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Knowledge, Perceptions, and Outcomes of Agricultural Communications Curriculum in Arkansas Secondary Agricultural Classrooms

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This thesis is approved for recommendation to the Graduate Council.

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ABSTRACT

The purpose of this mixed method study was to assess the effectiveness of agricultural communications curriculum developed and incorporated into a semester-long agricultural leadership and communications course for secondary agricultural education programs in Arkansas. This study was comprised of three parts including a pilot test, teacher training assessment, and a descriptive field test over a two-year period. For the pilot test portion of the study, students ($N = 297$) participated in newly developed instructional modules (careers, writing, design, and multimedia) predetermined by a committee of agricultural education and communications faculty at the University of Arkansas. The pilot test indicated students' knowledge increased after instruction, for each curriculum module. Lack of time, limited technology, teacher training, and curriculum content were the most common emergent themes among teachers.

Following the pilot test the curriculum was revised into 11 smaller units and made available on-line for the descriptive field test portion of the study. Additionally a series of agricultural communications teacher trainings were offered covering three units of revised curriculum. The teacher training aimed to gauge teachers' perceptions of the curriculum and the training experience. Participating teachers ($N = 23$) were most interested in photography and photo Editing / manipulation. Furthermore, Participants were satisfied with all aspects of the inservice including content, overview of curriculum, curriculum units covered during inservice, and the instructor.

The descriptive field test portion of the study evaluated student knowledge gained throughout the descriptive field test in 11 different unit areas, student knowledge application through project-based unit activities, and teachers' perceptions of the revised curriculum. For the

students who participated in this portion of the study ($N = 182$) it was evident from the pre- and post-test assessments, knowledge of agricultural communications increased. Moreover, agricultural communications skills were displayed in skill-based activities returned to the researcher. As for the teachers who participated in the descriptive field test ($N = 27$), it was noted they found value in the curriculum content but expressed the need for support from state staff and their school administrations to accept the agricultural communications curriculum as an integral part of high school agricultural education.

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This thesis is dedicated to my Mom, Dad, and sister. Mom and Dad, you have always encouraged me to follow my dreams and do what I love, even if that meant dancing to the beat of my own drum at a ballet recital. Both of you have supported my passion for agriculture and the desire to pursue it in my collegiate career. You never missed a rodeo, livestock show or awards banquet even though my interests and hobbies did not necessarily match yours. You are the best parents I could ask for and I am lucky to be your daughter. I love you.

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CHAPTER I: INTRODUCTION

Need for Study

Today's youth are digital natives; yet this does not necessarily mean they are adept at technology (Bullen, Morgan, & Qayyam, 2011). However, some are proficient and enjoy learning about, and with, visual and communication technologies (Margaryan, Littlejohn, & Vojt, 2011). These individuals are today's students in secondary and postsecondary schools, and we must find ways to teach and engage them with the technology they are already inclined to use. Pennington (2012) noted, "postsecondary and secondary education today is a dynamic educational environment as new electronic technologies and their educational potential emerge" (p. 2). Edward Thorndike applied scientific psychology toward learning, thus altering the view of how learning occurs (Wiburg, 2003). Thorndike (as cited in Wiburg, 2003) postulated students, when presented with innovative or new items, create a psychological impact resulting in a defined need to understand the information. Rosenshine and Furst (1971) posited that with clarity and variability, students would be more inclined to learn. Because of this, educators must account for students' thoughts, beliefs, and feelings when teaching (Bigge & Shermis, 1999; Gredler, 2005; Schunk, 2004). Furthermore, the use of emerging technology in secondary school programs allows for the acquisition of new knowledge, and in some students induces curiosity and a need for learning (Edgar, 2012).

"As agricultural education enters the twenty first century, [education and agriculture] must change with emerging trends in society and the agricultural industry" (Talbert, Vaughn, & Croom, 2005, p. 61). Bailey-Evans (1994) suggested with increasing accessibility of technology and as society becomes more disconnected from the farm, communication becomes vital to the

promotion of agriculture. The lack of knowledge about agriculture and the advancement of business-oriented industry in agriculture have produced a need for universities to include agricultural communications curriculum in the traditional agricultural education programs (Birkenholz & Craven, 1996). The promotion of agriculture is imperative to the existence of the industry and remains a need at the forefront of agricultural education. Agricultural communications curriculum should be included when preparing students for diverse agriculturally-related careers.

The Vocational Education Act of 1963 expressed vocational education as courses used for training students for paid or unpaid employment (Hayward, 1993). Additionally, the act recognizes agricultural education courses as preparing individuals for college studies. This preparation for the workforce can be realized through modified teaching methods that include reflective learning and hands-on engagement. When teachers incorporate experiential learning into their lessons students acquire real-world knowledge that may assist them in a successful career in an agricultural-related field upon finishing his or her education (Calico, Edgar, Edgar, Johnson, & Jernigan, 2014). Moreover, Knobloch (2003) suggested that experiential learning, combined with authentic learning standards, creates the ideal learning environment for agricultural education. Constructivism is supported by other theories including generative learning (Wittrock, 1990), discovery learning (Bruner, 1961), and situated learning (Brown, Collins, & Duguid, 1991), whose premise describes learning based on constructed experiences. There is a need for innovative curriculum to differentiated teaching and learning processes that motivates teachers and students to learn, and allows opportunities to gain knowledge using up-to-date technology.

Agricultural communications offers career choices for students wanting to work in an agricultural-related field, "because a large percentage of the population lacks agricultural understanding, it's important for agricultural communicators to provide timely, accurate information on current issues and events" (Hartenstein, 2002, p. 1). Agricultural communicators are uniquely prepared to promote agriculture because they are familiar with all aspects of the industry. They also have access to valuable resources: (a) cooperative state, research, education, and extension service personnel; (b) farmers and ranchers; (c) veterinarians; and (d) agriculture, food, and natural resource scientists.

Currently, minimal agricultural communications curriculum exists in high schools. However, in 2000 the National FFA Organization added agricultural communications as an official Career Development Event (CDE) area, creating a national contest for students interested in agricultural communications as a future career path. According to the National FFA Organization (2002), FFA members who are interested in pursuing a career in agricultural communications and journalism or who are looking to build additional communications skills are encouraged to participate in the agricultural communications CDE providing an educational experience upon which to build. Texas and Oklahoma are currently the only states with curriculum to support the Agricultural communications CDE, and the National FFA CDE superintendent has expressed the need for development of training materials that could be used by agricultural teachers nationally to prepare their students for the CDE (Erica Irlbeck, personal communication, October 14, 2012).

Problem Statement

With advances in technology and dissemination of information within the agricultural industry there is a need for secondary agricultural education students to be exposed to communications technology, specifically those used in agricultural communications (Birkenholz & Craven, 1996; Calico, Edgar, Edgar, Jernigan, & Northfell, 2013a; Hayward & Benson, 1993; Pennington, 2012). However, the adoption of agricultural communications curriculum, in Arkansas high school agricultural classrooms, has yet to happen. "Many agricultural education courses are built on a foundation of learning, constructivist theory, and experiential learning which opens the doors for students to learn about and use these technologies before entering degree programs or the workforce"(Pennington, 2012, p. 1). Therefore, the purpose of the curriculum assessed by this study was to incorporate agricultural communications into secondary agricultural education classrooms introducing written and visual communications strategies and technology.

Overview of Literature

Instruction in agricultural communications is intended to introduce students to avenues by which they can promote agriculture utilizing media (Oklahoma Instructional Media Center, 2010). Although the most recent *National Research Agenda* notes priority areas important to visual communications curriculum and training in secondary education programs (Doerfert, 2011), currently there is no agricultural communications curriculum in place in the state of Arkansas.

Although secondary educators know the importance and recognize the need to educate students about agriculture, electronic technologies, and strategies to promote agriculture while

improving English and writing skills, these institutions usually do not have the time and/or skills to create programs focused in agricultural communications (Calico et al., 2013a). As agricultural communications becomes a more prominent area of the industry, it is important for post-secondary institutions to work with secondary agricultural education programs to build student interest in agricultural communications (Calico, Edgar, & Edgar, 2013b). Because teachers are responsible for teaching numerous content areas pertaining to agriculture they have expressed the need for professional and skill development to improve their ability to teach subjects such as communications (Roberts, Dooley, Harlin, & Murphrey, 2006). Furthermore, the need for agricultural communications curriculum is evident and supported by teachers and students in Arkansas (Calico et al., 2013b).

The curriculum developed for this study was a combination of constructivism, experiential learning, and authentic learning standards to maximize student learning (Knobloch, 2003). When used as quality instructional material made available to instructors, this curriculum may create interest and career opportunities in agricultural communications for students in the future, identified as a need by Doerfert (2011).

Purpose Statement

The purpose of this study was to assess the effectiveness of researcher developed agricultural communications curriculum in secondary agricultural education programs through student knowledge gained, student application of skills, and teachers' perceptions of curriculum and training to prepare teachers.

Research Questions

The following research questions guided the study:

1. Are the module assessment instruments effective at determining knowledge gained from the agricultural communications curriculum during the pilot study?

2. What are agricultural teachers' perceptions of agricultural communications training used to prepare them to teach the curriculum?

3. Did student knowledge increase based on agricultural communications curriculum taught via unit of instruction?

4. What was student knowledge application through project-based activities?

5. What are agricultural teachers' perceptions of agricultural communications curriculum, developed for this study?

Definitions

Adobe Creative Cloud: Collection of design software available with monthly online membership including: Photoshop, InDesign, Illustrator, Premiere Pro, and Dreamweaver (Adobe, n.d.).

Agricultural Communications Curriculum: An educational curriculum consisting of multiple areas of instruction prepared by the University of Arkansas Department of Agricultural and Extension Education. Curriculum included lesson plans, PowerPoint presentations, support material, and resources for instruction for secondary agricultural science teachers. Units of instruction included: careers in agricultural communications, writing, design, and multimedia (Edgar, Cox, & Edgar, 2010).

AP Style: "Fundamental guidelines on spelling grammar, punctuation, and usage" (2012 AP

    Stylebook, n.d., para. 2).

Career: "An occupation or profession, especially one requiring special training, followed as

    one's lifework" (Dictionary, n.d., para. 1).

Design: "To create, fashion, execute, or construct according to plan" (Dictionary and Thesaurus,

    n.d., para. 1).

Dreamweaver: Adobe software specialized for website design (Adobe, n.d.).

EAST: "An educational model focusing on student-driven service projects accomplished by

    using teamwork and cutting-edge technology. EAST classrooms are equipped with state-

    of-the-art workstations, servers, software and accessories, including GPS/GIS mapping

    tools, architectural and CAD design software, 3D animation suites, virtual reality

    development and more" (EASTinitiative, 2010, para. 1).

HTML: "A computer language devised to allow website creation" (Shannon, 2011, para.1).

Illustrator: Adobe software specialized for creating vector graphics logo design (Adobe, n.d.).

InDesign: Adobe software specialized for desktop publishing and layout design (Adobe, n.d.).

Instructional Design: "A system of procedures for developing education and training programs in

    a consistent and reliable fashion" (Gustafson & Branch, 2002, p. 17).

Journalistic Writing: A style of writing intended for mass media incorporating news values and

    AP Style (Purdue, n.d.).

Module: A collection of units of instruction in a specific competency area (L. Edgar, personal

    communication, April 30, 2013).

Multimedia: "The combined use of several media, as sound and full-motion video in computer

    application" (Dictionary, n.d., para. 1).

Perkin's Activity Form: To purchase equipment and software utilizing Perkin's funding,

    secondary agricultural educators may apply for funding annually by submitting activity

    forms to their area Consortium or District (ACE, 2012).

Photoshop: Adobe software specialized for manipulating and editing photographs (Adobe, n.d.).

Premiere Pro: Adobe software specialized for video editing (Adobe, n.d.).

Teacher Perceptions: Opinions gathered from the teachers on the instructional units and projects

    using survey style (Likert scale) questions administered at the conclusion of the

    curriculum, telephone interviews, and journals (Edgar et al., 2010).

Visual Communications: Any optically stimulating message that is recognized by an observer

    (Lester, 2006).

Visual Communications on the Road in Arkansas: Creative Photo and Video Projects to Promote

Agriculture: Program funded through the USDA/NIFA through the Secondary Education, Two-

    Year Postsecondary Education, and Agriculture (SPECA) program which allowed visual

    communications curriculum to be created and a mobile classroom to be implemented in

    secondary agricultural courses in Arkansas (Pennington, 2012).

Unit: A section of instruction in a specific competency area (L. Edgar, personal communication,

    April 30, 2013).

Visual Literacy: "The ability to find meaning in imagery" (Yenawine, 1997, p. 1).

Assumptions

The following assumptions were made prior to, and during, the completion of this study:

1. Subjects answered all questions to the best of their knowledge.

2. Subjects participating in this study were representative of the general student population in the state of Arkansas.

3. Teachers who chose to participate in teaching the agricultural communications curriculum chose units that would benefit their students, program, and FFA chapter.

Limitations

The following limitations should be considered when reading or replicating this study:

1. A one-group pre-test/post-test design was used for this descriptive field study (Campbell & Stanley, 1963). Weaknesses outlined for this design included history, maturation, testing, instrumentation, selection, and statistical regression. The researcher attempted to limit the impact of these internal sources of validity. The study was conducted over one semester of time to limit maturation. Students were selected based on course enrollment rather than on an individual bases. Because students were participating in this study through a high school course, mortality was restricted.

2. Researcher-created instruments can create bias.

3. Limitations associated with self-reported instruments include selective memory, telescoping, attribution, and exaggeration (USCLibraries, n.d.). The researcher attempted to control for these limitation. Teachers were asked to journal on a daily basis after each class meeting to limit selective memory and telescoping. Post-test assessments were administers after each unit rather than each module to control for selective memory and telescoping. Teachers were encouraged to be detailed and honest when recounting their experiences with the curriculum in reflective journals to control for attribution and exaggeration.

4. The novelty effect may exist, but we were not able to post-post-test.

CHAPTER II: REVIEW OF THE LITERATURE

Conceptual Framework

Agricultural Education

The Vocational Education Act of 1963 defines vocational education as courses used for the preparation of students for employment after high school graduation (Hayward, 1993). Additionally, the act recognizes agricultural education courses as preparing individuals for college studies. As cited by Hayward and Benson (1993), Congress advanced this by defining career and technical education as a "…combined secondary and postsecondary program which: (a) leads to a two-year associate degree or a two year certificate (b) provides technical preparation in at least one field of engineering technology, applied science, mechanical, industrial, or practical art or trade, or agriculture, health, or business (c) builds student competence in mathematics, science, and communications (including through applied academics) through a sequential course of study and (d) leads to placement in employment" (p. 21). This preparation for the workforce can be achieved through modified teaching methods that include reflective learning and hands-on engagement.

Agricultural Communications

"Communications in agriculture is designed to introduce students to topics related to promoting agriculture through a variety of media sources" (Oklahoma Instructional Media Center, 2010, p. 5). However, since the incorporation of the agricultural communications CDE and the development of *The Guidebook for Agricultural Communications in the Classroom*, Arkansas has yet to develop an educational framework in agricultural communications to teach

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students about technologies and careers associated with the field. Yet, the most recent *National Research Agenda* notes priority areas important to visual communications curriculum and training in secondary education programs: (a) sufficient scientific and professional workforce that addresses the challenges of the 21st century (priority area three); (b) meaningful, engaged learning in all environments (priority area four); and (c) efficient and effective agricultural education programs (Doerfert, 2011). The agricultural communications curriculum developed for this study aims to develop students who can enter into the workforce with skills in communication and knowledge of the agricultural industry and history of agricultural communications (Akers, Vaughn, & Lockaby, 2001; Crawford, Lang, Fink, Dalton, & Fielitz, 2011). Moreover, the curriculum allows students to foster these desired skills and develop creative pieces showcasing their abilities in engaged learning environments.

Agricultural Communications Skills – Students

In today's technological society it is imperative that students are availed access to new technology. Presentation of new technology to students enrolled in secondary schools allows the acquisition of new knowledge and in some evokes curiosity and a desire for further learning. To explain learning, educators must include students' thoughts, beliefs, and feelings (Bigge & Shermis, 1999; Gredler, 2005; Schunk, 2004). Moreover, Rosenshine and Furst (1971) suggested clarity, variability, and student opportunity to learn are components of the learning process.

Learning through demonstration of technological equipment and application of knowledge, on a daily basis, will allow secondary students to understand the need for further knowledge acquisition and to become aware of the career opportunities requiring such knowledge (Palfrey & Gasser, 2008). This innovative idea, which includes differentiated

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teaching and learning processes, will ultimately motivate teachers and students to learn and will allow them the opportunity to gain research-based knowledge using state-of-the art technology.

Currently, high school agricultural education teachers must train students to enter into all aspects of the agricultural industry from production to sales (Talbert et al., 2005). Digital technologies are now being used to circulate information through media outlets, and agricultural communications courses have adapted to emulate this (Bills-Hunt, Cox, Edgar, Edgar & Pennington, 2012). Individuals in the agricultural communications career field are able to update society about agriculture, because they have been introduced to the industry through education and experience. Digitally focused graphic design, with computer generated graphics dominating print and electronic media, has become the norm. Another trend manifesting with the growth of technology and social networks is the view that "anyone can be a journalist instantly through personal websites or blogs" (Calico et al., 2013b, p. 3).

Moreover, in a recent study by Crawford et al. (2011), in conjunction with the Association of Public and Land-grant Universities and the University Industry Consortium, researchers identified soft skills that are most desirable by employers for new graduates. Seven soft skill clusters were finalized by representatives of the Association of Public and Land-grant Universities and the University Industry Consortium, of those seven, communication skills were the most desirable (Crawford et al., 2011). Descriptive characteristics of the communication skills cluster include: (1) Listening effectively, (2) Communicate accurately and concisely, (3) Effective oral communication, (4) Communicate pleasantly and professionally, (5) Effective written communication, (6) Ask good questions, (Communicate appropriately and professionally using social media (Crawford et al., 2011). The agricultural communications curriculum developed for this study provides opportunities for students to learn these desired skills and

others preferred by employers such as, decision making and problem solving skills, teamwork skills, professionalism and experience, and leadership skills (Crawford et al., 2011).

Although the technology the readily available in the workplace, both teachers and students must first be trained in effective communication strategies via multimedia channels that adhere to professional journalism standards and ethics. In Arkansas, there is an existing Leadership and Communications Frameworks that outline specific objectives that should be mastered by students enrolled in the course. The frameworks, however, are heavily dominated by leadership objectives and only include agricultural communications units on careers and public speaking (ACE, 2012). The curriculum developed for this study will increase the agricultural communications resources available to agricultural educators allowing them to better prepare students with the skills needed to be competitive in the job market post high school graduation (Crawford, 2011).

Teachers

Current high school agricultural science programs are required to teach a breadth of disciplines related to agriculture. As a result, high school agricultural teachers have reported needing specific skill development to enable them to improve teaching, especially in the areas of agricultural leadership, communications, and agricultural career development (Calico et al., 2013a; Roberts et al., 2006).

Bailey-Evans (1994) proposed as society becomes more detached from the farm communication becomes vital to the advancement of agriculture. This is a concern, especially in light of the fact the average American consumer is more than three generations removed from the family farm (American Farm Bureau Federation, 2002; Farm Bureau Federation, 1983).

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However, as cited by, Newman and Johnson (1994), agricultural teachers constantly express the need for training in technical skills and subjects (Barrick, Ladewig, & Hedges, 1983). This is even more evident when teachers are presented with new subject and material to teach (Newman & Johnson, 1994). According to Adobe (2012), "people need more time, training and an environment where they can think creatively" (p. 22). More than 50% of people in the United States believe it is essential to have tools to create; however, "time and money are seen as the biggest challenges [globally] to being able to create" (Adobe, 2012, p. 22).

Curriculum

As agricultural communications becomes a more prominent area of the industry, it is important for post-secondary institutions to work with secondary agricultural education programs to build student interest in agricultural communications. The most recent *National Research Agenda* identified priority areas important to visual communications curriculum and training in secondary education programs: (a) sufficient scientific and professional workforce that addresses the challenges of the 21st century (priority area three), (b) meaningful, engaged learning in all environments (priority area four), and (c) efficient and effective agricultural education programs (Doerfert, 2011). The need for agricultural communications curriculum is apparent and reinforced by teachers and students in Arkansas (Calico et al., 2013a). Quality instructional material will provide teachers with the opportunity to create different and unique career options for students post high school (Doerfert, 2011).

According to the *National Research Agenda* there is a need to "systematically identify and develop instructional systems to meet industry needs" (Doerfert, 2011, p. 19). Instructional systems can meet these needs through curriculum development. Therefore, it is critical for

university faculty, with expertise in agricultural communications, and high school teachers to build collaborative relationships to educate and prepare high school students for a future in, or as a supporter of, agriculture. By capitalizing on curiosity piqued through innovative technology presented to secondary students, high school teachers and university faculty can present knowledge and skill development activities to engage students in more meaningful learning. "A number of calls have been made in the agricultural education literature for increased collaboration between agricultural education and agricultural communications" (Tucker, Whaley, & Cano, 2003, p. 7). Furthermore, Lockeby and Vernon (1998), suggests "agricultural communications and agricultural education have become effective partners and … are rapidly becoming integral parts of each other" (p. 17).

In 2005, a report was released by three scientific groups in the United States recommending amplified support of science, technology, engineering, and math (STEM) programs in K-12 and postsecondary education (Augustine, 2005). The recommendation for increased STEM education is further supported by other organizations and government agencies such as the Government Accountability Office, National Science Board, and the Department of Education (Chen, 2009). Langdon, McKittrick, Beede, Khan, and Doms (2011) defined STEM jobs as "professional and technical support occupations in the fields of computer science and mathematics, engineering, and the life and physical sciences" (p. 2). STEM occupations specific to agriculture include, but are not limited to, agricultural engineers, environmental engineers, surveyors, agricultural and food scientists, and environmental scientists (Langdon et al., 2011). Furthermore, STEM undergraduate majors specific to agriculture include, but are not limited to, environmental engineering, animal sciences, food science, plant science and agronomy, soil science, environmental science, and genetics (Langdon et al., 2011).

More recently, "in this climate of economic uncertainty, America is once again turning to innovation as the way to ensure a prosperous future" (STEAM, 2014, para. 1). This innovation is remains firmly attached to STEM subjects, however "art and design are poised to transform our economy in the 21st century just as science and technology did in the last century" (STEAM, 2014, para. 1). Science, technology, engineering, and math plus art (STEAM) is an idea advocated by the Rhode Island School of Design and supported by institutions, corporations, and individuals (STEAM, 2014). The STEM to STEAM movement (STEAM, 2014) aims to:

1. Transform research policy to place Art and Design at the center of STEM,

2. Encourage integration of art and design in K-20 education, and

3. Influence employers to hire artists and designers to drive innovation.

Adobe (2012) conducted the State of Create Study surveying global attitudes and beliefs about creativity at work, school, and home. Overall, society feels creativity is the key to economic and societal growth; and nearly two-thirds feel that creativity is important to society (Adobe, 2012). Furthermore, "more than half feel that creativity is being stifled by their educational system" and as a culture, the United States takes creativity for granted (Adobe, 2012, p. 15).

The agricultural communications curriculum developed for this study incorporates the theory of constructivism along with both experiential and authentic learning to foster an engaging classroom environment. Through STEAM education, students learn real-world skills that can create college and career opportunities post high school graduation in STEM occupations.

Theoretical Framework

The theoretical framework for this study was based on direct instruction focusing on "interaction between teachers and students", and constructivist and experiential approaches to teaching and learning (Magliaro, Lockee, & Burton, 2006, p. 41). Learning is an active process where the learner uses sensory input to construct meaning with the content based on previous experiences (Hein, 1991; Mazurkewicz, Harder, & Roberts, 2012; Newcomb, McCracken, & Warmbrod, 2004).

There are multiple behavioristic models of direct instruction aimed to develop "mastery and automaticity of…target skills, knowledge, and disposition" (Magliaro et al., 2006, p. 41). The direct instruction model developed by Siegfried Engelmann, focuses on small learning units with clearly outlined objective and activities (Magliaro et al., 2006; National Institute, 2014). Engelmann (1980) designed his model to be "the most efficient way to teach each skill" (p. xi). According to Magliaro et al. (2006), key components of direct instruction include:

- Materials and curriculum broken down into small steps and arrayed in what is assumed to be the prerequisite order.

- Objectives stated clearly and in terms of learner outcomes or performance.

- Learners provided with opportunities to connect their new knowledge with what they already know.

- Learners given practice with each step or combination of steps.

- Learners experience additional opportunities to practice that promote increasing responsibility and independence (guided and/or independent in group and/or alone).

- Feedback provided after each practice opportunity or set of practice opportunity (p. 44).

Kolb (1984) proposed a theory of experiential learning that involved four principal stages: concrete experiences (CE), reflective observation (RO), abstract conceptualization (AC), and active experimentation (AE) (Figure 1).
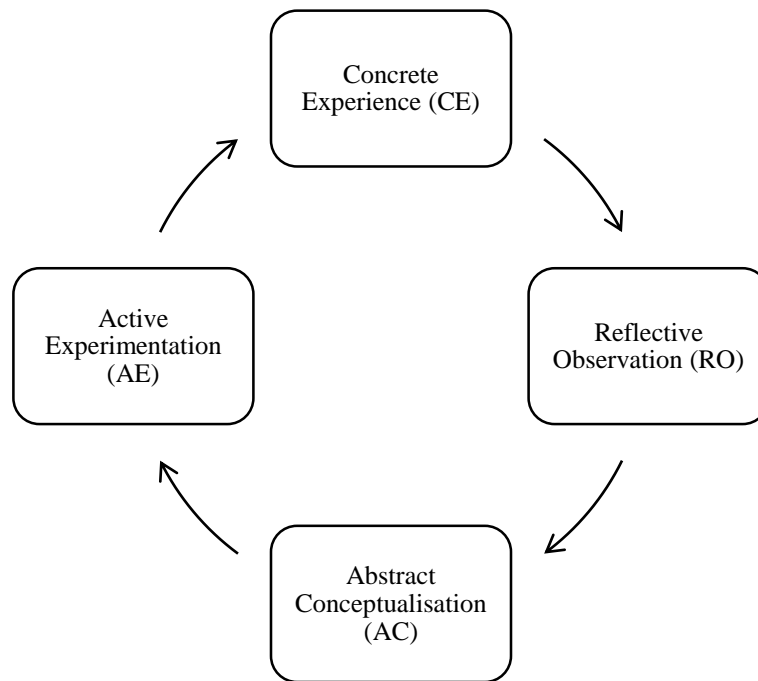
Figure 1. Model of the Experiential Learning Process (Kolb, 1984).

These teaching methods allow students to reach application, analysis, synthesis, and evaluation, the higher tiers in Bloom's Taxonomy of learning (Bloom, Engelhart, Furst, Hill, & Krathwohl, 1956). Although knowledge may be expanded through passive learning, "it is only through experiential learning that students can build skills most needed by those within the communications industry" (Northfell, Edgar, Miller, & Cox, 2013, p. 2). According to Morgan (2010), some of these skills include verbal communication, correct grammar use, meeting deadlines, being dependable, and conducting one's self ethically. Students are expected to apply skills they are learning (Edgar, 2012) and should be able to do more than simply act on

memorization. Learning opportunities are available to students through experiential learning, which is consciously acquired and improved through experiences over time (Kolb, 1984). While students may experience an individual, surrounding, or situation, they must reflect on the experience for it to leave a lasting impression (Bruening, Lopez, McCormick, & Dominguez, 2002). Currently agricultural education provides numerous opportunities for concrete experiences, however; teachers can elevate student learning by accompanying these experiences with the remaining three phases of experiential learning (Shoulders & Myers, 2012)

According to Knobloch (2003), agricultural teachers should model their instruction after experiential learning aligned with authentic learning standards to create a complete psychological structure for learning (Figure 2). The five standards that collectively create authentic learning include: (1) higher-order thinking, (2) depth of knowledge, (3) connection to the world beyond the classroom, (4) substantive conversation, and (5) social support for students' achievement (Newmann & Wehlage, 1993).

Constructivist theory suggests that students gain knowledge by working together to solve realistic problems (Duffy, Lowyck, & Jonasses, 1993). More specifically, social constructivism connects individual student leaning to social relationships (Bruner, 1990; Vygotsky, 1978). Agricultural education can be based on this "learning by doing" theory (Pennington, 2012, p. 17). Brooks and Brooks (1999) identified four characteristics of constructivist educational experiences:

- They free students from the dreariness of fact driven curriculums and allow them to focus on large ideas.
- They place in students' hands the exhilarating power to follow trails of interest, to make connections, to reformulate ideas, and to reach unique conclusions.

- They share with students the important message that the world is a complex place in which multiple perspectives exist and truth is often a matter of interpretations.

- They acknowledge that learning, and the process of learning, are, at best, elusive and messy endeavors that are not easily managed (pp. 21-22).

Agricultural Communications Curriculum Developed as Part of this Research

The agricultural communications curriculum developed for high school agricultural science programs in Arkansas combines direct instruction, experiential learning, and authentic learning standards with constructivist theory to create a complete learning experience. As the teacher and students begin each unit they engage in abstract conceptualization and substantive conversation as they are introduced to the concepts of the unit during a PowerPoint guided lecture discussion. Each PowerPoint was embedded with multiple videos and transitions to maintain the students' attention. At the end of each PowerPoint there was a video interview with a professional in the communications field allowing the students to connect the skills they learned to the real world beyond the classroom. At the conclusion of the video the teachers prompted the students into a discussion through reflective observation of the interview. Utilizing concrete experience the teacher guided the students through the steps to complete the activities that followed the lecture in each unit. The students' worked together, to provide support for student achievement, and individually using higher-order thinking and active experimentation to complete the assignments that showcased their depth of knowledge of the content included in each unit. The concepts in each unit were reviewed with the students daily to reinforce knowledge gain.

Conclusions

Although agricultural education courses are intended to prepare students for careers in agriculture post high school graduation, the need is evident for agricultural communications curriculum to prepare students to enter into careers to promote and advance agriculture (Calico et al., 2013b; Hayward & Benson, 1993). Agricultural communications curriculum developed for this study was designed to present topics related to promoting agriculture through media to students who participated. Moreover, the skills acquired through the instructional units reinforced the proficiencies tested during the Agricultural Communications CDE (Oklahoma Instructional Media Center, 2010).

A combination of constructivist theory, experiential learning and authentic learning standards were referenced to create the agricultural communications curriculum for this study. Agricultural courses provide concrete experiences but student learning can be reinforced with reflective observation, abstract conceptualization, and active experimentation to complete the experiential learning cycle (Shoulders & Myers, 2012). The four phases of experiential learning combined with the five authentic learning standards create a complete learning experience in the agricultural classroom (Knobloch, 2003).

CHAPTER III: METHODOLOGY

Restatement of Problem

With advances in technology and dissemination of information within the agricultural industry there is a need for secondary agricultural education students to be exposed to communications technology, specifically those used in agricultural communications (Birkenholz & Craven, 1996; Calico et al., 2013b; Hayward & Benson, 1993; Pennington, 2012). However, the adoption of agricultural communications curriculum, in Arkansas high school agricultural classrooms, has yet to happen. "Many agricultural education courses are built on a foundation of constructivist theory and experiential learning which opens the doors for students to learn about and use these technologies before entering degree programs or the workforce" (Pennington, 2012, p. 1). Therefore, the purpose of the curriculum assessed by this study was to incorporate agricultural communications into secondary agricultural education classrooms introducing written and visual communications strategies and technology.

Restatement of Research Questions

The following research questions guided the study:

1. Are the module assessment instruments effective at determining knowledge gained from the agricultural communications curriculum during the pilot study?

2. What are agricultural teachers' perceptions of agricultural communications training used to prepare them to teach the curriculum?

3. Did student knowledge increase based on agricultural communications curriculum taught via unit of instruction?

4. What was student knowledge application through project-based activities?

5. What are agricultural teachers' perceptions of agricultural communications curriculum, developed for this study?

Design of the Study

For this descriptive field test, a pre-experimental design (#2) one-shot pretest-posttest from Campbell and Stanley (1963) was used. A diagram of the pre-experimental design can be seen in Figure 2.

O_1	X	O_2
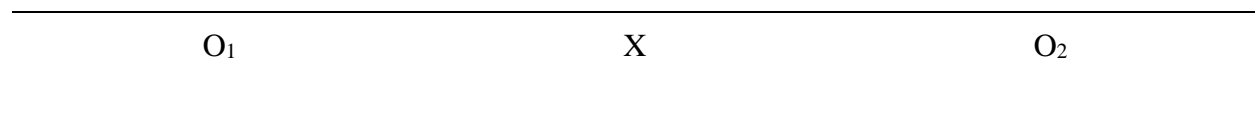
Figure 2. One Group Pretest-Posttest Design

Before beginning the descriptive field test, the initial curriculum was pilot tested in six schools the semester before it was made available online for all teachers in the state of Arkansas, as recommended by (Akers et al., 2001).

Pilot Test

Pilot Objective

The purpose of the mixed methods pilot study was to assess the effectiveness of newly developed agricultural communications curriculum in secondary agricultural education programs through student knowledge gained and teachers' perceptions of the curriculum.

Design of the Pilot Test

At the summer 2012, Arkansas agricultural teacher inservice, teachers were asked if they would be interested in teaching agricultural communications at their schools. A list was compiled

containing the names and contact information of those teachers who were interested. The researcher selected schools to participate in the pilot study, from the contact list, that represented the general population of high school agricultural education programs in Arkansas. A stipend of $200 was awarded to teachers who agreed to teach one curriculum module and $500 to teachers who agreed to teacher all four curriculum modules with the following expectations:

1. The participating agricultural program will complete the curriculum by the end of the spring 2013 semester.

2. The teacher will teach the curriculum as outlined by the corresponding lesson plan.

3. The teacher will provide a reflective journal recounting his or her experience with the agricultural communications curriculum.

4. The participating teacher will return all pre-tests, post-tests, handouts, projects, and rubrics completed by students at the end of the spring 2013 semester.

Participating teachers were provided with binders containing the complete agricultural communications curriculum and support material, as well as electronic copies of all curriculum and materials on a USB. Participating secondary teachers were responsible for teaching their students all curriculum units as assigned by the post-secondary institution. Each unit within the four modules consisted of lesson plans, instructional PowerPoint, handouts, worksheets, answer keys, grading rubrics, and additional support materials. Supplemental resources were provided to assist the teachers as they taught the Adobe Creative Suite skills based activities and projects.

Prior to teaching the curriculum, teachers did not receive any additional training on the skills or software needed to teach the lessons. Resources accompanied each lesson to assist teachers with facilitating the curriculum. The researcher contacted each teacher on a bi-weekly basis to document curriculum progress and provide assistance if needed. Instructors administered

a content specific pre-test to the students prior to the beginning of each of the four (writing, design, multimedia, and careers) curriculum modules. Students were given a post-test after the completion of each module. The post-tests were structured like the pre-test that accompanied each module.

Pilot Sample

The agricultural communications curriculum was piloted in six schools across Arkansas. These schools varied in size and geographical location. Of the six teachers who participated in the study, three were male and three were female. The programs also displayed different levels of technology availability and support. Students from 9th to 12th grade participated in this study. Four schools piloted one curriculum module each, and two schools attempted to pilot the curriculum in its entirety. Of those two schools, one only completed the careers and writing modules and the other did not provide feedback; therefore, no data was included in this study from that school.

Pilot Instrumentation

Prior to beginning each module, teachers administered a module specific pre-test containing true/false, multiple choice, and short answer questions. Students were given a post-test after the completion of each curriculum module. The post-tests were structured like the pre-test that accompanied each unit. A panel of four faculty members, with expertise is agricultural education and communications, examined the instruments and judged them to possess face and content validity.

Pilot IRB Approval

All research involving human subjects must be reviewed and approved by the Institutional Review Board (IRB) before researchers may begin their studies. This is a requirement under the University of Arkansas policies and federal regulations. IRB approval (Appendix A) was obtained for this study prior to data collection.

Pilot Data Collection

Participating students were required to provide written parent consent in the form of a waiver before beginning the pilot study (Appendix B). Teachers followed the included lesson plans in chronological order to complete each unit within the four modules. At the conclusion of the semester, all unit pre- and post-test assessments were mailed back to the Agricultural Education, Communications and Technology Department at the University of Arkansas (Appendix C). Additionally, creative pieces, and teacher notes and journal entries

Pilot Data Analysis

Preceding statistical analysis, various questions from the pre- and post-test assessments were removed to increase instrument reliabilities. Initially, the careers module pre- and post-test contained 11 questions and assessed students' knowledge of the history of agricultural communications, and opportunities to pursue agricultural communications degrees after high school. One short answer question was removed from the data and not included in the statistical analysis. The writing module pre- and post-test contained 10 questions and assessed students' knowledge of journalistic writing, AP Style, and editing. When the teachers returned the assessments, researchers found one question was presented in a manner unclear to the students;

therefore, it was removed from the statistical analysis. The design module pre- and post-test contained 10 questions pertaining to photography, graphic design, and web design. Of those 10 questions, three short answer questions were removed from the statistical analysis. The multimedia module pre- and post-test contained 10 questions pertaining to videography, digital audio broadcast, and social media. Of those 10 questions, five were removed including three fill in the blank items.

In addition to the pre- and post-test assessments, the creative projects designed and produced by the students using the skills they learned were returned to the researcher for analysis. These projects included plant sale flyers and short agricultural videos. The participating secondary agricultural teachers also kept reflective journals about their experiences as they taught the curriculum. Four of the six participating teachers returned journals to the researcher. The researcher performed a content analysis for emergent themes within the journals returned at the end of the study. Following Lincoln and Guba's (1985) constant comparative method, passages were coded in their original context (Creswell, 1998), and key themes emerged characterizing the teachers' perceptions related to their personal and students' experiences with the agricultural communications curriculum. Credibility of the findings was achieved through member checking and the use of the teachers' own reflections (via their reflective journals). Trustworthiness and dependability were established through purposive sampling, the use of thick description, and the use of an audit trail supporting the key findings.

Pilot Validity

The alpha coefficients for the pre-test assessments ranged from .30, .26, .15, and .37 for careers, writing, design, and multimedia. (Note: low alpha coefficients on the pre-test

assessments reflected a reliance on guessing by the students.) The alpha coefficients for the post-tests increased to .45, .55, .67, and .54, respectively. Nunnally (1967) stated a modest reliability of .60 or .50 is sufficient during early stages of research. Additionally, teacher-made tests usually have reliabilities around .50 (Frisbie, 1988). Data were analyzed using descriptive (means and standard deviations) statistics.

Curriculum Revisions

The Visual Communications on the Road in Arkansas: Video and Photo Creative Projects to Promote Agriculture is currently in phase two, which focuses on the integration of additional agricultural communications curriculum into state high school programs. This phase was used to expand the initial program to include a 16-week, semester-long agricultural communications course for secondary agricultural science programs. Instructional units in (a) careers, (b) writing, (c) design, and (d) multimedia were developed. The Careers module expanded content from the agricultural careers instructional unit and focused on agricultural history and careers. The Writing module was built on content in the original writing unit, providing an overview of journalistic writing, introducing students to stylistic concepts, and differentiating between news writing and feature writing styles. The Design module expanded content from the original photography unit and incorporated graphic design. The Multimedia module expanded content from the videography instructional unit.

Teacher Training

Prior to teaching the curriculum, the teachers were offered inservice training opportunity at four area education cooperatives across the state of Arkansas. These locations were chosen

based on teacher interest in the curriculum and location of education cooperative facilities. Inservice trainings were held at four area education cooperatives servicing school districts across Arkansas. A total of 23 teachers attended the four inservice trainings.

At these five-hour trainings participants received an overview of the agricultural communications curriculum and became familiar with how to teach the content confidently and effectively. Two units within the curriculum were highlighted during this training. Participants explored the college preparation unit and the components that accompany it. The photography unit was also discussed in depth. Participants learned how to teach the photography unit including photo composition, manipulation, proper camera use, and Photoshop. Participants used the skills they learned in the inservice to create calendars using the photos they captured after learning to use the camera. Teachers were able to take the calendars home with them at the end of the session to use as a resource for the recommended activity in the photography unit (Appendix D).

At the conclusion of the inservice, teachers completed a survey including: teachers' use and proficiency with technology, interest in agricultural communications curriculum, demographics, and the respondent' self-literacy, interest, and availability (Appendix E). The alpha coefficients for the inservice survey were .91 for the section of the survey pertaining to teachers' interests in agricultural communications competencies and .91 for the section of the survey pertaining to teachers' perceptions of the agricultural communications inservice training. Data were analyzed using descriptive (means and standard deviations) statistics.

Student Teacher Training

Prior to student teaching, candidates at the University of Arkansas attend a weeklong block of training to prepare them for the upcoming semester in the classroom. The researcher attended the block and provided training on the curriculum. Each student teacher selected a unit to practice teach during the block and selected a different unit to teach while in the classroom.

The researcher travelled to Southern Arkansas University to provide training to the six student teacher candidates participating in the study. The student teachers were provided with an overview of the curriculum and an explanation of how it should be used.

Descriptive Field Test

The subjects of the descriptive field test were a self-selected convenience sampling of high school students enrolled in agricultural education courses at seven schools during the fall 2013 semester. The revised agricultural communications curriculum consisted of four modules. Each unit contained information to benefit the students as they progressed through the curriculum. Participating teachers were asked to pick units from the curriculum modules that would benefit their students, program, and FFA Chapter. Each unit contained several activities of varying technology, equipment and software needs. Teachers could teach any unit with the activities appropriate for their available technology, equipment, and software. Students could then apply what they learned in the unit lectures through included activities.

Additionally, student teacher candidates from the University of Arkansas in Fayetteville, AR and Southern Arkansas University in Magnolia, AR taught units from the curriculum at their host schools during the spring 2014 semester. The University of Arkansas placed 14 student teachers in 11 high school agricultural classrooms across the state of Arkansas, one in Missouri,

and one in California. Each candidate was responsible for teaching one curriculum unit. Southern Arkansas University placed six student teachers, who taught at least one unit of curriculum, in five high school agricultural classrooms.

A $250 stipend to purchase a one year subscription to Adobe Creative Cloud was provided to four participating teachers who did not have access to Adobe software. These teachers were selected on a first-come-first-serve bases. The researcher had the following expectations for all participants selected for the descriptive field study:

1. The participating agricultural program will complete the curriculum by March 21, 2014.

2. The teacher will teach the curriculum as outlined by the corresponding lesson plan.

3. The teacher will provide a reflective journal recounting his or her experience with the agricultural communications curriculum.

4. The participating teacher will return all pre-tests, post-tests, handouts, projects, and rubrics completed by students by March 21, 2014.

Curriculum Dissemination

Prior to beginning the descriptive field test, participating students were required to return a consent form with a parent signature to the agricultural teacher (Appendix F) Participating teachers and student teachers were provided the curriculum via a curriculum link on the Agricultural Education, Communications and Technology Department homepage. Each unit consisted of Perkins Activity forms, lesson plans, instructional PowerPoint, handouts, worksheets, answer keys, grading rubrics, and additional support materials (Appendix G1-11). These detailed lesson plans protected the fidelity of the treatment by insuring consistency in

teaching each unit. The units in each module were evaluated in the pilot test conducted in the

spring 2013 semester with six participating Arkansas agricultural science programs. Adjustments

to content, objectives, and the length of the lessons were made with advisement from agricultural

communications and education faculty at the University of Arkansas to insure validity of the

competencies covered by the curriculum. Supplemental resources were provided for the teachers

to complete Adobe suite skill -based activities and projects. Students were given a pre-test before

each unit and a post-test after the completion of each unit (Appendix H1-11). The post-tests were

structured like the pre-test-test that accompanied each unit.

Curriculum

The four agricultural communications curriculum modules contained 11 units. Refer to

Tables' 1 through 4 for a breakdown of units within each module.

Table 1

Breakdown of Writing Module

Module	Unit	Objectives
	Journalistic Writing	The students will be able to define journalistic writing with 80% accuracy.
		The students will be able to compare and contrast news and feature styles of writing with 80% accuracy.
		The students will be able to use correct AP Style when writing and editing an article with 80% accuracy.
Writing		
	Public Relations	The students will be able to identify elements of press release format with 80% accuracy.
		The students will be able to incorporate the use of quotations in press releases with 80% accuracy.
		The students will understand the importance of ethics in public relations with 80% accuracy.

Table 2

Breakdown of Design Module

Module	Unit	Objectives
	Photography	
		The students will select and describe the features of a camera with 100% participation.
		The students will understand photo composition essentials with 80% accuracy.
		The students will understand elements of photo manipulation with 80% accuracy.
	Graphic Design	The students will understand the principles of graphic design with 80% accuracy.
		The students will be able to differentiate between serif, san serif, and decorative typefaces with 80% accuracy.
Design		The students will find and describe examples of good design principles with 80% accuracy.
	Layout Design	The students will identify principles, elements, formats, and guidelines of effective layout design with 80% accuracy.
		The students will become familiar with production processes and terminology in layout design with 100% participation.
		The students will gain knowledge of and competency in print layout design software with 100% participation.

Table 3

Breakdown of Multimedia Module

Module	Unit	Objectives
Multimedia	Videography	The students will be able to identify video production equipment with 100% participation.
		The students will be able to select and properly use a digital video camera with 80% competency.

Table 3 (continued)

Module	Unit	Objective
Multimedia	Videography	The students will gain competency in video camera parts with 80% competency.
	Digital Audio Broadcast	The students will apply broadcast writing style through writing scripts and incorporating interview and sound bytes with 100% accuracy.
		The students will create a social media integration plan with 80% accuracy.
		The students will use social media integration strategies for the web and track the success of usage with 100% participation.
	Social Media	The students will become familiar with new media, including blogs, Flickr, YouTube, LinkedIn, Facebook, Twitter, and Pinterest with 100% participation.
		The students will create a social media integration plan with 80% accuracy.
		The students will use social media integration strategies for the web and track the success of usage with 100% participation.
	Web Design	The students will gain competency in website design elements and terminology with 100% participation.
		The students will understand copyright and implications associated with publishing on the web with 100% participation.
		The students will be able to correctly use HTML code to develop a website with 80% accuracy

Table 4

Breakdown of Careers Module

Module	Units	Objectives
Careers	History	The students will learn about agricultural communication trends in America with 100% participation.
		The students will define agricultural communications and the role of agricultural communicators with 80% accuracy.
		The students will understand how communications practices have changed and identify current practices with 80% accuracy.
	College Preparation	The students will identify the advantages of attending college 100% participation.
		The students will gain awareness of steps to take in preparing for college with 100% participation.
		The students will gain awareness of the steps to follow when choosing a college with 100% participation.
		The students will identify ways to pay for college with 100% participation.

Writing Module

The writing module included two units. The journalistic writing unit taught students to write news and feature stories in correct AP style with two activity options accompanying the lecture. Activity one allowed students to edits sentences for correct AP Style. Activity two instructed students to write a quality article over a news or feature topic they selected at random. The students were then encouraged to work in groups to edit their stories for correct AP style. In the journalistic writing lesson plan teachers were provided with additional learning ideas such as inviting a prominent individual from the community who was involved in agriculture to speak to the class. At the conclusion of the guest presentation the students asked questions, which allowed them to write a feature story about the guest including correct quotations. Teachers could also encourage the students to submit their edited articles to the school or community newspaper and

provide bonus points to the students whose stories went into press. The public relations unit introduced press release format. For the activity that accompanies this unit, students wrote press releases over FFA events or upcoming agricultural programs hosted by the agricultural department such as plant sales or end-of-the-year banquets.

Design Module

In the design module, students explored aspects of design including: photography, graphic design, and layout. The photography unit taught students how to capture photos with a digital camera, recognize elements of good photo composition, and if technology will allow, how to manipulate photos in Adobe Photoshop. The photography unit included four activity options. For activity one, students watched the "Parts of a Camera" video included in the lecture PowerPoint. Learning engagement included instructional game-like activities which included, splitting the students in two groups to play a review game with questions selected from the notes packet the students filled in while listening the lecture. As the teams answered questions correctly they gained an opportunity to receive bonus points for labeling a part of the camera correctly.

Activity two prompted students to research and prepare group presentations over what they believed to be the top digital camera on the market. The teacher provided the groups with a camera checklist and a grading rubric to guide their projects. There were two options for activity three. If the teacher submitted the Perkins activity for the digital camera, tripod, and Adobe Photoshop students used the digital camera to take pictures, with correct photo composition, of objects that spelled out their school mascot. If digital cameras were not available, an iPhone, iPad, or something similar could be used in the same manner.

Activity four required the Adobe Photoshop program. If the teacher had access to a class set of computers with Adobe Photoshop installed on them the students manipulated the photos they captured in activity three using the skills explained in the Photoshop PowerPoint. If the teacher submitted the Perkins activity form for this unit and received Adobe Photoshop on his or her teacher computer the class worked as a group to manipulate the photos. This unit and the activities could easily have been adapted to fit into a different agricultural course. The students could have taken photographs of objects specific to the course, for example: flowers in plant science, livestock in animal science, or structures in a mechanics class. There was also a fundraising opportunity included in this unit as well. Students could capture and edit their photos to create a calendar to sell to the community.

The graphic design unit taught students the principles of graphic design, how to identify those principles in existing graphics, and how to apply those principles when developing their own graphics and logos. Three activities accompany this unit. For activity one, students worked in small groups to search magazines and newspapers for prominent companies and their logos. Students cut the logos out and labeled the elements of good graphic design they learned during the lecture. The groups presented their projects to the class when finished. For activity two, student's worked in groups to develop a well-designed logo for an agricultural company of their choice on poster board and presented their logos and the design elements they used to create it to the class. Activity thee required the Adobe Illustrator program. If the teacher had access to a class set of computers with Adobe Illustrator installed on them the students created digital versions of the logos they developed in activity two using the skills explained in the Illustrator PowerPoint. If the teacher submitted the Perkins activity form for this unit and received Adobe Illustrator on his or her teacher computer the class worked as a group to create a digital version

of the logo they choose. This unit could have been used in other classes to teach the students how to develop logos for products they created in other classes such as peanut butter in food science or a product in agricultural business.

The layout unit taught students the principles, elements, formats, and guidelines to creating an effective layout design and contains two activities. For activity one, students worked in small groups to search magazines for layouts that meet the principles of good design outlined in the lecture. The students labeled the principles and presented their findings to the class. Activity two required the Adobe InDesign program. If the teacher had access to a class set of computers with Adobe InDesign installed on them the students created their own layout using their articles from the writing units, pictures from the photography unit, and the skills explained in the Illustrator PowerPoint. If the teacher submitted the Perkins activity form for this unit and received Adobe InDesign on his or her teacher computer the class worked as a group to create a layout for the article they chose. Additionally, if the teachers chose to use topics specific to their program, FFA chapter, or community during the writing unit, the students could have created a newsletter featuring the students' articles and layouts. The students could work together or as a class to design the cover for the newsletter using the skills they learned during this unit.

Multimedia Module

In the multimedia module, students discovered ways to integrate multimedia into agricultural communications including: videography, digital audio broadcast, social media, and web design. Each lesson in this module prompted students to promote agriculture through various channels of media.

The videography unit taught students about video production equipment and techniques with six activity options. For activity one, students watched the "Parts of a Video Camera" video included in the lecture PowerPoint. Splitting the students in two groups the teacher played a review game selecting questions from the notes packet the students filled in while listening the lecture. As the teams answer questions correctly they gained an opportunity to receive bonus points by labeling a part of the video camera correctly. Activity two prompted students to research and prepare group presentations over what they believed was the top video camera on the market. The teacher provided the groups with a video camera checklist and a grading rubric to guide their projects. Activities three through six built on one another to produce a video as a final project. Students worked in groups, beginning with activity three, to create a storyboard over a topic they drew randomly out of a collection of agricultural topics. Teachers were also permitted to provide their own topics pertaining to current events in their community.

During Activity four the student groups worked to write scripts for the storyboards they created in activity three. The students then worked in there groups to rehearse and record their videos using the skills they learned during the lecture. Activity six required the Adobe Premier Pro program. If the teacher had access to a class set of computers with Adobe Premiere Pro installed on them the students edited the video they captured in activity five using the skills explained in the Premiere Pro PowerPoint. If the teacher submitted the Perkins activity form for this unit and received Adobe Premiere Pro on his or her teacher computer the class worked as a group to edit a video clip of their choice. This unit and the activities could have been adapted to fit into a different agricultural course. The students could have shot videos and posted them to a YouTube channel as an agricultural literacy project. They could have also used the skills they

learned during this unit to develop commercials for products they created in other classes such as peanut butter in food science or a product in agricultural business.

The digital audio broadcast unit taught students how to write for broadcast, how to conduct audio interviews, how to develop a radio personality, and how to edit and publish audio clips. There were five activities that accompany this unit. When students participated in activity one they learned to develop radio personalities by reading a script as if they were a character they drew at random. For activity two, students worked in groups to prepare a broadcast script over a topic they selected. In activity three the groups rehearsed their scripts and reduced their timing to between 30 seconds and one minute. The students recorded their podcast in activity four using a freeware called Audacity. Finally, the groups worked to edit and publish their podcasts in activity five. An additional activity for this unit allowed the students to create radio advertisements for products they created in other classes such as peanut butter in food science or a product in agricultural business.

Within the social media unit, students became familiar with new media outlets such as blogs, Flickr, YouTube. LinkedIn, Facebook, Twitter, and Pinterest. Students also learned how to use social media successfully and how to track their success. During the first of three activities students worked in groups to research and present on agricultural companies and how they use social media. In activity two the students created social media integration plans either as a class or in small groups. For the final activity, student groups created social media accounts to promote their program. Over the following weeks the groups tracked the success of their social media campaigns. Teachers could have also assigned social media outlets to multiple classes and created a competition between classes to see who could be the most successful.

In the last unit of the multimedia module students explored web design. In this unit students learned elements and terminology of website design and how to develop websites using HTLM code. There were four activities that accompanied this unit. In activity one students viewed several websites off of a list provided to the teacher. As the students looked at each site they decided if it was a good or bad website while answering a series of questions pertaining to its design. For activity two the students completed a fill-in-the-blank coding sheet while viewing the corresponding website provided to the teacher and a coding key. The students worked in groups for activity three to design a website on paper for their FFA chapter or agricultural program. Activity four required the Adobe Dreamweaver program. If the teacher had access to a class set of computers with Adobe Dreamweaver installed on them the students created digital versions of the websites they planned in activity three using the skills explained in the Dreamweaver PowerPoint. If the teacher submitted the Perkins activity form for this unit and received Adobe Dreamweaver on his or her teacher computer the class worked as a group to the website of their choice. Additionally, the students could have selected a website design and used a free web hosting service to publish their website. The students could have also updated the website on a weekly basis with the creative pieces they developed in the other units of the curriculum as well as things they created in other classes.

Careers Module

During the two units of the careers module, students explored the history of agricultural communications, and career opportunities that utilize agricultural communications skills. Students also researched the necessary steps to prepare for, and be successful in, an agricultural communications degree program, post high school.

During the history unit students learned about agricultural communication trends in America and how they have transformed over the years. Students also discovered what role an agricultural communicator plays in the agricultural industry. Two activities accompany this unit. For the first activity, the teacher instructed the students to get out a sheet of paper and pair up sitting back to back. One partner was A (communicator) and the other partner was B (listener). Partner A (communicator) drew an agricultural related item of the teachers choosing using shapes (triangle, circle, oval, square, rectangle, and diamond). Then Partner A attempted to explain to Partner B how to draw an exact replicate of the tractor. Partner A was the only one allowed to talk for the first two minutes. After two minutes, Partner B was allowed to ask questions. However, they could not compare drawings until the activity was finished. The teacher walked around and observed the students as they communicated, listened and provided feedback. The students could then switch roles for a second round.

During activity two, students worked in groups to identify a topic that an agricultural communicator would need to communicate about positively. The groups prepared a presentation and presented their findings to the rest of the class. If the teacher decided that the students were interested and engaged in the content covered during this unit there was an additional activity included in the lesson plan. For the additional activity, teachers allowed the students to brainstorm about companies that have or should have agricultural communications professionals working for them. The students then identified the roles or responsibilities of the agricultural communications professional in that company and why that organization needed agricultural communications professionals. This could have be an individual or group task and the students could share at least one company, the role of an agricultural communications specialist within the organization, and why the company needed the professional.

The second unit in the careers module prepared students for college. Students learned the advantages to attending college and the steps to take in order to get there. This was a predominantly discussion based unit with one activity. For this activity the teacher passed out a worksheet and instructed the students to research the colleges and universities they were interested in. When the students finished the worksheet the teacher reviewed what questions the students had about college and prompted a discussion over the topics. Although there was only one activity in this unit there were options to take the lesson further. The teachers could have asked the students to take five minutes and prepare a written response to the question: What is the purpose of a résumé and cover letter? And then allow the students to share their responses with the rest of the class.

The teacher guided the responses to address the purpose of these two business communications. The teacher then provided the students with a copy of the resume worksheet and cover letter example to assist them in outlining important content. The teacher also allowed the students to research resume layouts. Once the students found a layout they liked they created a résumé and cover letter for a position in which they were interested.

Descriptive Field Test Instrumentation

Students were given a content specific pre-test before the instruction of each unit to measure their knowledge level before the curriculum was administered. Each pre-test consisted of multiple choice, short answer, and fill-in-the-blank questions specific to the content area that followed it. After the students completed the pre-tests, agricultural science teachers taught the curriculum unit, as outlined by the corresponding lesson plan, paired with the content specific pre-test.

In addition to the pre- and post-test surveys, researchers developed a content analysis to evaluate the students' skills-based projects for students' abilities to apply competencies and objectives of the curriculum. Skill-based activities were assessed by content specific rubrics (Appendix I). Each videography project was evaluated based on content analysis and capturing techniques (use of tripod, lighting, overall quality). Photography projects were assessed by "determining the element(s) of composition (framing, centering/symmetry, leading lines, rule of thirds, simplicity, and or subject background relationship) applied, if photos were or should have been manipulated (edited using software), and if captions for photos were written correctly" (Pennington, 2012, p. 28). Written pieces were assessed based on the viewer's (coder's) ability to identify the "who," "what," when," "where," "why," and "how" featured in each piece and correct AP style. Graphic design and layout projects were assessed based on principles of good design (alignment, balance, contrast, dominance, repetition, and white space). Digital audio broadcast projects were assessed for correct audience, purpose, and personality, as well as, active voice and correct use of lead-in sentence and attributions. Grading rubrics were provided with each skills based activity to aid in grading the creative pieces by participating teachers and analysis by the researcher once the creative pieces and rubrics were returned to the Agricultural Education, Communication, and Technology Department. An overall grade of 80% of greater was quantified as a "quality" creative piece.

At the conclusion of the descriptive field test, participating agricultural teachers were contacted via email to complete a perceptions survey administered electronically by Qualtrics® (Appendix J). The researcher utilized a Qualtrics® survey to accommodate busy schedules held by high school agriculture teachers, eliminate interviewer bias, and allow respondents adequate time to answer survey questions in detail (Nielsen, n.d.). The teacher perceptions survey included

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yes or no, multiple choice, select all, and Likert-type questions pertaining to participating

teachers experiences with the content, technology, and software while teaching the curriculum.

Additionally, the survey included various creativity questions originally published in the State of

Create study conducted by Adobe (2012).

Once all material were returned to the researcher an email of appreciation for their

participation in the study was sent to the 33 teachers who originally expressed interest in

teaching the agricultural communications curriculum. A link to the Qualtrics® perceptions

survey was included at the end of the email with a request for all teachers to complete the survey

whether they taught a portion of the curriculum or not. A second email was sent to the original

33 teachers one week after the initial survey email was sent.

Teacher Support

Prior to teaching the curriculum, the teachers were offered an inservice training

opportunity at five area education cooperatives across the state of Arkansas. These locations

were chosen based on teacher interest in the curriculum and location of education cooperative

facilities. Participating teachers were provided resources, upon request, on a lesson-by-lesson

basis to assist them in facilitating the material. A one-year subscription of the Adobe Creative

cloud was purchased for four randomly selected participating teachers. Perkin's Activities were

created for each skill-based lesson. Perkins funding is awarded through each consortium or

district. Individual schools submit applications and funding is awarded annually (Arkansas, n.d.).

The teachers had the opportunity to submit Perkin's Activity Applications to receive *AP*

Stylebooks, the Adobe Creative Suite Master Collection (accessed through Creative Cloud),

digital cameras, digital video cameras, and additional equipment. These materials and equipment

were provided on an as-needed basis, determined by each participating school's district coordinator. The researcher also encouraged the participating teachers to work with business and EAST Lab teachers in their districts to provide technology, software, equipment, and support as partners "in learning communities, through which they model collaboration" while teaching the skill-based lessons (Rowjewsi, 2002, p. 36).

Descriptive Field Test Sample

The population of this study was high school students, 9th through 12th grade, enrolled in a leadership and communications course as part of the agricultural sciences program. The purposive sample group was selected based on teachers' willingness to teach the curriculum. The computer program, Arkansas Career Education ListServ was used to solicit teachers to participate in the study. Teachers from ## schools participated during the fall 2013 semester.

Descriptive Field Test Validity

Campbell and Stanley (1963) detail history and maturation as potential threats to validity for the pre-experimental one-group pretest-posttest design. The researcher evaluated the students after each curriculum module with a post-test to reduce history invalidity. Teachers were instructed when to administer each instrument over the course of the curriculum. The questions were the same on the pre- and post-test for each section; however, the questions were presented in a different order and data was collected over a short time period to reduce maturation invalidity, the change in subjects over time (Campbell & Stanley, 1963). Each curriculum module was completed in approximately two weeks from pretest to post-test.

The researcher developed the instrument used to assess knowledge level retention from the agricultural communications curriculum. To establish content validity, the instruments created by the researcher were based on the review of literature, and the objectives outlined by the agricultural communications curriculum. A group of agricultural education and communications faculty and staff at the University of Arkansas assessed the instrument for face and content validity. Cronbach's Alpha was used to measure instrument reliability. The pre- and post-test instruments asked the same questions in the same order. Table 5 notes Cronbach's Alpha values for each unit pre- and post-test assessment.

Table 5

Cronbach's Alpha values for Pre- and Post-test Assessments

		Cronbach's Alpha	
Curriculum unit	*n*	Pre-test	Post-test
Journalistic Writing	18	.74	.62
Public Relations	16	.26	.85
Photography	34	.80	.86
Graphic Design	17	.64	-.23
Print Design Layout	38	.61	.90
Videography	-	-	-
Digital Audio Broadcast	17	-.14	-.31
Social Media	-	-	-
Web Design	21	.86	.87
History	37	.66	.76
College Preparation	9	.82	.63

Note. "-" denotes missing data.

The reliability of the Qualtrics® teacher perception instrument was tested as well. The Cronbach's Alpha value for the three sections of the perceptions survey are displayed in Table 6.

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Table 6

Reliability Coefficients for Teacher Perception Instrument

Perception Area	Cronbach's Alpha
Curriculum	.89
Software	.85
Creativity	.62

Descriptive Field Test IRB Approval

All research involving human subjects must be reviewed and approved by the Institutional Review Board (IRB) before researchers may begin their studies. This is a requirement under the University of Arkansas policies and federal regulations. IRB approval (Appendix A) was obtained for this study prior to data collection.

Descriptive Field Test Data Collection Procedures

All students who participated were required to provide written parent consent in the form of a waiver for participation in this study. When participants completed the first pre-test they were assigned an alpha-numeric code to ensure confidentiality. This code was used to match all of the instrumentation from individuals. Participants who did not complete all instruments were not used as part of the study.

Teachers selected units that benefitted their students, programs or FFA chapters. The units they selected were not influenced by the researcher and they were not required to teach a specific number of units.

At the conclusion of the semester, the selected unit pre- and post-test assessments, creative pieces, and all teacher notes and journal entries were mailed back to the Agricultural Education, Communications and Technology Department at the University of Arkansas. Once all

material was returned to the researcher the participating teachers were asked to complete an on-line perceptions survey via Qualtrics.com.

Descriptive Field Test Analysis of Data

Data were analyzed using SAS 9.2 statistical package. The differences in test scores between each pre- and post-test were analyzed with inferential statistics using a repeated measures analysis of variance. *A priori* was set at .05. Descriptive statistics were used for the teachers' perceptions of the curriculum. The student creative pieces were analyzed by a panel of experts in agricultural communications and education in the Agricultural Education, Communications and Technology Department at the University of Arkansas.

CHAPTER IV: RESULTS AND FINDINGS

Pilot Test

The pilot test was used to answer research question one.

Are the module assessment instruments effective at determining knowledge gained from the agricultural communications curriculum during the pilot study?

Pilot Demographics

The agricultural communications curriculum was piloted in six schools in Arkansas. These schools varied in size and geographical location. Of the six teachers who participated in the study, three were male and three were female. The programs also displayed different levels of technology availability and support. Students from 9th to 12th grade participated in this study. Four schools piloted one curriculum module each, and two schools attempted to pilot the curriculum in its entirety. Of those two schools, one only completed the careers and writing modules and the other did not provide feedback; therefore, no data was included in this study from that school.

The population of this study consisted of students from six high school agriculture classes in Arkansas, during the spring 2013 semester ($N = 297$). Sample sizes for the individual modules included: Careers ($n = 130$), writing ($n = 131$), design ($n = 20$), and multimedia ($n = 16$). Information about each of the schools that participated in the pilot test regarding location, classification, ethnic distribution, and student's eligible for free/reduced lunches was attained from the National Center for Education Statistic's online database (http://nces.ed.gov/). Table 7 displays demographics for each school that participated in the study.

Table 7

Demographics of Schools Participating in the Pilot Study

| School | Location | Total | Gender Distribution | | Ethnic | Free/Reduced Lunch Eligible | |
			Male	Female		Free	Reduce
Berryville H.S.	North	529 (9-12)	270	259	75% White 22% Hispanic All other groups ≤5%	182	43
Conway H.S	Central	2,673 (9-12)	1,345	1,328	66% White 26% Black 6% Hispanic All other groups ≤5%	769	165
Mulberry H.S	West	91 (10-12)	45	46	92% White All other groups ≤5%	43	15
Springdale Central Jr. High	Northwest	825 (8-9)	444	381	65% White 25% Hispanic All other groups ≤5%	259	74
Taylor H.S.	South	137	68	69	91% White 9% Black	35	14

Data retrieved from http://nces.ed.gov/ccd/schoolsearch/index.asp

Pilot Results

Careers Module

Overall, the participants' ($n = 130$) scores significantly increased between the Careers pre-test ($M = 43.3\%$, $SD = 14.8\%$) and post-test ($M = 59.5\%$, $SD = 15.6\%$), $t(129) = 10.39$, $p <$ .0001. Specific content questions that received the greatest increase in correct answers between pre- and post-test evaluation where career ethics (pre-test: $M = 51.5\%$ $SD = 50.1\%$; post-test: M

= 82.5%, *SD* = 38.9%) and college preparation (pre-test: *M* = 46.9%, *SD* = 50.1%; post-test: *M* =

80.8%, *SD* =39.6%). Table 8 illustrates knowledge changes between the Careers pre- and post-

test assessments.

Table 8

*Student Test Scores from the Careers Module (*n = *130)*

Question	Pre-test (%)		Post-test (%)	
	M	*SD*	*M*	*SD*
History of ACOM	57.7	49.6	76.2	42.8
Dissemination of information	87.7	33.0	93.8	24.1
Career salary	1.5	12.4	20.0	40.2
Career ethics	51.5	50.1	82.5	38.9
College preparation	46.9	50.1	80.8	39.6
Funding college	7.7	87.7	2.3	15.1
Résumé writing	66.9	47.2	84.6	36.2
Non-verbal communication	1.5	12.4	17.7	38.3
Visual communication	75.4	43.2	78.5	41.3
Total	43.3	14.8	59.5	15.6

Note. Questions coded as 0 for incorrect and 1 for correct.

Writing Module

The participants' (*n* = 131) scores on the Writing pre-test (*M* = 27.7%, *SD* = 13.8%)

significantly increased on their post-test assessment (*M* = 52.8%, *SD* = 18.9%), *t*(130) = 13.46, *p*

< .0001. Specific content questions that received the greatest increase in correct answers between

pre- and post-test evaluation were news writing styles (pre-test: *M* = 6.1%, *SD* = 24.0%; post-

test: *M* = 52,7%, *SD* = 50.1%) and writing – Five W's and H and Purpose of the Lead (pre-test:

M = 64.1%, *SD* = 48.1%; post-test: *M* = 96.9%, *SD* = 17.3% and pre-test: *M* = 4.6%, *SD* =

21.0%; post-test: *M* = 30.5%, *SD* = 46.2%), respectively. Table 9 illustrates knowledge changes

between the Writing pre- and post-test assessments.

Table 9

*Student Test Scores from the Writing Module (*n = *131)*

Question	Pre-test (%)		Post-test (%)	
	M	*SD*	*M*	*SD*
News writing style	6.1	24.0	52.7	50.1
Feature writing style	67.2	47.1	67.2	47.1
Journalistic writing	0.0	0.0	16.0	36.8
Five W's and H	64.1	48.1	96.9	17.3
Purpose of a lead	4.6	21.0	30.5	46.2
AP Style	40.5	49.3	72.5	44.8
Elements of news	-	-	3.8	19.2
Boilerplate	19.8	40.0	51.9	50.2
Journalistic ethics	64.9	47.9	84.0	36.8
Total	29.7	13.8	52.8	18.9

Note. Questions coded as 0 for incorrect and 1 for correct.
"-" denotes missing data.

Design Module

Overall the participants ($n = 20$) scores on the Design pre-test ($M = 37.9\%$, $SD = 11.6\%$) significantly increased on their post-test assessment ($M = 73.6\%$, $SD = 24.6\%$), $t(19) = 6.24$, $p <$ .0001. Questions pertaining to layout received the greatest increase in correct answers between pre- and post-test evaluation; white space (pre-test: $M = 25.0\%$, $SD = 44.4\%$; post-test: $M = 70.0\%$, $SD = 47.0\%$) and pull quotes (pre-test: $M = 0.0\%$, $SD = 0.0\%$; post-test: $M = 50.0\%$, $SD = 51.3\%$). Table 10 illustrates the knowledge changes between the Design pre-and post-test assessments.

Table 10

*Student Test Scores from the Design Module (*n = *20)*

Question	Pre-test (%)		Post-test (%)	
	M	*SD*	*M*	*SD*
File formats	95.0	22.4	95.0	22.4
Characteristics of color	85.0	36.6	75.0	44.4
Body text font size	-	-	60.0	50.3

Table 10 (continued)

| Questions | Pre-test (5%) | | Post-test (%) | |
	M	SD	M	SD
White space	25.0	44.4	70.0	47.0
Pull quotes	-	-	50.0	51.3
Pixels	55.0	51.0	70.0	47.0
CMYK vs. RGB	05.0	22.4	95.0	22.4
Total	37.9	11.6	73.6	24.6

Note. Questions coded as 0 for incorrect and 1 for correct.

"-" denotes missing data.

Multimedia Module

The participants ($n = 16$) scores on the Multimedia pre-test ($M = 52.5\%$, $SD = 20.5\%$)

significantly increased on their post-test assessment ($M = 83.8\%$, $SD = 22.2\%$), $t(15) = 5.42$, $p <$

.0001. Specific content questions that received the greatest increase in correct answers between

pre- and post-test evaluation where ethics (pre-test: $M = 31.3\%$, $SD = 47.9\%$; post-test: $M =$

75.0%, $SD = 44.7\%$) and videography (pre-test: $M = 0.0\%$, $SD = 0.0\%$; post-test: $M = 92.8\%$, SD

$= 25.0\%$). Table 11 illustrated the knowledge changes between the Multimedia pre- and post-test

assessments.

Table 11

*Student Test Scores from the Multimedia Module (*n = 16*)*

| Question | Pre-test (%) | | Post-test (%) | |
	M	SD	M	SD
Copyright laws	31.3	47.9	75.0	44.7
Tripod use	75.0	44.7	87.5	34.2
File formats	62.5	50.0	87.5	34.2
Three phases of videography	-	-	92.8	25.0
Social Media effects on agriculture	93.8	25.0	75.0	44.7
Total	52.5	20.5	83.8	22.2

Note. Questions coded as 0 for incorrect and 1 for correct.

"-" denotes missing data.

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Participating Teachers Reflective Journals

Seven emergent themes were common between all six teachers as captured in their reflective journals. Lack of time, limited technology, and curriculum content were the most common themes. Teachers also commented that the students enjoyed the projects and activities the most. A summary of the remaining emergent themes with supporting quotes from the participating teachers can be found in Table 12.

Table 12

Emergent Themes Identified in Participating Teachers Journals (N *themes = 43*)

Themes	*n*	*f*	Support
Lack of Time	10	23%	"The unit took a long time to finish." T3 "I spent way too much time on this but when you actually have them thinking and talking and doing both at the same time it's hard to stop!" T2 "We needed one more day to complete." T1
Curriculum Content	9	21%	"Overall, I think the [this] curriculum is going to be an excellent class, and I think that it covers an important part of agriculture that needs to be taught." T3 "Communications in general in something that everyone needs to be proficient in, and if it fits into our program of study I would like to teach this [curriculum] in the future to my students." T3 "What I do believe is that this is the wave of the future and for most of our students the other units will seem 'old school' or 'boring'." T2
Limited Technology	7	16%	"Things we need to be more successful: cameras, computers, software." T3 "We did not have computer access for all of the students, and we could not download any of the software that was needed for the activities." T3
Engaging Activities	7	16%	"Great Projects." T4

Table 12 (continued)

Themes	*n*	*f*	Support
Engaging Activities			"The parts of this curriculum that I liked the most were the hands-on activities for each lesson." T3
			"The hands-on activities were great to help the students understand the material and make it more relatable to them." T3
			"[The final activity] was a good way to tie all the material together and show the students how age comma is used." T3
Supporting Material	2	5%	"Loved the notes." T4
			"There was a lot of information on each lesson, and...the lessons were detailed and easy to understand." T3
Interest and Approach	2	5%	"We had a blast." T4
			"The history section was very informative, the interest approach was very good, the kids liked seeing the old folks in the pictures! It did bring up much good conversation!" T2

Teacher Training

The teacher training was used to answer research question two.

What are agricultural teachers' perceptions of agricultural communications training used to prepare them to teach the curriculum?

Teacher Training Demographics

All teachers were offered inservice training opportunity at four area education cooperatives across the state of Arkansas. These locations were chosen based on teacher interest in the curriculum and location of education cooperative facilities. A total of 23 teachers attended the four inservice trainings. Out of the 23 participants who attended the trainings, 52.17% were male and 47.83% were female. When asked to specify an ethnicity, 22 of the participants selected Caucasian and one selected Native American. The participants ranged in age from 23 to

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61 (*M*=36.35, *SD*=11.45). Participants were then asked if they currently offered the course titled

"Agricultural Leadership and Communications", 18 of the 23 participants currently offered the

course and of those 18, 16 participants believed the agricultural communications curriculum

developed for this study would assist them in teaching the course. All five of the participants

who were not offering the course at that time were interested in teaching the course in the future.

Teacher Training Results

Participating Teachers Interest in Agricultural Communications Competencies

The first part of the post-inservice survey presented the participating teachers with 28

agricultural communications competencies. The teachers were asked to note their interest in each

competency based on a five point Likert-type scale. Participants reported being most interested

in Photography (*M* = 4.78, *SD* = 0.42) and Photo Editing / Manipulation (*M* = 4.78, *SD* = 0.52).

Refer to Table 13 for the secondary agricultural teachers' interest in specific agricultural

communications competencies.

Table 13

Secondary Agricultural Teachers Interest in Specific Agricultural Communications Competencies (N = 23)

Item	*n*	*M*	*SD*
Writing	23	4.13	.76
Communicating to the Public	23	4.35	.57
Journalistic Writing	23	3.70	.97
News Writing	23	4.00	.74
Feature Writing	23	4.00	.74
Associated Press Style	23	3.87	.87
Writing for Public Relations	22	4.23	.69

Table 13 (continued)

Item	n	M	SD
Writing for Marketing	23	4.09	.67
Blogging	23	3.43	1.16
Photography	23	4.78	.42
Photo Editing / Manipulation	23	4.78	.52
Videography (digital video camcorders)	23	4.22	.74
Video Editing / Manipulation	23	4.17	.78
Audio Recordings	22	4.14	.71
Audio Editing / Manipulation	23	4.09	.73
Creating Promotional Videos	23	4.39	.66
Electronic Print Design	23	4.22	.85
Electronic Layout (newsletters, brochures, etc.)	23	4.30	.76
Typography	23	3.78	.60
Graphic Design	23	4.26	.75
Web design	23	3.96	.88
Electronic Curriculum Development	23	3.96	.93
Radio Broadcast	23	3.65	.88
Television Broadcast	23	3.52	.95
Using Social Media for Program Promotion	23	4.17	1.11
Careers in Agricultural Communications	23	4.52	.51
History of Agricultural Communications	22	4.41	.67
Degree Preparation in Agricultural Communications	23	4.39	.50

Note. Responses based on a 5-point Likert-type scale with 5 = Highly Interested and 1 = Not at all Interested.

Teachers Perceptions of Agricultural Communications Inservice

The second section of the post-inservice survey contained questions specific to content presented by the researcher at the inservice. The teachers were asked to note their satisfaction in each area of the inservice based on a five point Likert-type scale. Section two consisted of six areas including content, overview of the curriculum, college preparation unit, photography unit, inservice activities, and instructor.

Participants were satisfied (*M* >4.00*)* with all aspects of the inservice. Refer to Tables' 14 through 18 for the secondary agricultural teachers' satisfaction in specific areas of the agricultural communications inservice.

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Table 14

*Secondary Agricultural Teachers Satisfaction with Inservice Content (*N = *23)*

Item	n	M	SD
General Information	23	4.87	.34
Goals and objective were clearly stated	23	4.78	.42
Format was professional in appearance	23	4.87	.34
Clarity of instruction / questions	23	4.83	.39
Training met my expectations	23	4.91	.29
Willingness to recommend this training to others	23	4.87	.34

Note. Responses based on a 5-point Likert-type scale with 5 = Satisfactory and 1 = Unsatisfactory.

Table 15

*Secondary Agricultural Teachers Satisfaction with Overview of Curriculum at Inservice (*N = *23)*

Item	n	M	SD
Clear instruction provided	23	5.00	-
Helped develop understanding of new concepts	23	4.96	.21
Helped develop new skills	23	4.96	.21
Appropriate level of challenge	23	4.91	.29
The curriculum met my expectations	23	4.91	.29

Note. Responses based on a 5-point Likert-type scale with 5 = Satisfactory and 1 = Unsatisfactory

Table 16

Secondary Agricultural Teachers Satisfaction with College Preparation Unit at Inservice (N = *23)*

Item	n	M	SD
Clear instruction provided	23	5.00	-
Helped develop understanding of new concepts	23	4.91	.29
Helped develop new skills	23	4.87	.46
Appropriate level of challenge	23	4.91	.29
The curriculum met my expectations	23	4.91	.29

Note. Responses based on a 5-point Likert-type scale with 5 = Satisfactory and 1 = Unsatisfactory.

Table 17

*Secondary Agricultural Teachers Satisfaction with Photography Unit at Inservice (*N = 23)

Item	n	M	SD
Clear instruction provided	23	4.96	.21
Helped develop understanding of new concepts	23	4.96	.21
Helped develop new skills	23	5.00	-
Appropriate level of challenge	23	4.91	.29
The curriculum met my expectations	23	5.00	-

Note. Responses based on a 5-point Likert-type scale with 5 = Satisfactory and 1 = Unsatisfactory.

Table 18

*Secondary Agricultural Teachers Satisfaction with Instructor at Inservice (*N = 23)

Item	n	M	SD
Knowledgeable about subject	23	5.00	-
Provided sufficient content detail	23	5.00	-
Responded to questions effectively	23	5.00	-

Note. Responses based on a 5-point Likert-type scale with 5 = Satisfactory and 1 = Unsatisfactory.

Additional Resources Needed for Teacher Success

Participants were asked what additional support, content, resources, etc. they would need to be successful teaching the Agricultural Leadership and Communications course. Of the 23 teachers who attended the inservice, 15 responded with a need equipment, software, and more training, the value of the Perkins activity forms for purchasing equipment and software, and adding content in speech preparation and goal setting. A summary of comment from the participating teachers can be found in Table 19.

Table 19

Additional Material Needed to be Successful Teaching the Agricultural Leadership and Communications course (n = 15)

Themes	*n*	*f*	Support
Equipment, Software, Training	10	66.7%	"Cameras, Photoshop, etc." T3
			"Just need more equipment and computers" T6
			"Cameras, Video recorder" T8
			"More program instruction." T9
			"I would like to know more about Adobe Photoshop and InDesign." T10
			"More training on certain programs (Photoshop, InDesign, etc.)" T11
			"May have to call you to help to present of some subjects." T14
			"More experience with Creative Suite." T17
			"Camera, and other video equipment to use in the classroom and information on photo editing on iPad." T18
			"Photoshop training" T19
Perkins Funding	4	26.7%	"I think most everything could be obtained through the Perkins monies." T4
			"I think it's great that ya'll included Perkin's activities, ya'll really thought of everything." T12
			"Perkins resources for materials." T16
			"Money to buy items for the class." T23
Additional Content	1	6.7%	"Resources in speech prep and goal setting and activities to guide." T13

Fourteen participants provided additional comments including the need for more programs like the one developed for this study, the need for more additional inservice opportunities, the professionalism of the instructor, and the versatility of the agricultural

communications curriculum. Refer to Table 20 for additional comments about the inservice

training.

Table 20

*Additional Comments About the Inservice (*n = *14)*

Themes	*n*	*f*	Support
Additional Programs	10	71.4%	"More inservices like this, great job!" T3
			"I thought it was great, some of us just need serious back grounding for this sort of stuff." T4
			"Good training!" T6
			"Small groups are good especially for older teachers who need to ask many questions." T9
			"Extend the time for the inservice so that we can ask more questions." T10
			"Better technology to use." T1
			"Could there be training for each unit?" T13
			"Just more days of inservice on the software." T17
			"Please develop more programs like this." T19
			"Excellent workshop. Thanks." T21
Instructor	4	14.3%	"None – excellent presentation. Great Presenter." T2
			"Trainer was very professional and knowledgeable about the subject." T16
Curriculum Versatility	1	14.3%	"I think this is a really neat course that I can put w/ many classes." T14
			"Training was great. Several things can be used in ag classes." T23

Descriptive Field Test

The descriptive field test was used to answer research questions three through five.

Did student knowledge increase based on agricultural communications curriculum taught via

unit of instruction?

What was student knowledge application through project-based activities?

What are agricultural teachers' perceptions of agricultural communications curriculum, developed for this study?

Descriptive Field Test Demographics

Individual units of agricultural communications curriculum were completed in 21 schools in Arkansas, one school in Missouri, and one school in California. These schools varied in size and geographical location. Of the seven teachers and 20 student teachers who participated in the study, 13 were male and 14 were female. The programs also displayed different levels of technology availability and support. Students from 9th to 12th grade participated in this study. Of the 33 teachers and student teachers who originally expressed interest in teaching the agricultural communications curriculum, 27 agreed to participate in the study. At the conclusion of the descriptive field test, 14 did not return agricultural communications curriculum data to the researcher; therefore, no data was included in this study from those participants.

The population of this study consisted of students from 11 schools in Arkansas, one school in Missouri, who returned data to the researcher, during the fall 2013 and spring 2014 semesters ($N = 182$). Sample sizes for the individual units is represented in Table 21.

Table 21

Sample Size of Students who Participated in Each Unit of Agricultural Communications Curriculum (N = 182)

	Class	Student
Curriculum unit	*n*	*n*
Journalistic Writing	3	18
Public Relations	2	16
Photography	3	34
Graphic Design	2	17

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Table 21 (continued)

Curriculum unit	Class _n_	Student _n_
Print Design Layout	1	38
Videography	-	-
Digital Audio Broadcast	1	17
Social Media	-	-
Web Design	1	21
History	3	37
College Preparation	2	9

Note. Participants may have completed more than one unit as part of the descriptive field test. "-" denotes missing data.

Information about each of the schools that participated in the descriptive field test regarding location, classification, ethnic distribution, and student's eligible for free/reduced lunches was attained from the National Center for Education Statistic's online database (http://nces.ed.gov/). Table 22 displays demographics information for each participating school in the study ($N = 23$).

Table 22

Demographics of Schools Participating in the Descriptive Field Test (N = 23)

School	Location	Total Students	Gender Distribution		Ethnicity	Free/Reduced Lunch Eligible	
			Male	Female		Free	Reduced
Alpena H.S.	North	240 (7-12)	118	122	94% White 4% Hispanic All other groups ≤5%	90	31
Beebe H.S	Central	915 (9-12)	465	450	91% White 3% Black 3% Two or More Races All other groups ≤5%	291	87
Bergman H.S	North	327 (9-12)	157	170	95% White All other groups ≤5%	127	33
*Elkins H.S.	North	347 (9-12)	181	166	90% White 7% Hispanic All other groups ≤5%	98	53
*Emerson H.S.	South	149 (7-12)	70	79	62% White 32% Black All other groups ≤5%	61	12
*Foreman H.S.	Southwest	264 (7-12)	135	129	73% White 19% Black 5% Hispanic All other groups ≤5%	132	45
*Fouke H.S.	Southwest	302 (9-12)	162	140	97% White All other groups ≤5%	110	48

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Table 22 (continued)

School	Location	Total Students	Gender Distribution		Ethnicity	Free/Reduced Lunch Eligible	
			Male	Female		Free	Reduced
Gentry H.S	Northwest	378 (9-12)	196	182	69% White 11% Hispanic 9% American Indian 9% Asian All other groups ≤5%	167	51
Gravette H.S.	Northwest	559 (9-12)	295	264	88% White 5% Hispanic 3% American Indian All other groups ≤5%	174	65
Greenbrier H.S.	Central	659 (10-12)	334	325	95% White All other groups ≤5%	145	42
*Greenland H.S.	West	256 (9-12)	136	120	88% White 4% Hispanic 3% Two or More Races All other groups ≤5%	115	26
Hermitage H.S.	Southeast	208 (7-12)	102	106	61% White 24% Hispanic 15% Black All other groups ≤5%	128	17
*Kingston H.S.	North	109 (7-12)	59	50	89% White 6% American Indian 6% Hispanic	51	19

Table 22 (continued)

School	Location	Total Students	Gender Distribution		Ethnicity	Free/Reduced Lunch Eligible	
			Male	Female		Free	Reduced
*Lafayette County H.S.	South	335 (7-12)	178	157	60% Black 37% White All other groups ≤5%	226	49
Lincoln	Northwest	349 (9-12)	173	176	82% White 9% Hispanic 5% American Indian All other groups ≤5%	177	56
*Magnolia H.S.	South	625 (10-12)	305	320	53% Black 44% White All other groups ≤5%	316	51
Mena	West	602 (9-12)	301	301	93% White 3% Hispanic All other groups ≤5%	245	105
Mount Judea H.S.	North	60 (7-12)	35	25	97% White All other groups ≤5%	38	11
Rector H.S.	Northeast	256 (7-12)	130	126	100% White All other groups ≤5%	102	39
*Pea Ridge H.S.	Northwest	486 (9-12)	268	218	94% White 4% Hispanic All other groups ≤5%	147	68

Table 22 (continued)

School	Location	Total Students	Gender Distribution		Ethnicity	Free/Reduced Lunch Eligible	
			Male	Female		Free	Reduced
*St. Paul H.S.	North	99 (7-12)	55	44	96% White All other groups ≤5%	63	9
Wheaton, MO. H.S.	Southwest	209 (7-12)	106	103	72% White 18% Asian 10% Hispanic All other groups ≤5%	130	19

Note. "*" indicates schools did not return data to researcher.
"-" indicates missing data (Data retrieved from http://nces.ed.gov/ccd/schoolsearch/index.asp)

The researcher was contacted during the duration of the descriptive field test by teachers from Georgia, Kansas, and Texas requesting permission to teach units from the agricultural communications curriculum in their classrooms. Enquiring teachers were granted permission to use the curriculum but were not required to return materials to the researcher at the conclusion of the study.

Descriptive Field Test Results

Writing Module

Journalistic Writing

Students from three participating schools completed the Journalistic Writing unit. One class only completed questions one through seven-C on the pre-test and questions one through seven-B on the post-test. Likewise, some participants only returned one assessment. Therefore,

missing questions and tests were omitted from statistical analysis. Overall, the participants' ($N =$ 18) scores increased between the Journalistic Writing pre-test ($M = 65.13\%$, $SD = 47.73\%$) and post-test ($M = 94.87\%$, $SD = 22.09\%$). Table 23 illustrates knowledge changes between the Journalistic Writing pre- and post-test assessments.

Table 23

Student Test Scores from the Journalistic Writing Unit (N = 18)

Question	Pre-test (%)			Post-test (%)		
	n	*M*	*SD*	*n*	*M*	*SD*
1. Journalistic writing covers agricultural news for print, broadcast and online media. (True/False)	14	100	-	16	100	-
2. What style are news stories written in? (Multiple Choice)	14	57.14	51.36	16	93.75	25.00
3. No creative style can be exercised in feature writing. (True/False)	14	85.7	36.30	16	100	-
4. What are the five W's and an H? (Fill in the Blank – W1)	14	85.71	36.31	16	100	-
4. What are the five W's and an H? (Fill in the Blank – W2)	14	92.86	26.73	16	100	-
4. What are the five W's and an H? (Fill in the Blank – W3)	14	92.86	26.73	16	100	-
4. What are the five W's and an H? (Fill in the Blank – W4)	14	92.86	26.73	16	100	-
4. What are the five W's and an H? (Fill in the Blank – W5)	14	92.86	26.73	16	100	-
4. What are the five W's and an H? (Fill in the Blank – H1)	14	85.71	36.31	16	100	-
5. What is the purpose of a news lead? (Short Answer)	14	28.57	46.88	16	93.75	25.00
6. Which answer correctly abbreviates the state of Arkansas when NOT used in an address according to the AP Stylebook? (Multiple Choice)	14	42.86	51.36	16	62.50	50.00
7. List three key elements of news writing. (Fill in the Blank – 1.)	14	28.57	46.88	16	93.75	25.00
7. List three key elements of news writing. (Fill in the Blank – 2.)	14	21.43	42.58	16	93.75	25.00

Table 23 (continued)

Question	n	Pre-test (%) M	SD	Question	n	Post-test (%) M	SD
7. List three key elements of news writing. (Fill in the Blank – 3.)	14	21.43	42.58		11	81.82	40.45
8. List three types of feature leads. (Fill in the Blank – 1.)	9	22.22	44.10		11	100	-
8. List three types of feature leads. (Fill in the Blank – 2.)	9	22.22	44.10		11	90.91	30.15
8. List three types of feature leads. (Fill in the Blank – 3.)	9	22.22	44.10		11	81.82	40.45
9. What style are feature stories written in? (Multiple Choice)	9	66.67	50.00		11	90.91	30.15
10. Provide the most important information (Matching – News/Feature)	9	88.89	33.33		11	90.91	30.15
10. Creative style can be used (Matching – News/Feature)	9	88.89	33.33	11		90.91	30.15
10. Uses Block Style (Matching – News/Feature)	9	66.67	50.00	11		100	-
10. Less than 400 words (Matching – News/Feature)	9	77.78	44.10	11		100	-
10. Uses Inverted Pyramid Style (Matching – News/Feature)	9	66.67	50.00	11		100	-
10. Creatively tells a story (Matching – News/Feature)	9	77.78	44.10	11		100	-
10. No-frill writing (Matching – News/Feature)	9	77.78	44.10	11		100	-
10. Over 500, but less than 1500 words (Matching – News/Feature)	9	88.89	33.33	11		100	-
Total		65.13	47.73			94.87	20.09

Note. Questions coded as 0 for incorrect and 1 for correct.
"-" denotes a value of 0.

Participants from one school returned articles and grading rubrics for the skills-based activity associated with news writing ($N = 4$). Participants did not achieve the desired grade of 80% on this activity ($M = 78.00$, $SD = 11.60$). Criterion receiving the lowest points possible included word count ($M = 2.00$, $SD = 0$) and adding a quote ($M = 4.50$, $SD = 5.26$). Refer to Table 24 for complete criteria used to assess student news articles.

Table 24

*Assessment of Participating Student News Story (*N = *4)*

Criteria	Points Possible	M	SD
Topic consistent with prompt	5	5.00	-
Included lead using WWWWWH	10	8.75	2.50
Includes a quote	10	4.50	5.26
Accuracy of Information	10	10.00	-
Approximately 400 words	5	2.00	-
Correct AP Style	10	6.00	1.15
Correct grammar, spelling, punctuation, and word choice	10	6.00	1.15
Follows Inverted Pyramid format	10	7.00	1.41
Edited peer article for correct AP Style	20	20.00	-
No-frill writing	10	8.75	2.50
Total	100	78.00	11.60

Note. "-" denotes a value of 0.

Public Relations

Students from two participating schools completed the Public Relations unit. Overall, the participants' (*N* = 16) scores increased between the Public Relations pre-test (*M* = 26.92%, *SD* = 47.61%) and post-test (*M* = 83.17%, *SD* = 37.50%). Table 25 illustrates knowledge changes between the Public Relations pre- and post-test assessments.

Table 25

*Student Test Scores from the Public Relations Unit (*N = *16)*

		Pre-test (%)			Post-test (%)	
Question	n	M	SD	n	M	SD
1. Public Relations is an organizations approach to building a negative image. (True/False)	16	81.25	40.31	16	93.75	25.00
2. The public relations audience is (Multiple Choice)	16	75.00	44.72	16	93.75	25.00
3. The short description of the company or organization found at the bottom of the press release is known as the (Multiple Choice)	16	31.25	47.87	16	75.00	44.72

Table 25 (continued)

Question	Pre-test (%)			Question	Post-test (%)		
	n	*M*	*SD*		*n*	*M*	*SD*
4. The common press release end sign looks like (Multiple Choice)	16	31.25	47.87		16	100	-
5. Press releases are written using the inverted pyramid style and AP style. (True/False)	16	75.00	68.31		16	100	-
6. What is the purpose of the release date? (Short Answer)	16	56.25	62.92		16	75.00	44.72
7. List the three reasons to write a press release. (Fill in the Blank – 1.)	16	-	-		16	87.50	34.16
7. List the three reasons to write a press release. (Fill in the Blank – 2.)	16	-	-		16	81.25	40.31
7. List the three reasons to write a press release. (Fill in the Blank – 3.)	16	-	-		16	81.25	40.31
8. Ethics are the beliefs about _____ and _____ that guide the way we _____and _____. (Fill in the Blank.)	16	-	-		16	81.25	40.31
9. List three rewards for good ethics. (Fill in the Blank – 1.)	16	-	-		16	75.00	44.72
9. List three rewards for good ethics. (Fill in the Blank – 2.)	16	-	-		16	75.00	44.72
9. List three rewards for good ethics. (Fill in the Blank – 3.)	16	-	-		16	62.50	50.00
Total		26.92	47.61			83.17	37.50

Note. Questions coded as 0 for incorrect and 1 for correct.
"-" denoted a value of 0.

Participants from one school returned press releases and grading rubrics for the skills-based activity associated with public relations ($N = 6$). Participants did not achieve the desired grade of 80% on this activity ($M = 75.00$, $SD = 10.93$). Criterion receiving the lowest points possible included identifying the event ($M = 5.00$, $SD = 5.48$) and correct AP Style ($M = 6.00$, $SD = 1.79$). Refer to Table 26 for complete criteria used to assess student press releases.

Table 26

Assessment of Participating Student Press Release (N = 6)

Criteria	Points Possible	*M*	*SD*
Identify upcoming FFA event or agricultural activity	10	5.00	5.48
Press release written covering all important information about event	10	8.33	4.47
Written in press release format	10	8.33	2.74
Correct style (AP)	10	6.00	1.79
Information is accurate	10	9.17	2.24
Writing is ethical	15	15.00	-
Grammar, spelling, punctuation, and word choice	10	6.17	1.34
Organization and format	10	9.17	2.24
Included quote with correct attributions	15	9.50	3.78
Total	100	75.00	10.93

Note. "-" denoted a value of 0.

Design Module

Photography

Students from three participating schools completed the Photography unit. Some participants only returned one assessment. Therefore, missing tests were omitted from statistical analysis. Overall, the participants' ($N = 34$) scores increased between the Photography pre-test ($M = 30.63\%$, $SD = 46.14\%$) and post-test ($M = 77.12$, $SD = 42.05\%$). Table 27 illustrates knowledge change between the Photography pre- and post-test assessments.

Table 27

Student Test Scores from the Photography Unit (N = *34)*

Question	Pre-test (%)			Post-test (%)		
	n	*M*	*SD*	*n*	*M*	*SD*
1. Photography is the art of taking and processing photographs. (True/False)	29	96.55	18.57	27	92.59	26.69
2. When using a film camera what creates the printable image? (Multiple Choice)	29	55.17	50.61	27	88.89	32.03
3. Records images electronically using a built-in processor (Matching – Film/Digital)	29	62.07	49.38	27	92.59	26.69
3. Three elements combine to create a printable image (Matching – Film/Digital)	29	65.52	48.37	27	85.19	36.20
3. Lens refracts light onto a computer chip (Matching – Film/Digital)	29	62.07	49.38	27	77.78	42.37
3. Made up of the lens, the film, and the camera body (Matching – Film/Digital)	29	62.07	49.38	27	88.89	32.03
4. What creates interest and appeal to those viewing the image? (Fill in the Blank)	29	-	-	27	59.26	50.07
5. List three rules to improve photo composition. (Fill in the Blank – 1.)	29	-	3.45	27	85.19	36.20
5. List three rules to improve photo composition. (Fill in the Blank – 2.)	29	-	-	27	81.48	39.58
5. List three rules to improve photo composition. (Fill in the Blank – 3.)	29	-	-	27	74.07	44.66
6. What is it called when you fix minor mistakes in a photograph by removing minor distractions that might hold the attention of the viewer? (Fill in the Blank.)	29	20.69	41.23	27	62.96	49.21
7. List three elements of photo manipulation. (Fill in the Blank – 1.)	29	3.45	18.57	27	81.48	39.58
7. List three elements of photo manipulation. (Fill in the Blank – 2.)	29	10.34	30.99	27	77.78	42.37

Table 27 (continued)

Question	Pre-test (%)			Post-test (%)		
	n	*M*	*SD*	*n*	*M*	*SD*
7. List three elements of photo manipulation. (Fill in the Blank – 3.)	29	3.45	18.57	27	70.37	46.53
8. Picture Element = (Fill in the Blank)	29	3.45	18.57	27	48.15	50.92
9. An image produced for print needs 72 ppi. (True/False)	29	72.41	45.49	27	74.07	44.66
10. What color mode should be selected for digital images? (Fill in the Blank)	29	-	-	27	70.37	46.53
Total		30.63	46.14		77.12	42.05

Note. Questions coded as 0 for incorrect and 1 for correct.

"-" denoted a value of 0.

Participants from two schools completed the alphabet photo scavenger hunt activity.

Participants achieved the desired grade of 80% on this activity (*M* = 85.00, *SD* = 0). Criterion

receiving the lowest points possible was listing the elements of photocomposition included in

each photo (*M* = 0, *SD* = 0). Refer to Table 28 for complete criteria used to assess student

alphabet photo scavenger hunts.

Table 28

*Assessment of Participating Student Alphabet Photo Scavenger Hunt (*n *= 10)*

Criteria	Points Possible	*M*	*SD*
Photographed subjects that resembled letters	25	25.00	-
Each "letter" used to spell high school mascot's name was captured	15	15.00	-
Specified elements listed of photocomposition used for each letter's photo	15	-	-
Did not take photos of real letters or people spelling them out	30	30.00	-
Creativity was used in capturing each photo	15	15.00	-
Total	100	85.00	-

Note. "-" denotes a value of 0.

Another school participating in this study completed the camera budget activity. Students worked in groups to complete this activity and present their finding to the class (*N* = 3). Participants did achieved the desired grade of 80% on this activity (*M* = 82.00, *SD* = 2.35). Criterion receiving the lowest points possible included finding a camera that exhibited each item on activity checklist (*M* = 10.67, *SD* = 1.15) and working in small groups to prepare presentation of chosen camera's qualities (*M* = 9.33, *SD* = 3.06). Refer to Table 29 for complete criteria used to assess the camera budget activity.

Table 29

*Assessment of Participating Student Camera Budget Activity (*N *= 3)*

Criteria	Points Possible	*M*	*SD*
Worked in small group to research the best camera buy	15	12.33	2.08
Found camera that covered each of the items on the checklist	15	10.67	1.15
Specified chosen camera's qualities under each of the categories	15	12.67	2.31
Worked in small group to prepare presentation of chosen camera's qualities	15	9.33	3.06

Table 29

Criteria	Points Possible	M	SD
Contributed to presentation on chosen camera	10	10.00	-
Compared and contrasted chosen camera with top competitor	15	12.67	2.31
Adequately explained camera choice with specific references to camera checklist	15	14.33	1.15
Total	100	82.00	2.35

Note. "-" denotes a value of 0.

In addition to participating in the camera budget activity, student from this school applied their knowledge by completing the Photoshop skills-based activity. Students at the participating school worked in the same groups from the previous activity to complete the assignment ($n = 3$). Participants did achieved the desired grade of 80% on this activity ($M = 84.00$, $SD = 4.00$). Criterion receiving the lowest points possible included printing a high quality version of each edited photo ($M = 18.00$, $SD = 5.20$) and saving the imaged under a specified file name ($M = 17.67$, $SD = 2.08$). See Table 30 for complete criteria used to assess student application of Adobe Photoshop skills

Table 30

Assessment of Participating Student Adobe Photoshop Skills (n = *3)*

Criteria	Points Possible	M	SD
Used photo manipulation elements covered in lesson to edit photos	30	26.33	1.53
Noted at least two editing techniques used for each photo	25	22.00	2.65
Printed a high quality version of each edited photo	25	18.00	5.20
Saved work as Image1, Image 2, etc.	20	17.67	2.08
Total	100	84.00	4.00

Graphic Design

Students from two participating schools completed the Graphic Design unit. Some participants only returned one assessment. Therefore, missing tests were omitted from statistical analysis. Overall, the participants' ($N = 17$) scores increased between the Graphic Design pre-test ($M = 47.40\%$, $SD = 50.06\%$) and post-test ($M = 98.04\%$, $SD = 13.90\%$). Table 31 illustrates knowledge changes between the Graphic Design pre- and post-test assessments. Total knowledge change was not presented for the graphic design unit in this table because of the low reliabilities reported for this unit.

Table 31

Student Test Scores from the Graphic Design Unit (N = 17)

	Pre-test (%)			Post-test (%)		
Question	*n*	*M*	*SD*	*n*	*M*	*SD*
1. The art or skill of combining text and pictures in advertisements, magazines, or books is known as (Fill in the Blank)	16	93.75	25	17	100	-
2. A communications message can be greatly enhanced with the right layout and design. (True/False)	16	100	-	17	100	-
3. List three basic principles of design. (Fill in the Blank – 1.)	16	6.25	25	17	94.12	24.25
3. List three basic principles of design. (Fill in the Blank – 2.)	16	6.25	25	17	100	-
3. List three basic principles of design. (Fill in the Blank – 3.)	16	6.25	25	17	100	-

Table 31 (continued)

Question	Pre-test (%)			Question	Post-test (%)		
	n	*M*	*SD*		*n*	*M*	*SD*
4. The space between graphics, margins, gutters, space between columns, space between lines of type or figures, and objects drawn or depicted is known as (Multiple Choice)	16	43.75	51.23		17	100	-
5. What can be used to effectively communicate complex messages? (Multiple Choice)	16	68.75	47.87		17	88.24	33.21
6. Font is a certain style of type that includes all characters in all sizes. (True/False)	16	18.75	40.31		17	100	-
7. Sans serif means "without feet". (True/False)	16	50.00	51.64		17	100	-
8. Which typeface is a serif? (Multiple Choice)	16	43.75	51.23		17	94.12	24.25
9. Which typeface is a sans serif? (Multiple Choice)	16	56.25	51.23		17	100	-
10. Which typeface is decorative? (Multiple Choice)	16	75.00	44.72		17	100	-

Note. Questions coded as 0 for incorrect and 1 for correct.
"-" denotes a value of 0.

In addition to completing the graphic design pre- and post-test assessments, participants from one school completed the logo hunt activity. Students worked in groups to complete this activity ($n = 3$). Participants did achieved the desired grade of 80% on this activity ($M = 98.33$, $SD = 2.89$). Criterion receiving the lowest points possible included each of the six basic principles of design being represented in the project ($M = 28.33$, $SD = 2.89$). See Table 32 for complete criteria used to assess student application of Adobe Photoshop skills.

Table 32

*Assessment of Participating Student Logo Identification Skills (*n = 3*)*

Criteria	Points Possible	M	SD
Searched in magazines and newspapers for prominent companies and their logos	10	10.00	-
Each of the six basic principles of design represented	30	28.33	2.89
Displayed an example of each logo on poster board	15	15.00	-
Labeled design principles used on each displayed logo	25	25.00	-
At least five different logos	10	10.00	-
Presented logos to the class	10	10.00	-
Total	100	98.33	2.89

Note. "-" denotes a value of 0.

Participants from the same school also completed the logo development activity. Students worked in groups to complete this activity (*n* = 4). All participants received full credit on this activity (*M* = 100, *SD* = 0). See Table 33 for complete criteria used to assess student application of logo development skills.

Table 33

*Assessment of Participating Student Logo Development Skills (*n = 4*)*

Criteria	Points Possible	M	SD
Identified agricultural product or service	20	20.00	-
Used paper, markers, scissors, glue etc. to create logo	20	20.00	-
Explained why the logo was created the way it was	30	30.00	-
Explained design principles used	30	30.00	-
Total	100	100	-

Note. "-" denotes a value of 0.

In addition to participating in the logo development activity, student from this school applied their knowledge by creating the logos they developed in the Illustrator skills-based

activity. Students at the participating school worked in the same groups from the previous

activity to complete the assignment ($n = 4$). Participants did achieved the desired grade of 80%

on this activity ($M = 95.00$, $SD = 10.00$). Criterion receiving the lowest points possible was

including the mission and vision statement for company in a text box on the artboard ($M = 15.00$,

$SD = 10.00$). See Table 34 for complete criteria used to assess student application of Adobe

Illustrator skills.

Table 34

*Assessment of Participating Student Adobe Illustrator Skills (*n = 4*)*

Criteria	Points Possible	*M*	*SD*
Mission and vision statement for company stated in a text box on the artboard	20	15.00	10.00
Used graphic design software to create company logo	40	40.00	-
Saved logo as a vector	15	15.00	-
Labeled design principles used on each printed logo on the artboard	25	25.00	-
Total	100	95.00	10.00

Note. "-" denotes a value of 0.

Print Design Layout

Students from one participating school completed the Graphic Design unit. Some

participants only returned one assessment. Therefore, missing tests were omitted from statistical

analysis. Overall, the participants' ($N = 38$) scores increased between the Print Design Layout

pre-test ($M = 29.63\%$, $SD = 45.70\%$) and post-test ($M = 82.83\%$, $SD = 37.75\%$). Table 35

illustrates knowledge changes between the Print Design Layout pre- and post-test assessments.

Table 35

*Student Test Scores from the Print Design Layout Unit (*N *= 38)*

Question	Pre-test (%)			Post-test (%)		
	n	*M*	*SD*	*n*	*M*	*SD*
1. The combination of both writing and layout and design is known as (Fill in the Blank)	36	30.56	46.72	33	84.85	36.41
2. Effective communication with print depends on the quality of both writing and layout and design. (True/False)	36	94.44	23.23	33	96.97	17.41
3. List three things to consider when designing a layout. (Fill in the Blank – 1.)	36	19.44	40.14	33	84.85	36.41
3. List three things to consider when designing a layout. (Fill in the Blank – 2.)	36	2.78	16.67	33	75.76	43.52
3. List three things to consider when designing a layout. (Fill in the Blank – 3.)	36	-	-	33	30.30	46.67
4. Used to mark the end of a story (Matching – End Sign)	36	5.56	23.23	33	87.88	33.14
4. Identifies each article in the document and attracts the attention of the reader (Matching – Headline)	36	-	-	33	84.85	36.41
4. Includes graphs, charts, tables, illustrations, or photos (Matching – Graphic)	36	16.67	37.80	33	84.85	36.41
4. A quotation or excerpt from the article that is typically placed in a larger or distinctive typeface on the same page (Matching – Pull Quote)	36	33.33	47.81	33	81.82	39.17
4. The space between letters (Matching – Kerning)	36	8.33	28.03	33	81.82	39.17
4. The banner on the first page (Matching – Nameplate)	36	5.56	23.23	33	81.82	39.17
4. The space above and below the lines of text (Matching – Leading)	36	55.56	50.40	33	90.91	29.19

Table 35 (continued)

Question	Pre-test (%)			Post-test (%)		
	n	M	SD	n	M	SD
4. One or more lines of text found between the headline and the body of the article (Matching – Deck)	36	19.44	40.14	33	90.91	29.19
4. Helps to make the graphic meaningful to the reader (Matching – Caption)	36	33.33	47.81	33	84.85	36.41
4. Bulk of the layout design (Matching – Body Copy)	36	50.00	50.71	33	87.88	33.14
4. Name of the person who wrote the article (Matching – Byline)	36	72.22	45.43	33	87.88	33.14
4. Space around the outside of the page and around graphic elements (Matching – Margins)	36	36.11	48.71	33	90.91	29.19
5. A photo caption should include the five W's and H in a short sentence or two describing a photo or illustration. (True/False)	36	50	50.71	33	81.82	39.17
Total		29.63	45.70		82.83	37.75

Note. Questions coded as 0 for incorrect and 1 for correct.
"-" denotes a value of 0.

Participants from this school completed the magazine layout activity (*n* = 13). All

participants received full credit on this activity (*M* = 100, *SD* = 0). See Table 36 for complete

criteria used to assess student achievement on the magazine layout activity.

Table 36

*Assessment of Participating Student Magazine Layout Skills (*n = 13)*

Criteria	Points Possible	M	SD
Chose magazine or with example of layout design	10	10.00	-
Magazine cover and article displayed in poster board	10	10.00	-
Each of the 12 components of electronic print design layout labeled	20	20.00	-

Table 36 (continued)

Criteria	Points Possible	M	SD
Accuracy in component identification	50	50.00	-
Explanation of why the layout was chosen	10	10.00	-
Total	100	100	-

Note. "-" denotes a value of 0.

Multimedia Module

Videography

No knowledge assessments or skill-based rubrics were returned to the researcher for the Videography unit.

Digital Audio Broadcast

Students from one participating school completed the Digital Audio Broadcast unit. Some participants only returned one assessment. Therefore, missing tests were omitted from statistical analysis. Overall, the participants' ($N = 17$) scores increased between the Digital Audio Broadcast pre-test ($M = 52.68\%$, $SD = 50.15\%$) and post-test ($M = 92.38\%$, $SD = 26.66\%$). Table 37 illustrates knowledge changes between the Digital Audio Broadcast pre- and post-test assessments. Total knowledge change was not presented for the digital audio broadcast unit in this table because of the low reliabilities reported for this unit.

Table 37

*Student Test Scores from the Digital Audio Broadcast Unit (*N = 17*)*

	Pre-test (%)			Post-test (%)		
Question	*n*	*M*	*SD*	*n*	*M*	*SD*
1. Digital audio broadcast is a system for transmitting visual signals through high-quality stereo. (True/False)	16	62.50	50.00	15	93.33	25.82
2. Why is digital audio broadcast a valuable outlet for agricultural communicators? (Multiple Choice)	16	93.75	25.00	15	100	-
3. What is the purpose of an air check? (Short Answer)	16	6.25	25.00	15	93.33	25.82
4. What free software program can be used for recording and editing audio recordings? (Multiple Choice)	16	50.00	51.64	15	86.67	35.19
5. T/F Always use active voice when recording audio podcasts and newscasts. (True/False)	16	93.75	25.00	15	100	-
6. Why is it important to develop a broadcast personality when recording podcasts and news casts? (Short Answer)	16	6.25	25.00	15	93.33	25.82
7. When quoting a source in a podcast or newscast always put the attribution at the (beginning / end) of the sentence. (Circle the Correct Answer)	16	56.25	51.23	15	80.00	41.40

Note. Questions coded as 0 for incorrect and 1 for correct.
"-" denotes a value of 0.

No skill-based activities were returned to the researcher for this unit.

Social Media

No knowledge assessments were returned to the researcher for the Social Media unit.

Web Design

Students from one participating school completed the Web Design unit. Some

participants only returned one assessment. Therefore, missing tests were omitted from statistical

analysis. Overall, the participants' ($N = 21$) scores increased between the Web Design pre-test

($M = 45.04\%$, $SD = 49.80\%$) and post-test ($M = 57.08\%$, $SD = 49.55\%$). Table 38 illustrates

knowledge changes between the Web Design pre- and post-test assessments.

Table 38

Student Test Scores from the Web Design Unit (N = 21)

Question	Pre-test (%)			Post-test (%)		
	n	*M*	*SD*	*n*	*M*	*SD*
1. Web design is the planning and creation of websites. (True/False)	21	100	-	20	95.00	22.36
2. What should you consider when developing a website? (Multiple Choice)	21	95.24	21.82	20	100	-
3. What four elements make a worthy website? (Fill in the Blank – 1.)	21	71.43	46.29	20	70.00	47.02
3. What four elements make a worthy website? (Fill in the Blank – 2.)	21	47.62	51.18	20	35.00	48.94
3. What four elements make a worthy website? (Fill in the Blank – 3.)	21	19.05	40.24	20	5.00	22.36
3. What four elements make a worthy website? (Fill in the Blank – 4.)	21	14.29	35.86	20	-	-
4. What is the acronym for the language for describing the structure of web pages? (Multiple Choice)	21	42.86	50.71	20	75.00	44.43

Table 38 (continued)

Question	n	Pre-test (%) M	SD	n	Post-test (%) M	SD
5. What is the acronym for the language for describing the presentation of web pages, including colors, layout, and fonts?	21	61.90	49.76	20	75.00	44.43
6. What is the fair use law? (Short Answer)	21	9.52	30.08	20	15.00	36.63
7. It is OK to borrow copyrighted content to use in a website. (True/False)	21	90.48	30.08	20	85.00	36.63
8. The business of providing various services, hardware, and software for websites, as storage and maintenance of site files on a server is known as? (Multiple Choice)	21	28.57	46.29	20	40.00	50.26
9. A container for all the head elements, must include a title for the document and can include scripts, styles, and meta tags. (Matching – <head>)	21	33.33	48.30	20	35.00	48.94
9. Defines the title of the document. This title is visible on the tab at the top of the browser. (Matching – <title>)	21	66.67	48.30	20	75.00	44.43
9. Typically used to specify page description, keywords, author of the document, last modified, and other metadata. These are not displayed on the page. (Matching – <meta>)	21	28.57	46.29	20	50.00	51.30
9. Used to define HTML headings. (Matching – <h1>)	21	9.52	30.08	20	20.00	41.04
9. Tells the browser that this is an HTML document. (Matching – <html>)	21	33.33	48.30	20	55.00	51.04
9. Contains all the contents of an HTML document, such as text, hyperlinks, images, tables, lists, etc. (Matching – <body>)	21	38.10	49.76	20	55.00	51.04
9. Defines a paragraph. (Matching – <p>)	21	52.38	51.18	20	75.00	44.43

Table 38 (continued)

Questions		Pre-test (%)			Post-test (%)	
	n	*M*	*SD*	*n*	*M*	*SD*
9. Defines a hyperlink, which is used to link from one page to another. (Matching – <a>)	21	19.05	40.24	20	45.00	51.04
9. Inserts a single line break. (Matching –)	21	42.86	50.71	20	70.00	47.02
9. Defines an image in an HTML page. (Matching – <img>)	21	47.62	51.18	20	65.00	48.94
9. Specifies a change in the font. (Matching – <font>)	21	47.62	51.18	20	75.00	44.43
9. Bolds the text. (Matching – <b>)	21	66.67	48.30	20	80.00	41.04
10. What is Adobe product is web authoring software? (Multiple Choice)	21	14.29	35.86	20	75.00	44.43
Total		45.04	49.80		57.08	49.55

Note. Questions coded as 0 for incorrect and 1 for correct.
"-" denotes a value of 0.

No skill-based activities were returned to the researcher for this unit.

Careers Module

History

Students from three participating schools completed the History unit. Some participants only returned one assessment. Therefore, missing tests were omitted from statistical analysis. Overall, the participants' ($N = 37$) scores increased between the History pre-test ($M = 50.92\%$, $SD = 50.04\%$) and post-test ($M = 85.74\%$, $SD = 35.00\%$). Table 39 illustrates knowledge changes between the History pre- and post-test assessments.

Table 39

Student Test Scores from the History Unit (N = *37)*

Question	Pre-test (%)			Post-test (%)		
	n	*M*	*SD*	*n*	*M*	*SD*
1. "The exchange of information about the agricultural and natural resources industries through effective and efficient media, such as newspapers, magazines, television, radio and the Web, to reach appropriate audiences." (Telg & Irani, 2012) (True/False)	34	67.65	47.49	32	90.63	29.61
2. Name six forms of media used to communicate agriculture. (Fill in the Blank – 1.)	34	88.24	32.70	32	93.75	24.59
2. Name six forms of media used to communicate agriculture. (Fill in the Blank – 2.)	34	88.24	32.70	32	100	-
2. Name six forms of media used to communicate agriculture. (Fill in the Blank – 3.)	34	88.24	32.70	32	100	-
2. Name six forms of media used to communicate agriculture. (Fill in the Blank – 4.)	34	58.82	44.12	32	96.88	17.68
2. Name six forms of media used to communicate agriculture. (Fill in the Blank – 5.)	34	44.12	50.40	32	71.88	45.68
2. Name six forms of media used to communicate agriculture. (Fill in the Blank – 6.)	34	17.65	38.70	32	59.38	49.90
3. First agricultural journalism course taught at Iowa State University (Matching – Early 1900s)	34	11.76	32.70	32	65.63	48.26
3. Newspapers began encouraging articles on farming (Matching – Late 1700s)	34	35.29	48.51	32	84.38	36.89
3. Computers dramatically changed the delivery of agriculture messages (Matching – 1920s)	34	47.06	50.66	32	93.75	24.59
3. Word of mouth communication between farmers (Matching – 1700s)	34	61.76	49.33	32	96.88	17.68

Table 39 (continued)

Question	Pre-test (%)			Post-test (%)		
	n	*M*	*SD*	*n*	*M*	*SD*
3. Television increases in popularity (Matching – 1940s & 1950s)	34	41.18	49.96	32	90.63	29.61
3. Radio becomes agricultural news medium (Matching – 1920s)	34	41.18	49.96	32	87.50	33.60
3. Agricultural magazines and journals circulated (Matching – Early 1900s)	34	14.71	35.96	32	75.00	43.99
3. Scientists in colleges of agriculture began writing for publications (Matching – 1840s & 1850s)	34	20.59	41.04	32	68.75	47.09
4. Agricultural communicators communicate what type of messages about agriculture to consumers, lawmakers and others who impact agricultural policy makers. (Multiple Choice)	34	88.24	32.70	32	96.88	17.68
Total		50.92	50.04		85.74	35.00

Note. Questions coded as 0 for incorrect and 1 for correct.
    "-" denotes a value of 0.

Participants from one school completed the positive communication activity. Students

worked in groups to complete the assignment (*N* = 3). Participants did achieve the desired grade

of 80% on this activity (*M* = 88.33, *SD* = 27.06). Criterion receiving the lowest points possible

Included researching and choosing an agricultural topic (*M* = 16.67, *SD* =5.77) and selecting

appropriate media and explaining how it could be utilized to communicate the topic (*M* = 16.67,

SD = 2.89). See Table 40 for complete criteria used to assess student achievement on the positive

communication activity.

Table 40

Assessment of Participating Student Achievement on Positive Communication Activity (N = 3)

Criteria	Points Possible	*M*	*SD*
Researched and chose an agricultural topic	20	16.67	5.77
Identified audience	20	18.33	2.89
Explained the importance of communicating the topic	20	20.00	-
Selected appropriate media and explained how it could be utilized to communicate the topic	20	16.67	2.89
Included the groups thoughts on the topic	20	20.00	5.77
Total	100	88.33	27.06

College Preparation

Students from two participating schools completed the College Preparation unit. Overall, the participants' (*N* = 9) scores increased between the History pre-test (*M* = 72.72%, *SD* = 44.72%) and post-test (*M* = 96.36%, *SD* = 18.80%). Table 41 illustrates knowledge changes between the College Preparation pre- and post-test assessments.

Table 41

Student Test Scores from the College Preparation Unit (N = 9)

Question	Pre-test (%)			Post-test (%)		
	n	*M*	*SD*	*n*	*M*	*SD*
1. Why should you go to college? (Multiple Choice)	9	100	-	9	100	-
2. You should establish goals each year to support your college goals (True/False)	9	100	-	9	100	-
3. _____ build leadership experiences and enhance scholarship opportunities. (Multiple Choice)	9	54.55	52.22	9	100	-
4. When choosing a college it should: (Multiple Choice)	9	90.91	30.15	9	100	-

Table 41 (continued)

Question	n	Pre-test (%) M	SD	n	Post-test (%) M	SD
5. Your educational costs exceed your family's resources to cover expenses, based on a formula established by the federal government (Matching – Need-based Financial Aid)	9	81.82	40.45	9	90.00	31.62
5. Financial support that does not have to be repaid (Matching – Grants)	9	45.45	52.22	9	100	-
5. Financial support based on merit and may come from government or private sources (Matching – Scholarships)	9	36.36	50.45	9	100	-
5. Financial support provided with requirement to pay back the money and charged interest on the amount (Matching – Loans)	9	81.82	40.45	9	100	-
5. Offers several options to help pay for college (ROTC, SOC, Veterans) (Matching – Military Programs)	9	81.82	40.45	9	90.00	31.62
5. Work study or non-work study jobs or college savings programs (Matching – Working and Saving)	9	100	-	9	90.00	31.62
4. Ag What does FAFSA stand for? (Fill in the Blank)	9	27.27	46.71	9	90.00	31.72
Total		72.73	44.72		96.36	18.80

Note. Questions coded as 0 for incorrect and 1 for correct.
"-" denotes a value of 0.

Agricultural Communications Curriculum Teacher Perception Qualtrics® Survey

The link to the Qualtrics® survey was provided to the all teachers who expressed interest in teaching agricultural communications curriculum at the beginning of the study ($N = 33$), and teachers completed the on-line survey. Of the teachers who completed the assessment ($n = 20$), 11 were male, nine were female. The median age of respondents was 28.1 years old. All participants were Caucasian.

Participants were asked if they offered the Agricultural Leadership and Communications course at their school, 70% answered "yes" and 30% answered "no" ($n = 20$). Of the six teachers who currently do not offer Agricultural Leadership and Communications course, 100% were interested in teaching it in the future.

Participants were then asked if they attended an agricultural communications curriculum inservice during the fall 2013 semester. Four participants indicated they had attended an inservice and 16 had not ($n = 20$). However, when asked if they would attend an agricultural communications inservice in the future, 100% indicated they would.

Participants were then asked a series of creativity questions originally published in the State of Create study conducted by Adobe (2012). The majority of participants (90%) believed creativity was key to driving economic growth ($n = 18$). Furthermore, over half the participants (55%) believed being creative is "extremely important" to society, followed by 35% who believed being creative was very important and 10% who believed being creative "somewhat important" to society ($n = 20$).

The next section of questions asked the participants to indicate to which extent they agreed or disagreed with a collection of statement pertaining to creativity based on a five point Likert-type scale. Participants agreed there is increasing pressure to be productive rather than creative at work ($M = 4.25$, $SD = .91$) and disagreed that they did not have the tools to be creative ($M = 2.20$, $SD = 1.01$) Refer to Table 42 for the secondary agricultural teachers' agreement with statements pertaining to creativity.

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Table 42

Secondary Agricultural Teachers Agreement with Statements about Creativity (N = 20)

Question	*n*	*M*	*SD*
People over the age of 35 are more creative than younger generations.	20	2.35	1.18
As a culture, we take creativity for granted.	20	3.40	.91
There is increasing pressure to be productive rather than creative at work.	20	4.25	.91
People are increasingly being expected to think creativity at work.	20	3.50	1.19
Students are becoming more creative as they spend more time online creating what they imagine.	20	3.40	1.10
Being creative is still reserved for the arts community.	20	2.75	1.45
Our creativity is being stifled by our educational system.	20	3.90	.91
I do not have the tools to create.	20	2.45	1.10
I do not have access to creative tools	20	2.20	1.01
Creative tools are too complex for the average person to use.	20	2.30	.98
Creative tools are made for artists and designers.	20	2.25	1.12

Note. Responses based on a 5-point Likert-type scale with 5 = Strongly Agree and 1 = Strongly Disagree.

Next, participating teachers were asked whether or not they taught at least one unit from the agricultural communications curriculum developed for this study. Of the 20 respondents who answered this question, 75% answered "yes" to teaching at least one unit and 25% answered "no". All participants who taught at least one unit of curriculum indicated they would teach the units again (*n* = 15). Refer to Table 43 for explanations information as to why teachers were unable to participate.

Table 43

Did You Teach Unit(s) From the Agricultural Communications Curriculum Available On-line at http://aect.uark.edu/mobile_classroom.php? (N = 20)

Answer	*n*	Support
Yes	15	

Table 43 (continued)

Answer	n	Support
No	5	"I wasn't able to change the program to that extent from where it was". T4
		"Honestly, just flat out didn't have time. If it would have been something I would have previously planned, I would have been able to much easier." T6
		"Medical leave from school" T13
		"The snow caused my supervising teacher to be behind in her lessons. I started two weeks behind in my own. Between playing catch up and attending and preparing for CDE's and planning for subs we ran out of time. I am Sorry!" T14

Teachers who taught at least one unit of agricultural communications curriculum were asked questions specific to the units they selected to teach during the descriptive field test ($n = 11$). The History unit was taught the most ($n = 4$). Refer to the Table 44 for a breakdown of agricultural communications units taught by teachers participating in the perceptions survey.

Table 44

*Agricultural Communications Curriculum Units Taught by Teachers Participating in the Perceptions Survey (*N = *15)*

Item	n
Journalistic Writing	2
Public Relations	3
Photography	4
Graphic Design	3
Print Design Layout	2
Videography	2
Digital Audio Broadcast	1
Social Media	1
Web Design	1
History	5
College Preparation	3

Note. Respondents could have taught more than one unit.

Respondents were asked to indicate which materials they used to teach the concepts introduced in curriculum unit. All participants used the PowerPoint that accompanied the each unit (*n* = 15). Refer to Table 45 for materials used by participants to teach the agricultural communications curriculum.

Table 45

*Secondary Agricultural Teachers Interest in Specific Agricultural Communications Competencies (*N = 15*)*

Material	*n*	% of Respondents
Perkins Activity Form	6	40
Lesson Plan	14	93
Unit Pre-test	13	87
Unit Pre-test Key	13	87
Student Notes	13	87
Student Notes Key	11	73
PowerPoint	15	100
Activity Handouts	13	87
Activity Handouts Keys	12	80
Activity Grading Rubrics	11	73
Activity One	14	93
Activity Two (if applicable)	11	73
Activity Three (if applicable)	6	40
Activity Four (if applicable)	5	30
Activity Five (if applicable)	2	13
Activity Six (if applicable)	3	20
Additional Resources	6	40

Note. Participants could have used more than one item of curriculum material.

The next block of questions pertained to skill-based lessons, technology, and equipment. Participating teachers were asked if technology and equipment influenced which units of agricultural communications curriculum they chose to teach. More than half of the respondents stated that technology and equipment did not influence their decision (53%). Refer to Table 46

for justification as to why or why not teachers were influenced by availability of technology and

equipment.

Table 46

Influence of Technology and Equipment on Agricultural Communications Curriculum Unit Selection (N = 15)

Answer	*n*	Support
Yes	8	"I had to use the east lab, because they had Adobe Illustrator already installed" T3
		"Recording podcasts was much easier when everyone used the same technology instead of using different electronics such as phones, etc." T7
		"Equipment is scarce at our school." T8
		"I had access to all the materials I needed" T10
		"I could not teach the web based ones." T17
		"It made it so much easier." T18
		"I had to limit units that I could teach in the classroom on the projector and THEN allow the students to do it in the computer lab where there is no projector." T20
No	7	"I had all the technology I needed." T11
		"history fit frameworks" T12
		"Because if I needed cameras I could have gotten the mobile classroom to Lincoln for our project." T15
		"Had all needed" T16

Respondents were asked if they taught the skill-based activities associated with the units

they selected. Similarly to the question before, 64% answered no (*n* = 7). Refer to Table 47 for

justification as to why or why not teachers taught the skill-based lessons.

Table 47

Participating Schools Ability to Complete Skills-Based Activities (N = 15)

Answer	*n*	Support
Yes	6	"They learned how to make a logo" T3
		"We used the Business departments'" T8
		"Bc I had access to adobe creative suite they learned how to make a logo" T10
		"But it was very short because my kids got it very quick." T17
		"Photoshop" T20
No	9	"Don't have it." T2
		"I did not need it." T11
		"Did not fit frameworks" T16
		"We did not have it" T15
		"Did not have access." T16
		"It was not available." 18
		"We couldn't access it." T19

Of the six teachers who answered yes to teaching the skill-based lessons, five reported having access to the Adobe Creative Suite to facilitate the activities. One additional teacher reported having access to the Adobe Creative Suite but not needing the programs to complete the selected curriculum unit. InDesign, Illustrator, Photoshop, and Premiere Pro were each used by six of the teachers individually ($n = 5$). Moreover, two participants who completed the perceptions survey were awarded a stipend to purchase the Adobe Creative Suite.

The teachers who were able to teach the skill-based lessons used the student developed creative projects as promotional pieces to advocate for agriculture ($n = 17$). The creative pieces were used to promote the FFA chapter by 67% of participating high school agricultural programs. One participating class used skills they learned in Photoshop to create a flyer to advertise for their fundraising dinner and auction. Refer to Table 48 for various ways participating programs used their student developed creative pieces to promote agriculture.

Table 48

*Uses for Student Developed Creative Pieces (*N = *17)*

Item	*n*
Community	1
Education	3
School	2
Agricultural Education Program	5
FFA Chapter	6
Event	1

Note. Respondents could have used creative pieces to promote more than one item.

Participating teachers listed issues with school internet, school closure due to winter weather, and students not being able to write and spell well as barriers they encountered while teaching the agricultural communications curriculum units. See Table 49 for additional barriers listed by teachers who participated in the descriptive field test.

Table 49

Barriers Encountered while Teaching Agricultural Communications
Curriculum Units (N = *11)*

Response
"The school web would not let me show the clip that was attached to the power point." T1
"Just various mishaps or miscommunications that kept getting me behind. Weather was also bad." T3
"I had issues with ice cream working which left the video portion short. I used a trial of Storyboard" T8
"It just took a little longer than I thought it would to thoroughly teach." T9
"The files were large and hard to work with especially with such limited Internet access." T21
"The students not being able to write or spell well" T11

Table 49 (continued)

Response
"Editing tools. And also when attempting to have students submit work it is sometimes difficult to get the corre
"Just technology." T15
"Explaining web coding to students." T18
"I couldn't access Photoshop. So we used other photo editing apps for students to edit pictures. We had very limited resources. File size to work with was difficult when downloading material." T19
"I'm an idiot with technology sometimes and that slowed me down at certain points." T20

The teachers were asked to note their interest in each competency based on a five point Likert-type scale. Participants reported being most interested in careers in agricultural communications ($M = 4.46$, $SD = 0.66$) and communicating to the public ($M = 4.56$, $SD = 0.66$). Refer to Table 50 for the secondary agricultural teachers' interest in specific agricultural communications competencies.

Table 50

*Secondary Agricultural Teachers Interest in Specific Agricultural Communications Competencies (*N = 20)*

Item	n	M	SD
Writing	20	3.60	0.99
Communicating to the Public	20	4.35	0.75
Journalistic Writing	20	3.35	0.93
News Writing	20	3.05	1.00
Feature Writing	20	3.05	0.89
Associated Press Style	20	2.85	0.88
Writing for Public Relations	20	3.75	1.02
Writing for Marketing	20	3.35	0.88
Blogging	20	2.65	1.31
Photography	20	3.80	1.20
Photo Editing / Manipulation	20	3.45	1.36
Videography (digital video camcorders)	20	3.50	1.24
Video Editing / Manipulation	20	3.40	1.23
Audio Recordings	20	3.30	1.17
Audio Editing / Manipulation	20	3.35	1.27

Table 50 (continued)

Item			
Creating Promotional Videos	20	3.80	1.15
Electronic Print Design	20	3.35	1.35
Electronic Layout (newsletters, brochures, etc.)	20	3.30	1.38
Typography	20	2.85	1.18
Graphic Design	20	3.50	1.43
Web design	20	3.35	1.35
Electronic Curriculum Development	20	3.10	1.25
Radio Broadcast	20	3.20	1.28
Television Broadcast	20	3.25	1.48
Using Social Media for Program Promotion	20	4.05	1.05
Careers in Agricultural Communications	20	4.30	0.86
History of Agricultural Communications	20	3.50	1.28
Degree Preparation in Agricultural Communications	20	3.70	1.08

Note. Responses based on a 5-point Likert-type scale with 5 = Highly Interested and 1 = Not at all Interested.

Participants were asked what additional support, content, resources, etc. they would need to be successful teaching the Agricultural Leadership and Communications course. Of the 16 teachers who responded, six responded with a need equipment, software, and supplies, as well as, more training to further their success teaching the agricultural communications curriculum units. A summary of comment from the participating teachers can be found in Table 51.

Table 51

Additional Material Needed to be Successful Teaching the Agricultural Leadership and Communications course (N = 16)

Themes	n	f	Support
Equipment, Software, Supplies	6	37.50%	"Access to computers."a T13
Training	6	37.50%	"Maybe a workshop explaining additional resources to use and the best way to incorporate activities." T7

Table 51 (continued)

Themes	n	f	Support
Support from State Staff and Administration	2	12.50%	"Cooperation with Frameworks writers in Little Rock so that we feel that this is not extra curriculum." T6
Activities	1	6.25%	"Activities." T8
Guest Speaker	1	6.25%	"Maybe a guest speaker on some units." T11

Participants provided additional comments including satisfaction with the agricultural communications curriculum developed for this study, the need for additional resources to teach the curriculum. Refer to Table 52 for a collection of additional thoughts provided by the participating teachers.

Table 52

Additional Comments About the Agricultural Communications Curriculum. (N = 20)

Themes	n	f(%)	Support
Overall Satisfaction	14	70.00	1. "I would like to have the Ag Communications as a stand-alone class, baring that I think that it could fit nicely into Leadership." T8 2. "It was fun, made teaching easier" T7 3. "The students seemed to really enjoy it." T11 4. "I believe communication is a key component to every aspect of life and wish I was able to implement this curriculum." T4
Edits	3	15.00	"Tests maybe should have been more extensive." T7
Supplemental Material	2	10.00	"Schools would be limited to some of the projects with not having money to buy the equipment." T12

Table 52 (continued)

Themes	n	f(%)	Support
Collaboration between Teachers	1	5.00	"Make sure to connect with the East Lab and Art Teachers in this unit. It really helps." T5

Chapter Summary

This chapter presented findings obtained from the agricultural communications curriculum pilot test, teacher training, and descriptive field test. The results reflected student knowledge gained throughout the pilot test in four different module areas, teachers' perceptions of the pilot curriculum, teachers' perceptions of the agricultural communications curriculum training, student knowledge gained throughout the descriptive field test in 11 different unit areas, Student knowledge application through project-based unit activities, and teachers' perceptions of the revised descriptive field test curriculum. It can be concluded from the findings that student knowledge increased in agricultural communications competencies in the pilot study and descriptive field test. Moreover, students displayed their ability to apply the skills they learned through the project-based activities. As for the teachers who participated in the study, it is evident they found value in the curriculum content, as well as, the training that was provided over the content included in the agricultural communications curriculum.

CHAPTER V: CONCLUSIONS AND RECOMMENDATIONS

Pilot Conclusions

Are the module assessment instruments effective at determining knowledge gained from the

agricultural communications curriculum during the pilot study?

Today's employment market requires skill in many technology areas. Based on the

findings of the pre-test assessment, student knowledge of agricultural communications and

communication-based technologies was relatively low and students may not be gaining skills in

present areas of emerging technology. This may be due to the fact that the current agricultural

leadership and communication class is primarily leadership with the only communications focus

being public speaking (Don Edgar, personal communication, December 19, 2013). Therefore, as

a vocationally based program, findings of this study do not agree with Akers (2001) that

preparation of students, especially based in current and emerging technologies associated in

agricultural communications is present. Participating in the agricultural communications

curriculum modules resulted in the gain of agricultural communications knowledge and skills.

This may be attributed to the presentation of the lessons through direct instruction, experiential

learning, and authentic instruction methods, as recommended by Knobloch (2003), Newmann

and Wehlage (1993), Kolb (1984), and Engelmann (1980).

When analyzing the pre- and post-test assessments the researcher eliminated various

questions from each module assessment to increase reliabilities. However, according to Nunnally

(1967) the reliabilities reported are sufficient during early stages of research.

The creative pieces submitted by the students provided evidence that application of

design and video production skills had been achieved. As stated in one instructor journal (in

reference to the plant sale flyers created during the design module), "The final activity…was a good way to tie all the material together and show the students how [agricultural communications] is used" (T3).

When reviewing the participating secondary teachers' journals several emergent themes were discovered. The curriculum may have been too detailed and covered too much content. Although teachers had positive comments regarding the projects and activities, lack of technology and software in the classroom posed a problem when executing student assignments. Teachers reported that the students were "interested and excited to start the lessons… and learn much better through the [activities] than the notes" (T1).

Although detailed teacher delivery instructions were included in each module that did not necessarily mean teachers followed the guidelines or even taught the lessons the way they were developed. When analyzing the teacher's journals it was evident that their own abilities with skill level in agricultural communications and technology were low. If students and teachers are to move toward an active process as touted by Hein (1991) then further education and experience (Kolb, 1984) must be gained in order to avail these abilities from the teacher to the student.

The participating teachers in this study were willing to teach the agricultural communications curriculum but expressed the need for training in the content areas and technology utilized in the agricultural communications curriculum. This research was supported by Calico et al. (2013a) research finding secondary teachers are interested in learning new skills related to agricultural communications.

Recommendations for Practitioners from Pilot Study

The researcher can assume that the extensive and detailed concepts covered in the modules exceeded the learning capacity of the students in the time allotted for knowledge gain. This was also verified in teacher reflective journals. Because of this, more emphasis should be placed on various content areas in the future to ensure maximum knowledge gain has occurred. Areas that need further emphasis include: agricultural communications history, feature writing, web design, digital audio broadcast, and social media. However, it is of equal importance to note that there was value in the original curriculum as noted in the knowledge increase in each module: careers (16.2%), writing (23.1%), design (35.7%), and multimedia (31.3%). That being said, all curriculum can be improved to better meet the needs of students and teachers.

Before making the curriculum available to the entire state it should be revised to include only overarching agricultural communication and communication technology knowledge and skill development so that students can simply be introduced to the overarching agricultural communications concepts and spark interest in pursuing similar opportunities after high school. In addition, the content should be reduced and revised to allow students to comprehend the concepts and create quality projects showcasing the skills and knowledge they have learned.

Because it is unlikely that funds can be secured to purchase all secondary agriculture programs the software and technologies needed to adequately teach agricultural communications in the classroom, all curriculum should be revised so that activities utilizing software and technology are optional depending on the level of technology available to students and teachers. Additional activities should be included in each unit to allow students to apply skills and concepts learned without equipment and technology. Perkins activity forms should be created

and included in the units to assist secondary teachers in purchasing equipment and software needed to more effectively teach agricultural communications curriculum.

Curriculum revisions should include the addition of more real-world application in the lecture portion of each curriculum unit to spark student interest in the content, which may in turn increase future career and college opportunities within agricultural communications. This could be achieved by including interviews and biographies of individuals currently working in the agricultural communications career field.

In cooperation with the state Department of Career and Technical Education, teacher inservice training should be scheduled to introduce teachers to necessary agricultural communications curriculum, software, and equipment, in addition to increasing their confidence in teaching the content.

Recommendations for Further Research from Pilot Study

Before continuing research regarding this study, researchers should revise the pre- and post-test assessments to eliminate weak questions in an effort to increase reliabilities. The pre- and post- tests should be administered before and after each unit opposed to each content module. This will reduce knowledge retention lost due to maturation. Furthermore, teachers should be advised to review unit concepts before and after each learning opportunity to reinforce the material taught during each unit.

In future studies activities such as this should be included at the end of each unit, rather than the end of each module, to increase discovery learning (Bruner, 1961), experiential learning (Kolb, 1984), and authentic learning (Newmann & Wehlage, 1993); and create the complete psychological structure for learning as outlined by Knobloch (2003).

Teacher Training Conclusions

What are agricultural teachers' perceptions of agricultural communications training used to prepare them to teach the curriculum?

Although technology is readily available in the workplace, both teachers and students must first be trained in effective communication strategies via multimedia channels that adhere to professional journalism standards and ethics. Based on the findings from the post-inservice survey, teachers are interested in the technology associated with teaching agricultural communications; however, it is evident that teachers need additional training and resources in agricultural communications competencies. These findings are consistent with those of Calico et al. (2013a), Adobe (2012), and Roberts et al. (2006), reporting high school agricultural teachers need specific skill development to enable them to improve teaching, especially in the areas of agricultural leadership, communications, and agricultural career development.

Newman and Johnson (1994), cited agricultural teachers constantly express the need for training in technical skills and subjects (Barrick et al., 1983). The participating teachers supported that claim by stating their satisfaction with all aspects of the training and requested more inservice opportunities in agricultural communications. The research conducted by Newman and Johnson (1994) was further supported by this study because teachers were presented with a new subject and material to teach.

Recommendations for Practitioners from Teacher Training

This study reinforced Calico et al. (2013a) claim that there is need for agricultural communications curriculum and that need is reinforced by teachers and students in Arkansas. Teachers who attended the inservice identified the versatility of the agricultural communications curriculum and stated the need for more programs such as the curriculum and training developed for this study. Quality instructional material will provide teachers with the opportunity to create different and unique career options for students post high school (Doerfert, 2011).

It is critical for university faculty, with expertise in agricultural communications, and high school teachers to build collaborative relationships to educate and prepare high school students' for a future in, or as a supporter of, agriculture. This study supported research stating "a number of calls have been made in the agricultural education literature for increased collaboration between agricultural education and agricultural communications" (Tucker et al., 2003, p. 7).

Teachers who attended the inservice expressed the need for additional training opportunities in agricultural communications. The state Department of Career and Technical Education, should work with faculty in agricultural communications to provide additional teacher inservices to introduce teachers to necessary agricultural communications curriculum, software, and equipment, in addition to increasing their confidence in teaching the content.

Participating teachers expressed the need for necessary equipment and software to teach the agricultural communications curriculum, supporting findings from the State to Create Study by Adobe (2012). In addition to providing Perkins activity forms for the teachers, other avenues of funding should be established to provide agricultural communications equipment and software to high school agricultural programs.

Recommendations for Further Research from Teacher Training

According to the *National Research Agenda,* there is a need to "systematically identify and develop instructional systems to meet industry needs" (Doerfert, 2011, p. 19). Researchers should work to further identify industry desired agricultural communications skills and provide inservice opportunities to teachers who are interested in learning more about agricultural communications. Furthermore, researchers should evaluate student need for skills in agricultural communications areas and incorporate teacher training specific to those skills to prepare students for the workforce (Akers et al., 2001; Crawford et al., 2011; Doerfert, 2011; Pennington, 2012).

A further recommendation would be to evaluate specific skills needed by students and teachers in other high school agricultural courses and provide training opportunities for teachers to increase their knowledge and confidence in teaching other material.

<div align="center">

Descriptive Field Test Conclusions

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Did student knowledge increase based on agricultural communications curriculum taught via unit of instruction?

What was student knowledge application through project-based activities?

What are agricultural teachers' perceptions of agricultural communications curriculum, developed for this study?

Based on the findings from the material submitted by participating teachers at the conclusion of the descriptive field test, the curriculum was taught by three certified teachers and 10 student teachers. More specifically, digital audio broadcast and graphic design were taught

entirely by novice student teachers in artificial teaching environments which could have attributed to student guessing on the knowledge assessments and lower reliabilities reported for these two units. Similarly to the pilot test for this study, although detailed lesson plans were included for each unit the teachers may not have taught the units the way they were developed. This is particularly true for the units taught by student teachers. Factor analyses were conducted for the graphic design and digital audio broadcast to determine variability among items included in the knowledge assessments. No conclusions could be drawn from the factor analysis for either units, therefore, the data was removed from the study.

The researcher did not influence which units of agricultural communications curriculum participating teachers selected to teach. Journalistic writing, photography, and history were taught by the most teachers. These units could have been selected because teachers were familiar and comfortable with these content areas as expressed by teachers who participated in the Qualtrics® perceptions survey. Furthermore, the teacher training provided to the teachers focused on photography and Photoshop increasing teachers' confidence in their ability to teach the photography unit. Teachers noted the lack of technology, software, and internet access available to their students as a barrier in teaching the curriculum which could have influenced teachers to select the journalistic writing, history, public relations, and college preparation units due to the fact that technology is not required to teach these units. The lack of technology, software, and internet access may also have been the deciding factor causing teachers not to select the videography and social media units.

Pre-test assessment averages ranged from 26.92% (photography) to 72.73% (college preparation) correct. It is evident, participating students displayed little to no knowledge of agricultural communications concepts prior to beginning the agricultural communications

curriculum unit selected by the participating teachers. This conclusion is consistent with claims drawn from the pilot test conducted earlier in this research study and further proves students are not building skills in communications through career and technical education, as defined by congress (Hayward & Benson, 1993).

Post-test assessment averages ranged from 57.08% (web design) to 98.04% (graphic design) correct. Although students did not meet the expected 80% average on the post-test for the web design unit and photography unit (77.12%) the increase in percent correct from pre-test to post-test assessment, on all units returned to the researcher, reflects an increase in knowledge of agricultural communications competencies as a result of participating in the agricultural communications curriculum developed for this study.

The pre- and post-test assessments coupled with skill-based activities and grading rubrics submitted by the students provided evidence that knowledge of positive communication and application of design fundamentals in photography, graphic design, and print design layout had been achieved. This knowledge gain supports Engelmann's (1980) direct instruction model to teach skills and Knobloch's (2003) suggestion that experiential learning paired with authentic learning standards fosters a dynamic learning experience in agricultural education. This conclusion is also supported by Thorndike, claiming innovative or new concepts create a psychological impact on students, resulting in a defined need to understand the information (Wiburg, 2003). However, students did not meet expectations in skills pertaining to writing for news and public relations. One of the participating teachers noted a barrier preventing them from teaching the curriculum effectively was students' ability to write well. Deficiencies in writing might attribute to the lower mean scores on news and press release writing.

Skill-based activities and rubrics from videography, digital audio broadcast, and web design were not returned to the researcher. Teachers noted in the Qualtrics® perceptions survey that one of the deciding factors on which units they taught depended on their level of confidence in teaching the material. Teachers may not have the skill set or confidence to teach the units within the multimedia module. The lack of teacher confidence to utilize the units within the multimedia module further supports the claim that agricultural teachers need skill development in areas of agricultural communications (Barrick et al., 1983; Calico et al., 2013a; Newman & Johnson, 1994; Roberts et al., 2006).

Only 20 of the original 33 teachers who were interested in the agricultural communications curriculum completed the curriculum perception survey. Furthermore, of the 20 who completed the survey, only 75% taught one or more units from the agricultural communications curriculum.

According to the Qualtrics® perceptions survey, the history unit was the most taught unit of the 11 units offered in the curriculum. Based on the findings from the perceptions survey this may be due to the fact that the history unit did not require any technology, equipment, or software to teach and it was the unit the teacher "felt most comfortable to teach'. Some teachers chose to teach this unit because it was "the basis and the starting point" or the teacher believed history 'needed to be covered in animal science class".

Teachers who participated in the descriptive field study were provided with all material required to teach the basic concepts outlined in each unit. Addition material and resources were included in each unit for teachers who wanted to extend learning experiences a step, and in some cases, two or three steps further. The researcher can conclude, teachers who participated in the

perception survey were extremely comfortable using the PowerPoints ($n = 15$), lesson plans ($n = 14$), and venturing into the first activity ($n = 14$) that accompanies the unit of instruction.

However, as the activities become more and more depended on technology, equipment, and software, teachers stop using the material and resources provided to them to teach the agricultural communications objectives. Perhaps teacher apprehension to teach new concepts stems from their lack of confidence and ability to teach emerging trends in society and technology, in the agricultural industry, through high school agricultural communications curriculum (Edgar, 2012; Talbert, et al., 2005).

Even though the majority of participants who completed the perceptions survey were not able to teach the skill-based lessons, six participants completed skill-based activities using the Adobe Creative Suite. Teachers created opportunities to teach with software and equipment by collaborating with business and EAST lab teachers, as suggested by Rojewski (2002). The collaboration of expertise between the two teachers creates an excellent learning environment for students from the agriculture class but students from the collaborating classroom reap the benefits from the concepts introduced through the agricultural communications curriculum. Additionally, the participating agriculture teachers gained confidence and knowledge of how to teach the skills associated with the objectives of the unit in the future. Agricultural classes that were able to complete skills-based activities utilized their new skills to develop creative pieces to promote agriculture, education, and FFA within their school and community.

Although teachers were generally successful at teaching the agricultural communications curriculum, participants stated the need for additional training and support with new technology and creative skills. This too agrees with findings from the pilot study, teacher training, and other research studies that suggest providing training in technical skills to agriculture teachers who are

presented with new teaching material (Barrick et al., 1983; Calico et al., 2013a; Newman & Johnson, 1994). Moreover, all of the teachers who participated in the study offered the Agricultural Leadership and Communications class or was interested in offering the course in the future. This finding, agrees with findings earlier discussed in the pilot test and supports research stating agricultural teachers are interested and willing to learn concepts pertaining to agricultural communications (Calico et al., 2013a).

An interesting conclusion drawn from the findings of the perceptions survey is participating teachers indicating teaching units of videography, including the use of Adobe Premier Pro, and social media. However, knowledge assessment and skill based student projects were not returned to the researcher in these two areas of agricultural communications curriculum. The missing assessment material may be related to the large number of school days, in areas of Arkansas up to 23 days, cancelled due to inclement weather during the spring 2014 semester (Fox News, 2014). Although assessment material from every unit were not returned to the researcher, results from the perceptions survey paired with the material returned to the researched indicates that all units of agricultural communications curriculum were taught at least once during the duration of the study.

The availability of technology and equipment dictates which aspects of curriculum units' teachers are able to facilitate. Teachers indicated in the perceptions survey lack of access to creative software, internet, computers, and supplies made teaching the skill-based activities impossible. This conclusion agrees with earlier research conducted during the pilot test of this study stating teacher, in fact, do not have access to up-to-date technology to teach the concepts presented in the agricultural communications curriculum.

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Although teachers lacked skills and knowledge of agricultural communications, their overall attitude towards the curriculum developed for this study was positive. Teachers expressed interest most in communicating to the public ($M = 4.35$, $SD = 0.75$) and careers in agricultural communications ($M = 4.30$, $SD = 0.86$). Participating teacher interest shifted from when the researcher posed the same question during the inservice training. At the teacher inservice participants indicated being most interested in photography ($M = 4.78$, $SD = 0.42$) and photo editing / manipulation ($M = 4.78$, $SD = 0.52$). Teacher interest in photography and photo editing / manipulation during the teacher inservice could be attributed to photography being the focus of the inservice provided prior to survey administration. This conclusion is further strengthened due to the fact that in a previous study conducted by Calico et al. (2013a) teachers claimed to be most interest in communicating to the public ($M = 3.37$, $SD = 0.67$) and careers in agricultural communications ($M = 3.08$, $SD = 0.73$).

Not only are agricultural teachers interested in teaching agricultural communications curriculum, they are interested in attending trainings to increase their ability and confident in teaching the concepts outlined by the curriculum. Only four participants of the perceptions survey attended the teacher training provided by the researcher. However, all responded indicated they would attend trainings in the future. This conclusion is consistent with those from the pilot study and teacher training conclusions and further supports Newman's and Johnsons' (1994) research stating agricultural teachers seek training in technical skills and subjects.

Participating teachers believe creativity is important to society and crucial to economic growth. Additionally, teachers agreed they are expected to be productive rather than creative at work. Because business teachers are already teaching concepts of design, there is a lack of support to teach these skills in agricultural courses (Chris Bacchus, personal communication,

August 29, 2012). This supports participating teachers' perceptions of creativity being stifled by the education system and hinders the ability to encourage art and design in STEM subjects as suggested by Rhode Island School of Design (STEAM, 2014). Furthermore, perceptions of creativity expressed by the participating teachers match the finding presented in the State of Create Study released by Adobe (2012).

Recommendations for Practitioners from Descriptive Field Test

Student knowledge of agricultural communications increased between pre- and post-test assessments for all units taught during the descriptive field test. However, some concepts need to be taught more in depth before student knowledge is assessed to insure student grasp the concepts and objectives taught in each unit. This is especially true for units of photography, graphic design, and web design were overall knowledge increase and Cronbach's Alpha coefficients were low. Additionally, pre- and post-test assessments from the graphic design and digital audio broadcast units should be revised to included questions that more accurately measure change in student knowledge.

Skill-based activities returned to the researcher proved teachers and high school students are capable of completing activities requiring software, equipment, and technology. This is supported by Palfrey and Gasser (2008) research stating environment "where students are doing applied work, research and writing, and problem solving are obvious places to seek integration" of technology (p. 247). Teacher who choose to integrate unit of agricultural communications curriculum into their programs of study need to make every effort possible to include skill-based activities as reinforcement to concepts covered in the lecture portions of the units. Moreover,

agriculture teachers should collaborate with EAST lab, English, and business teachers to facilitate completion of skill-based activities.

Participating students struggled to meet expectations in skills-based activities associated with writing. Indicating agricultural teachers need to incorporate elements of writing into everyday assignments in all aspects of agricultural education, not just communications. Moreover, national ACT writing scores have declined since 2007 and in 2012, writing scores for the state of Arkansas are below the national level of 7.1 on a 12 point scale (ACT, 2014). Units of journalistic writing and public relations, as well as other units of agricultural communications curriculum, can be supplemented into any agricultural education course offered in a program of study to improve writing and design skills.

Further supporting recommendations from the pilot student and teacher training, the state Department of Career and Technical Education needs to provide additional inservice opportunities to prepare teachers to confidently and successfully teacher agricultural communications curriculum, software, and equipment, to students enrolled in agricultural education courses.

The agricultural communications curriculum developed for this study should be used to develop a frameworks for a stand-alone semester long course in agricultural communications for implementation into classes across the state of Arkansas. A stand-alone agricultural communications course will alleviate teacher stress of integrating elements of agricultural communications into courses that are already required to cover large amounts of information in one semester of instruction.

The agricultural communications curriculum was created with Arkansas as the focus; however, the curriculum was actively taught outside of the state of Arkansas during the duration

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of the study. Curriculum standards are different for every state, but existing units of agricultural communications curriculum can be adapted to meet requirements specific to each state. Distribution of the curriculum should continue to other states interested in adding agricultural communications to their current offering of high school agricultural courses.

Recommendations for Further Research from Descriptive Field Test

Before conducting additional research involving the descriptive field test, student knowledge instruments evaluating graphic design and digital audio broadcast need revisions to ensure assessment items evaluate content covered in the specific units of instruction. Revisions to the pre- and post-test assessments will improve Cronbach's Alpha coefficients allowing total knowledge change to be included in the findings and conclusions of future studies. Furthermore, larger sample sizes for each unit should be obtained to increase validity of future studies. Support from state staff and school administrations to teach agricultural communications will encourage teachers to integrate curriculum units into their classes.

Additionally, institutions of agricultural science teacher preparation should evaluate student need for skills in agricultural communications areas and incorporate education for future candidates in teacher education. As reported by numerous researchers (Bigge & Shermis, 1999; Edgar, 2012; Gredler, 2005; Schunk, 2004), perceptions of students must be taken into account in order to explain learning. If educators are not utilizing technology, education may not be impacting students at a level where student learning is maximized.

It is further recommended that professional development be implemented for participants in the state where this study was conducted. Based on the findings of this study, limited proficiencies in agricultural communications technologies were found. Furthermore, researchers'

should investigate the acceptance of technologies by educators in [State] to further impact the

professional development of teachers.

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APPENDICES

Appendix A

IRB Approval

UNIVERSITY OF ARKANSAS

January 14, 2014

MEMORANDUM

TO:	Leslie Edgar Don Edgar Casandra Cox Jefferson Miller
FROM:	Ro Windwalker IRB Coordinator
RE:	PROJECT CONTINUATION
IRB Protocol #:	12-12-366
Protocol Title:	*Visual Communication on the Road in Arkansas: Video and Photo Creative Projects to Promote Agriculture, Phase II: Integration of Visual Communication into Arkansas High School Curriculum*
Review Type:	☒ EXEMPT ☐ EXPEDITED ☐ FULL IRB
Previous Approval Period:	Start Date: 01/17/2013 Expiration Date: 01/16/2014
New Expiration Date:	01/16/2015

Your request to extend the referenced protocol has been approved by the IRB. If at the end of this period you wish to continue the project, you must submit a request using the form *Continuing Review for IRB Approved Projects*, prior to the expiration date. Failure to obtain approval for a continuation on or prior to this new expiration date will result in termination of the protocol and you will be required to submit a new protocol to the IRB before continuing the project. Data collected past the protocol expiration date may need to be eliminated from the dataset should you wish to publish. Only data collected under a currently approved protocol can be certified by the IRB for any purpose.

This protocol has been approved for 500 total participants. If you wish to make *any* modifications in the approved protocol, including enrolling more than this number, you must seek approval *prior to* implementing those changes. All modifications should be requested in writing (email is acceptable) and must provide sufficient detail to assess the impact of the change.

If you have questions or need any assistance from the IRB, please contact me at 210 Administration Building, 5-2208, or irb@uark.edu.

Appendix B

Pilot Participation Consent Form

UA
UNIVERSITY OF ARKANSAS
DIVISION OF AGRICULTURE

Department of
Agricultural and Extension Education

UNIVERSITY OF ARKANSAS
Dale
BUMPERS COLLEGE
of Agricultural, Food and Life Sciences

205 Agriculture Building, University of Arkansas, Fayetteville, AR 72701-1201
479-575-2035 • Fax 479-575-2610

March 23, 2014

Dear Parent(s)/Guardian(s) and Student:

I am a faculty member at the University of Arkansas working on a USDA funded project. I am conducting research on integrating agricultural communications curriculum into Arkansas high schools. The goal of the research is to develop secondary school curriculum, which would improve student knowledge and skills in written and oral communications, electronic communication technologies, math, science, and literacy and increase understanding of agricultural communication careers.

Your student was chosen for this study because he/she is enrolled in an agricultural science course instructed by a teacher on the advisory council for this granted project. A total of approximately 300 students from five Arkansas public schools have been asked to participate in this study. Students will be taught curriculum in agricultural communications aligned with present coursework required by the state of Arkansas agricultural frameworks. He/she will be given tests to determine prior knowledge, knowledge gained, and knowledge retained from the lessons in this new curriculum. This information will help us improve the curriculum.

There are no risks connected to this project. The benefit of participation in this study is the opportunity of learning information about agricultural communications and professional opportunities. Your student will participate in all classroom activities during this research project. However, the decision to allow your child's scores and responses to be used in recording and analyzing data for this project is completely voluntary.

All information collected will be kept confidential to the extent allowed by law and University policy. All information will be coded by the researchers and identifying information will be removed from the forms. No identifiers linking you or your student to the study will be included in any report or publication.

By signing below you authorize your child to participate in the research project and have data collected. If you have any questions, you can contact me using the information listed below. Thank you for your support and participation.

Sincerely,

Leslie D. Edgar, Associate Professor of Agricultural Communications
Department of Agricultural and Extension Education
University of Arkansas

Participant (Student): _____ _____ _____
                              Print Name   Signature   Date

Parent / Guardian: _____ _____ _____
                              Print Name   Signature   Date

This research study has been reviewed by the Institutional Review Board at the University of Arkansas. For research-related problems or questions regarding students' rights, you can contact Ro Windwalker, the University's Compliance Coordinator, at (479) 575-2208 or e-mail irb@uark.edu.

The University of Arkansas is an equal opportunity/affirmative action institution

Appendix C

Pilot Pre- and Post-tests

Writing

Writing Module Pre-test

1. What style are news stories written in?
   a. Block Style
   b. Inverted Pyramid Style
   c. Free Style
   d. None of the Above

2. (True/False) No creative style can be exercised in feature writing.

3. List two forms of writing OTHER than journalistic writing.
   1. _____
   2. _____

4. What are the five W's and an H?
   W_____
   W_____
   W_____
   W_____
   W_____
   H_____

5. What is the purpose of a lead?

   _____
   _____
   _____

6. Which month of the year is correctly abbreviated according to the *AP Stylebook*?
   a. September 12, 2013
   b. Sep. 12, 2013
   c. Sept. 12, 2013
   d. Sept 12, 2013

7. List three key elements of news writing.
   1. _____
   2. _____
   3. _____

8. What style are news stories written in?
   a. Block Style
   b. Inverted Pyramid Style
   c. Free Style
   d. None of the Above

9. Where is a boilerplate located?
   a. Before the headline of a news story
   b. After the lead
   c. Under a picture
   d. At the end of a press release

10. (True/False) Plagiarism is an example of good ethics.

4. What style are news stories written in?
    a. Block Style
    b. Inverted Pyramid Style
    c. Free Style
    d. None of the Above

5. (True/**False)** No creative style can be exercised in feature writing.

6. List two forms of writing OTHER than journalistic writing.
    1. __**Scientific and Technical, Social**_____
    2. __**Academic, Creative**_____

4. What are the five W's and an H?
    Who
    What
    When
    Where
    Why
    How

5. What is the purpose of a lead?
    __**To catch the reader's attention.**____

6. Which month of the year is correctly abbreviated according to the *AP Stylebook*?
    a. September 12, 2013
    b. Sep. 12, 2013
    c. Sept. 12, 2013
    d. Sept 12, 2013

7. List three key elements of news writing.
    1. __**Impact, Conflict, Novelty**_____
    2. __**Prominence, Proximity, Timeliness**_____
    3. __**Fact-Focused**_____

8. What style are news stories written in?
    a. Block Style
    b. Inverted Pyramid Style
    c. Free Style
    d. None of the Above

9. Where is a boilerplate located?
    a. Before the headline of a news story
    b. After the lead
    c. Under a picture

d. At the end of a press release

10. (True/**False**) Plagiarism is an example of good ethics.

7. What style are news stories written in?
    a. Block Style
    b. Inverted Pyramid Style
    c. Free Style
    d. None of the Above

8. (True/False) No creative style can be exercised in feature writing.

9. List two forms of writing OTHER than journalistic writing.
    1. _____
    2. _____

4. What are the five W's and an H?
    W_____
    W_____
    W_____
    W_____
    W_____
    H_____

5. What is the purpose of a lead?

_____

_____

_____

6. Which month of the year is correctly abbreviated according to the *AP Stylebook*?
    a. September 12, 2013
    b. Sep. 12, 2013
    c. Sept. 12, 2013
    d. Sept 12, 2013

7. List three key elements of news writing.
    1. _____
    2. _____
    3. _____

8. What style are news stories written in?
    a. Block Style
    b. Inverted Pyramid Style
    c. Free Style
    d. None of the Above

9. Where is a boilerplate located?
    a. Before the headline of a news story
    b. After the lead

c. Under a picture
d. At the end of a press release

10. (True/False) Plagiarism is an example of good ethics

10. What style are news stories written in?
    a. Block Style
    b. Inverted Pyramid Style
    c. Free Style
    d. None of the Above

11. (True/**False)** No creative style can be exercised in feature writing.

12. List two forms of writing OTHER than journalistic writing.
    1. __**Scientific and Technical, Social**_____
    2. __**Academic, Creative**_____
4. What are the five W's and an H?
    Who
    What
    When
    Where
    Why
    How
5. What is the purpose of a lead?
    __**To catch the reader's attention.**____
6. Which month of the year is correctly abbreviated according to the *AP Stylebook*?
    a. September 12, 2013
    b. Sep. 12, 2013
    c. Sept. 12, 2013
    d. Sept 12, 2013
7. List three key elements of news writing.
    1. __**Impact, Conflict, Novelty**_____
    2. __**Prominence, Proximity, Timeliness**_____
    3. __**Fact-Focused**_____

8. What style are news stories written in?
    a. Block Style
    b. Inverted Pyramid Style
    c. Free Style
    d. None of the Above
9. Where is a boilerplate located?
    a. Before the headline of a news story
    b. After the lead
    c. Under a picture

d. At the end of a press release

10. (True/**False**) Plagiarism is an example of good ethics.

Design

Design Module Pre-test

13. Which file format is commonly used for everyday photography?
   a. .GIF
   b. .JPG
   c. .TIF
   d. .AI
2. (True/False) opposite color characteristics contrast
3. _____ to _____ point type is common for body text.
4. The space between graphics, margins, gutters, space between columns, space between lines of type or figures, and objects drawn or depicted is known as
   a. Blank Space
   b. Grey Space
   c. Dead Space
   d. White Space
5. _____: a quotation or excerpt from an article that is typically placed in a larger or distinctive typeface on the same page, serving to entice readers into an article to highlight a key topic.
6. What does SLR stand for?

   _____

7. List three basic principles of design.
   1. _____   _____
   2. _____   _____
   3. _____   _____
8. (True/False) Pixels = picture elements

9. List the two types of camera.
   1. _____   _____
   2. _____   _____

10. (True/False) Most digital images are saved as CMYK automatically.

Design Module Pre-test KEY

1. Which file format is commonly used for everyday photography?
   a. .GIF
   b. .JPG
   c. .TIF
   d. .AI
2. (**True**/False**)** opposite color characteristics contrast
3. __**10**__ to __**12**__ point type is common for body text.
4. The space between graphics, margins, gutters, space between columns, space between lines of type or figures, and objects drawn or depicted is known as
   a. Blank Space
   b. Grey Space
   c. Dead Space
   d. White Space
5. **<u>Pull Quote</u>**: a quotation or excerpt from an article that is typically placed in a larger or distinctive typeface on the same page, serving to entice readers into an article to highlight a key topic.
6. What does SLR stand for?
   Single Lens Reflex
7. List three basic principles of design.
   1. **Appropriateness, Balance, Focus, Rhythm**
   2. **Proportion, Dominance, Alignment, Repetition/Consistency**
   3. **Contrast, White Space, Proximity/Unity**
8. (**True**/False) Pixels = picture elements

9. List the two types of camera.
   1. **Film (Analog)**
   2. **Digital**

10. (True/**False**) Most digital images are saved as CMYK automatically.

Multimedia

Multimedia Module Pre-test

1. How long is a work under copyright?
   a. 50 years after creation
   b. 500 years after creation
   c. 120 years after creation
   d. 150 years after creation
2. (True/False) Never use a tripod while operating a video camera.
3. When designing a website, know your audience and have a clear
   a. goal
   b. vision
   c. mind
   d. none of the above
4. What file format plays using Windows Media Video?
   a. .mov
   b. .tif
   c. .wmv
   d. .wmp
5. Radio has a (small/large) channel capacity.
6. Name one characteristic of a good website?

   _____

7. List the three phases of videography.
   1. _____
   2. _____
   3. _____
8. (True/False) Social media has changed the agricultural communications industry.

9. List 3 examples of social media.
   1. _____
   2. _____
   3. _____
- 10. (True/False) Choose complex colors that complement each other and work on most

  web browsers.

Multimedia Module Pre-test KEY

1. How long is a work under copyright?
    a. 50 years after creation
    b. 500 years after creation
    c. 120 years after creation
    d. 150 years after creation
2. (True/**False)** Never use a tripod while operating a video camera.
3. When designing a website, know your audience and have a clear
    a. goal
    b. vision
    c. mind
    d. none of the above
4. What file format plays using Windows Media Video?
    a. .mov
    b. .tif
    c. .wmv
    d. .wmp
5. Radio has a (**small**/large) channel capacity.
6. Name one characteristic of a good website?
    __**Well-organized, easy to navigate, attractive, useful, up-to-date**_____
7. List the three phases of videography.
    1. __**Pre-production**_____
    2. __**Production**_____
    3. __**Post-production**_____
8. (**True**/False) Social media has changed the agricultural communications industry.

9. List 3 examples of social media.
    1. __**Blogs, Flickr, YouTube**_____
    2. __**LinkedIn, Facebook, Twitter**_____
    3. __**Pinterest, Keep and Share**_____
- 10. (True/**False**) Choose complex colors that complement each other and work on most

    web browsers.

Careers

Careers Module Pre-test

1. Agriculture was the sustenance keeping the country alive before the
    a. Great Depression
    b. Civil War
    c. Industrial Revolution
    d. Turn of the century
2. (True/False**)** Newspapers and Farmer's Almanac provided encouraging articles and
   information to help farmers.
3. The average starting salary for an agricultural communicator is _____-
   _____
4. Rules and standards that guide journalists in making ethical decisions
    a. Code of Ethics
    b. Student Handbook
    c. AP Stylebook
    d. None of the above
5. Can you name a university that offers an Agricultural Communications Degree?
   _____

6. What does FAFSA stand for?
   _____

7. List three key elements of news writing.
    1. _____
    2. _____
    3. _____
8. (True/False) A resume is a one- or two-page representation of you and used as a tool to get
   a specific job, scholarship, or internship.

9. List 3 examples of non-verbal communications.
    1. _____
    2. _____
    3. _____

10. (True/False) Visual aids make the data hard to understand and support the spoken
    message.

Careers Module Pre-test KEY

1. Agriculture was the sustenance keeping the country alive before the
    a. Great Depression
    b. Civil War
    c. Industrial Revolution
    d. Turn of the century

2. (**True**/False**)** Newspapers and Farmer's Almanac provided encouraging articles and information to help farmers.

3. The average starting salary for an agricultural communicator is **$35,000 - $50,000**

4. Rules and standards that guide journalists in making ethical decisions
    a. Code of Ethics
    b. Student Handbook
    c. AP Stylebook
    d. None of the above

5. Can you name a university that offers an Agricultural Communications Degree?
    University of Arkansas, Texas A&M, Oklahoma State, Kansas State, Texas Tech, or Ohio State University

6. What does FAFSA stand for?
    Free Application for Federal Student Aid

7. List three key elements of news writing.
    1. **Impact, Conflict, Novelty**
    2. **Prominence, Proximity, Timeliness**
    3. **Fact-Focused**

8. (**True**/False) A resume is a one- or two-page representation of you and used as a tool to get a specific job, scholarship, or internship.

9. List 3 examples of non-verbal communications.
    1. **Body language**
    2. **Facial expressions**
    3. **Eye contact (or others from the slide)**

10. (True/**False**) Visual aids make the data hard **to understand and support** the spoken message.

Careers Module Post-test

1. Agriculture was the sustenance keeping the country alive before the
    a. Great Depression
    b. Civil War
    c. Industrial Revolution
    d. Turn of the century

2. (True/False) Newspapers and Farmer's Almanac provided encouraging articles and information to help farmers.

3. The average starting salary for an agricultural communicator is _____-_____

4. Rules and standards that guide journalists in making ethical decisions
    e. Code of Ethics
    f. Student Handbook
    g. AP Stylebook
    h. None of the above

5. Can you name a university that offers an Agricultural Communications Degree?
    _____

6. What does FAFSA stand for?
    _____

7. List three key elements of news writing.
    1. _____
    2. _____
    3. _____

8. (True/False) A resume is a one- or two-page representation of you and used as a tool to get a specific job, scholarship, or internship.

9. List 3 examples of non-verbal communications.
    1. _____
    2. _____
    3. _____

10. (True/False) Visual aids make the data hard to understand and support the spoken message.

Careers Module Post-test

1. Agriculture was the sustenance keeping the country alive before the
    e. Great Depression
    f. Civil War
    g. Industrial Revolution
    h. Turn of the century

2. (**True**/False**)** Newspapers and Farmer's Almanac provided encouraging articles and information to help farmers.

3. The average starting salary for an agricultural communicator is **$35,000 - $50,000**

4. Rules and standards that guide journalists in making ethical decisions
    i. Code of Ethics
    j. Student Handbook
    k. AP Stylebook
    l. None of the above

5. Can you name a university that offers an Agricultural Communications Degree?
    University of Arkansas, Texas A&M, Oklahoma State, Kansas State, Texas Tech, or Ohio State University

6. What does FAFSA stand for?
    Free Application for Federal Student Aid

7. List three key elements of news writing.
    1. __**Impact, Conflict, Novelty**_____
    2. __**Prominence, Proximity, Timeliness**_____
    3. ___**Fact-Focused**_____

8. (**True**/False) A resume is a one- or two-page representation of you and used as a tool to get a specific job, scholarship, or internship.

9. List 3 examples of non-verbal communications.
    1. **Body language**
    2. **Facial expressions**
    3. **Eye contact (or others from the slide)**

10. (True/**False**) Visual aids make the data hard **to understand and support** the spoken message.

Appendix D

Teacher Inservice Schedule

Overview of Agricultural Communications Curriculum

Area Agricultural Career and Technical Education Teachers

9:00 a.m. to 2:00 p.m.

9:00 a.m.	Overview of curriculum
	Mobile Classroom Project overview
	How to use the curriculum
9:45 a.m.	College Preparation Unit
	Lesson Plan
	PowerPoint
	Activities
10:15 a.m.	Photography Unit
	PowerPoint
	Taking photos (How to use your camera)
11:00 a.m.	Lunch
11:45 p.m.	Taking photos (How to use your camera) cont.
	How to use Photoshop
	How to make a calendar using your photos
1:45 p.m.	Questions
2:00 p.m.	Dismiss

Carley Calico, Graduate Assistant

Agricultural Education, Communication, and Technology

University of Arkansas

Appendix E

Teacher Inservice Perceptions Survey

Agricultural Communication Curriculum Interest and Training Assessment
Post-Inservice Survey

I.   Interest in Agricultural Communications Curriculum

Use only one response for each item, and note **YOUR INTEREST** in each of the specific agricultural communications competencies listed. (Put an X in the box that most accurately describes your interest to use each of the technologies.)

Item	Not at all Interested 1	2	Neutral 3	4	Highly Interested 5
Writing					
Communicating to the Public					
Journalistic Writing					
News Writing					
Feature Writing					
Associated Press Style					
Writing for Public Relations					
Writing for Marketing					
Blogging					
Photography					
Photo Editing / Manipulation					
Videography (digital video camcorders)					
Video Editing / Manipulation					
Audio Recordings					
Audio Editing / Manipulation					
Creating Promotional Videos					
Electronic Print Design					
Electronic Layout (newsletters, brochures, etc.)					
Typography					
Graphic Design					
Web design					
Electronic Curriculum Development					
Radio Broadcast					
Television Broadcast					
Using Social Media for Program Promotion					
Careers in Agricultural Communications					
History of Agricultural Communications					
Degree Preparation in Agricultural Communications					

II. Interest in Agricultural Communications Curriculum

Use only one response for each item, and rate **YOUR SATISFACTION** in each area of todays inservice. (Put an X in the box that is most accurate for your satisfaction with each content area and activity covered in the training and note your overall satisfaction with the instructor.)

	Unsatisfactory		Neutral		Satisfactory
Content:	1	2	3	4	5
General information					
Goals and objectives were clearly stated					
Format was professional in appearance					
Clarity of instructions/questions					
Training met my expectations					
Willingness to recommend this training to other teachers					
Overview of Curriculum:					
Clear instruction provided					
Helped develop understanding of new concepts					
Helped develop new skills					
Appropriate level of challenge					
The curriculum met my expectations					
College Preparation Unit:					
Clear instruction provided					
Helped develop understanding of new concepts					
Helped develop new skills					
Appropriate level of challenge					
The college preparation information met my expectations					
Photography Unit:					
Clear instruction provided					
Helped develop understanding of new concepts					
Helped develop new skills					
Appropriate level of challenge					
The photography unit met my expectations					
Activities: Taking photos and Making an Electronic Calendar:					
Clear instruction provided					
Helped develop understanding of new concepts					
Helped develop new skills					
Appropriate level of challenge					
The activity met my expectations					
Instructor:					
Knowledgeable about subject					

Provided sufficient content detail					
Responded to questions effectively					

III. Background and Demographic Information
Instructions: Please answer the following questions as completely and accurately as possible.

1. What is your age today?   _____ Years

2. What is your gender? (Check One)
- ☐   Male
- ☐   Female

3. What is your ethnicity? (Check One)
- ☐   Caucasian
- ☐   African American
- ☐   Hispanic
- ☐   Asian
- ☐   Native American
- ☐   Pacific Islander
- ☐   Other

4. Do you offer the Agricultural Leadership and Communications course at your school? (Check One)
- ☐   Yes
- ☐   No

5. If not, are you interested in teaching the Agricultural Leadership and Communications course? (Check One)
- ☐   Yes
- ☐   No

6. If you are currently teaching the course, would this curriculum assist you in teaching the Agricultural Leadership and Communications course? (Check One)
- ☐   Yes
- ☐   No

7. What additional support, content, resources, etc. would you need to be successful teaching the Agricultural Leadership and Communications course? (Write your Comments)

_____
_____
_____

8. Please provide us with comments and feedback about how we can improve this training to better meet your and other teacher's needs. (Write your Comments)

_____
_____
_____

Thank you!

Appendix F

Descriptive Field Test Participation Consent Form

U⁄A
UNIVERSITY OF ARKANSAS
DIVISION OF AGRICULTURE

Department of
Agricultural and Extension Education

UNIVERSITY OF ARKANSAS
Dale
BUMPERS COLLEGE
OF AGRICULTURAL, FOOD AND LIFE SCIENCES

205 Agriculture Building, University of Arkansas, Fayetteville, AR 72701-1201
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March 24, 2014

Dear Parent(s)/Guardian(s) and Student:

I am a faculty member at the University of Arkansas working on a USDA funded project. I am conducting research on integrating agricultural communications curriculum into Arkansas high schools. The goal of the research is to develop secondary school curriculum, which would improve student knowledge and skills in written and oral communications, electronic communication technologies, math, science, and literacy and increase understanding of agricultural communication careers.

Your student was chosen for this study because he/she is enrolled in an agricultural science course instructed by a teacher on the advisory council for this granted project. A total of approximately 500 students from Arkansas public schools have been asked to participate in this study. Students will be taught curriculum in agricultural communications aligned with present coursework required by the state of Arkansas agricultural frameworks. He/she will be given tests to determine prior knowledge, knowledge gained, and knowledge retained from the lessons in this new curriculum. This information will help us improve the curriculum.

There are no risks connected to this project. The benefit of participation in this study is the opportunity of learning information about agricultural communications and professional opportunities. Your student will participate in all classroom activities during this research project. However, the decision to allow your child's scores and responses to be used in recording and analyzing data for this project is completely voluntary.

All information collected will be kept confidential to the extent allowed by law and University policy. All information will be coded by the researchers and identifying information will be removed from the forms. No identifiers linking you or your student to the study will be included in any report or publication.

By signing below you authorize your child to participate in the research project and have data collected. If you have any questions, you can contact me using the information listed below. Thank you for your support and participation.

Sincerely,

Leslie D. Edgar, Associate Professor of Agricultural Communications
Department of Agricultural and Extension Education / University of Arkansas

Participant (Student): _____ _____ _____
                          Print Name   Signature   Date

Parent / Guardian: _____ _____ _____
                          Print Name   Signature   Date

This research study has been reviewed by the Institutional Review Board at the University of Arkansas. For research-related problems or questions regarding students' rights, you can contact Ro Windwalker, the University's Compliance Coordinator, at (479) 575-2208 or e-mail irb@uark.edu.

The University of Arkansas is an equal opportunity/affirmative action institution

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Appendix G

Descriptive Field Test Lesson Plans

Journalistic Writing

Classroom Instruction Plan	
Agricultural Communications	**Unit: Journalistic Writing**

I.   Interest Approach:
How are you going to gain the attention of the students?

Have the students look at the newspaper examples. Have them search for agricultural related topics. Let the students discuss why agriculture is not well represented in mass press. Ask the students if they think it is important for agricultural related topics to be in mass press and why?

II.   Objectives to be Achieved:
What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for **background knowledge***? Where will you clearly state your* **objective** *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

Objectives-
The students will be able to define journalistic writing with 80% accuracy.
The students will be able to compare and contrast news and feature styles of writing with 80% accuracy.
The students will be able to use correct AP Style when writing and editing an article with 80% accuracy.

The instructor will check for background knowledge by asking the students, what is journalistic writing in agriculture?
     Journalistic writing covers agricultural news for print, broadcast, and online media.

In the next unit, students will learn about public relations.

III.   Questions to be Answered
What questions will the students answer so they can achieve the objectives that have been established?

1. **What is journalistic writing?**
2. **What are some differences between news and feature writing?**
3. **What facts should be included in a news story?**
4. **What is the inverted pyramid style?**
5. **What is block style?**
6. **What is AP Style?**
7. **Why do journalists use AP Style?**

IV. **Problem Solution**

    a. Student Grouping:
How will you group students for instruction?

The students will be grouped as a whole for the lecture portion of instruction. The students will work individually to complete activities one and two.

    b. Materials:
What instructional materials will you use, if any? Why have you chosen these materials?

Lecture – journalistic writing pre-test, white board, dry erase marker, projector, computer, newspapers, magazines, journalistic writing PowerPoint, journalistic writing student note packet

Activity One - class set of *AP Stylebooks* (optional, if you do not have the class set of *AP Stylebooks* printout the AP editing marks handout, AP Style Sheet Handouts A & B, and allow the students to use a dictionary), AP Style worksheet, AP Style grading key

Activity Two – Class set of *AP Stylebooks* (optional, if you do not have the class set of *AP Stylebooks* printout the AP editing marks handout, AP Style Sheet Handouts A & B, and allow the students to use a dictionary), journalistic writing student note packet, article prompts, article topic's cut into strips for the students to draw at random, popsicle sticks (optional), journalistic writing post-test, news article grading rubric, feature article grading rubric. You may also choose to access additional AP style information at http://owl.english.purdue.edu/owl/resource/735/02//.

These materials reinforce the objectives intended to be covered in this lesson.

    c. Teaching Methods:
What methods have you planned? Essentially, what are the students learning and how will they learn it?

Lesson Preparation – (Click on each link to open the actual file.)
- ☐ Complete and submit Perkins Activity #1 to your district coordinator for a class set of *AP Stylebooks* before the state deadline (if you do not have the class set of *AP Stylebooks* make copies of the AP editing marks handout, AP Style Sheet Handout A & AP Style Sheet Handout B, and allow the students to use a dictionary).
- ☐ Print out the AP style worksheet key and the journalistic writing note packet key.
- ☐ Make copies of:

- ☐ **journalistic writing pre-test**
- ☐ **journalistic writing student note packet**
- ☐ **AP Style worksheet**
- ☐ **journalistic article prompts**
- ☐ **news article grading rubric** (half of your students will be writing news stories and half of your students will be writing feature stories so make these copies accordingly)
- ☐ **feature article grading rubric** (half of your students will be writing news stories and half of your students will be writing feature stories so make these copies accordingly)
- ☐ **journalistic writing post-test**
- ☐ **Print out the article topic slips and cut into strips or tape to Popsicle sticks for activity two.**
- ☐ **Review the journalistic writing PowerPoint and teacher notes included in the PowerPoint.**
- ☐ **Write the journalistic writing unit objectives on the white board.**
- ☐ **When opening the PowerPoint, make sure the macros are enabled. The PowerPoint has numerous layers and animations, editing may cause those animations to stop working.**

Lecture – Begin the lecture with the journalistic writing pre-test. Once the students have completed the pre-test, hand out the newspapers and magazines. Ask the students to pick out articles that highlight agriculture. Let the students discuss why there is not very much related to agriculture in mass popular press. Ask the students if they think it is important for agricultural related topics to be in mass press and why. Hand out a journalistic writing note packet to each student. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity One – Review with the students on what AP Style is and why it is important. The students can use their journalistic writing note packet to answer the questions. Allow students to use an *AP Stylebook* and for this activity (If you do not have the class set of *AP Stylebooks,* pass out the AP editing marks handout, AP Style Sheet Handouts A & B, and allow the students to use a dictionary). Look through the AP Stylebook or handouts and explain some of the common missed made when writing. Also, explain the different editing marks and what they are used for. Pass out the AP Style worksheet and have the students correct the sentences according to the *AP Stylebook.* Use the AP Style grading key to grade the worksheets when the students have completed them.

Activity Two – Review with the students the differences between news and feature articles. Discuss what must be included in news articles and the formula for writing a news article. Also, discuss what must be included in feature articles

and the formula for writing a feature article. Have each student draw a topic slip that corresponds to the topics listed on the article prompts*. Depending on the number of student in your class, half of the students should have drawn news prompts and half of the students should have drawn feature prompts. Pass out the corresponding grading rubric to the students and remind them they will be graded according to the rubric. Have the students use their journalistic writing note packets and *AP Stylebooks* (OR AP editing marks handout, AP Style Sheet Handouts A & B, and dictionary) to plan and write their respective article based off of their prompt. When the students have completed writing their articles have them attach their rubric to the front. Ask the students that wrote news articles trade articles with the students who wrote feature articles for editing. Have each student write name in the section of the rubric labeled "edited by:" and instruct them to edit the article referencing the *AP Stylebook* (OR AP editing marks handout, AP Style Sheet Handouts A & B, and dictionary) for correct AP style, using editing marks, and make sure all aspects of the rubric are addressed. Once all of the articles have been edited have the students return the articles to their author for final revisions before submitting them for a grade. Use the attached rubric to grade the students' final articles.

*You are not required to use the topics provided. You can provide specific topics or issues related to your agricultural department, FFA chapter, or community (this is a great idea if your chapter has a newsletter). Some examples of this option include: interviewing local community members involved in agriculture or your chapter officers for feature stories, or a newsworthy event happening within your chapter or community. If you choose to use local topics have the students draw for their prompt just as you would with the provided topics. If the students have the opportunity to interview community members encourage them to include direct quotes in their news or feature article. Stress the importance of quoting exactly what the individual said. Have the students consult their AP Stylebooks or the internet (http://owl.english.purdue.edu/owl/) to insure they are attributing the quotations to the individual correctly.

Optional: Have students turn in their journalistic writing note packets. Use the journalistic writing note packet key to assign grades.

Optional: If you choose to use topics specific to your program, FFA chapter, or community have the students vote on the best news and feature article. Submit the winning articles to your local newspaper and see if they are published.

Additional activity – Have the students work in pairs and interview their partners about their beliefs on the most important aspect of agriculture. Allow 5 minutes for the interview and remind the students write detailed notes. Have the students write a one page feature story using correct block style, grammar, and

punctuation highlighting the findings from their interview. Encourage them to include direct quotes in their feature article. Stress the importance of quoting exactly what their partner said. Have the students consult their AP Stylebooks or the internet (http://owl.english.purdue.edu/owl/) to insure they are attributing the quotations to the individual correctly.

Have the students present their feature story to the class.

Teaching Method	Time Allotted
Day one:	**45 minutes total**
Pre-test	**5 minutes**
Lecture	**40 minutes**
Day two:	**45 minutes total**
Lecture	
Day three:	**45 minutes total**
Activity one	
Day four:	**45 minutes total**
Activity two	
Day five:	**45 minutes total**
Activity two	
Day six:	**45 minutes total**
Activity two	
Day seven:	**45 minutes total**
Activity two	
Day eight:	**45 minutes total**
Activity three	
Day nine:	**45 minutes total**
Activity three	
Day ten:	**45 minutes total**
Activity three	**40 minutes**
Post-test	**5 minutes**

Note: The time table is an estimate. The actual time to complete the unit may vary.

V.   Testing Solutions through Application
How will the students apply what they have learned in the classroom?

The students will apply what they learned by completing an AP style worksheet.
The students will apply what they learned by writing a news or feature article using the correct formula.
The students will apply what they learned by editing their peers articles.

VI. **Closure**
Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

After the lecture portion of the lesson the key points will be reviewed. Also, before each activity the concepts related to activity will be reviewed. All concepts will be reviewed once more before the journalistic writing post-test.
All aspects of agricultural communication work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of journalistic writing and AP style.

VII. **Evaluation of Solutions**
How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their journalistic writing pre- and post-test scores. Furthermore, the students will be evaluated on their writing and editing skills by assessing their written articles according to a rubric.

Public Relations

VIII.   Interest Approach:
How are you going to gain the attention of the students?

Search for ways National FFA have promoted their organization. Discuss the types of promotion they are currently using (Horizons magazine, newsletter, press releases, radio spots, RFD TV, Social Media, special events).

IX.   Objectives to be Achieved:
What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for background knowledge*? Where will you clearly state your* objective *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

Objectives-
The students will be able to identify elements of press release format with 80% accuracy.
The students will be able to incorporate the use of quotations in press releases with 80% accuracy.
The students will understand the importance of ethics in public relations with 80% accuracy.

The instructor will check for background knowledge by asking the students if they can think of any public relations strategies by other companies or organizations.

In the next unit, students will learn about agricultural photography.

X.   Questions to be Answered
What questions will the students answer so they can achieve the objectives that have been established?

   1. **What is public relations?**
   2. **What do you write a news release for?**
   3. **What are some unique elements of press release format?**
   4. **What does it mean to be ethical in public relations?**

XI.   Problem Solution
   a. Student Grouping:
How will you group students for instruction?

The students will be grouped as a whole for the lecture portion of instruction. The students will then work individually to complete activity one.

b. Materials:
What instructional materials will you use, if any? Why have you chosen these materials?

Lecture – public relations pre-test, white board, dry erase marker, projector, computer, newspapers, magazines, public relations PowerPoint, public relations student note packet

Activity One - class set of *AP Stylebooks* (optional, if you do not have the class set of *AP Stylebooks* printout the AP editing marks handout, AP style sheet handouts A & B, and allow the students to use a dictionary), writing a press release worksheet, press release grading rubric, public relations post-test

These materials reinforce the objectives intended to be covered in this lesson.

c. Teaching Methods:
What methods have you planned? Essentially, what are the students learning and how will they learn it?

Lesson Preparation – (Click on each document to open the actual file.)
- ☐ **If you do not have the class set of *AP Stylebooks* make copies of the <u>AP editing marks handout</u>, <u>AP style sheet handout A</u> & <u>AP style sheet handout B</u>, and allow the students to use a dictionary).**
- ☐ **Print out the <u>public relations note packet key</u>.**
- ☐ **Make copies of:**
    - ☐ **<u>public relations pre-test</u>**
    - ☐ **<u>public relations student note packet</u>**
    - ☐ **<u>writing a press release worksheet</u>**
    - ☐ **<u>press release rubric</u>**
    - ☐ **<u>public relations post-test</u>**
- ☐ **Review the <u>public relations PowerPoint</u> and teacher notes included in the PowerPoint.**
- ☐ **Write the <u>public relations unit objectives</u> on the white board.**

Lecture - Begin the lecture with the public relations pre-test. Once the students have completed the pre-test, Search for ways National FFA has promoted their organization. Discuss the types of promotion they are currently using (Horizons magazine, newsletter, press releases, radio spots, RFD TV, Social Media, special events). Hand out a public relations note packet to each student. As you present the PowerPoint allow the students to actively participate in the discussion and

fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity One – Review with the students what makes press releases unique and the reasons you would write a press release. Also review press release format, AP style and the importance of being ethical. The students can use their public relations note packet to answer the questions. Allow students to use an *AP Stylebook* and for this activity (If you do not have the class set of *AP Stylebooks,* pass out the AP editing marks handout, AP style sheet handouts A & B, and allow the students to use a dictionary). Pass out the writing a press release worksheet. Instruct the students to write a press release on an upcoming FFA chapter event or agricultural activity. Remind the students to write toward their target audience and to include a quote. Once the students have written their press releases have them switch papers and peer edit the press releases for correct press release format using AP editing marks. Return the edited papers to the owner to write a final draft before stapling it to the rubric and submitting it for a grade. Provide the students with the grading rubric prior to the beginning of the activity. The student's grades on this activity should reflect the rubric. Conclude the public relations unit with a short review and the public relations post-test.

Optional: Have students turn in their public relations note packets. Use the public relations note packet key to assign grades.

Optional: Submit some of the press releases to the school newspaper or community newspaper/website for publication.

Additional activity - Have the students use the skills they learned during this unit to write press releases for FFA and agricultural events in the future.

Teaching Method	Time Allotted
Day one: **Pre-test** **Lecture**	**45 minutes total** **5 minutes** **40 minutes**
Day two: **Lecture**	**45 minutes total**
Day three: **Lecture**	**45 minutes total**
Day four: **Lecture**	**45 minutes total**

Day five: Activity one	45 minutes total
Day six: Activity one	45 minutes total
Day six: Activity one	45 minutes total
Day seven: Activity one Post-test	45 minutes total 40 minutes 5 minutes

Note: The time table is an estimate. The actual time to complete the unit may vary.

XII.   Testing Solutions through Application
How will the students apply what they have learned in the classroom?

The students will apply what they learned by writing a press release featuring a FFA or agricultural event.
The students will apply what they learned by peer editing a press release for correct AP style and press release format.

XIII.

Closure
Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

After the lecture portion of the lesson the key points will be reviewed. Also, before the activity the concepts related to that activity will be reviewed. All concepts will be reviewed once more before the public relations post-test.
All aspects of agricultural communication work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of public relations.

XIV.   Evaluation of Solutions
How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their public relations pre- and post-test scores. Furthermore, the students will be evaluated on their writing and press release format skills by assessing their written press releases according to a rubric.

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Photography

Classroom Instruction Plan	
Agricultural Communications	**Unit: <u>Photography</u>**

I. Interest Approach:
How are you going to gain the attention of the students?

Show student three pictures at the beginning of the PowerPoint and ask them to choose which photos they like better. Talk about why they like one set of pictures better than the other. Students at this time may start talking about things like detail, closeness, and intrigue. Steer them away from talking about a photo's content and toward talking about qualities of the photo itself.

II. Objectives to be Achieved:
What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for background knowledge*? Where will you clearly state your* objective *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

Objectives-
The students will select and describe the features of a camera with 100% participation.
The students will understand photo composition essentials with 80% accuracy.
The students will understand elements of photo manipulation with 80% accuracy.

The instructor will check for background knowledge by asking the students, why photography is important to communication?
For communicators, photography is a unique way of visually communicating with an audience in a way that evokes emotions and feelings in a way that the written word often cannot.

In the next unit, students will learn about agricultural graphic design.

III. Questions to be Answered
What questions will the students answer so they can achieve the objectives that have been established?

1. **What is photography?**
2. **What is the difference between film cameras and digital cameras?**
3. **What is photo composition?**
4. **What are the six rules of photo composition?**
5. **What is photo manipulation?**

6. **What are the five elements of photo manipulation?**

IV. **Problem Solution**
  a. **Student Grouping:**
  How will you group students for instruction?

  The students will be grouped as a whole for the lecture portion of instruction. The students will then work in small groups to complete the activities.

  b. **Materials:**
  What instructional materials will you use, if any? Why have you chosen these materials?

  Lecture – photography pre-test, white board, dry erase marker, projector, computer, photography PowerPoint, photography student note packet

  Activity One – parts of a camera diagram, parts of a camera labels

  Activity Two – camera checklist handout, camera budget rubric, computers (iPads), poster board, markers, glue, scissors, etc.

  Activity Three – camera (iPad, iPhone), alphabet photo rubric

  Activity Four – alphabet photos from activity three, Adobe Creative Cloud, computer, Adobe Photoshop PowerPoint, Photoshop rubric

  Note: **Once you have chosen the final activity for this unit please follow with the photography post-test.**

  These materials reinforce the objectives intended to be covered in this lesson.

  c. **Teaching Methods:**
  What methods have you planned? Essentially, what are the students learning and how will they learn it?

  Lesson Preparation – (Click on each document to open the actual file.)
  ☐ **Complete and submit** <u>Perkins Activity #2</u> **to your district coordinator for a digital camera, tripod, and one month subscription to the Adobe Creative Cloud before the state deadline.**
  ☐ **Purchase sticky tack, poster board, markers, glue etc.**
  ☐ **Print out the photography note packet key and** <u>parts of a camera diagram key</u>**.**
  ☐ **Make copies of:**
      ☐ <u>**Photography pre-test**</u>

- ☐ **Photography post-test**
- ☐ **Photography student note packet**
- ☐ **Camera checklist handout**
- ☐ **Camera budget rubric**
- ☐ **Alphabet photo rubric**
- ☐ **Photoshop rubric (If reserving the computer lab)**
- ☐ **Print out the <u>parts of a camera labels</u> and cut into strips and laminate. Once laminated place sticky tack on the back of the labels for the parts of a camera game.**
- ☐ **If applicable, become familiar with the digital camera, tripod and Adobe Photoshop program.**
- ☐ **If applicable subscribe to Adobe Creative Cloud on the computer that is set up with the projector in the classroom.**
- ☐ **If applicable review the <u>Adobe Photoshop PowerPoint</u>**
- ☐ **Review the <u>photography PowerPoint</u> and teacher notes included in the PowerPoint.**
- ☐ **Write the <u>photography unit objectives</u> on the white board.**
- ☐ **If you have access to a class set of computers with Adobe Photoshop installed on them, reserve the computer lab for activity four.**

Lecture - Begin the lecture with the photography pre-test. Once the students have completed the pre-test, direct their attention to the PowerPoint presentation. Ask the students which photograph they like the best and why. Hand out a journalistic writing note packet to each student. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity one – Project the parts of a camera diagram onto the whiteboard or wall. Divide the class into two teams. Take turns asking each team a question from the notes discussed during the lecture portion of this unit. If the team gets the answer correct they get a point plus a chance for a bonus point if they can place a label of your choosing on the correct part of the diagram. If the team answers the question incorrectly, the other team gets a chance to steal the point and a chance for the bonus camera label.

Activity two – Review with the students the parts of the camera and the difference between film and digital cameras. Distribute the camera checklist handout to the student in small groups. Instruct students to research different cameras given an $800 budget. Students should make note of the top camera's qualities on their checklist. The students will prepare a presentation using poster board, markers, print-outs, etc. discussing why they chose the camera they did, as well as compare and contrast the camera against its top competitor. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric.

Activity three –
Option one: Review with the students what the six rules of good photo composition and why they are important. Using an iPhone or iPad let the students search around campus, in small groups, and take pictures of objects that resemble the letters that spell their school mascot. Have the students work together to note the elements of photo composition for each letter they capture. Once all of the photos have been captured review them with the class and them pick their favorite letters to spell out their school's mascot. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric.

Option two: Review with the students what the six rules of good photo composition and why they are important. Use the camera purchased with funding from the Perkin's Activity #2. Assign one or two letters from your school's mascot to each group. Have them search around campus for their letters. Once they have found the letters they are responsible for allow them to take turns capturing their letters. Have the students work together to note the elements of photo composition for each letter they capture. Once all of the photos have been captured review them with the class and them pick their favorite letters to spell out their school's mascot. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric.

Activity four –
Option one: Review with the students what the five elements of photo manipulation and why they are important to editing photographs. Present the Adobe Photoshop PowerPoint to the students. Let the students actively participate in the discussion. Open Adobe Photoshop on the computer and open the photos the students selected from the photo scavenger hunt during the previous activity. Have them choose at least two editing techniques for each photo and apply each technique to improve the overall quality of the image. Save each photo as Image1, Image2, etc. Grade this activity as group participation. Conclude the photography unit with a short review and the photography post-test.

Option two: In the computer lab, review with the students what the five elements of photo manipulation and why they are important to editing photographs. Present the Adobe Photoshop PowerPoint to the students. Let the students actively participate in the discussion. Have the students open Adobe Photoshop on their individual computers and open the photos the students selected from the photo scavenger hunt during the previous activity. Have them choose at least two editing techniques for each photo and apply each technique to improve the overall quality of the image. Have the students save each photo as Image1,

Image2, etc. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric. Have them save and print their photos and attach them to the rubric before submitting them for a grade. Conclude the photography unit with a short review and the photography post-test.

Optional: Have students turn in their photography note packets. Use the photography note packet key to assign grades.

Additional activity / fundraising opportunity – Have the students use the skills they learned during this unit to take pictures of agriculture for a FFA chapter calendar. Have the students plan, capture, and edit the photographs that will be featured in the calendar. Sell the calendar to the community as a chapter fundraiser.

Teaching Method	Time Allotted
Day one: **Pre-test** **Lecture**	**45 minutes total** **5 minutes** **40 minutes**
Day two: **Activity one**	**45 minutes total**
Day three: **Activity two**	**45 minutes total**
Day four: **Activity two**	**45 minutes total**
Day five: **Activity three**	**45 minutes total**
Day six: **Activity three**	**45 minutes total**
Day seven: **Activity three**	**45 minutes total**
Day eight: **Activity four**	**45 minutes total**
Day nine: **Activity four**	**45 minutes total**

Day ten:	45 minutes total
Activity four	40 minutes
Post-test	5 minutes

Note: The time table is an estimate. The actual time to complete the unit may vary.

V. **Testing Solutions through Application**
   How will the students apply what they have learned in the classroom?

   The students will apply what they learned by playing the parts of a camera game.
   The students will apply what they learned by researching and creating a presentation on which camera they would prefer to buy.
   The students will apply what they learned by capturing photographs that depict element of good composition.
   The students will apply what they learned by manipulating the photos they captured in Adobe Photoshop.

VI. **Closure**
   Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

   After the lecture portion of the lesson the key points will be reviewed by playing the parts of a camera game. Also, before each activity the concepts related to activity will be reviewed. All concepts will be reviewed once more before the photography post-test.
   All aspects of agricultural communications work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of photography.

VII. **Evaluation of Solutions**
   How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

   The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their photography pre- and post-test scores. Furthermore, the students will be evaluated on their photo composition and manipulation skills by assessing their photographs according to a rubric.

Graphic Design

VIII. Interest Approach:
How are you going to gain the attention of the students?

Show the students the examples of well-known logos and slogans on the first slide of the PowerPoint. Have students discuss why the logos are easily recognizable. After showing all the logos and taking responses, tell the students that today they will be learning about the principles of graphic design. These are the same principles used to create effective logo designs.

IX. Objectives to be Achieved:
What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for background knowledge*? Where will you clearly state your* objective *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

Objectives-
The students will understand the principles of graphic design with 80% accuracy.
The students will be able to differentiate between serif, san serif, and decorative typefaces with 80% accuracy.
The students will find and describe examples of good design principles with 80% accuracy.

The instructor will check for background knowledge by asking the students to describe the logos of some of their favorite brands.

In the next unit, students will learn about agricultural print layout design.

X. Questions to be Answered
What questions will the students answer so they can achieve the objectives that have been established?

1. What is graphic design?
2. What are the six principles to improve graphic design?
3. Why are visuals important to logo design?
4. What are the differences between serif, sans serif, and decorative typefaces?

XI. Problem Solution

a. **Student Grouping:**
How will you group students for instruction?

The students will be grouped as a whole for the lecture portion of instruction. The students will then work in small groups to complete the activities.

b. **Materials:**
What instructional materials will you use, if any? Why have you chosen these materials?

Lecture – Graphic design pre-test, white board, dry erase marker, projector, computer, graphic design PowerPoint, graphic design student note packet

Activity One – Magazines, newspapers, poster board, markers, glue, scissors, etc., logo hunt rubric, graphic design student note packet

Activity Two – paper, markers, glue, scissors, etc., logo development rubric, graphic design student note packet

Activity Three – Adobe Creative Cloud, computer, Adobe Illustrator PowerPoint, Illustrator rubric, graphic design student note packet

Note: **Once you have chosen the final activity for this unit please follow with the graphic design post-test.**

These materials reinforce the objectives intended to be covered in this lesson.

c. **Teaching Methods:**
What methods have you planned? Essentially, what are the students learning and how will they learn it?

Lesson Preparation – (Click on each document to open the actual file.)
- ☐ **Complete and submit <u>Perkins Activity #3</u> to your district coordinator for a one month subscription to the Adobe Creative Cloud before the state deadline.**
- ☐ **Purchase poster board, paper, markers, glue, scissors etc.**
- ☐ **Gather magazines and newspapers**
- ☐ **Print out the <u>graphic design note packet key</u>.**
- ☐ **Make copies of:**
    - ☐ <u>**Graphic design pre-test**</u>
    - ☐ <u>**Graphic design post-test**</u>
    - ☐ <u>**Graphic design student note packet**</u>
    - ☐ <u>**Logo hunt rubric**</u>
    - ☐ <u>**Logo development rubric**</u>

❑ <u>Illustrator rubric</u> **(If reserving the computer lab)**
❑ **If applicable, become familiar with the Adobe Illustrator program.**
❑ **If applicable subscribe to Adobe Creative Cloud on the computer that is set up with the projector in the classroom.**
❑ **If applicable review the <u>Adobe Illustrator PowerPoint</u>**
❑ **Review the <u>graphic design PowerPoint</u> and teacher notes included in the PowerPoint.**
❑ **Write the <u>graphic design unit objectives</u> on the white board.**
❑ **If you have access to a class set of computers with Adobe Illustrator installed on them, reserve the computer lab for activity three.**

Lecture – Begin the lecture with the graphic design pre-test. Once the students have completed the pre-test, direct their attention to the PowerPoint presentation. Show the students the examples of well-known logos and slogans on the first slide of the PowerPoint. Have students discuss why the logos are easily recognizable. After showing all the logos and taking responses, tell the students that today they will be learning about the principles of graphic design. These are the same principles used to create effective logo designs. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity one – Review the six principles of graphic design covered in the lecture portion of this unit. Have students work in small groups to search in magazines and newspapers for prominent companies and their logos. They must be appropriate. If the students are in doubt, have them be approved by the teacher. Have them find logos that represent each of the six basic principles of design discussed at the beginning of the lesson. Students should cut out an example of each logo they find, glue it to the poster board, and label the design principles used. They may find logos that represent more than one design element, but they should have at least five different logos. Bonus points may be awarded for more than five logos (up to 10 logos possible). Have the groups stand up and present their projects to the class. Provide the students with the grading rubric prior to the beginning of the activity. The student's grade on this activity should reflect the rubric.

Activity two – Review the six principles of graphic design and the differences in typefaces covered in the lecture portion of this unit. Have the students work in small groups to develop a logo representing am agricultural product or service of their choice. Once they have developed an agricultural product or service, have the students create the logo on a piece of paper using markers, glue, scissors, etc. Once all groups have created their logo have them present the product or service, logo design, and the reasoning and principles that led them to create the logo they did. Provide the students with the grading rubric prior to the beginning of the activity. The student's grade on this activity should reflect

the rubric. Have the students vote on their favorite logo to use in option one of activity three.

Activity three –
Option one: Review with the students what the six principles of graphic design are, and why they are important to logo development. Present the Adobe Illustrator PowerPoint to the students. Let the students actively participate in the discussion. Open Adobe Illustrator on the computer, have the students provide input and guide your actions as you create a digital version of the logo selected by the students from activity three. Grade this activity as group participation. Conclude the graphic design unit with a short review and the graphic design post-test.

Option two: In the computer lab, review with the students what the six principles of graphic design are, and why they are important to logo development. Present the Adobe Illustrator PowerPoint to the students. Let the students actively participate in the discussion. Have the students open Adobe Illustrator on their individual computers and create a digital version of the logo they created during the previous activity. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric. Have them save and print their logos and attach them to the rubric before submitting them for a grade. Conclude the graphic design unit with a short review and the graphic design post-test.

Optional: Have students turn in their graphic design note packets. Use the graphic design note packet key to assign grades.

Additional activity – Have the students use the skills they learned during this unit to develop logos for products they create in other classes such as peanut butter in food science or a product in agricultural business.

Teaching Method	Time Allotted
Day one:	45 minutes total
Pre-test	5 minutes
Lecture	40 minutes
Day two:	45 minutes total
Activity one	
Day three:	45 minutes total
Activity one	
Day four:	45 minutes total

Activity two	
Day five: Activity two	**45 minutes total**
Day six: Activity two	**45 minutes total**
Day seven: Activity two	**45 minutes total**
Day eight: Activity three	**45 minutes total**
Day nine: Activity three	**45 minutes total**
Day ten: Activity three Post-test	**45 minutes total** **40 minutes** **5 minutes**

Note: The time table is an estimate. The actual time to complete the unit may vary.

    XII. **Testing Solutions through Application**
How will the students apply what they have learned in the classroom?

        The students will apply what they learned by searching for and labeling logos that display elements of good graphic design.
        The students will apply what they learned by creating a logo for an agricultural product or service of their choice.
        The students will apply what they learned by creating a digital version of their logo in Adobe Illustrator.

    XIII. **Closure**
Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

        After the lecture portion of the lesson the key points will be reviewed before each activity. All concepts will be reviewed once more before the graphic design post-test.
        All aspects of agricultural communications work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of graphic design.

XIV. **Evaluation of Solutions**
How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their graphic design pre- and post-test scores. Furthermore, the students will be evaluated on their graphic design skills by assessing their logos according to a rubric.

Print Design Layout

Classroom Instruction Plan	
Agricultural Communications	Unit: **Print Layout Design**

I.   **Interest Approach:**
How are you going to gain the attention of the students?

Let the students work in small groups. Have these groups look through magazines to find their favorite design and layout. The groups can then share with the class why they chose the layouts they did. Once all groups have given their reasons, inform the students that they will be learning the specifics of design and layout for print media today.

II.   **Objectives to be Achieved:**
What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for background knowledge*? Where will you clearly state your* objective *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

Objectives-
The students will identify principles, elements, formats, and guidelines of effective layout design with 80% accuracy.
The students will become familiar with production processes and terminology in layout design with 100% participation.
The students will gain knowledge of and competency in print layout design software with 100% participation.

The instructor will check for background knowledge by asking the students to describe elements of a magazine layout.

In the next unit, students will learn about agricultural videography.

III.   **Questions to be Answered**
What questions will the students answer so they can achieve the objectives that have been established?

1. What should you consider when working with electronic print design and layout?
2. What elements of electronic print design and layout increase effectiveness?
3. What typeface is appropriate for electronic print design and layout?
4. What is kerning?
5. What graphics should be used to support text?

IV. **Problem Solution**
   a. **Student Grouping:**
   How will you group students for instruction?

   The students will be in small groups for the interest approach and work individually for the lecture portion and activity.

   b. **Materials:**
   What instructional materials will you use, if any? Why have you chosen these materials?

   Lecture – Print layout design pre-test, white board, dry erase marker, projector, computer, print layout design PowerPoint, print layout design student note packet

   Activity One – Magazines, poster board, markers, glue, scissors, etc., magazine layout rubric, print layout design student note packet

   Activity Two – Adobe Creative Cloud, computer, Adobe InDesign PowerPoint, InDesign rubric, print layout design student note packet, writing assignment from the writing units, photographs

   Note: **Once you have chosen the final activity for this unit please follow with the print layout design post-test.**

   These materials reinforce the objectives intended to be covered in this lesson.

   c. **Teaching Methods:**
   What methods have you planned? Essentially, what are the students learning and how will they learn it?

   Lesson Preparation – (Click on each document to open the actual file.)
   ☐ **Complete and submit <u>Perkins Activity #4</u> to your district coordinator for a one month subscription to the Adobe Creative Cloud before the state deadline.**
   ☐ **Purchase poster board, paper, markers, glue, scissors etc.**
   ☐ **Gather magazines**
   ☐ **Print out the <u>print layout design note packet key</u>.**
   ☐ **Make copies of:**
      ☐ **<u>Print layout design pre-test</u>**
      ☐ **<u>Print layout design post-test</u>**
      ☐ **<u>Print layout design student note packet</u>**

□ **Magazine layout rubric**
□ **InDesign rubric (If reserving the computer lab)**
□ **If applicable, become familiar with the Adobe InDesign program.**
□ **If applicable subscribe to Adobe Creative Cloud on the computer that is set up with the projector in the classroom.**
□ **If applicable review the Adobe InDesign PowerPoint**
□ **Review the print design PowerPoint and teacher notes included in the PowerPoint.**
□ **Write the print layout design unit objectives on the white board.**
□ **If you have access to a class set of computers with Adobe InDesign installed on them, reserve the computer lab for activity two.**

Lecture – Begin the lecture with the print design pre-test. Provide the students the examples of magazines and have them find a layout they think looks good. Have students discuss why the layouts caught their eyes. After taking responses from students, explain that today they will be learning about the principles of print layout design. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity one – Review the five things that a designer should consider when designing a layout covered in the lecture portion of this unit. Also review the 12 elements of layout design discussed in the lecture portion of this unit. Have students work in small groups to search in magazines for layouts that possess these elements and considerations. They must be appropriate. If the students are in doubt, have them be approved by the teacher. Students should cut out the magazine cover and the layout they picked, glue them to the poster board, and label the elements included. The students should also explain who the audience is, purpose, overall appearance and, usability of the layout. Have the groups stand up and present their projects to the class. Provide the students with the grading rubric prior to the beginning of the activity. The student's grade on this activity should reflect the rubric.

Activity two –
Option one: Review with the students how to effectively include photographs and captions in a print layout. Present the Adobe InDesign PowerPoint to the students. Let the students actively participate in the discussion. Open Adobe InDesign on the computer, have the students provide input and guide your actions as you create a magazine layout using the article from the writing unit the students voted on and photographs of your choosing. Grade this activity as group participation. Conclude the print layout design unit with a short review and the print layout design post-test.

Option two: In the computer lab, review with the students how to effectively include photographs and captions in a print layout. Present the Adobe InDesign

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PowerPoint to the students. Let the students actively participate in the discussion. Let the students browse magazines for inspiration for their own layout design. Have the students open Adobe InDesign on their individual computers and create a magazine layout using their article from the writing unit and photographs of their choosing. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric. Have them save and print their layouts and attach them and the magazine layout that inspired them to the rubric before submitting them for a grade. Conclude the print layout design unit with a short review and the print layout design post-test.

Optional: Have students turn in their print layout design note packets. Use the print layout design note packet key to assign grades.

Additional activity – If you chose to use topics specific to your program, FFA chapter, or community during the writing unit, create a newsletter featuring the students articles and layouts. Have them work together as a class to design a cover for the newsletter using the skills they learned during this unit.

Teaching Method	Time Allotted
Day one: **Pre-test** **Lecture**	**45 minutes total** **5 minutes** **40 minutes**
Day two: **Activity one**	**45 minutes total**
Day three: **Activity one**	**45 minutes total**
Day four: **Activity two**	**45 minutes total**
Day five: **Activity two**	**45 minutes total**
Day six: **Activity two**	**45 minutes total**
Day seven: **Activity two**	**45 minutes total**
Day eight:	

Activity two Post-test	45 minutes total 40 minutes 5 minutes

Note: The time table is an estimate. The actual time to complete the unit may vary.

V.   Testing Solutions through Application
How will the students apply what they have learned in the classroom?

**The students will apply what they learned by searching for and labeling magazine layouts that display elements of   good print layout design.
The students will apply what they learned by creating a layout design using their writing assignment from the   writing unit and photos of their choosing in Adobe InDesign.**

VI.   Closure
Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

**After the lecture portion of the lesson the key points will be reviewed before each activity. All concepts will be reviewed once more before the print layout design post-test.
All aspects of agricultural communications work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of print layout design.**

VII.   Evaluation of Solutions
How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their print layout design pre- and post-test scores. Furthermore, the students will be evaluated on their print layout design skills by assessing their magazine layouts according to a rubric.

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Videography

Agricultural Communications   **Unit: <u>Videography</u>**

I.   **Interest Approach:**
How are you going to gain the attention of the students?

Show student the video at the beginning of the PowerPoint and ask the students if they are familiar with any videography equipment used for producing videos. After the students have given their responses, tell them that today they will learn about video cameras and other important pieces of equipment for videography.

II.   **Objectives to be Achieved:**
What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for **background knowledge***? Where will you clearly state your* **objective** *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

Objectives-

The students will be able to identify video production equipment with 100% participation.
The students will be able to select and properly use a digital video camera with 80% competency.
The students will gain competency in video camera parts with 80% competency.

The instructor will check for background knowledge by asking the students, why videography is important to communication?

In a technological world, video communications are becoming a common practice. Videography is a unique way to spread agricultural information to the public.

In the next unit, students will learn about agricultural digital audio broadcast.

III.   **Questions to be Answered**
What questions will the students answer so they can achieve the objectives that have been established?

1. **What is videography?**
2. **What are some different types of lighting equipment?**
3. **What are some different types of audio equipment?**
4. **What are the rules of filming?**

5. What is the difference between linear and non-linear editing?
6. What is the difference between copyright and public domain?

IV. **Problem Solution**
   a. **Student Grouping:**
How will you group students for instruction?

The students will be grouped as a whole for the lecture portion of instruction. The students will then work in small groups to complete the activities.

   b. **Materials:**
What instructional materials will you use, if any? Why have you chosen these materials?

Lecture – videography pre-test, white board, dry erase marker, projector, computer, videography PowerPoint, videography student note packet

Activity One – parts of a video camera diagram, parts of a video camera labels

Activity Two – video camera checklist handout, video camera budget rubric, computers (iPads), poster board, markers, glue, scissors, etc.

Activity Three – storyboard worksheet example, storyboard instructions, storyboard worksheet, video topic slips

Activity Four – film crew handout, writing a video script handout, storyboard worksheet from activity three, script writing rubric

Activity five – digital video camera, storyboard worksheet from activity three, video script from activity four, props (optional)

Activity six – Adobe Creative Cloud, computer, digital video camera, storyboard worksheet from activity three, video script from activity four, stock music folder, Premiere Pro rubric, Adobe Premiere Pro PowerPoint

Note: **Once you have chosen the final activity for this unit please follow with the videography post-test.**

These materials reinforce the objectives intended to be covered in this lesson.

   c. **Teaching Methods:**
What methods have you planned? Essentially, what are the students learning and how will they learn it?

Lesson Preparation – (Click on each document to open the actual file.)

- ☐ Complete and submit Perkins Activity #5 to your district coordinator for a digital video camera, tripod, and one month subscription to the Adobe Creative Cloud before the state deadline.
- ☐ Purchase sticky tack, poster board, markers, glue etc.
- ☐ Print out the videography note packet key and parts of a video camera diagram key.
- ☐ Make copies of:
  - ☐ Videography pre-test
  - ☐ Videography post-test
  - ☐ Videography student note packet
  - ☐ Video camera checklist handout
  - ☐ Video camera budget rubric
  - ☐ Storyboard worksheet example
  - ☐ Storyboard instructions
  - ☐ Storyboard worksheet
  - ☐ Film crew handout
  - ☐ Video script handout
  - ☐ Script writing rubric
  - ☐ Premiere Pro rubric (If reserving the computer lab)
- ☐ Print out the parts of a video camera labels and cut into strips and laminate. Once laminated place sticky tack on the back of the labels for the parts of a video camera game.
- ☐ Print out the video topic slips and cut into strips or tape to Popsicle sticks for activity three.
- ☐ If applicable, become familiar with the digital video camera, tripod and Adobe Premiere Pro program.
- ☐ If applicable subscribe to Adobe Creative Cloud on the computer that is set up with the projector in the classroom.
- ☐ If applicable review the Adobe Premiere Pro PowerPoint.
- ☐ If applicable make the stock music folder available to the students for video editing.
- ☐ Review the videography PowerPoint and teacher notes included in the PowerPoint.
- ☐ Write the videography unit objectives on the white board.
- ☐ If you have access to a class set of computers with Adobe Premiere Pro installed on them, reserve the computer lab for activity six.

Lecture - Begin the lecture with the videography pre-test. Once the students have completed the pre-test, direct their attention to the PowerPoint presentation. Let the students watch the video and discuss what equipment and planning went into its production. Hand out a videography note packet to each student. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity one – Project the parts of a video camera diagram onto the whiteboard or wall. Divide the class into two teams. Take turns asking each team a question from the notes discussed during the lecture portion of this unit. If the team gets the answer correct they get a point plus a chance for a bonus point if they can place a label of your choosing on the correct part of the diagram. If the team answers the question incorrectly, the other team gets a chance to steal the point and a chance for the bonus video camera label.

Activity two – Review with the students the parts of the video camera and the equipment and accessories that accompany the video camera. Distribute the video camera checklist handout to the student in small groups. Instruct students to research different video cameras given a $1,000.00 budget. Students should make note of the top video camera's qualities on their checklist. The students will prepare a presentation using poster board, markers, print-outs, etc. discussing why they chose the video camera they did, as well as compare and contrast the video camera against its top competitor. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric.

Activity three – Review with the students the rules of filming, with emphasis on creating a storyboard. Split the class into groups of four to six students. Have one group member from each group draw a topic slip*. Place the selected topics in a separate jar. Pass out the storyboard instructions, storyboard worksheet example, and storyboard worksheet. Go through the instructions with the entire class and have them work to create storyboard for their video over the topic they selected.
*You are not required to use the topics provided. You can provide specific topics or issues related to your agricultural department, FFA chapter, or community (this is a great idea for an agricultural literacy project). If you choose to use local topics have the students draw for their topic just as you would with the provided topics. Have the students turn in their completed storyboards for a grade and or to use in activities four and five.

Activity four – Review with the students the rules of filming, with emphasis on writing a script. Also review the difference between copyright and public-domain and the importance of being honest. Have the students break into the groups they formed for activity three. Hand out the writing a video script handout and the film crew handout. Go through the instructions on how to write a video script and the different roles each crew member can play. Hand back the groups storyboard worksheets. Instruct the students to choose "jobs" for their production crew and include them with the script. Have the groups write out a video script using their storyboard as a guide. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric. Have the students staple their script and storyboard to the rubric and turn them in for a grade and or to use in activity five.

Activity five – Review with the students what and how audio and lighting equipment is used to enhance video production. Have the students split up into their groups and rehearse their scripts and storyboards. As the groups get ready have them record their videos using the digital video camera one group at a time. Encourage them to use props in their videos, and even take still photos using the skills they learned during the photography unit. Remind them that they have all been assigned jobs to do during the production of their videos.

Activity six –

Option one: Review with the students the difference between linear and non-linear editing. Explain that non-linear video editing will be used in this activity. Present the Adobe Premiere Pro PowerPoint to the students. Let the students actively participate in the discussion. Select one of the group's videos to use for the demonstration. Open Adobe Premiere Pro on the computer and open the video file you and the students selected into the program. Have them provide input as you edit the video for a finished product, this may take several days. Save the final edited video. Grade this activity as group participation. Conclude the videography unit with a short review and the videography post-test.

Option two: In the computer lab, review with the students the difference between linear and non-linear editing. Explain that non-linear video editing will be used in this activity. Present the Adobe Premiere Pro PowerPoint to the students. Let the students actively participate in the discussion. Have the students open Adobe Premiere Pro on their individual computers and open the video file the students produced during the previous activity. Have them edit the video according to what they learned during the Adobe Premiere Pro PowerPoint discussion, this may take several days. Have the students save their final edited video to a flash drive. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric. Have them turn in the rubric with their name on it for grading purposes. Once all of the groups have edited their videos let them show their final products to the class. Conclude the videography unit with a short review and the videography post-test.

Optional: Have students turn in their Videography note packets. Use the Videography note packet key to assign grades.

Additional activity – Create an FFA Chapter YouTube channel and post the agricultural videos the students produced to the website for an agricultural literacy project so that the public can see what great things you are doing!

Additional activity – Have the students use the skills they learned during this unit to develop commercials for products they create in other classes such as peanut butter in food science or a product in agricultural business

Teaching Method	Time Allotted
Day one: **Pre-test** **Lecture**	**45 minutes total** **5 minutes** **40 minutes**
Day two: **Lecture**	**45 minutes total**
Day three: **Lecture**	**45 minutes total**
Day four: **Activity one**	**45 minutes total**
Day five: **Activity two**	**45 minutes total**
Day six: **Activity two**	**45 minutes total**
Day seven: **Activity three**	**45 minutes total**
Day eight: **Activity three**	**45 minutes total**
Day nine: **Activity three**	**45 minutes total**
Day ten: **Activity four**	**45 minutes total**
Day 11: **Activity four**	**45 minutes total**
Day 12: **Activity five**	**45 minutes total**
Day 13: **Activity five**	**45 minutes total**

Day 14: Activity five	45 minutes total
Day 15: Activity six	45 minutes total
Day 16: Activity six	45 minutes total
Day 17: Activity six	45 minutes total
Day 18: Activity six Post-test	45 minutes total 40 minutes 5 minutes

Note: The time table is an estimate. The actual time to complete the unit may vary.

V. **Testing Solutions through Application**
How will the students apply what they have learned in the classroom?

The students will apply what they learned by playing the parts of a video camera game.
The students will apply what they learned by researching and creating a presentation on which video camera they would prefer to buy.
The students will apply what they learned by using a storyboard to plan their videos.
The students will apply what they learned by writing a script before shooting their videos.
The students will apply what they learned by using a digital video camera to capture video footage.
The students will apply what they learned by editing the videos they captured in Adobe Premiere Pro.

VI. **Closure**
Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

After the lecture portion of the lesson the key points will be reviewed by playing the parts of a video camera game. Also, before each activity the concepts related to activity will be reviewed. All concepts will be reviewed once more before the videography post-test.
All aspects of agricultural communications work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of videography.

VII.   Evaluation of Solutions
   How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

   The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their videography pre- and post-test scores. Furthermore, the students will be evaluated on their video production skills by assessing their storyboards, scripts, and final videos according to a rubric.

Digital Audio Broadcast

Agricultural Communications   **Unit: <u>Digital Audio Broadcast</u>**

I.   **Interest Approach:**
How are you going to gain the attention of the students?

Show student the podcast at the beginning of the PowerPoint. Ask the students is the podcast kept their attention. Ask them what aspects of the podcast kept them interested. How did the speaker manage to keep their attention? Ask them who their favorite radio personality is and why. After students have discussed adequately, inform them that today they will be learning "the rest of the story" about communications through radio broadcast.

II.   **Objectives to be Achieved:**
What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for **background knowledge***? Where will you clearly state your* **objective** *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

Objectives-

The students will apply broadcast writing style through writing scripts and incorporating interview and sound bytes with 100% accuracy.
The students will create a radio personality and how to develop a one-on-one medium with their audience 100% participation.
The students will edit and publish podcast's with 80% competency.

The instructor will check for background knowledge by asking the students, why digital audio broadcast is important to communication?

The reach associated with digital audio broadcast makes it a valuable outlet for agricultural communicators. Organizations such as Arkansas Farm Bureau Federation and the Division of Agriculture Research and Extension use podcasts to spread information across the state.

In the next unit, students will learn about social media in agriculture.

III.   **Questions to be Answered**
What questions will the students answer so they can achieve the objectives that have been established?

1. **What is digital audio broadcast?**
2. **What are the benefits of digital audio broadcast?**

3. **Why is it important to develop a broadcast personality?**
4. **What is an air check?**
5. **How does broadcast writing differ from writing for print?**
6. **When recording a podcast or news cast, do you speak in active of passive voice?**

IV. **Problem Solution**
   a. **Student Grouping:**
   How will you group students for instruction?

   The students will be grouped as a whole for the lecture portion of instruction. The students will then work in small groups to complete the activities.

   b. **Materials:**
   What instructional materials will you use, if any? Why have you chosen these materials?

   Lecture – digital audio broadcast pre-test, white board, dry erase marker, projector, computer, digital audio broadcast PowerPoint, digital audio broadcast student note packet

   Activity One – broadcast personality slips, mock scripts

   Activity Two – broadcast topic slips, broadcast script template

   Activity Three – interviewing tips

   Activity Four – recording your podcast instructions, Audacity rubric

   Activity Five – Audacity PowerPoint, stock music folder, Audacity rubric

   Note: **Once you have chosen the final activity for this unit please follow with the digital audio broadcast post-test.**

   These materials reinforce the objectives intended to be covered in this lesson.

   c. **Teaching Methods:**
   What methods have you planned? Essentially, what are the students learning and how will they learn it?

   Lesson Preparation – (Click on each document to open the actual file.)
   ☐ **Complete and submit Perkins Activity #5 to your district coordinator for an omnidirectional computer microphone before the state deadline.**
   ☐ **Print out the digital audio broadcast note packet key.**

- ☐ **Make copies of:**
  - ☐ **Digital audio broadcast pre-test**
  - ☐ **Digital audio broadcast post-test**
  - ☐ **Digital audio broadcast student note packet**
  - ☐ **Broadcast script template**
  - ☐ **Interviewing tips**
  - ☐ **Recording your podcast instructions**
  - ☐ **Audacity rubric**
- ☐ **Print out the broadcast personality slips and cut into strips or tape to Popsicle sticks for activity one.**
- ☐ **Print out the mock scripts and cut them apart so that every student will have a script. (There are four scripts total)**
- ☐ **Print out the video topic slips and cut into strips or tape to Popsicle sticks for activity two. (these are the same topics from the videography unit)**
- ☐ **If applicable download Audacity onto the computer that is set up with the projector in the classroom (http://audacity.sourceforge.net/). This website also provides excellent resources on how to operate the Audacity program.**
- ☐ **If applicable become familiar with the omnidirectional computer microphone and calibrate it to your computer.**
- ☐ **If applicable review the Audacity PowerPoint.**
- ☐ **If applicable make the stock music folder available to the students for podcast editing.**
- ☐ **Review the digital audio broadcast PowerPoint and teacher notes included in the PowerPoint.**
- ☐ **Write the digital audio broadcast unit objectives on the white board.**
- ☐ **If you have access to a class set of computers with Audacity installed on them, reserve the computer lab for activity six.(Audacity is a free program, you may be able to download it on the computer lab computers if it is not already)**

Lecture - Begin the lecture with the digital audio broadcast pre-test. Once the students have completed the pre-test, direct their attention to the PowerPoint presentation. Let the students listen to the podcast and discuss what aspects of the audio peaked their interest. Hand out a digital audio broadcast note packet to each student. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity one – Review with the students the five things to consider when recording a podcast placing emphasis on the importance of developing a personality. Pass out the blank broadcast personality slips and tell the students to write their favorite character on the slip. Share the characters that are already provided as examples to the students. Place the slips in a jar and have the students draw characters. Tell them not to share what character they selected with their classmates. Pass out one mock script to each student. Instruct

the students to stand up one at a time and read their script in the character's personality they drew. Let the other students guess what personality the speaker is portraying. Award participation points for this activity.

Activity two –
Option one: Review with the students the unique aspects of writing for broadcast. Have the students break into small groups. Allow one group member from each group draw a broadcast topic split from the jar. When every group has a topic, pass out the broadcast script template. Allow the students to work in their groups to research their topic and plan their podcast script. When the groups have completed their scripts have them turn them in for a grade.

Option two: Review with the students the unique aspects of writing for broadcast. Have the students break into the small groups they were in for the videography unit. Pass out the broadcast script template. Allow the students to work in their groups to research the topic they had during the videography unit further and plan their podcast script. Have them select one of their group members to interview as an "expert" on the subject and plan what questions the broadcaster will ask him or her. When the groups have completed their scripts have them turn them in for a grade.

Activity three – Review with the students the importance of being conversational and using active voice in the podcast. Also, remind the students that attributions belong at the beginning of the sentence rather than the end. Have the students get into their small groups. Pass out the interviewing tips. Have the students rehearse their scripts and practice their timing. Remind the students that the podcast should be between 30 seconds and 1 minute. Collect the scripts at the conclusion of class.

Activity four – Review with the students the purpose of an air check. Show the microphone to the students and ask them if they can remember what kind it is from the videography unit. Have the students get into their groups. Pass out the recording your podcast instructions and pass back the scripts. Read through the instructions with the students and answer any questions they may have. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric. Let the groups go to the computer one at a time and record their podcast.

Activity five –
Option one: Review with the students the importance of digital audio broadcast to agriculture. Present the Audacity PowerPoint to the students. Let the students actively participate in the discussion. Select one of the group's audio recording to use for the demonstration. Open Audacity on the computer and open the audio file you and the students selected into the program. Have them provide input as you edit the audio for a finished product, this may take several days.

Save the final edited podcast. Grade this activity as group participation. Conclude the digital audio broadcast unit with a short review and the digital audio broadcast post-test.

Option two: In the computer lab, review with the students the importance of digital audio broadcast to agriculture. Present the Audacity PowerPoint to the students. Let the students actively participate in the discussion. Have the students open audacity on their individual computers and open the audio file the students produced during the previous activity. Have them edit the audio according to what they learned during the Audacity PowerPoint discussion, this may take several days. Have the students save their final edited audio to a flash drive. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric. Have them turn in the rubric with their name and topic title on it for grading purposes. Once all of the groups have edited their videos let them play their final products to the class. Conclude the digital audio broadcast unit with a short review and the digital audio broadcast post-test.

Optional: Have students turn in their Digital audio broadcast note packets. Use the Digital audio broadcast note packet key to assign grades.
Additional activity – Have the students use the skills they learned during this unit to develop radio advertisements for products they create in other classes such as peanut butter in food science or a product in agricultural business.

Teaching Method	Time Allotted
Day one: **Pre-test** **Lecture**	**45 minutes total** **5 minutes** **40 minutes**
Day two: **Lecture**	**45 minutes total**
Day three: **Lecture**	**45 minutes total**
Day four: **Activity one**	**45 minutes total**
Day five: **Activity one**	**45 minutes total**
Day six: **Activity two**	**45 minutes total**

Day seven: **Activity two**	**45 minutes total**
Day eight: **Activity two**	**45 minutes total**
Day nine: **Activity three**	**45 minutes total**
Day ten: **Activity four**	**45 minutes total**
Day 11: **Activity four**	**45 minutes total**
Day 12: **Activity four**	**45 minutes total**
Day 13: **Activity five**	**45 minutes total**
Day 14: **Activity five**	**45 minutes total**
Day 15: **Activity five**	**45 minutes total**
Day 16: **Activity six** **Post-test**	**45 minutes total** **40 minutes** **5 minutes**

Note: The time table is an estimate. The actual time to complete the unit may vary.

V. **Testing Solutions through Application**
   How will the students apply what they have learned in the classroom?

   The students will apply what they learned by playing the broadcast personality game.
   The students will apply what they learned by researching and writing a podcast script over the topic they selected.
   The students will apply what they learned by practicing their interview skills
   The students will apply what they learned by recording a podcast in Audacity.
   The students will apply what they learned by editing their podcast in Audacity.

VI. **Closure**
   Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

Before each activity the concepts related to activity will be reviewed. All concepts will be reviewed once more before the digital audio broadcast post-test. All aspects of agricultural communications work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of digital audio broadcast.

VII. **Evaluation of Solutions**
How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their digital audio broadcast pre- and post-test scores. Furthermore, the students will be evaluated on their digital audio broadcast production skills by assessing their scripts, and final podcasts according to a rubric.

Social Media

Classroom Instruction Plan	
Agricultural Communications	**Unit: <u>Social Media</u>**

I. **Interest Approach:**
How are you going to gain the attention of the students?

Show the logos to the class; ask the students if they recognize the logos. Ask them what kind of social media they engage in. After a few students have given responses, ask the class if they ever post anything about agriculture on their social media sites. If some do, ask them to share with the class. Inform the students that social media is changing the way agriculturist communicate, and today they will learn about a variety of social media sites that they can use to promote agriculture.

II. **Objectives to be Achieved:**
What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for **background** knowledge*? Where will you clearly state your* **objective** *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

Objectives-

The students will become familiar with new media, including blogs, Flickr, YouTube, LinkedIn, Facebook, Twitter, and Pinterest with 100% participation. The students will create a social media integration plan with 80% accuracy. The students will use social media integration strategies for the web and track the success of usage with 100% participation.

The instructor will check for background knowledge by asking the students, what types of social media they use and what they use it for.

In the next unit, students will learn about agricultural Web design.

III. **Questions to be Answered**
What questions will the students answer so they can achieve the objectives that have been established?

1. **What is social media?**
2. **How can the use of social media affect the agricultural industry?**
3. **What are some forms of social media, and how can they be used?**
4. **How can social media be integrated into your FFA chapter or program?**
5. **How do you track the success of your social media plan?**

IV. **Problem Solution**
   a. **Student Grouping:**
   How will you group students for instruction?

   The students will be grouped as a whole for the lecture portion of instruction. The students will then work as a whole and in small groups to complete the activities.

   b. **Materials:**
   What instructional materials will you use, if any? Why have you chosen these materials?

   Lecture – social media pre-test, white board, dry erase marker, projector, computer, social media PowerPoint, social media student note packet

   Activity One – agricultural organization slips, organization social media rubric, poster board, markers, glue, scissors, etc.

   Activity Two – social media integration plan worksheet

   Activity Three – tracking social media success worksheet

   Note: **Once you have chosen the final activity for this unit please follow with the social media post-test.**

   These materials reinforce the objectives intended to be covered in this lesson.

   c. **Teaching Methods:**
   What methods have you planned? Essentially, what are the students learning and how will they learn it?

   Lesson Preparation – (Click on each document to open the actual file.)
   ☐ **Print out the social media note packet key.**
   ☐ **Purchase sticky tack, poster board, markers, glue etc.**
   ☐ **Make copies of:**
      ☐ **Social media pre-test**
      ☐ **Social media post-test**
      ☐ **Social media student note packet**
      ☐ **Social media discussion handout**
      ☐ **Organization social media rubric**
      ☐ **Social media integration plan worksheet**
      ☐ **Tracking social media success worksheet**

- ☐ **Print out the agricultural organization slips and cut into strips or tape to Popsicle sticks for activity one.**
- ☐ **If applicable contact the technology department at your school and request for the social media sites (Flickr, YouTube, LinkedIn, Facebook, Twitter, Pinterest, Instagram) be unblocked from the computer that is connected to your projector for the remained of the semester so the success of your FFA chapter or program social media integration plan can be tracked. If you opt to omit this activity have the sites unblocked for the duration of the unit only.**
- ☐ **If applicable create a LinkedIn account to use as an example during the lecture portion of this unit.**
- ☐ **If applicable reserve the computer lab for activity one**

Lecture - Begin the lecture with the social media pre-test. Once the students have completed the pre-test, direct their attention to the PowerPoint presentation. Show the logos to the class; ask the students if they recognize the logos. Ask them what kind of social media they engage in. After a few students have given responses, ask the class if they ever post anything about agriculture on their social media sites. If some do, ask them to share with the class. Inform the students that social media is changing the way agriculturist communicate, and today they will learn about a variety of social media sites that they can use to promote agriculture. Hand out a social media note packet to each student. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. When you get done discussing side five pass out the social media discussion handout. Have the students read it out loud or to themselves. Prompt a discussion about the importance of social media to agriculture. If you created a LinkedIn account access it when you discuss the LinkedIn website. Search different agricultural topics and see what connections you can make. At the beginning of slide eight ("Molding" Minds) have the students put their names on their notes and turn them in. if it is getting near the end of the class period wait until the following day to finish the presentation as it will consume a large amount of time. Prompt the students into an active discussion as you move through the various elements included on slide eight. Use the notes attached to this slide in the PowerPoint to guide the discussion. Slide nine showcases a positive message conveyed over social media. Prompt the students to discuss this as well. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity one – Review with the students the different social media outlets organizations and companies are using to promote their companies. Have the students break up into groups of three to four to prepare a presentation over an organizations social media integration strategy. Instruct one member from each group to draw an organization slip from the jar. Pass out the rubrics to the groups and have them research what forms of social media they are using and how they are utilizing it to promote their companies. Once the groups have

researched their organizations plan pass out the poster board, markers, glue, etc. for them to prepare their presentations. Have each group stand up one at a time and present their research. Remind the student's that their grade on this activity will reflect the rubric.

Activity two –
Option one: Review with the students how to integrate social media into your organization or business and why it is important. This activity is for the entire class to complete as a group. Pass out the social media integration worksheet. Direct the discussion as the students work together to create a social media integration plan for their FFA chapter or program. Include the social media sites discussed during the lecture portion of this unit. Encourage the students to think of other sites they could use such as Instagram as well. When the worksheet is complete have the students turn it in for a grade. Suggest that the photographs, videos, articles, podcasts, and graphics from the previous units be showcased in the social media plan.

Option two: Review with the students how to integrate social media into your organization or business and why it is important. This activity is for the entire class to complete as a group. If you already utilize some form of social media in your FFA chapter or program pass out the social media integration worksheet. Direct the discussion as the students work together to create a social media integration plan for their FFA chapter or program including the current efforts being utilized by the chapter or program. Evaluate the success of your current efforts and adjust the approach if necessary. Include the social media sites discussed during the lecture portion of this unit. Encourage the students to think of other sites they could use such as Instagram as well. When the worksheet is complete have the students turn it in for a grade. Suggest that the photographs, videos, articles, podcasts, and graphics from the previous units be showcased in the social media plan.

Activity three –
Option one: Review with the students how companies and organizations track their social media success. Ask the students why that is important. This activity is for the entire class to complete as a group. Pass back the social media integration plan the students completed during activity two. Allow the students to help you create the social media accounts they planned for their FFA chapter or program. Once the accounts have been created pass out the social media success tracker worksheet. Spend a few minutes each day following this activity updating and checking the success of each site. Divide the social media sites among the students and have them record the success of the site they are assigned on the success tracker worksheet. Award participation points for this assignment.

Option two: Review with the students how companies and organizations track their social media success. Ask the students why that is important. This activity

is for the entire class to complete as a group. Pass back the social media integration plan the students completed during activity two. Allow the students to help you create the social media accounts they planned for their FFA chapter or program and update any current effort being used. Once the accounts have been created pass out the social media success tracker worksheet. Spend a few minutes each day following this activity updating and checking the success of each site. Divide the social media sites among the students and have them record the success of the site they are assigned on the success tracker worksheet. If social media was used by the chapter or program in the past compare the success to the previous efforts to determine if the public response has increased. Award participation points for this assignment. Conclude the social media unit with a short review and the social media post-test.

Optional: Have students turn in their social media note packets. Use the Social media note packet key to assign grades.

Additional activity – Have the students in other agricultural courses submit content from their classes to add to the social media sites.

Teaching Method	Time Allotted
Day one: **Pre-test** **Lecture (to slide seven)**	**45 minutes total** **5 minutes** **40 minutes**
Day two: **Lecture (slide eight - review)**	**45 minutes total**
Day three: **Lecture (slide eight - review)**	**45 minutes total**
Day four: **Activity one**	**45 minutes total**
Day five: **Activity one**	**45 minutes total**
Day six: **Activity one**	**45 minutes total**
Day seven: **Activity two**	**45 minutes total**
Day eight: **Activity two**	**45 minutes total**
Day nine: **Activity two**	**45 minutes total**

Day ten: **Activity three**	**45 minutes total**
Day 11: **Activity three**	**45 minutes total**
Day 12: **Activity three**	**45 minutes total**
Day 13: **Activity three**	**45 minutes total**
Day 14: **Activity three** **Post-test**	**45 minutes total** **40 minutes** **5 minutes**

Note: The time table is an estimate. The actual time to complete the unit may vary.

    V.   **Testing Solutions through Application**
            How will the students apply what they have learned in the classroom?

            The students will apply what they learned by researching other organization and companies social media plans.
            The students will apply what they learned by creating a social media integration plan for their FFA chapter or   program.
            The students will apply what they learned by creating social media sites to showcase their FFA chapter or program.
            The students will apply what they learned by tracking the success of their social media accounts.

    VI.   **Closure**
            Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

            Before each activity the concepts related to activity will be reviewed. All concepts will be reviewed once more before the social media post-test.
            All aspects of agricultural communications work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of social media.

    VII.   **Evaluation of Solutions**
            How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their social media pre- and post-test scores. Furthermore, the students will be evaluated on their social media integration skills by assessing the success of their social media integration plan according to a rubric.

Web Design

Agricultural Communications   **Unit: Web Design**

I.   **Interest Approach:**
        How are you going to gain the attention of the students?

        Access the National FFA Website (ffa.org) for the students to see. Ask the students what they like about the website. Is it attractive? Is it simple? Are the graphics meaningful? Is the text easy to read? Is it easy to navigate? Talk with the class about why this website exhibits good design. After looking at the Website, inform the students that today they will be learning about the design principles of the Web, and how those principles can make them better communicators.

II.   **Objectives to be Achieved:**
        What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for **background knowledge***? Where will you clearly state your* **objective** *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

        Objectives-

        The students will gain competency in Website design elements and terminology with 100% participation.

        The students will understand copyright and implications associated with publishing on the Web with 100% participation.
        The students will be able to correctly use HTML code to develop a Website with 80% accuracy.

        The instructor will check for background knowledge by asking the students, what attracts them to a Website.

        Is it attractive? Is it simple? Are the graphics meaningful? Is the text easy to read? Is it easy to navigate?

        In the next unit, students will learn about the history of agricultural communications.

III.   **Questions to be Answered**

What questions will the students answer so they can achieve the objectives that have been established?

1. **What is Web design?**
2. **What should you consider when creating a Web page?**
3. **What are the names for the code used to develop Web pages?**
4. **What is the purpose of a tag on a Web style sheet?**
5. **What does "fair use" mean?**
6. **What is the purpose of a web hosting service?**

IV. **Problem Solution**
   a. **Student Grouping:**
   How will you group students for instruction?

   The students will be grouped as a whole for the lecture portion of instruction. The students will then work in small groups and individually to complete the activities.

   b. **Materials:**
   What instructional materials will you use, if any? Why have you chosen these materials?

   Lecture – Web design pre-test, white board, dry erase marker, projector, computer, Web design PowerPoint, Web design student note packet

   Activity One – good vs. bad Website worksheet, computer, projector, URL's of example Websites

   Activity Two – HTML code list, Website coding worksheet, sample FFA website

   Activity Three – Website planning worksheet, HTML code list

   Activity Four – Adobe Creative Cloud, computer, Website planning worksheet, HTML code list, Dreamweaver rubric, Adobe Dreamweaver PowerPoint

   Note: **Once you have chosen the final activity for this unit please follow with the Web design post-test.**

   These materials reinforce the objectives intended to be covered in this lesson.

   c. **Teaching Methods:**
   What methods have you planned? Essentially, what are the students learning and how will they learn it?

Lesson Preparation – (Click on each document to open the actual file.)

- ☐ Complete and submit Perkins Activity #6 to your district coordinator for a one month subscription to the Adobe Creative Cloud before the state deadline.
- ☐ Print out the Web design note packet key and Website code worksheet key.
- ☐ Make copies of:
  - ☐ Web design pre-test
  - ☐ Web design post-test
  - ☐ Web design student note packet
  - ☐ Good vs. bad Website worksheet
  - ☐ HTML code list
  - ☐ Website code worksheet
  - ☐ Website planning worksheet
  - ☐ Dreamweaver rubric (If reserving the computer lab)
- ☐ Visit the Websites of the URL's provided for activity one and choose one good Website and one bad Website for the students to compare.
- ☐ If you need further explanation of HTML code w3schools.com is an excellent resource.
- ☐ Locate the website folder within Activity two and test the sample website in your browser.
- ☐ If applicable, become familiar Adobe Dreamweaver program.
- ☐ If applicable subscribe to Adobe Creative Cloud on the computer that is set up with the projector in the classroom.
- ☐ If applicable review the Adobe Dreamweaver PowerPoint.
- ☐ Review the Web design PowerPoint and teacher notes included in the PowerPoint.
- ☐ Write the Web design unit objectives on the white board.
- ☐ If you have access to a class set of computers with Adobe Dreamweaver installed on them, reserve the computer lab for activity four.

Lecture - Begin the lecture with the Web design pre-test. Once the students have completed the pre-test, direct their attention to the PowerPoint presentation. Access the National FFA Website (ffa.org) for the students to see. Ask the students what they like about the website. Is it attractive? Is it simple? Are the graphics meaningful? Is the text easy to read? Is it easy to navigate? Talk with the class about why this website exhibits good design. After looking at the Website, inform the students that today they will be learning about the design principles of the Web, and how those principles can make them better communicators. Hand out a Web design note packet to each student. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity one – Review with the students the aspects of a worthy website. Hand out the good vs. bad website worksheet. Access one of the Websites you chose for

this activity. Do not tell the students if it is the good one or the bad one and have the students complete part one of the worksheet. Once they complete part one, access the other website you selected from the list of URLs have the students complete part two of the worksheet. Once all of the students have completed the activity let the students discuss what was different between the two websites and see if the majority could determine which one was good and which one was bad. Have the students turn in their worksheets for a grade.

Activity two – Review with the students the difference between HTML and CSS. Also remind the students that every time they open a tag, they must close that tag (<html> </html>). Pass out the HTML code list and the Website code worksheet. Open the sample website in your browser for the students to reference while completing the worksheet. Have the students work individually to complete the activity and turn it in for a grade. W3schools.com is an excellent resource when learning HTML code.

Activity three – Review with the students what they should consider when planning a website. Have the student break into groups of three to four and pass out the Website planning worksheet. Have the students get out their HTML code list from activity two. Explain that the students need to develop a Website for their FFA chapter or agricultural program. This Website can include: articles written from the journalistic writing unit, photographs captured during the photography unit, videos produced during the videography unit, podcast's recorded during the digital audio broadcast unit, RSS feeds from social media sites they create in the social media unit, as well as chapter and program news, information and events. Let the students use their Web design notes packet and HTML code list to complete the activity and turn it in for a grade.

Activity four –
Option one: Review with the students the rules concerning copyright laws and the process of publishing a Website to the internet. Have each student group present their website design. Have the students vote on the most functional and appealing website design. Present the Adobe Dreamweaver PowerPoint to the students. Let the students actively participate in the discussion. Open Adobe Dreamweaver on the computer, have the students provide input and guide you as you create the website using the planning worksheet from the chosen group. Save the finished website. Grade this activity as group participation. Conclude the Web design unit with a short review and the Web design post-test. Web design is a lot of trial and error. The good thing about Dreamweaver is you can split the screen and see what your code will look like on the Web as your type it. w3schools.com is an excellent resource when coding. Encourage your students to visit this Website when they are coding.

Option two: In the computer lab, review with the students the rules concerning copyright laws and the process of publishing a Website to the internet. Present the Adobe Dreamweaver PowerPoint to the students. Let the students actively participate in the discussion. Have the students open Adobe Dreamweaver on their individual computers and create their Website using the planning worksheet from the previous activity. Have the students save their finished Websites to a flash drive. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric. Have them turn in the rubric with their name on it for grading purposes. Once all of the groups have created their websites let them show their final products to the class. Conclude the Web design unit with a short review and the Web design post-test. Web design is a lot of trial and error. The good thing about Dreamweaver is you can split the screen and see what your code will look like on the Web as your type it. w3schools.com is an excellent resource when coding. Encourage your students to visit this Website when they are coding.

Optional: Have students turn in their Web design note packets. Use the Web design note packet key to assign grades.

Additional activity – Have the students select a Website design and use a free web hosting service to publish the Website. Have the students update the website on a weekly basis. You can even embed a view counter on the Webpage to track how many people are accessing the site.

Additional activity – Have the students use the skills they learned during this unit to develop Webpages for products they create in other classes such as a product in agricultural business.

Teaching Method	Time Allotted
Day one: **Pre-test** **Lecture**	**45 minutes total** **5 minutes** **40 minutes**
Day two: **Lecture**	**45 minutes total**
Day three: **Lecture**	**45 minutes total**
Day four: **Activity one**	**45 minutes total**
Day five:	**45 minutes total**

Activity two	
Day six: **Activity three**	**45 minutes total**
Day seven: **Activity three**	**45 minutes total**
Day eight: **Activity three**	**45 minutes total**
Day nine: **Activity three**	**45 minutes total**
Day ten: **Activity four**	**45 minutes total**
Day 11: **Activity four**	**45 minutes total**
Day 12: **Activity four**	**45 minutes total**
Day 13: **Activity four**	**45 minutes total**
Day 14: **Activity four**	**45 minutes total**
Day 15: **Activity four** **Post-test**	**45 minutes total** **40 minutes** **5 minutes**

Note: The time table is an estimate. The actual time to complete the unit may vary.

    V.   **Testing Solutions through Application**
        How will the students apply what they have learned in the classroom?

        The students will apply what they learned by completing the good vs. bad Website worksheet
        The students will apply what they learned by completing the Website HTML coding worksheet.
        The students will apply what they learned by planning a Website for their FFA chapter or agricultural program.

The students will apply what they learned by typing HTML code for their Website into Adobe Dreamweaver.

VI. **Closure**
Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

Before each activity the concepts related to activity will be reviewed. All concepts will be reviewed once more before the Web design post-test.
All aspects of agricultural communications work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of Web design.

VII. **Evaluation of Solutions**
How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their Web design pre- and post-test scores. Furthermore, the students will be evaluated on their Web design skills by assessing Websites according to a rubric.

History

I. **Interest Approach:**
How are you going to gain the attention of the students?

Provide students with copies of the history interest approach worksheet. You may have students work in groups or individually. The worksheet contains a series of photos representing different media or agricultural communication practices. Start the discussion by asking the students to complete the worksheet by numbers the images one through six with one being the earliest practice and six being the most modern. Once they have completed the worksheet ask them the following questions.
Have you ever thought about how communication, intended to reach farmers, has changed over time?
How did early farmers in America learn about farming?
How did you determine if a photo contained a historical media/ strategy or a modern one?
How would changes in agriculture and society impact the media/ strategy used to communicate to farmers and consumers?

II. **Objectives to be Achieved:**
What are your goals for student learning in this lesson? That is, what do you intend students to learn? Have you checked for **background knowledge***? Where will you clearly state your* **objective** *to your class? Will you show a logical connection with previous and future learning at the beginning and end of your lesson? Why have you chosen these goals?*

Objectives-
The students will learn about agricultural communication trends in America with 100% participation.
The students will define agricultural communications and the role of agricultural communicators with 80% accuracy.
The students will understand how communications practices have changed and identify current practices with 80% accuracy.

The instructor will check for background knowledge by having the students complete the history interest approach.

In the next unit, students will learn about college preparation.

III. **Questions to be Answered**
What questions will the students answer so they can achieve the objectives that have been established?

1. What is agricultural communications?
2. Where did the field of agricultural communications originate?
3. What types of media are used to communicate about agriculture?
4. How did farmers communicate in the 1700s?
5. What has dramatically changed the delivery of agricultural messages?
6. What is the current focus for communicating agriculture?

IV. **Problem Solution**
a. Student Grouping:
How will you group students for instruction?

The students will be grouped as a whole for the lecture portion of instruction. The students will then work in small groups to complete the activities.

b. Materials:
What instructional materials will you use, if any? Why have you chosen these materials?

Lecture – history pre-test, white board, dry erase marker, projector, computer, history PowerPoint, history student note packet

Activity One – notebook paper

Activity Two – positive communication instructions, positive communication rubric, computers (iPads), poster board, markers, glue, scissors, etc.

 Please follow with the history post-test.

These materials reinforce the objectives intended to be covered in this lesson.

c. Teaching Methods:
What methods have you planned? Essentially, what are the students learning and how will they learn it?

Lesson Preparation – (Click on each document to open the actual file.)
☐ Purchase sticky tack, poster board, markers, glue etc.
☐ Print out the history note packet key
☐ Make copies of:
   ☐ History pre-test
   ☐ History post-test

- ☐ History student note packet
- ☐ Positive communication instructions
- ☐ Positive communication instructions rubric
☐ Review the history PowerPoint and teacher notes included in the PowerPoint.
☐ Write the history unit objectives on the white board.
☐ If applicable reserve the computer lab for activity two.

Lecture - Begin the lecture with the history pre-test. Once the students have completed the pre-test, provide them with copies of the history interest approach worksheet. You may have students work in groups or individually. The worksheet contains a series of photos representing different media or agricultural communication practices. Start the discussion by asking the students to complete the worksheet by numbers the images one through six with one being the earliest practice and six being the most modern. Once they have completed the worksheet ask them the following questions.
Have you ever thought about how communication, intended to reach farmers, has changed over time?
How did early farmers in America learn about farming?
How did you determine if a photo contained a historical media/ strategy or a modern one?
Hand out a history note packet to each student. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity one – Review with the students where agricultural communications originated from in the 1700s. Have students get out a sheet of paper and pair up. One partner is A (communicator) and the other partner is B (listener). Partners should sit with backs facing, so neither can see the other partner's paper. Partner A (communicator) will draw a tractor, livestock or other agricultural related item of the teachers choosing using shapes (triangle, circle, oval, square, rectangle, and diamond). Then Partner A will attempt to explain to Partner B how to draw an exact replicate of the tractor. Partner A is the only one allowed to talk for the first two minutes. After two minutes, Partner B is allowed to ask questions. However, they may not compare drawings until the activity is finished. The teacher should walk around and observe students as they communicate, listen and provide feedback. Switch roles for a second round.

Activity two - Review with the students how agricultural communications has changed over the years. Break the students into groups of three to four and distribute the positive communications instructions. Ask the students to identify a topic that an agricultural communicator would need to communicate about positively. The students will prepare a presentation using poster board, markers,

print-outs, etc. discussing the topic they chose. Provide the students with the grading rubric prior to the beginning of the activity. Remind the student's that their grade on this activity will reflect the rubric.

Optional: Have students turn in their history note packets. Use the history note packet key to assign grades.

Additional activity – Have students brainstorm about companies that have or should have agricultural communications professionals working for them. Have students identify the role or responsibilities of the agricultural communications professional in that company and why that organization needs agricultural communications professionals. This could be an individual or group task. Have students share at least one company, the role of an agricultural communications specialist within the organization and why the company needs the professional?

Teaching Method	Time Allotted
Day one:	**45 minutes total**
Pre-test	**5 minutes**
Lecture	**40 minutes**
Day two:	**45 minutes total**
Lecture	
Day three:	**45 minutes total**
Lecture	
Day four:	**45 minutes total**
Lecture	
Day five:	**45 minutes total**
Activity one	
Day six:	**45 minutes total**
Activity two	
Day seven:	**45 minutes total**
Activity two	
Day seven:	**45 minutes total**
Activity two	
Day seven:	**45 minutes total**
Activity two	**40 minutes**
Post-test	**5 minutes**

Note: The time table is an estimate. The actual time to complete the unit may vary.

V. **Testing Solutions through Application**
How will the students apply what they have learned in the classroom?

The students will apply what they learned by practicing their verbal communications skills by participating in   activity one.
The students will apply what they learned by researching and presenting their positive communications projects.

VI. **Closure**
Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

After the lecture portion of the lesson the key points will be reviewed. Also, before each activity the concepts related to activity will be reviewed. All concepts will be reviewed once more before the history post-test.
All aspects of agricultural communications work together to create quality informational pieces that educate the public. In future lessons students will learn aspects of other career opportunities in agricultural communication that incorporate elements of history.

VII. **Evaluation of Solutions**
How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their history pre- and post-test scores.

College Preparation

Agricultural Communications   Unit: **College Preparation**

I.   **Interest Approach:**
        How are you going to gain the attention of the students?

        **Students will look to you as they begin to consider college. Share your
        experiences: how and when you decided college was the right course of action for
        you, how you learned about opportunities and how you decided which college to
        attend. Share any insight you have and provide advice for students as they begin
        thinking about college. You may even want to invite the school counselor to join
        you and assist with answering basic questions.**
        Encourage your students to ask questions about the college preparation process.
        Most importantly get them thinking about college or plans after high school.
        Why should we identify the advantages of attending college?
        Why should we gain awareness of steps to take in preparing for college?
        Why should we gain awareness of the steps to follow when choosing a college?
        Why should we identify ways to pay for college?

II.   **Objectives to be Achieved:**
        *What are your goals for student learning in this lesson? That is, what do you intend
        students to learn? Have you checked for* **background knowledge***? Where will you
        clearly state your* objective *to your class? Will you show a logical connection with
        previous and future learning at the beginning and end of your lesson? Why have
        you chosen these goals?*

        Objectives-
        **The students will identify the advantages of attending college 100%
        participation.**
        **The students will gain awareness of steps to take in preparing for college with
        100% participation.**
        **The students will gain awareness of the steps to follow when choosing a college
        with 100% participation.**
        The students will identify ways to pay for college with 100% participation.
        **The instructor will check for background knowledge by sharing his or her own
        experiences when they prepared for college. The instructor will engage the
        students in the conversation.**

        In the next unit, students will learn about business writing.

III.   **Questions to be Answered**
        *What questions will the students answer so they can achieve the objectives that
        have been established?*

1. What are the advantages of going to college?
2. How should you prepare for college?
3. What should you consider when researching colleges and universities?
4. What are some options when seeking financial aid?

IV. **Problem Solution**
a. **Student Grouping:**
How will you group students for instruction?

The students will be grouped as a whole for the lecture portion of instruction. The students will then work individually to complete the activities.

b. **Materials:**
What instructional materials will you use, if any? Why have you chosen these materials?

Lecture – college preparation pre-test, white board, dry erase marker, projector, computer, college preparation PowerPoint, college preparation student note packet

Activity One – planning for college worksheet, computers (iPads)

Please follow with the college preparation post-test.

These materials reinforce the objectives intended to be covered in this lesson.

c. **Teaching Methods:**
What methods have you planned? Essentially, what are the students learning and how will they learn it?

Lesson Preparation – (Click on each document to open the actual file.)
☐ **Print out the college preparation note packet key**
☐ **Make copies of:**
    ☐ **College preparation pre-test**
    ☐ **College preparation post-test**
    ☐ **College preparation student note packet**
    ☐ **Planning for college worksheet**
☐ **Review the college preparation PowerPoint and teacher notes included in the PowerPoint.**
☐ **Write the college preparation unit objectives on the white board.**
☐ **If applicable reserve the computer lab for activity one**

Lecture - Begin the lecture with the college preparation pre-test. Once the students have completed the pre-test, provide them with copies of the college preparation interest approach worksheet. You may have students work in groups or individually. The worksheet contains a series of photos representing different media or agricultural communication practices. Start the discussion by asking the students to complete the worksheet by numbers the images one through six with one being the earliest practice and six being the most modern. Once they have completed the worksheet ask them the following questions.

Have you ever thought about how communication, intended to reach farmers, has changed over time?

How did early farmers in America learn about farming?

How did you determine if a photo contained a historical media/ strategy or a modern one?

Hand out a college preparation note packet to each student. As you present the PowerPoint allow the students to actively participate in the discussion and fill in the notes packet. At the conclusion of the PowerPoint presentation have the students answer the review questions.

Activity one – Review with the students what the advantages of going to college are and how you should prepare for the transition. Pass out the planning for college worksheet and instruct the students to research the colleges and universities they are interested in. when the students have finish the worksheet have them turn them in. Review what questions the students have about college and prompt a discussion over the topics.

Optional: Have students turn in their college preparation note packets. Use the college preparation note packet key to assign grades.

Additional activity – Provide students with a copy of the career planning tips handout from the additional activity folder. Go over the career planning steps with your students. Ask the students to answer the questions about strengths, weaknesses, and interests. Encourage them to begin talking with their parents, counselors, you and others about career opportunities.

Additional activity – Ask students to take five minutes and prepare a written response to the question:

What is the purpose of a résumé and cover letter? Let students know they will be sharing their responses. Encourage them to prepare their compositions carefully. Guide responses to address the purpose of these two business communications. Provide students with a copy of the resume worksheet and cover letter example to assist them in outlining important content. Also, have the student's research resume layouts. Have students create a résumé and cover letter for a position in which they are interested. Use online resources to locate job descriptions: AG Careers.com (http://agcareers.com), National

Agricultural Communicators of Tomorrow(http://nactnow.org/opportunites/job-opportunities/), and LinkedIn (http://www.linkedin.com/).

Teaching Method	Time Allotted
Day one:	**45 minutes total**
Pre-test	**5 minutes**
Lecture	**40 minutes**
Day two:	**45 minutes total**
Lecture	
Day three:	**45 minutes total**
Lecture	
Day four:	**45 minutes total**
Lecture	
Day five:	**45 minutes total**
Lecture	
Day six:	**45 minutes total**
Activity one	
Day seven:	**45 minutes total**
Activity one	
Day eight:	**45 minutes total**
Activity one	**40 minutes**
Post-test	**5 minutes**

Note: The time table is an estimate. The actual time to complete the unit may vary.

V. **Testing Solutions through Application**
   How will the students apply what they have learned in the classroom?

   The students will apply what they learned by completing the planning for college worksheet.

VI. **Closure**
   Did you review and restate major points of today's lesson? How will future learning connect to today's learning?

   Before each activity the concepts related to activity will be reviewed. All concepts will be reviewed once more before the college preparation post-test. All aspects of agricultural communications work together to create quality informational pieces that educate the public. In future lessons students will learn

aspects of other career opportunities in agricultural communication that incorporate elements of college preparation.

VII.   **Evaluation of Solutions**
How and when do you plan to evaluate student learning on the content of this lesson? Why have you chosen this approach?

The students will be evaluated during the lecture and activities through active discussion. The students will be evaluated by comparing their college preparation pre- and post-test scores.

Appendix H

Descriptive Field Test Pre- and Post-tests

Journalistic Writing

Name_____

Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Journalistic writing covers agricultural news for print, broadcast and online media. ____

2. What style are news stories written in?
   a. Block Style
   b. Inverted Pyramid Style
   c. free style
   d. none of the above

3. T/F No creative style can be exercised in feature writing. ___

4. What are the five W's and an H?
   W_____
   W_____
   W_____
   W_____
   W_____
   H_____

5. What is the purpose of a news lead?
   _____
   _____
   _____

6. Which answer correctly abbreviates the state of Arkansas when NOT used in an address
   according to the *AP Stylebook*?
   a. Arkansas
   b. Ark.
   c. AR
   d. Ar.

7. List three key elements of news writing.
   1. _____
   2. _____
   3. _____

8. List three types of feature leads.
   1. _____
   2. _____
   3. _____

9. What style are feature stories written in?
      a. Block Style
      b. Inverted Pyramid Style
      c. free style
      d. none of the above

10. Match the type of article with its characteristic.

A. News   _____4. Less than 400 words
B. Feature   _____5. Uses Inverted Pyramid Style
                       _____6. Creatively tells a story
                       _____7. No-frill writing
                       _____8. Over 500, but less than 1500 words

_____1. Provide the most important information

_____2. Creative style can be used

_____3. Uses Block Style

Journalistic Writing Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Journalistic writing covers agricultural news for print, broadcast and online media. **T**

2. What style are news stories written in?
   a. Block Style
   b. Inverted Pyramid Style
   c. free style
   d. None of the Above

3. T/F No creative style can be exercised in feature writing. **F**

4. What are the five W's and an H?
   W   Who
   W   What
   W   When
   W   Where
   W   Why
   H   How

5. What is the purpose of a news lead?
   Gives some information about the story, but it also raises a number of questions

6. Which answer correctly abbreviates the state of Arkansas when NOT used in an address according to the *AP Stylebook*?
   a. Arkansas
   b. Ark.
   c. AR
   d. Ar.

7. List three key elements of news writing.
   1.   Impact, Conflict, Novelty
   2.   Prominence, Proximity, Timeliness
   3.   Fact-focused

8. List three types of feature leads.
   1.   Big Fact, Question
   2.   Suspense, Direct Address
   3.   Quotation

9. What style are feature stories written in?

    a. Block Style
    b. Inverted Pyramid Style
    c. free style
    d. none of the above

10. Match the type of article with its characteristic.

  A. News   **A** 1. Provide the most important
  B. Feature   information
                                              B 2. Creative style can be used
                                              B 3. Uses Block Style
                                              A 4. Less than 400 words
                                              A 5. Uses Inverted Pyramid Style
                                              B 6. Creatively tells a story
                                              A 7. No-frill writing
                                              B 8. Over 500, but less than 1500 words

Journalistic Writing Unit Post-test
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Journalistic writing covers agricultural news for print, broadcast and online media. ____

2. What style are news stories written in?
    e. Block Style
    f. Inverted Pyramid Style
    g. free style
    h. none of the above

3. T/F No creative style can be exercised in feature writing. ___

4. What are the five W's and an H?
    W_____
    W_____
    W_____
    W_____
    W_____
    H_____

5. What is the purpose of a news lead?

    _____
    _____
    _____

6. Which answer correctly abbreviates the state of Arkansas when NOT used in an address
    according to the *AP Stylebook*?
    a. Arkansas
    b. Ark.
    c. AR
    d. Ar.

7. List three key elements of news writing.
    1. _____
    2. _____
    3. _____

8. List three types of feature leads.
    1. _____
    2. _____
    3. _____

9. What style are feature stories written in?

     a. Block Style
     b. Inverted Pyramid Style
     c. free style
     d. none of the above

10. Match the type of article with its characteristic.

A. News	_____4. Less than 400 words
B. Feature	_____5. Uses Inverted Pyramid Style
	_____6. Creatively tells a story
	_____7. No-frill writing
	_____8. Over 500, but less than 1500 words

_____1. Provide the most important informatio n

_____2. Creative style can be used

_____3. Uses Block Style

Journalistic Writing Unit Post-test KEY
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Journalistic writing covers agricultural news for print, broadcast and online media. __T__

2. What style are news stories written in?
    - e. Block Style
    - **f. <u>Inverted Pyramid Style</u>**
    - g. free style
    - h. None of the Above

3. T/F No creative style can be exercised in feature writing. __F__

4. What are the five W's and an H?
    - **W__Who__**
    - **W__What__**
    - **W__When__**
    - **W__Where__**
    - **W__Why__**
    - **H___How__**

5. What is the purpose of a news lead?
    __Gives some information about the story, but it also raises a number of questions_____

    _____

    _____

6. Which answer correctly abbreviates the state of Arkansas when NOT used in an address according to the *AP Stylebook*?
    - a. Arkansas
    - **b. <u>Ark.</u>**
    - c. AR
    - d. Ar.

7. List three key elements of news writing.
    - **1.___Impact, Conflict, Novelty_____**
    - **2.___Prominence, Proximity, Timeliness_____**
    - **3.___Fact-focused_____**

8. List three types of feature leads.
    - **1.___Big Fact, Question_____**
    - **2.___Suspense, Direct Address_____**
    - **3.___Quotation_____**

9. What style are feature stories written in?
   a. Block Style
   b. Inverted Pyramid Style
   c. free style
   d. none of the above

10. Match the type of article with its characteristic.

A. News

B. Feature

__A__1. Provide the most important information

__B__2. Creative style can be used

__B__3. Uses Block Style

__A__4. Less than 400 words

__A__5. Uses Inverted Pyramid Style

__B__6. Creatively tells a story

__A__7. No-frill writing

__B__8. Over 500, but less than 1500 words

Public Relations

Public Relations Unit Pre-test
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Public Relations is an organizations approach to building a negative image. _____

2. The public relations audience is
    a. Internal
    b. External
    c. Both a and b
    d. None of the above

3. The short description of the company or organization found at the bottom of the press release
   is known as the
    a. End sign
    b. Biography
    c. Contact
    d. Boilerplate

4. The common press release end sign looks like
    a. – 30 –
    b. – 45 –
    c. – 5 –
    d. – 35 –

5. T/F Press releases are written using the inverted pyramid style and AP style. _____

6. What is the purpose of the release date?

   _____

7. List the three reasons to write a press release.
    1. _____
    2. _____
    3. _____

8. Ethics are the beliefs about _____ and _____ that

    guide the way we _____ and _____

9. List three rewards for good ethics.
    1. _____
    2. _____
    3._____

Name_____

Public Relations Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Public Relations is an organizations approach to building a negative image. **False**

2. The public relations audience is
   e. Internal
   f. External
   g. Both a and b
   h. None of the above

3. The short description of the company or organization found at the bottom of the press release is known as the
   a. End sign
   b. Biography
   c. Contact
   d. Boilerplate

4. The common press release end sign looks like
   a. – 30 –
   b. – 45 –
   c. – 5 –
   d. – 35 –

5. T/F Press releases are written using the inverted pyramid style and AP style. **True**

6. What is the purpose of the release date?

   Tells the media when to run the article in their respective outlet

7. List the three reasons to write a press release.
   1. **Announcements**
   2. **Community activities**
   3. **Media packets**
8. Ethics are the beliefs about **right** and **wrong** that guide the way we **think** and **act**

9. List three rewards for good ethics.
   1. **Satisfaction, Compensation**
   2. **Success, Promotions**

3. **Leadership**

Public Relations Unit Post-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Public Relations is an organizations approach to building a negative image. _____

2. The public relations audience is
    e. Internal
    f. External
    g. Both a and b
    h. None of the above

3. The short description of the company or organization found at the bottom of the press release is known as the
    a. End sign
    b. Biography
    c. Contact
    d. Boilerplate

4. The common press release end sign looks like
    a. – 30 –
    b. – 45 –
    c. – 5 –
    d. – 35 –

5. T/F Press releases are written using the inverted pyramid style and AP style. _____

6. What is the purpose of the release date?

    _____

7. List the three reasons to write a press release.
    1. _____
    2. _____
    3. _____

8. Ethics are the beliefs about _____ and _____ that

    guide the way we _____ and _____

9. List three rewards for good ethics.
    1. _____
    2. _____
    3._____

Public Relations Unit Post-test KEY
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Public Relations is an organizations approach to building a negative image. **False**

2. The public relations audience is
    i.   Internal
    j.   External
    k. Both a and b
    l.   None of the above

3. The short description of the company or organization found at the bottom of the press release is known as the
    a.   End sign
    b.   Biography
    c.   Contact
    d. Boilerplate

4. The common press release end sign looks like
    a. – 30 –
    b.   – 45 –
    c.   – 5 –
    d.   – 35 –

5. T/F Press releases are written using the inverted pyramid style and AP style. **True**

6. What is the purpose of the release date?

    Tells the media when to run the article in their respective outlet

7. List the three reasons to write a press release.
    1. **Announcements**
    2. **Community activities**
    3. **Media packets**

8. Ethics are the beliefs about **right** and **wrong** that guide the way we **think** and **act**
9. List three rewards for good ethics.
    1. **Satisfaction, Compensation**
    2. **Success, Promotions**
    3. **Leadership**

Photography

Name_____

Photography Unit Pre-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Photography is the art of taking and processing photographs. _____

2. When using a film camera what creates the printable image?
   a. Lens
   b. Film
   c. Camera body
   d. All of the above

3. Match the type of camera with its characteristic.
   A. Film   ___1. Records images electronically using a built-in processor
   B. Digital   ___2. Three elements combine to create a printable image
                            ___3. Lens refracts light onto a computer chip
                            ___4. Made up of the lens, the film, and the camera body

4. What creates interest and appeal to those viewing the image?_____

5. List three rules to improve photo composition.
   1._____
   2. _____
   3. _____

6. What is it called when you fix minor mistakes in a photograph by removing minor distractions that might hold the attention of the viewer? _____

7. List three elements of photo manipulation.
   1. _____
   2. _____
   3. _____

8. Picture Element = _____

9. T/F An image produced for print needs to be 72 ppi. _____

10. What color mode should be selected for digital images? _____

Photography Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Photography is the art of taking and processing photographs. **True**

2. When using a film camera what creates the printable image?
   a. Lens
   b. Film
   c. Camera body
   d. **All of the above**

3. Match the type of camera with its characteristic.
   A. Film
   B. Digital

   _**B**_1. Records images electronically using a built-in processor
   _**A**_2. Three elements combine to create a printable image
   _**B**_3. Lens refracts light onto a computer chip
   _**A**_4. Made up of the lens, the film, and the camera body

4. What creates interest and appeal to those viewing the image? <u>Photo Composition</u>

5. List three rules to improve photo composition.
   1.**Simplicity, Subject-background relationship**
   2.**Framing, Rule of Third**_____
   3.**Centering and symmetry, Lines**_____

6. What is it called when you fix minor mistakes in a photograph by removing minor distractions that might hold the attention of the viewer? **Photo Manipulation**

7. List three elements of photo manipulation.
   1.**Cropping, Resizing**_____
   2.**Red eye, Exposure**_____
   3.**Color**_____

8. Picture Element = **Pixel**

9. T/F An image produced for print needs to be 72 ppi. **False**

10. What color mode should be selected for digital images? **RGB**

Name_____

Photography Unit Post-test
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Photography is the art of taking and processing photographs. _____

2. When using a film camera what creates the printable image?
   a. Lens
   b. Film
   c. Camera body
   d. All of the above

3. Match the type of camera with its characteristic.
   A. Film   ___1. Records images electronically using a built-in processor
   B. Digital   ___2. Three elements combine to create a printable image
                        ___3. Lens refracts light onto a computer chip
                        ___4. Made up of the lens, the film, and the camera body

4. What creates interest and appeal to those viewing the image?_____

5. List three rules to improve photo composition.
   1._____
   2. _____
   3. _____

6. What is it called when you fix minor mistakes in a photograph by removing minor
   distractions that might hold the attention of the viewer? _____

7. List three elements of photo manipulation.
   1. _____
   2. _____
   3. _____

8. Picture Element = _____

9. T/F An image produced for print needs to be 72 ppi. _____

10. What color mode should be selected for digital images? _____

Photography Unit Post-test KEY
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Photography is the art of taking and processing photographs. **True**

2. When using a film camera what creates the printable image?
    a. Lens
    b. Film
    c. Camera body
    d. All of the above

3. Match the type of camera with its characteristic.
   A. Film
   B. Digital

   B 1. Records images electronically using a built-in processor
   A 2. Three elements combine to create a printable image
   B 3. Lens refracts light onto a computer chip
   A 4. Made up of the lens, the film, and the camera body

4. What creates interest and appeal to those viewing the image? <u>Photo Composition</u>

5. List three rules to improve photo composition.
        1. **Simplicity, Subject-background relationship**
        2. **Framing, Rule of Third**
        3. **Centering and symmetry, Lines**

6. What is it called when you fix minor mistakes in a photograph by removing minor distractions that might hold the attention of the viewer? **Photo Manipulation**

7. List three elements of photo manipulation.
        1. **Cropping, Resizing**
        2. **Red eye, Exposure**
        3. **Color**

8. Picture Element = **Pixel**

9. T/F An image produced for print needs to be 72 ppi. **False**

10. What color mode should be selected for digital images? **RGB**

Graphic Design

Graphic Design Unit Pre-test
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. The art or skill of combining text and pictures in advertisements, magazines, or books is
    known as _____

2. T/F A communications message can be greatly enhanced with the right layout and design.
    _____

3. List three basic principles of design.
    1. _____
    2. _____
    3. _____

4. The space between graphics, margins, gutters, space between columns, space between
    lines of type or figures, and objects drawn or depicted is known as
    a. Blank Space
    b. Grey Space
    c. Dead Space
    d. White Space

5. What can be used to effectively communicate complex messages?
    a. Typeface
    b. White Space
    c. Visuals
    d. Contrast

6. T/F Font is a certain style of type that includes all characters in all sizes. _____

7. T/F sans serif means "without feet". _____

8. Which typeface is a serif?
    a. AGRICULTURE
    b. Agriculture
    c. **Agriculture**
    d. *Agriculture*

9. Which typeface is a sans serif?
    a. Agriculture
    b. AGRICULTURE
    c. Agriculture

d.   AGRICULTURE

10. Which typeface is decorative?

    a.   Agriculture

    b.   Agriculture

    c.   **Agriculture**

    d.   *Agriculture*

Graphic Design Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. The art or skill of combining text and pictures in advertisements, magazines, or books is known as **Graphic Design**

2. T/F A communications message can be greatly enhanced with the right layout and design. **True**

3. List three basic principles of design.
    1. **Alignment, Balance _____**
    2. **Contrast, Dominance_____**
    3. **Repetition, White Space_____**

4. The space between graphics, margins, gutters, space between columns, space between lines of type or figures, and objects drawn or depicted is known as
    a. Blank Space
    b. Grey Space
    c. Dead Space
    d. **White Space**

5. What can be used to effectively communicate complex messages?
    a. Typeface
    b. White Space
    c. **Visuals**
    d. Contrast

6. T/F Font is a certain style of type that includes all characters in all sizes. **False**

7. T/F sans serif means "without feet". **True**

8. Which typeface is a serif?
    a. ᗩGᖇIᑕᑌᒪTᑌᖇᕮ
    b. Agriculture
    c. **Agriculture**
    d. *Agriculture*

9. Which typeface is a sans serif?
    a. Agriculture
    b. Agriculture
    c. Agriculture

d. AGRICULTURE

10. Which typeface is decorative?
    a. Agriculture

    b. Agriculture

    c. **Agriculture**

    d. *Agriculture*

Graphic Design Unit Post-test
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. The art or skill of combining text and pictures in advertisements, magazines, or books is known as _____

2. T/F A communications message can be greatly enhanced with the right layout and design. _____

3. List three basic principles of design.
   1. _____
   2. _____
   3. _____

4. The space between graphics, margins, gutters, space between columns, space between lines of type or figures, and objects drawn or depicted is known as
   a. Blank Space
   b. Grey Space
   c. Dead Space
   d. White Space

5. What can be used to effectively communicate complex messages?
   a. Typeface
   b. White Space
   c. Visuals
   d. Contrast

6. T/F Font is a certain style of type that includes all characters in all sizes. _____

7. T/F sans serif means "without feet". _____

8. Which typeface is a serif?
   a. **ΘGRICULTURΘ**
   b. Agriculture
   c. **Agriculture**
   d. *Agriculture*

9. Which typeface is a sans serif?
   a. Agriculture
   b. Agriculture
   c. Agriculture

d. AGRICULTURE

10. Which typeface is decorative?
   a. Agriculture
   b. Agriculture
   c. **Agriculture**
   d. *Agriculture*

Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. The art or skill of combining text and pictures in advertisements, magazines, or books is known as **Graphic Design**

2. T/F A communications message can be greatly enhanced with the right layout and design.
   True

3. List three basic principles of design.
   1. **Alignment, Balance _____**
   2. **Contrast, Dominance_____**
   3. **Repetition, White Space_____**

4. The space between graphics, margins, gutters, space between columns, space between lines of type or figures, and objects drawn or depicted is known as
   e. Blank Space
   f. Grey Space
   g. Dead Space
   h. White Space

5. What can be used to effectively communicate complex messages?
   a. Typeface
   b. White Space
   c. Visuals
   d. Contrast

6. T/F Font is a certain style of type that includes all characters in all sizes. **False**

7. T/F sans serif means "without feet". **True**

8. Which typeface is a serif?
   a. ᴀGRIᴄULTURᴇ
   b. Agriculture
   c. **Agriculture**
   d. *Agriculture*

9. Which typeface is a sans serif?
   a. Agriculture
   b. Aɢʀɪᴄᴜʟᴛᴜʀᴇ
   c. Agriculture

d.   AGRICULTURE

10. Which typeface is decorative?

    a.   Agriculture

    b.   Agriculture

    c.   **Agriculture**

    d.   *Agriculture*

Print Design Layout

Print Layout Design Unit Pre-test
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. The combination of both writing and layout and design is known as

   _____

2. T/F Effective communication with print depends on the quality of both writing and layout
   and design. _____

3. List three things to consider when designing a layout.
   1. _____ _____
   2. _____ _____
   3. _____   _____

4. Match the element of print layout design to its definition.

   1. ____ Nameplate
   2. ____ Leading
   3. ____ Kerning
   4. ____ Headline
   5. ____ Deck
   6. ____ Byline
   7. ____ Graphic
   8. ____ Caption
   9. ____ Margins
   10. ____ Pull Quote
   11. ____ End Sign
   12. ____ Body Copy

   b) Identifies each article in the document and attracts
      the attention of the reader
   c) Includes graphs, charts, tables, illustrations, or
      photos
   d) A quotation or excerpt from the article that is
      typically placed in a larger or distinctive typeface
      on the same page
   e) The space between letters
   f) The banner on the first page
   g) The space above and below the lines of text
   h) One or more lines of text found between the
      headline and the body of the article
   i) Helps to make the graphic meaningful to the reader
   j) Bulk of the layout design
   k) Name of the person who wrote the article
   l) Space around the outside of the page and around
      graphic elements

   a) Used to mark the end
      of a story

5. T/F A photo caption should include the five W's and H in a short sentence or two
   describing a photo or illustration. _____

Print Layout Design Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. The combination of both writing and layout and design is known as **Print Layout Design**

2. T/F Effective communication with print depends on the quality of both writing and layout and design. **True**

3. List three things to consider when designing a layout.
   1**. Audience, Purpose**_____ _____
   2. **Budget, Usability**_____ _____
   3. **Appearance**_____ _____

4. Match the element of print layout design to its definition.

1. **_f_** Nameplate	b) Identifies each article in the document and attracts the attention of the reader
2. **_g_** Leading	
3. **_e_** Kerning	c) Includes graphs, charts, tables, illustrations, or photos
4. **_b_** Headline	
5. **_h_** Deck	d) A quotation or excerpt from the article that is typically placed in a larger or distinctive typeface on the same page
6. **_k_** Byline	
7. **_c_** Graphic	
8. **_i_** Caption	e) The space between letters
9. **_l_** Margins	f) The banner on the first page
10. **_d_** Pull Quote	g) The space above and below the lines of text
11. **_a_** End Sign	h) One or more lines of text found between the headline and the body of the article
12. **_j_** Body Copy	
	i) Helps to make the graphic meaningful to the reader
	j) Bulk of the layout design
	k) Name of the person who wrote the article
	l) Space around the outside of the page and around graphic elements
a) Used to mark the end of a story	

5. T/F A photo caption should include the five W's and H in a short sentence or two describing a photo or illustration. **True**

Print Layout Design Unit Post-test
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. The combination of both writing and layout and design is known as

   _____

2. T/F Effective communication with print depends on the quality of both writing and layout and design. _____

3. List three things to consider when designing a layout.
   1. _____
   2. _____
   3. _____

4. Match the element of print layout design to its definition.

1. ____ Nameplate
2. ____ Leading
3. ____ Kerning
4. ____ Headline
5. ____ Deck
6. ____ Byline
7. ____ Graphic
8. ____ Caption
9. ____ Margins
10. ____ Pull Quote
11. ____ End Sign
12. ____ Body Copy

c) Includes graphs, charts, tables, illustrations, or photos
d) A quotation or excerpt from the article that is typically placed in a larger or distinctive typeface on the same page
e) The space between letters
f) The banner on the first page
g) The space above and below the lines of text
h) One or more lines of text found between the headline and the body of the article
i) Helps to make the graphic meaningful to the reader
j) Bulk of the layout design
k) Name of the person who wrote the article
l) Space around the outside of the page and around graphic elements

a) Used to mark the end of a story
b) Identifies each article in the document and attracts the attention of the reader

5. T/F A photo caption should include the five W's and H in a short sentence or two describing a photo or illustration. _____

Print Layout Design Unit Post-test KEY
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. The combination of both writing and layout and design is known as **Print Layout Design**

2. T/F Effective communication with print depends on the quality of both writing and layout and design. **True**

3. List three things to consider when designing a layout.
   1**. Audience, Purpose**_____
   2. **Budget, Usability**_____
   3. **Appearance**_____
4. Match the element of print layout design to its definition.

1. **f** Nameplate
2. **g** Leading
3. **e** Kerning
4. **b** Headline
5. **h** Deck
6. **k** Byline
7. **c** Graphic
8. **i** Caption
9. **l** Margins
10. **d** Pull Quote
11. **a** End Sign
12. **j** Body Copy

a) Used to mark the end of a story

b) Identifies each article in the document and attracts the attention of the reader
c) Includes graphs, charts, tables, illustrations, or photos
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j) Bulk of the layout design
k) Name of the person who wrote the article
l) Space around the outside of the page and around graphic elements

5. T/F A photo caption should include the five W's and H in a short sentence or two describing a photo or illustration. **True**

Videography

Videography Unit Pre-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Videography is the art or practice of using a video camera. _____

2. This video camera allow recording in multiple formats. For example, a camcorder might record on flash memory and a hard drive at the same time.
   a. AVCHD Camcorder
   b. Flash Memory Camcorder
   c. Hybrid Camcorder
   d. Hard-drive Camcorder

3. What is the purpose of diffusers, gels, and umbrellas?
   a. To directly light an item
   b. To support the lights
   c. To reflect available light to create additional light sources
   d. To modify the intensity and color of a light

4. What type of audio equipment is also known as a lapel microphone?
   a. Omnidirectional
   b. Lavaliere
   c. Unidirectional
   d. Desk

5. This video accessory reduces camera shake._____

6. What is the purpose of a storyboard?
   _____

7. What are the two main parts of a script?
   a. _____

   b. _____

8. A good rule to follow while filming is
   a. Use a microphone
   b. Zoom in
   c. Have adequate lighting
   d. All of the above

9. Adobe Premiere Pro is used for (linear / non-linear) editing

10. How long is a work under copyright?
    a. 50 years after creation
    b. 500 years after creation
    c. 120 years after creation
    d. 150 years after creation

Videography Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Videography is the art or practice of using a video camera. **<u>True</u>**

2. This video camera allow recording in multiple formats. For example, a camcorder might record on flash memory and a hard drive at the same time.
   a. AVCHD Camcorder
   b. Flash Memory Camcorder
   c. Hybrid Camcorder
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   a. To directly light an item
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4. What type of audio equipment is also known as a lapel microphone?
   a. Omnidirectional
   b. Lavaliere
   c. Unidirectional
   d. Desk

5. This video accessory reduces camera shake **<u>Tripod</u>**

6. What is the purpose of a storyboard?
   <u>To help you organize and plan your video</u>

7. What are the two main parts of a script?
   a. <u>Description of each scene explaining the background, scenery, music, and props</u>

   b. <u>Dialogue to be spoken by the actor</u>

8. A good rule to follow while filming is
    a. Use a microphone
    b. Zoom in
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    c. 120 years after creation
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Videography Unit Post-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Videography is the art or practice of using a video camera. _____

2. This video camera allow recording in multiple formats. For example, a camcorder might record on flash memory and a hard drive at the same time.
    a. AVCHD Camcorder
    b. Flash Memory Camcorder
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3. What is the purpose of diffusers, gels, and umbrellas?
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4. What type of audio equipment is also known as a lapel microphone?
    a. Omnidirectional
    b. Lavaliere
    c. Unidirectional
    d. Desk

5. This video accessory reduces camera shake._____

6. What is the purpose of a storyboard?
    _____

7. What are the two main parts of a script?
    a. _____

    b. _____

8. A good rule to follow while filming is
    a. Use a microphone
    b. Zoom in
    c. Have adequate lighting
    d. All of the above

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    c. 120 years after creation
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Videography Unit Post-test KEY
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Videography is the art or practice of using a video camera. **True**

2. This video camera allow recording in multiple formats. For example, a camcorder might record on flash memory and a hard drive at the same time.
   a. AVCHD Camcorder
   b. Flash Memory Camcorder
   c. **Hybrid Camcorder**
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   d. **To modify the intensity and color of a light**

4. What type of audio equipment is also known as a lapel microphone?
   a. Omnidirectional
   b. **Lavaliere**
   c. Unidirectional
   d. Desk

5. This video accessory reduces camera shake **Tripod**

6. What is the purpose of a storyboard?
   To help you organize and plan your video

7. What are the two main parts of a script?
   a. **Description of each scene explaining the background, scenery, music, and props**

   b. **Dialogue to be spoken by the actor**

8. A good rule to follow while filming is
    a. Use a microphone
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10. How long is a work under copyright?
    a. 50 years after creation
    b. 500 years after creation
    c. 120 years after creation
    d. 150 years after creation

Digital Audio Broadcast

Digital Audio Broadcast Unit Pre-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Digital audio broadcast is a system for transmitting visual signals through high-quality stereo. _____

2. Why is digital audio broadcast a valuable outlet for agricultural communicators?
    a. large reach
    b. inexpensive
    c. effective at building public awareness
    d. all of the above

3. What is the purpose of an air check?
   _____
   _____
   _____

4. What free software program can be used for recording and editing audio recordings?
    a. Photoshop
    b. Dreamweaver
    c. Illustrator
    d. Audacity

5. T/F Always use active voice when recording audio podcasts and newscasts. _____

6. Why is it important to develop a broadcast personality when recording podcasts and news casts?
   _____
   _____
   _____

7. When quoting a source in a podcast or newscast always put the attribution at the   (beginning / end) of the sentence. Circle the correct answer.

Digital Audio Broadcast Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Digital audio broadcast is a system for transmitting visual signals through high-quality stereo. **False**

2. Why is digital audio broadcast a valuable outlet for agricultural communicators?
   a. large reach
   b. inexpensive
   c. effective at building public awareness
   d. all of the above

3. What is the purpose of an air check?
   An air check is a recorded and edited audio example of your on-air work. The air check is recorded by the broadcaster in order to listen back to himself or herself to do a self-critique of each recording. The purpose of the air check is for the broadcaster to hear what was done well or not done well so they can continue to get better as an on-air performer.

4. What free software program can be used for recording and editing audio recordings?
   a. Photoshop
   b. Dreamweaver
   c. Illustrator
   d. Audacity

5. T/F Always use active voice when recording audio podcasts and newscasts. **True**

6. Why is it important to develop a broadcast personality when recording podcasts and news casts?
   Developing a personality for digital audio broadcast is one of the most important aspects of recording. You want your audience to be able to identify who you are while staying engaged to what you have to say. Your broadcasting personality will help you to develop a one-on-one relationship with your listeners.

7. When quoting a source in a podcast or newscast always put the attribution at the   (**beginning** / end) of the sentence. Circle the correct answer.

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Digital Audio Broadcast Unit Post-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Digital audio broadcast is a system for transmitting visual signals through high-quality stereo. _____

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   _____
   _____
   _____

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   a. Photoshop
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6. Why is it important to develop a broadcast personality when recording podcasts and news casts?

   _____
   _____
   _____

7. When quoting a source in a podcast or newscast always put the attribution at the (beginning / end) of the sentence. Circle the correct answer.

Digital Audio Broadcast Unit Post-test KEY
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Digital audio broadcast is a system for transmitting visual signals through high-quality stereo. **False**

2. Why is digital audio broadcast a valuable outlet for agricultural communicators?
   a. large reach
   b. inexpensive
   c. effective at building public awareness
   d. all of the above

3. What is the purpose of an air check?
   An air check is a recorded and edited audio example of your on-air work. The air check is recorded by the broadcaster in order to listen back to himself or herself to do a self-critique of each recording. The purpose of the air check is for the broadcaster to hear what was done well or not done well so the they can continue to get better as an on-air performer.

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6. Why is it important to develop a broadcast personality when recording podcasts and news casts?
   Developing a personality for digital audio broadcast is one of the most important aspects of recording. You want your audience to be able to identify who you are while staying engaged to what you have to say. Your broadcasting personality will help you to develop a one-on-one relationship with your listeners.

7. When quoting a source in a podcast or newscast always put the attribution at the   (
   beginning / end) of the sentence. Circle the correct answer.

Social Media

Social Media Unit Pre-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Social media are forms of electronic communication through which users create online communities to share information, ideas, personal messages, and other content.

    _____

2. Agriculturists can now act as what through the use of social media outlets?
    a. Farmer
    b. Consumers
    c. Journalist
    d. Entrepreneurs

3. What is a Web site that contains an online personal journal with reflections, comments, and often hyperlinks provided by the writer called?
    a. Flickr
    b. Pinterest
    c. Blog
    d. YouTube

4. Name two free blog sites.
    1. _____

    2. _____

5. _____ is a social media site for people to share photography.
    a. Flickr
    b. LinkedIn
    c. YouTube
    d. Blogs

6. What is the business-oriented social media site used for networking?
    a. Pinterest
    b. LinkedIn
    c. Flickr
    d. YouTube

7. _____ is a social media site for people to upload, share, and view videos.

8. _____ is a social media site that allows users to create a profile, add friends, post statuses, and upload videos and photos.

9. _____ allows users to post statuses under 140 characters, as well as post photos and videos, while gaining followers and following others.

10. _____ is a virtual pin board where users can share and organize content they find on the Internet and elsewhere.

11. T/F Social media success is measured by the amount of connections made. _____

Social Media Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Social media are forms of electronic communication through which users create online communities to share information, ideas, personal messages, and other content.
    True

2. Agriculturists can now act as what through the use of social media outlets?
    a. Farmer
    b. Consumers
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3. What is a Web site that contains an online personal journal with reflections, comments, and often hyperlinks provided by the writer called?
    a. Flickr
    b. Pinterest
    c. Blog
    d. YouTube

4. Name two free blog sites.
    3. Word Press

    4. BlogSpot

5. _____is a social media site for people to share photography.
    a. Flickr
    b. LinkedIn
    c. YouTube
    d. Blogs

6. What is the business-oriented social media site used for networking?
    a.   Pinterest
    b. LinkedIn
    c. Flickr
    d. YouTube

7. **YouTube** is a social media site for people to upload, share, and view videos.

8. **Facebook** is a social media site that allows users to create a profile, add friends, post statuses, and upload videos and photos.
9. **Twitter** allows users to post statuses under 140 characters, as well as post photos and videos, while gaining followers and following others.

10. **Pinterest** is a virtual pin board where users can share and organize content they find on the Internet and elsewhere.

11. T/F Social media success is measured by the amount of connections made. **True**

Social Media Unit Post-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Social media are forms of electronic communication through which users create online communities to share information, ideas, personal messages, and other content.

   _____

2. Agriculturists can now act as what through the use of social media outlets?
   a. Farmer
   b. Consumers
   c. Journalist
   d. Entrepreneurs

3. What is a Web site that contains an online personal journal with reflections, comments, and often hyperlinks provided by the writer called?
   a. Flickr
   b. Pinterest
   c. Blog
   d. YouTube

4. Name two free blog sites.
   5. _____

   6. _____

5. _____is a social media site for people to share photography.
   a. Flickr
   b. LinkedIn
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Social Media Unit Post-test KEY
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

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   True

2. Agriculturists can now act as what through the use of social media outlets?
   a. Farmer
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11. T/F Social media success is measured by the amount of connections made. **True**

Web Design

Web Design Unit Pre-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Web design is the planning and creation of Websites. _____

2. What should you consider when developing a Website?
   a. Audience
   b. Purpose
   c. Content
   d. All of the above

3. What four elements make a worthy Website?
   1. _____
   2. _____
   3. _____
   4. _____

4. What is the acronym for the language for describing the structure of Web pages?
   a. WWW
   b. CSS
   c. HTML
   d. USDA

5. What is the acronym for the language for describing the presentation of Web pages, including colors, layout, and fonts?
   a. WWW
   b. CSS
   c. HTML
   d. USDA

6. What is the fair use law?
   _____
   _____
   _____

7. T/F It is OK to borrow copyrighted content to use in a Website. _____

8. The business of providing various services, hardware, and software for Websites, as storage and maintenance of site files on a server is known as?
    a. Web designing
    b. Web harboring
    c. Web hosting
    d. Web publishing

9. Match the correct HTML tag to the content it describes
    a. <html>
    b. <body>
    c.
    d. <img>
    e. <p>
    f. <h1>
    g. <font>
    h. <a>
    i. <meta>
    j. <title>
    k. <head>

    1. <b>_____ A container for all the head elements, must include a title for the document and can include scripts, styles, and meta tags.
    2. _____ Defines the title of the document. This title is visible on the tab at the top of the browser.
    3. _____ Typically used to specify page description, keywords, author of the document, last modified, and other metadata. These are not displayed on the page.
    4. _____ Used to define HTML headings.
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    7. _____ Defines a paragraph.
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    10. _____ Defines an image in an HTML page.
    11. _____ Specifies a change in the font.
    12. _____ Bolds the text.

10. What is Adobe product is Web authoring software?
    a. Photoshop
    b. InDesign
    c. Dreamweaver
    d. Illustrator

Name_____

Web Design Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include
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1. T/F Web design is the planning and creation of Websites. **True**

2. What should you consider when developing a Website?
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   c. Content
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3. What four elements make a worthy Website?
   5. **Appearance**
   6. **Content**
   7. **Functionality**
   8. **Usability**

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6. What is the fair use law?
   Limited use of copyrighted material allowed without obtaining permission from rights holder.

7. T/F It is OK to borrow copyrighted content to use in a Website. **False**

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3. What four elements make a worthy Website?
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    10. _____
    11. _____
    12. _____

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Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F Web design is the planning and creation of Websites. **True**

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    14. Content
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6. What is the fair use law?
    Limited use of copyrighted material allowed without obtaining permission from rights holder.

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History

History Unit Pre-test
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. T/F "The exchange of information about the agricultural and natural resources industries through effective and efficient media, such as newspapers, magazines, television, radio and the Web, to reach appropriate audiences." (Telg & Irani,2012) _____

2. Name six forms of media used to communicate agriculture.

   1. _____

   2. _____

   3. _____

   4. _____

   5. _____

   6. _____

3. Match the time period to the agricultural communications advancement. 1700s
   a. Late 1700s
   b. 1800s
   c. 1840s & 1850s
   d. Early 1900s
   e. 1920s
   f. 1940s & 1950s
   g. 1980s to 2000s

   _____ Newspapers began encouraging articles on farming
   _____ Computers dramatically changed the delivery of agricultural messages
   _____ Word of mouth communication between farmers
   _____ Television increases in popularity
   _____ Radio becomes agricultural news medium
   _____ Agricultural magazines and journals circulated

   _____ First agricultural journalism course taught at Iowa State University

   _____ Scientists in colleges of agriculture began writing for publications

4. Agricultural communicators communicate what type of messages about agriculture to consumers, lawmakers and others who impact agricultural policy makers
   a. positive
   b. false

313

c. negative
d. exaggerated

History Unit Pre-test KEY
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T / F, multiple choice, fill in the blank, short answer, and matching.

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2. Name six forms of media used to communicate agriculture.
    1. **Magazines, Periodicals**

    2. **Newsletter, Websites**

    3. **Radio Broadcasts**

    4. **Advertising Campaigns**

    5. **Television Shows**

    6. **Research Reports**

3. Match the time period to the agricultural communications advancement.
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    e. Early 1900s
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    h. 1980s to 2000s

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    8. _____

    9. _____

    10. _____

    11. _____

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4. Agricultural communicators communicate what type of messages about agriculture to consumers, lawmakers and others who impact agricultural policy makers
   a. **positive**
   b. false

c. negative
d. exaggerated

College Preparation

Name_____

College Preparation Unit Pre-test
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. Why should you go to college?
   a. Better pay
   b. Job security
   c. Networking opportunities
   d. All of the above

2. T/F You should establish goals each year to support your college goals. _____

3. T/ F Do not involve your parents / guardians in your college planning. _____

4. _____ build leadership experiences and enhance scholarship opportunities.
   a. Straight A's
   b. Extracurricular activities
   c. Text books
   d. Video games

5. When choosing a college it should:
   a. Offer your degree
   b. Be affordable
   c. Offer Scholarships
   d. All of the above

6. Match the type of financial aid with its description
   1. Loans   4. Working and savings
   2. Need-based financial aid   5. Scholarships
   3. Military programs   6. Grants

   _____Your educational costs exceed your family's resources to cover
           expenses, based on a formula established by the federal government.
   _____Financial support that does not have to be repaid.
   _____Financial support based on merit and may come from government or
   private sources.
   _____Financial support provided with requirement to pay back the money and
   charged interest on the amount.
   _____Offers several options to help pay for college (ROTC, SOC, Veterans).
   _____Work study or non-work study jobs or college savings programs.

Name_____

7. What does FAFSA stand for _____

Name_____

College Preparation Unit Pre-test KEY
Please answer the following questions to the best or your ability. The questions include T / F, multiple choice, fill in the blank, short answer, and matching.

1. Why should you go to college?
    a. Better pay
    b. Job security
    c. Networking opportunities
    d. <u>All of the above</u>

2. T/F You should establish goals each year to support your college goals. **<u>True</u>**

3. T/ F Do not involve your parents / guardians in your college planning. **<u>False</u>**

4. _____ build leadership experiences and enhance scholarship opportunities.
    a. Straight A's
    b. <u>Extracurricular activities</u>
    c. Text books
    d. Video games

5. When choosing a college it should:
    a. Offer your degree
    b. Be affordable
    c. Offer Scholarships
    d. <u>All of the above</u>

6. Match the type of financial aid with its description
    1. Loans
    2. Need-based financial aid
    3. Military programs
    4. Working and savings
    5. Scholarships
    6. Grants

    __**2**__ Your educational costs exceed your family's resources to cover expenses, based on a formula established by the federal government.

    __**6**__ Financial support that does not have to be repaid.

    __**5**__ Financial support based on merit and may come from government or private sources.

    __**1**__ Financial support provided with requirement to pay back the money and charged interest on the amount.

    __**3**__ Offers several options to help pay for college (ROTC, SOC, Veterans).

    __**4**__ Work study or non-work study jobs or college savings programs.

Name_____

7. What does FAFSA stand for? **<u>Free Application for Federal Student Aid</u>**

Name_____

College Preparation Unit Post-test
Please answer the following questions to the best or your ability. The questions include
T / F, multiple choice, fill in the blank, short answer, and matching.

1. Why should you go to college?
    a. Better pay
    b. Job security
    c. Networking opportunities
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2. T/F You should establish goals each year to support your college goals. _____

3. T/ F Do not involve your parents / guardians in your college planning. _____

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    opportunities.
    a. Straight A's
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1. Why should you go to college?
    a. Better pay
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    d. **All of the above**

2. T/F You should establish goals each year to support your college goals. **True**

3. T/ F Do not involve your parents / guardians in your college planning. **False**

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    a. Straight A's
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7. What does FAFSA stand for? **<u>Free Application for Federal Student Aid</u>**

Appendix I

Skill-based Activity Rubrics

Journalistic Writing

News Article Rubric

Student Writers Name _____

Student Editors Name _____

	Points Possible	Points Earned
Topic consistent with prompt	5	
Includes lead using WWWWWH	10	
Includes a quote	10	
Accuracy of information	10	
Approximately 400 words	5	
Correct style (AP)	10	
Correct grammar, spelling, punctuation and word choice	10	
Follows inverted pyramid format	10	
Edited peer article for correct AP style	20	
No-frill writing	10	
Total:	100	

Feature Article Rubric

Student Writers Name _____

Student Editors Name _____

	Points Possible	Points Earned
Topic consistent with prompt	10	
Appropriate title	5	
Correct style (AP)	10	
Correct grammar, spelling, punctuation and word choice	10	
Follows block format	10	
Approximately 500 to 1500 words	5	
Includes feature lead	10	
Includes a quote	10	
Edited peer article for correct AP style	20	
Creativity	10	
Total:	100	

Public Relations

Student Name _____

Press Release Rubric

	Points Possible	Points Earned
Identify upcoming FFA chapter event or agricultural activity	10	
Press release written covering all important information about event	10	
Written in press release format	10	
Correct style (AP)	10	
Information is accurate	10	
Writing is ethical	15	
Grammar, spelling, punctuation and word choice	10	
Organization and format	10	
Included quote with correct attributions	15	
Total:	100	

Photography

Camera Budget Rubric

Student Name _____

	Points Possible	Points Earned
Worked in small group to research the best camera buy	15	
Found camera that covered each of the items on the checklist	15	
Specified chosen camera's qualities under each of the categories	15	
Worked in small group to prepare presentation of chosen camera's qualities	15	
Contributed to presentation on chosen camera	10	
Compared and contrasted chosen camera with top competitor	15	
Adequately explained camera choice with specific references to camera checklist	15	
Total:	100	

Alphabet Photo Rubric

Student Name _____

	Points Possible	Points Earned
Photographed subjects that resembled letters	25	
Each "letter" used to spell high school mascot's name was captured	15	
Specified elements listed of photocomposition used for each letter's photo	15	
Did not take photos of real letters or people spelling them out	30	
Creativity was used in capturing each photo	15	
Total:	100	

Photoshop Rubric

Student Name _____

	Points Possible	Points Earned
Used photo manipulation elements covered in lesson to edit photos from scavenger hunt	30	
Noted at least two editing techniques used for each photo	25	
Printed a high quality version of each edited photo	25	
Saved work as Image1, Image2, etc.	20	
Total:	100	

Graphic Design

Logo Hunt Rubric

Student Name _____

	Points Possible	Points Earned
Searched in magazines and newspapers for prominent companies and their logos	10	
Each of the six basic principles of design represented	30	
Displayed an example of each logo on poster board	15	
Labeled design principles used on each displayed logo	25	
At least five different logos	10	
Presented project to the class	10	
*Bonus	**	
Total:	100	

Logo Development Rubric

Student Name _____

	Points Possible	Points Earned
Identified agricultural product or service	20	
Used paper, markers, scissors, glue etc. to create logo	20	
Explained why the logo was created the way it was	30	
Explained design principles used	30	
Total:	100	

Illustrator Rubric

Student Name _____

	Points Possible	Points Earned
Mission and vision statement for company stated in a text box on the artboard	20	
Used graphic design software to create company logo	40	
Saved logo as a vector	15	
Labeled design principles used on each printed logo on the artboard	25	
Total:	100	

Print Design Layout

Magazine Layout Rubric

Student Name _____

	Points Possible	Points Earned
Chose magazine or with example of layout design	10	
Magazine cover and article displayed in poster board	10	
Each of the 12 components of electronic print design layout labeled	20	
Accuracy in component identification	50	
Explanation of why the layout was chosen	10	
Total:	100	

InDesign Grading Rubric

Student Name _____

	Points Possible	Points Earned
Explained inspiration for layout design	10	
Used layout and design software to create a layout	30	
Layout was one page (8.5 X 11)	15	
Used text and images to enhance the layout	15	
Inserted photo caption	10	
Saved the layout as "Project_Name"	20	
Total:	100	

Explain the inspiration for your layout:

_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____

Videography

Camcorder Budget Rubric

Student Name _____

	Points Possible	Points Earned
Worked in small group to research the best video camera buy	15	
Found video camera that covered each of the items on the checklist	15	
Specified chosen video camera's qualities under each of the categories	15	
Worked in small group to prepare presentation of chosen video camera's qualities	15	
Contributed to presentation on chosen video camera	10	
Compared and contrasted chosen video camera with top competitor	15	
Adequately explained video camera choice with specific references to video camera checklist	15	
Total:	100	

Script Writing Grading Rubric

Student Name _____

	Points Possible	Points Earned
Created full script for the group's planned video	20	
Script writing handout was used as a guide	30	
Jobs determined for entire production crew	25	
Student participated equally in group effort to develop the script and determine crew members	25	
Total:	100	

Premiere Pro Grading Rubric

Student Name _____

	Points Possible	Points Earned
Participated with team members to create one-minute video	10	
Video highlights upcoming FFA chapter event or educates public about agriculture	30	
Video included title slides and music	15	
Video included edited video footage and at least one image	15	
Video enhanced by editing tools learned in Premiere Pro Basics lesson	10	
Presented video to the class	20	
Total:	100	

Digital Audio Broadcast

Audacity Basics Grading Rubric

Student Name_____

	Points Possible	Points Earned
Used a voice recorder to record a 30 second to 1 minute radio spot	20	
Podcast covers topic selected	25	
Includes an interview	30	
Podcast is was well-written and grammatically correct	25	
Total:	100	

Web Design

Dreamweaver Basics Grading Rubric

Student Name _____

	Points Possible	Points Earned
Used Dreamweaver to create web page	20	
Website includes pictures	20	
Website includes hyperlinks	15	
Website is created as a new site with a root folder	15	
Table is used to contain content	15	
Website shows creativity	15	
Total:	100	

History

Positive Communication Grading Rubric

Student Name_____

	Points Possible	Points
Researched and chose an agricultural topic	20	
Identified audience	20	
Explained the importance of communicating the topic	20	
Selected appropriate media and explained how it could be utilized to communicate the topic	20	
Included the groups thoughts on the topic	20	
Total:	100	

Appendix J

Agricultural Communications Curriculum Teacher Perception Qualtrics® Survey

Default Question Block

Did you teach unit(s) from the Agricultural Communications curriculum available on line at http://aect.uark.edu/mobile_classroom.php ? (If no, please explain)

○ Yes

○ No

In which courses did you teach the Agricultural Communications curriculum? (Please list all)

Why did you select the course(s) in which you taught the Agricultural Communications curriculum?

What units of Agricultural Communications curriculum did you teach? (Please check all that apply)

- ☐ Journalistic Writing
- ☐ Public Relations
- ☐ Photography
- ☐ Graphic Design
- ☐ Print Layout Design
- ☐ Videography
- ☐ Digital Audio Broadcast
- ☐ Social Media
- ☐ Web Design
- ☐ History
- ☐ College Preparation

Will you teach these curriculum units in the future? (If no, please explain)

○ Yes

○ No

Were you awarded a stipend to purchase Adobe Creative Cloud?

● Yes

○ No

Did you have access to the Adobe Creative Suite?

◉ Yes

○ No

Which Adobe programs did you use to teach the skills-based lessons of the curriculum? (If no programs were used please explain why)

☑ InDesign

☑ Illustrator

☑ Photoshop

☐ Premiere Pro

☐ Dreamweaver

☑ None

Why did you select the Agricultural Communications curriculum units that you taught?

What aspects of the unit materials did you utilize to teach the concepts in each of the units you taught? (Please check all that apply)

☑ Perkins Activity Form

☑ Lesson Plan

- Unit Pre-test
- Unit Pre-test Key
- Student Notes
- Student Notes Key
- PowerPoint
- Activity Handouts
- Activity Handouts Keys
- Activity Grading Rubrics
- Activity One
- Activity Two (if applicable)
- Activity Three (if applicable)
- Activity Four (if applicable)
- Activity Five (if applicable)
- Activity Six (if applicable)
- Additional Resources

Do you have any comments or revisions pertaining to the existing material available in each Agricultural Communications curriculum unit?

Please list any barriers you encountered while teaching the Agricultural Communications curriculum.

Did the availability of technology and equipment influence which Agricultural Communications curriculum units you selected to teach? (Please explain why or why not)

- Yes

- No

Did you teach the skills-based lessons utilizing the Adobe Creative Suite (Please explain why or why not)

- Yes

⦿ No

Did you use any of the creative pieces developed by your students as promotional pieces?

○ Yes
◉ No

What were the creative pieces used to promote? (Please check all that apply)

☐ Community
☑ Education
☑ School
☐ Agricultural Education Program
☐ FFA Chapter
☑ Event (Please explain)

Did you attend an Agricultural Communications curriculum Inservice during the fall 2013 semester?

◉ Yes
◉ No

Would you attend an Agricultural Communications curriculum inservice in the future?

◉ Yes
◉ No

Do you offer the Agricultural Leadership and Communications course at your school?

○ Yes
◉ No

Are you interested in teaching the Agricultural Leadership and Communications course?

○ Yes

⦿ No

Which Agricultural Communications curriculum units do you plan on teaching in the future? (Please check all that apply)

☐ Journalistic Writing

☐ Public Relations

☐ Photography

☐ Graphic Design

☐ Print Layout Design

☐ Videography

☐ Digital Audio Broadcast

☐ Social Media

☐ Web Design

☐ History

☐ College Preparation

☐ None

Do you believe creativity is key to driving economic growth?

○ Yes

○ No

How valuable is being creative to society?

⦿ Extremely

○ Very

○ Somewhat

○ Not at all

⦿ Not sure

Please indicate to what extent you AGREE or DISAGREE with the following statements.

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	Strongley Disagree	Disagree	Neutral	Agree	Strongly Agree
	1	2	3	4	5
There is increasing pressure to be productive rather than creative at work.					
People are increasingly being expected to think creatively at work.					
Students are becoming more creative as they spend more time online creating what they imagine.					
Being creative is still reserved for the arts community.					
Our creativity is being stifled by our educational system.					
As a culture, we take creativity for granted.					
People over the age of 35 are more creative than younger generations.					

Please indicate to what extent you AGREE or DISAGREE with the following statements.

	Strongley Disagree	Disagree	Neutral	Agree	Strongly Agree
	1	2	3	4	5
I do not have the tools to create.					

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I do not have access to creative tools				
Creative tools are too complex for the average person to use.				
Creative tools are made for artists and designers.				

Please note YOUR INTEREST in each of the specific agricultural communications competencies listed.

	No: Interested		Neutral		Highly Interested
	1	2	3	4	5
Writing					
Communicating to the Public					
Journalistic Writing					
News Writing					
Feature Writing					
Associated Press Style					
Writing For Public Relations					
Writing for Marketing					
Blogging					
Photography					
Photo Editing /					

Manipulation				
Videography				
Video Editing / Manipulation				
Audio Recordings				
Audio Editing / Manipulation				
Creating Promotional Pieces				
Electronic Print Design				
Electronic Layout (newsletters, brochures, etc.)				
Typography				
Graphic Design				
Web Design				
Electronic Curriculum Development				
Radio Broadcast				
Television Broadcast				
Using Social Media for Program Promotion				
Careers in Agricultural Communications				

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History of Agricultural Communications				
Degree Preparation in Agricultural Communications				

What is your age today? (In years)

[ ]

What is your gender?

○ Male

○ Female

What is your ethnicity?

○ African American

○ Asian

○ Caucasian

○ Hispanic

○ Native American

○ Pacific Islander

○ Other

What additional support, content, resources, etc. would you need to be successful teaching the Agricultural Leadership and Communications course? (Please write your comments)

[ ]

Please provide us with additional comments and feedback pertaining to the Agricultural Communications curriculum. (Please write your comments)

[ ]

Additional agricultural communications curriculum and resources can be accessed at:

http://aect.uark.edu/mobile_classroom.php