Blended Learning in Teacher Preparation Programs: A Literature Review

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ABSTRACT

This paper reviews relevant literature on the concept and design of blended learning in Teacher Preparation Programs (TPPs). First, the authors define blended learning in this context and explained an activity system as an analytical framework. Second, the authors describe the method for choosing the studies in this literature review. Third, the authors present some findings through the lens of an activity system. Finally, the authors discuss how the activity system can analyze the effectiveness of blended learning. The activity system framework is very useful to examine the effectiveness of blended learning because the framework explains what components should be included and examined by research. This review could offer some guideline for the nature of blended learning in TPPs for future study.

Keywords: Activity System Framework, Blended Learning, Educational Technology, Online Learning, Teacher Preparation Programs

INTRODUCTION

Online learning is a major emerging issue in education fields, and many higher education programs provide students with online learning (Clary & Wandersee, 2009; Garrison & Kanuka, 2004). Since online learning was first introduced for educational purposes, the technology has changed and developed dramatically. For instance, technology has provided learners with more opportunities to interact with instructors and other learners. However, irrespective of these changes, online learning in higher education has not changed in full accordance with the development of technology and the demands of the information society. Specifically, teacher preparation programs (TPPs) for K-12 classrooms generally do not provide student teachers (STs) with their own distinct specialized online programs, so their online experiences do not go beyond online learning in other fields.

Although online learning could overcome the limitations of traditional learning, the online learning approach has produced other problems, such as separation, isolation, and estrangement among members, limited feedback, and lack of responsibility (Lock, 2006). Consequently, blended learning is an important alternative approach for overcoming the limitations of both...
face-to-face and online learning, because this approach adopts the advantages of both types of learning (Schlager et al., 2002). Blended learning is more effective than face-to-face or online learning in terms of students’ satisfaction and faculties’ responses (Wingard, 2004), time and place flexibility, ease of using resources, increase of interactions (Lock, 2006), and effectiveness of interaction between peers and instructors (Chamberlain et al., 2005). TPPs have also provided blended learning approaches for their STs. Research also suggests that these approaches are effective for improving STs’ discussion skills, developing their communities of practice, and achieving their course purposes (Means et al., 2009).

The blended learning approach is a new area, and the concept is still ill-defined and inappropriately used in many contexts (Oliver & Trigwell, 2005), but the interest in and research on blended learning in the context of higher education have increased and developed respectively. In comparison with research in higher education, empirical study of the blended learning approach in teacher education fields is relatively limited (Wang, 2008). According to Means et al. (2009), a meta-analysis and review of online learning studies conducted from 1996 to 2008 showed that only 10 studies were related to teacher education (10 out of 176) and there was no empirical study about the blended learning approach in TPPs. This data showed that the blended learning approach has been developed and applied in higher education, but research on the teacher education field is limited and needs to investigate the effectiveness of blended learning empirically. Dede (2006) also argued that there is “little known about best practices for the design and implementation of these alternative models for professional enhancement” (p. 2).

We argue that there are some reasons for the small number of studies on the blended learning approach in TPPs. First, not all teacher educators agree that blended or online learning approach is effective in TPPs because of the limitations of technology to improve STs’ learning and their field experiences. Having authentic field experiences and developing pedagogical knowledge and practice through classroom activities are considered to be important in TPPs. However, teacher educators seem to believe that face-to-face classroom is more effective in providing these opportunities to their STs which seems to have caused the paucity of research on blended learning in TPPs. Second, even though some TPPs provide a blended learning approach to their STs, it is not easy for researchers to evaluate the effectiveness of the programs because of limitations in the methodology being used.

The success of traditional TPPs is related to successful transition from student to teacher, formation of teacher identity, and development of professional learning. However, these features are not easily observed or examined in the online learning environment. New or different research methods which can examine the effectiveness of a blended learning approach in TPPs are necessary. Third, related to the first issue, some instructors and STs are in transition from the possibility of the blended learning approach to its necessity in TPPs. However, many educators have just suggested possible models – there is need to establish a practical model that teachers can apply in their classrooms.

The goal of this review is to synthesize the literature that has examined blended learning in Teacher Preparation Programs (TPPs). First, we define blended learning in this context and explain an activity system as an analytical framework. Second, we describe our method for choosing the studies in this literature review. Third, we present some findings through the lens of an activity system. Finally, we discuss how the activity system can analyze the effectiveness of blended learning and provide suggestions for how this literature review could help researchers design and study blended learning in TPPs in the future.

**BLENDED LEARNING AND ANALYTICAL FRAMEWORK**

**Blended Learning**

Some researchers have defined blended learning as the integration of face-to-face and online
Activity Theory Approach to Developing Context-Aware Mobile Learning Systems for Understanding Scientific Phenomenon and Theories
Lorna Uden and Gwo-Jen Hwang (2013). *International Journal of Distance Education Technologies* (pp. 30-44).
[www.igi-global.com/article/activity-theory-approach-to-developing-context-aware-mobile-learning-systems-for-understanding-scientific-phenomenon-and-theories/102814?camid=4v1a](www.igi-global.com/article/activity-theory-approach-to-developing-context-aware-mobile-learning-systems-for-understanding-scientific-phenomenon-and-theories/102814?camid=4v1a)

Great Plains Interactive Distance Education Alliance (Great Plains IDEA)
Virginia Moxley, Sue Maes and Dawn Anderson (2010). *Cases on Distance Delivery and Learning Outcomes: Emerging Trends and Programs* (pp. 110-130).
[www.igi-global.com/chapter/great-plains-interactive-distance-education/37998?camid=4v1a](www.igi-global.com/chapter/great-plains-interactive-distance-education/37998?camid=4v1a)