Chapter 8
Integrating Digital Literacy in Competency-Based Curriculum

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ABSTRACT
This chapter discusses the integration of digital literacy in competency-based curriculum (CBC). In the introduction, the authors discuss the 21st century skills and their relevance to the competency-based curriculum. The discussion funnels from global, regional, and local contexts. Theoretical perspectives in ICT and the CBC are dealt with to provide a background. Multiple approaches of integrating digital literacy within the curriculum are highlighted later in the chapter. These issues are discussed in the light of the extant literature on digital literacy and the competency-based curriculum. The discussion revolves around the trends, controversies of digital literacy in the CBC with possible solutions put forth towards the end of the chapter. Finally, recommendations and future research directions are made. The chapter concludes with a summary of the major issues discussed in the chapter and recommendations for further reading.

INTRODUCTION
The demands of the 21st century has created the need to equip the new generations of millennials with new skill sets that will enable them to contribute positively to the challenges of the new order of things. These demands have precipitated the need for a curriculum that incorporates the desired skills – the 21st Century skills. The development of the Competency Based Curriculum (CBC) is an effort to make this a reality. This chapter discusses issues relating to digital literacy and how they can be integrated in the CBC. The concept of CBC is discussed from a global and regional perspective and various issues surrounding the integration of digital literacy in the CBC are discussed in great length. In many developing countries, there is a mismatch between the curricula and the needs of the labour market. Youth graduating from the education system are unable to fit properly in the job market. Many countries around the world have implemented the CBC curriculum to address the challenges faced by the employment sector and bridge the gap between the skills requirement and education. Digital literacy is one of the
necessary skills. This chapter will discuss some of the ways through which digital competencies can be taught through the curriculum.

In Kenya, the Ministry of Education has piloted a new competency-based curriculum and is in the process of implementing it to replace the previous system that has been too exam oriented. The impetus for the new curriculum is to teach new competencies to school-age children that will enable them face the challenges of the 21st century. Among the competencies embedded in the new curriculum is digital literacy. The chapter discusses some of the pertinent issues around digital literacy and the competency-based curriculum. Drawing on global and local experiences, the objectives of the Chapter are to provide a general understanding of the issues of digital literacy and its integration in the CBC. It seeks to discuss the issues, perspectives and challenges in the integration of digital literacy and contribute to the discourse around competency-based curriculum and digital education.

The chapter is organised as follows. After a description of the underlying concept of digital literacy, the issues around the competence-based curriculum, perspectives and challenges surrounding the integration are discussed. The final recommendations for further reading and research are provided for the purposes of extending the discourse.

BACKGROUND

ICT in Education

The aim of education is to prepare a labour force that will meet the requirements of the labour market. Information communication and technology has received adequate attention in education. The United Nations and other global partners in education have mainstreamed ICT in their developmental agendas. The UNESCO ICT Competency Framework for Teachers was developed to support countries to put in place policies and standards that provide guidelines for national teacher ICT competency. It aimed at providing an important component for governments to develop legal frameworks for the integration of ICT in Education Masterplans (Olsson, 2006). The framework has three different approaches to developing teachers’ competencies. These are: the development of technology literacy, enhancing knowledge deepening and eventually the creation of knowledge. The use of ICT in teaching is essential because it makes learning to occur more efficiently and effectively. Through the use of ICTs, students are able to deepen their understanding and create new knowledge in their subject areas. They can innovatively apply this to solve the complex problems that face modern societies (UNESCO, 2011).

The use of technology in education necessitates the equipping of teachers with new pedagogical competencies and new approaches in teacher education. Teachers should become aware of policy goals and be able to identify the various areas of education reform that are related to these policy goals. The policy goals identified in the UNESCO ICT framework are technology literacy, knowledge deepening and knowledge creation. These policy goals are discussed in the following sections under the broad sub-heading of digital citizenry, collaborative learning/teaching and lifelong learning. They provide essential building blocks for erecting the digital edifice in educational institutions that will provide a basis for efficiency and effectiveness.