

# [Critical review of a study of digital citizenship](https://assignbuster.com/critical-review-of-a-study-of-digital-citizenship/)

The purpose of this paper is to conduct a critical review of a dissertation by LeeAnn Lindsey (2015) titled “ Preparing Teacher Candidates for 21 st Century Classrooms:  A study of Digital Citizenship.”  Each chapter will be examined and pertinent information discussed via the assignment prompts.

## Abstract Review

### Summary

After instituting technological approaches to the instruction of teacher candidates at Mary Lou Fulton Teachers College at Arizona State University, it was realized that an important aspect was missing – digital citizenship (DC).  Online modules and support systems born out of the Technology Infusion Support System (TISS) were put in place to assist faculty in teaching DC in their courses.  To determine TISS’ effectiveness in promoting DC, the author utilized a mixed methods action research approach, which included surveys, observations, interviews, and researcher journals, and was guided by the Theory of Planned Behavior.  The results of the study involving faculty, students, and technology specialists indicated that the inclusion of TISS was beneficial in teaching DC (Lindsey, 2015).

Further Discussion

The author did well to applicably and succinctly explain her study.  Her writing was sequential and walked the reader through the major sections of the dissertation.  Although the problem of practice was explained, I felt that it lacked any expression why it was a problem, outside of the obvious oversight of not including digital citizenship in the original curriculum.  Butin () expresses that any review of the literature in the abstract should be at a minimum; however, creating a brief sense of why digital citizenship was important would have been advantageous.  The methodology was appropriately referenced, as were the results, which was helpful in understanding core aspects of the study.  The discussion write-up gave just enough information to know what to expect upon further reading.  Given that the goal of the abstract is to provide a “ summary of your dissertation” (Butin, (), p. 127), I thought that the author covered the basics in detailed enough fashion so future readers would have a salient understanding of what the dissertation entails.

Context – Chapter One

Purpose

The purpose of the action research study was to determine the effects of educating teacher candidates about digital citizenship using a Technology Infusion Support System (TISS) intervention versus direct instruction in the classroom.  In using a mixed-methods research approach, the author sought to answer four over-arching questions in better informing her practice and determining the effectiveness of the aforementioned intervention (Lindsey, 2015).   According to Lindsey, the first three research questions centered on “ How does the TISS influence instruction of digital citizenship in a teacher preparation program?” (p. 12), “ How and to what extent does instructors’ use of the TISS to teach digital citizenship influence teacher candidates’ beliefs about promoting and modeling digital citizenship” and their “ intention to promote and model digital citizenship?” (p. 13).  The last research question Lindsey asked was “ To what extent do behavioral beliefs, behavioral attitudes, normative beliefs, subjective norms, control beliefs, and perceived behavioral control predict teacher candidates’ intention to promote digital citizenship in their future classrooms?” (p. 13).

Summary

Since 2010, significant attention has been given to the use of educational technology in the form of money invested and rhetoric around its implementation from governmental agencies to school districts.  As a result, the importance of digital citizenship has emerged as an important topic in education due to the influx of technology in schools and its use by faculty and students.  In 2009, Arizona State University’s Mary Lou Fulton Teachers College set forth a campaign to increase academic rigor in their teacher preparation programs, which yielded a departure from direct instruction regarding educational technology.  To combat this loss, the college sought to teach important aspects of this now defunct class to teacher candidates through a method of infusion of core technological aspects into other required classes.  Unfortunately, this initially left out the important component of digital citizenship.  To remedy this problem, the author, who was hired to oversee this new mode of instruction, developed online learning modules and systems of support so teacher candidates could receive necessary instruction while not overburdening professors whose content knowledge didn’t align with educational technology.  To determine the effectiveness of this intervention, a mixed-methods action research study was conducted (Lindsey, 2015).

Situational Context

The situational context was well defined and articulated throughout the entire discussion.

The author was descriptive in explaining the massive size of the context (MLFTC at ASU), which provided the reader with a sense of importance regarding the magnitude of the eventual problem of practice.  The sequencing of events was described in great detail so as to provide the reader with a clear understanding of what was happening and why, i. e., loss of curriculum on digital citizenship due to a change in curriculum, which was sparked by an increase in academic rigor for teacher candidates.  Moreover, the author was very thorough in explaining who the major players in this context were (e. g., instructors, teacher candidates, herself) and the litany of steps (e. g., mining courses for best practices) and obstacles (e. g., instructor comfort level with technological instruction) that paved the way to an eventual intervention to address digital citizenship (i. e., online learning modules).  Overall, the author thoughtfully explained the local context in which the action research study took place and provided relevant information to guide the reader in their understanding; however, although I concluded that this was related to on-campus bachelor programs through the use of deductive reasoning, this could have been more explicit, especially with the influx of online learning degrees.

Local/National Connection

The author did well from the outset to describe the national context of technological advancement in education and draw a connection to her local context (i. e., MLFTC at ASU).  By discussing national trends in educational technology both at the governmental and local levels (e. g., school districts) it became clear that teacher candidates would be on the front lines of any new initiatives (e. g., technology in the classroom); therefore, teacher preparation was of paramount importance.  This backdrop made a strong connection as to why the study was of importance and how the problem of practice (i. e., teacher candidates needing to learn about digital citizenship in their preparation) evolved.  Moreover, the author further narrowed the connection by discussing how MLFTC had received numerous grants in support of teacher preparation in the area of technological integration in the classroom but that there was a lack of understanding regarding digital citizenship in relation to faculty and student knowledge.  Although not explicit, it was clear that the research questions were born out of the national context influencing the local, as they were designed to better understand digital citizenship from the perspectives of teacher instruction and student beliefs and motives given the trends described regarding the rapid growth of technology in schools.  In describing the benefits of technological advances in education, Lindsey (2015) expertly brought in an alternative view in how “ the increased potential for technology misuse in the form of disruptive, unsafe, or unethical behaviors is also frightening to many teachers, administrators, and parents” (p. 3).  The latter, I believe, sets the tone for the importance of the study being done in the local context of the teacher preparation program at MLFTC.

Literature Review – Chapter Two

Summary

The rise of technology in educational settings and others (i. e., outside of the school setting), due to ongoing advancements, has surpassed proper ethical standards, laws pertaining, and policies related to its use.  Emanating from this dilemma is the notion of digital citizenship, which speaks to the responsible and safe use of technology by its users, particularly students.  Moreover, schools have been identified as needing to increase accountability measures including monitoring students and their technology use, filtering of content entering the school, and creating acceptable use policies; however, these have all been shown to have varying degrees of impact (e. g., often a lack of awareness or understanding by school administrators and teachers), as well as challenges with implementation (e. g., filtering may block useful content and are easily manipulated).  That said, an Australian study of 15-16 year olds yielded positive results in students committed to being a more responsible digital user when exposed to online learning teaching on the subject.  Seeing the growing need for teachers to be well-versed in the area of digital citizenship, preparation programs have been tapped to be include such content in their curriculum (e. g., including ISTE standards, particularly digital citizenship).  In conjunction with outlining the need for establishing a method of instruction for digital citizenship content, the idea of a blended and flipped learning module was introduced as a means to be operationalize content delivery on the topic of building technological capacity in new teachers, particularly in the area of teaching students about digital citizenship.  This model has been shown to increase student learning by introducing content to students prior to class and then building on said material in class to achieve a higher level of understanding and integration and was a primary method for delivering instruction in the research study.  Furthermore, to better understand the potential implementation of student learning into practice, the Theory of Planned Behavior was utilized as a framework to suggest that teacher intentions of utilizing technology instruction with their students is related to such predictors as beliefs, norms, and attitude on the topic.  (Lindsey, 2015).

Further Discussion

The literature review was well written and brought together the practical nature of the issue (i. e., responsible technology use in schools) with the theory (i. e., TPB) and approach (i. e., blended learning).  The reasoning for the study being done was put very much into context and it was easy to see the pressing need for universities to bolster their teacher preparation programs and K-12 schools to implement responsible use policies and curriculum.  To this end, the author tied together how this could be done in best preparing teachers through a blended learning model but also how to best understand why they would actually follow through in their practice.  There was connection in the literature review to both purpose, as just described, as well as research questions.  For example, the research questions targeted the validity of using TPB as a theoretical framework, as well as the intentions of prospective teachers.  However, there may have been a potential gap in connecting the literature to the first research question pertaining to instructor use.  The literature described a blended and flipped learning format and positive effects at the university level, particularly for students; however, there was less of a connection to faculty’s views outside of the aforementioned student benefit and concern that it presented as an increase in workload.  It would have been interesting to learn more about faculty’s use and comfort levels associated with blended learning since the first questions pertains, in part, to that aspect.  That said, question one is highly applicable to the efficacy of the study.  Overall, the author made a thorough, objective case for the importance and purpose of the study, as well as bringing together all related parts, as sufficient information was given in all aspects.

Methods – Chapter Three

Summary

The action research study took place at Mary Lou Fulton Teachers College (MLFTC) at Arizona State University.  More specifically, the setting included five courses where the study’s intervention would be taught.  Through purposive sampling and logistical convenience, five instructors were chosen for the study, which was a sample representative of MLFTC’s elementary and secondary education programs.  Additionally, a total of 114 teacher candidates from six class sections of the aforementioned five classes, averaging 24 years old, helped to comprise the study’s participants.  Three technology support persons in their primary role for the college supported the participants of the study with the author being one of them in addition to the primary data collector.  The primary intervention of the study was an infusing of digital citizenship learning into the curriculum at MLFTC teacher preparation program due to it being initially left out when the faculty redesigned the classes.  The process of integrating such material was doing via online learning modules that were asynchronous, overseen by the class instructors, but largely done by the teacher candidates, which was modeled after research done on flipped learning methods.  Various supports were put in place to support professors in this endeavor, including an instructor’s guide, online resources, and in-person technical support.  To test the intervention, a mixed-methods research design was utilized to best determine the influence that the technology model had on the instruction of digital citizenship.  Quantitative methods in the form of surveys were used to obtain data from teacher candidates and focus groups, observations, and interviews with students and faculty provided qualitative data, which largely focused on gathering information on beliefs, attitudes, and intention regarding the digital citizenship model.  The process of implementation was largely done during the fall semester of 2014 with prep work doing the summer prior.  As much as this section focused on data collection methods (e. g., surveys, interviews, using a audio recorder during interviews, etc.), there was no discussion on analysis (Lindsey, 2015).

Further Discussion

The author was very descriptive throughout the method section in explaining the setting of the study, who was involved, the intervention, and the process of implementation.  A clear connection was made to the purpose of the study, as well as research questions, with numbers two, three, and four being more outwardly addressed.  The latter made sense, though, because of the theoretical framework being that of Planned Behavior.  As I’ve already expressed, I felt that there was less of a connection to research question number one in seeking to directly understand teacher instruction of digital citizenship.  Overall, the author was very thorough, especially in explaining the setting and participants (herself included).  The instruments used and methods of implementation were explained in detail and helped to enforce validity and illustrated how her approach was firmly rooted in theory; therefore, the she continued to align the various components of the research study.

Results – Chapter Four

Summary

In this section that author went into detail regarding the analysis of the data (i. e., what methods were used), for example, coding, reliability analysis, confirmatory path anaylsis, and repeated measures anaylsis of variance (ANOVA).  Quantitative results yielded that the subsets being tested of the Theory of Planned Behavior were indeed reliable.  Furthermore, the confirmatory path model showed that intention of the teacher candidates to encourage digital citizenship had a high internal factor when compared to external (i. e.,  norms originating outside of the candidate) and that attitudes toward behavior where high predictors, as well.  ANOVA results indicated large, reliable differences between pre and post-test intervention.

Qualitative results indicated that instructors relied heavily on the TISS modules to both understand and deliver content and how these were a basis for class discussions with teacher candidates, as well as opportunities for modeling.  Confirmed barriers to digital citizenship instruction included technology (e. g., accessing the internet in class) and instructor/teacher candidate implementation and navigation of the online modules, which necessitated frequent tech support. Both instructors and teacher candidates reported gains in awareness of digital citizenship and knowledge of the content with the latter being in the modest range. Although teacher candidates supported the learning and modeling of digital citizenship there were was a low expectation of them needing to demonstrate it professionally (Lindsey, 2015).

Further Discussion

As a novice reader of data analysis and results, I found the author’s write-up to be descriptive and informative.  There was direct linkage to the author’s purpose statement and research questions.  The former was made especially relevant in understanding teacher candidate’s beliefs and attitudes regarding digital citizenship.  Moreover, where in other sections I hesitated to conclude a strong alignment with question number one (teacher instruction), I found the results section to be more connected and illustrative of this, particularly in respect to the qualitative data.  Additionally, it was also helpful that there was a brief discussion on the procedures of data collection and analysis, as this better put the learned information in context.

## References

* Lindsey, L. (2015). Preparing teacher candidates for 21 st century classrooms: A Study of digital citizenship (Doctoral dissertation). Retrieved fromhttp://repository. asu. edu/attachments/150461/content/Lindsey\_asu\_0010E-14677. pdf