Chapter 11
Evaluating the "Flipped" Face to Face Classroom and the Online Classroom in Teacher Education

Lori Severino
Drexel University, USA

Mary Jean Tecce DeCarlo
Drexel University, USA

ABSTRACT

This chapter will discuss a study that set out to determine if knowledge of the structure of language and self-efficacy of pre-service and in-service teachers was impacted by whether the course was taken in a face to face or online format. Results of the study showed there was a statistically significant change in the Teacher Knowledge Assessment: Structure of Language (TKA: SL) for participants in the online courses, but not for students taking the course face to face. To determine whether or not self-efficacy increased, the Teacher Efficacy Scale: short form (TES) was used, The TES includes two subscales: teacher efficacy and personal efficacy. Results showed no statistical significance on the overall TES score between participants; however, on the personal efficacy score, there was a statistically significant change in pre and post test scores of participants who took the course face to face.

INTRODUCTION

Many people are turning to online degree programs to complete their coursework for teacher certification. Distance education has become an option for students that live far away from a university and for those who either do not have the time and or money to attend on campus. In the United States hybrid courses, flipped classrooms, and fully online classes are new options for those interested in becoming teachers. There has been concern over whether or not eLearning can provide the same opportunities and experiences necessary to develop successful teachers as face to face formats (Downing & Dyment, 2013; Fogle & Elliot, 2013). These online learning options raise several questions. Can pre-service teachers taking online courses gain the knowledge to become effective teachers in the classroom? Do university

DOI: 10.4018/978-1-5225-0522-8.ch011

students engaged in eLearning gain similar content knowledge to students in face to face courses? Do the on line students experience gains in self-efficacy? Are they provided with similar opportunities as their peers receiving instruction face to face? A set of university professors had these same questions and designed a study to investigate them. The study was completed at a university in the Northeast, United States. This School of Education has a well-regarded, online teacher education program as well as traditional face to face programs on campus. The professors wanted to explore the learning experiences, the knowledge gains and the feelings of self-efficacy between and among participants taking a course either in a "flipped" face to face class or an online class. This chapter will examine the similarities and differences in participant outcomes and experiences when a field-based, special education course geared toward struggling readers is offered online and also as a "flipped" face to face course on campus.

BACKGROUND

In the United States the majority of elementary and secondary teachers are trained through traditional four year undergraduate programs in colleges and universities (U.S. Department of Education Office of Postsecondary Education, 2013). Graduate degrees are also offered for those who wish to get an additional certification or deepen skills in a particular subject area. Degrees can be earned in early childhood education, elementary education, middle school education, secondary subject specific education, arts and physical education and special education. All of these programs include general academic coursework as well as classes in educational psychology, learning theory, teaching methods, and education law. Teacher education programs also provide pre-service educators with time in the field observing and working with students in elementary and secondary schools.

Successful program completers then apply for a teaching credential from a specific state. Each state has a Board or Department of Education, which requires educators to obtain a teaching license. All fifty states have standards for elementary and secondary classroom teachers, and 44 have specific teacher standards for all levels of special education (U.S. Department of Education Office of Postsecondary Education, 2013). Institutions of higher education submit plans of study to the state that demonstrate that the university coursework aligns with these standards.

Teacher education programs are now being influenced by the growth in eLearning. Some universities offer some or all of their courses online in synchronous or asynchronous formats. Even while attending on campus, students can choose to take some of their courses online. Flipped classrooms are also being incorporated into on campus programs. In a flipped classroom design, direct instruction moves from the group learning space to the individual learning space (What Is Flipped Learning, 2014). Content is delivered via online lectures and learning activities and face-to-face classroom time is devoted to applied learning such as problem sets, lab activities or field experiences. In this study, the "flipped" classroom involved field experiences and hands on learning in elementary or secondary schools.

Concerns have been raised about online learning and online teacher preparation specifically. Individual studies have found that online students can have lower graduation rates than on campus students (Grau-Valldosera & Minguillón, 2014; Jaggar & Hu, 2010). Fogle and Elliot (2013) found that school administrators who had not experienced online learning themselves were reluctant to hire teachers whose coursework was exclusively taken online. However larger meta-analyses have concluded that students from primary school through university can and do learn effectively in online formats (Means, Toyama, Murphy, Bakia, & Jones, 2009; The Future of State Universities, 2011).