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**INFORMATION SOCIETY  
IN THE REPUBLIC OF BELARUS**

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The data book presents statistics on the activities in the sector of Information and Communication Technologies (ICT), on the ICT use by legal entities and households, and access of households to computers, communications and the Internet.

The publication is intended for government authorities, financial and economic departments of enterprises, scientific organisations, higher education teaching staff, postgraduates and students, and other interested users.

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## **FOREWORD**

The data book is prepared on the basis of data of the state statistical survey carried out through the report form "Questionnaire on the use of information and communication technologies and manufacture of computing equipment, software and provision of related services" which was submitted by for-profit organisations (except small business entities and private (peasant) farms) with the principal economic activity in agriculture, hunting and forestry; fishing and fish farming; electricity, gas and water supply; construction; trade; repair of motor vehicles and household and personal goods; hotels and restaurants; transport and communications; financial activities; real estate, renting and business services; community, social and personal services, as well as by small and micro-entities with the principal economic activity in the sector of information and communication technologies (ICT).

There are data on the use of ICT by for-profit organizations and residents of the High Technology Park. Selected statistical indicators describe the ICT use by households.

The book provides data on the ICT organisations, such as the number of employees, wages and salaries, fixed capital investment, volume of production, exports and imports of goods and services, and financial indicators. The information on training of ICT specialists is also included.

The book provides information on the ICT use in the Republic of Belarus in comparison with other countries.

Statistical indicators are furnished with brief methodological explanations; charts and diagrams are also presented.

The statistical book is prepared by the Main Department of Services and Demographic Statistics with the involvement of other units of the National Statistical Committee of the Republic of Belarus and is intended for a wide range of users.

### **Explanation of symbols:**

- not applicable
- ... data not available
- 0,0 negligible magnitude

Ratios are computed on the basis of absolute figures with a smaller unit of measurement than those provided in the tables.

In certain cases insignificant discrepancies between the total and the sum of components are explained by data rounding.

### **Abbreviations:**

thous.	- thousand
mln	- million
bn	- billion
channel-km	- channel-kilometre

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Training of ICT specialists	Irina Shestakova	214-95-10
International comparisons	Irina Shestakova	214-95-10

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## METHODOLOGICAL NOTES

**Information and communication technology (ICT)** are information processes and methods of work with information using telecommunication means and computer equipment.

The **ICT sector** comprises organizations with the main economic activity in the production and implementation of information and communication technology, and the provision of related services.

In accordance with the national classification of economic activities OKRB 005-2006 "Kinds of Economic Activity" (further referred to as OKED) approved by the resolution of the State Committee for Standards of the Republic of Belarus No. 65 of 28 December 2006, the ICT sector comprises the following areas according to the principal economic activity:

**"Manufacture, installation and maintenance of equipment"** includes manufacture of office equipment (without installation); installation and adjustment of office equipment; manufacture of electronic computing machinery and other data processing equipment (without installation); installation and adjustment of electronic computing machinery and other data processing equipment; manufacture of insulated wire and cable; manufacture of electronic and radio components; manufacture of television and radio apparatus for industrial use; manufacture of line telephony and line telegraphy; assembly, adjustment, repair and maintenance of transmission apparatus; manufacture of sound or video receiving, recording and reproducing apparatus; manufacture of instruments and appliances for measuring and checking; manufacture of optical instruments and equipment for measuring and checking; repair and maintenance of instruments, appliances and equipment for measuring and checking; assembly of industrial process control equipment; maintenance and repair of office and computing machinery; other computer-related activities;

**"Sale, renting and servicing of equipment"** includes wholesale of radio and television apparatus; wholesale of computers and peripherals; wholesale of office machinery and equipment; wholesale of other electronic components and equipment; renting of office machinery and equipment, including computing machinery; consultancy in hardware;

**"Telecommunication services"** includes telecommunications;

**"IT products and services"** includes software publishing; software design and related consultancy; data processing; database activities.

**ICT Development Index** consists of three sub-indices:

ICT access sub-index captures the development of the telecommunication infrastructure;

ICT use sub-index captures the use of technologies by ICT users;

ICT skills sub-index captures the development of human capital.

**Web Services Index** is based on the indicators measuring presence or absence of particular electronic services as well as their accessibility. To construct the index, official

websites (portals) of the government and selected ministries (of health, education, labour and employment (social security), finance ministries) are analysed.

**UN e-Government Readiness Index** is constructed as an arithmetic mean of three primary sub-indices: web services sub-index, ICT development sub-index, and human capital sub-index.

**Internet** is a set of interlinked international data networks based on the TCP/IP stack and using interconnect address space.

**Intranet** is a distributed corporate computer network based on the Internet technology and designed to ensure the access of staff to the corporate electronic information resources.

**Extranet** is an extended Intranet comprising selection space with access allowed to external users. For example, external users may be partially provided with the access to corporate data on the status of their orders or stocks.

**Local area network** links two or more personal computers (PCs), electronic computing machines (which may be of different types) as well as printers, scanners, security and fire alarm systems and other industrial equipment or peripherals located within one or several closely located buildings, not using public communications.

**Global information network** covers PCs (electronic computing machines) which may be located in any place around the globe and are linked together with dial-up or allocated channels provided by telecommunication operators. The global information network may be either publicly accessible or specialised (corporate or private). When a PC can receive from or send information in electronic form to remote PCs located out of one or several adjacent buildings, it is considered to be connected to the global information network irrespective of the equipment, software, protocols and data exchange regulations used.

**Dial-up access** is the arrangement of connection between subscriber terminal equipment (terminal) of telecommunication user and the Internet using a dial-up technology (V.32-V.92). The example of dial-up access is the Internet connection setup at a speed up to 56 Kbit per second using subscriber terminal equipment (modem) and a fixed telephone line.

**Fixed broadband access** to the Internet is a one- or two-way connection of subscriber (user) to data transmission networks at a speed of 256 Kbit per second or higher using a cable modem (DOCSIS technology), xPON, xDSL, Ethernet, Wi-Fi, WiMAX or other technology.

**Wireless broadband access** is the connection of subscriber to mobile cellular telecommunication networks with a one- or two-way access to data transmission networks at a speed of 256 Kbit per second or higher. The wireless broadband access uses such technology as W-CDMA, HSDPA, CDMA2000 1xEV-DO, CDMA 2000 1xEV-DV, UMTS and other.

**Electronic digital signature** is a sequence of characters which is a requisite element of electronic document and is intended to confirm its integrity and authenticity.

**ICT expenditure** are total expenditures, including capital and current expenditures, on the development, acquisition, implementation and use of information and communication technology.

**Telecommunications** is a type of communication comprising any emission, transmission or reception of characters, signals, voice data, written text, images, sounds or other messages via radio system, wire, optical or other electromagnetic system.

**Data transmission services** are telecommunication services of reception, transmission, processing and storage of data.

**Continuous access to the Internet services** are data transmission services that provide permanent connection between data terminal equipment of telecommunication user and the Internet.

**Television programme broadcasting services** are services of broadcasting of television programmes to a wide range of geographically distributed telecommunication users.

**Mobile cellular telecommunication services** are telecommunication services provided to telecommunication users by telecommunication operator via mobile cellular telecommunication network.

**Computer services** comprise:

design, development, delivery, maintenance, support, and documentation of custom software; design, development and implementation of automated systems; design, development and formatting of web pages; processing of data employing the customer's or proprietary software; database-related services, including creation of databases, storage and provision of access to databases; services of web search portals and search engines;

consultancy on software, hardware and equipment of information computer systems, including analyses of user needs and development of the most economical solutions;

maintenance and repair of computers and peripherals.

**Mobile cellular telecommunication subscriptions** comprise mobile cellular telecommunication subscriptions under related contracts concluded, with the subscriber number or a unique identification code assigned for these purposes.

**Fixed telephone lines connected to general use telecommunication network** comprise telephone lines connected to the national telecommunication operator's network and telephone lines connected to the technological telecommunication networks linked with the general use telecommunication network. The total number of fixed telephone lines include main (individual and shared) and coupled lines installed in organizations and

dwellings. Home telephone lines, i.e. telephone lines installed in apartments and dwelling houses are distinguished in total fixed telephone lines.

**Gross Domestic Product** characterizes the value of goods and services produced in an economy by all economic activities and intended for final consumption, capital formation and net exports.

**Gross value added** is calculated at the level of economic activities as the value of goods and services produced in the reference period (output) less the value of goods and services fully consumed in the process of production in the same period (intermediate consumption).

**Payroll number of employees** comprises employees who worked under employment agreements (contracts) and performed permanent, temporary or seasonal work. The number includes both actually working and temporarily away from work for any reason (annual leave, leave initiated by employer, temporary incapacity, other reason). External multiple job holders and civil law contractors are not included.

**Average monthly payroll number of employees** is calculated by summing up employees on the payroll for each calendar day of the reference month. The sum is then divided by the number of calendar days in that month.

**Average annual payroll number of employees** is calculated by summing up average monthly numbers of employees for all months of the reference year, with the sum then divided by 12. The average payroll numbers of employees do not include employees on maternity leaves, leaves in connection with the adoption of a child under three months of age, and child-care leaves up to the age 3 years.

**Nominal gross average monthly wages and salaries** are calculated by dividing the accrued wage fund, including the income tax and compulsory insurance contributions of employees, by the average payroll number of employees taken to compute average wages and salaries, and by the number of months in the period.

**Revenues from sales of goods, products, works and services** is the receipt of assets recognized as revenues from sales of goods, products, works and services.

**Net cost of goods, products, works and services sold** comprises costs related to the manufacture of products, performance of works and provision of services referred to the products, goods, works and services sold; sales costs; administrative expenses; and also acquisition cost of goods sold.

**Profit, loss (-) from sales of goods, products, works and services** is a financial result from sales of goods, products, works and services defined as the difference between the revenues from sales and net cost of goods, products, works and services sold and taxes and duties payable from revenues.

**Net profit or net loss** is the final financial result from the activities of organizations for the reference period.

**Profitability of products, goods, works and services sold** is the ratio of profits from sales of products, goods, works and services to the net cost of products, goods, works and services sold.

**Profitability of sales** is calculated as a ratio of profits from sales of goods, products, works and services to the revenues from sales of goods, products, works and services. A negative financial result from sales of goods, products, works and services means operating at a loss.

**Loss-making organisation** is an organization that has a net loss over a reference period.

**Share of loss-making organizations in total organisations** is the ratio of the number of loss-making organizations to the total number of organizations.

**Fixed capital investment** is total costs invested in the acquisition, reproduction and creation of new fixed assets. Data on fixed capital investment include investment activities of small business entities.

According to the technological structure, fixed capital investment is classified in the following works and costs: building and assembly; assembly of equipment; purchase of machinery, equipment, transport vehicles, tools and implements; other works and costs.

**Exports of goods** is the shipment of goods from the territory of the Republic of Belarus which subtract from the material stocks of the country.

**Imports of goods** is the entry of goods in the territory of the Republic of Belarus which add to the material stocks of the country.

**Exports of services** is the provision of different services by residents of the Republic of Belarus to non-residents.

**Imports of services** is the reception of different services by residents of the Republic of Belarus from non-residents.

Data on exports and imports of services are compiled in accordance with the methodology of the external trade in services statistics.

**Sample household living standards survey** is a non-exhaustive state statistical observation of the changes in the level, quality and conditions of life of the population. The survey is carried out on an annual basis in all regions of the country and the city of Minsk.

**Household** is a group of persons who share the same housing unit and provide themselves with the essentials for living, fully or partially pooling and spending their funds, or a person living alone and providing him/herself with the essentials for living.

## 1. MAIN INDICATORS OF ICT SECTOR

### 1.1. Main socio-economic indicators of ICT sector

	2009	2010	2011	2012
Number of ICT organizations	3 065	3 411	3 569	3 958
of which small and micro-entities	2 395	2 714	2 829	3 048
Share of ICT organizations in total for-profit organizations, percent	3,6	3,6	3,6	3,7
Gross value added of ICT sector (at current prices), BYR bn	2 896,8	5 130,0	8 752,3	16 289,8
Share of ICT sector value added in GDP, percent	2,1	3,1	2,9	3,1
Share of gross value added of ICT sector in gross value added of the economy, percent	2,5	3,6	3,4	3,5
Fixed capital investment in ICT sector, BYR bn	1 338,3	1 720,5	2 961,7	3 110,3
Share of fixed capital investment in ICT sector in total fixed capital investment, percent	3,1	3,1	3,0	2,0
Net profit in ICT sector, BYR bn	1 059,9	1 354,2	1 882,0	3 839,4
Profitability of sales in ICT sector, percent	16,0	13,3	16,9	14,1
Average annual payroll number of employees in ICT sector, persons	90 998	91 041	92 026	92 649
of which in small and micro-entities	25 431	26 257	27 272	28 392
Share of payroll number of employees in ICT sector in payroll number of employees of country's organizations, percent	2,2	2,2	2,2	2,2
Nominal gross average monthly wages and salaries in ICT sector, BYR thous	1 289,3	1 671,7	2 895,0	5 458,6
Ratio of nominal gross average monthly wages and salaries to average country wage level, percent	131,9	137,9	152,8	148,8

**1.2. Main socio-economic indicators of ICT sector  
by regions and Minsk city in 2012**

	Brest	Vitebsk	Gomel	Grodno	Minsk city	Minsk	Mogilev
Number of ICT organisations	231	233	318	189	2 481	308	198
of which small and micro-entities	196	190	260	156	1 845	235	166
Gross value added of ICT sector (at current prices), BYR bn	1 075,0	1 229,8	1 218,8	840,0	10 525,9	572,0	828,2
Share of ICT sector gross value added in Gross Regional Product (GRP), percent	2,2	2,5	2,0	2,0	8,3	0,7	2,1
Share of gross value added of ICT sector in gross value added of the economy, percent	2,3	2,5	2,0	2,0	8,3	0,7	2,1
Fixed capital investment in ICT sector, BYR bn	261,2	280,3	326,3	225,2	1 475,7	315,1	226,5
Share of fixed capital investment in ICT sector in total fixed capital investment, percent	1,6	2,0	1,5	1,2	4,2	1,0	1,3
Net profit in ICT sector, BYR bn	87,6	63,2	94,4	58,0	3 393,0	82,7	60,5
Profitability of sales in ICT sector, percent	8,9	8,2	8,3	10,6	15,6	9,7	13,9
Average annual payroll number of employees in ICT sector, persons	7 091	11 649	8 586	4 969	51 529	4 577	4 248
of which in small and micro-entities	1 382	1 694	1 894	1 115	19 368	1 645	1 294
Share of payroll number of employees in ICT sector in payroll number of employees of region's organizations, percent	1,3	2,3	1,5	1,1	5,3	0,7	1,0
Nominal gross average monthly wages and salaries in ICT sector, BYR thous	3 762,1	3 314,0	4 243,4	4 180,5	6 753,0	4 279,4	3 886,7
Ratio of nominal gross average monthly wages and salaries to average regional wage level in 2012, percent	118,7	100,6	121,0	127,3	147,3	116,9	116,5

### 1.3. Main economic characteristics of ICT sector

	2009	2010	2011	2012
<b>Payroll number of employees in ICT sector, percent</b>	<b>100</b>	<b>100</b>	<b>100</b>	<b>100</b>
of which:				
“Manufacture, installation and maintenance of equipment”	38,0	36,4	35,1	33,1
“Sale, renting and servicing of equipment”	5,5	4,6	4,1	5,0
“Telecommunication services”	37,2	36,6	35,2	32,7
“IT products and services”	19,3	22,4	25,6	29,2
<b>Fixed capital investment in ICT sector at constant prices, percent of previous year</b>	<b>89,6</b>	<b>116,6</b>	<b>113,9</b>	<b>59,3</b>
of which:				
“Manufacture, installation and maintenance of equipment” of ICT sector at constant prices, percent of previous year	43,8	116,5	120,0	87,0
“Sale, renting and servicing of equipment” of ICT sector at constant prices, percent of previous year	109,3	42,6	223,1	99,7
“Telecommunication services” of ICT sector at constant prices, percent of previous year	98,2	117,6	113,3	53,2
“IT products and services” of ICT sector at constant prices, percent of previous year	80,9	117,2	100,9	161,2
<b>Profitability of sales in ICT sector, percent</b>	<b>16,0</b>	<b>13,3</b>	<b>16,9</b>	<b>14,1</b>
of which:				
“Manufacture, installation and maintenance of equipment” of ICT sector, percent	7,9	6,8	14,7	10,5
“Sale, renting and servicing of equipment” of ICT sector, percent	2,1	2,3	8,6	4,6
“Telecommunication services” of ICT sector, percent	23,5	19,3	20,0	19,3
“IT products and services” of ICT sector, percent	21,1	22,6	22,6	20,8
<b>Share of loss-making organisations in total ICT sector, percent</b>	<b>23,7</b>	<b>20,1</b>	<b>19,5</b>	<b>18,6</b>
of which				
“Manufacture, installation and maintenance of equipment” of ICT sector, percent	21,5	17,5	16,2	15,7
“Sale, renting and servicing of equipment” of ICT sector, percent	31,1	25,1	24,6	20,4
“Telecommunication services” of ICT sector, percent	15,8	13,4	17,7	13,5
“IT products and services” of ICT sector, percent	22,0	20,4	19,5	20,9

## 2. LABOUR AND COMPENSATION OF LABOUR

### 2.1. Payroll number of employees and nominal gross average monthly wages and salaries in ICT sector

	Average annual payroll number of employees, persons		Nominal gross average monthly wages and salaries, BYR thous.		Ratio of nominal gross average monthly wages and salaries to average country wage level in 2012, percent
	2011	2012	2011	2012	
Total for ICT sector	91 041	92 649	1 671,7	5 458,6	148,8
<b>Manufacture, installation and maintenance of equipment</b>					
manufacture of office equipment (without installation)	8	27	775,0	2 049,4	55,9
installation and adjustment of office equipment	51	46	1 066,5	2 242,0	61,1
manufacture of electronic computing machines and other data processing equipment (without installation)	2 304	1 750	1 251,0	3 837,4	104,6
installation and adjustment of electronic computing machines and other data processing equipment	134	99	1 073,8	3 048,6	83,1
manufacture of insulated wire and cable	3 670	4 086	1 350,9	4 203,2	114,6
manufacture of electronic and radio components	7 220	7 412	1 049,7	3 293,5	89,8
manufacture of television and radio apparatus for industrial use	514	1 172	1 162,8	3 096,1	84,4
manufacture of apparatus for line telephony and telegraphy	4 403	2 679	1 049,7	3 130,3	85,3
assembly, adjustment, repair and maintenance of transmission apparatus	711	649	2 176,7	6 625,1	180,6
manufacture of sound or video receiving, recording and reproducing apparatus	3 909	3 387	811,3	2 489,4	67,9
manufacture of instruments and apparatus for measuring and checking	5 486	4 531	1 257,3	4 220,0	115,1

Continued

	Average annual payroll number of employees, persons		Nominal gross average monthly wages and salaries, BYR thous.		Ratio of nominal gross average monthly wages and salaries to average country wage level in 2012, percent
	2011	2012	2011	2012	
manufacture of optical instruments and equipment for measuring and checking	225	224	1 997,7	6 617,5	180,4
repair and maintenance of instruments, appliances and equipment for measuring and checking	810	713	1 312,3	4 320,7	117,8
assembly of industrial process control equipment	318	360	1 531,3	4 548,5	124,0
maintenance and repair of office and computing machinery	2 446	2 711	1 067,8	2 900,9	79,1
other computer-related activities	896	803	1 359,8	3 885,0	105,9
<b>Sale, renting and servicing of equipment</b>					
wholesale of radio and television apparatus	814	438	1 216,8	3 025,7	82,5
wholesale of computers and peripherals	1 784	2 141	1 026,3	3 391,4	92,5
wholesale of office machinery and equipment	896	891	931,6	2 887,8	78,7
wholesale of other electronic components and equipment	585	1 051	1 089,6	3 220,0	87,8
renting of office machinery and equipment, including computing machinery	63	37	1 162,3	1 622,3	44,2
hardware consultancy	81	55	1 116,4	4 477,5	122,1
<b>Telecommunication services</b>					
telecommunications	33 297	30 302	1 801,3	4 694,2	128,0
<b>IT products and services</b>					
software publishing	122	248	1 830,1	4 822,1	131,5
software design and related consultancy	16 105	22 701	2 586,3	9 581,2	261,2
data processing	1 766	1 742	1 640,8	3 807,8	103,8
database activities	2 423	2 394	1 948,3	5 843,8	159,3

**2.2. Average annual payroll number of employees in ICT sector  
by regions and Minsk city**

(persons)

	2010			2012		
	total	of which employed in		total	of which employed in	
		small entities	micro-entities		small entities	micro-entities
Republic of Belarus	91 041	15 510	10 747	92 649	16 107	12 285
Region:						
Brest	6 656	878	635	7 091	718	664
Vitebsk	13 571	948	626	11 649	1 049	645
Gomel	8 972	990	1 011	8 586	862	1 032
Grodno	5 095	529	589	4 969	530	585
Minsk city	47 395	10 701	6 642	51 529	11 379	7 989
Minsk	5 086	902	690	4 577	880	765
Mogilev	4 266	562	554	4 248	689	605

**2.3. Payroll number of employees in ICT sector by educational attainment,  
by regions and Minsk city<sup>1)</sup>**

(end of 2012; percent of total)

	Total employees	Of which with completed education				
		higher	secondary specialised	vocational- technical	general secondary	general basic (including general primary)
Republic of Belarus	100	50,9	18,4	11,7	18,2	0,8
Region:						
Brest	100	34,0	25,1	16,8	22,8	1,3
Vitebsk	100	28,1	29,3	19,0	22,7	0,9
Gomel	100	38,1	22,4	16,6	21,8	1,1
Grodno	100	37,2	24,7	12,8	24,7	0,6
Minsk city	100	64,6	11,9	7,6	15,2	0,7
Minsk	100	34,8	28,3	14,8	21,7	0,4
Mogilev	100	40,3	27,8	17,2	14,3	0,4

<sup>1)</sup> Excluding micro-entities.

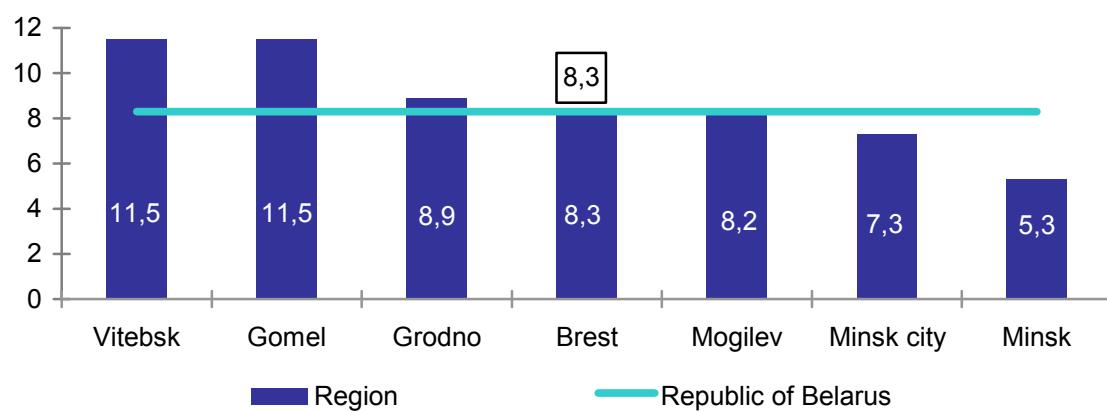
## 2.4. Professional training of employees of ICT sector by regions and Minsk city in 2012<sup>1)</sup>

(persons)

	Total staff trained	Of which in educational programmes			
		skills upgrading	internships for managers and specialists	re-training	vocational training of manual/ non-manual workers
Republic of Belarus	6 922	5 527	122	824	449
Region:					
Brest	543	400	8	88	47
Vitebsk	1 267	759	17	344	147
Gomel	892	662	16	120	94
Grodno	398	261	21	34	82
Minsk city	3 312	2 952	57	224	79
Minsk	202	198	3	1	-
Mogilev	308	295	-	13	-

## 2.5. Share of employees of ICT sector who completed professional training by regions and Minsk city in 2012<sup>1)</sup>

(percent of total employees in ICT sector)

<sup>1)</sup> Excluding micro-entities.

### 3. INVESTMENT

#### 3.1. Fixed capital investment in ICT sector

	Fixed capital investment, BYR bn	Percent of total fixed capital investment	Percent of previous year, at constant prices
2009	1 338,3	3,1	89,6
2010	1 720,5	3,1	116,6
2011	2 961,7	3,0	113,9
2012	3 110,3	2,0	59,3

#### 3.2. Fixed capital investment in ICT sector by source of funding in 2012

(at actual prices; BYR million)

	Fixed capital investment	Of which by source of funding		
		own funds of organisations	budgetary funds	foreign sources
Total for ICT sector	3 110 344	2 269 771	46 523	713 234
<b>Manufacture, installation and maintenance of equipment</b>				
manufacture of office equipment (without installation)	6	6	–	–
manufacture of insulated wire and cable	158 196	89 294	306	885
manufacture of electronic computing machines and other data processing equipment (without installation)	11 906	11 117	477	–
installation and adjustment of electronic computing machines and other data processing equipment	13	13	–	–
manufacture of electronic and radio components	57 323	40 324	4 905	11 311
manufacture of television and radio apparatus for industrial use	8 922	8 922	–	–
manufacture of apparatus for line telephony and telegraphy	26 553	15 526	7 755	–
assembly, adjustment, repair and maintenance of transmission apparatus	4 490	4 372	–	–
manufacture of sound or video receiving, recording and reproducing apparatus	13 388	12 432	912	–

INVESTMENT

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Continued

	Fixed capital investment	Of which by source of funding		
		own funds of organisations	budgetary funds	foreign sources
manufacture of instruments and appliances for measuring and checking	35 658	28 177	2 727	–
manufacture of optical instruments and equipment for measuring and checking	5 424	3 903	1 521	–
repair and maintenance of instruments, appliances and equipment for measuring and checking	4 143	3 779	–	–
assembly of industrial process control equipment	1 262	1 262	–	–
maintenance and repair of office and computing machinery	21 201	21 201	–	–
other computer-related activities	756	756	–	–
<b>Sale, renting and servicing of equipment</b>				
wholesale of radio and television apparatus	3 293	3 293	–	–
wholesale of computers and peripherals	12 767	12 767	–	–
wholesale of office machinery and equipment	3 437	3 026	–	–
wholesale of other electronic components and equipment	5 733	5 321	–	–
renting of office machinery and equipment, including computing machinery	19 480	19 480	–	–
hardware consultancy	44	44	–	–
<b>Telecommunication services</b>				
telecommunications	2 472 944	1 771 062	26 157	674 343
<b>IT products and services</b>				
software publishing	1 502	1 502	–	–
software design and related consultancy	148 725	137 131	–	10 625
data processing	71 951	71 951	–	–
database activities	21 227	3 110	1 763	16 070

### 3.3. Fixed capital investment in ICT sector by economic activity

(at actual prices; BYR million)

	2009	2010	2011	2012
Fixed capital investment used – total	1 338 321	1 720 539	2 961 744	3 110 344
of which by economic activity:				
manufacture, installation and maintenance of equipment	97 257	124 908	226 552	349 241
sale, renting and servicing of equipment	15 980	7 514	25 336	44 754
telecommunication services	1 181 824	1 532 227	2 624 656	2 472 944
IT products and services	43 260	55 890	85 200	243 405
Percentage share of fixed capital investment in ICT sector in total fixed capital investment	3,1	3,1	3,0	2,0

### 3.4. Structure of fixed capital investment in ICT sector by economic activity

(percent of total)

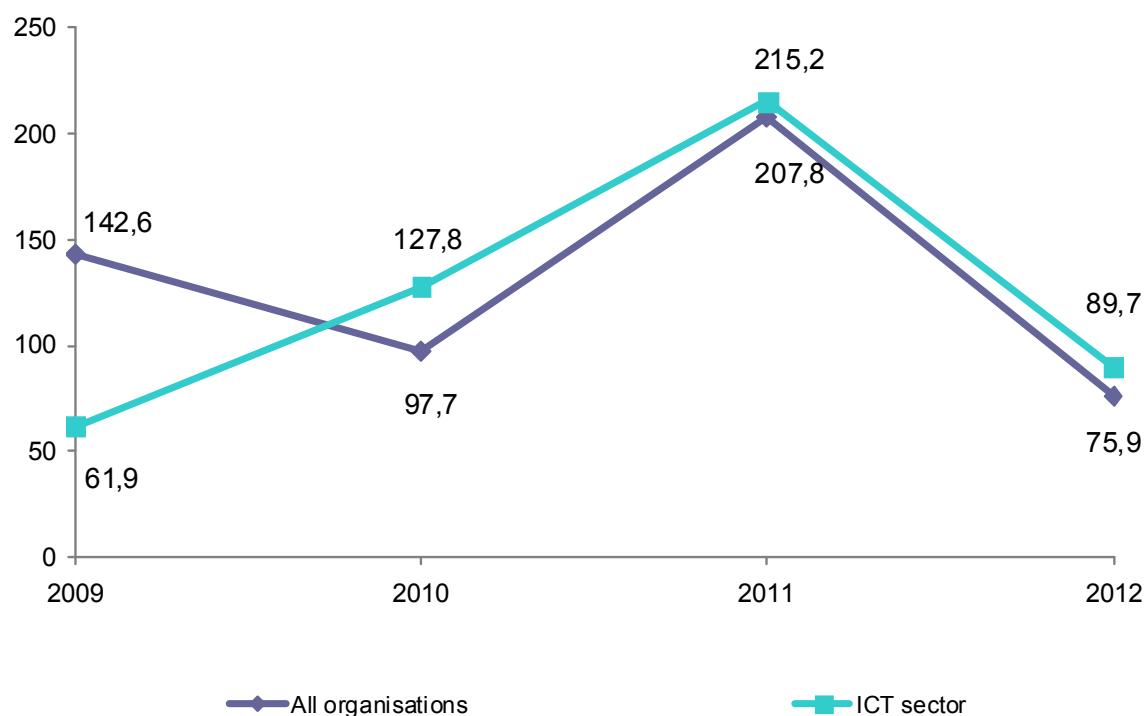
	2009	2010	2011	2012
Fixed capital investment used – total	100	100	100	100
of which by economic activity:				
manufacture, installation and maintenance of equipment	7,3	7,3	7,6	11,2
sale, renting and servicing of equipment	1,2	0,4	0,9	1,5
telecommunication services	88,3	89,1	88,6	79,5
IT products and services	3,2	3,2	2,9	7,8

### 3.5. Foreign investment in ICT sector

	Foreign investment in ICT sector, US\$ thousand	Percentage share of foreign investment in ICT sector in total foreign investment
2009	183 609,2	2,0
2010	234 618,9	2,6
2011	505 017,1	2,7
2012	452 897,9	3,2

### 3.6. Foreign investment

(percent of previous year)



### 3.7. Foreign investment in ICT sector by economic activity

(US\$ thousand)

	2009	2010	2011	2012
Total for ICT sector	183 609,2	234 618,9	505 017,1	452 897,9
<b>Manufacture, installation and maintenance of equipment</b>				
manufacture of insulated wire and cable	2 587,2	47,2	7 078,2	7 163,5
manufacture of electronic computing machines and other data processing equipment (without installation)	2 004,7	2 073,5	5 583,0	1 478,4
installation and adjustment of electronic computing machines and other data processing equipment	175,9	18,0	-	-
manufacture of electronic and radio components	3 736,9	0,9	795,3	6 510,2
manufacture of television and radio apparatus for industrial use	-	-	54,1	115,3
manufacture of apparatus for line telephony and telegraphy	-	-	3,2	17,8
assembly, adjustment, repair and maintenance of transmission apparatus	877,6	2 221,3	3 618,6	4 635,8
manufacture of sound or video receiving, recording and reproducing apparatus	-	1 253,5	168,2	70,3
manufacture of instruments and appliances for measuring and checking	216,5	532,6	2 026,9	2 777,3
manufacture of optical instruments and equipment for measuring and checking	-	-	502,9	316,5

INVESTMENT

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Continued

	2009	2010	2011	2012
repair and maintenance of instruments, appliances and equipment for measuring and checking	25,0	-	33,3	1,8
assembly of industrial process control equipment	-	15,0	205,7	79,7
maintenance and repair of office and computing machinery	573,6	162,1	1 777,6	1 719,2
other computer-related activities	616,1	29,9	543,0	1 817,9
<b>Sale, renting and servicing of equipment</b>				
wholesale of radio and television apparatus	1 530,0	1 478,6	4 113,8	3 812,8
wholesale of computers and peripherals	2 128,9	1 816,9	5 505,7	24 217,8
wholesale of office machinery and equipment	3 882,5	7 216,9	4 023,2	3 098,2
wholesale of other electronic components and equipment	266,7	4 541,9	399,9	1 778,5
renting of office machinery and equipment, including computing machinery	159,9	2,9	-	-
hardware consultancy	12,7	176,9	241,0	149,5
<b>Telecommunication services</b>				
telecommunications	153 864,9	202 764,9	407 691,5	303 574,3
<b>IT products and services</b>				
software publishing	132,4	378,7	313,3	105,9
software design and related consultancy	3 560,1	4 829,4	57 471,9	88 299,7
data processing	1 549,1	208,2	1 733,7	768,3
database activities	5 708,5	4 849,6	1 133,1	389,2

## 4. USE OF INFORMATION AND COMMUNICATION TECHNOLOGY IN ICT SECTOR

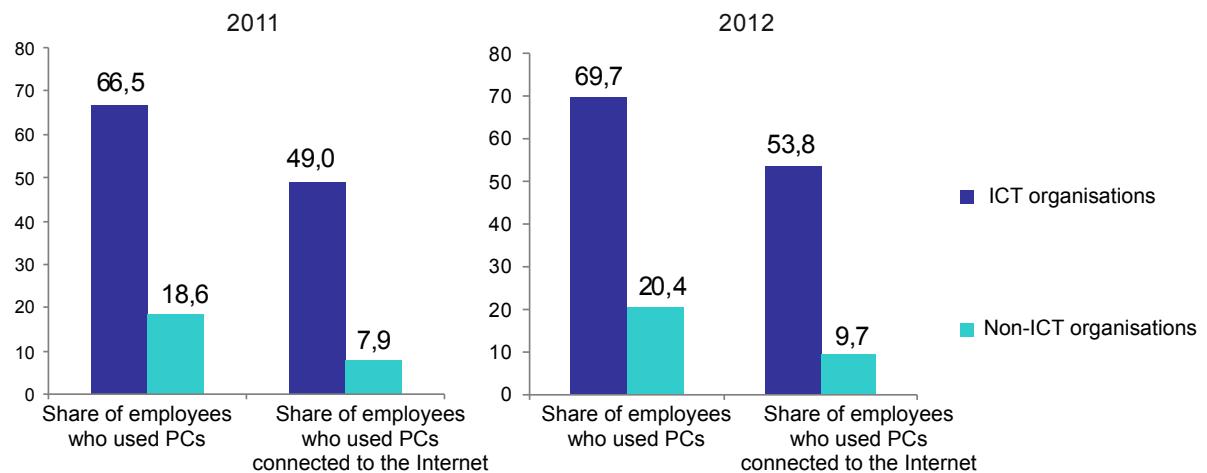
### 4.1. Organisations by type of Internet access

(percent of total organisations with Internet access)

	ICT organisations		Non-ICT organisations	
	2011	2012	2011	2012
Use Internet via:				
dial-up access	23,1	23,0	32,9	30,2
fixed broadband access	82,0	81,4	85,0	87,7
of which:				
subscriber communication lines	60,4	57,4	71,4	72,6
fibre-optic links	13,2	17,0	8,6	11,3
cable connection	16,9	16,8	15,5	18,4
wireless access	17,6	19,2	17,7	22,7
of which broadband access	9,2	9,9	9,6	12,4

### 4.2. Share of employees who used personal computers

(percent of total employees)



### **4.3. Use of electronic documentation management system in organisations by regions and Minsk city in 2012**

(percent of total organisations surveyed)

	ICT organisations	Non-ICT organisations
Republic of Belarus	17,2	14,2
Region:		
Brest	2,2	7,8
Vitebsk	6,3	14,3
Gomel	8,2	10,3
Grodno	1,8	5,5
Minsk city	27,8	37,2
Minsk	0,5	2,6
Mogilev	-	7,9

### **4.4. Self-manufactured products shipped, works performed and services provided by ICT organisations and costs of production of goods (works, services)**

(at actual selling prices)

	2009		2011		2012	
	BYR bn	% of total	BYR bn	% of total	BYR bn	% of total
ICT-related self-manufactured products shipped, works performed and services provided without subcontracting	5 266	100	11 496	100	22 022	100
of which:						
hardware	1 170	22,2	3 627	31,6	6 279	28,5
software	245	4,7	799	6,9	1 491	6,8
consultancy related to acquisition, installation and operation of hardware	6	0,1	45	0,4	42	0,2
software maintenance and consultancy	131	2,5	298	2,6	646	2,9
consultancy on information support and data processing; data origination and entry services	88	1,6	192	1,7	285	1,3
development of automated information systems, systems for scientific research, design and control systems on the basis of databases, system software and applications	272	5,2	839	7,3	1 649	7,5

Continued

	2009		2011		2012	
	BYR bn	% of total	BYR bn	% of total	BYR bn	% of total
maintenance and repair of office machinery, electronic computing machines, of peripherals and network equipment used with them	93	1,8	212	1,8	382	1,7
electronic information services	40	0,7	56	0,5	70	0,3
telecommunication services	...	...	...	...	7 302	33,2
telematic and data transmission services	1 660	31,5	1 365	11,9	1 984	9,0
training in ICT	3	0,1	2	0,0	7	0,0
other ICT-related services	1 558	29,6	4 061	35,3	3 868	17,6
Costs of production of goods (works, services)	5 277	x	10 898	x	18 698	x

**4.5. Sold goods of non-own production of ICT sector**

(at actual selling prices)

	2009		2011		2012	
	BYR bn	as % of total	BYR bn	as % of total	BYR bn	as % of total
ICT-related goods of non-own production sold	1 091	100	1 786	100	5 610	100
of which:						
hardware	1 056	96,8	1 701	95,2	5 400	96,3
software	35	3,2	85	4,8	210	3,7

#### 4.6. Expenditure on research and development by economic activity

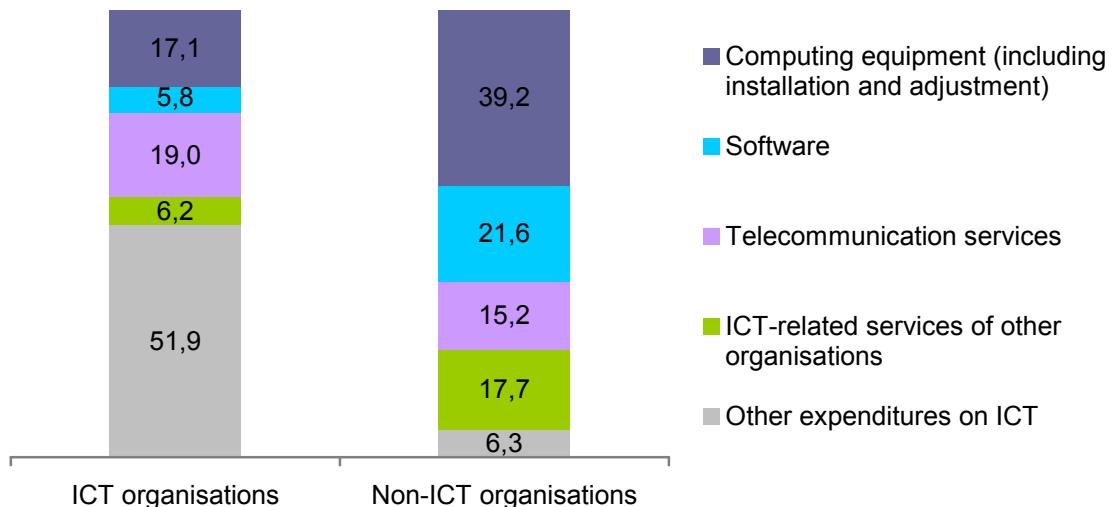
	2011 total, BYR mln	2012		
		total, BYR mln	% of total	Percentage share of R&D expenditure in total expenditure on production of goods (works, services)
R&D expenditure – total	68 932	131 079	100	0,7
of which:				
manufacture of electronic and radio components	41 004	57 006	43,5	7,6
manufacture of television and radio apparatus for industrial use	1 068	910	0,7	0,7
manufacture of apparatus for line telephony and telegraphy	5 020	10 856	8,3	3,5
assembly, adjustment, repair and maintenance of transmission apparatus	137	291	0,2	0,3
manufacture of sound or video receiving, recording and reproducing apparatus	3 738	6 338	4,8	0,4
manufacture of instruments and appliances for measuring and checking	2 499	6 979	5,3	1,2
telecommunications	...	2 755	2,1	0,0
software publishing	260	520	0,4	1,5
software design and related consultancy	7 682	42 215	32,2	1,4
database activities	656	2 130	1,6	1,0
maintenance and repair of office machinery and computing equipment	431	39	0,0	0,0
other computer related activities	4	504	0,4	0,5

#### **4.7. Expenditure of ICT sector on information and communication technology**

	2009		2011		2012	
	BYR mln	% of total	BYR mln	% of total	BYR mln	% of total
Total	343 028	100	1 245 682	100	1 417 253	100
of which on:						
computing equipment (including installation and adjustment)	56 227	16,4	519 728	41,7	243 099	17,1
of which produced in the Republic of Belarus	...	...	274 811	22,1	68 596	4,8
software	18 033	5,3	53 242	4,3	81 950	5,8
of which designed in the Republic of Belarus	...	...	8 602	0,7	41 857	3,0
telecommunication services	84 100	24,5	219 146	17,6	268 661	19,0
of which Internet access	33 527	9,8	29 596	2,4	54 167	3,8
training of employees related to development and use of ICT	2 148	0,6	4 251	0,3	7 280	0,5
ICT-related services of other organisations	41 060	12,0	53 239	4,3	87 224	6,2
of which on:						
custom software	...	...	...	...	20 605	1,5
of which design in the Republic of Belarus	...	...	...	...	14 801	1,0
services of data origination and entry	...	...	...	...	10 801	0,8
other expenditures on ICT	141 460	41,2	396 076	31,8	729 039	51,4

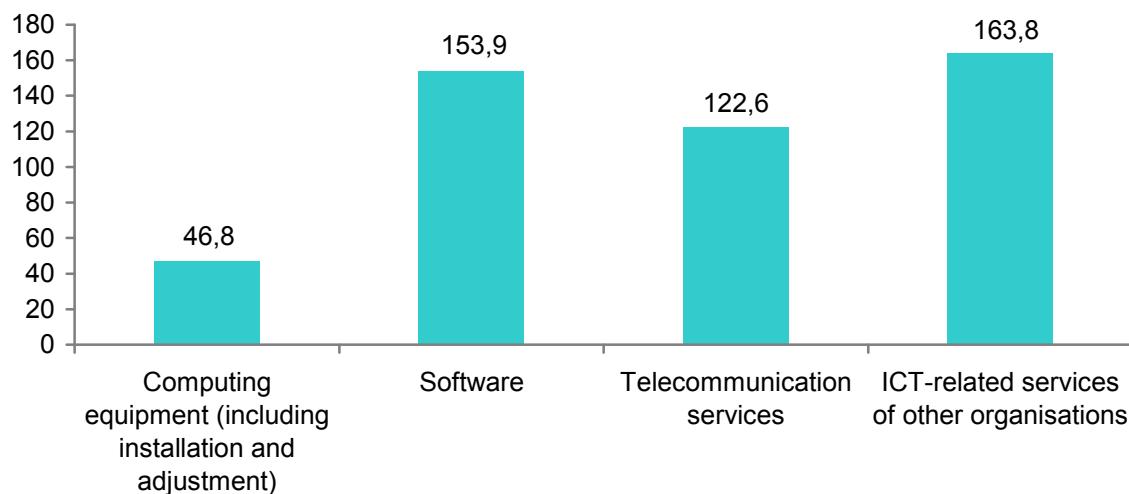
#### 4.8. Structure of expenditures of organizations on information and communication technology in 2012

(percent of total)



#### 4.9. Expenditures of organisations on information and communication technology in 2012

(percent of previous year)



## 5. PRODUCTION, EXPORT AND IMPORT

### 5.1. Manufacture of ICT goods

	2011	2012
Portable digital computing machines of a weight of less than 10 kg (laptops, notebooks, organisers, etc.), units	9 927	12 794
Digital computing machines containing a central processing unit and an input-output unit in one casing, combined or placed in separate blocks, units	76 394	104 484
Telephone and videophone apparatus, units	84 625	69 068
Television apparatus, units	403 900	594 475
Video recording or reproducing apparatus, combined for recording and reproduction, including the apparatus using laser digital disks, units	194 682	105 365

### 5.2. Manufacture of products (works, services) in ICT sector

(for principal economic activity; at actual prices; BYR million)

	2009	2010	2011	2012
Manufacture of office equipment (without installation)	390	269	1 978	4 132
Installation and adjustment of office equipment	1 261	2 322	1 885	4 773
Manufacture of electronic computing machines and other data processing equipment (without installation)	219 736	330 357	524 307	771 087
Installation and adjustment of electronic computing machines and other data processing equipment	8 994	6 374	7 863	14 609
Manufacture of insulated wire and cable	460 680	790 595	1 700 032	2 595 586
Manufacture of electronic and radio components	235 983	306 191	555 136	1 150 922
Manufacture of television and radio apparatus for industrial use	32 365	34 696	99 148	217 951
Manufacture of apparatus for line telephony and telegraphy	209 209	306 888	306 287	556 139
Assembly, adjustment, repair and maintenance of transmission apparatus	50 347	73 051	133 097	232 410

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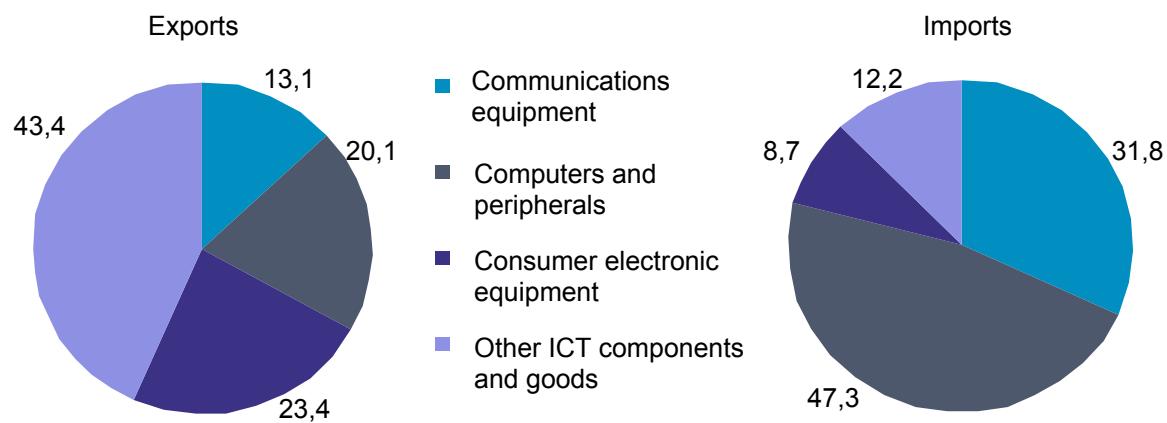
	2009	2010	2011	2012
Manufacture of sound or video receiving, recording and reproducing apparatus	163 483	256 560	676 046	1 740 662
Manufacture of instruments and appliances for measuring and checking	254 013	368 278	604 556	1 049 592
Manufacture of optical instruments and equipment for measuring and checking	15 705	18 795	48 281	73 892
Repair and maintenance of instruments, appliances and equipment for measuring and checking	35 528	30 412	64 244	129 637
Assembly of industrial process control equipment	17 587	27 477	47 847	104 725
Wholesale of radio and television apparatus	49 477	46 424	66 441	83 160
Wholesale of computers and peripherals	80 306	117 801	365 723	666 473
Wholesale of office machinery and equipment	52 886	47 320	115 114	172 335
Wholesale of other electronic components and equipment	25 592	34 910	98 255	216 769
Telecommunications	4 430 890	5 147 002	6 849 099	11 228 493
Renting of office machinery and equipment, including computing machinery	1 412	2 773	2 251	2 568
Hardware consultancy	2 515	2 723	6 855	13 990
Software publishing	26 126	29 508	63 188	109 232
Software design and related consultancy	693 950	995 534	2 101 305	4 982 793
Data processing	81 479	96 824	155 869	287 853
Database activities	93 020	126 425	196 717	347 667
Maintenance and repair of office machinery and computing equipment	76 902	106 535	245 476	334 973
Other computer related activities	33 853	47 391	52 503	123 799

### 5.3. Commodity exports and imports of ICT sector

	2009		2010		2011		2012	
	exports	imports	exports	imports	exports	imports	exports	imports
Total – US\$ mln	104,4	530,3	158,5	845,5	176,4	759,2	81,8	773,3
of which:								
communications equipment	3,0	164,5	5,2	293,7	10,8	230,3	10,7	245,8
computers and peripherals	16,0	207,2	30,3	279,4	13,5	232,9	16,4	365,6
consumer electronic equipment	16,7	82,2	31,0	159,9	62,7	150,9	19,2	67,4
other ICT components and goods	68,8	76,4	92,0	112,5	89,3	145,1	35,5	94,5
Percentage share of ICT goods in total commodity exports and imports	0,5	1,9	0,6	2,4	0,4	1,7	0,2	1,7

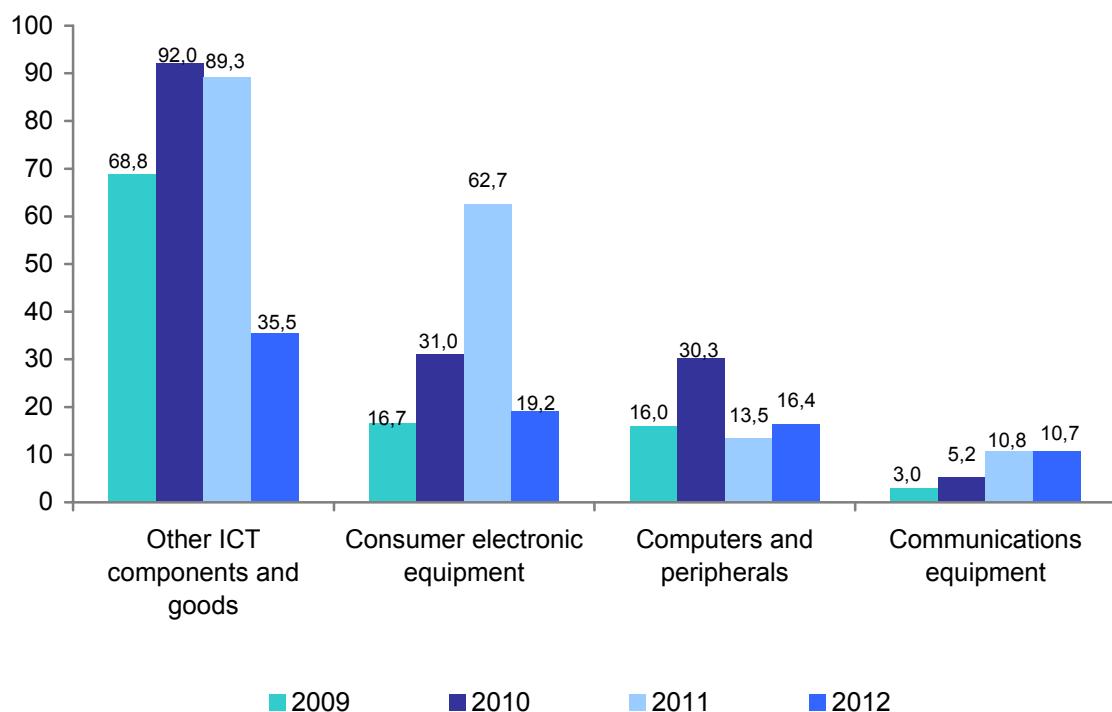
### 5.4. Structure of commodity exports and imports of ICT sector in 2012

(percent of total)



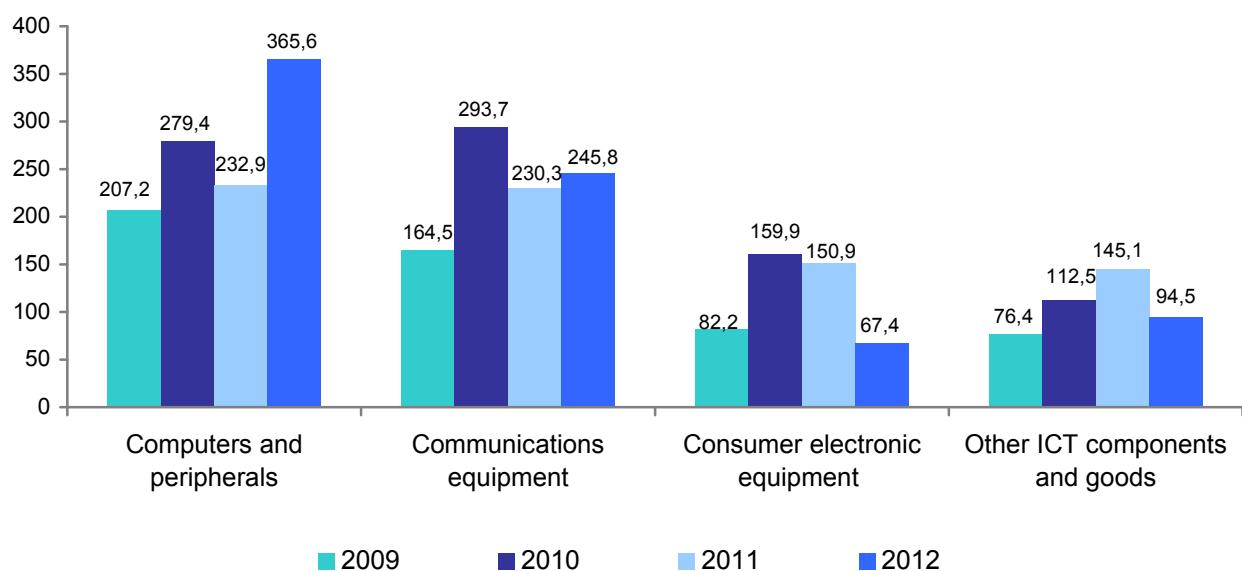
## 5.5. Commodity exports of ICT sector

(US\$ million)



## 5.6. Commodity imports of ICT sector

(US\$ million)



**5.7. Commodity exports of ICT sector  
by selected countries**

(US\$ thousand)

	2009	2010	2011	2012
Communications equipment	2 953,2	5 178,3	10 815,9	10 730,7
China	279,5	139,1	1,9	1,1
Kazakhstan	44,0	138,0	63,0	147,1
Latvia	1,3	11,0	8,0	4,1
Lithuania	29,8	34,5	73,5	4 928,7
Netherlands	134,6	175,6	81,1	100,0
Russia	2 296,4	3 334,6	7 903,2	4 618,3
Ukraine	16,0	54,0	10,3	5,5
Computers and peripherals	15 957,2	30 292,1	13 539,1	16 422,9
Georgia	16,5	217,2	65,9	116,6
Netherlands	241,6	412,1	333,7	62,0
Russia	7 659,7	11 058,6	10 777,6	14 133,0
Venezuela, Bolivarian Republic of	7 276,2	17 494,4	–	20,9
Consumer electronic equipment	16 710,3	30 975,2	62 726,9	19 172,6
Kazakhstan	2,7	5,0	407,9	191,8
Lithuania	28,9	59,5	40,4	319,2
Russia	15 958,7	30 025,6	61 201,3	17 536,6
Ukraine	396,0	429,0	270,3	5,6
Other ICT components and goods	68 768,8	92 009,8	89 294,8	35 451,2
China	10 072,8	11 067,3	6 464,6	609,8
Hong Kong	3 923,0	6 612,0	8 641,0	561,9
Japan	1 278,5	833,9	703,5	758,9
Korea, Republic of	5 684,4	7 202,2	5 402,7	710,5
Russia	37 070,2	56 237,3	56 818,6	26 267,9
United Kingdom	976,9	594,7	859,2	1 070,7

**5.8. Commodity imports of ICT sector  
by selected countries**

(US\$ thousand)

	2009	2010	2011	2012
Communications equipment	164 467,8	293 682,4	230 336,6	245 777,9
China	86 432,5	155 729,5	128 395,9	96 860,0
Germany	10 781,7	8 624,8	6 178,6	3 793,3
Hungary	8 791,9	10 753,9	8 742,5	2 047,2
Israel	782,2	1 857,8	879,9	1 455,0
Korea, Republic of	5 553,1	9 761,6	5 068,4	1 247,3
Malaysia	3 898,5	5 939,1	2 992,9	3 124,4
Romania	4 838,3	13 112,6	5 741,9	74,5
Russia	10 155,1	13 061,3	9 790,4	102 786,7
Thailand	451,5	1 222,2	765,6	871,5
Sweden	11 898,4	11 109,7	7 470,3	3 125,2
Switzerland	1 423,9	3 949,8	2 401,4	365,4
Ukraine	373,6	724,4	4 016,2	1 055,7
United States	2 428,1	6 792,3	5 293,2	9 864,1
Computers and peripherals	207 227,5	279 400,2	232 886,2	365 592,1
China	109 421,5	158 947,7	135 671,7	169 879,0
Czech Republic	7 104,9	11 766,2	17 765,2	29 862,1
Germany	11 206,9	11 446,9	7 027,2	10 061,7
Ireland	4 417,7	3 877,9	3 301,1	1 310,3
Malaysia	14 320,0	12 533,6	6 980,7	7 451,2
Mexico	951,6	1 543,9	1 111,5	826,3
Russia	8 445,3	12 145,6	13 192,5	72 639,7
Taiwan (China)	6 763,5	11 464,5	8 396,0	10 141,1
United Kingdom	5 825,4	7 421,2	1 867,1	1 270,7
United States	7 535,0	7 378,6	4 802,6	8 396,4
Consumer electronic equipment	82 160,1	159 938,3	150 866,9	67 448,1
China	37 105,7	63 433,5	57 698,5	23 100,1
Czech Republic	2 442,4	4 641,2	4 233,3	337,3
Germany	4 051,7	2 640,8	3 626,0	2 403,0
Hungary	2 532,0	2 570,1	710,4	219,5
Indonesia	930,2	2 386,1	824,0	492,0

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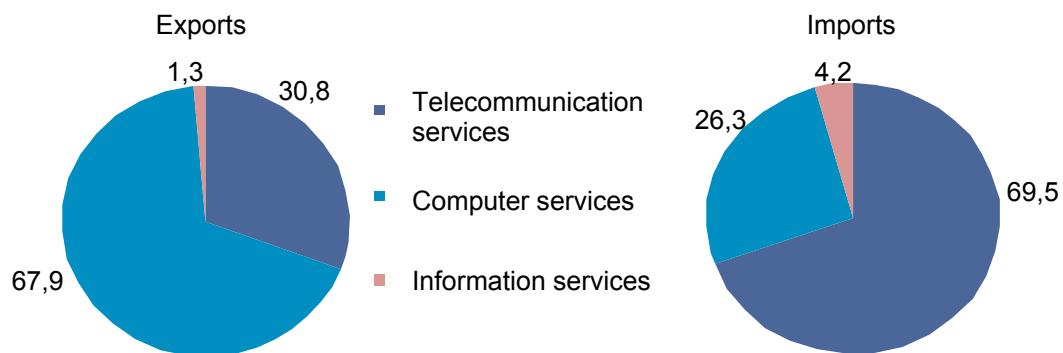
	2009	2010	2011	2012
Japan	3 528,4	5 174,3	3 614,5	1 890,9
Korea, Republic of	3 245,3	3 784,3	3 274,9	2 002,8
Malaysia	1 576,7	6 578,9	3 326,7	1 082,0
Poland	3 275,7	5 449,0	6 426,3	305,4
Russia	13 364,6	45 097,4	56 226,2	26 270,6
Other ICT components and goods	76 410,9	112 527,9	145 078,8	94 465,3
China	15 524,0	30 335,9	45 856,8	19 605,0
Germany	2 714,9	3 247,9	3 660,8	1 717,1
Korea, Republic of	2 067,6	1 749,8	2 109,4	445,4
Malaysia	3 889,4	6 621,0	3 747,1	879,4
Poland	1 723,2	1 034,4	20 846,5	856,1
Russia	33 438,4	36 981,9	43 336,7	53 515,1
Taiwan (China)	2 628,9	3 267,5	4 848,6	739,5
Ukraine	1 743,0	5 686,8	1 278,7	8 108,9
United States	2 447,1	2 744,3	5 597,8	1 480,2

### 5.9. Exports and imports of services of ICT sector

	2009		2010		2011		2012	
	exports	imports	exports	imports	exports	imports	exports	imports
Total, US\$ mln	307,5	118,7	388,7	138,7	456,4	180,2	592,2	206,4
of which:								
telecommunication services	148,4	76,6	167,2	88,1	177,3	127,8	182,3	143,5
computer services	155,9	37,5	217,0	43,2	272,7	46,2	402,1	54,3
information services	3,2	4,6	4,5	7,4	6,4	6,2	7,8	8,6
Percentage share of ICT sector in total exports and imports of services	9,3	7,1	8,9	5,7	9,0	6,3	10,6	6,1

## 5.10. Structure of exports and imports of services of ICT sector in 2012

(percent of total)



## 5.11. Exports of services of ICT sector by selected countries

(US\$ thousand)

	2009	2010	2011	2012
Telecommunication services	148 370,7	167 166,8	177 305,5	182 305,3
Austria	3 195,5	4 256,8	1 647,3	1 500,4
Belgium	800,3	924,6	1 875,4	2 088,3
Canada	1 597,7	2 905,8	1 746,2	1 054,3
Cyprus	204,0	150,6	1 184,1	974,8
Czech Republic	1 394,9	2 191,7	1 438,3	1 110,7
Georgia	224,3	606,3	1 622,3	244,6
Germany	4 917,9	5 811,9	5 650,4	5 674,8
Israel	1 767,1	1 190,9	1 438,3	989,8
Italy	3 898,7	4 452,2	2 633,3	3 229,4
Spain	191,0	538,0	4 035,7	4 807,7
Latvia	1 635,6	1 483,9	944,7	1 024,6
Lithuania	3 529,5	5 223,7	2 289,8	2 601,3
Netherlands	2 603,0	1 909,7	2 025,2	3 545,0
Poland	6 847,5	9 329,7	3 933,8	6 248,4
Russia	83 932,0	96 504,2	119 210,3	121 422,1
Sweden	2 583,1	3 461,8	2 601,1	2 279,9
Ukraine	10 548,8	8 622,8	8 064,6	7 006,9
United Kingdom	1 212,6	835,0	3 619,6	3 559,9
United States	8 717,8	8 984,3	3 805,0	5 481,3

Continued

	2009	2010	2011	2012
Computer services	155 895,9	217 017,7	272 710,7	402 143,2
Cyprus	13 187,3	14 724,5	16 898,8	50 412,3
Czech Republic	3 682,7	5 109,3	8 066,3	8 551,8
Denmark	488,5	1 136,0	3 168,2	5 374,3
Finland	591,8	907,2	2 293,6	4 870,0
France	2 033,5	1 911,2	3 349,4	3 971,1
Germany	16 703,3	19 327,4	23 718,5	27 713,6
Israel	87,2	1 567,0	2 114,2	2 546,9
Kazakhstan	2 944,2	2 904,0	2 185,6	2 934,9
Latvia	1 348,7	1 204,4	2 554,4	2 278,5
Luxembourg	1 119,1	508,2	2 187,1	3 679,9
Netherlands	2 331,1	3 443,5	3 831,3	3 492,2
Poland	1 221,4	1 802,7	2 388,7	3 345,5
Russia	32 249,1	41 249,1	44 374,2	65 706,8
Sweden	1 375,9	1 288,0	1 926,0	1 781,9
Switzerland	1 142,2	1 902,2	2 506,3	3 640,3
United Kingdom	9 160,7	19 346,2	22 027,6	25 781,5
United States	53 777,9	83 257,0	110 371,1	163 690,9
Information services	3 247,3	4 489,4	6 392,3	7 775,8
Austria	120,9	110,3	175,0	200,7
Finland	14,9	250,0	131,9	-
Germany	150,0	218,5	281,9	432,6
Lithuania	69,8	104,4	164,9	555,3
Poland	158,9	97,2	165,7	383,1
Russia	1 682,0	2 424,4	3 851,6	4 460,9
Switzerland	68,8	113,8	190,8	174,1
United States	321,1	355,4	392,9	363,5
Virgin Islands, British	71,7	57,5	365,1	426,6

## 5.12. Imports of services of ICT sector by selected countries

(US\$ thousand)

	2009	2010	2011	2012
Telecommunication services	76 584,8	88 103,9	127 833,2	143 517,2
Austria	1 448,7	1 161,8	1 566,5	1 130,6
Belgium	1 716,5	1 440,4	1 491,8	1 608,3
Bulgaria	586,4	608,0	623,6	1 452,2
Canada	152,5	177,8	1 626,1	1 558,9
Czech Republic	682,7	667,5	661,9	1 058,6
Egypt	953,4	874,6	574,2	734,4
Estonia	787,1	1 813,6	2 848,9	2 022,4

PRODUCTION, EXPORT AND IMPORT

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Continued

	2009	2010	2011	2012
France	1 247,6	1 456,1	1 360,3	2 005,3
Germany	3 052,6	2 938,4	3 125,7	4 635,9
Israel	362,4	429,2	1 298,7	1 518,9
Italy	1 989,1	1 598,6	2 201,5	2 771,2
Latvia	869,1	1 233,1	1 239,8	1 218,7
Lithuania	3 326,8	3 292,8	3 322,9	3 403,0
Netherlands	704,6	564,1	560,5	2 026,8
Poland	3 996,6	4 249,1	6 284,0	8 407,8
Russia	30 613,9	42 684,8	74 028,0	63 759,9
Spain	316,6	381,6	3 273,3	5 606,3
Switzerland	743,2	1 029,9	736,0	1 219,2
Turkey	1 547,8	883,5	952,9	1 289,9
Ukraine	11 529,0	10 251,3	9 848,5	21 329,3
United Kingdom	2 758,0	3 133,1	2 970,8	4 065,1
United States	1 634,7	1 587,9	1 669,6	2 221,1
Computer services	37 456,2	43 236,4	46 217,7	54 276,2
Austria	9 166,5	3 258,5	2 555,7	2 944,2
Cyprus	643,8	388,7	219,2	459,9
Czech Republic	2 313,3	3 825,3	3 736,6	1 434,7
Estonia	141,4	607,8	1 314,6	1 387,8
Israel	2 205,7	1 789,8	1 634,8	1 763,3
Latvia	591,0	1 163,6	1 120,3	1 076,7
Netherlands	901,9	1 944,2	1 431,7	2 351,1
Norway	-	-	2 088,1	1 789,3
Poland	1 346,0	1 021,5	876,1	1 538,7
Russia	11 810,4	12 904,7	15 953,0	19 889,5
Spain	904,6	1 489,1	1 602,4	1 869,8
Sweden	461,6	1 048,5	2 575,9	3 394,1
Ukraine	278,1	1 446,6	1 325,4	2 641,6
United Kingdom	1 182,3	2 867,4	2 328,8	2 941,9
United States	1 834,9	2 059,3	2 277,8	2 498,7
Information services	4 604,9	7 390,4	6 200,0	8 581,4
Germany	145,0	99,3	122,9	134,6
Latvia	34,9	66,9	58,8	47,6
Lithuania	244,1	405,1	302,7	350,5
Poland	75,3	43,0	19,7	21,0
Russia	1 106,5	1 599,4	1 441,9	1 989,3
Switzerland	277,7	240,9	91,3	71,4
Ukraine	96,5	111,8	42,5	157,6
United Kingdom	1 896,9	3 852,0	3 481,3	3 782,9
United States	420,3	596,8	491,5	536,1

**5.13. Electronic commerce**

	2010	2011	2012
Commodity (product) e-commerce of wholesale organisations, BYR mln	66 953	188 836	907 882
Retail turnover of trade via online shops, BYR mln	231 592	884 617	1 988 395
Number of online shops	1 198	1 253	1 744
Percentage share			
of commodity (product) e-commerce in total wholesale turnover	0,1	0,1	0,3
of retail turnover via online shops in retail turnover of trade	0,8	1,0	1,3

**5.14. Sale of information and communication equipment by wholesale organisations**

	2011			2012		
	total, BYR mln	of which		total, BYR mln	of which	
		domestically produced goods	% of total sales		domestically produced goods	% of total sales
Radio, television and video apparatus	831,3	121,5	14,6	1 104,2	150,3	13,6
Computers, peripherals and software	804,2	54,0	6,7	2 961,9	235,6	8,0
Office printing and computing (calculators) machinery, copying equipment	136,5	1,3	0,9	578,9	3,9	0,7
Other electronic equipment and components thereof	1 255,2	58,8	4,7	1 855,5	227,0	12,2

## 6. FINANCE

### 6.1. Main financial indicators of ICT sector

	2009	2010	2011	2012
Revenues from sales of products, goods, works and services, BYR bn	9 871,6	12 977,4	19 690,1	36 734,8
Taxes and duties payable from revenues from sales of products, goods, works and services, BYR bn	1 007,5 <sup>1)</sup>	1 388,0	1 748,6	3 208,5
Net cost of goods, products, works and services sold, BYR bn	6 688,1 <sup>2)</sup>	9 858,9	14 606,5	28 353,5
Profit, loss (-) from sales of products, goods, works and services, BYR bn	1 581,5	1 730,5	3 335,0	5 172,8
Profit, loss (-) before tax, BYR bn	1 595,6 <sup>2)</sup>	1 871,5	2 492,0	4 608,4
Net profit, net loss (-), BYR bn	1 059,9	1 354,2	1 882,0	3 839,4
Number of loss-making organisations, entities	626	579	591	618
Percentage share of loss-making organisations in total organisations, percent	23,7	20,1	19,5	18,6
Total net loss of loss-making organisations, BYR bn	225,3	265,9	1 210,6	690,9
Profitability of goods, products, works and services sold, percent	23,6	17,6	22,8	18,2
Profitability of sales, percent	16,0	13,3	16,9	14,1

<sup>1)</sup> Excluding other taxes and duties payable from the revenues from sales of products, goods, works and services of micro-entities.

<sup>2)</sup> Excluding micro-entities.

## 6.2. Financial indicators of ICT sector by economic activity in 2012

	Revenues from sales of products, goods, works and services, BYR mln	Net cost of products, goods, works and services sold, BYR mln	Profit, loss (-) from sales of products, goods, works and services, BYR mln	Profitability of products, goods, works and services sold, percent	Profitability of sales, percent
Total for ICT sector	36 734 801	28 353 517	5 172 767	18,2	14,1
<b>Manufacture, installation and maintenance of equipment</b>					
manufacture of office equipment (without installation)	7 052	5 340	491	9,2	7,0
installation and adjustment of office equipment	7 951	6 312	419	6,6	5,3
manufacture of electronic computing machines and other data processing equipment (without installation)	1 888 208	1 474 090	104 044	7,1	5,5
installation and adjustment of electronic computing machines and other data processing equipment	20 872	12 918	4 405	34,1	21,1
manufacture of insulated wire and cable	2 742 316	2 242 107	279 420	12,5	10,2
manufacture of electronic and radio components	1 156 008	885 391	234 220	26,5	20,3
manufacture of television and radio apparatus for industrial use	245 154	171 341	41 931	24,5	17,1
manufacture of apparatus for line telephony and telegraphy	721 009	551 587	56 099	10,2	7,8
assembly, adjustment, repair and maintenance of transmission apparatus	375 801	254 388	65 455	25,7	17,4
manufacture of sound or video receiving, recording and reproducing apparatus	1 798 966	1 711 909	16 403	1,0	0,9

Continued

	Revenues from sales of products, goods, works and services, BYR mln	Net cost of products, goods, works and services sold, BYR mln	Profit, loss (-) from sales of products, goods, works and services, BYR mln	Profitability of products, goods, works and services sold, percent	Profitability of sales, percent
manufacture of instruments and appliances for measuring and checking	1 251 089	861 574	240 981	28,0	19,3
manufacture of optical instruments and equipment for measuring and checking	80 717	55 343	21 237	38,4	26,3
repair and maintenance of instruments, appliances and equipment for measuring and checking	190 803	129 340	31 737	24,5	16,6
assembly of industrial process control equipment	146 036	104 156	16 354	15,7	11,2
maintenance and repair of office and computing machinery	594 906	442 636	61 287	13,8	10,3
other computer-related activities	231 979	169 683	26 226	15,5	11,3
<b>Sale, renting and servicing of equipment</b>					
wholesale of radio and television apparatus	608 362	491 217	25 144	5,1	4,1
wholesale of computers and peripherals	4 200 324	3 381 221	135 265	4,0	3,2
wholesale of office machinery and equipment	892 497	677 684	68 438	10,1	7,7
wholesale of other electronic components and equipment	1 035 739	792 836	76 013	9,6	7,3
renting of office machinery and equipment, including computing machinery	3 026	1 888	854	45,2	28,2
hardware consultancy	16 798	8 524	5 809	68,1	34,6

Continued

	Revenues from sales of products, goods, works and services, BYR mln	Net cost of products, goods, works and services sold, BYR mln	Profit, loss (-) from sales of products, goods, works and services, BYR mln	Profitability of products, goods, works and services sold, percent	Profitability of sales, percent
<b>Telecommunication services</b>					
telecommunications	12 797 034	9 667 817	2 470 907	25,6	19,3
<b>IT products and services</b>					
software publishing	148 243	112 949	14 765	13,1	10,0
software design and related consultancy	4 782 796	3 609 655	1 034 835	28,7	21,6
data processing	377 389	240 701	79 417	33,0	21,0
database activities	413 726	290 910	60 611	20,8	14,7

### 6.3. Financial and business performance in ICT sector in 2012

	Profitable organisations		Loss-making organisations	
	percentage share of profitable organisations in total organisations	total net profit, BYR mln	percentage share of loss-making organisations in total organisations	total net loss, BYR mln
Total for ICT sector	81,4	4 350 326	18,6	690 943
<b>Manufacture, installation and maintenance of equipment</b>				
manufacture of office equipment (without installation)	60,0	584	40,0	195
installation and adjustment of office equipment	72,7	357	27,3	6
manufacture of electronic computing machines and other data processing equipment (without installation)	87,5	58 348	12,5	3 672
installation and adjustment of electronic computing machinery and other data processing equipment	91,7	1 886	8,3	1
manufacture of insulated wire and cable	87,0	216 123	13,0	293
manufacture of electronic and radio components	88,0	26 312	12,0	782
manufacture of television and radio apparatus for industrial use	76,9	46 157	23,1	15 566
manufacture of apparatus for line telephony and telegraphy	81,3	45 442	18,7	1 284
assembly, adjustment, repair and maintenance of transmission apparatus	83,1	56 278	16,9	4 678

Continued

	Profitable organisations		Loss-making organisations	
	percentage share of profitable organisations in total organisations	total net profit, BYR mln	percentage share of loss-making organisations in total organisations	total net loss, BYR mln
manufacture of sound or video receiving, recording and reproducing apparatus	71,4	6 440	28,6	64 378
manufacture of instruments and appliances for measuring and checking	90,9	183 826	9,1	8 853
manufacture of optical instruments and equipment for measuring and checking	85,7	12 444	14,3	18
repair and maintenance of instruments, appliances and equipment for measuring and checking	92,6	23 354	7,4	80
assembly of industrial process control equipment	88,0	12 956	12,0	264
maintenance and repair of office and computing machinery	83,0	48 507	17,0	1 721
other computer-related machinery	80,2	14 607	19,8	1 674
<b>Sale, renting and servicing of equipment</b>				
wholesale of radio and television apparatus	76,6	13 875	23,4	3 636
wholesale of computers and peripherals	80,2	59 963	19,8	5 157
wholesale of office machinery and equipment	81,2	28 879	18,8	3 900
wholesale of other electronic components and equipment	77,0	46 573	23,0	3 152
renting of office machinery and equipment, including computing machinery	87,5	948	12,5	330
hardware consultancy	93,3	5 607	6,7	1
<b>Telecommunication services</b>				
telecommunications	86,5	2 509 338	13,5	529 728
<b>IT products and services</b>				
software publishing	77,3	14 106	22,7	354
software design and related consultancy	79,3	972 796	20,7	27 238
data processing	85,4	70 363	14,6	571
database activities	72,5	54 257	27,5	13 411

## 6.4. Status of accounts in ICT sector

(at actual prices; BYR billion)

	As of 1 January 2010	As of 1 January 2011	As of 1 January 2012	As of 1 January 2013
Accounts receivable	1 149,0	1 503,6	2 797,4	4 940,3
of which overdue	115,9	119,7	194,4	271,2
Percentage share of overdue accounts receivable in total accounts receivable	10,1	8,0	6,9	5,5
Foreign accounts receivable	189,1	306,5	989,0	1 721,3
of which overdue	34,9	31,2	70,6	40,1
Accounts payable	1 709,2	2 267,0	5 260,8	7 213,7
of which:				
on taxes, duties, social insurance and social security <sup>1)</sup>	128,4	178,0	297,7	410,5
on fuels and energy <sup>1)</sup>	5,9	10,5	13,3	40,0
Overdue accounts payable	84,0	79,7	223,3	392,2
of which:				
on taxes, duties, social insurance and social security	6,7	7,3	4,4	2,2
on fuels and energy <sup>1)</sup>	2,8	3,9	0,9	0,5
Percentage share of overdue accounts payable in total accounts payable	4,9	3,5	4,2	5,4
Foreign accounts payable	778,5	1 018,9	3 252,0	3 441,5
of which overdue	32,2	28,0	164,7	293,4
Debts under credits and loans <sup>1)</sup>	1 333,0	1 652,8	5 566,8	6 457,4
of which overdue <sup>1)</sup>	18,5	2,7	3,4	4,3

<sup>1)</sup> Excluding micro-entities and small entities without departmental affiliation.

## 7. MAIN INDICATORS OF HIGH TECHNOLOGY PARK RESIDENTS

### 7.1. Main indicators of Hi Tech Park residents

	2009	2010	2011	2012
Resident organizations, entities	78	92	102	113
as percent of ICT sector	2,5	2,7	2,9	2,9
Average annual payroll number of employees, persons	6 222	8 412	10 481	12 976
as percent of payroll number of employees in ICT sector	6,8	9,2	11,4	14,0
Nominal gross average monthly wages and salaries, BYR thous	3 001,5	3 567,8	7 747,1	13 268,9
ratio to nominal gross average monthly wages and salaries in ICT sector	в 2,3p.	в 2,1p.	в 2,7p.	в 2,4p.
ratio of nominal gross average monthly wages and salaries to average national wage level, percent	в 3,1p.	в 2,9p.	в 4,1p.	в 3,6p.
Fixed capital investment used, BYR mln	6 864	16 082	38 152	112 499
as percent of fixed capital investment in ICT sector	0,5	0,9	1,3	3,6

### 7.2. High Tech Park residents by legal organisational form

(end of year)

	Number of resident organisations				Percent of total			
	2009	2010	2011	2012	2009	2010	2011	2012
Total	78	92	102	113	100	100	100	100
of which:								
joint-stock companies	8	9	8	8	10,3	9,8	7,8	7,1
limited liability companies	44	53	63	74	56,4	57,6	61,8	65,5
superadded liability companies	3	3	3	3	3,8	3,3	2,9	2,6
unitary enterprises	23	27	28	28	29,5	29,3	27,5	24,8

### 7.3. Share of High Tech Park residents by type of Internet connection and maximum data transmission rate

(percent of total resident organisations with Internet access)

	As of 1 August 2010	As of 1 January 2012	As of 1 January 2013
Type of Internet connection			
dial-up access	16,9	11,9	15,9
fixed broadband access	90,9	96,0	97,3
wireless access	5,2	21,8	21,2
Maximum data transmission rate via Internet			
less than 256 Kbps	1,3	3,0	2,7
256 Kbps and higher	98,7	97,0	97,3

### 7.4. Expenditures of High Tech Park residents on ICT

	Total, BYR mln			Percentage share in expenditure of ICT sector		
	2009	2011	2012	2009	2011	2012
Expenditure on ICT	79 329	348 100	602 021	23,1	27,9	42,5
of which:						
computing machinery (including installation and adjustment)	5 088	90 723	66 467	9,0	17,5	27,3
of which manufactured in the Republic of Belarus	...	3 017	15 647	...	1,1	22,8
software	2 949	1 745	2 443	16,4	3,3	3,0
of which designed in the Republic of Belarus	...	530	672	...	6,2	1,6
telecommunication services	3 720	4 516	6 407	4,4	2,1	2,4
of which Internet access	2 723	2 682	3 826	8,1	9,1	7,1
training of employees in the development and use of ICT	110	1 280	2 129	5,1	30,1	29,3
ICT-related services of other organisations (except communications and training)	2 380	7 754	15 962	5,8	14,6	18,3
of which on:						
custom software	...	...	3 965	...	...	19,2
of which designed in the Republic of Belarus	...	...	3 960	...	...	26,8
data origination and entry	...	...	170	...	...	1,6
other expenditures on ICT	65 082	242 082	508 613	46,0	61,1	69,8

## 7.5. Self-manufactured products shipped, works performed and services provided by High Tech Park residents

(at actual selling prices)

	Total, BYR mln			Percentage share in products shipped in ICT sector		
	2009	2011	2012	2009	2011	2012
ICT-related self-manufactured products shipped, works performed and services provided without subcontracting	394 418	1 406 207	3 085 924	7,5	12,2	14,0
of which:						
hardware	225	—	1 325	0,0	—	0,0
software	144 338	567 564	1 159 399	59,0	71,1	77,7
consultancy on hardware acquisition, installation and operation	—	9 942	35 064	—	21,9	84,4
software maintenance and related consultancy	41 363	81 672	230 938	31,6	27,4	35,8
consultancy on information support and data processing; data origination and data entry services	1 622	32 370	78 172	1,9	16,9	27,4
development of automated information systems, systems for scientific research, design and control systems on the basis of databases, system software and applications	193 454	695 207	1 413 473	71,0	82,8	85,7
other ICT-related services	13 128	19 452	162 221	0,8	0,5	4,2

## 7.6. Sales of ICT-related goods of non-own production by High Tech Park residents

(BYR million)

	2009	2011	2012
ICT-related goods of non-own production sold	267	613	2 811
of which:			
hardware	26	—	2 807
software	241	613	4

## 7.7. Main financial indicators of Hi Tech Park residents

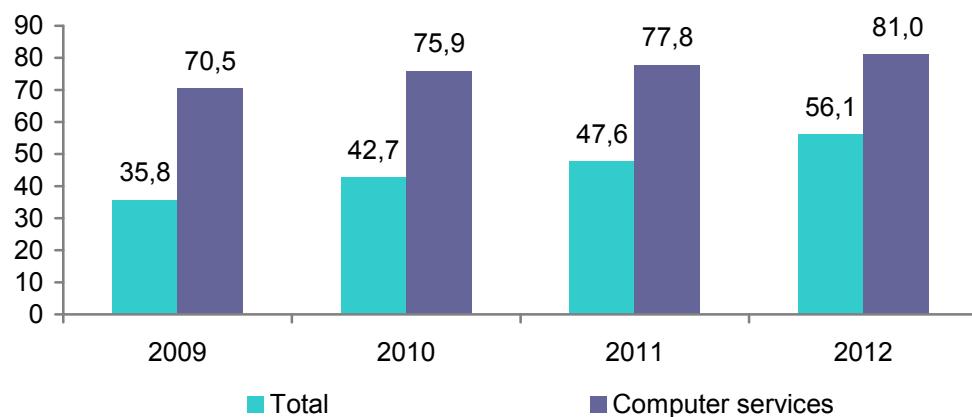
	2009	2010	2011	2012
Revenues from sales of products, goods, works and services, BYR mln	417 695	609 960	1 399 268	3 111 508
Taxes and duties payable from revenues from sales of products, goods, works and services, BYR mln	730 <sup>1)</sup>	993	998	946
Net cost of products, goods, works and services sold, BYR mln	285 629 <sup>2)</sup>	405 351	1 001 615	2 333 715
Profit, loss (-) from sales of products, goods, works and services, BYR mln	130 764	203 616	396 655	776 847
Profit, loss (-) before tax, BYR mln	107 474 <sup>2)</sup>	160 483	644 668	723 984
Net profit, net loss (-), BYR mln	102 894	153 224	636 041	715 842
Number of loss-making organisations	8	9	4	14
Percentage share of loss-making organisations in total organizations	8,7	9,3	4,0	12,4
Net loss of loss-making organisations, BYR mln	415	1 438	239	5 181
Profitability of products, goods, works and services sold, percent	45,8	50,2	39,6	33,3
Profitability of sales, percent	31,3	33,4	28,3	25,0

<sup>1)</sup> Excluding other taxes and duties payable from the revenues from sales of products, goods, works, and services of micro-entities.

<sup>2)</sup> Excluding micro-entities.

## 7.8. Share of exports of services of High Tech Park residents in total exports of services of ICT sector

(percent)



## 7.9. Exports of services by High Tech Park residents by selected countries

(US\$ thousand)

	2009	2010	2011	2012
Total	110 106,9	166 130,3	217 185,3	332 376,6
of which:				
computer services	109 888,2	164 700,8	212 276,8	325 822,8
Australia	200,7	245,2	202,7	356,7
Azerbaijan	231,8	472,1	583,4	1 178,1
Belgium	109,2	373,2	666,8	762,8
Bermudas	1 253,8	902,6	1 346,2	1 576,9
Canada	431,7	112,7	355,2	488,0
China	847,4	1 343,4	1 103,2	467,7
Cyprus	2 047,6	6 852,4	7 989,1	43 845,9
Czech Republic	3 297,8	5 046,5	6 759,6	6 774,0
Denmark	363,8	1 008,5	2 889,0	5 249,7
Estonia	369,2	44,0	100,4	79,8
Finland	575,5	902,7	2 285,8	4 686,8
France	1 669,8	1 553,9	2 905,1	3 402,6
Germany	13 923,7	16 016,0	19 203,0	23 092,3
Ireland	413,2	550,5	1 336,6	851,6
Israel	70,7	1 546,1	2 105,4	2 544,9
Kazakhstan	1 755,5	786,3	957,3	1 817,8
Latvia	201,7	801,8	1 397,4	554,2
Lithuania	114,8	282,9	323,0	451,0
Luxembourg	528,9	147,5	1 874,3	3 076,9
Montenegro	318,0	107,4	36,6	67,0
Netherlands	1 664,7	1 843,6	3 075,6	2 445,2
Poland	-	1 760,9	2 342,6	3 291,4
Russia	23 529,7	26 721,4	28 019,0	40 770,5
Seychelles	235,0	368,0	837,6	86,3
Singapore	1 846,6	1 758,7	1 810,0	1 822,4
Sweden	1 153,1	803,8	1 633,4	1 560,6
Switzerland	302,1	492,6	1 014,1	1 654,6
Ukraine	91,3	602,8	853,3	848,1
United Kingdom	5 774,0	15 489,7	18 279,5	21 341,7
United States	45 261,7	74 386,2	98 583,3	146 242,8

## 8. DEVELOPMENT OF ICT INFRASTRUCTURE

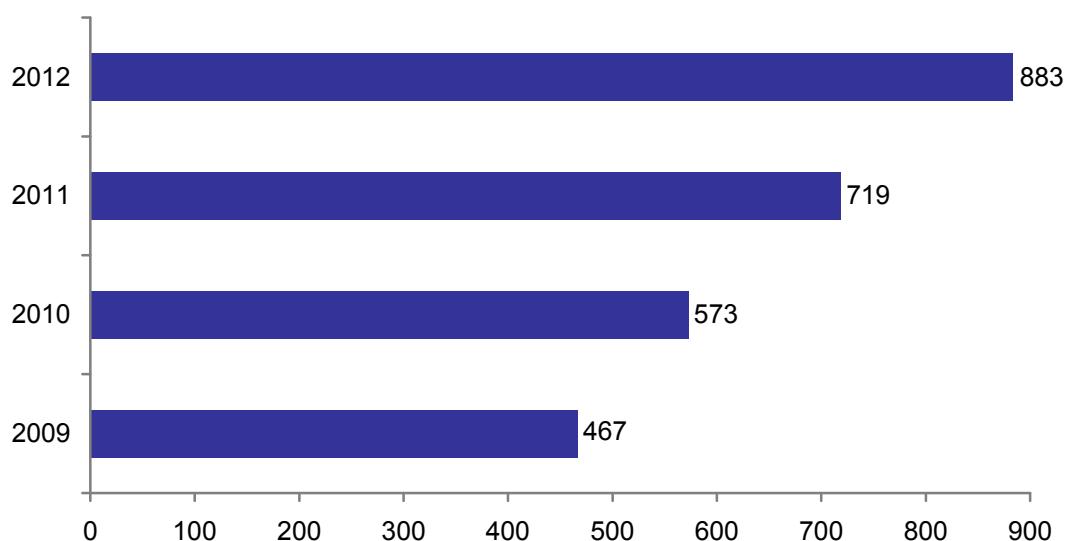
### 8.1. Indicators of data transmission network

(end of year)

	2009	2010	2011	2012
Subscribers of all types of data transmission – total, thousand	4 790,9	6 012,7	7 528,3	9 218,3
of which:				
without Internet access	354,1	580,5	723,5	857,8
with Internet access	4 436,8	5 432,2	6 804,8	8 360,5
individuals	3 985,1	4 808,8	6 062,2	7 469,3
dial-up access	495,4	348,7	143,0	88,2
fixed (anytime) access	1 047,7	1 600,7	2 020,0	2 435,4
wireless access	2 440,6	2 858,0	3 898,7	4 945,5
other access	1,4	1,4	0,5	0,2
legal entities	451,7	623,4	742,6	891,2
dial-up access	36,5	29,5	20,8	14,9
fixed (anytime) access	44,6	65,2	78,8	96,2
wireless access	365,7	523,6	639,1	777,5
other access	4,9	5,1	3,9	2,6
Bandwidth of exterior Internet access channels, Gbps	23	67	200	350
Public Internet access centres, units	1 468	1 625	1 626	1 583

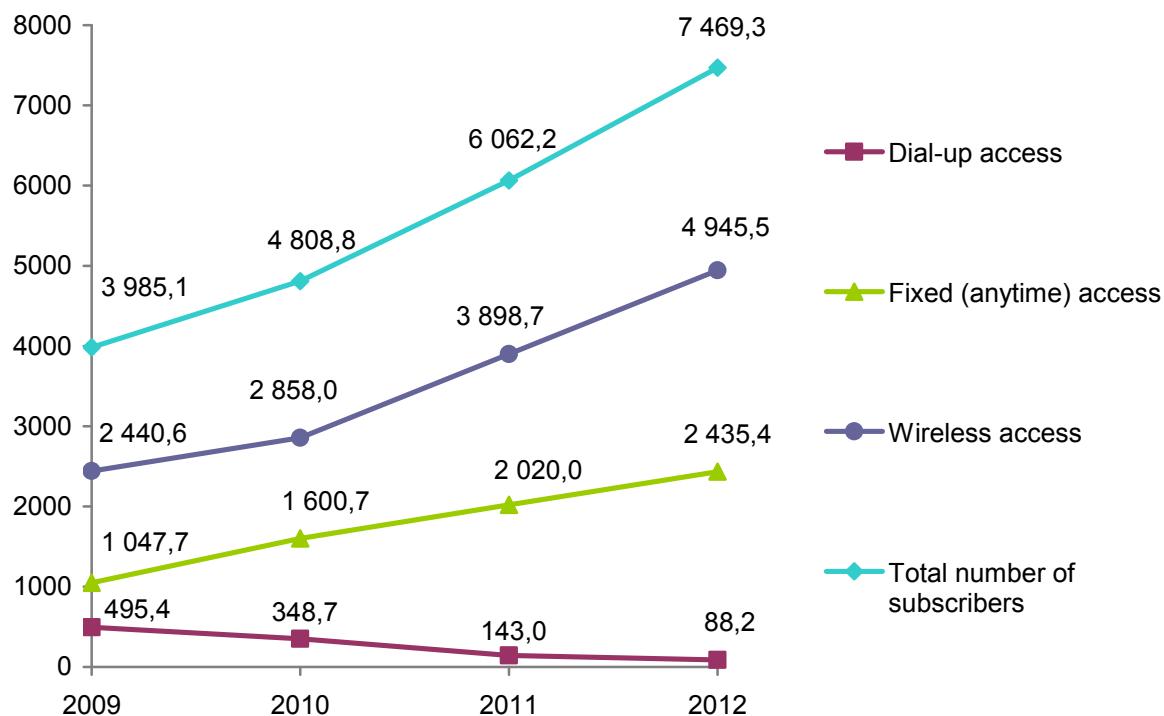
### 8.2. Internet subscribers per 1 000 population

(legal and natural persons; end of year; units)



### 8.3. Number of Internet subscribers (individuals)

(end of year; thousand)



### 8.4. Access of individuals to the Internet

(end of year; per 1 000 population; units)

	2011	2012
Internet subscribers	640	789
Subscribers of fixed broadband Internet	213	257
Subscribers of wireless broadband Internet	169	297

## 8.5. Development of cable television

(end of year)

	2009	2010	2011	2012
Cable television systems – total, units	269	296	524	523
of which broadcasting television programmes in digital format	–	71	90	96
Cable television subscribers – total, thousand	1 722	1 756	1 895	1 919
of which digital format subscribers	–	54	66	126
Localities with cable television available, units	120	248	259	261

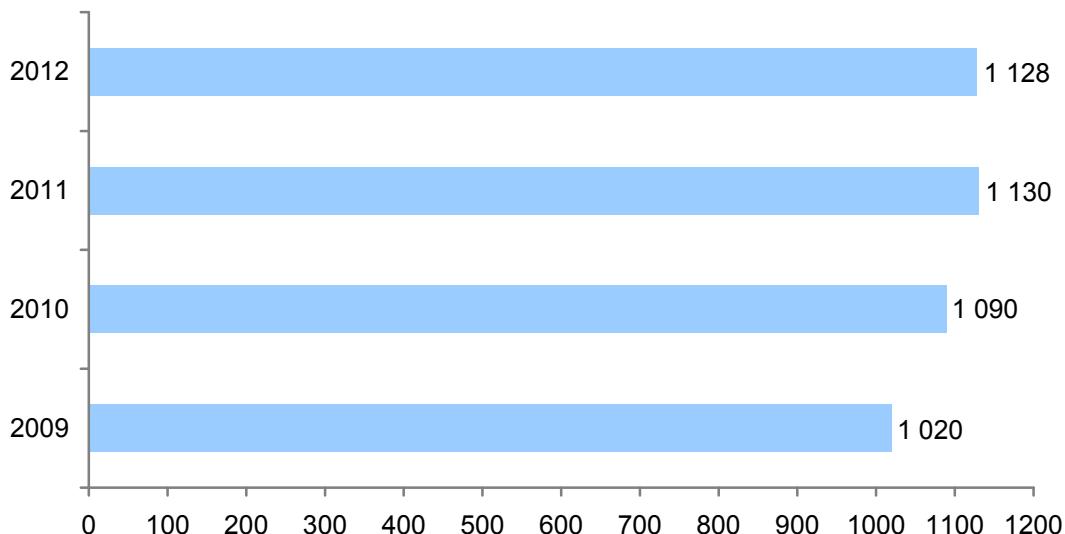
## 8.6. Main indicators of mobile cellular telecommunications

(end of year)

	2009	2010	2011	2012
Number of mobile cellular telecommunication subscriptions, thousand	9 686,3	10 332,9	10 694,9	10 676,5
of which:				
GSM	9 661,9	10 318,4	10 685,2	10 668,3
IMT-MC-450	24,4	14,5	9,7	8,2
Population coverage with mobile cellular telecommunication services, percent	99,4	99,7	99,7	99,7
Territorial coverage with mobile cellular telecommunication services, percent	97,2	97,8	98,1	98,2

## 8.7. Mobile cellular telecommunication subscriptions per 1 000 population

(end of year; units)



## 8.8. Main indicators of general use long-distance telephone communications

(end of year)

	2009	2010	2011	2012
Long-distance and international telephone connections, mln	894,4	882,4	806,3	731,1
Length of long-distance telephone channels, mln channel-km	537,8	558,3	3 126,6	7 487,8
Capacity of automatic trunk exchanges, ports	179 256	188 824	190 853	197 997
Public pay telephones with long-distance service, units	13 819	12 981	9 925	9 846

## 8.9. Main indicators of urban and rural telephone network

(end of year)

	2009	2010	2011	2012
Fixed telephone lines connected to general use telecommunications – total, thous.	4 121,7	4 245,3	4 203,0	4 283,1
of which:				
urban network	3 209,2	3 282,0	3 223,8	3 300,1
rural network	912,5	963,3	979,2	983,0
Out of total, home fixed telephone lines, thous.	3 312,3	3 438,8	3 519,9	3 587,1
of which:				
urban network	2 518,4	2 594,5	2 655,0	2 719,4
rural network	793,9	844,3	864,9	867,7
Home fixed telephone lines connected to general use telecommunications per 1 000 population, units	349	363	372	379

## 8.10. Tariff indices of selected communication services

(percent of previous year)

	For legal entities and individual entrepreneurs				For individuals			
	2009	2010	2011	2012	2009	2010	2011	2012
Communication services	104,0	99,9	110,3	147,3	106,0	102,8	109,0	150,8
of which:								
local telephone service within urban telephone network	104,0	102,4	119,3	174,3	104,7	109,0	114,9	155,6
long-distance and international telephone service	100,7	100,2	109,7	157,8	100,5	100,5	110,5	160,0
data transmission services (Internet connection)	98,0	77,6	100,0	108,4	100,0	100,0	100,0	100,0
mobile cellular telecommunications	106,7	100,4	108,5	155,7	107,2	102,0	107,0	156,7
broadcasting of sound programmes	115,3	106,1	147,9	184,4	105,8	127,5	119,6	129,4
broadcasting of television programmes	116,0	106,1	144,4	171,1	106,7	104,1	119,4	154,7

## 8.11. Average tariffs of communication services for legal entities (BYR)

	Average tariff for December		
	2010	2011	2012
Access to local telephone network using subscriber's terminal equipment (main telephone line)	60 420	60 420	60 420
Long-distance connection to fixed telecommunication network subscribers, for each full or part minute of connection	178	214	279
Three-minute connection within the same mobile cellular telecommunication network	56,5	79,7	119,5
Anytime (dedicated) access to the Internet	54 000	54 000	25 379

## 8.12. Average tariffs of communication services for individuals (BYR)

	Average tariff for December		
	2010	2011	2012
Access to local telephone network using subscriber's terminal equipment (main telephone line)	60 420	60 420	60 420
Long-distance connection to fixed telecommunication network subscribers, for each full or part minute of connection			
within the region	22,00	28,00	46,00
within the country	43,90	53,00	46,00
Three-minute connection within the same mobile cellular telecommunication network	174,33	224,68	339,20
Data transmission services:			
anytime access to the Internet:			
for 1 Mb/s of anytime Internet access according to tariff plan for day-and-night access (excluding traffic)	-	-	39 600
for 1 Mbyte of traffic via anytime Internet access according to tariff plan taking into account prepaid traffic	-	-	20,41
dial-up password-free Internet access, per minute of access	13,00	13,00	13,00

## 9. ICT USE IN ORGANISATIONS

### 9.1. Employees in organizations who used personal computers (electronic computing machines) in 2012

	Employees that used personal computers (electronic computing machines)		Of which employees that used personal computers connected to the Internet	
	total, persons	% of payroll number of employees	total, persons	% of employees that used personal computers (electronic computing machines)
Republic of Belarus	503 399	22,3	256 438	50,9
<b>Region:</b>				
Brest	45 683	16,1	22 159	48,5
Vitebsk	39 950	16,0	19 336	48,4
Gomel	56 283	17,7	25 490	45,3
Grodno	32 715	14,4	16 107	49,2
Minsk city	250 640	37,8	133 054	53,1
Minsk	45 569	15,6	26 415	58,0
Mogilev	32 559	14,9	13 877	42,6

### 9.2. Share of organisations that used ICT

(percent)

	as of 1 August 2010	as of 1 January 2012	as of 1 January 2013
Local area network available	58,5	73,7	76,4
Internet access available	84,0	94,6	96,8
Website available	40,6	50,2	51,2
Intranet available	9,5	18,1	18,4
Extranet available	2,1	5,9	5,3

### 9.3. Organisations that used ICT by economic activity

(percent of total organisations that used personal computers)

	Used				Had website	
	Internet		local area network			
	2011	2012	2011	2012	2011	2012
Total	97,1	97,9	75,7	77,3	51,5	51,8
of which:						
agriculture, hunting and forestry	93,7	98,0	51,9	60,8	14,3	19,9
fishing and fish farming	100,0	100,0	66,7	50,0	33,3	50,0
mining and quarrying	100,0	100,0	85,7	81,0	61,9	61,9
manufacturing	98,8	99,0	87,3	88,9	77,7	78,0
electricity, gas and water supply	100,0	100,0	94,1	95,9	42,9	52,4
construction	99,3	99,7	82,1	86,6	36,5	40,2
trade, repair of motor vehicles and household and personal goods	97,2	97,0	78,3	77,4	53,0	49,4
hotels and restaurants	97,6	100,0	89,4	91,1	62,4	63,3
transport and communications	96,2	97,4	75,5	74,9	49,8	50,5
financial activities	100,0	100,0	97,6	97,5	97,6	97,5
real estate, renting and business services	96,6	96,5	74,7	71,8	59,3	54,2
community, social and personal services	100,0	99,2	85,1	90,7	58,2	66,9

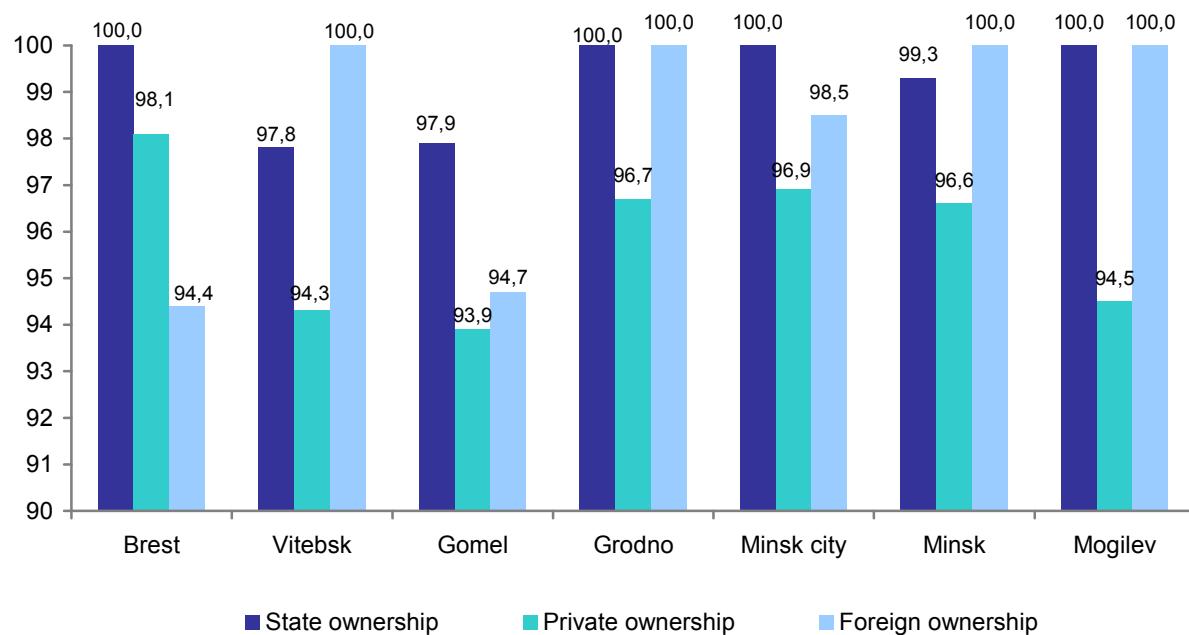
#### 9.4. Organisations that used personal computers by ownership type, by regions and Minsk city in 2012

(entities)

	Republic of Belarus	Of which by region:						
		Brest	Vitebsk	Gomel	Grodno	Minsk city	Minsk	Mogilev
Total organisations	7 179	856	790	858	659	2 477	953	586
of which:								
state ownership	1 354	151	232	234	165	278	152	142
private ownership	5 529	688	543	606	484	1 996	777	435
foreign ownership	296	17	15	18	10	203	24	9

#### 9.5. Distribution of organisations that used Internet by ownership type, by regions and Minsk city in 2012

(percent of total organisations of corresponding ownership)

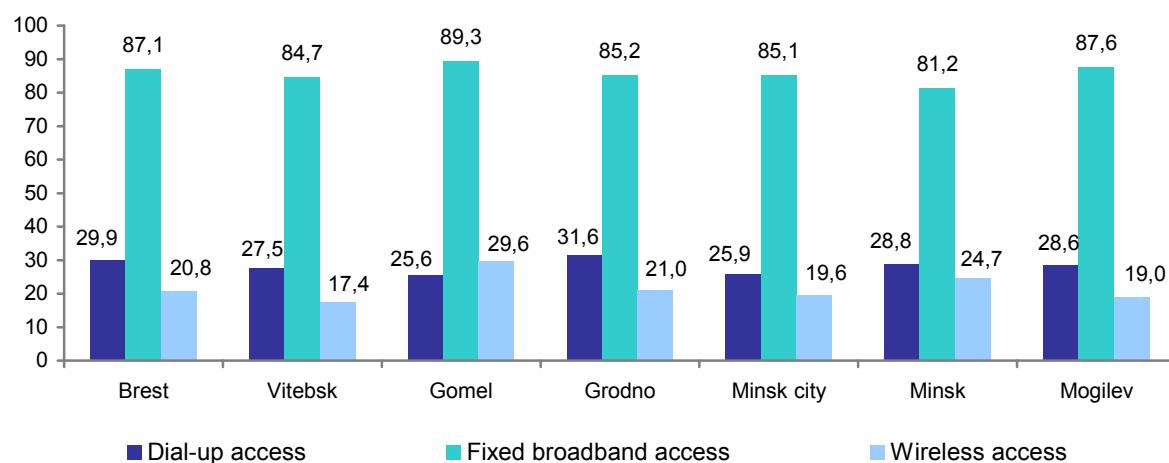


## 9.6. Organisations that used Internet, local area network and electronic mail by ownership type, by regions and Minsk city in 2012

	Republic of Belarus	Of which by region:						
		Brest	Vitebsk	Gomel	Grodno	Minsk city	Minsk	Mogilev
<b>Internet, entities</b>								
Total	7 030	847	772	828	643	2 426	934	580
of which:								
state ownership	1 343	151	227	229	165	278	151	142
private ownership	5 393	679	530	581	468	1 947	759	429
foreign ownership	294	17	15	18	10	201	24	9
<b>Percent of total organisations that used personal computers</b>								
Total	97,9	98,9	97,7	96,5	97,6	97,9	98,0	99,0
of which:								
state ownership	99,2	100,0	97,8	97,9	100,0	100,0	99,3	100,0
private ownership	97,5	98,7	97,6	95,9	96,7	97,5	97,7	98,6
foreign ownership	99,3	100,0	100,0	100,0	100,0	99,0	100,0	100,0
<b>LAN, entities</b>								
Total	5 549	684	577	619	516	1 943	732	478
of which:								
state ownership	1 099	127	181	152	140	261	115	123
private ownership	4 200	540	383	451	367	1 519	594	346
foreign ownership	250	17	13	16	9	163	23	9
<b>Percent of total organisations that used personal computers</b>								
Total	77,3	79,9	73,0	72,1	78,3	78,4	76,8	81,6
of which:								
state ownership	81,2	84,1	78,0	65,0	84,8	93,9	75,7	86,6
private ownership	76,0	78,5	70,5	74,4	75,8	76,1	76,4	79,5
foreign ownership	84,5	100,0	86,7	88,9	90,0	80,3	95,8	100,0
<b>E-mail, entities</b>								
Total	6 903	834	754	796	639	2 378	932	570
of which:								
state ownership	1 309	150	219	210	165	275	149	141
private ownership	5 303	667	520	568	464	1 905	759	420
foreign ownership	291	17	15	18	10	198	24	9
<b>Percent of total organisations that used personal computers</b>								
Total	96,2	97,4	95,4	92,8	97,0	96,0	97,8	97,3
of which:								
state ownership	96,7	99,3	94,4	89,7	100,0	98,9	98,0	99,3
private ownership	95,9	96,9	95,8	93,7	95,9	95,4	97,7	96,6
foreign ownership	98,3	100,0	100,0	100,0	100,0	97,5	100,0	100,0

## 9.7. Organisations by type of Internet connection in 2012

(percent of total organisations with Internet access)



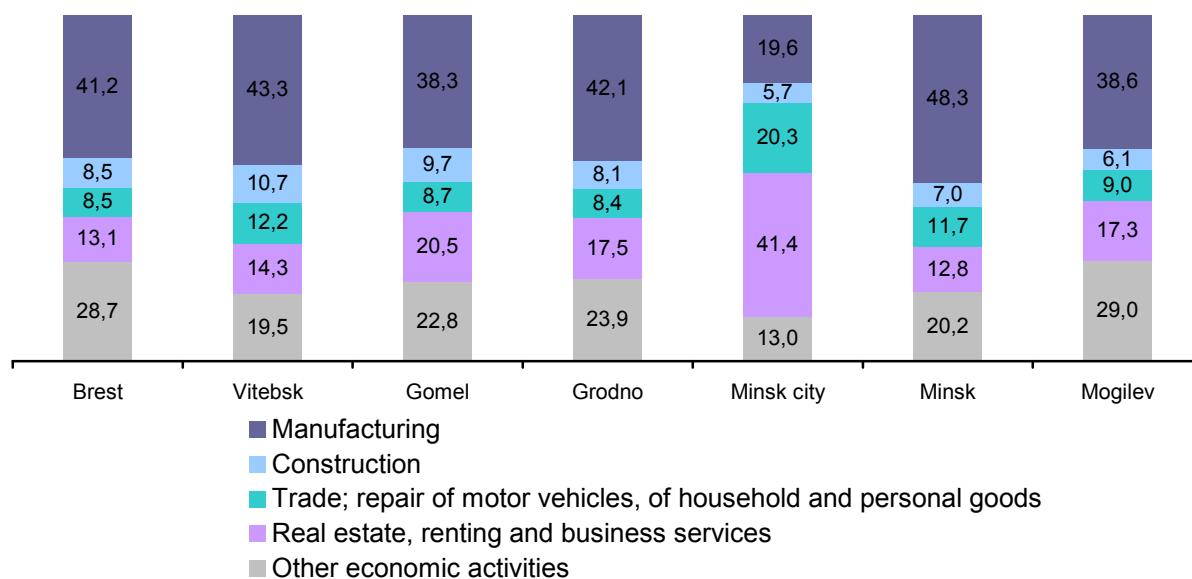
## 9.8. Organisations by type of Internet connection and data transmission rate by regions and Minsk city in 2012

	Number of organisations							
	by type of Internet connection				by data transmission rate			
	dial-up access	fixed broadband access	wireless access	of which broadband access	up to 256 Kbps	256 Kbps to 2 Mbps	2 to 10 Mbps	10 Mbps and higher
<b>Entities</b>								
Republic of Belarus	1 944	6 010	1 506	809	1 301	2 506	2 411	812
Region:								
Brest	253	738	176	99	188	312	274	73
Vitebsk	212	654	134	76	151	327	224	70
Gomel	212	739	245	115	141	374	254	59
Grodno	203	548	135	75	104	273	191	75
Minsk city	629	2 065	475	267	320	691	1 056	359
Minsk	269	758	231	120	268	296	261	109
Mogilev	166	508	110	57	129	233	151	67
<b>Percent of total organisations with Internet access</b>								
Republic of Belarus	27,7	85,5	21,4	11,5	18,5	35,6	34,3	11,6
Region:								
Brest	29,9	87,1	20,8	11,7	22,2	36,8	32,4	8,6
Vitebsk	27,5	84,7	17,4	9,8	19,6	42,3	29,0	9,1
Gomel	25,6	89,3	29,6	13,9	17,0	45,2	30,7	7,1
Grodno	31,6	85,2	21,0	11,7	16,2	42,4	29,7	11,7
Minsk city	25,9	85,1	19,6	11,0	13,2	28,5	43,5	14,8
Minsk	28,8	81,2	24,7	12,8	28,7	31,7	27,9	11,7
Mogilev	28,6	87,6	19,0	9,8	22,2	40,2	26,0	11,6

**9.9. Organisations with website by economic activity,  
by regions and Minsk city in 2012**  
(entities)

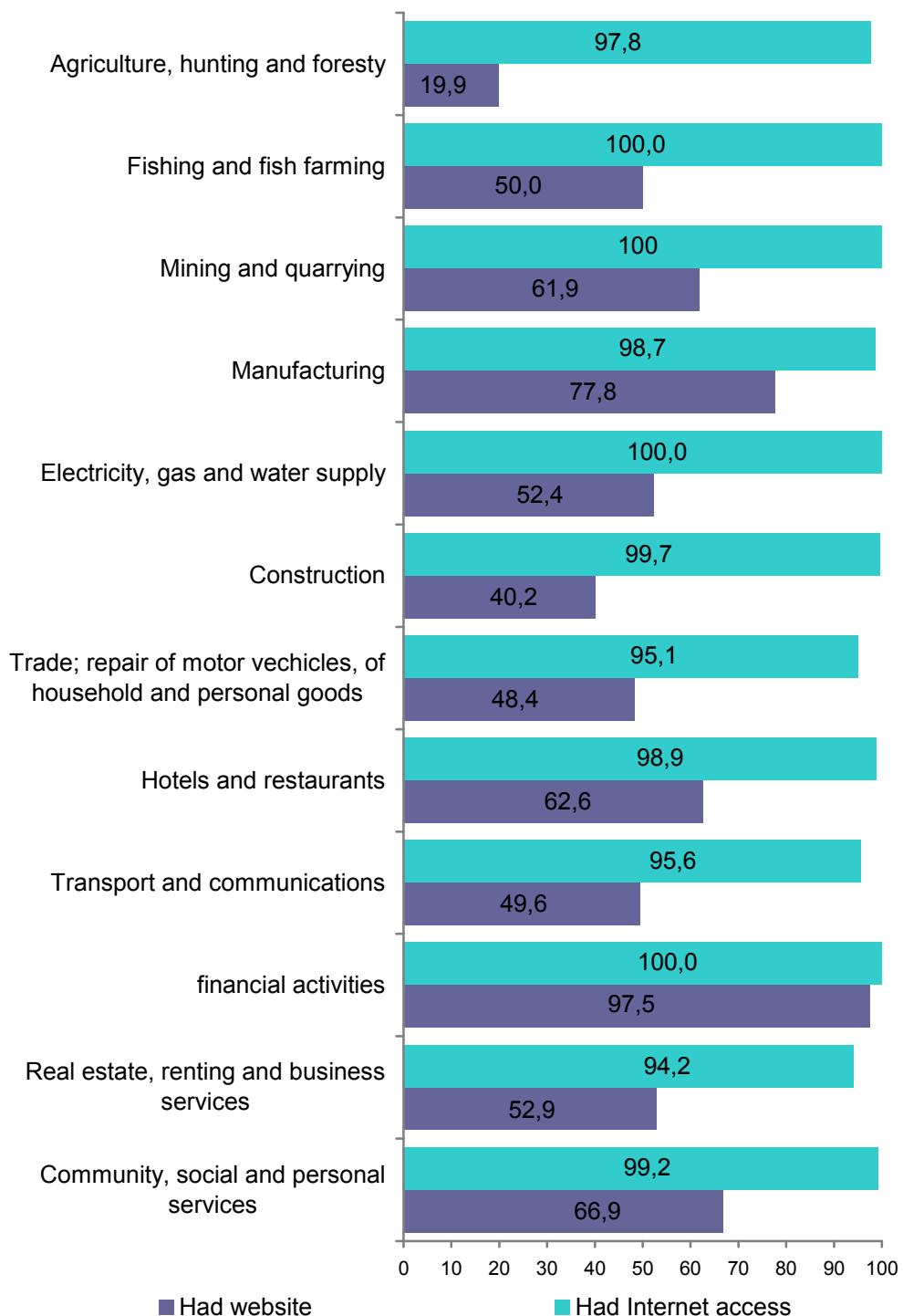
	Republic of Belarus	Of which by region:						
		Brest	Vitebsk	Gomel	Grodno	Minsk city	Minsk	Mogilev
Total organisations	3 719	434	335	381	297	1 550	445	277
of which:								
agriculture, hunting and forestry	246	53	21	35	38	13	51	35
mining and quarrying	13	3	2	2	2	1	3	-
manufacturing	1 221	179	145	146	125	304	215	107
electriCity, gas and water supply	89	21	10	14	12	6	9	17
construction	270	37	36	37	24	88	31	17
trade; repair of motor vehicles, of household and personal goods	528	37	41	33	25	315	52	25
hotels and restaurants	57	7	9	5	1	29	3	3
transport and communications	191	29	15	21	14	79	18	15
real estate, renting and business services	981	57	48	78	52	641	57	48
community, social and personal services	79	8	8	10	4	36	3	10

**9.10. Distribution of organisations with website by economic activity,  
by regions and Minsk city in 2012**  
(percent of total organisations with website)



### 9.11. Distribution of organisations with Internet access and website by economic activity in 2012

(percent of total organisations surveyed)

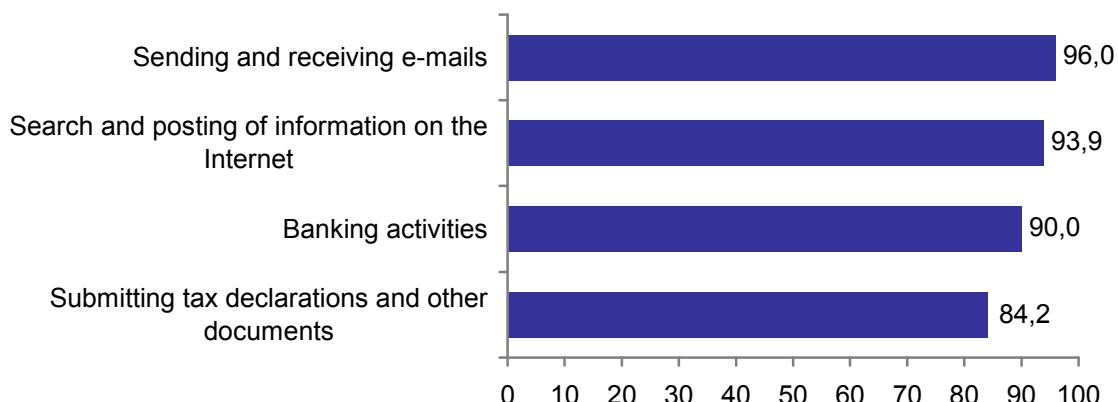


## 9.12. Organisations by purpose of Internet use

	Number of organisations, entities		Percentage share of organisations by purpose of Internet use in total organisations with Internet access	
	2011	2012	2011	2012
Purpose of Internet use:				
search and posting of information on the Internet	6 521	6 603	92,3	93,9
sending and receiving e-mails	6 744	6 750	95,5	96,0
recruitment and training of personnel	2 803	3 036	39,7	43,2
use of IP-telephony (Internet telephony), audio- and videoconferencing	1 183	1 355	16,8	19,3
paid subscription to electronic databases and electronic libraries	2 308	2 548	32,7	36,2
banking activities	6 376	6 330	90,3	90,0
reception of other information services	5 174	5 272	73,3	75,0
provision of information services	1 455	1 519	20,6	21,6
placement of orders for required goods (works, services)	2 953	3 215	41,8	45,7
reception of orders for goods (works, services) produced	2 302	2 495	32,6	35,5
receiving information on the activities of state bodies (organisations)	4 850	4 827	68,7	68,7
receiving blank forms from state bodies (organisations)	5 558	5 865	78,7	83,4
submitting customs documents	1 507	1 786	21,3	25,4
receiving state information services from state bodies (organisations) in electronic form	3 851	4 210	54,5	59,9
submitting tax declarations and other documents	5 715	5 917	80,9	84,2
submitting state statistical reports, departmental reports	3 206	4 748	45,4	67,5
electronic registration (re-registration) of business entities	652	851	9,2	12,1
participation in electronic auctions for public purchase of goods (works, services)	1 664	2 165	23,6	30,8

**9.13. Share of organisations by purpose of Internet use in 2012**

(percent of total organisations with Internet access)

**9.14. Organisations by purpose of Internet use by regions and Minsk city in 2012**

(percent of total organisations with Internet access)

	Republic of Belarus	Of which by region						
		Brest	Vitebsk	Gomel	Grodno	Minsk city	Minsk	Mogilev
Purpose of Internet use:								
search and posting of information on the Internet	93,9	93,4	91,2	92,6	94,2	97,0	90,8	92,2
sending and receiving e-mails	96,0	96,6	95,5	94,6	98,1	95,5	97,1	96,2
recruitment and training of personnel	43,2	34,0	32,5	32,1	35,5	60,8	36,4	32,4
use of IP-telephony (Internet-telephony), audio- and videoconferencing	19,3	18,7	16,5	16,8	16,8	24,7	15,1	14,3
paid subscription to electronic databases and electronic libraries	36,2	36,1	33,3	41,4	40,9	35,7	32,1	36,9
banking activities	90,0	94,2	95,1	94,0	93,3	82,8	93,0	93,6
reception of other information services	75,0	78,5	72,5	77,3	80,2	71,2	76,6	77,2
provision of information services	21,6	22,1	18,3	19,2	19,9	26,2	17,2	18,4

Continued

	Republic of Belarus	Of which by region						
		Brest	Vitebsk	Gomel	Grodno	Minsk city	Minsk	Mogilev
placement of orders for required goods (works, services)	45,7	47,3	42,9	48,1	50,7	44,3	43,6	47,9
reception of orders for goods (works, services) produced	35,5	34,2	30,8	34,7	36,4	37,7	34,8	35,5
receiving information on the activities of state bodies (organizations)	68,7	71,0	63,3	66,3	75,3	69,1	66,5	70,0
receiving blank forms from state bodies (organizations)	83,4	87,1	84,8	84,9	88,8	77,9	85,1	88,4
receiving state information services from state bodies (organizations) in electronic form	59,9	61,0	59,2	60,4	69,4	55,6	60,5	65,0
submitting customs documents	25,4	24,7	23,6	22,8	24,3	25,7	30,6	24,3
submitting tax declarations and other documents	84,2	89,0	86,9	86,8	91,4	77,3	85,1	88,8
submitting state statistical reports, departmental reports	67,5	71,8	76,0	68,7	76,2	56,7	71,6	77,6
electronic registration (re-registration) of business entities	12,1	13,6	14,0	11,0	-	12,9	13,3	17,2
participation in electronic auctions for public purchase of goods (works, services)	30,8	33,8	35,4	38,6	40,0	22,1	26,7	42,1

### 9.15. Organisations by results of Internet use

	Number of organisations, entities		Percentage share of organisations by results of Internet use in total organisations with Internet access	
	2011	2012	2011	2012
Results of the Internet use:				
reduced costs of production and sale of goods (works, services)	4 148	4 086	58,7	58,1
improved quality of goods (works, services)	3 633	3 635	51,4	51,7
expanded range of goods (works, services)	3 084	3 129	43,7	44,5
new suppliers engaged	4 200	4 231	59,5	60,2
reduced staff	1 522	1 569	21,6	22,3
improved work conditions	6 100	5 909	86,4	84,1
improved image of organisation	5 642	5 591	79,9	79,5

### 9.16. Documentation management in central offices of government authorities and other state organisations

	2009	2010	2011	2012
Percentage share of documents received in electronic format in total incoming documents	30,4	39,3	42,5	44,6
Percentage share of documents sent in electronic format in total outgoing documents	20,3	26,9	30,6	33,6

### 9.17. Distribution of government authorities by type of Internet connection in 2012

	Percentage share in total government authorities with Internet access by type of connection						
	dial-up access	fixed broadband access			wireless access		
		total	of which using				
		subscriber lines	волоконно-оптических линий связи	кабельного соединения			
Republic of Belarus – total of which:							
government legislative authorities	27,1	94,9	54,2	52,5	25,4	10,2	
government executive authorities		–	100,0	–	100,0	–	–
government authorities and organisations subordinated and/ or accountable to the President of the Republic of Belarus	29,6	94,4	57,4	50,0	25,9	11,1	
government authorities and other organisations subordinated to the Council of Ministers of the Republic of Belarus	12,5	100,0	37,5	87,5	25,0	12,5	
local executive authorities	35,9	92,3	64,1	38,5	28,2	7,7	
government judicial authorities	14,3	100,0	42,9	71,4	14,3	28,6	
	–	100,0	33,3	66,7	33,3	–	

### 9.18. Expenditures of organisations on information and communication technology

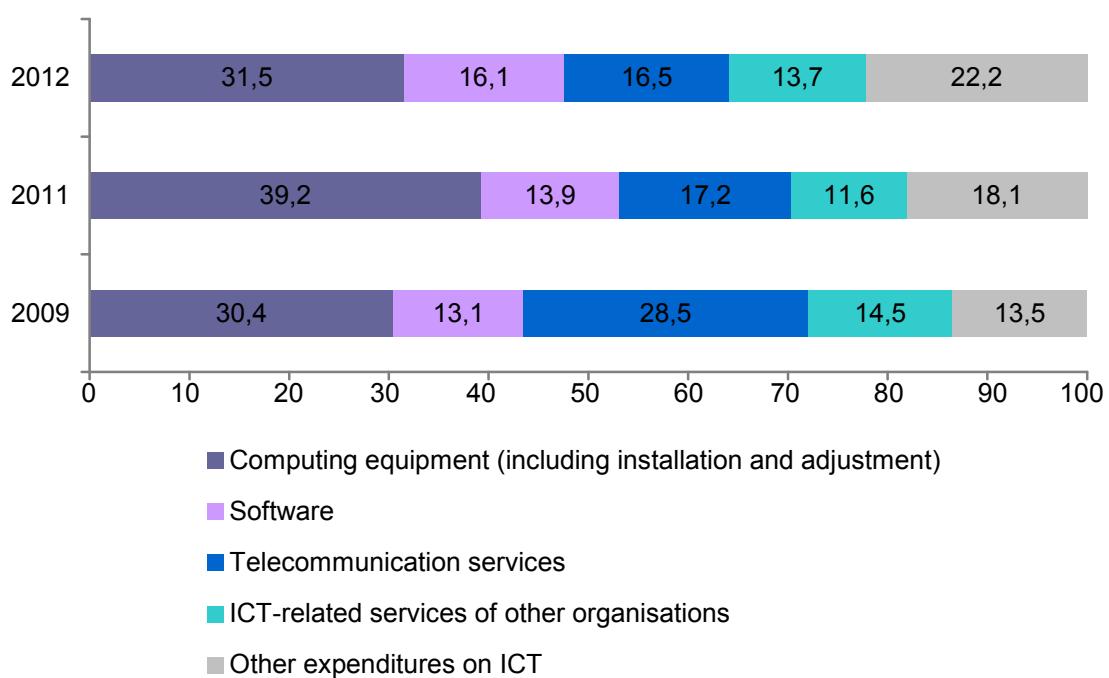
	2009		2011		2012	
	BYR mln	% of total	BYR mln	% of total	BYR mln	% of total
Total	1 452 875	100	2 650 320	100	4 074 516	100
of which on:						
computing equipment (including installation and adjustment)	441 780	30,4	1 039 472	39,2	1 284 314	31,5
of which produced in the Republic of Belarus	...	...	400 320	15,1	313 363	7,7
software	189 759	13,1	367 180	13,9	656 437	16,1
of which designed in the Republic of Belarus	...	...	115 944	4,4	299 064	7,3

Continued

	2009		2011		2012	
	BYR mln	as % of total	BYR mln	as % of total	BYR mln	as % of total
telecommunication services	414 008	28,5	455 921	17,2	671 634	16,5
of which Internet access	87 300	6,0	55 489	2,1	95 531	2,3
training of employees related to development and use of ICT	7 323	0,5	9 794	0,4	18 676	0,5
ICT-related services of other organisations	211 237	14,5	308 392	11,6	558 987	13,7
of which on:						
custom software	...	...	...	...	129 870	3,2
of which designed in the Republic of Belarus	...	...	...	...	96 566	2,4
data origination and entry	...	...	...	...	24 543	0,6
other expenditures on ICT	188 768	13,0	469 561	17,7	884 469	21,7

### 9.19. Structure of expenditures of organisations on information and communication technology

(percent of total)



## 10. USE OF ICT BY HOUSEHOLDS

### 10.1. Main indicators of household access to information and communication technology

(data of sample household living standards survey; percent of total households)

	2009	2010	2011	2012
Households with colour television apparatus	98,2	98,5	98,6	98,8
Households with fixed telephone (beginning of year)	...	90,6	92,7	92,6
Households with cellular telephone	...	84,1	86,3	89,4
Households with personal computer	38,2	40,8	46,4	51,7
Households with Internet access from home computer (beginning of year)	20,0	24,9	31,2	40,3

At the beginning of 2013 the share of households with fixed telephone was 93,9%; with Internet access from home computer – 48,3%.

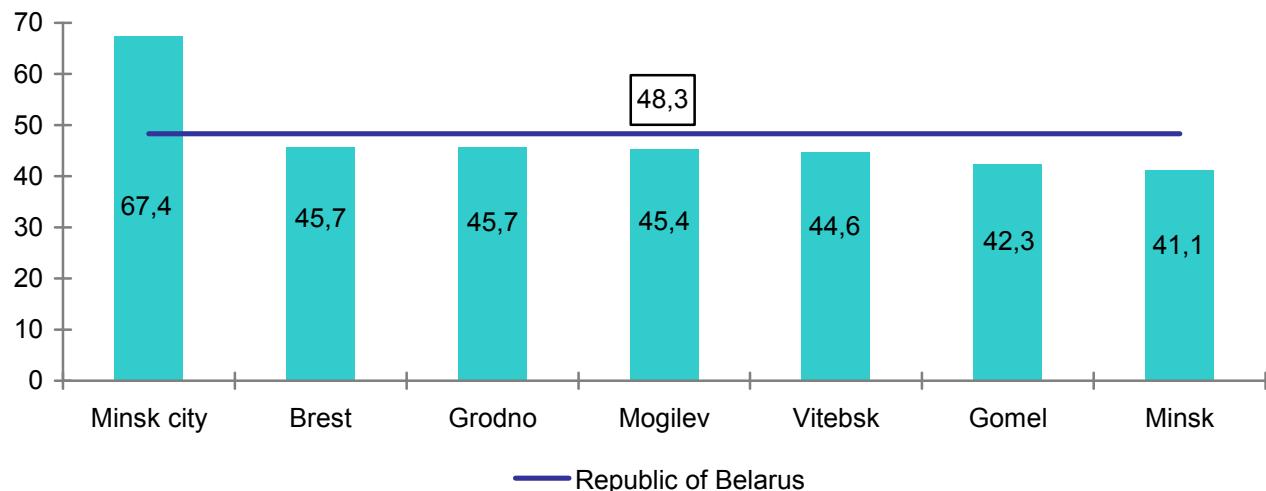
### 10.2. Access of households to the Internet from home computer

(data of sample household living standards survey; beginning of year;  
percent of total households of corresponding group)

	2010	2011	2012	2013
All households	24,9	31,2	40,3	48,3
of which by residence:				
urban	30,6	38,1	47,5	56,6
rural	9,8	13,1	21,4	26,6
Households by region:				
Brest	20,1	27,5	34,7	45,7
Vitebsk	18,5	23,2	36,2	44,6
Gomel	16,7	25,2	35,6	42,3
Grodno	21,3	26,2	36,1	45,7
Mins city	45,1	51,4	61,9	67,4
Minsk	23,6	29,5	34,7	41,1
Mogilev	21,2	28,1	35,0	45,4

### 10.3. Access of households to the Internet from home computer as of the beginning of 2013

(data of sample household living standards survey;  
percent of total households)



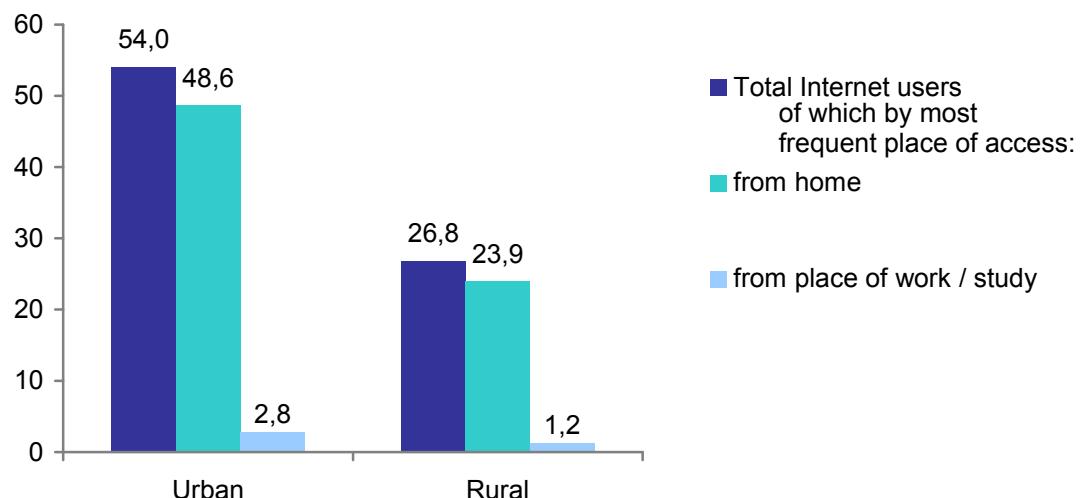
### 10.4. Access of population to the Internet

(data of sample household living standards survey; beginning of 2013;  
percent of total households of corresponding group)

	Total Internet users	Of which by most frequent place of access to the Internet				
		home	place of work / study	Internet café / club, post office	friends', relatives' place	other
Population 16 years old and over – total	46,9	42,1	2,4	0,2	0,3	1,9
of which:						
by age group						
16-24	91,0	83,0	1,6	0,3	0,7	5,4
25-54	59,8	53,7	3,4	0,1	0,3	2,3
55-64	18,0	15,5	1,7	0,2	0,4	0,2
65 and over	4,5	4,0	0,3	0,0	0,1	0,1
by education:						
higher	70,6	61,2	7,3	0,2	0,4	1,5
secondary specialised	46,2	42,4	1,5	0,2	0,4	1,7
vocational technical	39,9	36,5	0,6	0,0	0,1	2,7
general secondary	39,4	35,9	1,0	0,1	0,3	2,1
by residence:						
urban	54,0	48,6	2,8	0,2	0,4	2,0
rural	26,8	23,9	1,2	0,0	0,2	1,5

## 10.5. Access of population<sup>1)</sup> to the Internet by residence

(data of sample household living standards survey; beginning of 2013;  
percent of total households of corresponding group)



## 10.6. Access of population<sup>1)</sup> to the Internet by regions and Minsk city

(data of sample household living standards survey; beginning of 2013;  
percent of total households of corresponding group)

	Total Internet users	Of which by most frequent place of access to the Internet				
		home	place of work/ study	Internet café / club, post office	friends', relatives' place	other
Republic of Belarus	46,9	42,1	2,4	0,2	0,3	1,9
Region:						
Brest	43,5	39,3	1,9	0,3	0,0	2,0
Vitebsk	43,8	40,6	1,5	0,1	0,4	1,2
Gomel	41,3	36,8	2,0	0,1	1,0	1,4
Grodno	45,9	42,3	1,3	0,0	0,2	2,1
Minsk city	63,7	55,4	5,8	0,4	0,1	2,0
Minsk	39,6	35,4	1,1	0,1	0,3	2,7
Mogilev	44,4	40,6	1,5	0,0	0,5	1,8

<sup>1)</sup> 16 years old and over.

## 10.7. Access of population<sup>1)</sup> to the Internet depending on educational attainment by regions and Minsk city

(data of sample household living standards survey; beginning of year;  
percent of total households of corresponding group)

	Education											
	general secondary			vocational technical			secondary specialised			higher		
	2011	2012	2013	2011	2012	2013	2011	2012	2013	2011	2012	2013
Republic of Belarus	27,8	32,1	39,4	20,4	27,6	39,9	28,6	39,9	46,2	58,3	65,9	70,6
Region:												
Brest	20,9	24,2	35,2	20,7	25,3	38,4	22,1	34,8	45,3	47,6	58,6	66,3
Vitebsk	22,2	27,6	36,8	21,1	30,0	39,5	21,9	37,7	45,2	52,8	63,3	67,1
Gomel	17,8	34,6	37,6	20,5	26,1	38,6	25,1	34,1	39,0	51,2	62,4	65,0
Grodno	30,4	21,6	32,0	18,2	28,4	44,2	24,7	39,8	45,1	55,3	62,8	72,9
Minsk city	48,7	53,6	55,1	28,6	34,2	53,0	46,2	52,6	59,6	69,1	76,4	77,9
Minsk	24,6	28,3	32,8	17,3	31,4	30,6	27,9	36,7	43,5	58,9	60,1	60,8
Mogilev	21,2	26,6	40,2	16,5	20,9	36,8	25,8	38,8	41,1	56,9	58,4	71,1

## 10.8. Internet users by frequency of access

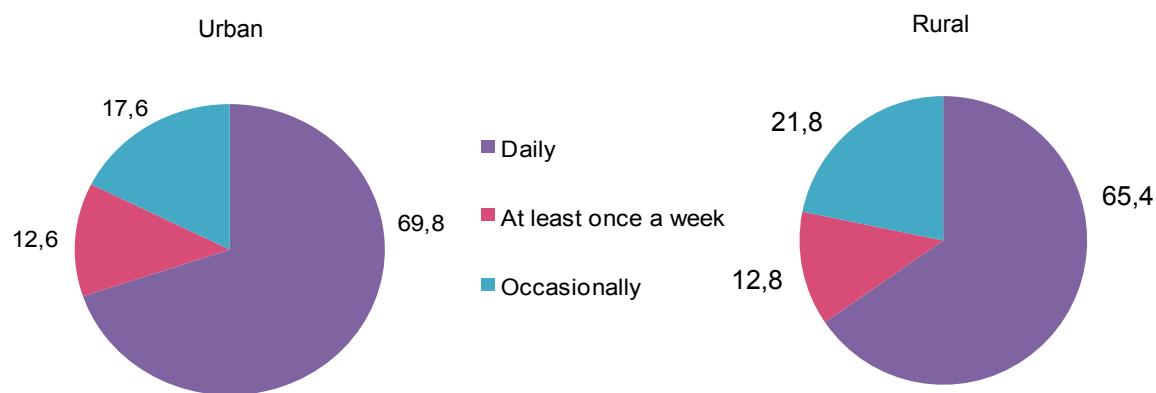
(data of sample household living standards survey; beginning of 2013;  
percent of total households of corresponding group)

	Total Internet users	Of which by frequency of access		
		daily	at least once a week	occasionally
Population 16 years old and over – total	100	69,1	12,6	18,3
of which:				
by age group:				
16-24	100	88,4	6,0	5,6
25-54	100	65,5	13,9	20,6
55-64	100	47,0	19,3	33,7
65 and over	100	39,5	25,4	35,1
by education:				
higher	100	70,9	13,2	15,9
secondary specialised	100	64,6	14,0	21,4
vocational technical	100	63,1	12,6	24,3
general secondary	100	74,9	10,3	14,8

<sup>1)</sup> 16 years old and over.

### 10.9. Distribution of Internet users by frequency of access

(data of sample household living standards survey;  
beginning of 2013; percent of total)



### 10.10. Internet users<sup>1)</sup> by frequency of access by regions and Minsk city

(data of sample household living standards survey;  
beginning of 2013; percent of total)

	Total Internet users	Of which by frequency of access		
		daily	at least once a week	occasionally
Republic of Belarus	100	69,1	12,6	18,3
Region:				
Brest	100	74,1	10,6	15,3
Vitebsk	100	68,7	7,8	23,5
Gomel	100	69,5	10,8	19,7
Grodno	100	64,9	17,1	18,0
Minsk city	100	71,2	13,9	14,9
Minsk	100	69,8	8,9	21,3
Mogilev	100	61,4	19,2	19,4

<sup>1)</sup> 16 years old and over.

### 10.11. Age structure of Internet users by regions and Minsk city

(data of sample household living standards survey;  
beginning of 2013; percent of total)

	Total	Of which by age group			
		16-24	25-54	55-64	65 and over
Republic of Belarus	100	23,4	67,9	7,2	1,5
<b>Region:</b>					
Brest	100	24,7	69,1	5,1	1,1
Vitebsk	100	20,0	68,3	11,1	0,6
Gomel	100	22,4	67,1	8,8	1,7
Grodno	100	24,7	68,2	5,5	1,6
Minsk city	100	23,5	67,9	6,4	2,2
Minsk	100	24,6	67,5	6,6	1,3
Mogilev	100	23,8	66,5	8,2	1,5

## 11. TRAINING OF ICT SPECIALISTS

### 11.1. Training of specialists with secondary specialized education in “Engineering and technology”

(beginning of academic year; persons)

	2011/2012			2012/2013		
	intake	total enrollment	new graduates	intake	total enrollment	new graduates
Total for “Engineering and technology”	15 411	52 396	13 037	15 225	49 996	13 781
of which by area of study (group of specialties):						
appliances	246	726	156	247	784	151
radioelectronic equipment	332	1 249	296	355	1 193	336
computer equipment	2 120	7 401	1 581	2 153	6 802	2 141
radio-, micro- and nanoelectronic equipment	130	363	87	139	386	85
telecommunications	706	2 682	377	625	2 409	726
automation of industrial processes, production and control	465	2 143	585	578	2 084	550

### 11.2. Training of ICT specialists with higher education in “Engineering and technology”

(beginning of academic year; persons)

	2010/2011			2011/2012		
	intake	total enrollment	new graduates	intake	total enrollment	new graduates
Total for “Engineering and technology”	19 554	84 101	12 520	18 322	83 186	12 692
of which by area of study (group of specialties):						
radioelectronics	604	2 552	355	500	2 527	393
appliances	660	2 625	348	539	2 571	337
radioelectronic equipment	653	2 886	426	621	2 878	408
computer equipment	3 088	10 676	1 285	3 000	11 007	1 397
radio-, micro- and nanoelectronic equipment	125	577	81	172	601	90
telecommunications	564	2 413	499	559	2 441	409
automation of industrial processes, production and control	1 915	8 283	1 205	1 721	8 147	1 232
intelligent systems	61	213	38	48	221	28
ergonomics in information systems	78	277	24	61	311	26

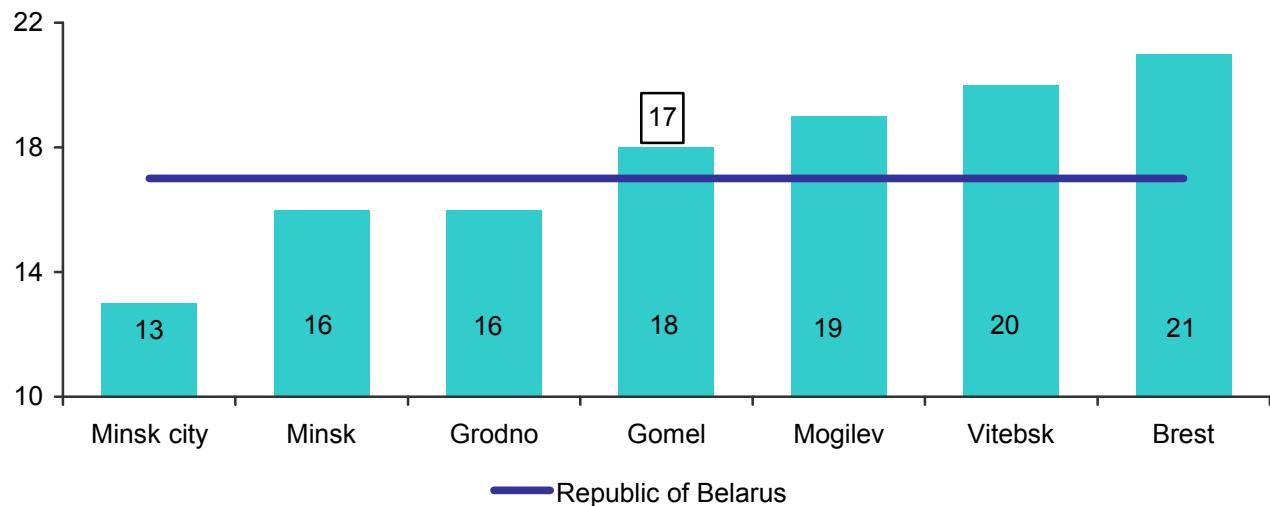
### 11.3. ICT use in day-time institutions of general secondary education

(institutions under the Ministry of Education of the Republic of Belarus  
(except special education institutions); beginning of academic year)

	2010/11	2011/12	2012/13
<b>Total</b>			
Number of institutions with:			
computer classrooms	3 261	3 188	3 059
percent of total institutions	98,8	98,7	97,5
Internet access	2 884	2 933	2 983
percent of total institutions	87,4	90,8	95,1
Number of personal computers used in the process of education	46 046	49 598	53 039
Pupils per personal computer	20	18	17
Number of teachers prepared to use computer technology	121 700	92 479	87 187
percent of total teachers	72,5	77,0	76,9
<b>Urban</b>			
Number of institutions with:			
computer classrooms	1 179	1 177	1 172
percent of total institutions	97,7	97,9	97,8
Internet access	1 082	1 109	1 145
percent of total institutions	89,6	92,3	95,6
Number of personal computers used in the process of education	29 086	32 174	35 474
Pupils per personal computer	24	22	20
Number of teachers prepared to use computer technology	55 986	58 635	56 333
percent of total teachers	72,3	76,3	76,5
<b>Rural</b>			
Number of institutions with:			
computer classrooms	2 082	2 011	1 887
percent of total institutions	99,4	99,1	97,3
Internet access	1 802	1 824	1 838
percent of total institutions	86,1	89,9	94,8
Number of personal computers used in the process of education	16 960	17 424	17 565
Pupils per personal computer	13	12	11
Number of teachers prepared to use computer technology	32 273	33 844	30 854
percent of total teachers	72,9	78,5	77,5

#### **11.4. Pupils per personal computer in day-time institutions of general secondary education by regions and Minsk city**

(institutions under the Ministry of Education of the Republic of Belarus  
 (except special education institutions);  
 beginning of academic year 2012/2013; persons)



#### **11.5. Availability of personal computers in institutions of vocational-technical education**

(beginning of academic year)

	2010/ 11	2011/ 12	2012/ 13
Number of computer classrooms	512	504	434
Personal computers – total, units	10 684	10 959	11 268
of which used in educational process	6 351	6 462	6 631
Personal computers per institution	47	48	50
Students per personal computer, persons	17	15	12

**11.6. Availability of personal computers in institutions  
of vocational-technical education by regions and Minsk city**  
(beginning of academic year 2012/13)

	Number of computer classrooms	Personal computers – total, units	Of which used in educational process	Personal computers per institution, units	Students per personal computer, persons
Republic of Belarus	434	11 268	6 631	50	12
Region:					
Brest	73	1 934	1 128	59	10
Vitebsk	52	1 051	562	28	19
Gomel	59	1 410	775	35	18
Grodno	54	1 591	840	55	10
Minsk city	69	2 203	1 376	79	10
Minsk	50	1 259	822	60	12
Mogilev	77	1 820	1 128	48	11

**11.7. Availability of personal computers in institutions  
of secondary specialized education by regions and Minsk city**  
(beginning of academic year 2012/13)

	Number of computer classrooms	Personal computers used in educational process – total, units	of which connected to the Internet	Personal computers per institution, units	Full-time students per personal computer, persons
Republic of Belarus	579	9 190	4 557	41	12
Region:					
Brest	57	912	411	29	15
Vitebsk	108	1 432	646	45	10
Gomel	68	1 081	437	36	14
Grodno	64	910	514	36	14
Minsk city	151	2 654	1 713	60	10
Minsk	62	1 101	472	41	11
Mogilev	69	1 100	364	31	11

**11.8. Availability of personal computers in institutions  
of higher education by regions and Minsk city**

(beginning of academic year 2012/13)

	Personal computers used in educational process – total, units	of which connected to the Internet	Personal computers per institution, units	Full-time students per personal computer, persons
Republic of Belarus	26 855	19 945	497	8
Region:				
Brest	1 516	1 450	379	11
Vitebsk	2 712	1 527	542	8
Gomel	2 365	1 492	338	10
Grodno	1 636	1 381	545	10
Minsk city	16 374	12 540	546	7
Minsk	2 250	1 554	450	7

## 12. INTERNATIONAL COMPARISONS

### 12.1. Information and communication development index<sup>1)</sup>

	2011		2010		2008	
	Rating	Index	Rating	Index	Rating	Index
Republic of Korea	1	8,56	1	8,40	1	7,80
Sweden	2	8,34	2	8,23	2	7,53
Denmark	3	8,29	4	7,97	3	7,46
Iceland	4	8,17	3	8,06	7	7,12
Finland	5	8,04	5	7,87	12	6,92
Netherlands	6	7,82	9	7,61	5	7,30
Luxembourg	7	7,76	7	7,78	4	7,34
Japan	8	7,76	13	7,42	11	7,01
United Kingdom	9	7,75	10	7,60	10	7,03
Switzerland	10	7,68	8	7,67	9	7,06
Hong Kong, China	11	7,68	6	7,79	6	7,14
Singapore	12	7,66	19	7,08	15	6,71
Norway	13	7,52	11	7,60	8	7,12
Macao, China	14	7,51	21	6,84	27	5,84
United States	15	7,48	17	7,09	17	6,55
Germany	16	7,39	15	7,27	13	6,87
New Zealand	17	7,34	12	7,43	16	6,65
France	18	7,30	18	7,09	18	6,48
Austria	19	7,10	16	7,17	21	6,41
Ireland	20	7,09	23	6,78	19	6,43
Australia	21	7,05	14	7,36	14	6,78
Canada	22	7,04	26	6,69	20	6,42
Belgium	23	6,89	22	6,83	22	6,31
Estonia	24	6,81	33	6,16	28	5,81

INTERNATIONAL COMPARISONS

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Continued

	2011		2010		2008	
	Rating	Index	Rating	Index	Rating	Index
Slovenia	25	6,70	24	6,75	24	6,19
Malta	26	6,69	29	6,43	31	5,68
Israel	27	6,62	20	6,87	23	6,20
Spain	28	6,62	25	6,73	25	6,18
Italy	29	6,28	28	6,57	26	6,10
Qatar	30	6,24	44	5,60	48	4,50
Poland	31	6,19	38	5,95	41	5,29
Czech Republic	32	6,17	37	5,97	37	5,42
Greece	33	6,14	30	6,28	30	5,70
Barbados	34	6,07	41	5,83	33	5,47
Lithuania	35	6,06	35	6,04	35	5,44
Latvia	36	6,06	40	5,90	39	5,31
Portugal	37	6,05	27	6,64	29	5,70
Russia	38	6,00	47	5,38	49	4,42
Slovakia	39	5,86	39	5,94	40	5,30
Bahrain	40	5,85	45	5,57	42	5,16
Hungary	41	5,77	34	6,04	34	5,47
Croatia	42	5,75	31	6,21	36	5,43
Antigua and Barbuda	43	5,74	42	5,63	38	5,32
Cyprus	44	5,73	36	5,98	43	5,02
United Arab Emirates	45	5,64	32	6,19	32	5,63
<b>Belarus</b>	46	5,57	52	5,01	58	3,93
Saudi Arabia	47	5,43	46	5,42	55	4,13
Serbia	48	5,40	50	5,11	47	4,51
Kazakhstan	49	5,27	68	4,02	72	3,39
Uruguay	50	5,24	54	4,93	51	4,21

Continued

	2011		2010		2008	
	Rating	Index	Rating	Index	Rating	Index
Bulgaria	51	5,20	49	5,19	45	4,75
Romania	52	5,13	48	5,20	46	4,67
Oman	53	5,10	60	4,38	68	3,45
Macedonian	54	5,05	53	4,98	52	4,20
Chile	55	5,01	55	4,65	54	4,14
Argentina	56	5,00	56	4,64	53	4,16
Brunei Darussalam	57	4,95	43	5,61	44	4,97
Malaysia	58	4,82	58	4,45	57	3,96
Moldova, Republic of	62	4,55	57	4,47	64	3,57
Ukraine	67	4,40	62	4,34	59	3,83
Azerbaijan	68	4,39	74	3,78	83	2,97
Turkey	69	4,38	59	4,42	60	3,81
Georgia	73	4,20	77	3,65	85	2,96
Uzbekistan	102	3,05	110	2,55	110	2,22
Turkmenistan	110	2,49	111	2,50	111	2,15

1) Data of the International Telecommunication Union (ITU).

## 12.2. Web-services index<sup>1)</sup>

	2006	2008	2010
Republic of Korea	0,8227	1,0000	1,0000
United States	0,9532	0,9365	1,0000
United Kingdom	0,6923	0,7746	0,9739
Netherlands	0,7893	0,6794	0,9608
Canada	0,7659	0,8825	0,8889
Finland	0,6321	0,4794	0,8824
France	0,8294	0,6825	0,8758
Australia	0,7525	0,7651	0,8627
Japan	0,7425	0,6730	0,8627
Denmark	1,0000	0,6730	0,8562
Norway	0,9465	0,7365	0,8562
Sweden	0,9833	0,5270	0,8431

INTERNATIONAL COMPARISONS

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Continued

	2006	2008	2010
Estonia	0,7124	0,5016	0,8235
Kazakhstan	0,3211	0,5270	0,7843
New Zealand	0,6421	0,6381	0,7843
Spain	0,6990	0,7651	0,7582
Germany	0,5753	0,5492	0,7516
Austria	0,6656	0,4762	0,7451
Lithuania	0,6087	0,4825	0,6993
Luxembourg	0,6087	0,3810	0,6993
Hungary	0,6171	0,5048	0,6863
Switzerland	0,5585	0,4444	0,6732
Slovenia	0,5017	0,4000	0,6667
Russia	0,3344	0,3302	0,6601
Portugal	0,5987	0,3873	0,6536
Belgium	0,5385	0,6254	0,6471
Croatia	0,4314	0,4222	0,6405
Malta	0,7258	0,4698	0,6144
Georgia	0,3545	0,2476	0,6013
Latvia	0,4482	0,4159	0,5882
Greece	0,4147	0,3556	0,5752
Italy	0,5117	0,2889	0,5752
Cyprus	0,4783	0,3714	0,5621
Czech Republic	0,6455	0,4540	0,5425
Iceland	0,4615	0,3968	0,5425
Ireland	0,6756	0,4984	0,5359
Poland	0,5385	0,3873	0,5359
Moldova, Republic of	0,3110	0,2952	0,5163
Romania	0,4147	0,4159	0,5163
Slovakia	0,4749	0,3460	0,5033
Uzbekistan	0,2742	0,3778	0,4967
Bulgaria	0,4849	0,4095	0,4902
Turkey	0,4214	0,3460	0,4641
Kyrgyzstan	0,2977	0,3175	0,4248
Ukraine	0,5351	0,3460	0,4248
<b>Belarus</b>	0,3278	0,3016	0,4118
Azerbaijan	0,3946	0,3238	0,3660
Armenia	0,2709	0,1746	0,3268
Tajikistan	0,0368	0,0889	0,2418

<sup>1)</sup> UN data.

**12.3. e-Government readiness index in 2010<sup>1)</sup>**

	Rating	Index
Republic of Korea	1	0,9283
Netherlands	2	0,9125
United Kingdom	3	0,8960
Denmark	4	0,8889
United States	5	0,8687
France	6	0,8635
Sweden	7	0,8599
Norway	8	0,8593
Finland	9	0,8505
Singapore	10	0,8474
Canada	11	0,8430
Australia	12	0,8390
New Zealand	13	0,8381
Liechtenstein	14	0,8264
Switzerland	15	0,8134
Israel	16	0,8100
Germany	17	0,8079
Japan	18	0,8019
Luxembourg	19	0,8014
Estonia	20	0,7987
Austria	21	0,7840
Iceland	22	0,7835
Spain	23	0,7770
Belgium	24	0,7718
Slovenia	25	0,7492
Monaco	26	0,7468
Russia	27	0,7345

Continued

	Rating	Index
United Arab Emirates	28	0,7344
Lithuania	29	0,7333
Croatia	30	0,7328
Hungary	31	0,7201
Italy	32	0,7190
Portugal	33	0,7165
Ireland	34	0,7149
Malta	35	0,7131
Bahrain	36	0,6946
Greece	37	0,6872
Kazakhstan	38	0,6844
Chile	39	0,6769
Malaysia	40	0,6703
Saudi Arabia	41	0,6658
Latvia	42	0,6604
Colombia	43	0,6572
Barbados	44	0,6566
Cyprus	45	0,6508
Czech Republic	46	0,6491
Poland	47	0,6441
Qatar	48	0,6405
Antigua and Barbuda	49	0,6345
Uruguay	50	0,6315
Serbia	51	0,6312
San Marino	52	0,6305
Slovakia	53	0,6292
Brunei Darussalam	54	0,6250
Mexico	55	0,6240

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	Rating	Index
Argentina	56	0,6228
Montenegro	57	0,6218
Andorra	58	0,6172
Brazil	59	0,6167
Bulgaria	60	0,6132
Belarus	61	0,6090
Romania	62	0,6060
Kuwait	63	0,5960
Oman	64	0,5944
Bahamas	65	0,5793
Ukraine	68	0,5653
Moldova, Republic of	69	0,5626
Georgia	72	0,5563
Uzbekistan	91	0,5099
Armenia	94	0,4997
Azerbaijan	96	0,4984
Kyrgyzstan	99	0,4879
Tajikistan	121	0,4069
Turkmenistan	125	0,3813

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<sup>1)</sup> UN data.

**12.4. Internet users per 100 population<sup>1)</sup>**

	2009	2010	2011	2012
Australia	74,3	76,0	79,5	82,4
Austria	73,5	75,2	79,8	81,0
Azerbaijan	27,4	46,0	50,0	54,2
<b>Belarus</b>	<b>27,4</b>	<b>31,8</b>	<b>39,6</b>	<b>46,9</b>
Belgium	70,0	75,0	78,0	82,0
Bulgaria	45,0	46,2	51,0	55,2
Canada	80,3	80,3	83,0	86,8
China	28,9	34,3	38,3	42,3
Croatia	50,6	56,6	59,6	63,0
Cuba	14,3	15,9	23,2	25,6
Cyprus	49,8	53,0	57,7	61,0
Czech Republic	64,4	68,8	73,0	75,0
Denmark	86,8	88,7	90,0	93,0
Egypt	25,7	31,4	39,8	44,1
Estonia	72,5	74,1	76,5	79,0
Finland	82,5	86,9	89,4	91,0
France	71,6	80,1	79,6	83,0
Georgia	20,1	26,9	36,6	45,5
Germany	79,0	82,0	83,0	84,0
Greece	42,4	44,4	53,0	56,0
Hungary	62,0	65,0	70,0	72,0
Iceland	93,0	93,4	95,0	96,0
India	5,1	7,5	10,1	12,6
Ireland	67,4	69,9	76,8	79,0
Italy	48,8	53,7	56,8	58,0
Japan	78,0	78,2	79,1	79,1
Kazakhstan	18,2	31,6	50,6	53,3
Kyrgyzstan	17,0	18,4	20,0	21,7
Latvia	66,8	68,4	71,7	74,0
Lithuania	59,8	62,1	65,1	68,0
Luxembourg	87,3	90,6	90,9	92,0
Malta	58,9	63,0	69,2	70,0
Mexico	26,3	31,1	35,0	38,4
Moldova, Republic of	27,5	32,3	38,0	43,4
Netherlands	89,6	90,7	92,3	93,0
New Zealand	79,7	83,0	86,0	89,5

Continued

	2009	2010	2011	2012
Norway	92,1	93,4	94,0	95,0
Panama	39,1	40,1	42,7	45,2
Poland	59,0	62,3	64,9	65,0
Portugal	48,3	53,3	57,8	64,0
Romania	36,6	39,9	44,0	50,0
Russia	29,0	43,0	49,0	53,3
Slovakia	70,0	75,7	74,4	80,0
Slovenia	64,0	70,0	69,0	70,0
Spain	62,4	65,8	67,6	72,0
Sweden	91,0	90,0	94,0	94,0
Switzerland	81,3	83,9	85,2	85,2
Tajikistan	10,1	11,6	13,0	14,5
Turkey	36,4	39,8	43,1	45,1
Turkmenistan	2,0	3,0	5,0	7,2
Ukraine	17,9	23,3	28,7	33,7
United States	71,0	74,0	77,9	81,0
Uzbekistan	17,1	20,0	30,2	36,5

<sup>1)</sup> Data of the International Telecommunication Union (ITU).

## 12.5. Mobile telephone subscriptions<sup>1)</sup>

(end of year; thousand)

	2009	2010	2011	2012
Armenia	2 191,5	3 865,4	3 210,8	3 322,8
Australia	22 200,0	22 500,0	24 490,0	24 338,0
Austria	11 434,0	12 241,0	13 022,6	13 588,0
Azerbaijan	7 757,1	9 100,1	10 120,1	10 125,2
<b>Belarus</b>	<b>9 686,3</b>	<b>10 332,9</b>	<b>10 694,9</b>	<b>10 676,5</b>
Belgium	11 775,2	12 154,0	12 957,6	12 879,1
Bulgaria	10 454,8	10 199,9	10 475,1	10 780,7
Canada	23 811,9	25 825,4	27 387,2	26 263,0
Cyprus	977,5	1 034,1	1 090,9	1 110,9
Czech Republic	13 062,6	12 972,9	13 285,1	12 973,1
Denmark	6 833,7	6 420,8	6 505,7	6 597,0
Estonia	1 570,5	1 652,8	1 863,1	2 070,5
Finland	7 700,0	8 390,0	8 940,0	9 320,0

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	2009	2010	2011	2012
France	57 918,0	57 785,0	59 816,0	62 280,0
Georgia	2 837,0	3 980,0	4 430,3	4 698,6
Germany	105 000,0	104 560,0	108 700,0	107 658,0
Greece	13 295,1	12 292,7	12 128,0	13 353,7
Hungary	11 792,5	12 011,8	11 689,9	11 579,4
Iceland	339,7	341,1	344,1	346,0
Ireland	4 704,5	4 701,5	4 906,4	4 905,9
Italy	90 032,9	93 666,0	96 041,0	97 226,0
Japan	116 295,4	123 287,1	132 761,1	138 362,8
Kazakhstan	17 063,2	19 402,6	25 240,8	28 731,4
Kyrgyzstan	4 487,1	5 275,5	6 277,1	6 797,9
Latvia	2 303,6	2 306,1	2 309,0	2 310,0
Lithuania	4 961,5	4 891,0	5 004,2	4 997,3
Luxembourg	720,0	727,0	765,0	761,3
Malta	422,1	455,6	521,7	539,5
Moldova, Republic of	2 784,8	3 165,1	3 587,4	4 080,1
Netherlands	20 149,0	19 179,0	19 829,3	19 643,0
Norway	5 354,6	5 599,3	5 694,0	5 731,8
Poland	44 806,6	46 952,1	50 160,2	50 840,0
Portugal	11 795,1	12 210,4	12 334,6	12 311,7
Romania	25 100,0	24 360,0	23 420,0	22 700,0
Russia	230 050,0	237 689,2	256 116,6	261 886,3
Slovakia	5 497,7	5 925,0	5 983,1	6 094,5
Slovenia	2 100,4	2 122,0	2 168,5	2 245,7
Spain	51 052,7	51 389,4	52 597,6	50 662,5
Sweden	10 440,0	10 992,4	11 454,3	11 643,2
Tajikistan	4 900,0	5 940,8	6 324,0	6 528,0
Turkey	62 779,6	61 769,6	65 321,7	67 680,5
Turkmenistan	2 132,9	3 197,6	3 511,0	3 953,0
Ukraine	54 942,8	53 928,8	55 576,5	59 343,7
United Kingdom	80 255,4	81 115,5	81 612,0	82 109,0
United States	274 283	285 118,0	298 293,0	310 000,0
Uzbekistan	16 417,9	20 952,0	25 441,8	20 274,1

1) Data of the International Telecommunication Union (ITU).

## 12.6. Mobile telephone subscriptions per 100 population<sup>1)</sup>

(end of year; units)

	2009	2010	2011	2012
Armenia	71,0	125,0	103,6	106,9
Australia	101,4	101,0	108,3	106,2
Austria	136,6	145,8	154,8	161,2
Azerbaijan	85,6	99,1	108,8	107,5
<b>Belarus</b>	<b>102,0</b>	<b>109,0</b>	<b>113,0</b>	<b>112,8</b>
Belgium	110,5	113,5	120,5	119,4
Bulgaria	138,6	136,1	140,7	145,7
Canada	70,7	75,9	79,7	75,7
Cyprus	89,6	93,7	97,7	98,4
Czech Republic	125,1	123,6	126,1	122,8
Denmark	123,7	115,7	116,8	118,0
Estonia	117,1	123,2	139,0	154,6
Finland	144,2	156,4	166,0	172,5
France	92,8	92,0	94,8	98,1
Georgia	64,9	91,5	102,3	109,2
Germany	127,4	127,0	132,3	131,3
Greece	117,4	108,2	106,5	116,9
Hungary	117,9	120,3	117,3	116,4
Iceland	107,7	106,5	106,1	105,4
Ireland	106,6	105,2	108,4	107,1
Italy	149,4	154,7	158,0	159,5
Japan	91,9	97,4	105,0	109,4
Kazakhstan	107,7	121,1	155,7	175,4
Kyrgyzstan	85,1	98,9	116,4	124,8
Latvia	101,9	102,4	102,9	103,4
Lithuania	148,5	147,2	151,3	151,8
Luxembourg	144,7	143,3	148,3	145,5
Malta	101,7	109,4	124,9	128,7
Moldova, Republic of	77,3	88,6	101,2	115,9
Netherlands	121,7	115,5	119,0	117,5
Norway	110,8	114,7	115,6	115,6
Poland	117,1	122,7	131,0	132,7
Portugal	110,7	114,4	115,4	115,1
Romania	116,5	113,4	109,3	106,1
Russia	160,8	166,3	179,3	183,5
Slovakia	100,8	108,5	109,4	111,2

Continued

	2009	2010	2011	2012
Slovenia	103,8	104,6	106,6	110,1
Spain	111,9	111,5	113,2	108,3
Sweden	112,1	117,2	121,3	122,6
Tajikistan	72,2	86,4	90,6	92,2
Turkey	87,4	84,9	88,7	90,8
Turkmenistan	42,8	63,4	68,8	76,5
Ukraine	120,2	118,7	123,0	132,1
United Kingdom	130,2	130,8	130,8	130,8
United States	89,1	91,9	95,3	98,2
Uzbekistan	60,5	76,3	91,7	72,2

<sup>1)</sup> Data of the International Telecommunication Union (ITU).

## 12.7. Fixed telephone lines<sup>1)</sup>

(end of year; thousand)

	2009	2010	2011	2012
Armenia	599,9	592,3	577,5	584,2
Australia	10 709,0	10 625,0	10 573,0	10 471,0
Austria	3 253,0	3 398,0	3 388,0	3 342,0
Azerbaijan	1 401,1	1 506,6	1 683,9	1 733,6
<b>Belarus</b>	<b>3 983,2<sup>2)</sup></b>	<b>4 138,6<sup>2)</sup></b>	<b>4 093,0<sup>2)</sup></b>	<b>4 173,3<sup>2)</sup></b>
Belgium	4 636,1	4 639,8	4 633,5	4 630,9
Bulgaria	2 205,4	2 222,5	2 355,7	2 252,5
Canada	18 708,0	18 394,0	18 201,0	18 010,0
Croatia	1 859,2	1 865,7	1 760,9	1 640,0
Cyprus	414,5	413,2	405,0	373,2
Czech Republic	2 526,9	2 405,5	2 289,0	2 100,0
Denmark	2 774,3	2 613,8	2 514,8	2 431,3
Estonia	492,8	482,2	471,9	448,2
Finland	1 430,0	1 250,0	1 080,0	890,0
France	40 934,0	40 622,0	40 043,0	39 290,0
Georgia	620,0	1 105,9	1 340,4	1 276,1
Germany	53 700,0	52 900,0	51 800,0	50 700,0
Greece	6 000,4	5 898,1	5 745,0	5 461,2

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	2009	2010	2011	2012
Hungary	3 068,7	2 977,2	2 933,3	2 960,6
Iceland	190,2	193,6	191,1	189,0
Ireland	2 131,9	2 078,0	2 046,6	2 007,7
Italy	22 642,7	22 466,0	22 105,0	21 656,0
Japan	66 794,3	65 618,7	64 668,5	64 273,1
Kazakhstan	3 856,5	4 057,6	4 265,8	4 340,3
Kyrgyzstan	498,3	489,1	502,0	488,9
Latvia	561,7	532,1	516,3	501,0
Lithuania	747,4	733,7	723,0	667,3
Luxembourg	263,6	272,4	279,1	266,7
Malta	246,9	247,6	232,2	229,7
Moldova, Republic of	1 138,7	1 161,1	1 180,0	1 205,8
Netherlands	7 256,0	7 232,0	7 133,0	7 086,0
Norway	1 770,9	1 647,4	1 529,0	1 465,6
Poland	8 493,5	7 667,1	6 852,6	6 125,0
Portugal	4 328,3	4 486,2	4 542,6	4 558,0
Romania	4 730,0	4 500,0	4 680,0	4 680,0
Russia	45 379,6	44 915,8	44 151,5	42 902,3
Slovakia	1 219,6	1 098,8	1 056,0	974,8
Slovenia	939,1	910,8	872,8	824,8
Spain	20 244,3	20 209,6	19 866,6	19 219,7
Sweden	5 140,0	4 734,5	4 482,2	4 321,3
Switzerland	4 704,5	4 651,5	4 608,8	4 382,0
Tajikistan	347,3	367,7	380,0	393,0
Turkey	16 534,4	16 201,5	15 210,8	13 859,7
Turkmenistan	494,3	520,0	547,0	575,0
Ukraine	13 026,3	12 941,3	12 680,9	12 182,1
Uzbekistan	1 856,6	1 892,2	1 927,7	1 963,4

<sup>1)</sup> Data of the International Telecommunication Union (ITU).

<sup>2)</sup> Number of main telephone lines (fixed) including payphones.

**12.8. Fixed telephone lines per 100 population<sup>1)</sup>**

(end of year; units)

	2009	2010	2011	2012
Armenia	19,5	19,2	18,6	18,8
Australia	48,9	47,7	46,8	45,7
Austria	38,9	40,5	40,3	39,7
Azerbaijan	15,5	16,4	18,1	18,4
<b>Belarus</b>	<b>41,9</b>	<b>43,7</b>	<b>43,2</b>	<b>44,1</b>
Belgium	43,5	43,3	43,1	42,9
Bulgaria	29,2	29,7	31,6	30,5
Canada	55,6	54,1	53,0	51,9
Croatia	42,2	42,4	40,1	37,4
Cyprus	38,0	37,4	36,3	33,1
Czech Republic	24,2	22,9	21,7	19,9
Denmark	50,2	47,1	45,1	43,5
Estonia	36,7	36,0	35,2	33,5
Finland	26,8	23,3	20,1	16,5
France	65,6	64,7	63,4	61,9
Georgia	14,2	25,4	31,0	29,7
Germany	65,2	64,3	63,1	61,8
Greece	53,0	51,9	50,4	47,8
Hungary	30,7	29,8	29,4	29,8
Iceland	60,3	60,5	58,9	57,6
Ireland	48,3	46,5	45,2	43,8
Italy	37,6	37,1	36,4	35,5
Japan	52,8	51,9	51,1	50,8
Kazakhstan	24,3	25,3	26,3	26,5
Kyrgyzstan	9,5	9,2	9,3	9,0
Latvia	24,8	23,6	23,0	22,4
Lithuania	22,4	22,1	21,9	20,3
Luxembourg	53,0	53,7	54,1	51,0
Malta	59,5	59,5	55,6	54,8
Moldova, Republic of	31,6	32,5	33,3	34,3
Netherlands	43,8	43,5	42,8	42,4
Norway	36,6	33,7	31,1	29,6
Poland	22,2	20,0	17,9	16,0
Portugal	40,6	42,0	42,5	42,6
Romania	22,0	20,9	21,8	21,9
Russia	31,7	31,4	30,9	30,1

Continued

	2009	2010	2011	2012
Slovakia	22,4	20,1	19,3	17,8
Slovenia	46,4	44,9	42,9	40,4
Spain	44,4	43,9	42,8	41,1
Sweden	55,2	50,5	47,5	45,5
Switzerland	61,7	60,7	59,8	56,7
Tajikistan	5,1	5,4	5,5	5,6
Turkey	23,0	22,3	20,7	18,6
Turkmenistan	9,9	10,3	10,7	11,1
Ukraine	28,5	28,5	28,1	27,1
Uzbekistan	6,8	6,9	6,9	7,0

<sup>1)</sup> Data of the International Telecommunication Union (ITU).

## 12.9. Main indicators of ICT use by households and individuals in 2011<sup>1)</sup>

(percent)

	Share of households having	
	personal computer	Internet access from home computer
Australia	82,6	78,9
Austria	78,1	75,4
Belarus	46,4	40,3
Belgium	78,9	76,5
Bulgaria	46,8	45,0
Czech Republic	69,9	66,6
Croatia	...	61,4
Cyprus	63,9	57,4
Denmark	90,4	90,1
Egypt	36,4	30,5
Estonia	71,4	70,8
Finland	85,1	84,2
France	78,2	75,9
Germany	86,9	83,2
Greece	57,2	50,2

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Continued

	Share of households having	
	personal computer	Internet access from home computer
Hungary	69,6	65,2
Iceland	94,7	92,6
Ireland	80,6	78,1
Italy	66,2	61,6
Korea, Republic of	81,9	97,2
Latvia	64,3	63,6
Lithuania	61,8	61,8
Luxembourg	91,7	90,6
Malta	76,4	75,3
Mexico	30,0	23,3
Netherlands	94,2	93,6
Norway	91,0	92,2
Poland	71,3	66,6
Portugal	63,7	58,0
Romania	51,2	47,4
Russia	57,1	46,0
Slovakia	75,4	70,8
Slovenia	74,4	72,6
Spain	71,5	63,9
Sweden	91,6	90,6
Turkey	48,5	42,9
United Kingdom	84,6	85,1

<sup>1)</sup> Data of the International Telecommunication Union (ITU).