal in landfills (Chapter 1). However, Austria's charges for municipal waste, while based on volume of waste generated, are relatively low and do not seem sufficient to encourage waste prevention at household level (EC, 2012a).

The role of private operators in the water sector is relatively limited, reflecting a view in Austrian society that water services are of key public interest and should be publicly managed. Public specialised producers, mainly run by municipalities, account for more than half the expenditure for wastewater management (Figure 3.5). Investment in wastewater treatment and water supply infrastructure is largely subsidised by the federal government. In 2011, capital transfers accounted for more than 95% of government expenditure for water supply, a share that has remained stable since 2000. The Environmental Support Act (Section 4) provides the framework for federal subsidies for municipal water supply and wastewater infrastructure and for industrial wastewater treatment. Wastewater treatment investment has absorbed the vast majority of federal transfers since 1993, when the act was approved, and has benefitted from a higher average subsidisation rate (Table 3.4). This is in line with the government priority of extending connections to wastewater treatment plants and reducing water pollution. In 2010, 94% of the population was connected to public wastewater treatment plants, all of which provided secondary and/or tertiary treatment (Chapter 1 and Annex I.C).

As public support aims at keeping end-use prices affordable, the subsidisation rate increases with the investment costs. On average, federal transfers covered 22% of investment costs in water infrastructure, below the average rate registered in 1993-2010 (Table 3.4). This is in line with the general trend of declining subsidisation rates, and is linked to the smaller size of projects (Section 4).¹⁰ Additional subsidies from the *Länder*, loans and equity capital cover most of the remaining investment costs, while fees for connection to the infrastructure account for about 10-15%.

Table 3.4. Federal subsidies for water infrastructure^a

	2011				1993-2010			
	Investment cost	Subsidy	Average subsidy rate ^b	% of total	Investment cost	Subsidy	Average subsidy rate ^b	% of total
	EUR million		%		EUR million		%	
Wastewater treatment	384.7	93.5	24	76	12 853.6	4 053.2	32	89
Water supply	162.6	29.5	18	24	2 661.4	485.4	18	11
Total	547.3	123.0	22	100	15 515.0	4 538.6	29	100

a) Under the Environmental Support Act.

b) Subsidy/investment cost-ratio.

Source: BMLFUW (2011), *Umweltförderungen des Bundes 2011*.

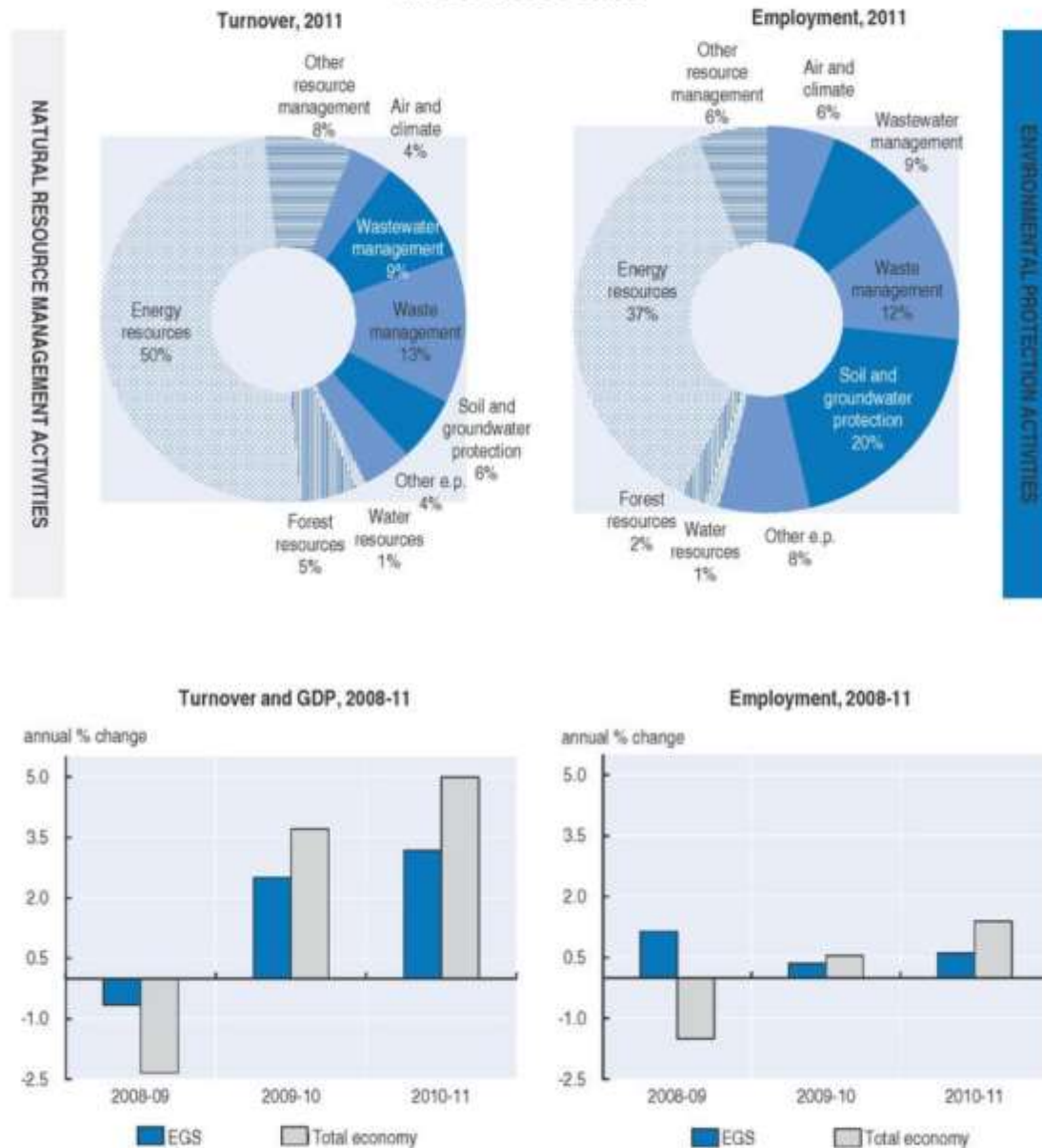
In addition to connection fees, municipalities levy charges that are directly or indirectly linked to water consumption or wastewater discharge. Some municipalities apply a wastewater surcharge depending on pollution load. Municipal charges have to be in a range set by federal regulations and meet regulatory requirements. Estimates indicate that, on average, water charges cover 85% of annual costs to municipalities for providing water services. However, the way in which annual costs are calculated and the extent to which they include investment costs vary across municipalities (Heidler and Prandstetten, 2008). Households contribute 70-75% to cost recovery of water services, industry 20-25% and agriculture 2-5% (EC, 2012b).

6. Expanding environment-related markets and employment

Long-established environmental regulations and significant financial assistance to environment- and climate-related investment have helped Austria develop a strong, innovative and dynamic environmental goods and services sector.¹² Statistik Austria reported that turnover in the EGS sector totalled EUR 32.6 billion in 2011, equivalent to 10.8% of GDP. This was greater than the contribution to GDP of other important economic sectors such as construction (6.7%) and tourism (5.5%). Employment in the EGS sector reached about 171 245 full-time equivalents in 2011, or 4.8% of total employment.

The EGS sector grew by 5.1% in 2008-11 while the economy as a whole grew by 6.4%. While total employment increased by 0.4%, in the EGS sector it increased by 2%. The EGS sector weathered the 2008-09 recession well: its turnover declined less than GDP did, and employment in the sector grew by about 1% while total employment declined by nearly 1.5% (Figure 3.6). Growth rates vary by activity: some (e.g. protection of biodiversity and landscape, renewables, waste management) grew well above average, while others (e.g. management of wild flora and fauna, protection of ambient air and climate, noise and vibration abatement) shrank.

Figure 3.6. **Turnover and employment in the environmental goods and service sector**



Source: Statistik Austria (2013), *Environment Statistics* (database).

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As in other countries, the EGS sector has undergone a structural transformation in the last ten years, with increasing focus on energy and low-carbon technologies, goods and services. Resource management activities (which aim to preserve and maintain the stock of natural resources) accounted for about 63% of turnover and about 45% of employment in 2011. Environmental protection activities, which aim to prevent, reduce and eliminate pollution and environmental degradation, accounted for most of the employment in the EGS sector (55%) but for 37% of turnover (Figure 3.6). Turnover in the energy management sector far exceeded that in other categories, driven by a boom in both renewables and energy efficiency activities: renewables accounted for 36% of turnover, energy efficiency for 14%. Management of waste and wastewater and soil and water resource protection were the other large subsectors. The renewables industry was the largest employer in the EGS sector in 2011, accounting for about 22% of employment, followed by soil and water protection (20%) and heat/energy efficiency (15%).

Environmental services (e.g. waste and wastewater treatment and energy- and water-saving activities) generated 44% of EGS turnover in 2011. Production of less polluting or more resource-efficient goods, including organic farming products and less polluting vehicles, accounted for 36% of EGS sales. Production of environmental technologies, including renewables technologies, followed with 18%.

Austrian companies are generally export oriented, and this is particularly evident in the EGS sector. A survey by the Austrian Institute of Economic Research indicates that environmental technology exports grew by an annual average of 11% between 2007 and 2011, almost 10% faster than manufacturing exports as a whole. Austrian companies have increasingly diversified towards extra-EU markets, although they remain mostly oriented

towards the EU market. Austria's exports accounted for 1.5% of the global market in environmental technology in 2009-11. While this is a relatively minor share, it is slightly above Austria's share of the global market in manufactured goods and comparable to that of other EU countries such as Denmark and Sweden. Other indicators suggest that Austria's competitive position in the sector is strong and improving, also owing to its high research and innovation intensity (Köppl et al., 2013) (Section 7). In 2005, the BMLFUW and the Austrian Federal Economic Chamber launched an environmental technology export initiative to assist EGS companies in developing export markets. By late 2010, about 270 companies had participated in the initiative (Pirgmaier and Schreiber, 2011).

The subsidy programmes for environmental investment discussed in Section 4 have been a key policy tool to stimulate domestic demand for EGS, thereby promoting development of the sector. The government has increasingly provided information on the impact of these subsidies on GDP growth, exports and employment. Often, estimates indicate very positive effects. For example, the building retrofitting initiative generated more than 12 000 jobs in 2011 (Table 3.2); klima:aktiv Mobil has created 4 600 jobs since its launch in 2007; and the renewables feed-in tariff system will result in net employment growth of 64 000 jobs by 2020 (E-Control, 2011). However, it is not always clear how these impacts are calculated and to what extent the various estimates are comparable. It appears that the growth in green jobs is an important factor in discussions about support for environmental and climate-related investment and about environmental policy measures more generally.

In 2010, the BMLFUW launched the Masterplan Green Jobs with the goal of creating 100 000 additional "green jobs" by 2020. This means EGS employment would increase by more than 50% from its 2010 level. The Masterplan focuses on agriculture and forestry, environmental technology and renewable energy, and the tourism and leisure industry.

It identifies six main areas of action to reach the goal: education and training for the environment industry; support to innovation; promotion of networking and co-operation among actors in the green economy (industry, research and education institutes, public institutions, etc.); export promotion; targeted investment and consumer incentives to stimulate the demand for cleaner products, technology and services; and awareness raising. The plan was partly based on an *ex ante* assessment of the potential net employment impact of selected measures. The assessment indicated that nearly 20 000 additional full-time equivalents could be employed, compared to the baseline scenario, by promoting exports of environmental technology, ecotourism and use of agriculture and forestry biomass as an energy and material source. More than two-thirds of the jobs would be in ecotourism (Meyer et al., 2010). The assessed measures were subsequently included in the plan. As part of the Masterplan, a green jobs career portal (green-jobs.at) was established as a hub for job seekers and employers.

Maintaining the positive employment effects of EGS sector expansion will likely require better co-ordination between environmental and labour market policies, with a view to providing workers with the new job skills needed in a greener economy and facilitating their shift from “losing” to “winning” sectors. Effective co-ordination would help keep skill shortages from hampering the effectiveness of environmental policy measures (e.g. energy efficient retrofitting of buildings) and prevent green training programmes from overanticipating demand for EGS and leaving trained workers underemployed. The *klima:aktiv* initiative (Box 2.2) is a good example of such policy co-ordination (OECD, 2012c): it provides workforce training as part of a package of measures to support green sectors.¹³ More generally, Austria could broaden its policy focus from promoting the EGS sector to enhancing its labour market capacity to adjust to the green growth transition. A socio-ecological tax reform could help in this respect: partially shifting the tax burden from labour to environmental “bads” could encourage employment (Section 2).

The growth of green sectors is projected to continue on a global scale in the long term, and Austria is poised to benefit from it. However, unstable economic conditions, the phasing out of stimulus packages and implementation of austerity measures in EU countries may hamper prospects in the short term (Köppl et al., 2013). In addition, competition in international markets, especially from emerging economies, has been intensifying. Austria's capacity to maintain and further develop its competitive position thus will critically depend on technological progress and productivity gains. These would require a strengthened policy framework for promoting eco-innovation (Section 7) and continuous efforts to facilitate access to foreign markets, on the model of the export initiative.

8. Mainstreaming the environment in development co-operation

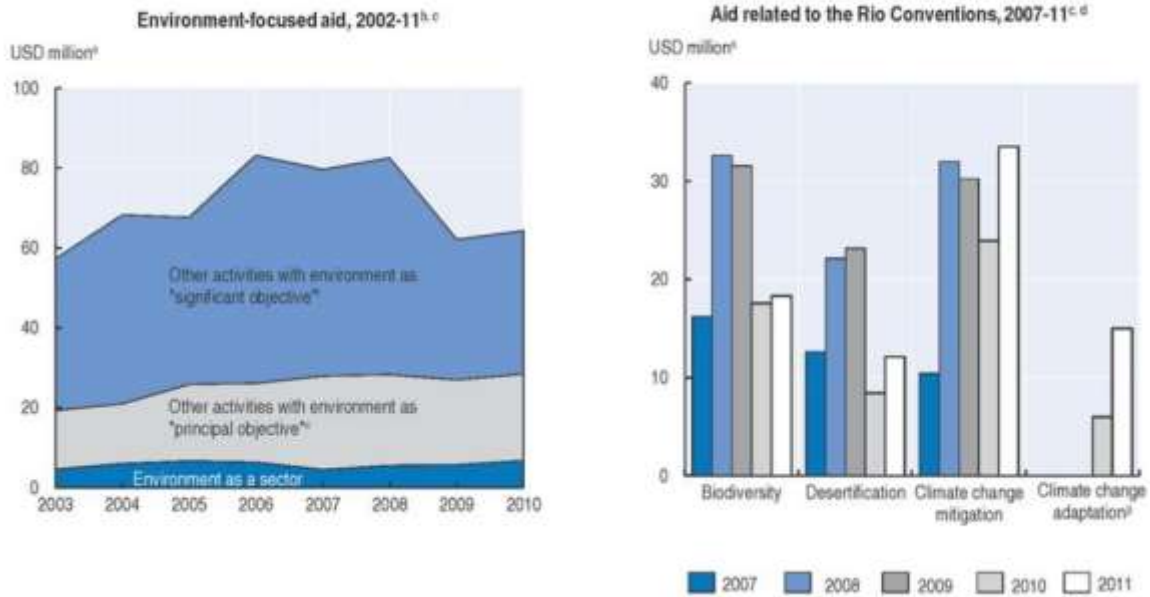
Planning and co-ordination of development co-operation policy are the responsibility of the Federal Ministry for European and International Affairs (BMEIA). The Austrian Development Agency (ADA) is responsible for implementing bilateral programmes and projects in partner countries, and manages a small part of the national official development assistance (ODA) flows. There is no consolidated ODA budget, and at least eight federal ministries and the *Länder* fund aid-related activities from their budgets. This makes the aid system fragmented and could undermine policy coherence (OECD, 2010).

As a small country, Austria accounts for relatively little of worldwide ODA. Its efforts focus on non-EU central and eastern European countries, partly for historical and proximity reasons, and least developed countries in sub-Saharan Africa. Austria's net ODA grew by nearly 70% in real terms between 2001 and 2007, but has since dropped significantly. In 2012, its net ODA was USD 1.11 billion, only slightly above the 2001 level. This is equivalent to 0.28% of gross national income (GNI), well below the EU intermediate target of 0.51% for 2010. Austria has reaffirmed its commitment to reach the international target of 0.7% ODA/GNI. However, it recognises that it will not be able to do so by the deadline of 2015 (set at EU level), due to domestic budget cuts that will run until 2014 (OECD, 2012e).

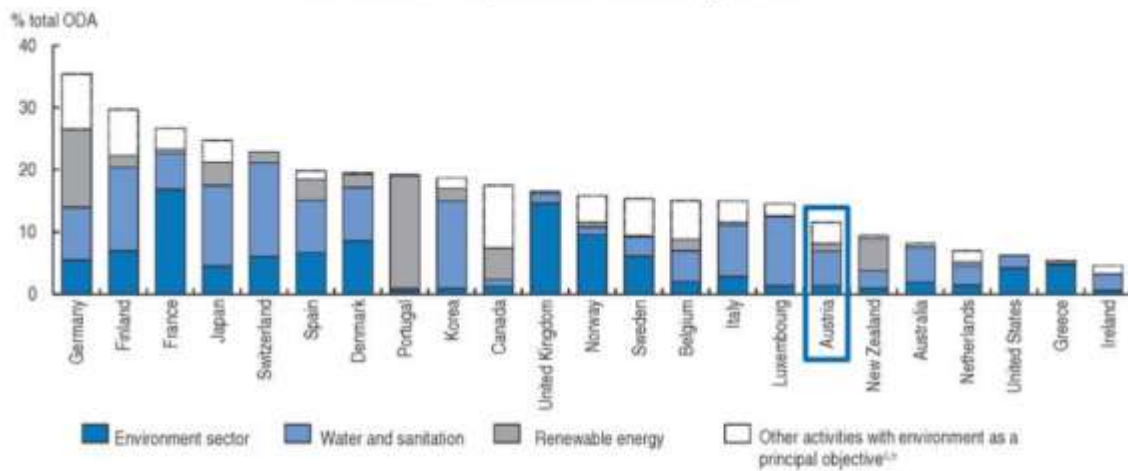
Austria has been increasingly committed to mainstreaming environment and climate in development co-operation. The 2003 Federal Development Co-operation Act indicates that "preserving the environment and protecting natural resources to ensure sustainable development" forms one of three key objectives of development co-operation (the others being reducing poverty and ensuring peace and security). In the context of declining ODA flows, bilateral aid for programmes in the environmental sector and/or with the environment as a core objective grew by 47% in real terms between 2002-04 and 2009-11

(annual average). Bilateral aid for activities with the environment as a significant, but secondary, objective followed the same trend as general ODA and declined markedly in the late 2000s (Figure 3.9).

Figure 3.9. **Bilateral aid in support of the environment**



ODA for environment, water and renewable energy,^h 2010-11



- a) Commitments of bilateral ODA expressed at 2011 prices and exchange rates.
b) The coverage ratio for activities screened against the environment policy marker is nearly 100% of total sector-allocable aid.
c) The marker data do not allow exact quantification of amounts allocated or spent in support of the environment. They give an indication of such aid flows and describe the extent to which donors address these objectives in their aid programmes.
d) Most activities targeting the objectives of the Rio Conventions fall under the definition of 'environment-focused aid' but there is no exact match of the respective coverage. An activity can target the objectives of more than one of the conventions, thus respective ODA flows should not be added.
e) Activities where environment is an explicit objective of the activity and fundamental in its design.
f) Activities where environment is an important, but secondary, objective of the activity.
g) Climate change adaptation markers exist only since 2010.
h) Commitments of bilateral ODA expressed as percentage of total sector-allocable ODA.
Source: OECD (2013). *OECD International Development Statistics* (database); OECD calculations.

StatLink <http://dx.doi.org/10.1787/888932895235>

Overall, in 2010-11, bilateral aid for environment-related programmes (i.e. for the environment as a sector, renewables, water and sanitation, and activities with fundamental environmental objectives) was equivalent to 11.5% of total sector-allocable ODA. This is low compared to many other members of the OECD Development Assistance Committee (Figure 3.9). Water and sanitation accounted for nearly 48% of environment-related aid, followed by other activities with environment as a principal objective (29%). Austria's commitments to the objectives of the Rio Conventions on climate change, desertification and biodiversity increased in 2008, then declined sharply. Only in 2011 did aid related to the conventions pick up again, especially in the areas of climate change and desertification (Figure 3.9). While climate change mitigation dominates, Austria bilateral aid has been increasingly focused on adaptation, which partly reflects increased political emphasis on this issue at home (Chapter 5).

In 2009, the BMEIA and the BMLFUW, in consultation with NGOs, approved the Strategic Guidelines on Environment and Development in Austrian Development Policy, which provide the reference framework for mainstreaming environmental objectives in development co-operation activity at federal level. The guidelines, which had been long overdue, are a step towards improving coherence among the development agendas of the various ministries. They include an analysis of environment-related challenges, set operating principles, outline a common implementation strategy and summarise planned activities of all involved ministries by means of an "implementation matrix". The

guidelines identify four priority areas: achieving sustainable natural resource management, combating desertification and preserving biodiversity (e.g. promotion of organic farming and sustainable forest management); climate change (e.g. energy efficiency and renewables, adaptation); water and sanitation; and environmentally sound chemicals and waste management. However, staff and expertise for dealing with environment- and climate-related issues remain limited in Austria's development co-operation system, including in the BMEIA and ADA. Thus, setting fewer priorities could increase aid effectiveness, as the OECD (2010) recommended. It would be preferable for development co-operation priorities to match Austria's comparative advantage (e.g. adaptation, organic farming and renewables) and partner countries' needs.

As a cross-cutting theme, environment is treated as an integral component of development activities rather than in stand-alone programmes. Project screening is the main tool to ensure mainstreaming. All applicants for ADA funding (including NGOs and partner governments) must answer a set of environment-related questions. ADA then assesses environmental threats and opportunities of project proposals, as well as their relevance to the Rio Conventions. Environmental impact assessment is undertaken if ADA deems it necessary, which has been rare. Strategic environmental assessment has not been consistently undertaken for development policies and country programmes, and its use could be helpfully extended (OECD, 2010). A strategic evaluation of Austria's development co-operation in the environment and energy sectors is planned in 2014.