Discussion Group 3 - Guidelines and directions for ICT policy in education

Chair: Anton Knierzinger (Austria)

Rapporteurs: William Newman (Australia)
Stanford M. Gudza (Zimbabwe)

Participants: Florence T. Chinwadzimba (Zimbabwe), Giuliana Dettori (Italy),

Bojka Gradinarova (Bulgaria), Tendayi Kakora (Zimbabwe), Joseph Mandibvisa (Zimbabwe), Aaron V.J. Ndlovu (Zambia), Thuto Ntsekhe-Mokhehle (Lesotho)

1 INTRODUCTION

This document does not attempt to prescribe policy. It is provides guidelines and directions that are important in considering the creation of policy. Policy in its final form applies to all schools and as such must be very carefully worded.

2 STRATEGIC OBJECTIVES

The following objectives are designed to encompass a governmental approach to Information Technology (IT). They are designed to improve the range of available services, and encourage economic development and employment growth in industries of the 21st century.

- network to introduce innovative and competitive telecommunications infrastructure and solutions for the country;
- encourage business and employment growth to develop an internationally competitive business sector that is confident and proficient in the use of IT; this can be an aim to make students better employable;
- enhance service delivery to enhance the delivery of services from government and the private sector in the key areas of government, business and home;
- provide new ways to learn to provide all citizens with the opportunity to learn the skills to use the new technology for their benefit.

3 IMPLEMENTATION

The information in this document relates to primary and secondary levels of education. At both levels there has to be an emphasis on the computer as a tool. It

is important at a primary school level to ensure that IT is not viewed as a specialist subject that only a few people can do. If IT is implemented as a special subject it can have the effect of allowing teachers not involved in the teaching of IT to sit back and do nothing.

At a secondary level IT should also be taught in an integrated way. There is a need to offer IT as a discipline in upper secondary ('O' and 'A' levels) and tertiary levels. It is not necessary to examine IT skills other than in the formal discipline subjects at upper secondary level.

- It is important in formulating policy that the issue of technical support be addressed. Technical support is defined as the fixing of hardware.
- IT sponsorship from industry should be actively sought by individual schools. It is important in doing so that government does not relinquish its responsibility to provide support.
- It is important to focus on the education of IT use rather than on training in IT for its own sake.
- Schools rather than ministries or governments decide on the appropriate hardware and software for the school.
- The emphasis on IT in education should be on function and philosophy, and not on simple skill acquisition.
- It is vitally important to remember that all goals and strategies are inter-related and no one point can be considered in isolation.

4 IMPLEMENTATION STRATEGY

The following areas provide a means whereby the above objectives can be met.

4.1 Sensitisation

Sensitisation is defined as the process of making people aware of the importance and implications of the use of IT in education. It should involve all stakeholders including industry, politicians, parents, principals, teachers and proprietors. It can be achieved by a number of strategies including seminars, information on what is happening elsewhere, demonstrations of what people can do personally, creating a personal interest, demonstrating a need and showing how the resources can be used in the general community.

4.2 Curriculum

- Curriculum needs to be revised on a regular basis.
- Methodologies should be emphasised in the curriculum.

4.3 Support

Support is essential and must have a high priority. In particular, it must concentrate on pre-service and in-service training as well as training the trainers.

- The provision and level of training is important. IT as a discipline should only be taught by teachers qualified to do so.
- All teachers must have the skills to use IT in their teaching of the curriculum.
 Fundamental to this is the need to provide critical thinking skills in the use of the technology.
- An ongoing professional development program is essential.
- Extensive pre-service training on the use of IT should be compulsory. This training must include methodological guidelines.
- Emphasis must be on teacher training ahead of hardware purchases.
- Teacher training is the cornerstone of any success.
- Continuous support and training of teachers is considered to be essential.

5 CONCLUSION

The above information can be used to create policy. It is not itself policy. Every country will have its own constraints and challenges in formulating and then implementing policy.