Bulgaria – transition to Knowledge Society

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Information space in Bulgaria

Bulgaria has accepted the basic regulatory framework, which ensures the integrated approach towards the development of an Information Society:

- **Telecommunications Law** - fully harmonized with 2000 *acquis* and partially with 2002 *acquis*
  - Transparent regulatory system
    - *Significantly shortened terms and procedures for license issuing have been introduced*
    - *Decreased number of activities that require individual licenses*
- **New Telecommunication Law** – fully harmonized with the 2002 *acquis* will be adopted in the beginning of 2006
- **Law on the Electronic Document and Electronic Signature**
- **Law on the Protection of Personal Data**
- **Convention on Cyber Crime**
Information space in Bulgaria - results

- Incumbent BTC privatized in June 2004
- 16 new operators of fixed voice
- Fixed operators have started the construction of NGN, new services incl. VoIP
- 3-rd GSM operator started in the beginning of November 2005
- 3 UMTS licenses
- 4 Point-to-Multipoint licenses issued end of 2005
- Broadband – LAN access

- Digitalization of the fixed network is still too low – 34% as of the end of 2004, expected rate at end of 2005 – 60%
- Broadband is developing mostly in urban areas
- A small number of interactive services
Information space in Bulgaria - challenges

✓ **Speed:** faster broadband – content

✓ **Rich content:** increased legal and economic certainty to encourage new services and on-line content

✓ **Security:**
  - making Internet safer
  - combat computer crimes
Information space in Bulgaria - measures

- Actively promote fast and efficient implementation of the existing and updated *European laws*
- Actively support IT companies for creation of rich content through the introduction of new PPP models
- Establishment of a Cyber Security Center
Human resource capacity

- 12% of IT specialists in Eastern Europe
- 15,000 IT specialists in the country
- 110 Cisco academies in 26 towns and cities

Tertiary education (at least bachelor)

USA: 28%
Canada: 20%
Japan: 19%
UK: 18%
Spain: 17%
Bulgaria: 15%
Hungary: 14%
Germany: 13%
France: 12%
Greece: 12%
Poland: 12%
Czechs: 11%

Top 10 countries as per number of certified professionals per 10,000 inhabitants

USA: 8.2
Bulgaria: 5.8
Canada: 4
Australia: 3.6
Romania: 3.4
UK: 1.7
Ukraine: 1.2
Russia: 1.1
India: 0.9
Pakistan: 0.3
Innovation and investment

Investments in R&D

- Bulgaria has highly-qualified IT specialists
- Bulgaria is successfully constructing its Research Network
- All Bulgarian universities and institutes of the Bulgarian Academy of Sciences are connected to the Pan-European Research Network

Investment in R&D, % of GDP

- Bulgaria: 0.47
- Slovenia: 1.57
- Czech: 1.22
- Hungary: 0.95
- Estonia: 0.69
- Latvia: 0.69
- Turkey: 0.64
- Poland: 0.59
- Slovakia: 0.58
- Latvia: 0.44

- R&D expenditures are low
- A small percentage of SMEs are introducing ICT to enhance their performance
Innovation and investment - challenges

✓ Increasing investments in research and innovation

✓ Reducing the barriers between research results and economic rewards

✓ Deployment and adoption ICT in SMEs
Innovation and investment - measures

- Stimulation of private investment in high technology activities
- Establishment of high tech parks and business incubators
- Encouragement of entrepreneurship among scientists and researchers
- Establishment of call centers for the support of SMIs in the introduction of ICT
- Effective participation in European programs that support ICT introduction
- Introduction of distance working incentives
Inclusive Information Society

- All schools have computer classes
- 1000 (of total 3000) schools have broadband connection, in 2006 – all
- PC penetration and Internet penetration make a progress, but are still low

- Still too small number of business and citizen services
- Insufficient online content on the historical and cultural heritage
- 60% of Internet users are between 15 and 45 years old
Inclusive Information Society - challenges

✓ Making ICT products and services more accessible and more cost-effective

✓ Increasing computer literacy in all age groups
For successful transition to knowledge society Bulgaria relies on:

- Talented young generation and highly-qualified IT specialists
- Adequate professional and technological level of Bulgarian IT companies for the establishment of successful PPP models
- Effective participation in European programs
THANK YOU
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