Agricultural Teacher Perceptions of School Components as Motivational Factors to Continue Teaching and Demotivational Factors to Discontinue Teaching

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ABSTRACT

The purpose of the study was to analyze agricultural education teachers' attitudes toward selected school components as motivational factors to continue teaching and demotivational factors to discontinue teaching. Using a mail questionnaire, the researchers employed a census study of agricultural education teachers in West Virginia (N=90). Researchers used mean scores to assess teachers' perceptions of the selected motivational and demotivational factors. Teachers agreed that: "Having highly motivated students within the agricultural education program;" and "having good classroom and laboratory conditions," were the top motivational factors. The top demotivational factors were: "a lack of student motivation for agricultural education;" and "student discipline problems in classrooms and laboratories."

Introduction and Review of Literature

It is widely recognized that the education profession has experienced an increased demand in the rapid push to prepare students for the 21st century. Although every child has the right to a high quality education, it is not certain that every student will be taught by a teacher that possesses the ambition, goals, and accountability to be an effective educator. Even more of a concern is the growing body of evidence that, given a variety of factors such as an aging teacher workforce and the increase in student enrollment numbers, it is projected that the number of public school teachers will increase to an average of over 300K per year (National Center for Education Statistics, 2011). In the field of agricultural education alone, there has been over a 20% decline in the number of newly qualified agricultural educators produced in addition to numerous agricultural teaching positions nationwide that will not operate due to the lack of a qualified teacher (Kantorvich, 2010). For these and other reasons, teacher retention has become an important agenda item for many school leaders.

Since the No Child Left Behind Act's push to require all schools to man their classrooms with highly qualified teachers, the uphill climb to meet these demands continues to remain steep (Darling-Hammond, 2003; Eppley, 2009). Teacher retention has become a major issue as research indicates that almost 25% of entering public school teachers leave the profession within the first three years (Keigher, 2010). From a demographic perspective, rural teachers (where a large percentage of agricultural education programs exist) tend to leave the teaching profession at a greater percentage compared to city and suburban teachers (Keigher, 2010). In addition, Monk (2007) concluded that rural school districts have difficulty in hiring highly qualified teachers, staffing teachers who are trained to meet the needs of special education students, and meeting the needs of highly mobile children of low-income migrant farm workers. As such, the

growing number of students in public education along with the high number of teacher shortages and turnover reinforces the notion that research is needed to examine what factors influences teacher longevity.

With the increasing amount of shortages of teachers across the education field, there has been a renewed focus in understanding what motivates people to remain active in the profession. However, for the last three decades, much of what is known about teacher motivation has been scarce. Retelsdorf and Gunther (2011, p.1) contributes this lack of knowledge to the "paucity of compelling conceptual frameworks." To further validate this statement, a review of literature regarding teacher motivation research yields a multitude of conceptual and theoretical ideologies such as Dunkin and Biddle's (1974) research on the study of teaching, Krumboltz's (1979) research on social learning theory, Wigfield and Eccles's (2000) work on the expectancy-value theory of achievement motivation, and more recently, Butler's (2007) framework of achievement goal theory for teaching. In addition, the expansion of teacher motivation has included research studies associated with teacher retention and job satisfaction (Walker, Garton, & Kitchel, 2004; Chenevey, Ewing, & Whittington, 2008), and teacher attrition (Boone & Boone, 2009). In a lone study concerning the motivational factors related to agriculture teachers, Dlamini and Vilane (1998) reported that the retention of agriculture teachers was due to the teacher's own achievement (e.g., being able to see the results of their job and being able to successfully execute all of their task related to the job) and positive administrative factors such as (1) administrators promoting efficiency; and (2) promoting good working relationships among colleagues.

Indeed, in the heterogeneity among previous studies, most research in teacher motivation has been equated from a quantitative variable (Ames, 1984; Butler, 2007). In contrast, Ames and Ames (1984) reasoned that teacher motivation can also be conceptualized as a qualitative variable that represents "different value or goal orientations, different ways of processing or attending to information, and different cognitions about one's performance" (p. 535). This interpretation suggests that teachers process information about their behavior in the perspective of a value orientation that gives a level of significance to variable goals related to teaching. According to Ames (1983), this "value-belief" system indicates that teachers select and pursue a goal because attainment of this desirable goal implies something desirable about themselves such as that they are responsible for student achievement (ability-evaluative and task-mastery) and are concerned about the success of their students (moral responsibility). Moreover, studies have shown that goals and values matter because of their ability to create motivational systems associated with qualitative differences that defines and evaluates a teacher's success and how they process information (Ames, 1984; Butler, 2000, 2007). In brief, ability-evaluative goals are associated with the protection of the teachers' self-esteem and self-concept while, in moral responsibility motivational systems, the teacher is concerned with the welfare of the student. In comparison, task-mastery motivational systems orient teachers define and evaluate their ability based on accomplishing new or improving previous task (Ames & Ames, 1989). Although each system has common similarities, teacher ability and effort are ends under the ability-evaluative and moral responsibility systems whereas teacher ability under task-mastery systems focuses on accomplishing valued student goals (Ames & Ames, 1989).

Given the complexity of the issue and the absence of coherent theoretical frameworks, it is clear that an empirical investigation of teacher motivation is needed. Additionally, rather than

relying on the narrow perspectives of previous research that sought to determine teacher motivation in traditional settings, we seek to build on the work of previous studies concerning motivational factors of agricultural education teachers. Moreover, this study also seeks to determine what keeps agricultural education teachers in the profession. Furthermore, with respect to empirical studies in teacher burnout and teacher stress, additional research for concrete solutions to this problem is warranted (Boone & Boone, 2009; Chenevey, Ewing, & Whittington, 2008). At a time when other professions provide higher salaries and greater societal status, it would only make sense that researchers who are concerned about retaining present and future teachers put forth a concentrated effort to understand what it takes to foster teacher longevity. As Porter, Bigley, and Steers (2003) suggest, that to understand human motivation, one must understand "(1) what energizes human behavior; (2) what directs or channels such behavior; and (3) how this behavior is maintained..." (p.1). As such, the novel proposal guiding this study is that examining what factors motivated teachers to continue teaching and what demotivating factors would cause teachers to discontinue their teaching careers is pertinent for the sustainability of agricultural education.

Purpose and Objectives

The purpose of this study was to determine and evaluate agricultural teachers' perceptions on factors they perceived as motivating them to continue teaching in agricultural education programs in West Virginia. Specific objectives were to:

- 1. Describe the factors that motivate agricultural teachers to continue teaching in agricultural education programs in West Virginia.
- 2. Describe the factors that demotivate agricultural teachers to discontinue teaching in agricultural education programs in West Virginia.

Methods

The Institutional Review Board at West Virginia University approved this study. Following Dillman's (2007) *Tailored Design Method* for survey implementation, the researchers implemented a questionnaire using the traditional mailed notification followed by a series of electronic mail (e-mail) reminders. A modified Delphi technique (Dalkey & Helmer, 1963) was used to develop the questionnaire for the study. Because of the shortage of previous research concerning motivational factors of agricultural educators, the researchers selected the Delphi technique because if its ability to achieve a convergence of opinions regarding real-world knowledge solicited from experts within the profession. Furthermore, the researchers elected to implement the modified designed solely to improve initial round response rates and provide solid grounding for the previous and future work of similar research (Custer, Scarella, & Stewart, 1999). Finally, the Delphi technique has been used and is widely accepted in agricultural education research (Ramsey & Edwards, 2011).

To develop the initial questionnaire, the researchers perused current and past research documents (e.g., journal articles, conference proceedings, theses, dissertations, etc.) relating to teacher motivation, job satisfaction, retention, attrition, burnout, and stress. Based on a list of specifications constructed by the researchers and developed from the review of literature, ten emerging themes were selected related to motivational or demotivational factors associated with

teacher longevity. To establish a set of statements prior to the initial round of data collection, the researchers modified and converted the themes into 36 individualized statements (18 motivational, 18 demotivational) applicable to agricultural education. This closed-end modified Delphi technique was chosen to eliminate the possibility of the ambiguous and broad scope of the more traditional Delphi technique and also allowed the researchers to use the pre-established questionnaire to verify its face and content validity prior to sending the first round set to the participants (Hsu & Sandford, 2007; Marchant, 1988). As such, content and face validity were determined by a panel review of university agricultural educators. Reliability of the instrument was conducted and a post-hoc reliability analysis yielded a Cronbach's alpha value of .90. A pilot test was conducted with a panel of seven agricultural teachers not included in the survey. The group provided input regarding the content and direction of the statements, which added to the precision of the instrument.

Regarding the selection of subjects for the Delphi study, a group of five agricultural educators were chosen to serve as expert panelist. The panelists were selected because they were considered to be highly trained and competent within the profession of agricultural education teaching. Likewise, the researchers determined that the five panelists constituted a sufficient representation of opinions for which the researchers could analyze (Ludwig, 1984). Panelists were contacted and notified of their selection and a request was solicited for their participation. All of the panelists selected agreed to participate (100%). Panelists were e-mailed the list of statements immediately after agreeing.

Rounds two and three of the modified Delphi technique consisted of the expert panelists ranking the 36 individualized items using the following scale: 1= strongly disagree, 2 = disagree, 3 = agree, and 4 = strongly agree. Each round consisted of providing the expert panelist with statements from the previous round with the exception of the researchers removing the six lowest ranking statements from the motivational and demotivational list. (i.e., round two = 18 statements, round three = 12 statements). Because of the size of the panel and the consensus among the accuracy of the panelists in agreement of the statements, it was determined that a fourth round was not needed. After the construction of the questionnaire, the researchers were ready to proceed with survey implementation.

The population consisted of all West Virginia secondary agricultural educators as listed by the West Virginia secondary agriculture teacher directory during the 2010-2011 school year (N = 90). Due to the small number of agricultural teachers in the state, a census of the population was conducted. Participants were mailed the questionnaire along with an introductory letter describing the goals and confidentiality of the study. For the remainder of the data collection phase, the researchers sent reminder e-mails every week to encourage participants to complete and return the questionnaire. Nonresponse error was addressed by comparing early respondents to late respondents (Ary et al., 2006). A chi-square test of independence was used to determine whether there was a significant difference between early and late respondents on gender and years of teaching experience. The chi-square values were not significant ($\alpha > .05$). A conclusion that nonrespondents were similar to respondents was drawn (Ary et al., 2006); hence, generalizations could be made to the entire population. The final return rate was 44%.

Results

Table 1 depicts the means and standard deviations for the statements regarding what factors motivated them to continue teaching. The top items on which participants scored the highest mean score were: "Having highly motivated students within the agricultural education program" (M = 3.56, SD = .56), "Having good classroom and laboratory conditions" (M = 3.56, SD = .56), and "Aiding in student success and achievement" (M = 3.53, SD = .65). The top items on which participants scored the lowest mean scores were: "Having positive parent participation" (M = 3.06, SD = .88), and "Having positive community involvement" (M = 3.00, SD = .72). To summarize the information further regarding the motivational factors that encourage teacher longevity, the researchers computed an overall mean score from the 12 items in the scale. The average overall mean of the total group was 3.30 (SD = 63).

Table 1 *Motivational Factors that Influence Agricultural Teachers to Continue Teaching (n = 40)*

Statement	M	SD
Having highly motivated students within the agricultural education program	3.56	.56
Having good classroom and laboratory conditions	3.56	.56
Aiding in student success and achievement	3.53	.65
Administrative support of the agricultural education program	3.47	.59
Having students matriculate through the program	3.39	.73
Providing students with flexibility in their schedules for agricultural education	3.33	.72
course options.		
Availability of funds for updating and maintaining program facilities	3.25	.84
School-wide support of agricultural education program	3.17	.85
Preparing students for future careers in agricultural education	3.17	.61
Recognition of program accomplishments by peers	3.14	.76
Having positive parent participation	3.06	.67
Having positive community involvement	3.00	.72

Note. Scale: Scale: 1.00-1.50 = Strongly Disagree, 1.51- 2.50 = Disagree, 2.51-3.50 = Agree, 3.51- 4.00 = Strongly Agree.

Table 2 depicts the means and standard deviations for the statements regarding what factors that could demotivate them to discontinue teaching. The top items on which participants scored the highest mean scores were: "A lack of student motivation for agricultural education" (M=3.14, SD=.59), "Student discipline problems in classrooms and laboratories" (M=2.94, SD=.72), and "Guidance counselors using agricultural education classes as a dumping ground for low performing students" (M=2.89, SD=.92). The top items on which participants scored the lowest were: "Students not having the desire to participate in the National FFA Organization (M=2.67, SD=.68), "Having a disproportionate number of special needs students in my agricultural education program" (M=2.64, SD=.80), and "A lack of student success at Career Development Events" (M=1.81, SD=.62). To summarize the information further regarding the motivational factors that encourage teacher longevity, the researchers computed an average mean score from the 12 items in the scale. The average mean of the total group was 2.71 (SD=.72).

Table 2Demotivational Factors that Influence Agricultural Teachers to Discontinue Teaching (n = 40)

Statement	M	SD
A lack of student motivation for agricultural education	3.14	.59
Student discipline problems in classrooms and laboratories	2.94	.72
Guidance counselors using agricultural education classes as a dumping ground for low performing students.	2.89	.92
Lack of time to supervise Supervised Agricultural Experiences	2.83	.74
Lack of administrative support	2.81	.79
Lack of instructional materials	2.78	.90
Hostile competition from colleagues to recruit students out of my agricultural education program to their classes and student organizations.	2.75	.77
Lack of parental support	2.69	.86
Paperwork that is required by the administration to complete agricultural related activities	2.67	.76
Students not having a desire to participate in the National FFA Organization	2.67	.68
Having a disproportionate number of special needs students in my agricultural education program.	2.64	.80
A lack of student success at Career Development Events (CDE's)	1.81	.62

Note. Scale: 1.00-1.50 = Strongly Disagree, 1.51- 2.50 = Disagree, 2.51-3.50 = Agree, 3.51- 4.00 = Strongly Agree.

Conclusions and Recommendations

The findings of this research attempts to provide an explanation as to what factors motivate and demotivate agricultural educators in the teaching profession. Research indicates that teacher motivation is directly related to both teacher job satisfaction and job stress (Davis & Wilson, 2000). With the profession's goal to fill the numerous positions that go untaken each year, administrators and career and technical directors, along with teacher educators, may need a better understanding of what factors promote teacher longevity in agricultural education. Such understanding may generate better recruitment and retention guidelines that could be implemented at various stages of a teacher's career. Additionally, a quantifiable understanding of

the dynamics of teacher motivation and demotivation is important to the researchers and experts alike.

In this study we have extended the body of literature on what factors motivate teacher retention and what demotivating factors could cause teachers to discontinue their careers. In undertaking in this study, the researchers sought to examine factors exclusively related to the agricultural education teacher and program. Although the concept for the study can associated with other previous mentioned empirical research, it was the researchers' goal to specifically focus on those factors that were discovered through the Delphi technique implemented in the instrument development phase of this study. As such, the limitations to this study are purposeful by design.

Based on the data analysis, the researchers found that respondents were in agreement with the statements regarding the motivational factors that encourage teacher longevity in agricultural education. Given this finding, considerable efforts should be dedicated towards providing teachers with the necessary information that could encourage teacher retention. One thought would be a series teacher workshops designed to assist teachers in the development of techniques and strategies that could useful in achieving the factors identified in this study. These workshops could provide teachers with an opportunity to engage in peer mentoring with other colleagues in the profession. Research has shown that effective mentoring programs can raise teacher retention rates by improving their attitudes, feelings, and instructional skills (Darling-Hammond, 2003). In addition, increasing the communication opportunities for agricultural education teachers beyond the traditional settings (i.e., conferences, state conventions, etc.) is warranted.

Respondents strongly agreed that having highly motivated students was the top motivational factor in their continuation to teach. This finding adds credibility to similar studies that documented the importance of student achievement towards teacher job satisfaction (Caprara, Barbaranelli, Steca, & Malone, 2006; Tye & O'Brien, 2002). Given the importance of increasing academic performance on both the student and the teacher, it would only make sense that policy makers revisit their agenda and direct more attention toward determining what competencies teachers derive from their profession that allows them to sustain student motivation. Conversely, it would also be advantageous for researchers to examine what students' perceived as having a good teacher. When students thought about teachers they liked, they reported higher levels of learning goals, increased perceptions of ability, and higher perceptions of school being instrumental for both obtaining rewards and receiving recognition than when they thought about teachers they disliked (Montalvo, Mansfield, & Miller, 2007).

In addition to student motivation, respondents were also in agreement that a lack of student motivation was the highest demotivating factor that would influence their decision to discontinue teaching. This finding, in addition to the aforementioned finding, further highlights the importance of having highly motivated students within the agricultural education program. Given the strong evidence, it is critical that school administrators and agricultural education teachers develop recruitment efforts to ensure that the agricultural education program is positively promoted and equally encouraged to all students. The effect that low-performing students have on teachers affects the entire school district. The trickle-down sequence typically

starts with teacher burnout which leads to teacher turnover which subsequently leads to school districts constantly putting money into recruitment efforts and professional support for new teachers (Darling-Hammond, 2003).

Respondents strongly agreed that having good classrooms and laboratories are desirable factors that promote teacher longevity. Indeed, the importance of the quality of school facilities is an important factor that often times goes unnoticed. Anderson (2004) reported that any aspect of the physical environment that distracts teachers from instructional activities does have an impact of their effectiveness. Additionally, Uline & Tschannen-Moran (2006) concluded that teachers may be less passionate about their jobs and less willing to put in the needed effort in helping students learn when they are in inadequate buildings. In agricultural education, this situation would seem to have a double effect since instruction typically takes place in classroom and laboratory settings. Based on the results of this study, it is recommended that teachers and school administrators insist on building a positive maintenance program that would promote functional classroom and laboratory resources. In addition, district policy makers should be made aware of these poor working conditions and concentrated efforts by the school principal and teacher should be developed to advocate improved facilities.

Respondents agreed that student discipline problems in classrooms and laboratories were a demotivational factor in discontinuing their teaching career. Indeed, research has shown that student attitudes and discipline problems are major causes for teacher attrition (Boone & Boone, 2009; Tye & O'Brien, 2002). As such, teachers often find themselves devoting more time to classroom management thus taking focus away from instructional time. Therefore, it is recommended that teachers develop classroom management policies that promotes student cooperation and discourages negative behavior. In addition, it is recommended that teachers consult with parents, counselors, and administrators to create a plan for managing student discipline.

The present article has attempted to lay the foundation for further inquiry in that it sheds light on motivating and demotivating factors regarding agricultural education teachers' longevity in the profession while presenting supporting evidence pertaining to teacher motivation from a career and technical education perspective. We believe the ultimate value of this inquiry is in its contribution toward future studies that focuses on teachers who we presume, are career-long constituents. The present work has primarily examined external related factors. In any adequate foundational study, however, these external factors must be examined to other motivational factors, namely, Tschannen-Moran and Woolfolk Hoy (2001) teacher efficacy. The research reported from this study suggests that student welfare had a noticeable impact of teacher longevity. From our point of view, an important next step is the study of the linkage between student welfare and its impact on the teaching efficacy of career and technical education teachers. However, the development of the study should not be in the context of the traditional quantitative methodology. Instead, a qualitative study that assesses specifically, what do teachers believe are the most critical components in teacher longevity as it relates to students well-being. The end product would be an important source that describes and explains what motivates teachers to have a high tendency to persevere through challenges and undesired results in career and technical education classrooms.

Schools and school districts will continually face the challenge of teacher attrition retention among teachers. Although every school is different, the researchers believe that the dynamics of the motivational factors revealed in this study are transferable across any school or district. Understanding the factors that increase and diminish educators' motivation to remain teaching has a large impact on the agricultural education field. If factors are identified that increases motivation, teacher retention and success rates increase thus minimizing the high cost of attrition and burnout. Although the study highlighted12 motivational factors, it would be irrational to believe that the job satisfaction of teachers can be quantified into short statements.

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