Chapter 21

Incorporating Information Literacy into Instructional Design within Pre-Service Teacher Programs

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ABSTRACT

As information and technology increase, the need for help in accessing, evaluating, and using information efficiently rises. Preservice teachers need information literacy for their own study, instructional practice, and as a set of skills to teach PK-12 students. Librarians are uniquely trained and experienced in this arena, so their instructional role has the potential to serve as a central function in teacher preparation. In reality, educator librarians collaborate on several levels; ideally, they are instructional partners with teacher educators.

INTRODUCTION

The management, processing, and transformation of information constitute central tasks in education. As information and technology increase, the need for help in accessing, evaluating and using information efficiently rises. Librarians are uniquely trained and experienced in this arena, so their instructional role has the potential to serve as a central function. Therefore, as they assume the role of instructional partners for preservice teachers, librarians need to be intentional about instructional planning and implementation. This chapter examines the competencies needed for entering PK (pre-kindergarten)-12 grade teachers, and explains the role that information literacy plays in gaining such competencies. Next, the chapter discusses the role of librarians in supporting information literacy curriculum, and suggests ways that PK-20 education librarians can collaborate with teacher educators to design instruction that incorporates information literacy.

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BACKGROUND

In order to examine how teacher preparation programs incorporate information literacy, the need for such inclusion needs to be established.

What Do Teachers Need To Know And Do?

Today’s teachers need to prepare their students for a constantly changing world. Students must learn how to navigate their world, engage with it, make meaning of it, survive in it, and contribute to it. To this end, students need to gain declarative knowledge (such as facts), procedural knowledge (how to do a task), and conceptual knowledge. In addition, students also need to develop psychomotor skills and address attitudes.

One of the goals of education is to help individuals become functionally literate, which involves a continuum of skills that enables students to be able to do something: procedural knowledge. Students need to access, comprehend, and respond to information. In the United States, reading and writing ability are core competencies in that process. However, other skills such as numeracy and visual acuity are also implicated because knowledge can be represented in so many forms. Increasingly, other countries combine information and communication literacies under the heading ICT (Information and Communication Technology). Indeed, the term “literacy” has sometimes been replaced by “multiliteracies,” and has been both parsed and broadened to explicit call attention to technology literacy, media literacy, visual literacy, aural literacy, numeracy, and even social literacy. The 2010 Common Core State Standards reinforce the need for multiliteracies as they emphasize deep and broad reading, the ability to write and research, and use media technology for analysis and production.

According to the National Council for Accreditation of Teacher Education (NCATE) (2008), beginning teachers need to demonstrate the following competences:

- “Select instructional strategies and technologies, based on research and experience, that help all students learn” (NCATE, 2008, p. 2).
- Construct learning experiences that “support individual students’ development, acquisition of knowledge, and motivation” (Association for Childhood Education International, 2007, p. 1).
- Understand, integrate, synthesize and teach content knowledge, skills, and dispositions
- Use a variety of teaching strategies to encourage students to develop critical thinking and problem solving skills.
- Foster active student engagement in learning and social interaction.
- Effectively assess for instruction, and make adjustments to positively impact student learning.
- Model reflective practice in light of research.
- Collaborate professionally with the school community and local agencies.

Over the last decade, the educational picture has changed in the United States. Technology has advanced, particularly in the area of social media, which fosters collaboration but also requires more discernment. Around the world, teacher preparation programs see the need for entering teachers to use information and communications technologies for personal use and as a tool for learning (Kirschner & Davis, 2003). Globalization pushes the need for cultural awareness and interaction. Educational accountability has also increased, with teachers needing to employ evidence-based practice. For