

Country Brief: Slovenia

8 / 2005

The context for supply and demand of public online services in Slovenia

Slovenia has a single-level system of local self-government. The municipalities, of which there are 193, are responsible only for local tasks. As a result of the appointment of a new government, responsibility for eGovernment has been transferred from the former Ministry of Information Society to a new Ministry of Public Administration. The new ministry also receives responsibility for overseeing the Government Centre for Informatics, which is in charge of infrastructure development at the operational level, and to support, control and coordinate departmental ICT projects.

Slovenia was the only one of the former Yugoslav republics to be in the first wave of candidates for membership of the European Union. It joined in May 2004. The country's population is two million.

Slovenia has always been the most prosperous region of the former Yugoslavia and has found the transition from a socialist economy to the capitalist free market easier than most. GDP per head is already at 79% of the EU25 level – substantially higher than that of the other transitioning economies of Central Europe. The economy has been growing steadily in recent years. Inequality remains quite low. In mid-2004 Slovenia agreed to adopt the Euro by 2007 and, therefore, must keep its debt levels, budget deficits, interest rates, and inflation levels within the EU's Maastricht criteria.

Key figures about Slovenia¹

	Slovenia	Ø EU15	Ø EU25
Old age dependency ratio	21.4	25.5	24.5
Population density	98.3	119.8	116.3
GDP per head	79.1	108.6	100
Growth 5 year average	3.28%	1.85%	1.92%
Unemployment rate	6.0%	8.1%	9.0%
Inequality index	22	30	29

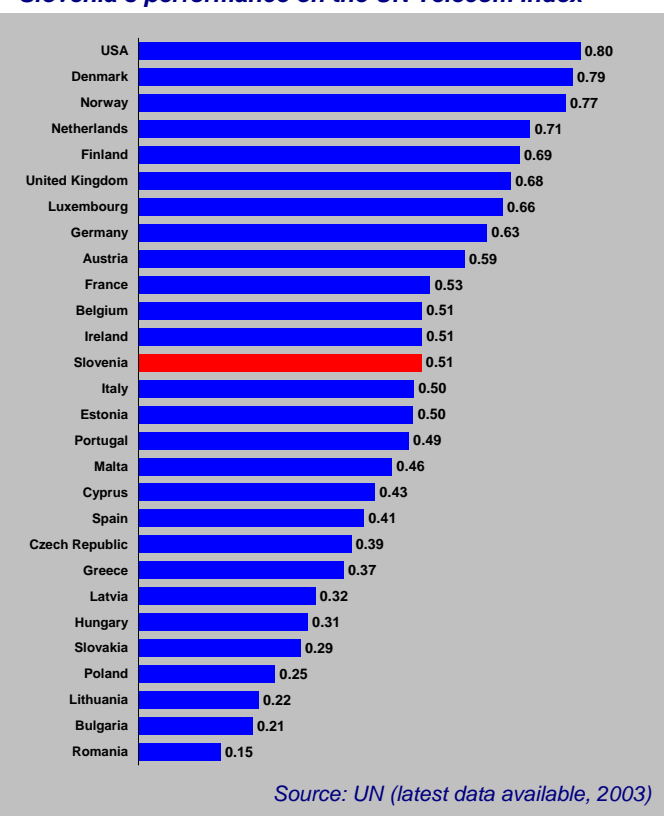
Together with Estonia, Slovenia has one of the most advanced positions among the New Member States with regard to development of the Information Society. Rates of Internet access and usage are already ahead of the EU15 average. Broadband is lagging behind, but catching up fast. ICT expenditure is 4.0% per year, which should guarantee that the ICT infrastructure will be brought up to or maintained at a high level in the years to come.

Information Society indicators²

	Slovenia	Ø EU15	Ø EU25
Households with Internet access	47%	45%	42%
Broadband penetration	3.8%	7.6%	6.5%
ICT expenditure as percentage of GDP	4.0%	3.2%	2.6%
Digital Divide Index	44.8	53.0	50.1

For take-up of online public services, the ability of citizens to have access to services and information electronically is crucial. In the first quarter of 2004, around 47% of households had access to the Internet, according to the Statistical Office of the Republic of Slovenia. This share is expected to grow in the coming years, thereby widening the potential reach of public online services.

Slovenia's performance on the UN Telecom Index³



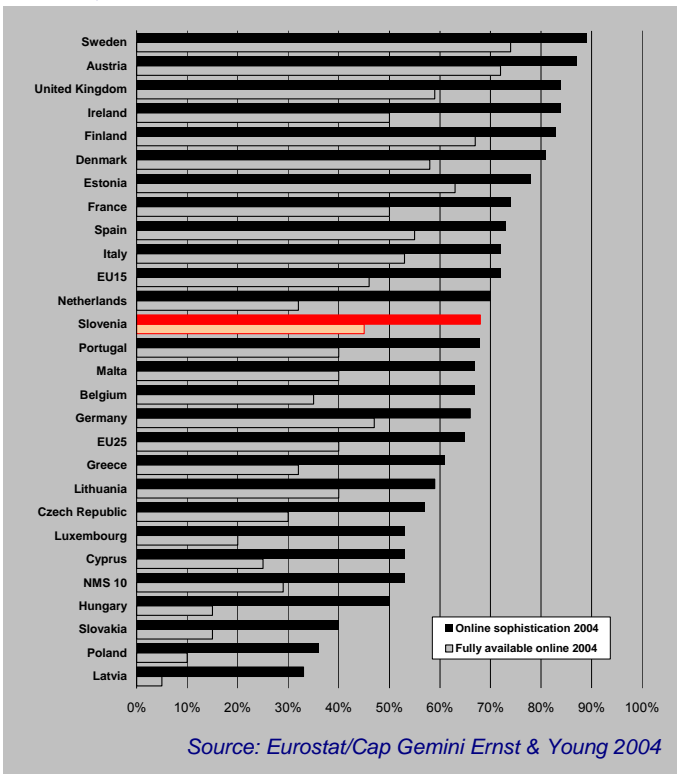
Slovenia embarked relatively early on its path to the adoption of ICTs. This is related to the population's high level of interest in innovative technology. Uptake of ICTs has also been driven by the actions of the government such as the computer literacy education programme, the implementation of a network of Public Internet Access Points and the eSchools project. According to data collected by the project Research on Internet (RIS) in 2002, Slovenian Internet users tend to be satisfied with the role of the state in fostering Internet-related development.

Attitude to the Ministry of Information Society has also been positive. It, however, was abolished in November 2004, and its former competences distributed across a number of different Ministries: the Ministry of the Economy, Ministry of Public Administration and Ministry of Higher Education Science and Sport.

eGovernment in Slovenia

Supply of eGovernment services in EU Member States is measured annually as part of the eEurope benchmarking exercise. The data from the latest round of measurement (end 2004) indicates that Slovenia is at the same level of progress than the average of the old Member States (EU15), reaching a score on the online sophistication index of nearly 70%, and on the full online availability index of close to 45%. According to this measure, Slovenia is second only to Estonia among the new Member States. eServices are in place for tax submission and notification, searching for a job, personal documents, car registration, notifying the police, public libraries, documents (birth certificate, marriage certificate), high school and University enrolment and providing health-related administrative information.

Supply of eGovernment services in Slovenia⁴



Other data, collected by the project Research on Internet (RIS), suggests that interest in public online services in the Slovenian population is very high. Slovenia is the country with the highest gap between interest and actual usage of these services. However, wherever public online services are actually available, uptake also tends to be strong. Approximately 23% of regular Internet users communicate online with the government, mostly to download official forms. However, only half of them return the forms using the Internet. Clearly, effort is still required to ensure full use of two-way transaction capabilities.

Moreover, although users tend to be satisfied with the national eGovernment portal in general, they would like to obtain more information and see more new topics and content on the portal.

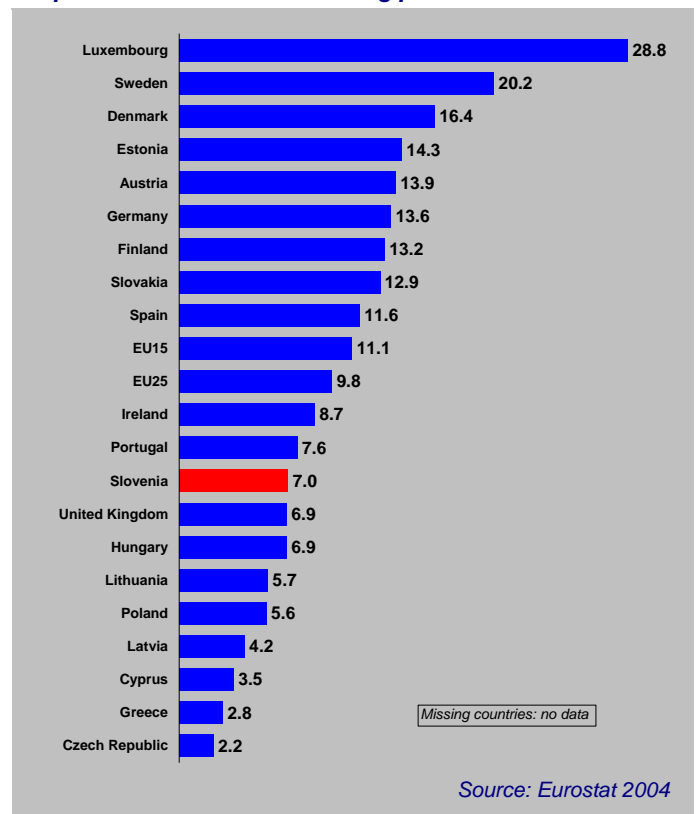
Government activities for eGovernment and modernisation of the public administration in Slovenia are laid out in a number of core strategic documents, including

the Strategy for eCommerce in Public Administration for the Period 2001-2004 (2001), the Strategy for the Republic of Slovenia in the Information Society (2003), the eGovernment Action Plan (2003) and the Strategy for Electronic Commerce in Local Communities (2003).

Core objectives formulated are (a) provision of high quality online services (and related infrastructure) that are oriented to the daily needs of all citizens, including members of ethnic minorities living in the country; (b) full compliance with EU standards and learning from best practice abroad; (c) improving communication between public sector and citizens in order to allow citizens to participate and improve their sense of identification with decisions adopted by the public administration; (d) step-by-step removal of existing barriers to the supply and take-up of eGovernment; (e) continuous monitoring of progress based on European and global comparable indicators; (f) improvements of back-office processes via applications of ICTs in order to increase speed and efficiency also of services provided traditional communication channels.

Until the adoption of the policy strategy on eGovernment, transaction between legal and natural subjects (parties) on the one hand and the state on the other hand was primarily through physical channels. Studies that were carried out in the context of the development of eGovernment policy in Slovenia, which served as a foundation for the Government centre for Informatics, showed that the state could save up to 70% of costs by introducing electronic services. Establishment of the Slovenian Ministry of Information Society in 2001 brought an important impetus for development of eGovernment services.

Uptake of eGovernment among private households⁵



The legal framework for development of eGovernment in the country comprises mainly the Personal Data

Protection Act (1999), the Act on Access to Information of Public Interest (2003); the Electronic Commerce and Electronic Signature Act (2000; amendment 2004); the Electronic Communications Act (2003) and the Act on Conditional Access to Protected Electronic Services (2004).

Slovenia has made good progress in establishing and promoting digital identification. The digital certificate authorities SIGOV-CA and SIGEN-CA, set up for the purpose, issue two types of digital signature: personal and digital web certificates. According to the results of different studies conducted by RIS, Slovenian Internet users are less concerned with online security than users in other EU countries, although they are faced with similar difficulties (viruses, spam, credit card misuse). Trust in the security of the systems is relatively high, which is also reflected in a high number of persons (ca. 125,000) using digital certificates for accessing eGovernment services.

According to the results of RIS research, conducted in 2003, the most often mentioned reason for non-usage of eGovernment services is (perceived) lack of e-content and e-services in Slovenian language that would be attractive to the various types of users. In Slovenia, the Internet is used more often for general purposes (e.g. search for information, education) than in other EU countries, while it is less often used for advanced applications such as fully online transactions.

User Orientation in eGovernment

User orientation is an essential part of the country's strategy for eGovernment and modernisation of public administration.

The Strategy for the Republic of Slovenia in the Information Society (2003) has a focus on provision of high quality public online services and related infrastructure, oriented at the the daily needs of all citizens including ethnic minorities (mainly Hungarian and Italian). While the strategy has partly been realised already, experts agree that more needs to be done with regard to accessibility of services for persons with special needs, and to provision of services in the languages of minorities.

Turning the Government's strategy for electronic business in public administration for the period from 2001 to 2004 into practice means that administrative processes have become simpler for the Slovenian public, mainly by better integration and networking of public administration back offices. Again, the strategy has largely been realised and citizens can benefit from added value through electronic service provision.

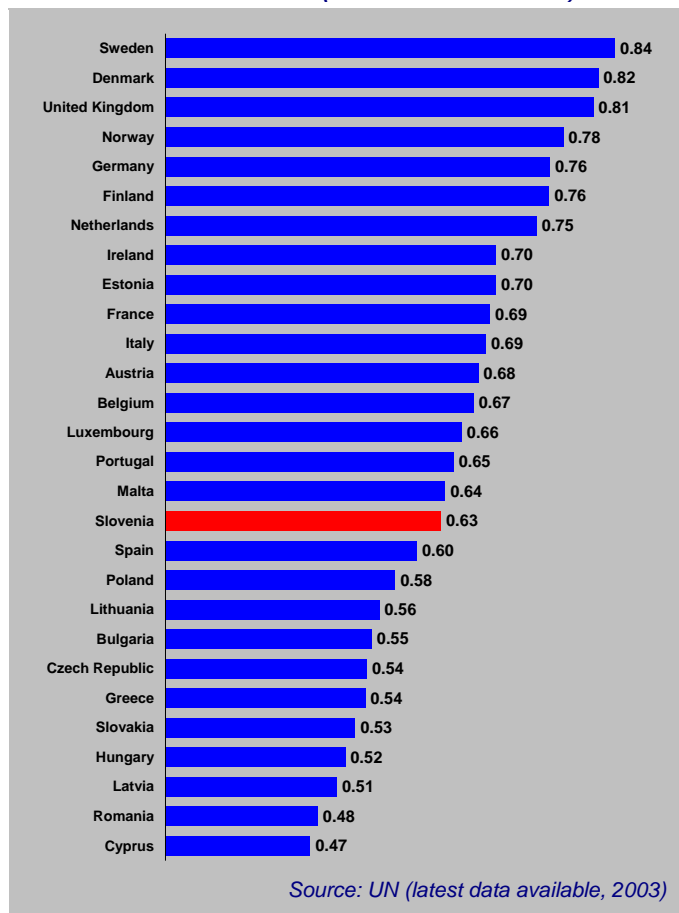
According to the Action Plan eGovernment up to 2004 eService development should be guided by the principle "one-time notification", which means that citizens have to notify public administration only once of changes to personal status (e.g. address change). By integrating records in data bases and administrative registers, all relevant agencies will receive such information automatically. This reduces the burden to citizens of having to provide data to state agencies, and can also reduce the number of mistakes significantly.

In the future, all eGovernment services will be available to users according to the system "one stop shop", for which the official eGovernment portal will be further developed. For those using the Internet at home, the home computer will be the interface to government services. For

people without home Internet access, e-kiosks and other public Internet access points will be made available. The concepts takes account of the fact that not all citizens will be able or willing to carry out their administrative business by themselves. For those who need help, assistance by a qualified public employee is foreseen.

Progress in this respect has been impressive. The Ministry of Information Society together with the Ministry of Culture has already launched a network of multimedia centres and e-library access points. In addition, measures to enable citizens to use the Internet in public spaces have been taken – for example a network of Cyber Cafés and the eSchools project.

eGovernment Readiness (United Nations Index)⁶



In spite of these positive developments, it must not be forgotten that Slovenia is affected by a strong digital divide according to education and age. The non-educated segments show a particularly low interest in PC and Internet usage. The low share of the population with a tertiary education must be seen as a key barrier to higher usage of eGovernment services in Slovenia. More effort will be needed to meet the requirements and preferences of this group of citizens in relation to public service provision.

In the spotlight: www.policija.si

Online Declaration to the Police is a new eService for the citizens in Slovenia, developed by the Government Centre for Informatics, the Police and the Ministry of the Interior. Since 7 June 2004, the service is operational and can be used to declare criminal acts to the police. The objective behind the implementation was the establishment of a system that provides citizens with the possibility to submit a declaration to the police electronically through the Internet in order to increase the efficiency of the process and open up a new channel for communication between police and citizens.

The eGovernment state portal of the Republic of Slovenia (at <http://eup.gov.si>) includes an application that supports full electronic handling of forms registered in the centrally maintained registry of procedures. Online declaration to the police is available to users with qualified digital certificates valid in the country. The individual user is asked to fill in a blank form, sign it electronically and submit it through the Internet to the Police Directorate Operation And Communication Centre. The public servants in the operation and communication centre check the declaration and initiate the appropriate further steps of the process.

Of course, the traditional service via the telephone or face-to-face interaction are maintained.

In order to increase awareness of the online service, the police and the Government Centre for Informatics organised press conferences in which they presented the service to the population. In addition, advertisements in the mass media were used (radio, TV, newspapers).

The service demands authentication, which means that only users with valid certificates have access to the content of that website. It is free of charge and thus affordable for everybody. The service can be easily located through the official government portal.

It is only available in Slovenian language. People with disabilities or national minorities have not been considered yet. Information about the service is available for blind and visually impaired users, although the application seems hardly of much value to this target group when compared to the telephone.

Much emphasis is put on protecting data security and data privacy of users. User registration, however, is required.

The service appears to be simple to use and well structured. It demands only an appropriate minimum of information from users.

<http://www.policija.si/>

<http://e-uprava.gov.si/>

eHealth in Slovenia

The amount of **health-related information** on the Slovenian language part of the Internet is extensive. There appears to be, however, a lack of online health information of proven quality and reliability.

Key figures about the Slovenian Health System⁷

	Slovenia	Ø EU15	Ø EU25
Percentage satisfied with own health	79.5%	82.5%	79.8%
Prevalence of long-term illness	26.8%	13.8%	20.0%
Doctors per 100.000 inhabitants	228	233	251
Health expenditure as percentage of GDP	7.8%	7.4%	7.3%

Official supply from state sources of such information is the least developed among all online public services. The majority of online health services are provided by the private-commercial sector. Examples include Med.over.net, the most extensive health related web portal in Slovenian language. The portal is intended for the general public, allowing access to information in a straightforward, simple way. The portal offers facilities that help users find what they are looking for easily, such as a search facility, links to other relevant sites and reference materials. Content provided covers all main health-related areas: healthy living, healthy diet, health hazards, general and specialized information on diseases and medical treatment, and first aid.

Ordinacija.net is eHealth portal which enjoys the support of the Slovenian Ministry of Health. The portal is intended for the general public, allowing access to information in the form of a guide. Apart from offering own content health advice, the website is meant as a help for finding healthcare services provided by organisations across Slovenia. The information is offered in several languages: Slovenian, German, English, Croatian, Italian, Spanish, Serbian and French. The portal provides effective tools that help users locate the information they are interested in. The site stresses that users' security and privacy are being protected.

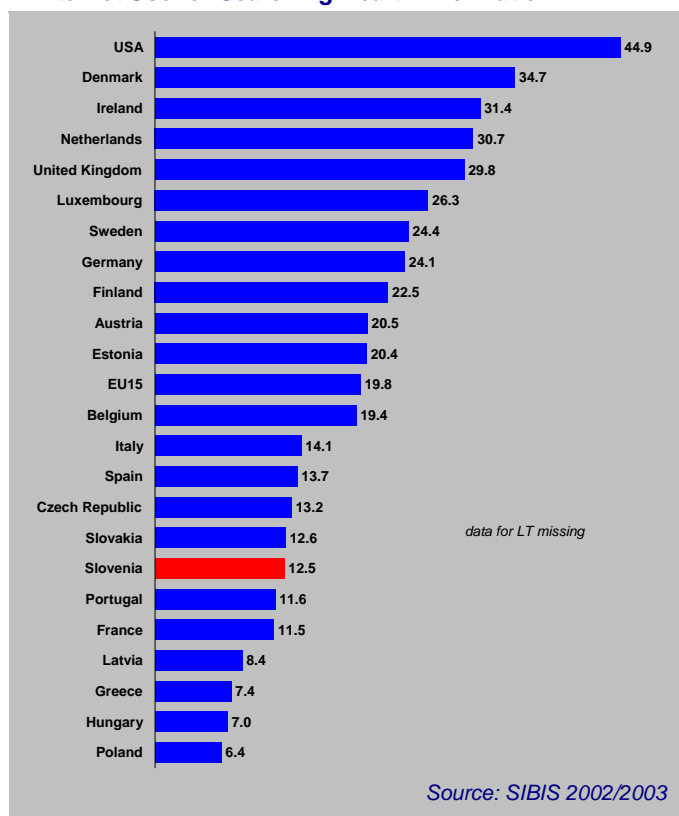
The Ministry of Health website itself features only limited information targeted at general interest users, such as links to other sites, search tool and the list of frequently asked questions. The Health Insurance Institute website mainly provides content on compulsory health insurance (rights and duties of the insured persons), information about Health Insurance Card and medicines, and about health care providers (the list of health care providers with information about working time and waiting periods), information regarding regional units and branch offices, and advice for EU citizens. The information is offered in Slovenian language except of some basic text in English. The Institute for Public Health of the Republic of Slovenia website is another official website, but does not appear to be much oriented to the needs of users from the general public.

The extent to which family doctors, general practitioners and public health clinics in Slovenia have websites oriented towards the public varies. According to the Health Insurance Institute of Slovenia, in the last 10

years Slovenia has achieved a rather high level of diffusion of computer technology among health care service providers. Utilisation of the Internet is limited, though, partly because Slovenian legislation prohibits commercial self-promotion of health care providers. Website content has to be in conformance with legislation, covering professional quality, correctness and validity of data, and information being easily understandable for the general population and provided in Slovenian language. This means that content of such websites is limited to providing official and easy accessible information of mostly administrative character. In general, most users prefer personal or telephone contact with their doctors.

Online consultancy is offered by some of the health websites in Slovenia. Site users of Med.over.net, the biggest private sector health website, can ask for online advice on health problems and receive answers free of charge. A discussion forum for communication between users is also included. The Slovenian broadcasting company POP TV has launched an Internet website related to health advice (POP's doctors) that enables contacts with doctors from different disciplines via e-mail. Personal advice and consultancy is given free of charge. The service provides anonymity. At present, over 30 doctors provide consultancy and advice. The archives of questions and answers can also be accessed through the website. The inquiry revealed that the biggest advantage of contacts with doctors via e-mail as perceived by the users of these services is a simple way of communication with doctors (39%), anonymity (20%) and access to the advice of doctors from different disciplines (18%). The short time needed to get an answer is also well appreciated by users of the service.

Internet Use for Searching Health Information⁸



A similar service is offered by the Slovene Family Medicine Society's Counselling eForum. Here, a team of doctors answers questions regarding family and general medicine. The service provides anonymity. Archives of forums can also be accessed through the website. However, this website tends to be unknown to the general public. The next limitation is that the website is not suitable for persons with disabilities, especially blind or partly-sighted.

Making appointments and registering online for treatment in public health clinics is not available yet.

Online interaction with a family doctor, specialist or primary health care clinic is a very delicate issue in Slovenia, which needs to be addressed in the future. The Medical Chamber of Slovenia argues that such online interaction is hardly feasible because of the provisions of the Slovenian Personal Data Protection Act. This piece of regulation makes it compulsory to unconditionally protect personal data as much as possible. This applies, of course, in particular to sensitive health-related data. This means that test results, prescription renewal and online appointment scheduling are not available through e-mail or other online means. In general, the same applies to **consultation via phone**, although in practice doctors may use the telephone for giving information and prescription renewal to well-known patients.

There are some initiatives regarding **ePrescription** which seek to enable patients who are chronically ill to make prescription renewal through the Internet.

With regard to **after hours service**, there is as yet no structured telephone-based (triage) system that would allow patients to have access to medical advice after hours, except in emergencies.

Patients who want to receive a **Second Opinion** in Slovenia need to contact the largest health care centre in Slovenia, the Clinical Centre in Ljubljana, which houses the Slovenian Second Opinion Committee. There is no second opinion online service in Slovenia.

Overall, the availability of eHealth services targeted at end users (patients) is still quite limited in the country. One of the characteristics of Slovenia's health system related to ICT is the poor state of information and documentation systems both for hospitals and patients.

The problem was addressed in the Ministry of Health document Strategic Directives for the 2001-2004 Period, which recognised the setting up an adequate information system as one of the priorities of health sector development. In 2003, the Ministry of Health accepted the White Paper on Health Reform, which put much emphasis on development of an information base in the health system. It also addressed the objective of upgrading the health insurance card, which today is one of the most important projects of the government. While some elements of the "new eHealth card" are already in place (data on allergies, medicines issued and other remedies), the whole process, which will include integration of all relevant personal health-related data, will take up to 10 years.

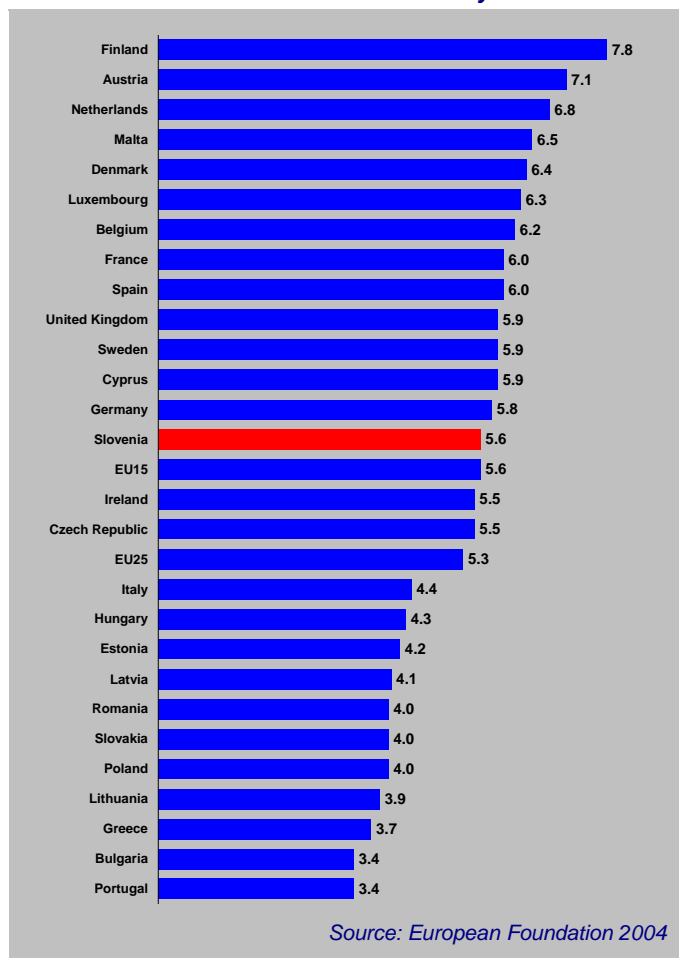
Other major problems are connected with the high costs of the modern healthcare services and the lack of efficient technological solutions, which would make online communication among patients and doctors quick and easy. Health care institutions in Slovenia tend to be equipped with modern information technology, but much less so are general practitioners. It remains a challenge

how to reduce costs while ensuring high quality of services. Access to information, privacy and confidentiality are becoming increasingly important. To improve information access to medical staff and patients while simultaneously ensure data security, privacy and confidentiality.

eHealth policy-making is organised as part of the general strategies and initiatives on development of the Slovenian Information Society. The Action Plan eGovernment up to 2004 foresees the development of eHealth services, which would provide interactive counselling on available services in hospitals and online application for medical treatment. The next step to follow, in two years, will be the introduction of ePrescription. At the moment, the proposed services are still in the phase of development. The only health-related **administrative transaction** that can be carried out online (or, alternatively, through self-help terminals) is ordering of a convention certificate for emergency medical assistance abroad. Since 1 June 2004, the service of ordering the European Health Insurance Card is offered online. The certificates ordered arrive through regular mail within 3 working days.

Online sales of over-the-counter medicines is legal, but online trade with medications that require prescription is prohibited by law. The sale of non-prescription medicines is limited to verified pharmacies. Pharmaceutical institutions in the Republic of Slovenia are well aware of the importance of the Internet. Gorenjske Lekarne, the second biggest public pharmaceutical institution, has set up an extensive website offering expert information and personal advice on use of drugs.

Satisfaction with National Healthcare System⁹



User orientation in eHealth services

User orientation is gaining ground in the design of eHealth services to be introduced in Slovenia. According to the Action Plan up to 2004, access to administrative services, such as application forms (either for downloading or online completion) and interactive ordering for medical treatment, should be developed in an easy-to-use way.

The introduction of the Slovenian Health Insurance card can be quoted as an example of success through user orientation. The device is widely recognised and accepted among the whole population. The Health Insurance Institute has actively promoted the health card among the population, both on-line and with the usage of traditional media (TV, radio, press). Thus, the promotion of service was crucial for visibility and findability among target population. The Health Insurance Institute is highly relevant organisation, which enjoys a high level of trust among the general population.

Access to the health system in Slovenia is guaranteed for the entire population and health services in general enjoy a high rate of user satisfaction – the highest among all New Member States. Every citizen has the right to choose themselves their personal primary care physician. The list of health care providers in Slovenia is easily accessible through the Internet. The personal physician has got a gate-keeping role for access to secondary and tertiary care. If secondary or tertiary care is needed, the patient is referred to a particular specialist or hospital for consultation or for treatment.

On the negative side, Slovenians are suffering from long waiting lists for treatment in hospitals and by some specialists. Patients are thus interested to have quick and easy access to reliable information online that would make it as easy as possible to take a decision about which hospital or specialist to attend. Comparative information on waiting periods for medical treatment provided by hospitals and specialists is now published on the website of the Health Insurance Institute of Slovenia and on some other websites of Slovenian health care providers.

An RIS survey conducted in 2001 found that more than 60% of the total population are interested in receiving health advice or help for interpretation of diagnosis through online means. Around 58% of Internet users expressed general interest in the usage of eHealth services. Interest is strongest in finding information on usage and properties of medicines. Around 16% of the respondents were interested in buying medicines online.

eHealth services should be designed to answer all questions about where and how citizens can attain medical treatment, and about available healthcare services and providers. Although the supply of such information has much improved in recent years, potential and actual users tend to be unaware of this. They are also concerned about security issues regarding data privacy and confidentiality. Both problems need to be addressed by increasing the visibility and findability of online services, and by promoting data privacy guidelines and their evaluation by independent controllers.

It is clear that more needs to be done with regard to accessibility of online information for persons with disabilities, as well as for members of ethnic minorities who do not speak fluent Slovenian. Access to websites for groups of people with special needs should be safeguarded.

An other problem is that health websites are often not updated regularly, which diminishes their value for users.

Patients are interested in online communication with their doctors, not just for dealing with administrative issues but also for consultation and transmission of test results. The latter may require the establishment of interoperable standardised security services by means of an infrastructure for user authentication via digital signature.

eLearning and Lifelong Learning for Adults in Slovenia

According to the National Statistical Institute Slovenia, in the 2000-2001 academic year 393 institutions offered 17,773 different adult education courses, comprising on average 40 hours and involving 280,000 participants. The Report on the supply of adult education in Slovenia in 2002/2003 by the Slovenian Institute for Adult Education reports that the main providers are private educational institutions (31.5%), followed by secondary schools (16.45%) and folk universities (12.3%). Various societies (5.5%), museums and galleries (3.9%) and general-educational libraries (2.2%), which increasingly incorporate adult education into their activities, are also involved.

The most well-known providers of adult education courses are the "ljudske univerze" (folk universities). There are more than 40 "folk universities" active in Slovenia, carrying out the education of adults as their basic activity. Most popular are basic adult education, foreign languages, computer programmes, and work-related programmes on legal, financial and managerial topics.

Of special interest for the eUSER project is the Third Age University of Slovenia, a voluntary educational movement targeting the population 50+, mostly retired people, but also for elderly workers out of work. The Third Age University encompasses 27 universities.

The overall rate of participation in lifelong learning is considerably above the EU15 and EU25 averages. However, the share of enterprises providing training to their staff, and the percentage of worker participation in employer-provided training, are well below EU averages.

Key education indicators about Slovenia¹⁰

	Slovenia	Ø EU15	Ø EU25
Youth education attainment level	89.7%	73.5%	76.4%
Total public expenditure on education as a percentage of GDP	6.02%	5.22%	5.22%
Enterprises providing training	33%	54%	53%
Employees' participation in company-provided training	32%	40%	39%
Overall participation in Lifelong Learning	17.9	10.6	9.9

As in any European country, the majority of adult Slovenians are not engaged in education and training anymore. The traditional way of thinking is still widespread according to which education takes place at young age, which should then be fully sufficient for managing working life.

There is also strong resistance of the traditional educational environment toward changes introduced by the right to life-long learning. The main barriers which keep adults from participating in lifelong learning in Slovenia are similar to those in other countries. For example, lack of access to employer-provided training reduces the likelihood of participation, as does older age or unemployment. According to the data issued by the Statistical Office of the Republic of Slovenia (2003), as much as two thirds of the

population did not take part in formal education or continuing education. Most of them stated lack of interest as the reason for not participating. The second reason for not taking part is lack of time, which is the most frequent in the age groups 25-54, followed by health reasons, too busy with the job and family responsibilities. Costs for education courses or difficulty to reach places of education are mentioned much less often by citizens.

A study on "Literacy of Adults and their Participation in education" by the Centre for Adult Education of Slovenia, (1998) found 57% of all adult participants in education do so on their own initiative. This findings indicates that most individuals need to be personally motivated in order to participate in lifelong learning.

In recent years there has been growing awareness in society about the importance of continuous education for staying employable. Government intervention is also contributing to make adult education more attractive for Slovenians. Important factors are an expansion of supply of adult education offers in the country, and wider recognition of pre-learning experience and skills obtained through non-formal and informal learning. A new act introducing a certification system was adopted in 2000. This enables the assessment and verification of vocation-related knowledge, skills and experiences acquired out-of-school. It thus makes it possible for individuals to obtain a vocational qualification in ways other than through formal schooling.

The possibility to obtain financial support is one of the key factors that can motivate adults to participate in education. Willingness of the employer to finance job-related training is a decisive factor. According to data of the National Statistical Office (2003), in over 80% of cases work-related training was paid by the employer; in 60% of cases, training courses took place only or mainly during paid working hours.

On the supply side, there has been considerable growth in different course offerings. The proliferation of course offerings and providers has led to a problem of lack of market transparency. Many courses and/or providers are new and users find it hard to assess beforehand whether courses are of the required quality. The demand for independent advice and counselling has thus increased considerably.

The responsible organisation for counselling in the field of adult education is the Slovenian Institute for Adult Education. Annually, the Institute perform 4.000 counselling hours – for institutions active in the field of adult education as well as for individuals who wish to participate in education or learning. In addition to providing information by phone or directly, through personal contact, the Institute has established a Counselling E-forum within SIAE's web site. The wider public is targeted via information campaigns in the mass media.

The unequal distribution of education supply between Slovenian regions also represents a barrier. The Slovenian Institute for Adult Education found that, while there are 130 providers in central Slovenia, there are only four in the Zasavje and Notranjska-Karst regions.

Policy-making on lifelong learning is mainly under the responsibility of the Ministry of Education and Sport. In addition, the Ministry of Labour, Family and Social Affairs has certain responsibilities in employment related aspects of vocational training and adult education. Adult education is financed from three main sources: employers, individuals and public finances. In the national budget, 0.1% of GDP is earmarked for adult education. Adult and lifelong learning is

mentioned in several long-term strategic documents, the most important of which is the Adult Education Master Plan to 2010. It lists three strategic goals: (a) increasing participation of adults in non formal general education activities for personal development and improving participation in cultural, political and social activities in communities; (b) improving educational attainment, and (c) increasing participation in education and training related to improving employability.

In 2002, the Ministry for the Information Society launched an innovative initiative entitled eSchool, under which schools have been opened up for every citizens. With the help of a mentor, i.e. a trainer who is always present, citizens can use their local school to learn basic computer skills and how to access the Internet, and also obtain information about how they can participate in proper adult education courses.

eLearning as a solution?

eLearning has been developed in the country against the background of a traditional interest in distance education. Distance education, however, was mainly considered as an application for formal tertiary education. The at the University Research and Development Centre at the Faculty of Economics, University of Ljubljana, was instrumental in progressing the cause. In 1994 Slovenia was involved in the Phare Programme, which lasted from August 1995 until autumn 1999 and introduced eLearning applications to the country.

Since then many higher education institutions have implemented eLearning features and online courses as a way to enrich traditional forms of education. According to a study from 2004¹¹, online eLearning applications are provided by 17% of all tertiary education institutions today. Complete eLearning courses are offered by 9% of institutions; almost 35% of institutions state that they prepare the introduction of eLearning elements in regular study courses; and one in five institutions are preparing whole study programs for being delivered online in the near future.

According to an evaluation from 2001 by the Steinbeis Transfer Centre, Slovenia is seen as having leading expertise in ICT applications for education and training within the larger region. However, the number of online courses offered by educational institutions is still rather low and investment in ICT-based courses is somewhat sporadic. There appears to be a lack of eLearning courses (and related services), particularly for adults, in Slovenia. This is reflected by the comparatively low take-up of Internet-based learning by the population, which was found in the 2003 SIBIS cross-country survey.

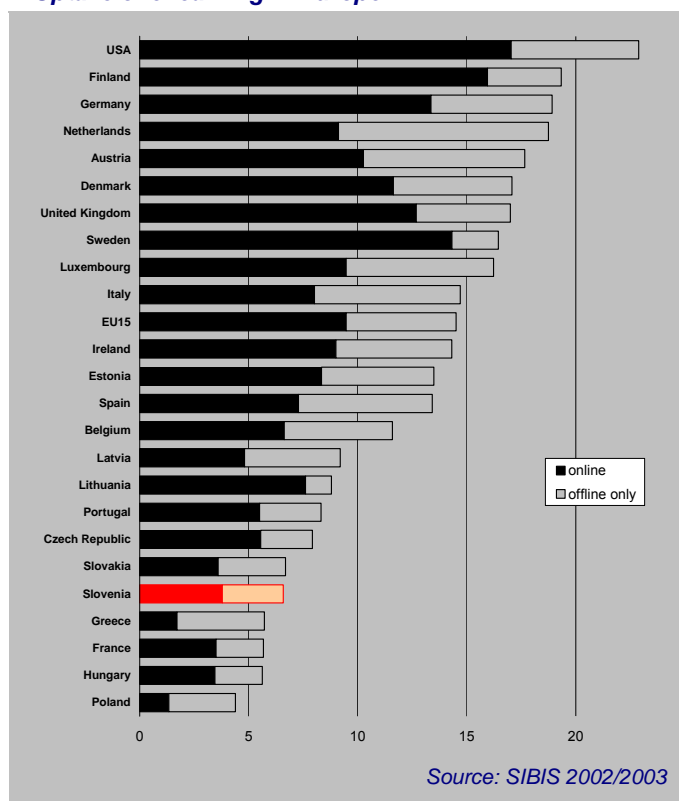
According to a recent study¹² in 2003 there were 26 websites in Slovenia through which distance education was offered. However, the majority of pages focus the primary and secondary school market or regular students in higher education. Language learning online is offered by DOBA, the Vocational College Maribor. All DOBA courses are also available on CD-ROMs, which takes account of the fact that most Slovenian Internet users do not have broadband access yet.

Other available online courses include computing courses by private providers NEVRON and Interactive Solutions. The "Virtual Academy", established in October 2004, offers three methods of online learning

"eCompanion" programs mean independent learning through the Internet with the support of a fully automatic mentoring application; "eCounsellor" means learning through the Internet with the permanent support of a "real" mentor; and "eMentor" which means combined learning through the Internet with the intensive support of a personal mentor. In the area of tertiary education, the "Virtual University" provides links to faculties and schools of higher education that are members of the University of Ljubljana. The CDI Univerzum Ljubljana provides basic education for adults including second chance programmes of primary and secondary education, offering self-learning (under mentorship) with eLearning applications as one option. It has 3000 participants per year.

With regard to company-provided training and education, it appears that Slovenian enterprises recognize the potential advantages of eLearning: flexibility, possibility of quick and easy adaptation, updating and distribution of contents, and economies of scale. However, according to the RIS survey from 2003, only 10% of Slovenian companies (big, medium-sized and small ones) have already used eLearning or distance learning for training and learning support for their staff. The major obstacle seems to be the relative low level of digital literacy among employees, especially older ones and those less educated.

Uptake of eLearning in Europe¹³



National level policy-making on eLearning is coordinated by the Ministry of Education in coordination with other ministries and state bodies. The National Programme for Higher Education, approved by the Slovenian Parliament in February 2002, gives clear priority to further development of distance education and eLearning. Experts agree, however, that what is missing in Slovenia at the moment is a consistent and well-targeted educational policy which could foster development of eLearning.

A project on Distance Learning in Slovenia has been initiated by the Ministry of Education, Science and Sport in 2002, in order to elaborate a national strategy in the field of eLearning covering all relevant aspects as regards organisational, didactical, economic, technological and legal factors to be taken into account. As yet, the project has not lead to the adoption of a national strategy on eLearning.

User Orientation in LLL and eLearning

According to the official statistical data (2003), 55% of the unemployed in Slovenia expressed no interest in learning, while over 8,000 people (16%) said that they have no time. This is a clear indication that even among those groups of the population which are in most need of improving their skills, awareness of the necessity to practice lifelong learning is not wide-spread. Interest in lifelong learning is lowest among the less educated and they are the ones who are worst prepared to make use of the possibilities opened up by eLearning.

Apart from a lack of intrinsic motivation, available evidence also points out that a lack of incentives for those willing to participate in lifelong learning is negatively affecting rates of participation. The often high level of costs incurred also play an important role.

The supply of online courses for self-learning in Slovenia is still modest, and mainly limited to foreign languages and ICT. Information about such courses appears to be well communicated to the target audience, it can be accessed easily through all usual channels from the Slovenian Institute for Adult Education, the national institution for counselling in the field of adult education. The Institute has also established a Counselling E-forum on its website which will be of special interest for persons interested in eLearning courses.

Many experts consider the eSchools initiative as a high point is user orientation. The initiative means that every citizen is invited to enter the school nearest to them, and there find a mentor who will teach them basic computer skills and how to use the Internet to locate information about more regular training offers.

Overall it is becoming clear that the country would benefit from a national strategy for making best use of eLearning systems, which itself would need to be fully integrated into the national approach for fostering participation in lifelong learning.

eUser – the Project

The eUser study is funded by the European Commission's IST (Information Society Technology) programme. eUser is a major research and support project which has set out to provide solid evidence as to users' real needs regarding eGovernment, eHealth and eLearning offers, as well as providing data about their attitudes and the uptake levels of current public online services. The project supports the IST programme to achieve its key objectives of putting the user and his/her needs at the centre of IST developments. It provides empirical information on key public eServices domains – eGovernment, eHealth, eLearning – identified as priorities by the European Council, and assesses the demand/supply match in these fields.

The eUser Approach

To achieve its objectives, eUser addresses both generic user-related issues and domain-specific topics, and develops a globally accessible repository of evidence-based knowledge, methods and best practice examples. It pursues an extensive programme of active knowledge translation, transfer and dissemination supported by sophisticated online knowledge dissemination tools. The knowledge base will consolidate both existing knowledge and approaches, and novel data generated by the project through representative population surveys (demand side) in old and new Member States, and through comparative analyses of readiness to address user aspects of public eServices in each Member State (supply side).

The project is designed in two phases. *Phase 1* – the preparatory phase – has developed a conceptual framework that systematically identifies and cross-references user issues and service characteristics in relation to online public services. An EU-wide population survey regarding the needs, experiences and requirements of both current and potential users of online public services has been carried out in early 2005. Concerning the supply side, information from national public sector environments has been collected, about the degree to which the European public sector pays sufficient attention to user-orientation of online services. Good practice examples regarding user-appropriate online public service provisions are being identified and described.

All these results build the basis and provide content for the eUser interactive online knowledge base and support service which is being set up as an online observatory on user issues. This constitutes the basis for active support services on user-centred topics which are being made available inside and outside the IST programme.

eUser Country Briefs

This document has been prepared by empirica based on information provided by two National Correspondents (**Prof. Vasja Vehovar and Tanja Sterk, University of Ljubljana, Faculty of Social Sciences**) as well as secondary data sources such as Eurostat and other Commission Services.

Altogether 25 eUser Country Briefs are available in a common format, one for each member of the enlarged European Union. You can access and download these documents in PDF format (for free) from our website.

More information

Check our results and achievements on: www.euser-eu.org. If you wish to be provided with more details, or to receive news and updates, please contact us at: eUser@empirica.com or get in touch with any of the project partners listed below.



empirica Gesellschaft für Kommunikations- und Technologieforschung mbH
(Project Co-ordinator)

Oxfordstr. 2, 53111 Bonn, Germany, Tel.: +49 228 985 30 0, www.empirica.com



Danish Technological Institute
Center for Competence and IT

Kongsvang Allé 29, Aarhus, Denmark, Tel.: +45 72201417, www.teknologisk.dk



Foundation for Research and Technology – Hellas
Institute of Computer Science

P.O. Box 1385, Heraklion, Crete, GR - 71110
Greece, Tel: +30-2810-391741,
www.ics.forth.gr



Work Research Centre Ltd.

1 Greenlea Drive, Terenure, Dublin 6W,
Ireland, Tel.: +353 1 492 7042, www.wrc-research.ie



University of British Columbia, Vancouver, BC,
Canada

#105 - 2194 Health Sciences Mall, Vancouver,
B.C., Canada, Tel.: +1 6 04 6 39 46 68

www.cme.med.ubc.ca



National Research Council Canada
Conseil national de recherches Canada

National Research Council Canada, Saint
John, New Brunswick

127 Carleton Street, Saint John, New
Brunswick, Canada, E2L 2Z6, Tel: +1 5 06 6
35 06 33, www.iit-iti.nrc-cnrc.gc.ca



Project cofunded by the European Commission SIXTH FRAMEWORK PROGRAMME
PRIORITY 1.1.2 Information Society Technologies

Notes About the Data Sources Used in This Document

- ¹ Old age dependency ratio = Population aged 65 and over expressed as a percentage of the 2004 working age population (15-64 years); Source: Eurostat 2005. Population density = Inhabitants per km², middle of year; Source: Eurostat 2001. GDP per capita = GDP in 2004 in Purchasing Power Standards in relation to EU25 average; Source: Eurostat 2005. GDP growth average = real GDP Growth Rate, average five years; Source: Eurostat 2000-2004. Unemployment rate = unemployed persons as a percentage of the labour force 2004. Source: Eurostat 2005. Inequality index = Gini coefficient; Source: Eurostat 2001. Lower values indicate less inequality.
- ² Households with Internet access = Percentage of households that have Internet access at home 2004; Population base: 16-74; Source: Eurostat 2005. Broadband penetration: Number of broadband in 7/2004 connections related to population; user group not specified; Source: Eurostat 2005. ICT expenditure: Annual expenditure for ICT hardware, equipment, software and other services in 2004, as percentage of GDP; Source: EITO. Digital Divide Index: The DIDIX is a compound index comprised of four indices, and measures diffusion of computer and Internet access and use amongst the four identified 'at risk' groups along the dimensions gender, age, education and income in relation to the population average. The lower the Index value the more severe is the divide, with parity resulting in a value of 100. Based on SIBIS data from 2002/2003 (www.sibis-eu.org). EU25 average does not include Malta and Cyprus. See Hüsing, T. & Selhofer, H. (2004): DIDIX: A Digital Divide Index for Measuring Inequality in IT Diffusion, In: IT&SOCIETY, 1(7): 21-38.
- ³ The Index comprises indicators on diffusion of PCs, Internet connections, phone lines, mobile subscriptions and TV sets, and share of population online. Source: United Nations, Department of Economic and Social Affairs (2003): World Public Sector Report 2003. New York.
- ⁴ This indicator measures the online availability of 20 basic public services, of which 12 are targeted at citizens. Measurement is based on a sample of URLs agreed with Member States as relevant for each service. Native speakers in each language then carry out a web survey to measure the degree of sophistication of online availability using a 4 stage classification: (1. Basic Information; 2. One-way Interaction; 3. Two-way Interaction; 4. Full electronic case handling). Around 14,000 URLs were tested in 2004. Source: Cap Gemini Ernst & Young 2005.
- ⁵ Percentage of individuals who are using the Internet for downloading official forms, 2004 data. Target population considered is between 16-74 years. Source: Eurostat 2005.
- ⁶ UN eGovernment Readiness Index = combined index of Web Measure Index, Telecommunication Infrastructure Index, Human Capital Index. Web Measure = measures state provided services online, presence of services available, Telecommunication Infrastructure Index = PC and Internet penetration, Human Capital Index = composite of adult literacy rate and gross enrolment ratio. Source: United Nations, Department of Economic and Social Affairs (2003): World Public Sector Report 2003. New York.
- ⁷ Percentage satisfied with own health = percentage of people being very and fairly satisfied with their own health; 2002 data; Source: European Foundation for the Improvement of Living and Working Conditions, 2004. Prevalence of long-term illness = percentage reporting having a long-term illness or disability; Source: Eurobarometer 2002. Doctors per 100,000 inhabitants = total number of practising physicians or doctors per 100,000 inhabitants. Newest data available (EU15 and EU15 averages: 2002); Source: Eurostat 2005. Health expenditure as percentage of GDP; Source: Eurostat 2002.
- ⁸ Share of total population 15+ who have used the Internet to look for health-related information in the 12 months prior to the survey. See www.sibis-eu.org.
- ⁹ Satisfaction with National Health System = combined index of satisfaction with health care and with social services. Measured on a scale from 1 (low) to 10 (high); Data source: Eurobarometer 2002; Source: European Foundation for the Improvement of Living and Working Conditions, 2004.
- ¹⁰ Youth education attainment level: Percentage of the population aged 20 to 24 having completed at least upper secondary education in 2003; Source: Eurostat 2004. Total public expenditure on education as a percentage of GDP: Expenditure includes direct expenditure for educational institutions and transfers to private households and firms; data for 2002; Source: Eurostat 2005. Enterprises providing training: as % of all enterprises (>9 employees); Source: CVTS2 2002 (reference period: 1999). Employees' participation in company-provided training courses: in % of total employees (total of enterprises >9 employees); Source: CVTS2 2002 (reference period: 1999). Overall participation in Lifelong Learning: Percentage of adult population aged 25-64 who took part in any training in the four weeks prior to the survey; Source: Eurostat 2005 (based on 2004 National Labour Force Surveys).
- ¹¹ Lesjak, D., Sulčič V., Trunk Širca, N., Vehovar, V. (2004): "Information and communication technology in tertiary education institutions in Slovenia. a prerequisite for e-learning".
- ¹² Lesjak, D., Trunk Širca, N. and Sulčič, V. (2004): "Electronic Learning in Slovenia".
- ¹³ Share of labour force who use eLearning for work-related training (online/only offline). See www.sibis-eu.org.