Universities* and Information and Communication Technologies

Using and developing information and communications technologies offer universities tremendous new possibilities in research and education and open wider access to information. Universities have been at the forefront of ICT development as well as among the leaders in integrating and adopting these technologies into their work, especially in teaching, learning and research, as well as community outreach, library and information services and management. As universities develop and expand the use of ICTs in their activities they are strengthening their capacity to enhance quality and respond to new challenges. It must nevertheless be recognized as well that benefits from ICTs are not equitably shared around the world.

Fundamental Questions and the Need for ICT Policy

Recognizing that ICTs bring challenges as well as opportunities and that these must be addressed to ensure that technology truly serves research and educational needs without bringing unexpected negative impacts and undermining important values, the International Association of Universities (IAU) has been a keen observer of ICT production, development and application in universities. The IAU has identified the following areas as being of particular importance:

· the impact on cultural and linguistic diversity in higher education of expanded use of ICTs;
· the need to safeguard university values such as academic freedom when developing the ICT policy of universities;
· the need for continued attention to quality also when applying ICTs in teaching and learning;
· the need to understand the impact of using ICTs in the learning process;
· the recognition of the crucial socializing role of higher education institutions;
· the striking and widening inequalities between developed, developing and least developed countries in terms of access and capacity to use ICTs;
· the need to protect student involvement and influence at universities when implementing ICTs.

Recommendations

Conscious of the importance and complexity of ICT-related issues for its highly diverse Membership, the International Association of Universities stresses that appropriate policies and strategies are required at the institutional, governmental and international level. The Association recommends that:

International community and intergovernmental organizations

1. promote the development of internationally compatible ICT tools, thus ensuring a global standardization of processes and systems in order to enable effective cooperation and exchanges in research and training around the world. At the same time, efforts should be made to ensure that the potential of ICTs is more equitably shared around the world and to avoid the overwhelming domination by developed countries in terms of ICT production, development and application;

2. initiate ICT development programs at a regional and an international level with the contribution of national authorities and all stakeholders (private sector, Civil Society groups and universities) in order to bridge the “digital divide” between the developed countries and the developing and least developed countries. Such global solidarity is urgently needed to provide universities in least developed countries with the appropriate financial, technical and human support required to make ICTs available and to promote capacity building so that the technologies can be adopted locally in each region;

3. strengthen and contribute to policies and mechanisms that guarantee mutual and equitable recognition of qualifications and degrees around the world, in response to the increasing internationalization of higher education also enhanced by the use of ICTs;

4. ensure that existing or renewed legal frameworks in regard to the protection of intellectual property and copyright are applied and respected. Regulate the risks of cyber piracy and informatics crimes including plagiarism, data manipulation, etc. These legal frameworks should secure full access for all users to knowledge and information for educational and research.
purposes;

**Governments and national authorities**

5. safeguard public responsibility for higher education and research. Given the increasing trans-national for-profit higher education market, it is of particular importance that universities provide the widest and most equitable access to higher education and retain their important role in the pursuit and dissemination of knowledge in the age of ICTs;

6. frame ICT policies for higher education systems, explicitly stating objectives, action plans and committing public funds in order to afford each university equal opportunities to benefit from the potential of and meet the challenges raised by ICTs;

7. develop appropriate telecommunication infrastructures to allow each university access to ICTs for educational and research purposes, either free of charge or at reasonable rates. This will require the provision of reliable electrical and telecommunication facilities;

**Universities**

8. develop and continuously update institutional ICT policies in order to align educational and research objectives with the most appropriate technology choices and adequate financial and human resources. These policies should:

- place quality in teaching and learning as well as in research at the center of ICT-based developments at the institution, since a focus on pedagogy, curriculum and content-related questions are of utmost importance as the use of ICT tools expands. ICT application to teaching and learning should not be viewed as a substitute for teachers, but rather as a means of their empowerment. Policy should promote adoption of ICTs as a means for teachers to gain easier and wider access to information, to initiate greater exchange opportunities with peers and engage in a new, enriched interaction with students;
- provide all members of the academic community and non-academic staff with skills to use up-to-date ICTs. Sufficient and on-going financial support should also be allocated to ensure that all students are provided with the relevant ICT skills;
- safeguard a genuine cultural pluralism in educational and research material, given the increasing globalization of higher education, enhanced by ICTs;

9. examine critically and on an on-going basis the use of ICTs in the educational process in order to avoid an exclusive reliance on technologies even in the case of distance learning or virtual universities. The face-to-face interaction within the academic community and thus the socializing dimension of higher education must be maintained;

10. develop and build bilateral, regional and international networks or partnerships in research, courseware, development of information services and ICT expertise. Such partnerships, based on the principles of cross-cultural, equitable and non-commercial co-development could make a significant contribution to bridging the digital divide' between higher education institutions in developed, developing and least developed countries;

**International Association of Universities**

In line with all these priorities, the International Association of Universities will pursue its efforts to:

- act as a platform for information sharing in regard to the use of ICTs in higher education, stimulating exchange of expertise and disseminating examples of good practices such as the Open Educational Resources;
- advocate and promote networking among higher education institutions to share experience, educational material and ICT facilities in order to ensure that institutions in all parts of the world can fully participate in exchanges of information, knowledge and expertise;
- encourage the development of a code of good practice for the exchange of research results and products in the field of ICTs;
- promote cooperation and consortia for the design and dissemination of educational materials in non-dominant’ languages.

* the word “Universities” refers to all university level higher education institutions.