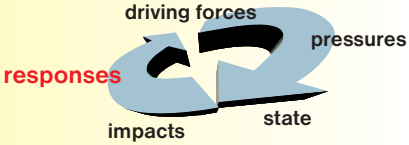
Instruments of environmental policy

Instruments of environmental policies are related to methods, environmental legislation and administrative procedures developed with a view to reduce negative impacts on the environment created by human activity. The aim of developing such mechanisms is the establishment of a decision-making system that will contribute to more reasonable and balanced decisions. The instruments of environmental protection policy are divided into environmental protection, information and legal instruments. The synergy of all these instruments reflects society's reactions and dictates the steps that are to be made in order to ensure balanced development of the society as a whole. Their integration into sectoral policies is necessary in order to assure the integrated pollution prevention.

The instruments of environmental protection policy indicated further in this chapter deal with the economic aspect of environmental policy (environmental protection taxes and other environmental pressure charges), information parameters of environmental policy (reporting of environmental data), as well as the case of introducing an environmental management system which meets the requirements of ISO 14001 certification and the EMAS scheme (Eco-Management and Audit Scheme).

49. ENVIRONMENTAL PROTECTION TAXES AND OTHER ENVIRONMENTAL PRESSURE DUTIES



This indicator shows financial effects and the amounts of environmental protection taxes and other duties for environmental pressures as well as use of natural resources in the Republic of Slovenia by individual year. Environmental protection taxes and other environmental pressure duties are economic instruments of environmental protection policy, the basic aim of which is to encourage reduction of environmental pressures by implementing a "polluter pays" principle. In accordance with the latter aim, expenses arising from damages caused to the environment are at least partially included in the production expenses. Regulatory decrees determine the methods of calculating the environmental pressure caused, expressed in so-called environmental load units (ELU) per individual polluter as well as the amount of tax and contribution, respectively, per individual environmental load unit (ELU). The main share of taxes and contributions is used directly for the purpose of environmental protection investments with the remaining share representing budgetary revenue.

GOAL

The National Environmental Action Programme recognises the following as priority targets with regard to the economic aspects of the environment: encouragement of an increase in economic resources for investments in environmental protection projects as well as increases in budget expenditure which would indirectly entail reduction in pollution; speeding up introduction of tax relief for investments in environmental protection projects; and introduction of a deposit and refund system in relation to the system of taxation.

Figure 49-1: Financial effects of environmental pressure duties

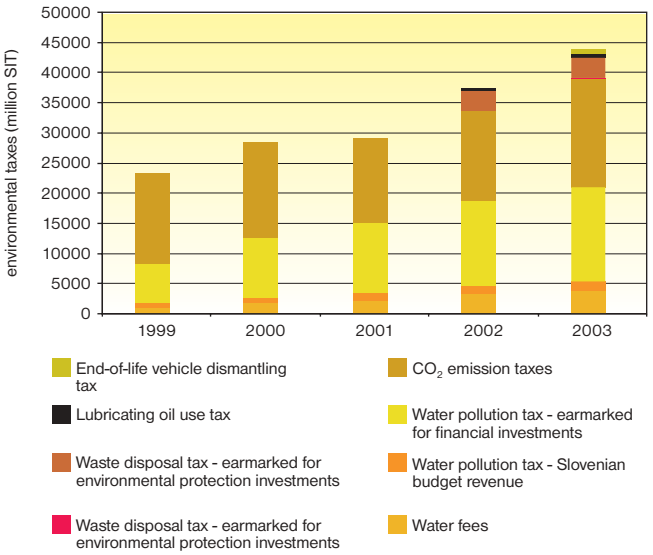


Figure 49-2: Share of environmental pressure duties in Slovenian GDP

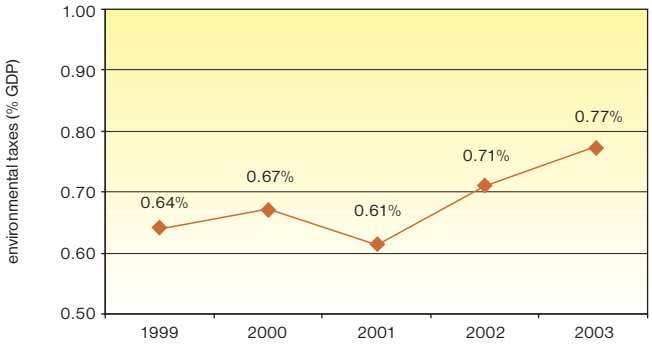


Table 49-3: Environmental taxes and duties in the European States

	Use of Natural Resources				Waste			Emissions		Selected Products					Other	
	Mining, minerals, gravel, sand	Groundwater and surface water	Hunting and fisheries	Use of forests, clearings	Disposal	Incineration	Hazardous waste	Air emissions	Water emissions	Chemical substances	Packaging	Batteries	Pesticides	Plastic bags	Noise	Land use changes
Austria				x	x				x		x	x				
Belgium	x	x							x		x	x	x			
Bulgaria	x		x	x				x	x							
Czech Republic	x	x					x	x	x	x					x	x
Denmark	x		x		x	x			x	x	x	x	x	x		
Estonia	x	x	x		x			x	x		x					
Finland	x		x		x				x		x		x			
France	x							x	x							
Germany		x					x		x							
Greece		x	x						x							
Hungary	x	x	x	x			x	x	x		x	x			x	
Ireland									x					x		
Italy					x			x	x					x	x	
Latvia	x	x		x	x			x	x	x	x	x				
Lithuania	x	x	x	x				x	x							
Netherlands		x	x		x				x						x	
Norway					x	x		x	x	x	x				x	
Poland	x	x	x	x			x	x	x	x	x					x
Portugal			x													
Romania		x						x	x							
Slovakia	x	x			x			x	x	x	x	x		x		x
Slovenia	x	x			x			x	x	x						x
Spain								x	x							
Sweden	x		x		x			x	x			x	x			
United Kingdom	x				x											

Source: Europe's Environment, The Third Assessment. European Environment Agency, 2003

Slovenia is made responsible for implementation of a "polluter pays" principle by the provisions of Article 174 of the EC Treaty and also within the Slovenian legal system, the provisions of the Environmental Protection Act (OJ RS, No 41/04). The introduction of this principle has given rise to a significant source of financing environmental protection policy measures. Positive experience gained in the area of waste water collection and treatment with the introduction of tax exemption for water pollution as an earmarked source of financing the construction of infrastructure facilities and equipment were also included in the legal basis for waste disposal and CO_2 emissions taxes. Waste disposal tax exemptions represent an earmarked source of financing the construction of suitable networks of facilities and equipment for waste management as well as an important mechanism for achieving the set and prescribed targets. The latter are principally as follows: reduction in the quantity of waste generated at source; disposal of smallest quantities of waste possible and disposal of the most inert waste possible; reduction in the share of biodegradable waste; accelerating separated collection of individual urban waste portions; and a gradual increase in the scope of waste treatment and utilisation. The CO_2 emissions tax instrument is one of the key instruments included in the programme to reduce greenhouse gas emissions for the achievement of the objectives in this area and the fulfilment of the obligations undertaken with the signing of the Kyoto Protocol, ratified by Slovenia in June 2002. With the enforcement of the Waters Act, funds arising from water fees accumulate in the Waters Fund and are intended for financing water infrastructure. A certain share of funds collected via the lubricating oil and fluid use tax is also earmarked for rehabilitation of unregulated waste landfills and old burdens, while a share of environmental pollution tax on the generation of end-of-life vehicles is earmarked for implementation of public economic service for end-of-life vehicles management.

The increase in the annual amount of environmental taxes is principally the result of an increase in the level of taxes per environmental load unit and unit of product, respectively, as well as greater coverage of polluters (introduction of stricter conditions and new contributions), rather than a rise in environmental pressures.

DATA AND SOURCES

Table 49-1: Financial effects of environmental pressure duties
Source: Balance Sheet of Expenditure and Revenue of the Slovenian National Budget, Ministry of Finance, General Customs Office; databases Water Fees, Taxes and Concessions; Sources of Pollution; and Waste Management, Ministry of the Environment, Spatial Planning and Energy – Environmental Agency of the Republic of Slovenia, 2004.

environmental taxes:	unit	1999	2000	2001	2002	2003
Water fees	million SIT	1 010	1 710	2 169	3 267	3 738
Water pollution tax – Slovenian budget revenue	million SIT	740	1 004	1 233	1 363	1 580
Water pollution tax – earmarked for financial investments	million SIT	6 556	9 974	11 715	14 115	15 608
CO_2 emission taxes	million SIT	15 055	15 684	13 998	15 000	17 985
Waste disposal tax – Slovenian budget revenue	million SIT	n/a	n/a	n/a	n/a	168
Waste disposal tax – earmarked for environmental protection investments	million SIT	n/a	n/a	n/a	3 156	3 314
Lubricating oil use tax	million SIT	n/a	n/a	n/a	494	619
End-of-life vehicle dismantling tax	million SIT	n/a	n/a	n/a	n/a	801
TOTAL	million SIT	23 361	28 372	29 115	37 396	43 813

Table 49-2: Share of environmental pressure duties in Slovenian GDP
Source: Balance Sheet of Expenditure and Revenue of the Slovenian National Budget, Ministry of Finance, General Customs Office; databases Water Fees, Taxes and Concessions, Sources of Pollution, and Waste Management, Ministry of the Environment, Spatial Planning and Energy – Environmental Agency of the Republic of Slovenia, 2004; Statistical Yearbook 2003, www.stat.si (March, 2004), Statistical Office of the Republic of Slovenia.

	unit	1999	2000	2001	2002	2003
GDP in current prices	million SIT	3 648 401	4 222 404	4 740 122	5 275 827	5 670 640
environmental taxes and duties	million SIT	23 361	28 372	29 115	37 396	43 813
Share of environmental pressure duties in GDP	%	0.64	0.67	0.61	0.71	0.77

Data for Slovenia

The Environmental Agency of the Republic of Slovenia, on the basis of reports from persons liable according to these decrees:

- Decree on the Water Pollution Tax (OJ RS, No 41/95, 44/95, 8/96, 124/00 and 49/01, 8/04),
- Decree on the Water Fee (OJ RS, No 41/95, 84/97, 124/00, 110/01, 103/02),
- Decree on the Carbon Dioxide Emission Tax (OJ RS, No 68/96, 2/97, 5/97 – corr., 24/98, 65/98, 51/99, 42/00 and 124/00), replaced by the Decree on the Carbon Dioxide Emissions Tax (OJ RS, Nos 91/02, 8/03, 67/03),
- Decree on the Waste Disposal Tax (OJ RS, No 70/01, 9/04) maintains databases (Water Fees, Taxes and Concessions; Sources of Pollution; Waste Management), which contain information on environmental taxes and other duties for environmental protection, as well as the amounts of tax and contribution exemptions due to investments in environmental protection. As the data for 2003 concerning the amount of funds earmarked for investments from waste water and waste disposal contributions for 2003 are still incomplete, this report provides an estimate of the amount of these funds in respect of prepayments paid (technological waste waters) and the level of increase in tax per load unit (for urban waste water and municipal waste).

Ministry of Finance, Macroeconomic Analysis and Government Accounts Department issues monthly reports on the realisation of the national budget for individual budget years within the framework of the balance sheet of the national budget expenditure and revenue. In accordance with the above mentioned decrees as well as the decrees listed below, these are the sources of information on the Slovenian national budget revenues.

- Decree on the Tax on the Use of Lubricating Oils and Fluids (OJ RS, No 2/02, 20/2002),
- Decree on the tax on the Generation of End-Of-Life Vehicles (OJ RS, No 13/03).

Data on GDP in current prices are as stated in the Statistical Yearbook 2003 (Statistical Office of the Republic of Slovenia); data for 2003 are as stated on www.stat.si - Indicators, GDP.

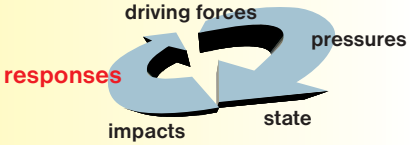
Earmarked use of funds for investments in relation to waste water and waste disposal taxes for 2003 is assessed on the basis of forecasts made by liable persons.

Data for other countries

Europe's Environment: The Third Assessment, 2003, European Environment Agency (EEA).

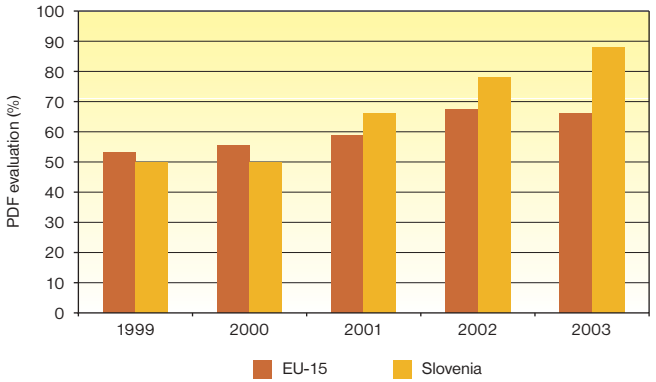
The table does not include contributions exclusively covering production or public service expenses (e.g. contributions for waste collection, water supply).

50. REPORTING OF ENVIRONMENTAL DATA



Reporting of environmental data is measured by and as the level of completeness of environmental data collected in compliance with the requirements stipulated by the European Environment Agency (EEA). This level is presented in an assessment established by the EEA in its annual Progress Report – Priority Data Flows in EIONET, hereinafter referred to as PDF, addressed to the Management Board of the EEA.

Figure 50-1: Reporting of environmental data – level of completeness of environmental data collected in compliance with the requirements stipulated by the European Environment Agency (EEA)



GOAL

The obligation to report to the European Environment Agency by the Republic of Slovenia arises from Article 8 of the Agreement between the European Community and the Republic of Slovenia concerning the Participation of the Republic of Slovenia in the European Environment Agency and the European Environment Information and Observation Network, signed and ratified by the Slovenian Parliament (OJ RS – MP No 18/01) which determines that the Republic of Slovenia should provide data according to the obligations and practices established in the Agency's work.

So far, we have communicated to the EEA reports on the state of water, air quality and air emissions, protected areas, state of soil, implementation of the CORINE Land Cover project, etc. The preparation and communication of reports is implemented through the EIONET Network in Slovenia.

The compliance of Slovenia's reporting with the requirements defined by the EEA has been subject to assessment since 2000. In this period Slovenia has, as the majority of other EEA Member States, in particular EU accession countries, shown significant progress. Pursuant to the PDF criteria, Slovenian reports have achieved 88 % conformity with the EEA's reporting requirements, placing Slovenia in 4th place among 31 assessed countries.

DATA AND SOURCES

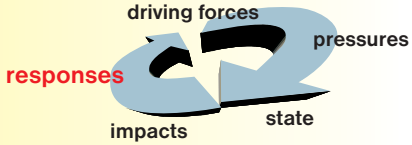
Table 50-1: Reporting of environmental data – level of completeness of environmental data collected in compliance with the requirements stipulated by the European Environment Agency (EEA)
Source: Progress Report – Priority Data Flows in EIONET, European Environment Agency, 2000, 2001, 2002, 2003

	unit	1999	2000	2001	2002	2003
EU-15	%	53	55	59	67	66
Slovenia	%	50	50	66	78	88

PDF is a set of six to nine reports provided by the EEA, in due content and form, that EEA Member States are obliged to communicate to the EEA within a specified time limit in order for the latter to be able to use them in the preparation of its own reports. For the purposes of preparing annual progress reports, the EEA assesses each report (reporting) by using so-called "smileys", i.e. points – 1, 2 or 3. The sum of gathered points representing a share of all possible points that can be acquired by each assessed state constitutes an overall assessment of the level of completeness of environmental data collected in each state in accordance with the requirements stipulated by the EEA. The rating criteria are determined in advance and for each separate report, and relate in particular to the length and completeness of the time series of the data required and communicated, communication of the data in due time and form, etc. The quality of data communicated prior to 2004 has not been subject to assessment.

This indicator is also included in the compilation of indicators used for measuring the development of information society in accordance with the eEurope+ Action plan.

51. COMPANIES AWARDED ENVIRONMENTAL CERTIFICATES



Standardisation is an important economic instrument for environmental communication and reporting the environmental information. It represents legally non-binding norms obliging members of standardisation organisations at both national and international levels. One such standard that is being particularly implemented in Slovenia is ISO 14001. Following the establishment of the European Community (1957), the development of environmental legislation became more systematic. Currently, environmental management in the European Union is directly affected by environmental management systems which include the Eco-Management and Audit Scheme (hereinafter the EMAS scheme), put into EU legislation through the Eco-Management and Audit Scheme Regulation No 1836/93. The system of awarding certificates pursuant to the EMAS scheme has been possible in Slovenia since 1 May 2004, i.e. from the day of Slovenia's accession.

Both the EMAS scheme and ISO 14001 give priority to the introduction of an efficient environmental management system. One crucial difference between them is that ISO 14001 is introduced on a voluntary basis and may be used not only by profit but also by non-profit organisations, whereas the EMAS scheme pursues, in particular, the achievement of specific requirements dictated by the public sector, the general public as well as consumers in the EU Member States. However, owing to the similarity between the ISO 14001 and EMAS scheme requirements the European Commission adopted a decision in 1997 defining common elements of both systems and proposing a gradual transition from certification under ISO 14001 to certification under the EMAS scheme.

GOAL

The introduction of environmental management systems aims at a developmentally balanced production and consumption. That includes promoting production of environmentally friendly products, encouraging sounder environmental management of companies, as well as informing the public about the effects that technological processes have on the environment.

Figure 51-1: Number of Slovenian companies awarded ISO 14001 certificate

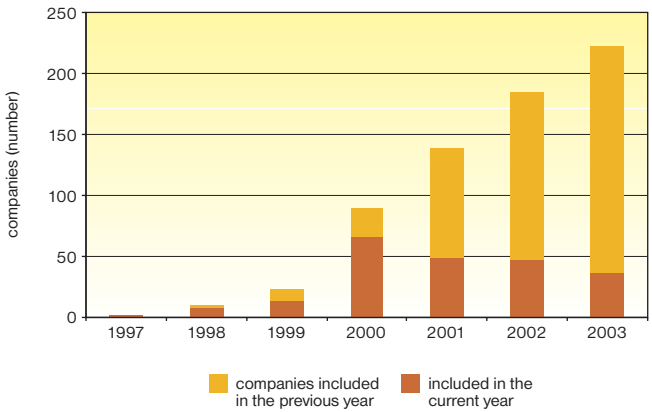
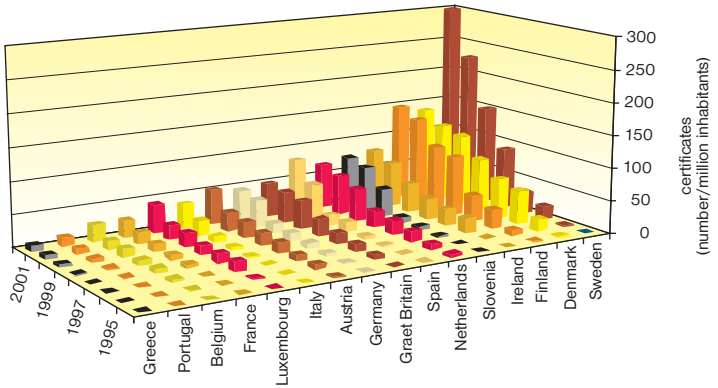


Figure51-2: Comparison of Slovenia with EU-15 Member States in the area of certification under ISO 14001



Certification pursuant to ISO 14001 constitutes a commitment of companies that are members of the International Organisation for Standardisation (ISO). Although the EMAS scheme has still not been defined in Slovenian legislation to date, it represents a basic principle and a strategic guideline of the National Environmental Action Programme in the field of sustainable production and consumption, and shall be the object of the new Environment Protection Act.

On the EU level, the EMAS scheme is subject to Council Regulation (EEC) No 1836/93 Allowing Voluntary Participation by Companies in the Industrial Sector in a Community Eco-Management and Audit Scheme (OJ L 168, 10.7.93). The Regulation is accompanied by relevant secondary legislative Acts, such as Council Regulation (EEC) No 3037/90 on the statistical classification of economic activities in the European Community and relevant standards such as ISO 100011, ISO 14001 and EN 45012.

From 1997 to the end of 2003, the ISO 14001 certificate was awarded to 222 Slovenian companies, indicating a growing awareness in the field of environmental protection. The latter is also partially due to the increasing interest in acquisition of the ISO 9000 certificate. During the last six years the majority of ISO 14001 certificates were awarded in the area of manufacturing industries comprising chemical industry, metal-working industry, as well as the electrical engineering industry. According to the data collected by the Chamber of Commerce and Industry of Slovenia (as on 6 February 2004) the greatest number of certificates since 1997 have been granted by the certification authority BVQI (Bureau Veritas, 99) and the lowest by TUV Bayern Sava (58). To date, the EMAS scheme has not yet been translated into practice since the certification system is still in its establishment phase. Preparations however, are currently under way for the establishment of an accreditation body that will verify the ability of organisations for the purposes of acquiring a certificate pursuant to the EMAS scheme.

In the field of certification pursuant to ISO 14001, the situation of Slovenia, as compared to EU-15, is favourable. According to the data by the International Organisation for Standardisation (ISO), Slovenia ranked fifth in 2002 by number of certificates awarded per million inhabitants.

DATA AND SOURCES

Table 51-1: Number of Slovenian companies awarded ISO 14001 certificate
Source: Chamber of Commerce and Industry of Slovenia, Environmental Protection Department, 2004

	UNIT	1997	1998	1999	2000	2001	2002	2003
number of all companies	number	2	10	23	89	138	185	222
number of companies included in the current year	number	2	8	13	66	49	47	37

Table 51-2: Comparison of Slovenia with EU-15 Member States in the area of certification under ISO 14001
Source: Chamber of Commerce and Industry of Slovenia, 2004

year		1995	1996	1997	1998	1999	2000	2001	2002
Sweden	number/million inhabitants	0.22	2.75	21.32	33.41	93.52	150.55	227.47	300.00
Finland	number/million inhabitants	1.96	8.04	29.61	40.39	92.16	99.61	134.71	147.06
Denmark	number/million inhabitants	4.04	18.46	51.92	60.38	82.69	111.54	119.23	136.73
Spain	number/million inhabitants	n/a	0.33	2.36	4.21	14.69	15.38	52.92	82.77
Ireland	number/million inhabitants	0.83	2.22	22.78	26.67	31.94	45.28	68.61	80.28
Slovenia	number/million inhabitants	n/a	n/a	2.50	6.00	9.50	44.00	68.00	74.50
Netherlands	number/million inhabitants	4.74	7.63	16.86	21.86	25.83	50.26	60.38	68.78
Hungary	number/million inhabitants	n/a	0.29	1.18	2.75	11.86	16.08	33.33	62.75
Austria	number/million inhabitants	1.38	7.00	10.00	16.5	19.5	25.38	27.88	53.63
Great Britain	number/million inhabitants	1.06	5.59	11.18	15.99	25.9	43.99	47.26	50.64
Germany	number/million inhabitants	0.43	2.04	4.33	8.01	11.83	15.5	41.57	45.51
Luxemburg	number/million inhabitants	n/a	2.50	15.00	15.00	15.00	22.50	22.50	42.50
Italy	number/million inhabitants	n/a	0.48	1.81	2.17	4.28	9.17	22.80	37.90
Czech	number/million inhabitants	n/a	n/a	0.39	4.08	5.83	11.26	16.89	30.87
Belgium	number/million inhabitants	n/a	0.80	3.70	7.30	7.40	13.00	13.00	26.4
France	number/million inhabitants	0.05	0.39	0.89	5.03	7.88	12.12	18.63	25.03
Portugal	number/million inhabitants	n/a	0.10	0.71	1.52	2.83	4.75	8.89	13.84
Republic Slovakia	number/million inhabitants	n/a	0.19	1.13	2.83	4.53	6.79	13.77	13.21
Poland	number/million inhabitants	n/a	n/a	0.21	0.39	1.97	1.71	7.62	11.24
Greece	number/million inhabitants	n/a	0.10	0.57	0.95	1.9	4.00	6.29	8.48

Data for Slovenia

The data for Slovenia have been taken from the e-catalogue "Companies Awarded Environment Certificates" managed by the Environmental Protection Section within the Chamber of Commerce and Industry of Slovenia. The data on the number of certificates ISO 14001 relate to certificate recipients, i.e. companies having been awarded the certificate concerned. The data for the e-catalogue are communicated to the Chamber of Commerce and Industry of Slovenia by Slovenian certification bodies SIQ, BVQI and Bayern Sava. As a rule the database is updated each quarter. The database does not include all data on ISO 14001 certificates awarded as so far, foreign certification bodies have not communicated them regularly to the Chamber of Commerce and Industry of Slovenia.

Data for other countries

The data for EU-15 were provided by the Chamber of Commerce and Industry of Slovenia. The data has been taken from the report prepared by the International Organisation for Standardisation (ISO). According to the ISO methodology, the report contains a list of certificate recipients for which the ISO has aggregated the data on the basis of reports from international certification bodies. Since the confidence levels of the data provided by the ISO and those provided by the Chamber of Commerce and Industry of Slovenia differ and the data are drawn from various sources, there are partial inconsistencies among the data in respect of the total number of ISO 14001 certificates awarded to Slovenian companies.