

2015

Exemplary Teachers' Perspectives on Effective Teaching Elements in Danielson's Framework for Teaching

Derek Jon Olson
Walden University

Follow this and additional works at: <http://scholarworks.waldenu.edu/dissertations>

 Part of the [Educational Assessment, Evaluation, and Research Commons](#), and the [Teacher Education and Professional Development Commons](#)

This Dissertation is brought to you for free and open access by the Walden Dissertations and Doctoral Studies Collection at ScholarWorks. It has been accepted for inclusion in Walden Dissertations and Doctoral Studies by an authorized administrator of ScholarWorks. For more information, please contact ScholarWorks@waldenu.edu.

Walden University

COLLEGE OF EDUCATION

This is to certify that the doctoral study by

Derek Olson

has been found to be complete and satisfactory in all respects,
and that any and all revisions required by
the review committee have been made.

Review Committee

Dr. George Smeaton, Committee Chairperson, Education Faculty
Dr. Kathryn Swetnam, Committee Member, Education Faculty
Dr. Richard Hammett, University Reviewer, Education Faculty

Chief Academic Officer

Eric Riedel, Ph.D.

Walden University
2015

Abstract

Exemplary Teachers' Perspectives on Effective Teaching Elements in Danielson's

Framework for Teaching

by

Derek J. Olson

MA, University of St. Thomas, 1994

BA, St. Olaf College, 1988

Doctoral Study Submitted in Partial Fulfillment

of the Requirements for the Degree of

Doctor of Education

Walden University

December 2015

Abstract

Reforms in teacher evaluation are enacted to increase student achievement. Although there is research on teacher evaluation and teacher quality, there is little that addresses effective teaching as conceptualized in Danielson's Framework for Teaching, a commonly used evaluation tool. The purpose of this quantitative study was to determine which of the 4 domains and 76 elements of Danielson's framework are viewed by award-winning teachers as having the greatest impact on effective teaching and learning. Constructivism formed the theoretical basis for this study. The research questions examined to what extent state and national teachers of the year perceive differences in the importance to effective teaching and learning across each of Danielson's 4 domains and across the elements within those domains. A quantitative single-factor within-subject design was utilized. Framework for Teaching Survey importance ratings obtained from state teachers of the year for the past 6 years ($N = 350$) were compared using repeated measure one-way analysis of variances). Significant F values were followed by the Fisher Least Significant Difference Test to determine the domains or elements that significantly differ from one another. Significant differences in the importance ratings were obtained across each of the 4 domains. The instruction domain was rated most important followed by classroom environment, planning and preparation, and professional responsibilities. Findings may facilitate positive social change by enabling schools, districts, and states to more accurately evaluate teachers and devote limited professional development resources to domains and elements with the greatest potential for improving teacher quality.

Exemplary Teachers' Perspectives on Effective Teaching Elements in Danielson's
Framework for Teaching

by

Derek J. Olson

MA, University of St. Thomas, 1994

BA, St. Olaf College, 1988

Doctoral Study Submitted in Partial Fulfillment
of the Requirements for the Degree of
Doctor of Education

Walden University

December 2015

Dedication

I dedicate this to my amazing wife Kris, whose support, encouragement, and understanding has made this journey possible and bearable. I also dedicate it to my wonderful children Kaija, Ben, and Anna, who have had to put up with years of Dad working on his dissertation. Hopefully, research like this increases the likelihood that my kids, and all kids, have a quality teacher in each and every classroom.

Acknowledgments

Thanks to Charlotte Danielson, developer of the Framework for Teaching (upon which this study is based) for her willingness to talk with me, providing direction and ideas. Most importantly I appreciate her work and efforts in provide a means for teachers to grow and improve and better meet the needs of their students.

Thanks to Dr. Tina Sweeley for allowing me to use the Framework for Teaching Survey which she created.

I would like to thank my amazing chair Dr. George Smeaton for all his wise, sage, and timely support, feedback, wisdom, and encouragement. He is a true educator, not to mention an amazing guru of all things quantitative.

I would also like to thank my mentor at Walden, Dr. Kathryn Swetnam, who was also my second committee member. From when she taught my first course at Walden in 2010 until the final period of this dissertation, she has been a constant guide, advisor, encourager not to mention an expert of all things APA and wise in the ways of navigating the doctoral journey.

I truly can't imagine having a better dissertation committee.

Table of Contents

List of Tables	vi
Section 1: Introduction to the Study	1
Introduction.....	1
National Academic Achievement Gap.....	1
Global Achievement Gap.....	4
Teacher Quality, Teacher Evaluation, and the Achievement Gap.....	5
Background to the Local Problem	6
Problem Statement.....	8
Rationale	9
Purpose.....	11
Nature of the Study	12
Research Questions.....	13
Theoretical Framework.....	15
Operational Definitions.....	15
Assumptions.....	17
Limitations	17
Scope and Delimitations	17
Significance of the Study	19
Summary.....	20
Section 2: Literature Review	22
Introduction.....	22

History of Teacher Evaluation	23
Current Trends in Teacher Evaluation	25
Current Models of Teacher Evaluation.....	25
Trend Towards Evaluation for Teacher Development.....	26
Trend Towards Technology in Teacher Evaluation.....	27
Trends in Measurements and Components of Teacher Evaluation	27
Charlotte Danielson’s Framework for Teaching.....	28
Domain 1: Planning and Preparation	29
Domain 2: Classroom Environment.....	30
Domain 3: Instruction	31
Domain 4: Professional Responsibilities	31
Levels of Performance	32
Theoretical Framework: Constructivism	33
Roots of Constructivism	34
Classroom Implications of Constructivism.....	36
Constructivism, Educational Research, and Teacher Evaluation	37
Constructivism and Danielson’s Framework for Teaching	38
Constructivism and a Best Practices Model for Improvement of a Profession.....	38
Summary of the Constructivist Theoretical Framework.....	40
Relationship between Teacher Quality and Student Achievement.....	40
Relationship Between Teacher Evaluation and Student Achievement.....	42

Gap in Practice and Literature	47
Best Practices Model of Improvement.....	49
Methodology	51
Conclusion	53
Section 3 Methodology.....	56
Introduction.....	56
Research Design and Approach	57
Setting and Sample	59
Population	59
Sample Method.....	61
Sample Size.....	62
Instrumentation and Materials	62
Validity	63
Reliability.....	64
Data Collection Procedures.....	64
Data Analysis Procedures	65
Hypotheses.....	65
Analysis.....	66
Ethical Considerations	67
Conclusion	68
Section 4: Results.....	69
Demographics of Respondents	69

Data Analysis	70
Research Question 1	71
Research Question 2	72
Research Question 3	76
Research Question 4	78
Research Question 5	83
Summary of Data Analysis	86
Conclusion	87
Section 5: Discussion, Conclusions, and Recommendations.....	89
Introduction.....	89
Overview.....	89
Interpretation of Findings	91
Research Question 1: Comparisons Across Four Domains	91
Research Question 2: Domain 1: Planning and Preparation.....	93
Research Question 3: Domain 2: Classroom Environment	95
Research Question 4: Domain 3: Instruction.....	97
Research Question 5: Domain 4: Professional Responsibilities.....	99
Limitations	101
Practical Applications	102
Implications for Social Change.....	103
Recommendations for Action	104
Recommended Actions	104

Dissemination	107
Recommendations for Further Study	108
Conclusion	110
References.....	112
Appendix A: Framework for Teaching Survey	134
Appendix B: Permission to Use Framework for Teaching Survey.....	139
Appendix C: Permission to Use NNSTOY Database.....	140
Appendix D: Letter from MN Commissioner of Education	141

List of Tables

Table 1 *Descriptive Characteristics of the Study's Participants* 70

Table 2 *Domain Means and Standard Deviations Ordered by Mean Importance Rating* 71

Table 3 *Domain 1 Means and Standard Deviations Ordered by Mean Importance Rating*
..... 75

Table 4 *Domain 2 Means and Standard Deviations Ordered by Mean Importance Rating*
..... 77

Table 5 *Domain 3 Means and Standard Deviations Ordered by Mean Importance Rating*
..... 82

Table 6 *Domain Four Means and Standard Deviations Ordered by Mean Importance
Rating* 85

Table 7 *Top 3 Elements of Domain 1: Planning and Preparation Ordered by Mean
Importance Rating* 94

Table 8 *Top 3 Elements of Domain 2: Classroom Environment Ordered by Mean
Importance Rating* 96

Table 9 *Top Four Elements of Domain 3: Instruction Ordered by Mean Importance
Rating* 98

Table 10 *Top Four Elements of Domain 4: Professional Responsibilities Ordered by
Mean Importance Rating* 100

Section 1: Introduction to the Study

“And this is our present purpose: to discover, so far as possible, what elements enter into the making of a capable teacher.”

- J. L. Meriam, Teachers College Contributions to Education No. 1 (1906)

Introduction

There is an academic achievement gap in the United States (Coggshall, Rasmussen, Colton, Milton, & Jacques, 2012; Doerr, 2012; Kane & Staiger, 2012; National Council on Teacher Quality, 2011; Taylor & Tyler, 2012). This national disparity in academic performance is both socioeconomic and geographic in nature (Coggshall et al, 2012; Doerr, 2012; Kane & Staiger, 2012; Taylor & Tyler, 2012). In addition, there is a global achievement gap with U.S. students academically performing significantly below those in many other countries (Markow & Pieters, 2012; National Council on Teacher Quality, 2011).

National Academic Achievement Gap

Based on National Assessment of Educational Progress (NAEP) data, ethnic minority students in the United States are on average 4 years behind White counterparts by the time they reach 12th grade (National Governor’s Association, 2013). Hispanic students perform approximately 20 points lower than White students on 4th and 8th grade reading and math NAEP tests nationally (Hemphill & Vanneman, 2011). Black students perform 26 points lower on those same tests in reading and math than White students (National Center for Educational Statistics, 2011; Vanneman, Hamilton, Anderson, &

Rahman, 2009). Academic achievement levels are not consistent between states. Based on NAEP data, students in Massachusetts, the number one ranking state in reading, had greater than twice the number of students ranked proficient or higher than Mississippi, the lowest ranking state (National Governor's Association, 2013). In mathematics Alabama's and Mississippi's scaled NAEP scores are 30 points lower than the leading state of Massachusetts (National Center for Educational Statistics, 2011). State growth gains in 2012 were six times greater in some states than in others (Hanushek, Peterson, & Woessmann, 2012).

The National Governors Association (2013) stated that this academic achievement gap that exists among race, class, and geographic region is among the most pressing education-policy challenges facing states. Because of this disparity in academic performance, the Common Core State Standards, which are currently being implemented across the country, were developed with the primary mission of ensuring that eventually every American child, in every zip code and of every race, has access to a quality education that will leave them prepared for a successful future (National Governors Association Center for Best Practices & Council of Chief State School Officers, 2012). Shrinking the achievement gap is critical because academic achievement greatly influences the life chances of a student, impacting a student's professional and career opportunities, social mobility, and even self-esteem and self-identity (Bandura, Barbaranelli, Caprara, & Pastorelli, 2001). Shrinking the achievement gap is not only important to the rights of individual students, but also to society as a whole. In addition to the obvious social issue of equality, a quality education is statistically linked to economic

outcomes such as higher income and social outcomes, such as a lower chance of teenage pregnancy and incarceration (Economist Intelligence Unit, 2012). Regarding income, according to the U.S. Census Bureau (2012), students who do not graduate with a quality K-12 education have a mean income of \$20,000 whereas those who graduate from high school and college and have a professional degree average \$120,000. Regarding the social savings of crime reduction related to education, a 1% increase in high school graduation rates among men could result in as social savings in as much as \$1.4 billion (Belfield & Levin, 2007). Teen birth rates have been attributed to relative access to education (Basch, 2011). Teen mothers are 38% less likely to have graduated with a high school degree. The average annual cost to U.S. taxpayers of teenage childbearing is approximately \$7.3 billion (Hoffman & Maynard, 2008).

Public schools were originally mandated based on the recognition that for a democracy to flourish there needs to be an educated work force that can perform competently and an educated populace that can vote intelligently (Dewey, 1916; Jefferson, 1786; Kahlenberg, 2012; Washington, 1784). If a significant number of students are not graduating and fail to achieve minimum academic standards, both these requirements to a successful democracy are in jeopardy. In regard to the economy, according to a report by the international consulting firm McKinsey (2009), the current achievement gap has “created the equivalent of a permanent, deep recession in terms of the gap between actual and potential output in our economy” (p. 5). McKinsey estimated that closing the achievement gap in the United States between White students and Black and Hispanic students could increase gross domestic product (GDP) by up to \$525 billion

or 4% of total GDP. Likewise raising the achievement of students whose families earn less than \$25,000 to that of students whose families earn more could increase GDP by up to \$670 billion or 5% of total GDP (McKinsey, 2009; Tomsho, 2009).

Global Achievement Gap

The achievement gap extends internationally. According to the most recent data from the Organization for Economic Cooperation and Development's (OECD, 2013) Programme for International Student Assessment (PISA), U.S. students are currently ranked 20th in reading and 30th in math compared to students in countries around the world. Students in India, China, Finland, Korea, and other countries consistently outscore U.S. students who only rank average in reading and below average in math (OECD, 2013). The most recent United States average scores are not measurably different from prior PISA assessment United States' results (OECD, 2011; Kelly et al., 2013). In the key area of technology, there are approximately 70,000 engineering graduates in the United States, compared to 350,000 in India and 600,000 in China (Wadhwa, Gereffi, Rissing, & Ong, 2007). In terms of actual academic growth, in 2012 U.S. students ranked 25th (Hanushek et al., 2012).

The economic costs of this gap are significant. U.S. students are competing for jobs both nationally and internationally (Friedman, 2007). Unfortunately, they are not being educated as well as those in other countries. Correlational studies link national student achievement to national income, with higher national 8th grade (PISA) test results relating to higher national GDP (Economist Intelligence Unit, 2012). Hanushek and Woessmann (2012) found that cross-country growth regressions generated a close

relationship between a country's educational achievement and GDP growth that is stable, with one standard deviation in a nation's test scores associated with a 2% gain in GDP growth rate. In terms of dollars, shrinking the global achievement gap between the United States and the highest performing nations could increase GDP by as much as \$2.3 trillion, or 16% (McKinsey, 2009). The American Legislative Exchange Council's 2013 Report Card on American Schools referred to the global achievement gap in the United States as "international evidence of a national disgrace" (Ladner & Myslinski, 2013, p. 28). The final report of an independent task force launched by the Council on Foreign Relations, and chaired by former Secretary of State Condoleezza Rice, emphasized that "current educational failure puts the United States' future prosperity, global position, and physical safety at risk" (Rice & Klein, 2012, p. 4).

Teacher Quality, Teacher Evaluation, and the Achievement Gap

Improving the quality of teachers, especially in areas where student achievement is low, is one way to address the achievement gap (Darling-Hammond, 2010; Fullan, 2009; Gates, 2012; Markow & Pieters, 2010; Marshall, 2009). New federal initiatives, most notably the No Child Left Behind Act of 2001 (2002) and Race to the Top (U. S. Department of Education, 2010) have increased the national focus on teacher accountability and teacher evaluation (Coggshall et al., 2012; Darling-Hammond, 2010; Doerr, 2012; Kane & Staiger, 2012; Markow & Pieters, 2012; National Council on Teacher Quality, 2011; Taylor & Tyler, 2012). As a result many states have passed new statutes mandating increased and revamped teacher evaluation programs. Danielson's (2013) Framework for Teaching is the most commonly used tool for teacher evaluation

(Teachscape, 2012). Although there is much research on teacher evaluation and teacher quality, there is little that addresses the 76 components of effective teaching in Danielson's framework from the perspective of those teachers who have been recognized as being effective. The purpose of this study was to determine which elements of Danielson's (2013) framework those teachers who have been recognized as effective perceive to most impact effective teaching and learning. The findings can be beneficial to school districts across the United States to more accurately evaluate teachers and promote teacher development, which may result in improving teacher quality.

Background to the Local Problem

From 2009 to 2013 the number of states requiring yearly evaluation of teachers rose from 12 to 39 and that number is projected to rise further (National Council on Teacher Quality, 2012). Like many states, Minnesota has passed a new law mandating districts put a teacher evaluation process in place by 2015 (Minnesota Statute 122A.40, subs.4, 5, 8, 9, 2012). Although districts have teacher evaluation programs, currently no district in Minnesota is implementing a teacher evaluation plan that meets all the requirements of this new statute (Minnesota Department of Education [MDE], 2013b).

As of the 2013-2014 school year, the state of Minnesota includes 1,987 schools divided into 333 public school districts that serve a population of 824,000 K-12 students who are taught by 65,781 licensed educators (MDE, 2013a). Those educators each need to be evaluated in a manner consistent with the new legislation. This is especially challenging because there are multiple approaches to defining and evaluating teacher quality which makes it even more difficult for administrators in Minnesota and across the

country to recognize and accurately evaluate effective teaching (Kimball & Milanowski, 2009; Looney, 2011; Pallas, 2011).

Districts in Minnesota can either create their own model that meets statute criteria or use the default model created by the Minnesota Department of Education (MDE, 2013b). There are three main components to the default model: student achievement and growth (35% of a teacher's yearly summative evaluation), student engagement (20%), and teacher practice (45%). The teacher practice component is primarily based on observations by a trained administrator (MDE, 2013b). The rubric for those observations, as well as self-assessments and peer reviews, are based on Danielson's (2013) Framework for Teaching. The Framework for Teaching consists of four domains divided into 22 components, which are further broken down into a total of 76 elements (Danielson, 2013).

It is challenging for districts to effectively implement the requirements of the new law for the intended purposes of evaluating teachers and promoting teacher effectiveness using the Framework for Teaching. Danielson (2011a) pointed out that a credible system of teacher evaluation requires evaluators to have a high level of proficiency with the tool. In addition, those being evaluated should have a high level of understanding of the tool. These two requirements help increase assessment accuracy, provide meaningful feedback, and promote increased teacher effectiveness. Danielson's (2011a) research indicated that it takes extensive training and practice for evaluators to demonstrate effective use of the Framework for Teaching and provide a consistent level of inter-rater reliability. Other researchers have also found that effective use of the Framework for

Teaching can be achieved and even linked to student achievement, although extensive training and understanding of the observation tool is necessary for this link to occur (Kane & Staiger, 2012; Sartain, Stoelinga, & Brown, 2011). For example, it is difficult to observe all 76 elements in one classroom observation effectively and to know which elements to focus on (Danielson, 2011a; Doerr, 2012; Kane & Staiger, 2012).

The intended goals of teacher evaluation programs are both to evaluate teachers and to use the information gathered to promote teacher development; increase teacher effectiveness; and therefore, raise student achievement (Doerr, 2012). For an observation tool to effectively accomplish this second goal, it is important that the teacher being evaluated understands the tool and believes it to be an accurate and valid measure of teacher effectiveness (Benedict, Thomas, Kimerling, & Leko 2013). It is also important to know which components within a tool most impact teacher effectiveness (Kane & Staiger, 2012).

Problem Statement

There is an achievement gap in the United States (Darling-Hammond, 2013; Looney, 2011; Mangiante, 2011; Rothstein, 2010). This national disparity of academic performance has created an increased demand for teacher quality, which is a key factor in student achievement (Darling-Hammond, 2013; Gates, 2012; Markow & Pieters, 2010; Marshall, 2009). To address this issue, the state of Minnesota, as well as many other states, has passed a new teacher evaluation statute. The state's default model uses Danielson's (2013) Framework for Teaching as the basis for the teacher observation tool. The Framework for Teaching is critical in the effects it will have on the teachers, and the

evaluation of those teachers, in districts across the state of Minnesota. In light of the increased focus on teacher evaluation and use of Danielson's Framework for Teaching around the country, researchers have surveyed teachers in different districts and found that teachers agreed that the four domains in Danielson's Framework for Teaching are effective indicators of teaching and learning (D'Alfonso, 2006; Doerr, 2012; Sweeley, 2004). However, those researchers disagree on which of the 76 components within the four domains of Danielson's (1996) Framework for Teaching most impact teacher effectiveness (D'Alfonso, 2006; Doerr, 2012, Kane & Staiger, 2012; Sweeley, 2004). In addition, no researchers have studied to what extent teachers who have been recognized as highly effective agree that each of the domains and elements of Danielson's (2013) Framework for Teaching impact teacher effectiveness. Without consensus of which of the 76 components are most important, the implementation of the Framework for Teaching will be less effective than it could be in accurately evaluating teachers and promoting teacher development, for the ultimate purpose of raising student achievement.

Rationale

Danielson's (2013) Framework for Teaching is used across the world, the nation, and in the state of Minnesota as a teacher observation tool (Danielson, 2013; Kane & Staiger, 2012; Teachscape, 2012). The Framework for Teaching is a research-based set of elements of instruction rooted in a constructivist paradigm of teaching and learning (Danielson, 2007). It divides the complex process of teaching into 22 components grouped into four domains of teaching: planning and preparation, classroom environment, instruction, and professional responsibilities (Danielson, 2013). Those components are

further broken down into 76 elements (Danielson, 2013). Currently, 16 states have adopted the Framework for Teaching as a state-wide teacher evaluation rubric, it is one of several sanctioned rubrics in nine other states, and is used in many districts in those states which have not mandated a specific statewide requirement (Teachscape, 2012). The Minnesota Department of Education estimates that currently over two thirds of districts in the state of Minnesota base their current teacher observation protocols on the Danielson framework (MDE, 2013c). The Department of Education (2013c) also projects that as districts adopt plans that meet the new state teacher evaluation legislation more than 50% will base their new evaluation plan on the state's default model that uses a Danielson-based rubric for teacher observation.

The Danielson tool is widely used because it is accepted as one of the most effective teacher evaluation tools available. Teachers ranking as highly effective on the framework by a trained observer have been linked to students with higher achievement (Kane & Staiger, 2012; Sartain, Stoelinga, & Brown, 2011). Nevertheless, there is a gap in research as to which of the 76 elements most impact teacher effectiveness and, therefore, student achievement. Research is needed to determine which of the 76 elements are most important to help districts effectively and efficiently use the tool as part of an overall teacher evaluation program that identifies effective teaching, promotes the development of effective teachers, and increase student achievement (Bransford, Brown, & Cocking, 2000; Danielson 2011a; Doerr 2012; Kane & Staiger, 2012; Varlas, 2012).

In a study of over 1,000 teachers, Kane and Staiger (2012) argued that when evaluators are overburdened by the challenge of tracking many different skills at once, their powers of judgment could decline. They suggested further research on the competencies themselves, the numbers of competencies observers are asked to track, and which competencies can improve teaching. Regarding further research, Bransford (2000) pointed out that the research on effective teaching is still incomplete; although the framework has been constructed from prior research, details are still needed to advance the science of teaching and learning.

Purpose

Teachers who are recognized as exemplary are well positioned to address teacher effectiveness (Bransford et al., 2000; Carless, Salter, Yang, & Lam, 2011; D'Alfonso, 2006; Dikkers, 2012; Goldacre, 2013; Javidi, Downs, & Nussbaum, 1988; Keller, 2005; Kember, 2009; Whitaker, 2012; Worley, Titsworth, Worley, & Cornett-DeVito, 2007). The purpose of this study was to examine award-winning teachers' perspectives toward the importance of the elements in Danielson's Framework for Teaching on effective teaching. In this study I surveyed state teachers of the year from throughout the United States from the past 6 years. As policy makers and administrators at local, state, and national levels attempt to make decisions concerning teacher effectiveness and how it is evaluated, teachers, especially those who have been recognized as highly effective, are in an excellent position to contribute to the conversation (Cole & Ishiyama, 2008; Gates, 2012; Markow & Pieters, 2010, Worley et al., 2007). Their perceptions could help shape

effective utilization of teacher-evaluation programs including those based on Danielson's (2013) framework. However, there is little research on this topic.

Nature of the Study

The proposed research design for this study was a quantitative single-factor within-subjects design (Keppel, 1982). The population was award-winning teachers, specifically state teachers of the year. The sample was state teachers of the year, from all 50 states, from the past 6 years. I collected data through a survey administered via email using Survey Monkey distributed through the National Network of State Teachers of the Year (NNSTOY) database.

The survey utilized an existing survey instrument: Framework for Teaching Survey (Appendix A). Sweeley (2004) developed the survey for a study on teachers' attitudes towards Danielson's four domain areas in a Pennsylvania school district adopting Danielson's framework. It has been used since then in other studies (D'Alfonso, 2006; Doerr, 2012). The survey uses a Likert scale including these choices: strongly agree, agree, disagree, strongly disagree, and do not understand. It includes one question for each element of the framework and eight background questions.

Data were analyzed using SPSS statistical software. Descriptive statistics and repeated measure one-way Analysis of Variances (ANOVA) were conducted to assess the significance of differences in mean importance ratings obtained for each participant for the four domains of Danielson's (2013) framework as well as for the individual elements of each domain. Significant *F* values were followed by post-hoc tests to

determine the domains or elements that significantly differ from one another. The nature of the study and methodology will be explained in full in Section 3.

Research Questions

Research Question 1: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of Danielson's four domains?

H_01 : There is no difference in the extent to which award-winning teachers believe each of Danielson's four domains is important to effective teaching and learning.

H_a1 : There is a difference in the extent to which award-winning teachers believe each of Danielson's four domains is important to effective teaching and learning.

Research Question 2: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 23 elements in Danielson's planning and preparation domain?

H_02 : There is no difference in the extent to which award-winning teachers believe each of the 23 elements in Danielson's Domain 1 (planning and preparation) is important to effective teaching and learning.

H_a2 : There are differences in the extent to which award-winning teachers believe each of the 23 elements in Danielson's Domain 1 (planning and preparation) is important to effective teaching and learning.

Research Question 3: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 15 elements in Danielson's classroom environment domain?

H_03 : There is no difference in the extent to which award-winning teachers believe each of the 15 elements in Danielson's Domain 2 (classroom environment) is important to effective teaching and learning.

H_a3 : There are differences in the extent to which award-winning teachers believe each of the 15 elements in Danielson's Domain 2 (classroom environment) is important to effective teaching and learning.

Research Question 4: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 18 elements in Danielson's instruction domain?

H_04 : There is no difference in the extent to which award-winning teachers believe each of the 18 elements in Danielson's Domain 3 (instruction) is important to effective teaching and learning.

H_a4 : There are differences in the extent to which award-winning teachers believe each of the 18 elements in Danielson's Domain 3 (instruction) is important to effective teaching and learning.

Research Question 5: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 20 elements in Danielson's professional responsibilities domain?

H_05 : There is no difference in the extent to which award-winning teachers believe each of the 20 elements in Danielson's Domain 4 (professional responsibilities) is important to effective teaching and learning.

H_a5: There are differences in the extent to which award-winning teachers believe each of the 20 elements in Danielson's Domain 4 (professional responsibilities) is important to effective teaching and learning.

Theoretical Framework

Danielson's (2013) Framework for Teaching is rooted in the constructivist theory of learning developed by Dewey, Piaget, and Vygotsky (Danielson, 2007; Doerr, 2012; Kane & Staiger, 2012). Therefore, constructivism formed the theoretical basis for this study. Constructivism has its roots in the functional psychology of Dewey (1916), Vygotsky's (1978) focus on the importance of social interaction on cognitive development, the classroom implications of Piaget's (1952) stage theory of intellectual development, and the cognitive psychology works of Bruner (1986). Central to the theory of constructivism is the idea that human learning is not passive, but an active process of constructing meaning in the world around us, and that knowledge is constructed in the mind of the learner (Dewey, 1938; Piaget, 1952; Vygotsky, 1978). Additionally, the constructivist idea that existing knowledge is used to build new knowledge supports the theory that best practice can inform future practice of others within a profession. Constructivism, both in how individuals learn and how professions can be improved, will form the theoretical basis for this study and will be fully discussed in Section 2.

Operational Definitions

Danielson's Framework for Teaching: A framework for the supervision and evaluation of teachers (Danielson, 2013).

Danielson's four domains: The professional practice and responsibilities divisions in Danielson's Framework for Teaching: planning and preparation, classroom environment, instruction, and professional responsibility. These domains are further divided into components and elements of instruction (Danielson, 2013).

Minnesota Statute 122A.40, subds.4, 5, 8, 9, 2012: New statute that outlines new state requirements related to teacher evaluation (MDE, 2013b).

National Network of State Teachers of the Year: Organization of teachers of the year from all 50 states and the District of Columbia, American Samoa, Guam, Northern Mariana Islands, the U.S. Virgin Islands, and the Department of Defense Education Activity (Council of Chief State School Officers, 2013) .

No Child Left Behind Act of 2001 (NCLB): This act, created by Congress and signed by President George W. Bush, amended the Elementary and Secondary Education Act (ESEA). It redefined the role of the federal government in the public education with a focus on student achievement. It is divided into four sections: stronger accountability for results, increased local control, expanded education option for parents and students, and emphasis on teaching methods proven to be successful (No Child Left Behind [NCLB], 2002).

Nontenured teacher: In Minnesota, probationary teachers licensed by the state with less than 3 years experience in one district (Minnesota Department of Education, 2013).

Tenured teacher: Teachers licensed by the state of Minnesota who have signed a fourth contract in the same district (Minnesota Department of Education, 2013c).

Value-added assessment: Measurement of effective teaching using student growth based on test scores (Benedict, Kimerling, & Leko, 2013).

Assumptions

The following assumptions are associated with this study:

1. State teachers of the year have been vetted and chosen by their local community in a manner that assures they are worthy of recognition for exemplary teaching and that their practices are considered models of effective practice.
2. Teachers answered survey questions honestly and responses will accurately represent respondents' perceptions.

Limitations

In this quantitative study, survey questions were limited to Likert style items, which does not allow respondents to explain answers, comment, or provide clarification. Also, because respondents might not have answered survey questions with candor, results might not correctly reflect the views of all members of the targeted population. In addition, some respondents could have stated inaccurate information through acts, or omission, or inadequate reporting. The lack of a probability sampling technique using a random sample significantly limits the ability to generalize the results of this study (perspectives of teachers of the year) to the perspectives of teachers outside the teacher of the year population.

Scope and Delimitations

In terms of the local problem, the boundary for this study was the state of Minnesota. There are several rationales for this boundary. In terms of the population

surveyed, the boundary for my study is members of the National Network of State Teachers of the Year (NNSTOY). In terms of participants, this study was delimited to state teachers of the year from the past 6 years. Other groups of award-winning teachers and teachers who have demonstrated effectiveness in other ways were excluded from the study. In terms of effective teaching frameworks, this study was delimited to award-winning teachers' perspectives on the elements of effective teaching as represented specifically in the four domains and 76 elements in Danielson's Framework for Teaching. Other models and other representations of the characteristics of effective teaching were excluded.

Teachers' perspectives were measured on a Likert-type scale with the Framework for Teaching Survey (Sweeley, 2004), which is an instrument designed specifically for assessing teacher perspectives on the Framework for Teaching. To ensure manageability of data, survey questions were limited to Likert-type items and did not include open-ended questions. Also interviews were not included for the same reason.

The results (perspectives of award-winning teachers in the sample) are not generalizable to the perspective of teachers outside the teacher of the year population. However, the results may still be very beneficial in informing those making decisions about using the Framework for Teaching in the most effective manner to evaluate teacher effectiveness and increase teacher quality. In addition, sampling state teachers of the year award recipients provides a unique, high performing group for better understanding the operationalization of Danielson's Framework for Teaching.

Significance of the Study

The significance of this study was to determine which elements in the four domains of Danielson's (2013) framework those teachers who have been recognized as being highly effective perceive to most impact effective teaching and learning. The findings from this study may be the basis for a professional development workshop to support the many districts across Minnesota that are required to implement a teacher evaluation program based on Danielson's framework to meet the new state statute as part of the nation-wide effort to increase teacher quality and raise student achievement.

A better understanding of the teacher evaluation tool used in schools across America can contribute to positive social change. There is a significant achievement gap in America (Darling-Hammond, 2010; Fullan, 2009; Mangiante, 2011). Because teacher quality has a significant impact on student achievement (Baker, Oluwole, & Green, 2013; Darling-Hammond, 2013; Looney, 2011), every child in America deserves a quality teacher. Improving the quality of teachers in Minnesota and across the country, especially in areas where achievement is low, is one way to address the achievement gap (Baker et al., 2013; Darling-Hammond, Amrein-Beardsley, Haertel, & Rothstein, 2011; Mangiante, 2011). By asking those teachers who have been recognized as effective what are the most important elements of teaching and learning, evaluation tools such as Danielson's (2013) Framework for Teaching can be more accurately used to not only identify the quality of teachers, but to promote teacher growth and therefore increased student achievement.

Summary

There is an increased focus on teacher quality in the United States as one way to address the achievement gap. This increased focus has led to a rising demand for teacher evaluation. Teacher evaluation programs are designed to both assess teachers and provide opportunity for professional growth, hopefully leading to an increase in teacher quality. Like many states, Minnesota has a new law requiring specific teacher evaluation criteria. The default teacher observation tool is based on Danielson's (2013) Framework for Teaching, which is the most common evaluation tool in U.S. school districts across the country. The problem is that researchers do not agree on which of the elements in Danielson's (2013) Framework for Teaching most impact teaching and learning. In addition, no researchers have studied the perspectives of exemplary teachers on the domains and elements of Danielson's (2013) Framework for Teaching. The purpose of this quantitative study was to survey award-winning teachers, specifically state teachers of the year, on their perspectives of the impact on effective teaching and learning of the four domains and the 76 elements in Danielson's (2013) Framework for Teaching. The results of this study will add to the body of literature on the characteristics of effective teaching. The findings can be beneficial to school districts across Minnesota to more accurately evaluate teachers and promote teacher development, which can result in improving teacher quality.

In Section 2 I review the body of literature on topics related to teacher evaluation, Danielson's (2013) Framework for Teaching, and the use of best practices for teacher improvement. Section 3 addresses the methodology of the study, focusing on design,

population, and instrumentation. Section 4 focuses on analysis of the data gathered related to all research questions. Section 5 presents conclusions and recommendations for further research.

Section 2: Literature Review

Introduction

In this section, I begin with literature on the history of teacher evaluation and move to current trends in teacher evaluation. I then specifically address Danielson's (2013) Framework for Teaching. This is followed by an in-depth look at the literature of constructivism, which is the foundation for Danielson's work and the theoretical framework of this study. I will then explore research on the relationship between teacher evaluation and student achievement. Gaps in practice as described in the literature and gaps in the literature related to teacher evaluation will be described. This leads to a discussion of a best practices model of improvement, both within the profession of education and in other professions, and of using award winning teachers to inform educational decisions. Finally, I present a research survey methodology that will be used in this study. Understanding the literature on these topics is important to this study.

Search strategies included utilizing multiple databases: Education Complete, ERIC, Sage, ProQuest, and Google Scholar. I used the following search terms: *teacher evaluation, effective teaching, award-winning teachers, Framework for Teaching, Charlotte Danielson, best practices, student achievement, and achievement gap*. Combining these key terms in multiple ways provided more precise and targeted results. In addition to current, peer-reviewed journal articles, I included books, white papers, archival material, and governmental reports when appropriate. I continued my searches, reading, and synthesis with the goal of reaching saturation in the current literature on teacher evaluation.

History of Teacher Evaluation

Teacher evaluation has changed over the past half century. In the 1940s and 1950s, teacher evaluation focused on teacher traits such as appearance, warmth, enthusiasm, voice, trustworthiness, and emotional stability (Danielson & McGreal, 2000). As teachers who exhibited these characteristics were believed to be more effective, these traits were central to teacher evaluation criteria of the time (Danielson & McGreal, 2000). In the 1960s and 1970s new research shifted the focus to skills that a teacher possessed, with a particular emphasis on math and science (Doerr, 2012). Clinical supervision also became more prevalent (Doerr, 2012). During the 1980s and 1990s teacher evaluation programs were primarily focused on the work of Madeline Hunter (1982) who had researched and developed very prescriptive teaching practices based on teacher-centered, structured classrooms.

The current push for educational reform in the United States is rooted in the publishing of *A Nation at Risk: The Imperative for Educational Reform* (National Commission on Excellence in Education, 1983), which highlighted that the country was falling behind other nations. This realization sparked an interest among U.S. politicians and the general public to take a closer look at education, specifically the qualification of teachers. *A Nation at Risk* (National Commission on Excellence in Education, 1983) included several recommendations, including that teacher evaluation programs should be designed to reward quality teaching, focus on problem areas, and removed ineffective teachers. These recommendations resulted in research that reviewed current teacher evaluation practices of the time. Stodolsky (1984) found those practices relied heavily on

observation and argued that the observation tools available made it very difficult to determine teacher effectiveness simply by observing a lesson. In response to *A Nation at Risk* (National Commission on Excellence in Education, 1983), the Carnegie Forum on Education and the Economy convened a task force on teaching as a profession, made up of educators, teachers' union representatives, policy makers, and business leaders. In *A Nation Prepared: Teachers for the 21st Century* (Task Force on Teaching as a Profession, 1986) the task force argued that improving the teaching profession required the creation of standards. As a result, in 1986, the National Board for Professional Teaching Standards (NBPTS) was formed with the goal of developing standards that best capture authentic classroom practice (National Board of Professional Teaching Standards, 2013). By demonstrating competency in these standards, teachers can earn the label of national board certified teacher.

More recently, new federal initiatives, most notably the No Child Left Behind Act of 2001 (No Child Left Behind [NCLB], 2002) and Race to the Top (U. S. Department of Education, 2010), have increased the national focus on high stakes testing and teacher accountability (Doerr, 2012; Fullan, 2011; Markow & Pieters, 2012). These initiatives were a result of numerous studies that linked teacher quality to student effectiveness (Darling-Hammond, 2000; Darling-Hammond, 2013; Markow & Pieters, 2011). As a result, the Race to the Top (2010) initiative included the challenging imperative to link student achievement to teacher evaluations. These nationwide initiatives also required states and districts to take a closer look at teacher quality as a path to increase student achievement. As of 2012, 39 states have enacted new legislation that requires the

implementation of new teacher evaluation programs (National Council on Teacher Quality, 2012).

Current Trends in Teacher Evaluation

There are several current trends related to teacher evaluation. Educational researchers, and in some cases, individual states, are developing new models. These new models include a wider range of measurements. In particular, heightened emphasis is on value-added measures, student and parent surveys, and peer review. In many states teacher evaluation is being tied to the Common Core State Standards ([CCSS] National Governors Association Center for Best Practices & Council of Chief State School Officers, 2010). New technology is changing the way evaluation data are recorded and used. Also, teacher evaluation is increasingly recognized as a tool not only for assessing teachers, but also to help teachers improve.

Current Models of Teacher Evaluation

The most common models currently used for teacher evaluation are Danielson's (2013) Framework for Teaching, the Marzano (2013) causal teacher evaluation model, the teacher evaluation standards (Mid-continent Research for Education and Learning [McREL], 2009), and Stronge's (2010b) teacher effectiveness performance evaluation system (TEPES) (Kane & Staiger, 2012). Danielson's (2013) Framework for Teaching seeks to define what teacher should know and be able to do as they practice the profession of teaching. In addition to evaluating teachers, the goal of the Framework for Teaching is to provide a "foundation for professional conversations among educators as they develop their skills" (Danielson, 2007, p. 5). The goal of Marzano's (2012) causal

teacher evaluation model is for all teachers to increase their expertise from year to year, resulting in a powerful cumulative effect on gains in student achievement. Marzano (2011) claims this model differs from others by allowing teachers through reflective practice and self-assessment to take responsibility for their individual growth. However, the other major models also emphasize reflection (Danielson & McGreal, 2000; Stronge, 2010b). McREL's (2009) Teacher Evaluation System attempts to standardize the evaluation process, provide opportunities for coaching and knowledge building, and help talented teachers realize their potential. This system is based on elements of a 21st century education and a set of rigorous research-based guidelines developed by McREL (2013). The goal of Stronge's (2012) Teacher Effectiveness Performance Evaluation System (TEPES) is to "support the continuous growth and development of each teacher by monitoring, analyzing, and applying pertinent data compiled within a system of meaningful feedback" (p. 1). The system is based on seven key teacher performance standards used to document and rate teacher performance.

Trend Towards Evaluation for Teacher Development

Each of the major evaluation models in use today emphasize the teacher development goal as equally important as the teacher assessment goal (Danielson, 2007; Marzano, 2012; McREL, 2013; Stronge, 2010). Marzano (2012) argued that an evaluation model should focus more on teacher learning than teacher competence, and should actually measure teacher growth, not just student achievement. Danielson (2007) viewed her framework not so much for assessing teachers as promoting professional conversations and development of educators. The McREL model (2009) focused on

linking teacher performance to professional development and creating a culture of continuous teacher improvement. In each case, the emphasis is as much on development of the teacher being evaluated as on the evaluation itself.

Trend Towards Technology in Teacher Evaluation

In a survey study, Ullman (2012) found that new technology significantly impacted how teachers are evaluated and how evaluation data are stored and used. Software such as FASTe (Formative Action System for Teacher Effectiveness) allows districts to integrate student assessment, data, management and teacher evaluation data, often providing immediate data to teachers (Ullman, 2012). Teachscape has developed classroom specific video recording devices that include two high definition video cameras and two wireless microphones to provide panoramic views of the classroom to help teachers reflect on their teaching, share, practices, and receive feedback (Teachscape, 2012). Software such as Observe4success allows administrators to perform multiple observations and provide quick, timely feedback (Ullman, 2012).

Trends in Measurements and Components of Teacher Evaluation

Historically, teacher evaluation models focused almost exclusively on classroom observation (Danielson, 1996; Stodolsky, 1984). More recently, student engagement measures (including student and parent surveys), value-added measures based on student achievement data, and peer review, have become common additions to teacher evaluation programs (Benedict, Thomas, Kimerling, & Leko, 2013; Darling-Hammond, 2013).

All four of the predominant models recognize the importance of including other measures besides observation of teachers in a comprehensive teacher evaluation program,

but they recommend different approaches. Marzano's causal teacher evaluation model recommends approximately 50% of a teacher's total evaluation be based on student achievement, 25% on deliberate practice activities such as setting goals and reflecting, and only 25% on teacher observation scores (Marzano et al., 2011). Stronge's (2012) teacher effectiveness performance evaluation system incorporates classroom observations, portfolios, student surveys, and student achievement/performance goal setting. The McREL model (2009) incorporates student achievement data with classroom observations.

Danielson's (2013) framework focuses on observations and does not specifically include other measures of evaluation. However, Danielson supports using a range of measures as part of a comprehensive teacher evaluation program including peer coaching, portfolios, action research, and self-directed professional development plans (Danielson & McGreal, 2000). Danielson recognizes the importance of looking at student outcomes when evaluating teachers yet cautions that making summative judgments of teachers based on value-added student achievement measures remains problematic (Danielson & McGreal, 2000). Although these models have many similarities, Danielson's Framework for Teaching continues to be the dominant model in use across the United States.

Charlotte Danielson's Framework for Teaching

Danielson's (2013) Framework for Teaching identifies the elements of an educator's responsibilities that have been demonstrated through empirical and theoretical research to promote improved student achievement. The Framework for Teaching is an outgrowth of Praxis III: Classroom Performance Assessments, of the Praxis Series by

Educational Testing Service (ETS), which was originally created to provide a framework for agencies making teacher licensing decisions (Danielson, 2007). Danielson saw the Praxis III criteria as having a greater purpose beyond that of licensing teachers and expanded the criteria into a framework with the purpose of enriching the professional life of any teachers using it. Unlike Praxis III, Danielson's Framework for Teaching is intended not only to assess and license teachers but also to promote professional conversations and the development of educators. Other work informing the framework include the National Board for Professional Teaching Standards (1991), research at the University of Wisconsin by Newman, Secada, and Wehlage (1995), Michael Scriven's (1994) ideas regarding teacher duties, and research on the classroom implications of constructivism (Danielson, 2013).

The Framework for Teaching separates the complex act of teaching into four areas, which Danielson refers to as domains (Danielson, 2013). The four domains are planning and preparation, classroom environment, instruction, and professional responsibilities. Each domain is further broken down into five or six components, each of which contain up to five elements. Each component describes a specific aspect of the domain. The elements describe a distinct feature of the component. Together, these 76 elements make up the Framework for Teaching (Danielson, 2013).

Domain 1: Planning and Preparation

Domain 1 is demonstrated through a teacher's plans for teaching. It describes how teachers organize content and design instruction. It begins with an understanding of pedagogy and content, yet extends to transforming that content into instructional designs

that engage students and result in learning. All components of the instructional design (activities, material, strategies, assessments) need to be appropriate for students and align with goals and standards. The components of Domain 1 (planning and preparation) are as follows:

- 1a. Knowledge of content and pedagogy
- 1b. Knowledge of students
- 1c. Instructional outcomes
- 1d. Knowledge of resources
- 1e. Coherent instruction
- 1f. Student assessments (Danielson, 2013).

Domain 2: Classroom Environment

Domain 2 is primarily demonstrated through a teacher's interaction with students and on creating an environment conducive to learning. These elements are not related to content but on setting the stage for learning (Danielson & McGreal, 2000). Domain 2 is about establishing a respectful and comfortable environment, which creates a safe place for risk taking and cultivates a culture for learning. The components of Domain 2 (classroom environment) are as follows:

- 2a. Creating an environment of respect and rapport
- 2b. Establishing a culture for learning
- 2c. Managing classroom procedures
- 2d. Managing student behavior
- 2e. Organizing physical space (Danielson, 2013).

Domain 3: Instruction

Domain 3 (instruction) involves the components at the center of teaching: engaging students in content. This domain emphasizes enhancing student learning. Quality instruction focuses on students building complex understanding of content and participating in a community of learners. Instruction is the implementation of plans created in Domain 1 (planning and preparation). Like Domain 2, instruction is primarily demonstrated through a teacher's interaction with students. Components of Domain 3 (instruction) are as follows:

- 3a. Communicating with students
- 3b. Using questioning and discussion techniques
- 3c. Engaging students in learning
- 3d. Using assessment in instruction
- 3e. Demonstrating flexibility and responsiveness (Danielson, 2013).

Domain 4: Professional Responsibilities

Domain 4 involves being a true professional, ranging in activities from participating in professional communities and contributing to the profession to self-reflection and professional growth. Professional responsibility is demonstrated in the interactions teachers have with families, colleagues (ranging from school staff to professional organizations), and community members. Most of these activities are accomplished outside of interaction with students, but still have an important impact in the classroom, the school community, and on the profession itself. The components of Domain 4 (professional responsibilities) are as follows:

- 4a. Reflecting on teaching
- 4b. Maintaining accurate records
- 4c. Communicating with families
- 4d. Participating in a professional community
- 4e. Growing and developing professionally
- 4f. Showing professionalism (Danielson, 2013).

The components and elements of the four domains are described separately but are interconnected and are not conducted in isolation. Danielson compares the complex act of teaching to a theater-in-the-round play, with the audience sitting around the stage. The domains and components can be viewed as the lights. To better understand the teaching, the focus can be on a particular component such as discussion techniques, expectations for learning, or monitoring of student behavior. In other words, the components are a diagnostic tool helping to understand how educators' performances can be improved in a particular area while recognizing that all components of teaching are connected to others (Danielson, 2013).

Levels of Performance

As teachers gain experience and expertise, their level of performance improves. There are four levels of performance in the Framework for Teaching: unsatisfactory, basic, proficient, and distinguished. These levels are described for each domain and for each element that make up the components of the domains. The levels range from teachers still mastering the rudiments of teaching (unsatisfactory) to those that are highly proficient educators able to share their experience (distinguished). The levels are intended

to describe specific levels of teaching performance, not teachers themselves (Danielson, 2013).

The Framework for Teaching (Danielson, 2013) is used in nations across the world and is the most common evaluation tool used across the United States (Teachscape, 2012). Currently, 16 states have adopted the Framework for Teaching as their statewide teacher evaluation rubric. It is one of several sanctioned rubrics in nine other states and is used in many districts in those states, which have not mandated a specific statewide requirement (Teachscape, 2012). The observation tool in the Minnesota default teacher evaluation model is based on Danielson's Framework for Teaching (MDE, 2013c).

Theoretical Framework: Constructivism

Constructivism will form the theoretical basis for this study as Danielson's (2013) Framework for Teaching is based on the constructivist theory of learning developed by Dewey, Piaget, and Vygotsky (Danielson, 2007; Doerr, 2012; Kane & Staiger, 2012). Constructivism is rooted in the idea that human learning is not passive, but an active process of constructing meaning in the world around us, and that knowledge is constructed in the mind of the learner (Dewey, 1938; Piaget, 1952; Vygotsky, 1978). Constructivism grew out of the functional psychology of Dewey (1916), the classroom implications of Piaget's (1952) stage theory of intellectual development, Vygotsky's (1978) focus on the importance of social interaction on cognitive development, and the cognitive psychology works of Bruner (1986). Also, the constructivist idea that existing knowledge is used to build new knowledge supports the theory that best practice can inform future practice of others within a profession.

Roots of Constructivism

Dewey. Dewey is considered the founder of functional psychology (Backe, 2001). Dewey (1938) believed that education depended on active rather than passive learning, and that learners should participate in real-life tasks and challenges. Dewey contended that ideas and knowledge emerged from situations in which students must draw them out of experiences that are important and meaningful to them. This focus on learning through experience is well articulated in *Experience and Education* (1938) in which Dewey stated, “there is an intimate and necessary relation between the processes of actual experience and education” (p. 7). In addition, Dewey believed that the path to quality education required not only that teachers have a strong general knowledge base, but also that they know their individual students well and build learning experiences on students’ prior learning.

These experiences, Dewey (1938) believed, need to occur in a social setting, such as a classroom, where learners are actively involved in building a community of students and then forming knowledge together within that community. As much as Dewey was a proponent of active and experience-based learning, Dewey also believed in the importance of reflective activity, emphasizing that chosen activities needed to engage the mind. Dewey also focused on the importance of teacher planning and teacher organization.

Piaget. Piaget (1952) believed “human cognitive development is a continually adaptive process of assimilation, accommodation and correction” (p. 21). Dewey argued that cognitive developmental abilities are the key factor for students to construct

understanding. Piaget's developmental stage theory broke down cognitive development into four stages:

1. Sensorimotor (birth-2).
2. Preoperational (2-7).
3. Concrete operational (7-11).
4. Formal operational (adolescence-adulthood).

As learners move through these four stages, they become more able to construct more complex understanding of the world around them (Piaget, 1952). According to Piaget (1971), "the essential functions of the mind consist in understanding and inventing, in other words building up structures, by structuring reality" (p. 27). Piaget argued that learning comes not just from the subject (the learner) or the object (the item or concept being studied), but from the unity of the two (Piaget & Inhelder, 1971).

Vygotsky. Whereas Piaget focused on how individuals build knowledge, Vygotsky (1978) focused more on the roles society plays in the development of knowledge within an individual. Therefore, Vygotsky is considered the father of social constructivism (Chu Chih Liu & Ju Chen, 2010). Vygotsky believed that "Human learning presupposes a special social nature by which children grow into the intellectual life of those around them" (Vygotsky, 1978, p. 88). This theory is summed up in Vygotsky's concept of the zone of proximal development, described as "the distance between the actual developmental level as determined by independent problem solving and the level of potential development as determined through problem solving under adult guidance or in collaboration with more capable peers" (p. 86). Vygotsky referred to

those adults or more capable peers as a more knowledgeable other or a MKO. Another key constructivist contribution of Vygotsky is the concept of scaffolding, whereby different students need different levels of assistance to understand a topic.

Other contributors to constructivism. Other researchers contributed to the development of constructivism. Glasersfeld (1995) built on the works of Piaget and argued that conceptual structures are developed through reflection and abstraction. Bruner's (1960) constructivist theory was also based on the earlier works of Piaget, and concluded that learning is an active process where students construct new ideas and concepts relying on their past and current knowledge. Cobb (1994) argued that the social constructivist theories of Vygotsky regarding the interplay of mind and society can work in conjunction with Piaget's theory of how individuals acquire knowledge.

Classroom Implications of Constructivism

There are many classroom implications of the constructivist theory. Brooks and Brooks (1999) proposed five classroom implications for teachers:

1. Teachers should expose students to concrete, contextually meaningful experiences through which they can raise questions, search for patterns, and build models.
2. Teachers should act as facilitators to create a community of learning where students are active and participate in discourse and reflection.
3. Students should be responsible for owning ideas.
4. Learning should be active, not passive.
5. Students should be assessed in the context of learning.

One of Piaget's (1968) ideas that has become a basic tenant of constructivist classrooms is that learners create new problem-solving strategies, even with existing, successful strategies in place. Bruner (1986) argued that in a constructivist classroom teachers must focus on experiences and contexts that make students both able and willing to learn, structure instruction so students can easily grasp it, and design instruction to allow and encourage students to go beyond the information given to them. A key classroom implication of Vygotsky's (1978) zone of proximal development is that learning needs to mirror the learner's developmental level.

Constructivism, Educational Research, and Teacher Evaluation

Given that the very purpose of conducting any sort of research is to add new knowledge to current knowledge and that education is about the acquiring of knowledge, it is not surprising that constructivism has been the theoretical foundation for much recent research in the field of education (Al-Huneidi & Schreurs, 2012; Dzerviniks & Poplavskis, 2012; Mvududu & Thiel-Burgess, 2012). The application of constructivism in educational research ranges from studies on English language learners (Mvududu & Thiel-Burgess, 2012) to physics (Dzerviniks & Poplavskis, 2012) and includes newer topics such as studies on blended learning (Al-Huneidi & Schreurs, 2012). Just as importantly, constructivism provides portions of the theoretical base for all five of the major teacher evaluation models in use today (Danielson, 2013; Marzano, 2012; McREL, 2013; Stronge, 2010).

Constructivism and Danielson's Framework for Teaching

When creating the Framework for Teaching, Danielson (1996) focused research on the pedagogical implications of constructivist learning and stated that it is, “the constructivist view of learning (and therefore teaching) that underlines the framework for professional practice” (1996, p. 122). The framework is based on research (Druian & Butler, 1987; Sykes & Bird, 1992) that supports the constructivist ideas that teaching is not about infusing knowledge into a vacuum, but rather is about students being engaged in learning and that the responsibility of the teacher is to help guide self-directed learning. Other constructivist ideas are apparent in Danielson's (2013) framework. For example, Dewey's (1938) insistence on the importance of teacher planning and teacher organization form the basis of Domain 1 (planning and preparation) of Danielson's (2013) framework. Dewey's (1938) concept of reflective activity is the basis for the emphasis on reflective question techniques covered in Domain 3 (Instruction) of Danielson's (2013) framework.

Constructivism and a Best Practices Model for Improvement of a Profession

In addition, Danielson (1996) based the Framework for Teaching not only on the theory and data developed by educational researchers, but also on what Shulman (1987) called the wisdom of practice of expert teachers. Danielson conducted an extensive literature search to synthesize and summarize the most significant research on effective teaching, in other words, on what effective teachers do in the classroom. The constructivist idea that existing knowledge is used to build new knowledge supports the theory that best practice can inform future practice of others within a profession. This

idea has most commonly been used in professions outside of education, such as law, medicine, and business (Bransford et al., 2000; Danielson, 2007), and even to shape national policy and impact history.

For example, in World War I, Germany and the United States had two different philosophies regarding fighter pilots that ultimately had a significant impact on the Allies winning the war of the skies and ultimately the war itself (Bingham, 1920). The Germans kept their best pilots in the skies, accumulating victory after victory, but eventually even the best, such as Manfred von Richthofen, popularly known as the Red Baron, were shot down. The Americans, on the other hand, pulled successful fighter pilots off the front lines (usually unwillingly) to become trainers, teaching their skills and best practices to a new generation of pilots (Bingham, 1920). This kept the pipeline of quality Allied pilots flowing while the German supply of quality pilots dwindled, and ultimately made the difference in the war of the skies (Bingham, 1920).

In education there is a battle to improve teacher quality and, as a result, student achievement. Those who have been effective teaching in the trenches could offer insights to winning that battle. The constructivist approach to teaching and learning can be applied to the profession of education as an entity. Just like an individual constructs new knowledge by building on prior knowledge and experience, so, too, when a profession is viewed as an entity, the same constructivist approach can apply to building on the current knowledge of those currently demonstrating teacher effectiveness to expand and increase that knowledge for others in the profession, thereby creating a new understanding of effective teaching among a greater number of educators. Vygotsky's (1978) constructivist

concept of the *zone of proximal development* (the distance between actual development level as determined by individual performance and the level of potential development as determined through collaboration with more capable peers) can extend beyond students within a class, to teachers within a profession, when the experience of capable peers is used to bring less effective teachers higher in their zone of proximal development as educators.

Summary of the Constructivist Theoretical Framework

Constructivism serves as the foundation for Danielson's (2013) Framework for Teaching, the model of teacher evaluation being examined in this study. Additionally, constructivism also serves as the basis for the methodological approach to this study, both in how individuals learn and how professions can be improved. This theoretical paradigm will form the basis for this study.

Relationship between Teacher Quality and Student Achievement

Recent studies are virtually unanimous in the conclusion that teacher quality is an important factor, if not the most important schooling factor, in affecting student achievement (Aronson, Barrow, & Sander, 2007; Clotfelter, Ladd, & Vigdor, 2010; Jacob, 2012; Mangiante, 2011; Palardy & Rumberger, 2008). In a study examining literature on teacher quality and student achievement, Marzano et al. (2011) found "one incontestable fact in the research on schooling is that student achievement in classes with highly skilled teachers is better than student achievement in classes with less skilled teachers (p. 2). In another review of literature, Barber and Moushed (2007) stated "available evidence suggests that the main driver of the variation in student learning is

the quality of teachers” (p. 12). Their conclusion was based on the results of studies that look at all available evidence of teacher quality; they conclude that students placed with higher-performing educators are likely to progress three times faster than those with lower-performing educators (Barber & Mourshed, 2007). Darling-Hammond et al. (2011) also found a large body of evidence in research that teaching quality significantly impact gains in student learning.

In the past decade, researchers have explored the value-added effects of specific teachers to student achievement by applying sophisticated statistical models to longitudinal data on student achievement. These value-added methods have an advantage of removing the effects of factors not under the control of the teacher such as socioeconomic status or prior student achievement, resulting in more accurate estimates of teacher effectiveness (Jacob, 2012; Marzano, 2012; Stronge, 2010a). Unlike traditional statistical methods which focused on student achievement levels, value-added approaches focus on student achievement gains (Jacob, 2012).

Sanders and Horn (1998) pioneered this statistical approach to determine the effectiveness of teachers on student achievement using the Tennessee Value-Added Assessment System (TVASS), which included a large statewide longitudinal database that linked students achievement to their teachers over time. The research based on this database showed that when isolated, class size, race, and socioeconomic level are not good predictors of student achievement. Instead, teacher effectiveness is the largest predictor of student growth (Kupermintz, 2003; Sanders & Horn, 1998).

Since the work of Sanders and Horn (1998), many other studies have utilized the same statistical approach, and other approaches, and come to the same conclusion; teacher quality impact has a significant effect on student achievement (Aaronson et al., 2007; Mangiante, 2011; Marzano, 2012; Palardy & Rumberger, 2008). In addition, estimates of teacher quality are not correlated to initial student test scores (Aaronson et al., 2007). In other words, an effective teacher is just as effective with low and high ability students, and an ineffective teacher is just as ineffective across the spectrum of student ability.

Studies on the value-added to students achievement by specific teachers have followed different approaches in different studies, resulting in different differential statistical power of teacher effects (Palardy & Rumberger, 2008; Stronge, 2010a). Yet the general result of the large majority of studies is the same: teachers matter and teacher quality is the single most significant element at school that impacts student achievement.

Relationship Between Teacher Evaluation and Student Achievement

Researchers have clearly demonstrated that teacher quality is a key factor, if not the most important factor, in student achievement (Darling-Hammond, 2010; Fullan, 2009; Gates, 2012; Markow & Pieters, 2010; Marshall, 2009). This understanding has led to the current focus on teacher evaluation as a way of assuring and improving teacher quality. Policy makers are demanding increased teacher evaluation and accountability, educators and administrators are striving to determine how to turn evaluation data into productive teacher development, and researchers are focusing on the link between teacher

evaluation and student achievement (Baker et al., 2013; Doherty & Jacobs, 2013; National Council on Teacher Quality, 2012).

However, the results of the research supporting using teacher value-added achievement data to accurately evaluate teachers has been mixed. As described above, there are studies that have found that when available, value-added achievement data can be accurate in linking specific teachers to specific student's achievement gains. At the same time, there are other studies that caution against using value-added student achievement data to evaluate teachers (Baker et al., 2013; Darling-Hammond, Newton, Haertel, & Thomas, 2010). These researchers argue that in the practical setting of schools, outside of controlled research experiments, it is difficult to obtain accurate and statistically reliable and valid value-added student achievement data that can be isolated and attributed to individual teachers. For example, value-added data are easy to collect for a second grade teacher who has one group of students all day whom take an achievement test in the fall and again in the spring. Yet for a sixth grade teacher who works in a team of four teachers, where students rotate from teacher to teacher and some students receive outside support, it is difficult to isolate accurately the value-added effect of that teacher on student achievement growth. In a large study in Iran, (Bahadori et al., 2012) no correlation could be found between teachers' evaluation scores and student achievement scores. Baker, Oluwole, and Green (2013) stated their findings vehemently: "overly prescriptive, rigid state statutory and regulatory policy frameworks regarding teacher evaluation, tenure and employment decisions outstrip the statistical reliability and

validity of proposed measures of teaching effectiveness” (p. 1). There is clearly no consensus on the reliability of value-added data among researchers.

Given the dispute among policy makers and researchers on the validity of value-added data to evaluate teachers, the primary component of all four major teacher evaluation systems in use today remains teacher observation by a trained administrator (Danielson, 2013; Marzano et al., 2011; McREL International, 2013; Stronge, 2010b). The reliance on teacher observations is based on research that shows that instructional practices of teachers are significantly more associated to student achievement growth than other factors such as teacher qualifications (Aronson et al., 2007; Jacob, 2012; Palardy & Rumberger, 2008). Sartain, Stoelinga, and Brown (2011) provided one of the first research-based evidences that demonstrated teacher observation tools, in this case based on Danielson’s (2011) Framework for Teaching, when accompanied by quality evaluation systems and professional development, can accurately measure teacher effectiveness and provide educators with feedback on the elements that matter for increasing the achievement of students.

Kane and Staiger (2012) analyzed the results of the Measures for Effective Teaching Project (Gates, 2012), the largest study ever to attempt to link teacher evaluation to student achievement that involved over 1,000 teachers. They examined five instruments used to assess the effectiveness of teacher practices based on classroom observations, including Danielson’s (2011) Framework for Teaching. The findings from Kane and Staiger’s (2012) research indicated that when scores were combined from multiple lessons by well-trained observers, teachers’ observations scores were linked

positively to students' achievement test scores. However, Kane and Staiger (2012) could only test each evaluation instrument's ability to predict achievement gains non-experimentally as students had not been randomly assigned. A follow up study (Kane, McCaffery, Miller, & Staiger, 2013) put the same evaluation instruments to a definitive and statistically significant test. These researchers used data from the 2012 study (Kane & Staiger, 2012) to build a composite measure of teacher effectiveness and randomly assigned students to teacher's classrooms and tracked student achievement. When comparing predicted student achievement (based on prior teacher evaluation results) to actual student achievement over 1 year, the measures of effectiveness predict and identified those teachers whose students had higher average achievement following the random assignment. As a group, teachers who scored higher on the evaluation instruments produced more growth in student achievement than teachers in the same school, grade, and subject with lower evaluation scores. (Mihaly, McCaffrey, Staiger & Lockwood, 2013).

Likewise, Looney (2011) found that well-designed teacher evaluation systems, together with correlated professional development and learning, can add to improving teacher quality and raising student achievement. Not only has research linked high teacher evaluation scores to high student achievement, but also Taylor and Tyler (2012) found that students of teachers in an effective evaluation program that included professional development based on the evaluation actually had higher achievement than students of those same teachers in years prior to the evaluation program.

However, in each of these five studies, in order for the connection to student achievement to be made, the overall teacher evaluation plan needed to include multiple observations, well-trained observers, and professional development based on observation results (Kane & Staiger, 2012; Looney, 2011; Sartain et al., 2012; Taylor & Tyler, 2012). Without multiple observations, well-trained observers, and professional development based on results, it is difficult to statistically link teacher evaluation scores to student achievement scores (Borman & Kimball, 2005; Hanushek & Rivkin, 2010; Looney, 2011; Sartain, Stoelinga, & Brown, 2011). In a study of over 400 teachers and the 7,000 students assigned to those teachers, Borman and Kimball (2005) found that teachers with higher evaluation ratings were no more able to close the achievement gap of students within their classrooms than lower scoring teachers. Hanushek and Rivkin (2010) reported that observed teacher characteristics rarely accurately represent teacher quality. In a study reviewing research that connected teacher evaluation to student achievement, Looney (2011) found that teachers report that teacher evaluations do not occur systematically, evaluators are not well trained, and that professional learning is not tied to their evaluations. In a mixed methods study of 23 school leaders, Kimball and Milanowski (2009) found substantial variation in the relationship between observers' ratings of teachers and the achievement of those teachers' students. The researchers could not identify factors that made the results of certain evaluators more valid than others and concluded that school leaders face significant challenges in evaluating teachers and cautioned against using such evaluations for high stakes purposes. Kimball and Milanowski recommended that future research is needed on how school leaders can

accurately evaluate teachers in a way that is valid and reflects student achievement. Sartain et al. (2012) also pointed out that there is limited research on how to create evaluation systems that center on classroom observations that can determine between ineffective and effective teaching. The conflicting results described above indicate that additional research is needed to better link teacher observations to accurate teacher evaluation and corresponding student achievement.

It is because Danielson's (2011) Framework for Teaching is the most commonly used teacher observation tool that it was one of the tools analyzed in the Measures of Effective Teaching study described above (Kane & Staiger, 2012) and found to link teacher scores on the framework to student achievement scores if observers were adequately trained and teachers were observed multiple times. An evaluation tool is more likely to be useful to improve practice if those being evaluated believe it to be relevant and accurate (Benedict et al., 2013; Shagrir, 2012). Studies that asked teachers their perceptions on Danielson's framework confirmed that teachers perceived all four domains positively impact teacher effectiveness. Sweeley (2004) found that teachers believed all four domains in Danielson's Framework for Teaching to be an effective measurement of teacher effectiveness. Using the survey created by Sweeley (2004), both D'Alfonso (2006) and Doerr (2012) had similar results, agreeing with Sweeley that teachers believe Danielson's four domains effectively measure teaching and learning.

Gap in Practice and Literature

Sweeley (2004), D'Alfonso (2006), and Doerr (2012) all discussed which elements within each domain teachers indicated as more important to teaching and

learning. However, there is disagreement between the three studies on which elements in each domain teachers believe most impact teaching and learning. None of the three studies statistically analyzed the importance of differences of the elements within each domain. In addition, in an exhaustive search of literature, no studies were found that specifically asked those teachers who have been recognized as effective for their perspectives on Danielson's four domains or the relative importance of the elements within each domain on teacher effectiveness. The survey instrument created by Sweeley (2004) could provide an excellent tool for such a study.

Relative to the large body of research and other literature on topics related to teacher evaluation and other issues of school reform, few studies have examined the opinions of teachers in the classroom to obtain their perspective. The MetLife sponsored state of states survey is conducted annually on a wide range of issues related to education and found that 79% of teachers believe their voices are not heard on issues related education reform and policy (Markow & Pieters, 2012). In 2012, the Gates Foundation, together with Scholastic, Inc, launched Primary Sources, a nationwide survey of 40,000 teachers on issues related to education (Gates, 2012). Elements of effective instruction was not one of the topics.

There is even less peer-reviewed current research that focused on the perspectives of those teachers who have been recognized as highly effective on issues related to school reform, especially teacher evaluation. In an exhaustive search of literature searching for studies focusing on exemplary teachers' views on any current educational issues only one was found. Dikkers (2012) reported that the professional development trajectories of 39

award-winning teachers tended to be nontraditional compared to the teacher population. No research could be found that specifically asked teachers recognized as highly effective their perspectives on teacher effectiveness, teacher evaluation in general, or Danielson's (2013) framework specifically. Considering the nationwide emphasis on teacher quality and teacher evaluation and the prevalence of Danielson's (2013) framework to accomplish those evaluations, this is a significant gap in the literature.

Best Practices Model of Improvement

An application of the constructivist theory described above is that best practices provide an excellent model for professional improvement, both at the individual and profession-wide level. Best practices are the foundation for professional growth in many other professions and could be in education (Goldacre, 2013). Best practices have long been recognized in the medical field as a viable way of transmitting knowledge necessary to improve practice from those more skilled to those less so (Bosch, Tavender, Bragge, Gruen, & Green, 2013; Bredin & Warburton, 2013). Recognizing the importance of looking at best practices in education, the U.S. Department of Education created the What Works Clearinghouse (WWC), to provide educators and administrators with access to successful, proven practices that result in student success (U.S. Department of Education, 2013). In a qualitative study of 39 state teachers of the year, Dikkers (2012) argued that it is critical to look to those teachers singled out for their expertise when attempting to improve educational practice. In a study of what great teachers do differently, Whitaker (2012) argued that what is needed in education is for more teachers to be like the best teachers. Whitaker asked, "If every teacher were like the best teachers, would that be a

great school?” (p. 4). He concluded, “Of course it would. And if all schools had educators like the best teachers, the students who walk through their doors each day would face the future with confidence” (p. 4). Regarding improving education, the best practices and perspectives of highly effective teachers can be a valuable tool.

Desimone (2011) argued evaluators should measure common features that research shows are related to the educational outcomes of most concern. Agreeing which features of instruction are most related to the outcomes of most concern is one of the biggest challenges related to teacher evaluation. Bransford et al. (2000) pointed out, “the framework has been constructed from earlier research; details now need to be provided in order to advance the science of learning by refining the principles” (p. 277). These researchers recommend more research that investigates successful educational practice, specifically investigating the principles of learning and teaching that underlie the work of exceptional teachers who have demonstrated success in their classrooms (Bransford et al., 2000). Rather than looking at research literature to determine which elements of instruction are most critical to effective teaching and learning, this study directly asked those award winning teachers whom have actually been determined to be effective.

Recognizing the lack of teacher voice, and specifically that of award-winning teachers, on issues pertinent to education, such as teacher evaluation, is a key reason organizations such as the National Network of State Teachers of the Year (NNSTOY) are forming. The mission of NNSTOY states, “focused on assuring that every student has access to excellent teachers, we are committed to bring to voice of teachers into policy making” (NNSTOY, 2013, p. 1). Research supports the idea of teachers becoming

involved in decisions related to education: “Transforming schooling in the twenty-first century depends on education policies being supported by expanded teacher participation in education policy-making” (Collinson et al., 2009, p. 1). This study seeks to clarify what instructional elements are considered most important in the opinions of a national sample of teachers who have all been identified by panels of education experts as being among the most effective educators in the United States.

Methodology

In order to address shortcoming of prior research on teacher effectiveness assessments, specifically Danielson’s (2013) Framework for Teaching, research is needed that studies the extent to which award-winning teachers perceive differences in the importance to effective teaching and learning across the elements of Danielson’s (2013) Framework for Teaching. There is prior research that addressed teacher perceptions on Danielson’s (2013) Framework for Teaching (D’Alfonso, 2006; Doerr, 2012; Sweeley, 2004). Sweeley (2004) developed a Likert-style survey instrument, the Framework for Teaching Survey (Appendix A), for a quantitative study on teacher’s attitudes towards Danielson’s (1996) four domain areas in a Pennsylvania school district adopting Danielson’s (1996) framework. Doerr (2012) and D’Alfonso (2006) also used the survey. Like Sweeley, D’Alfonso (2006) studied schools in Pennsylvania, focusing on differences of elementary, intermediate, and secondary teachers’ perceptions towards the domains of Danielson’s (1996) framework. In a larger study, Doerr (2012) surveyed teachers from five school districts in a Midwestern state using the same survey. All three studies concluded that teachers agreed that the components within Danielson’s four

domains were effective in teaching and learning (D'Alfonso, 2006; Doerr, 2012; Sweeley, 2004).

However, there are limitations of these studies. The results differ on which of the 76 components within the four domains of Danielson's Framework for Teaching most impact teacher effectiveness (D'Alfonso 2006; Doerr, 2012, Kane & Staiger, 2012). In addition, these studies did not include nation-wide samples but were focused on teachers in a limited number of districts. Also, no research has studied to what extent teachers who have been recognized as highly effective agree that each of the domains and elements of Danielson's Framework for Teaching impact teacher effectiveness.

Applying a survey such as the Likert-style Framework for Teaching survey (Sweeley, 2004) to a nation-wide sample of teachers recognized as highly effective could address this research gap. Creswell (2013) stated that in quantitative research, surveys are an appropriate quantitative strategy of inquiry to collect data on predetermined instruments that will yield statistical data. Surveys are particularly useful when the information needed should come directly from subjects and when the data they provide is based on perceptions (Fink, 2009).

Other studies focusing on subjects' perceived differences on a particular subject, as is the case in this study, have used a single-factor within-subjects design (Benoit et al., 2000; Gardiner & Dras, 2012). It is particularly appropriate when looking at whether mean scores differ significantly (Gardiner & Dras, 2012; Wendorf, 2012). This design is used in research ranging from medicine (Benoit et al., 2000) to education (Gardiner &

Dras, 2012). An advantage of within-subjects design is variability caused by differences among subjects is reduced (Franz & Loftus, 2012).

Conclusion

In light of the current reform movements in education focusing on increasing teacher accountability there is a significant amount of research that addressed teacher evaluation and teacher quality, but a limited amount of the literature asked teachers for their perspectives on teacher quality, teacher evaluation, and the tools used for evaluation, such as Danielson's (2013) Framework for Teaching. Even less research looked at what those teachers viewed as exemplary educators have to say about effective teaching and how to evaluate it. This study seeks to fill that void.

The nation-wide disparity in academic achievement has created an increased demand for teacher quality, which research shows is a key factor in student achievement. Although research is clear that teacher quality significantly impacts student achievement, the research on whether it is possible to link a specific teacher's effectiveness to the achievement of their students, is mixed. The focus on teacher quality, and the challenges of measuring it, has resulted in a focus on, and heightened demand for, effective teacher evaluation.

There are several recurrent themes in literature on teacher evaluation. First, effective teacher evaluation should not only focus on grading teachers, but also on developing teachers. The five major current models of teacher evaluation all not only focus on evaluating teachers, but also on using evaluation as a way to develop all teachers into better teachers. Also, teacher evaluation when conducted by highly trained

evaluators can be better associated with student achievement, but this is difficult to accomplish in practice and quite often, such correlations cannot be made.

Teacher evaluation models based on Danielson's (2013) Framework for Teaching are currently the most commonly used in states and districts across the United States. Therefore, The Framework for Teaching is critical in the effects it will have on the teachers, and the evaluation of those teachers, in districts across the state of Minnesota and the country. In light of the increased focus on teacher evaluation and use of Danielson's Framework for Teaching around the country, researchers have surveyed teachers in different districts and found that teachers agreed that the four domains in Danielson's Framework for Teaching are effective indicators of teaching and learning (D'Alfonso 2006; Doerr, 2012; Sweeley, 2004). However, those researchers disagree on which of the 76 components within the four Domains of Danielson's Framework for Teaching most impact teacher effectiveness (D'Alfonso 2006; Doerr, 2012, Kane & Staiger, 2012). The sample population in each of these studies was limited in size, and also to a specific geographic area. In addition, no researchers have studied to what extent teachers who have been recognized as highly effective educators agree that each of the domains and elements of Danielson's Framework for Teaching impact teacher effectiveness. There is therefore, a clear deficit in the research of the perceptions of teachers, especially those whom have been recognized as effective, on which components most impact effective teaching and learning. Without consensus of which of the 76 components are most important, the implementation of the Framework for Teaching will

be less effective than it could be in accurately evaluating teachers and promoting teacher development, for the ultimate purpose of raising student achievement.

This study seeks to fill that void by administering the Framework for Teaching Survey (Sweeley, 2004) to a nation-wide sample of state teachers of the year from the past 6 years. Data gathered in this manner addresses this gap in past research on teacher effectiveness assessment by identifying the perceptions of teachers who have been determined to be effective educators on the elements of instruction that most impact teaching and learning. Section 3 will describe the study, including research design, sample and setting, instruments used, project procedures, and statistical analysis.

Section 3 Methodology

Introduction

Section 3 will describe and provide a rationale for the quantitative research paradigm and single-factor within-subjects design of this study on the perceptions of award-winning teachers on the elements of effective teaching in Danielson's (2013) Framework for Teaching. I will describe methodology, including a description of participants, participant selection, and the role of the researcher. The data collection plan will provide a description of the data collection instrument and the process for data collection and analysis, including a discussion of validity and reliability. I will conclude with ethical issues related to the study.

The purpose of this study was to examine award-winning teachers' perspectives towards the importance of the elements in Danielson's (2013) Framework for Teaching on effective teaching. In this study I surveyed state teachers of the year from throughout the United States from the past 6 years. As policy makers and administrators at local, state, and national levels attempt to make decisions regarding teacher evaluation, teachers, especially those who have been recognized as highly effective, are in an excellent position to contribute to the conversation concerning teacher effectiveness and how that effectiveness is evaluated (Cole & Ishiyama, 2008; Gates, 2012; Markow & Pieters, 2010, Worley et al., 2007). Their perceptions can help shape effective utilization of teacher-evaluation programs including those based on Danielson's (2013) framework.

This research study answers the following questions:

RQ1: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of Danielson's four domains?

RQ2: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 23 elements in Danielson's planning and preparation domain?

RQ3: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 15 elements in Danielson's classroom environment domain?

RQ4: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 18 elements in Danielson's instruction domain?

RQ5: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 20 elements in Danielson's professional responsibilities domain?

Research Design and Approach

In order to answer the above questions and test the corresponding null hypothesis, I utilized a quantitative survey approach. The study is quantitative in nature because it seeks to identify differences in perceptions of award-winning teachers. The purpose of quantitative survey research is to generalize from a sample to a population so that inferences can be made about characteristics, behaviors, attitudes, or perceptions of a population (Babbie, 2007). Surveys are an appropriate quantitative strategy of inquiry to collect data on predetermined instruments that will yield statistical data (Babbie, 2007).

Surveys are particularly useful when the information required should come directly from subjects and when the data provided are based on perceptions (Fink, 2009). Surveys are also appropriate when the people from whom the data will be collected come from a specific grouping (Babbie, 2007; Fowler, 2009). For these reasons, I used a quantitative survey approach to collect data in this study.

The specific research design for this study was a quantitative single-factor within-subjects design. Keppel (1982) described this design as “a *factorial* experiment in which *subjects* (factor S) are treated as a second factor. In this arrangement, then, both the independent factor (factor A) and subjects (factor S) are completely crossed; that is, each subject receives each of the a treatments” (p. 382). There is one independent variable in single-factor experiments. In within-subjects experimental designs, each subject is exposed to all levels of the independent variable. A within-subjects design is appropriate for this study as all subjects will be in one group. The independent variable was Danielson’s (2013) Framework for Teaching, with the individual domains and elements being different levels. The dependent variable was the level of importance assigned to each domain and element using Sweeley’s (2004) Framework for Teaching Survey.

Each participant was exposed to each of Danielson’s domains and the elements within those domains, and rated the importance of the elements using the Framework for Teaching Survey (Sweeley, 2004). Differences in importance ratings were then assessed using a repeated-measures ANOVA followed by the Fisher Least Significant Difference (LSD) test (Keppel, 1982).

In this study, I identified, through statistical analysis, to what extent award-winning teachers perceive differences in the importance to effective teaching and learning across the elements of Danielson's (1996) Framework for Teaching. Other studies focusing on subjects' perceived differences on a particular subject also used a single-factor within-subjects design (Gardiner & Dras, 2012). This design has been used in other studies, which also looked at whether mean scores differ significantly (Gardiner & Dras, 2012; Wendorf, 2012). Single-factor within-subjects design has been used in research ranging from medicine to education (Benoit et al., 2000). An advantage of within-subjects design is that variability caused by differences among subjects is reduced (Franz & Loftus, 2012). For these reasons, I used a quantitative survey approach using a single-factor within-subjects design.

Setting and Sample

Population

The population for this study was award-winning teachers, specifically state teachers of the year from the past 6 years. The sample frame was state teachers of the year, from all 50 states and six U.S. extra-state jurisdictions from the past 6 years with email addresses available through the National Network of State Teachers of the Year (NNSTOY) database. Every year, in every state, teachers are nominated by administrators, principals, teachers, and students for the State Teacher of the Year Awards (Council of Chief State School Officers [CCSSO], 2013). A teacher can also be chosen each year from the District of Columbia, American Samoa, Guam, Northern Mariana Islands, the U.S. Virgin Islands, and the Department of Defense Education

Activity. Each state uses its own selection process in determining the state teacher of the year, but each state conducts a “rigorous selection procedure to validate the state teacher of the year's competencies in the classroom” (CCSSO, 2013, p. 1). These teachers are nominated, filtered, and vetted for classroom talents and practices viewed as effective and warrant careful examination (Dikkers, 2012).

All state teachers of the year qualify for the National Teacher of the Year Program, which is organized by the CCSSO. The profiles of all 55 winners are submitted to a selection committee made up of representatives from major education organizations. The committee, under the direction of CCSSO, chooses four finalists after reviewing the data for each candidate. The committee then chooses a winner from these finalists based on interviews and the biography and eight essays each candidate submits. The President of the United States traditionally presents the award in the White House Rose Garden. The Teacher of the Year Award Program was initiated in order to bring recognition to the importance of teachers in America (CCSSO, 2012). The National Network of State Teachers of the Year (NNSTOY) is a professional organization of past state teachers of the year with a focus of “assuring that every student has access to excellent teachers, and bringing the voice of teachers into policy making” (NNSTOY, 2013, “About NSTOY,” para. 1). All state teachers of the year from the past 6 years (from all 50 states, provinces, the Department of Defense Education Activity, and the District of Columbia) qualify for this study.

Sample Method

This study utilized convenient sampling, meaning participants are chosen from the given population because they are able and willing to be studied (Fink, 2009). The sample included those state teachers of the year from the past 6 years with email addresses in the NNSTOY database. Convenient sampling is typically used when randomized sampling is not possible (Creswell, 2013). In this case, however, convenience sampling was actually used because such a high percentage of the given population have addresses in the NNSTOY database and were, therefore, conveniently available to be included in the sample. In fact, the sample frame was close enough to the full population that using convenience sampling described above almost reached a level, which could be defined as direct sampling, where all members of the population are in the sample (Marriott, 1990). Although a randomized sample could be generated from this 6 year grouping of state teachers of the year (STOYS), there were no obstacles to surveying all STOYS within the sample frame (those with addresses in the data base from the past 6 years), and the larger sample number adds to the power of the study (Fink, 2009). In other words, it was convenient to include almost all members of the population (of STOYS from the past 6 years) in the convenience sampling, thereby maximizing the number of participants and increasing the power of the study. Given that the mission of NNSTOY (2013) is to bring the voice of teachers into policy making and advocating for the profession, it is not surprising that many members found the time needed to take the survey (approximately 12 minutes) a valuable use of their time.

Sample Size

The sample included 300 STOYS ($n = 300$). The sample size included those STOYS from the past 6 years with an email address in the NNSTOY database. According to Creswell (2013), a power of .8 is recommended for this type of study. Based on a power analysis conducted using a maximum of 22 levels of the repeated measure, a maximum individual item standard deviation of .60, and an alpha level of .05, a sample of 57 provides a detectable within-group difference of .50 (out of a 5-point scale) with a power level of .80 (Lenth, 2006-9). A standard deviation of .6 was chosen for this analysis as it is the highest standard deviation found in the results of other studies using the same instrument (Sweeley, 2004; Doerr, 2012). Based on this power analysis result, the chosen sample is of sufficient size to reach the recommended level of power. Of the 300 teachers of the year invited to complete the survey, 134 responded, which provided a 43.8 % response rate. A full review of the demographic characteristics of the sample will be provided in the next chapter.

Instrumentation and Materials

For data collection I utilized an existing survey instrument: Sweeley's (2004) Framework for Teaching Survey (Appendix A). Sweeley developed the Framework for Teaching Survey for a study on teacher's attitudes towards Danielson's four domain areas in a Pennsylvania school district adopting Danielson's framework. There is one question for each element of the framework, grouped by the four domains for a total of 76 element questions. The survey uses a 5-point Likert continuous scale including these choices: "strongly agree," "agree," "disagree," "strongly disagree," and "do not understand." The

questions ask whether or not and to what extent respondents agree that each respective element is important to effective teaching and learning. There are also eight demographic questions related to years of teaching experience, years in current position, teaching assignment, grade level taught, gender, subject(s) taught, level of education, and familiarity with Danielson's Framework for Teaching. I completed statistical analysis to determine if specific domains and elements within those domains are viewed as being especially important to effective teaching and learning.

The Framework for Teaching Survey has been implemented and the results statistically analyzed with valid and reliable results by Sweeley (2004), D'Alfonso (2006), and Doerr (2012). The instrument was also field tested by Sweeley (2004) during the creation and modification of the survey. Therefore, additional field testing is not necessary.

Validity

The content validity of Sweeley's (2004) Framework for Teaching Survey instrument can only be as valid as the framework itself. Danielson (1996) stated, "the validity of the framework derives from the professional conversations that accompany its introduction into a school or district" (p. 12). Sweeley (2004) created one survey question directly from each element within Danielson's Framework for Teaching in order to assure the content validity of the instrument.

Regarding criterion validity, the four domains of Danielson's (2013) Framework for Teaching have repeatedly been found in studies using other instruments to be a valid measurement of effective teaching (Danielson, 2011a; Darling-Hammond, 2013; Kane,

McCaffery, Miller, & Staiger, 2013; Sartain, Stolina, & Brown, 2011). Studies using the same instrument as this survey, Sweeley's (2004) Framework for Teaching survey, found the four domains of Danielson's framework to be valid measurements of effective teaching (D'Alfonso, 2006; Doerr, 2012; Sweeley, 2004). Therefore, the instrument also has criterion validity.

Reliability

For the Framework for Teaching survey instrument to be reliable, first the framework itself must first be a reliable evaluation tool. Danielson (1996) argued that the domains and components of the framework are research based and "have shown high levels of inter-rater agreement, which is considered critical to demonstrate the reliability of the system" (p. 12). Regarding internal consistency among the questions within each of the four domains, Doerr (2012) reported Cronbach's alpha values of .939 (Domain 1), .929 (Domain 2), .921 (Domain 3), and .922 (Domain 4). In all four cases, the Cronbach's alpha value is above the .8 value generally viewed as necessary to establish internal consistency (Cronbach, 1984).

Data Collection Procedures

I collected data through a survey administered via email using SurveyMonkey distributed through the National Network of State Teachers of the Year (NNSTOY) database. Using Survey Monkey and email was a convenient way to reach a large number of state teachers of the year and an efficient way to access the resulting data and statistics. I utilized Salant and Dillman's (1994) four-phase administration process. First, participants were sent an advance-notice email. A week after the advance-notice email, I

sent a second email containing a link to the actual survey. This email also included a restatement of the purpose of the survey, an assurance of anonymity and confidentiality, and a statement of appreciation for their participation. A week after the survey email, a follow-up email was sent, thanking those who had completed the survey and reminding those who had not to please do so. The fourth email, with a personalized salutation, was sent to all non-respondents 2 weeks after the follow-up email. The total administrative period for data collection was 4 weeks. Sample members were not contacted until after I received IRB approval. In an attempt to maintain anonymity, participants did not need to respond by email.

Data Analysis Procedures

Hypotheses

Data was analyzed to test the following five null hypotheses:

H_01 : There is no difference in the extent to which award-winning teachers believe each of Danielson's four domains is important to effective teaching and learning.

H_02 : There is no difference in the extent to which award-winning teachers believe each of the 23 elements in Danielson's Domain 1 (planning and preparation) is important to effective teaching and learning.

H_03 : There is no difference in the extent to which award-winning teachers believe each of the 15 elements in Danielson's Domain 2 (classroom environment) is important to effective teaching and learning.

H_04 : There is no difference in the extent to which award-winning teachers believe each of the 18 elements in Danielson's Domain 3 (instruction) is important to effective teaching and learning.

H_05 : There is no difference in the extent to which award-winning teachers believe each of the 20 elements in Danielson's Domain 4 (professional responsibilities) is important to effective teaching and learning.

Analysis

I analyzed data using SPSS software for Mac (2011). It is appropriate to treat scores from Likert-style responses format as interval data in order to allow the use of parametric tests (Ferguson & Cox, 1993). For research question one, I used descriptive statistics and repeated measure one-way Analysis of Variances (ANOVA) to assess the significance of differences in mean importance ratings obtained for each participant for the four domains of Danielson's (2013) framework. Significant F values were followed by the Fisher Least Significant Difference (LSD) test (Keppel, 1982) to determine the domains that significantly differ from one another.

Whereas research question one looks for differences of importance between the four domains, research questions two through five each focus on one domain and look for differences between the importance of the elements within that respective domain. The analysis, however, for each of four domain-specific questions, was identical to that for question one.

Ethical Considerations

In order to assure ethical standards of research are met and that the rights of participants are protected, this study did not begin, and potential participants were not contacted until the Walden University Institutional Review Board (IRB) approved the proposal. Written permission (Appendix B) from Sweeley was obtained to use the Framework for Teaching Survey (2004). Written permission (Appendix C) from the National Network of State Teachers of the Year (NNSTOY) was also obtained to disseminate the survey to emails obtained from the NNSTOY database.

Participation in the study was voluntary. As the 2009 Minnesota Teacher of the Year, I am a member of this organization, but I am not in a position of authority over any other members. A potential impact this could have on data collection is that because of personal relationships I have formed with fellow NNSTOY members, I may have a higher rate of survey completion than someone who was from outside the organization, especially among state teachers of the Year from 2009. However, the consent form administered to all participants stated clearly that their survey responses would be completely anonymous, and their decision to participate would not have any impact on their relationship with me.

Surveys were completed via SurveyMonkey, which assures confidentiality and anonymity. To further protect confidentiality, results will only be presented in aggregate form. Participants were made aware of the confidentiality of their responses and of their anonymity. Data will be stored on a flash drive for 5 years in a locked file cabinet and then destroyed.

Conclusion

This section included a description and rationale for the study design, sample and sample selection procedures, population, instrumentation, data collection, data analysis, and ethical considerations. A single-factor within-subjects design was used for this study on the perceptions of award-winning teachers on the elements of effective teaching in Danielson's (2013) Framework for Teaching. The data collection plan followed Salant and Dillman's (1994) four-phase administration process. Data was collected using Sweeley's (2004) Framework for Teaching survey, a reliable and valid instrument. Data analysis included descriptive statistics and repeated measure one-way ANOVA followed by the Fisher LSD post hoc test. The results of this study provide key insights into the perspectives of award-winning teachers on the importance of the domains and elements of Danielson's (2013) Framework for Teaching on teaching and learning.

Section 4: Results

This section describes the demographics of respondents and then reports the findings obtained based on the research questions. The five research questions examined to what extent award-winning teachers perceive differences in the importance to effective teaching and learning across each of Danielson's (2013) four domains and across the elements within those domains.

Demographics of Respondents

Of the 300 state and national teachers of the year, 43.8% ($N = 134$) of the sample population responded. As summarized in Table 1, the sample obtained was largely female, consisting of 96 females (74.4%) and 33 males (25.6%). The highest level of education reported by the majority of participants was a master's degree (87.8%), while 3.1% reported a bachelor's degree, and 9.2% a doctoral degree. Regarding current status as an educator, 86 (65.6%) respondents still teach, 10 (7.6%) are administrators, 5 (3.8%) are retired, and 30 (22.9%) are in other positions in education. Seventy-five percent of respondents were familiar with Charlotte Danielson's Framework for Teaching and 23% were not. Two percent did not respond.

Table 1

Descriptive Characteristics of the Study's Participants

Characteristic	<i>N</i>	%
Gender		
Female	96	25.6
Male	33	25.6
Highest Level of Education		
Bachelor's Degree	4	3.1
Master's Degree	115	87.8
Doctoral Degree	12	9.2
Current Status as an Educator		
Teacher	86	65.6
Administrator	10	7.6
Other Position in Education	30	22.9
Retired	5	3.8
Familiar with Danielson's Framework?		
Yes	100	76.3
No	31	23.7

Data Analysis

Presented below are the results of the statistical tests of the null hypothesis that follow from each research question. Question one compared differences of mean importance rating between the four domains in Danielson's framework for teaching. Questions two through five compared the differences of mean importance ratings of the elements within each domain. The degree to which resulting differences were significant was also examined.

Research Question 1: To What Extent do Award-Winning Teachers Perceive Differences in the Importance to Effective Teaching and Learning Across Each of Danielson’s Four Domains?

A within-subjects ANOVA was conducted to assess the differences of mean importance ratings between the four domains. The overall within-subjects effect was highly significant across the four domains, $F(3, 330) = 41.15, p < .001$. A test of pairwise comparisons using the Fisher Least Significant Difference (LSD) test (Keppel, 1982) indicated that the differences between the domains were all statistically significant at the level of at least $p < .001$. Table 2 presents the means and standard deviations ordered by mean importance rating for the four domains.

Table 2

Domain Means and Standard Deviations Ordered by Mean Importance Rating

Domain	Mean	SD	n
Domain 3 – (Instruction) Adjusted for Points Possible	1.25a	.28	111
Domain 2 – (Classroom Environment) Adjusted for Points Possible	1.31b	.26	111
Domain 1 – (Planning and Preparation) Adjusted for Points Possible	1.40c	.29	111
Domain 4 – (Professional Responsibilities) Adjusted for Points Possible	1.50d	.36	111

Note. Means sharing a common subscript do not differ at $\alpha = .001$ according to the LSD procedure. The following scale was used for all items within each of the four domains: 1=Strongly Agree; 2=Agree; 3=Disagree; 4=Strongly Disagree; 5=Do not understand—treated as missing data.

As summarized in Table 2, teachers of the year rated Domain 3 (Instruction) with the highest mean importance rating, followed by Domain 2 (Classroom Environment), Domain 1 (Planning and Preparation), and lastly, Domain 4 (Professional

Responsibilities). The inferential analysis provided the support to reject null hypothesis H_01 that there is no difference in the extent to which award-winning teachers believe each of Danielson's four domains is important to effective teaching and learning.

Research Question 2: To what Extent do Award-Winning Teachers Perceive Differences in the Importance to Effective Teaching and Learning Across Each of the 23 Elements in Danielson's Planning and Preparation Domain?

A within-subjects analysis of variance (ANOVA) was conducted to assess the differences of mean importance ratings between the 23 elements of Domain 1 (planning and preparation). The overall within-subjects effect was highly significant across the 23 elements, $F(22, 2,508) = 18.17, p < .001$. This finding provides justification for the rejection of null hypothesis H_02 : There is no difference in the extent to which award-winning teachers believe each of the 23 elements in Danielson's Domain 1 (planning and preparation) is important to effective teaching and learning.

A test of the pairwise comparison using the Fisher Least Significant Difference (LSD) test (Keppel, 1982) indicated that there are numerous instances of significant differences between the elements of Domain 1 (planning and preparation) at the level of at least $p < .05$. Table 3 presents the means and standard deviations ordered by mean importance rating from most important to least important with subscripts indicating instances of significant difference. Most noteworthy, of the 23 elements in Domain 1, teachers of the year rated Element 16 and Element 1 as being significantly more important to teaching and learning than the other 21 elements. Element 16 focuses on learning activities that engage students and advances them through outcomes. Element 1

focuses on teachers' ability to display a solid knowledge of content and the structure of the discipline. Element 13 (teacher is aware of all teaching resources available) was rated as significantly less important than the others 22 elements of Domain 1. Within Domain 1 (planning and preparation), the 23 elements are grouped into six components. Findings for the elements of Domain 1 grouped by component are as follows.

Component 1a. Of the three elements in Component 1a (demonstrating knowledge of content and pedagogy), Element 1 (teacher displays a solid knowledge of content and the structure of the discipline) and Element 2 (teacher's plans and practice reflect an understanding of relationships among concepts taught) were rated as significantly more important than Element 3 (pedagogical practices reflect current research).

Component 1b. Of the five elements in Component 1b, (demonstrating knowledge of students), three were rated among the most significant in the entire domain: Element 4 (teacher displays an understanding of developmental characteristics of students), Element 6 (teacher displays knowledge of students' skills, knowledge, and language proficiency), and Element 8 (teacher displays knowledge of students' special needs).

Component 1c. The four elements in Component 1c (setting instructional outcomes) were rated significantly low as a group, with none of the four in the top half of the 23 elements in Domain 1. Element 9, the only element to mention Common Core State Standards, was rated one of the two least important elements of the 23.

Component 1d. Similar to Component 1c, the three elements of Component 1d

(demonstrating knowledge of resources) were rated significantly lower with all three in the bottom third of the 23 elements of this domain. In fact, Element 13 (teacher is aware of all teaching resources available) is rated significantly lower than all other 22 elements in Domain 1.

Component 1e. There is significant disparity between the importance ratings of the four elements that make up Component 1e (designing coherent instruction). Element 16 (learning activities are engaging for students and advance them through outcomes) and Element 17 (materials and resources support instructional outcomes and engage students) are both among the group of highest rated elements. However Element 18 (instructional groups are varied and appropriate) and Element 19 (lessons and units have clearly defined structure and sequence) are both among the lowest. Additionally Element 16 has the highest mean importance rating of all 23 elements in this domain.

Component 1f. There is no significant difference in the mean importance ratings between the three elements of Component 1f (designing student assessments). Moreover, none of the three were in the group rated highest or the group rated lowest of the 23 elements in this domain.

Table 3

Domain 1 Means and Standard Deviations Ordered by Mean Importance Rating

Component	Element Number and Name	Mean	SD	n
1e	16. Learning activities are engaging for students and advance them through outcomes	1.15 _a	.36	115
1a	1. Teacher displays a solid knowledge of content and the structure of the discipline	1.15 _a	.36	115
1b	4. Teacher displays an understanding of developmental characteristics of students	1.20 _{ab}	.40	115
1a	2. Teacher's plans and practice reflect an understanding of relationships among concepts taught	1.21 _{ab}	.41	115
1e	17. Materials and resources support instructional outcomes and engage students	1.22 _{ab}	.41	115
1b	6. Teacher displays knowledge of students' skills, knowledge, and language proficiency	1.23 _{ab}	.42	115
1f	22. Formative assessments for learning are planned as part of the instructional process	1.23 _{ab}	.48	115
1f	23. Teacher uses assessment results to plan for individuals and groups	1.24 _{ab}	.43	115
1b	8. Teacher displays knowledge of students' special needs	1.24 _{ab}	.43	115
1f	20. The teacher's instructional outcomes match assessments	1.26 _b	.46	115
1f	21. Assessment criteria and standards are clear and are communicated	1.28 _b	.49	115
1b	5. Teacher displays solid understanding of different learning styles	1.33 _{bc}	.51	115
1c	12. Outcomes reflect several different types of learning opportunities	1.36 _{bc}	.50	115
1c	10. Outcomes are clear and permit viable methods of assessments	1.40 _{bc}	.53	115
1b	7. Teacher displays knowledge of students' interests or cultural heritage	1.43 _c	.53	115
1e	18. Instructional groups are varied and appropriate	1.44 _c	.52	115
1d	15. Teacher is aware of resources to extend professional knowledge	1.50 _{cd}	.52	115
1e	19. Lessons and units have clearly defined structure and sequence	1.50 _{cd}	.61	115
1c	11. Outcomes are suitable for all students in the class	1.50 _{cd}	.63	115
1d	14. Teacher is aware of how to gain access, for students, to resources	1.56 _d	.56	115
1a	3. Pedagogical practices reflect current research	1.58 _d	.53	115
1c	9. Student outcomes reflect significant learning, and reflect, when appropriate, Common Core State Standards	1.60 _d	.65	115
1d	13. Teacher is aware of all teaching resources available	1.80 _e	.61	115

Note. Means sharing a common subscript do not differ at $\alpha = .05$ according to the LSD procedure. The following scale was used for all items within Domain 1: 1=Strongly Agree; 2=Agree; 3=Disagree; 4=Strongly Disagree; 5=Do not understand—treated as missing data.

Research Question 3: To What Extent do Award-Winning Teachers Perceive Differences in the Importance to Effective Teaching and Learning Across Each of the 15 Elements in Danielson's Classroom Environment Domain?

A within-subjects analysis of variance (ANOVA) was conducted to assess the differences of mean importance ratings between the 15 elements of Domain 2 (classroom environment). The overall within-subjects effect was highly significant across the fifteen elements $F(14, 1,708) = 45.12, p < .001$. The inferential analysis provided the support to reject null hypothesis H_03 : There is no difference in the extent to which award-winning teachers believe each of the 15 elements in Danielson's Domain 2 (classroom environment) is important to effective teaching and learning.

A test of the pairwise comparison using the Fisher Least Significant Difference (LSD) test (Keppel, 1982) indicated that there are many instances of significant differences between the elements of Domain 2 (classroom environment) at the level of at least $p < .05$. Table 4 presents the means and standard deviations ordered by mean importance rating from most important to least important with subscripts indicating instances of significance difference. Most noteworthy, teachers of the year rated Elements 14, 3 and 1 as being significantly more important to teaching and learning than the other 12 elements in Domain 2. Element 14 focuses on classroom safety and learning accessibility for all students; Element 3 on teachers conveying genuine enthusiasm for the subject, and Element 1 on teacher-student interactions being positive. Elements of this domain that were rated as significantly less important than all others were Element 8

Table 4

Domain 2 Means and Standard Deviations Ordered by Mean Importance Rating

Component	Element Number and Name	Mean	SD	n
2e	14. The classroom is safe and all learning is equally accessible to all students.	1.09 _a	.29	123
2b	3. Teacher conveys genuine enthusiasm for the subject, and students demonstrate commitment to its value.	1.11 _a	.31	123
2a	1. Teacher-student interactions are friendly, demonstrate general warmth, caring and respect, and are appropriate to developmental and cultural norms of students.	1.11 _a	.32	123
2d	13. Teacher response to misbehavior is appropriate and respectful of the student's dignity.	1.13 _{ab}	.36	123
2d	12. Teacher is alert to student behavior.	1.15 _{ab}	.35	123
2b	5. Instructional goals, activities, interactions, and classroom environment convey high expectations for achievement.	1.15 _{ab}	.38	123
2c	6. Tasks for groups are organized and students are engaged.	1.20 _b	.42	123
2d	11. Standards of conduct are clear to all students.	1.24 _b	.44	123
2b	4. Students accept teacher insistence on work of high quality and demonstrate pride in that work.	1.26 _b	.46	123
2a	2. Student interactions are generally polite and respectful.	1.28 _b	.45	123
2c	9. Efficient systems for performing classroom routines are in place.	1.48 _c	.50	123
2c	7. Transitions occur smoothly.	1.51 _c	.52	123
2e	15. Teacher uses physical resources skillfully, and the furniture is a resource for learning activities.	1.58 _{cd}	.61	123
2c	8. Routines for handling supplies occur smoothly.	1.63 _d	.55	123
2c	10. Volunteers and paraprofessionals are productively engaged during class.	1.76 _e	.54	123

Note. Means sharing a common subscript do not differ at $\alpha = .05$ according to the LSD procedure. The following scale was used for all items within each of the four domains: 1=Strongly Agree; 2=Agree; 3=Disagree; 4=Strongly Disagree; 5=Do not understand—treated as missing data.

(routines for handling supplies occur smoothly) and Element 10 (volunteers and paraprofessionals are productively engaged during class).

There are five components in Domain 2, each consisting of multiple elements. Of the elements that make up Component 2a (Creating an environment of respect and rapport), Element 1 (teacher-student interactions) was rated as significantly more important than the others. Within Component 2b (establishing a culture for learning), Element 3 (teacher enthusiasm for the subject) was rated as significantly more important than other elements. In Component 2c (managing classroom procedures), Element 6 (tasks for groups are organized and students are engaged) was rated as significantly more important than the other four elements in this component. There is no significant difference in the mean importance ratings between the two elements of Component 2d (managing student behavior). For Component 2e (organizing physical space), the mean importance rating for Element 14 (the classroom is safe and all learning is equally accessible to all students) was rated as significantly more important than for the other element in Component 2e. In fact, this element had the highest mean importance rating of all 15 elements.

Research Question 4: To What Extent do Award-Winning Teachers Perceive Differences in the Importance to Effective Teaching and Learning Across each of the 18 Elements in Danielson's Instruction Domain?

A within-subjects analysis of variance (ANOVA) was conducted to assess the differences of mean importance ratings between the 18 elements of Domain 3 (instruction). The overall within-subjects effect was highly significant across the 18

elements $F(17, 2,142) = 7.88, p < .001$. This finding permits the rejection of null hypothesis H_{03} : There is no difference in the extent to which award-winning teachers believe each of the 18 elements in Danielson's Domain 3 (instruction) is important to effective teaching and learning.

A test of the pairwise comparison using the Fisher Least Significant Difference (LSD) test (Keppel, 1982) indicated that there are numerous instances of significant differences between the elements of Domain 3 (classroom environment) at the level of at least $p < .05$. Table 5 presents the means and standard deviations ordered by mean importance rating from most important to least important with subscripts indicating instances of significance difference.

Most noteworthy, teachers of the year rated elements 13, 5, 14, and 17 significantly more important than the other elements of Domain 3. Element 13 focuses on how teachers effectively monitor student learning. Element 5 focuses on the quality of teachers' questioning strategies. Element 14 relates to both the quality and timeliness of teacher feedback to students. Element 17 is about accommodating students' questions and interests and taking advantage of teachable moments.

Of the elements in this domain, three were rated as significantly less important than all others:

- Element 7 (teacher successfully engages all students in the discussion)
- Element 15 (students self-assess and monitor progress)
- Element 11 (lessons have clearly defined pacing and structure – including reflection – around which the activities are organized).

There are five components in Domain 3. Within Domain 3 (classroom environment), the 18 elements are grouped into five components. Findings for the elements of Domain 3 grouped by component are as follows.

Component 3a. Of the four elements that comprise component 3a (communicating with students), Element 4 (teacher's explanations of content are thorough and clear, developing conceptual understanding) was rated as significantly more important than elements 2, 3, and 1. There was no significant difference in importance ratings between those elements.

Component 3b. Regarding the three elements of Component 3b (using questioning and discussion techniques), Element 5 (teacher questioning) was rated significantly more important than Element 6 (classroom interaction represents true discussion, with teacher stepping to the side when appropriate) and Element 7 (teacher successfully engages all students in the discussion). Also, Element 7 was rated significantly less important than both Elements 5 and 6.

Component 3c. Of the 4 elements in component 3c (engaging students in learning), Element 8 (activities and assignments are appropriate to students and are engaging and require students to explain their thinking) was rated significantly more important than the other 3 elements (9, 10, and 11). In addition, Element 11 (lessons have clearly defined pacing and structure (including reflection) around which the activities are organized) was rated significantly less important than the other 3 elements.

Component 3d. The four elements in Component 3d (using assessment in instruction) varied greatly in their importance ratings. Elements 13 (teachers effectively

monitor student learning) and 14 (teacher feedback to students is of high quality and is provided in a timely manner) rated among the four most important of the 18 elements in Domain 3, while the other two elements in Component 3d (elements 12 and 15) were rated among the four least important of the 18 elements in Domain 3.

Component 3e. Of the three elements in Component 3e (demonstrating flexibility and responsiveness), Element 17 (teacher accommodates students' questions or interests and takes advantage of teachable moments) was among the top 4 of all 18 elements in the domain and was rated significantly more important than the other two elements (16 and 18). It is important to note, however, that all 3 were in the top half of the 18 in terms of importance.

Table 5

Domain 3 Means and Standard Deviations Ordered by Mean Importance Rating

Component	Element Number and Name	Mean	SD	n
3d	13. Teachers effectively monitor student learning	1.13 _a	.33	127
3b	5. Teacher's questions are of high quality and adequate time is available for students to respond	1.14 _a	.35	127
3d	14. Teacher feedback to students is of high quality and is provided in a timely manner	1.14 _a	.35	127
3e	17. Teacher accommodates students' questions or interests and takes advantage of teachable moments	1.14 _a	.35	127
3c	8. Activities and assignments are appropriate to students and are engaging and require students to explain their thinking	1.15 _{ab}	.36	127
3e	18. Teacher persists in seeking approaches for student who have difficulty learning	1.16 _{ab}	.37	127
3b	6. Classroom interaction represents true discussion, with teacher stepping to the side when appropriate	1.18 _{ab}	.39	127
3a	4. Teacher's explanations of content are thorough and clear, developing conceptual understanding	1.18 _{ab}	.39	127
3e	16. Teacher is able to make an adjustment to a lesson, and the adjustment occurs smoothly	1.22 _b	.42	127
3a	2. Teacher directions and procedures are clear to students and contain an appropriate level of detail	1.26 _{bc}	.44	127
3a	3. Teacher's spoken and written language is clear and correct as well as appropriate to students' age and interests	1.27 _{bc}	.44	127
3a	1. Teacher clearly communicates goals for learning	1.28 _{bc}	.45	127
3c	10. Instructional materials and resources are suitable to instructional goals	1.28 _{bc}	.45	127
3c	9. Instructional groups are productive and appropriate	1.28 _{bc}	.47	127
3d	12. Students are aware of and understand assessment criteria	1.32 _{bc}	.54	127
3b	7. Teacher successfully engages all students in the discussion	1.34 _c	.51	127
3d	15. Students self-assess and monitor progress	1.39 _c	.51	127
3c	11. Lessons have clearly defined pacing and structure (including reflection) around which the activities are organized	1.41 _c	.55	127

Note. Means sharing a common subscript do not differ at $\alpha = .05$ according to the LSD procedure. The following scale was used for all items within each of the four domains: 1=Strongly Agree; 2=Agree; 3=Disagree; 4=Strongly Disagree; 5=Do not understand—treated as missing data.

Research Question 5: To What Extent do Award-winning Teachers Perceive Differences in the Importance to Effective Teaching and Learning Across Each of the 20 Elements in Danielson's Professional Responsibilities Domain?

A within-subjects analysis of variance (ANOVA) was conducted to assess the differences of mean importance ratings between the 20 elements of Domain 4 (professional responsibilities). The overall within-subjects effect was highly significant across the 20 elements $F(19, 2,223) = 28.80, p < .001$. The inferential analysis provided the support to reject null hypothesis H_03 : There is no difference in the extent to which award-winning teachers believe each of the 20 elements in Danielson's Domain 4 (professional responsibilities) is important to effective teaching and learning.

A test of the pairwise comparison using the Fisher Least Significant Difference (LSD) test (Keppel, 1982) indicated that there are numerous instances of significant differences between the elements of Domain 4 (professional responsibilities) at the level of at least $p < .05$. Table 6 presents the mean and standard deviation ordered by mean importance rating from most important to least important with subscripts indicating instances of significance difference. Most noteworthy, Elements 16 and 17, both from Component 4f (showing professionalism), were ranked significantly more important than the other 18 elements in Domain 4. Element 16 denotes teachers acting with integrity and honesty and Element 17 refers to teachers actively seeking to serve students' needs. At the same time, Elements 11 and 12, both from component 4d (participating in the professional community), were ranked significantly less important than the other 18 elements of this professional responsibility domain. Element 11 concerns teachers

volunteering to participate in school events, making a substantial contribution. Element 12 is about teacher volunteering to participate in school and district projects, making a substantial contribution. The 20 elements of the professional responsibilities domain are categorized into six components. Findings by component are as follows.

Components 4a, 4b, 4c, and 4d. Neither of the two elements of Component 4a (reflecting on teaching), the three elements of Component 4b (maintaining accurate records), or the three elements of Component 4c (communicating with families) were among either the most significantly or least significantly rated elements of this domain. None of the elements of Component 4d (participating in professional communities) were ranked in the top third of elements in this domain.

Component 4e. Regarding Component 4e, Element 13 (teacher seeks out opportunities for professional development to enhance content knowledge and pedagogical skill) was ranked significantly more important than all but three of the other 19 elements in this domain, including the other two elements of Component 4e.

Component 4f. The five elements of Component 4f (showing professionalism) varied significantly in their ranking. Elements 16 and 17, as mentioned above, ranked significantly more important than all other 18 elements, whereas Element 20 (teacher adheres to policies and established procedures) is among the four elements ranked significantly lower than the other 16 elements in this domain.

Table 6

Domain Four Means and Standard Deviations Ordered by Mean Importance Rating

Component	Element number and name	Mean	SD	n
4f	16. Teacher acts with integrity and honesty	1.11 _a	.31	118
4f	17. Teacher is active in serving student needs	1.14 _a	.37	118
4e	13. Teacher seeks out opportunities for professional development to enhance content knowledge and pedagogical skill	1.22 _b	.44	118
4a	1. Teacher makes an accurate assessment of a lesson's effectiveness and the extent to which it achieved its goal	1.28 _{bc}	.47	118
4f	19. Teacher maintains an open mind and participates in team or departmental decision-making	1.31 _c	.53	118
4b	4. Teacher's system for maintaining information on student progress in learning is effective	1.32 _{cd}	.49	118
4a	2. Teacher is able to make specific suggestions on how a lesson might be improved	1.33 _{cd}	.51	118
4d	10. Teacher contributes to a professional learning community focused on improving practice	1.37 _{cd}	.57	118
4f	18. Teacher works within a particular team to ensure that students receive a fair opportunity to succeed	1.42 _d	.58	118
4d	9. Teacher's relationship with colleagues is cooperative and supportive	1.46 _d	.58	118
4e	14. Teacher participates actively in networks that provide collegial support and feedback	1.49 _d	.57	118
4b	3. Teacher's system of maintaining information on student completion of assignments is effective	1.53 _d	.55	118
4c	7. Teacher communicates with parents about students' progress on a regular basis	1.55 _e	.56	118
4e	15. Teacher is active in professional organizations to enhance personal practice and provide leadership and support to colleagues	1.60 _{ef}	.60	118
4c	6. Teacher provides frequent information to parents about the instructional program	1.64 _f	.59	118
4c	8. Teacher's efforts to engage families in the instructional program are frequent and successful	1.67 _f	.60	118
4f	20. Teacher adheres to policies and established procedures	1.70 _{fg}	.67	118
4b	5. Teacher's system for maintaining information on non-instructional information is effective	1.74 _{fg}	.56	118
4d	11. Teacher volunteers to participate in school events making a substantial contribution	1.80 _g	.66	118
4d	12. Teacher volunteers to participate in school and district projects making a substantial contribution	1.81 _g	.68	118

Note. Means sharing a common subscript do not differ at $\alpha = .05$ according to the LSD procedure. The following scale was used for all items within Domain 4: 1=Strongly Agree; 2=Agree; 3=Disagree; 4=Strongly Disagree; 5=Do not understand—treated as missing data.

Summary of Data Analysis

In summary, for all five research questions the null hypothesis can be rejected, as significant differences in importance ratings were found between all four domains (Research Question 1) and among the elements within each domain (Research Questions 2 through 5). Regarding the domains themselves, Domain 3 (instruction) was rated most important, followed by Domain 2 (classroom environment), then Domain 1 (planning and preparation), and lastly, Domain 4 (professional responsibilities). It is important to note that even the mean importance rating of 1.5 of the lowest rated domain (professional responsibilities) still indicates a mean response between *strongly agree* and *agree* with the statement that the domain is important to effective teaching and learning.

Regarding Domain 3 (instruction), the highest rated domain, four elements were rated significantly more important than the other 14:

- Element 5 (quality of teacher questioning strategies)
- Element 13 (effectively monitoring student learning)
- Element 14 (quality and timeliness of teacher feedback to students)
- Element 17 (accommodating students' questions and interests and taking advantage of teachable moments).

Concerning the second highest rated domain (Domain 2, classroom environment), three elements (14, 3, and 1) were rated significantly more important than the other 12 elements. Element 14 focuses on classroom safety and learning accessibility for all students; Element 3 on teachers conveying genuine enthusiasm for the subject, and

Element 1 on teacher-student interactions being positive. These three elements represented three different components of Domain 2.

With respect to the third highest rated domain (Domain 1, planning and instruction), two elements (16 and 1) were rated significantly higher than the other 21. Element 16 focuses on learning activities that are engaging for students and advance them through outcomes, and Element 1 focuses on teachers displaying a solid knowledge of content and the structure of the discipline.

Finally, even though Domain 4, professional responsibilities, was the lowest rated domain, it contained elements that were individually rated as important. Most notably, Elements 16 (teachers acting with integrity) and 17 (teachers actively seeking to serve students' needs), were ranked significantly more important than the other 18 elements in this domain. Both of these elements are from Component 4f, which focuses on showing professionalism. It is essential to note that the mean importance rating for all 78 elements was between *agree* and *strongly agree*, although there were significant differences between the level of agreement from domain to domain and within the elements and components of each domain.

Conclusion

This section described the demographics of respondents and then reported the findings of inferential statistics based on the five research questions. The questions examined to what extent award-winning teachers perceive differences in the importance to effective teaching and learning across each of Danielson's (2-13) four domains and across the elements within those domains. In all five cases, significant differences were

found and null hypotheses were rejected. Section five discusses interpretation of findings, implications for social change, recommendations for action, and recommendations for further study.

Section 5: Discussion, Conclusions, and Recommendations

Introduction

This section begins with an overview of the study, followed by an interpretation of findings addressing each research question and relating those findings to the constructivist conceptual framework of the study. Implications for social change, recommendations for action, and recommendations for further study will also be addressed. The section will conclude with a summary of the key take-home points of this study.

Overview

This quantitative study was designed to determine award-winning teachers' perspectives on the important elements of effective teaching as reflected in Danielson's Framework for Teaching, a commonly used teacher evaluation instrument. Across the United States, reforms in teacher evaluation are being enacted in an attempt to raise teacher quality and, as a result, student achievement. Although there is much research on teacher evaluation and teacher quality, there is little that addresses the relative importance of the 4 domains (planning and preparation, classroom environment, instruction, and professional responsibility) and the 76 elements of effective teaching in Danielson's Framework for Teaching from the perspective of exemplary teachers. The purpose of this study was to examine award-winning teachers' perspectives towards the importance of the elements in Danielson's Framework for Teaching on effective teaching. Danielson's (2013) Framework for Teaching is rooted in the works of Dewey, Piaget, Brunner, and Vygotsky. Likewise, constructivism forms the theoretical foundation of this study, both

in how individuals learn and how professions can be improved. The constructivist concept that current knowledge can be used to build new knowledge supports the idea that best practices and the perspectives of exemplary practitioners can inform the practice of others within a given profession.

The research questions examined to what extent award-winning teachers perceive differences in the importance to effective teaching and learning across each of Danielson's four domains and across the elements within those domains. Five research questions were addressed:

To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of Danielson's four domains?

To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 23 elements in Danielson's planning and preparation domain?

To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 15 elements in Danielson's classroom environment domain?

To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 18 elements in Danielson's instruction domain?

To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 20 elements in Danielson's professional responsibilities domain?

A quantitative single-factor within-subject design was utilized. Framework for Teaching Survey importance ratings obtained from state teachers of the year for the past 6 years ($N = 350$), were compared using repeated measure one-way Analysis of Variances (ANOVA). Significant F values were followed by the Fisher Least Significant Difference (LSD) test (Keppel, 1982) to determine the domains or elements that significantly differ from one another.

In all five cases, significant differences were found and null hypotheses were rejected. There were significant differences in importance ratings across the four domains (question 1) and across the elements within each domain (questions 2-5). Findings from this study may facilitate positive social change by providing valuable information for schools, districts, and states across the United States to more accurately evaluate teachers and promote positive teacher development, which may result in improving teacher quality, raising student achievement, and closing the achievement gap.

Interpretation of Findings

Research Question 1: Comparisons Across Four Domains

The first question asked: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of Danielson's four domains? A Fisher Least significant Difference (LSD) test (Keppel, 1982) showed that importance ratings between the 4 domains were different to a statistically significant level of at least $p < .001$ (see Table 2), allowing for a rejection of the null hypothesis. Domains were rated in the following order from most important to least important:

1. Domain 3: Instruction
2. Domain 2: Classroom Environment
3. Domain 1: Planning and Preparation
4. Domain 4: Professional Responsibilities.

These findings are consistent with other research and opinions on the relative importance of the four domains. This order of domain importance is identical to that found by Sweeley (2004) in a study using the same survey of teachers in a Pennsylvania school district. Because of the perceived greater importance of domains 2 and 3, some studies have only focused on those 2 domains, in some cases even excluding domains 1 and 4. For instance, in the large Measures of Effective Teaching Project, a study of over 3,000 teachers focusing on the link between evaluations and student achievement, only Domains 2 and 3 were used (Kane & Steiger, 2012). Likewise, in a similar study of teachers in the Chicago Public Schools, only Domains 2 and 3 were used (Sartain, Stoelinga, & Brown, 2011). In summary, this study and others have concluded that when it comes to the four domains in the framework, it is the art and science of instruction itself that matters most.

However, it is important to note that even for the lowest ranked domain (professional responsibilities), the mean importance ratings were between “agree” and “strongly agree” at $M = 1.5$ (see Table 2). In other words, although the instruction and classroom environment domains were ranked most important, participants still ranked the other two domains (planning and preparation and professional responsibilities) as vital components of effective teaching and learning. Therefore, in a complete and

comprehensive teacher development plan, all four domains should be included. At the same time, if areas of focus need to be chosen, especially for evaluation purposes, Domain 3: Instruction and Domain 2: Planning and Preparation are the logical places to start.

Research Question 2: Domain 1: Planning and Preparation

The second question asked: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 23 elements in Danielson's planning and preparation domain? A test of pairwise comparisons using the Fisher Least Significant Difference (LSD) test (Keppel, 1982) indicated that there are numerous instances of significant differences between the elements of Domain 1: Planning and Preparation at the level of at least $p < .05$ (see Table 3), therefore the null hypothesis can be rejected.

Although in research question 1, which compared domains, this domain (planning a preparation) ranked lower than two others, its elements are still important, with a mean importance rating between "agree" and "strongly agree" ($M = 1.4$). The top three ranked elements of Domain 1 are listed in Table 7.

Table 7

Top 3 Elements of Domain 1: Planning and Preparation Ordered by Mean Importance Rating

Component	Element Number and Name	Mean
1e	16. Learning activities are engaging for students and advance them through outcomes.	1.15 _a
1a	1. Teacher displays a solid knowledge of content and the structure of the discipline.	1.15 _a
1b	4. Teacher displays an understanding of developmental characteristics of students.	1.20 _{ab}

Note. Means sharing a common subscript do not differ at $\alpha = .05$ according to the LSD procedure. The following scale was used for all items within Domain 1: 1=Strongly Agree; 2=Agree; 3=Disagree; 4=Strongly Disagree; 5=Do not understand—treated as missing data. See Table 2 for a complete listing of the elements of Domain 1 by order of mean importance rating.

Of the 23 elements in this domain, two were rated significantly more important than the other 21:

- Element 16: Learning activities are engaging for students and advance them through outcomes ($M = 1.15$)
- Element 1: Teacher displays a solid knowledge of content and the structure of the discipline ($M = 1.15$)

The value of focusing on student engagement, even in the planning process, as reflected in the top rated element of this domain (Element 16), is indicative of the constructivist emphasis on the importance of student engagement in the learning process (Bruner, 1986; Vygotsky, 1978). Likewise, the importance of teachers displaying a solid knowledge of content and the discipline (the second highest rated element), reflects Dewey's (1938) emphasis on teachers possessing a strong knowledge base and

Vygotsky's (1978) notion of the zone of proximal development and the idea that the teacher must be at a significant level of content expertise in order to bring students along. The third highest rated element ($M = 1.20$) in Domain 1 was Element 4: Teacher displays an understanding of developmental characteristics of students (See Table 7). The importance of this element is reflective of Piaget's (1952) stage theory of intellectual development.

In conclusion, planning for student engagement, teacher knowledge of the content area and the discipline, and teacher understanding of the development of students, were rated as the key elements of the planning and preparation domain.

Research Question 3: Domain 2: Classroom Environment

The third question asked: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 15 elements in Danielson's classroom environment domain? A test of pairwise comparisons using the Fisher Least Significant Difference (LSD) test (Keppel, 1982) indicated that there are numerous instances of significant differences between the elements of Domain 2: Classroom Environment at the level of at least $p < .05$ (See Table 4). Therefore the null hypothesis was rejected.

Three elements of the classroom environment domain were rated significantly higher than the other 12 in this domain (see Table 4). These top three elements of the classroom environment domain are listed in Table 8.

Table 8

*Top 3 Elements of Domain 2: Classroom Environment Ordered by Mean Importance**Rating*

Component	Element Number and Name	Mean
2e	14. The classroom is safe and all learning is equally accessible to all students.	1.09 _a
2a	1. Teacher-student interactions are friendly, demonstrate general warmth, caring and respect, and are appropriate to developmental and cultural norms of students.	1.11 _a
2b	3. Teacher conveys genuine enthusiasm for the subject, and students demonstrate commitment to its value.	1.11 _a

Note. Means sharing a common subscript do not differ at $\alpha = .05$ according to the LSD procedure. The following scale was used for all items within each of the four domains: 1=Strongly Agree; 2=Agree; 3=Disagree; 4=Strongly Disagree; 5=Do not understand—treated as missing data. See Table 4 for a complete listing of the elements of Domain 2 by order of mean importance rating.

Element 14 (which had the highest mean importance rating) focuses on the physical classroom environment: The classroom is safe and all learning is equally accessible to all students. Sweeley (2004), in a study using the same survey (which she created), also found this to be one of the three top elements of the classroom environment domain. This is not surprising because, for students to learn, they must feel safe and learning must be accessible (Thapa, Cohen, Guffey, & Higgins-D'Alessandro, 2013).

The other two elements in the top three both focus on the emotional environment in the classroom. Element 1 emphasizes the relationship between the teacher and the students. Both Sweeley (2004) and Doer (2012), who also used this survey with educators, found this element to be among the three most important of the classroom environment domain. This is consistent with a large body of research that emphasizes the importance of the relationship between teacher and student in quality teaching (Marzano,

2003; Whitaker, 2012; Worley, Titsworth et al, 2007). Element 3 focuses on the enthusiasm the teacher demonstrates toward the content and the students show toward learning. Doer (2012) also found Element 3 to be a top three Domain 2 element. Although teacher evaluations are often based on student test scores, it is important not to underestimate the value of non-cognitive factors such as relationships, enthusiasm towards content and teaching, and attitudes towards learning. The consistencies of the results of this study with those of Sweeley (2004) and Doerr (2012) underscore the importance of these three key elements.

Research Question 4: Domain 3: Instruction

The fourth question asked: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 18 elements in Danielson's instruction domain? A test of pairwise comparisons using the Fisher Least Significant Difference (LSD) test (Keppel, 1982) indicated that there are numerous instances of significant differences between the elements of Domain 3: Instruction at the level of at least $p < .05$ (see Table 5). Therefore the null hypothesis can be rejected.

Four of the 18 elements were rated significantly higher than the other 14: Elements 13, 5, 14, and 17 (see Table 9).

Table 9

Top Four Elements of Domain 3: Instruction Ordered by Mean Importance Rating

Component	Element Number and Name	Mean
3d	13. Teachers effectively monitor student-learning .	1.13
3b	5. Teacher's questions are of high quality and adequate time is available for students to respond.	1.14
3d	14. Teacher feedback to students is of high quality and is provided in a timely manner.	1.14
3e	17. Teacher accommodates students' questions or interests and takes advantage of teachable moments.	1.14

Note. Means do not differ at $\alpha = .05$ according to the LSD procedure. The following scale was used for all items within each of the four domains: 1=Strongly Agree; 2=Agree; 3=Disagree; 4=Strongly Disagree; 5=Do not understand—treated as missing data. See Table 5 for a complete listing of the elements of Domain 3 by order of mean importance rating.

The element with the highest mean importance rating was Element 13: Teachers Effectively Monitor Student Learning. This outcome reflects the importance of using formative assessment to shape future instruction. Unfortunately, with a nation-wide focus on standardized, summative assessment to evaluate teachers, programs, schools, and districts, often the type of formative assessment that may help monitor student learning and provide teachers with the information to adjust instruction accordingly is overlooked (Schneider & Gowan, 2013). The fact that this element was the highest rated by exemplary teachers in the instruction domain indicates the importance of formative assessment and other efforts to monitor student learning.

Elements 5, 14, and 17, followed with matching mean importance ratings ($M = 1.14$). Element 5 involving high quality teacher questioning and wait time was also the highest rated element in Doer's (2012) study. Element 14: Teacher feedback to students is of high quality and is provided in a timely manner, was also one of the highest rated

elements in both Sweeley's (2004) and Doer's (2012) study. Element 17: Teacher accommodates students' questions and takes advantage of teachable moments, was not among the highest rated in the Sweeley and Doer studies, but was in this study.

It is important to remember that in all three studies, this domain (Domain 3: Instruction) had the highest average mean importance rating compared to the other domains (see Table 2). Additionally, even the *lowest* rated element in this domain (Element 11: Lessons have clearly defined pacing and structure) has a mean importance rating ($M = 1.41$) *above* the overall average rating for the lowest rated domain ($M = 1.50$), which is Domain 4: Professional Responsibilities. Therefore, all 18 elements in Domain 3: Instruction should be considered highly important to effective teaching. These instruction elements are clustered into the following five components:

- communicating with students;
- using questioning and discussion techniques;
- engaging students in learning;
- using assessment in instruction;
- demonstrating flexibility and responsiveness.

The highest rated elements of the instruction domain as described above are an accurate reflection of the five components. These concepts can be considered the heart of the art and science of teaching (Marzano, Frontier, & Livingston, 2011).

Research Question 5: Domain 4: Professional Responsibilities

The fifth question asked: To what extent do award-winning teachers perceive differences in the importance to effective teaching and learning across each of the 20

elements in Danielson’s professional responsibilities domain? A test of pairwise comparisons using the Fisher Least Significant Difference (LSD) test (Keppel, 1982) indicated that there are numerous instances of significant differences between the elements of Domain 4: Professional Responsibilities at the level of at least $p < .05$ (see Table 6). Therefore the null hypothesis can be rejected.

Table 10

Top Four Elements of Domain 4: Professional Responsibilities Ordered by Mean Importance Rating

Component	Element number and name	Mean
4f	16. Teacher acts with integrity and honesty.	1.11 _a
4f	17. Teacher is active in serving student needs.	1.14 _a
4e	13. Teacher seeks out opportunities for professional development to enhance content knowledge and pedagogical skill.	1.22 _b
4a	1. Teacher makes an accurate assessment of a lesson’s effectiveness and the extent to which it achieved its goal.	1.28 _{bc}

Note. Means sharing a common subscript do not differ at $\alpha = .05$ according to the LSD procedure. The following scale was used for all items within each of the four domains: 1=Strongly Agree; 2=Agree; 3=Disagree; 4=Strongly Disagree; 5=Do not understand—treated as missing data. See Table 6 for a complete listing of the elements of Domain 4 by order of mean importance rating.

Although overall this domain is the lowest rated, there are four elements within it with very high mean importance ratings (see Table 10). In fact, Elements 16 and 17 were among the highest rated in the entire framework. Element 16 ($M = 1.11$) focuses on teachers acting with integrity and honesty. However, under increasing pressure to perform, teachers can be tempted to act dishonestly and without integrity regarding, for instance, student test scores on high stakes tests (Brown, 2014). It is when teachers are

willing to embrace their own weaknesses as educators with honesty and integrity that the potential for improvement grows (Whitaker, 2012).

Element 17 ($M = 1.14$) is about teachers actively serving students' needs. The high ranking of this element demonstrates the recognition among exemplary teachers that being a great teacher requires going beyond teaching the syllabus and student achievement. Perhaps their actions in this regard may be one of the key reasons the teachers in this study have been found to be exemplary.

Elements 13 and 1 each deal with teachers' efforts to improve instructional practice. Element 13 focuses on teachers participating in professional development to enhance content knowledge and pedagogical skill. In order for teachers to improve, having a growth mindset and a desire to learn are crucial for teacher development and improvement (Yeager & Dweck, 2012). Element 1 emphasizes the importance of teachers assessing the effectiveness of a lesson and its success in meeting the desired learning outcome. This reflective process is a key to improving practice (Whitaker, 2012). In summary, although the professional responsibilities domain as a whole was rated less important to teaching than the other three domains, the specific elements related to teacher integrity, meeting the needs of students, and reflecting on practice were rated among the most important overall.

Limitations

The generalizations resulting from this study are limited to the population of state and national teachers of the year. The sample size was limited to those teachers of the year who responded to the survey request. However, the opinions and perspectives of this

group of exemplary educators can serve to inform larger populations of educators, administrators, and policy makers. The study was also limited by its quantitative nature, as respondents had no opportunity to elaborate on their answers or explain their choices on the Likert-style survey or to provide any additional information. Therefore, the findings and conclusions in this study result from the perspectives reported on the Framework for Teaching Survey (Sweeley, 2004) and do not consider any other data.

Practical Applications

The results of this study are relevant to anyone who uses Danielson's Framework for Teaching (2013) to evaluate teachers, to train teachers, or to improve their own instructional practice as a teacher. It is difficult for evaluators to assess all 66 elements of the framework. The results from this study can help evaluators focus on the elements that exemplary teachers found to be most important. Likewise, when instructional coaches and mentors work with teachers who are evaluated by the framework, these results may provide a starting place or point of emphasis. These results also apply to those responsible for creating professional development for teachers. Finally, as teachers use the framework to improve their own practice they can focus on these same key elements. Therefore, the results of this research are valuable to teachers, to the administrators who evaluate them, and to those who train them.

The results of this study are also relevant to those who prepare teachers and administrators to enter the profession. Federal initiatives and state legislation have increased the focus on teacher accountability and evaluation (Coggshall et al., 2012; Taylor & Tyler, 2012). Therefore, teacher preparation institutions need to prepare their

students for the increased importance of teacher evaluation in the teaching profession. Likewise, those institutions that license and train administrators, also need to include training in how to effectively evaluate teachers using the common evaluation tools such as Danielson's (2013) framework. Focusing on the elements of the framework that matter most is one way to evaluate teachers effectively.

Implications for Social Change

The purpose of this study was to examine award-winning teachers' perspectives towards the importance of the elements in Danielson's (2013) Framework for Teaching on effective teaching. The significance of the findings from this study provides insights into the most commonly used teacher evaluation tool in America that may facilitate positive social change by increasing the quality of instruction in classrooms. There is a large academic student achievement gap in America (Darling-Hammond, 2010; Fullan, 2009; Mangiante, 2011). Teacher quality is directly linked to increased student achievement (Darling-Hammond, 2010; Fullan, 2009; Gates, 2012; Markow & Pieters, 2010; Marshall, 2009). Because teacher quality has a significant impact on student achievement (Baker, Oluwole, & Green, 2013; Darling-Hammond, 2013; Looney, 2011), every child in America, regardless of socio-economic status or zip code, deserves a quality teacher. Improving the quality of teachers in Minnesota and across the country, especially in areas where achievement is low, is one way to address the achievement gap (Baker et al., 2013; Darling-Hammond, Amrein-Beardsley, Haertel, & Rothstein, 2011; Mangiante, 2011). By focusing on the elements of teaching that those teachers who have been recognized as exemplary perceive to be the most important as identified in this

study, evaluation tools such as Danielson's (2013) Framework for Teaching can be used to promote social change by enabling schools, districts and states to more accurately evaluate teachers and to devote resources to developing teachers in the domains and elements with the greatest potential to improve teacher quality, thereby raising student achievement, and closing the achievement gap.

Recommendations for Action

The findings of this study, as stated above, are relevant to anyone involved in teacher quality and teacher evaluation. This included, at the highest level, the governmental agencies that oversee education, and the policy makers who legislate the licensing and evaluation of educators. The findings are also relevant to school districts across the state of Minnesota and the country, administrators, those who train teachers and administrators, and ultimately, teachers themselves.

Recommended Actions

The following key actions may be taken to leverage the findings of this study.

1. Based on the results of research question 1, districts with limited time and resources should focus their training, development, workshops, and evaluation efforts on the components of Domain 2: Classroom Environment and Domain 3: Instruction because these domains were rated significantly more important than Domains 1 and 2.
2. Districts with the resources, time, and expertise to focus on the components of all four domains should do so. Despite the response that Domain 1: Planning and Preparation and Domain 4: Professional Responsibilities were rated as statistically

less important than Domains 2 and 3, the responses for both domains 1 and 4 were still between “agree” and “strongly agree” indicating that these elements are still important to promoting teacher growth.

3. When creating workshops and trainings based on Domain 1: Planning and Preparation it is important to focus on the key elements of student engagement, teacher knowledge of the content area, and teacher understanding of student development.
4. When creating workshops and trainings based on Domain 2: Classroom Environment it is important to focus on the following key areas: (a) Physical environment: How to create a safe classroom with equal access to learning for all students; and (b) Emotional environment: The importance of creating and maintaining positive teacher-student relationships and teacher enthusiasm towards the content and its value. These ideas are often described as relationship and relevance (Marzano, 2003). These two distinct environment topics were among the highest rated in the entire framework by respondents.
5. When creating workshops and trainings based on Domain 3: Instruction efforts should focus on:
 - monitoring student learning;
 - using effective questioning and discussion techniques;
 - providing high quality feedback to students in a timely manner;
 - accommodating students’ questions and interests and taking advantage of students’ interests.

Although there are more elements highlighted here than in the other domains, this was the highest rated domain. Therefore, this is a key area of focus in order to develop effective teachers in the classroom.

6. Workshops and trainings based on Domain 4: Professional Responsibilities should provide support in terms of the importance of:
 - teaching with honesty and integrity;
 - meeting students' needs, both academic and otherwise, and how to access building, district, and community resources and supports that are available in order to do so;
 - reflecting on lesson effectiveness and evaluating if lessons are teaching the intended learning outcomes.
7. Teacher preparation programs and administrator training programs should focus on the elements highlighted in Steps 2-6.
8. Administrators, who actually conduct teacher evaluations using Danielson's Framework (2013), should focus their efforts on looking for evidence of the elements highlighted in this study as being rated most important.
9. Policy makers at both the district and state levels where teacher evaluations are used that are based on Danielson's Framework for Teaching (2013), would serve their constituents well by understanding that not all elements of teaching are equal in their importance to quality teaching. Therefore, policies and legislation should not be crafted that assume equal importance of elements. Instead, policies that allow teachers to focus on those elements that are most important will better serve

the academic needs of students rather than attempting to have teachers try to improve in all 66 elements. Likewise, when teacher observation results are used to assess teacher quality, it is important to remember that a teacher's low (or high) score on certain elements may not affect student achievement in the classroom as much as a particular score on a different element.

Dissemination

Results of this study may be disseminated in several ways. First, I will write an executive report based on the findings of this dissertation. Second, I plan to present my report to, the Minnesota Commissioner of Education who expressed interest concerning the findings of this study stating, "We at the Minnesota Department of Education are very interested in the findings of your research...your research could provide national evidence that could inform our current model as we work to make it even more relevant and meaningful to our teachers" (B. Cassellius, personal communication, September 13, 2013). Additionally, this report will be presented to the head of the Educator Evaluation Specialist Committee commissioned in Minnesota who is responsible for teacher evaluation and development. The results of this study may be coordinated and disseminated in the state through the auspices of this official office. The commissioner also suggested a "shared reporting out of your findings" (B. Cassellius, personal communication, September 13, 2013). I also plan to create and conduct both a teacher development and an administrator workshop throughout the state of Minnesota based on findings of this study for those districts that use Danielson's Framework for Teaching as part of their teacher evaluation and development plans. This endeavor will be conducted

with the support of Minnesota Commissioner of Education, who stated, “In addition to the findings of your research, we would be interested in learning more about any projects you have planned to use your research and how it might better the work of evaluating teachers across the state” (B. Cassellius, September, 13, 2013, p. 1). This workshop, based on the research findings of this study, could help districts implement new evaluation programs focused on the *key* elements of Danielson’s Framework for Teaching when observing, training, and evaluating teachers, thereby improving evaluation accuracy, driving teacher professional development, increasing teacher effectiveness, and ultimately increasing student academic achievement.

Finally, I will share the findings of this study with the creator of the Framework for Teaching who expressed interest in the results of this research to identify which elements exemplary teachers perceive to be the most important to quality teaching (C. Danielson, personal communication, July 10, 2014). Perhaps most importantly, as a practicing elementary teacher, these results will inform and improve my own practice.

Recommendations for Further Study

The design of this study was quantitative, with data gathered limited to responses to a Likert-style survey. A qualitative study, consisting of interviews or focus groups with a random selection of original participating teachers would allow for further analyzing and exploring the results of this study. The original study focused on which elements teachers of the year believed to be most important; a qualitative follow-up study could focus on why exemplary teachers perceived these elements to be most important to effective teaching.

This study surveyed award-winning teachers on their perspectives on the 66 elements of Danielson's Framework for Teaching. One of the reasons behind conducting this study was that it is difficult for evaluators to focus on such a large number of elements during a one-period observation of teachers in the classroom. Because of the large number of elements, sometimes evaluators observe teachers and comment on only the 22 components (which are each made up of elements) rather than the entirety of the 66 elements (Danielson, 2013). Therefore, it would be valuable to conduct a similar quantitative survey study that asked participants specifically about their perceptions on the importance to quality teaching of the 22 components rather than all 66 elements. The research questions of this future study could be similar to or the same as those used in the original study. The results would be relevant to how the framework is used in those applications where the focus is on the 22 components as opposed to the 66 elements.

This study focused on the perspectives of award-winning teachers made up of state and national teachers of the year. It could be replicated with other groups of exemplary teachers (e.g., Milikan award-winners, National Board Certified teachers). This study also could be conducted with a sample or randomly generated group of teachers of all abilities and experience levels. Those results could be compared to the original study, or a similar sample of exemplary teachers.

Finally, a similar study, using the same survey, could be given to exemplary administrators. This would provide data as to the perspective of those in leadership who have been recognized as highly effective at supervising teachers perceive to be the key

components of teacher quality. Administrator studies could take on the same variations described above.

Conclusion

Teacher quality matters because it significantly impacts student achievement. Unfortunately, there is currently an achievement gap in America. Every child, regardless of his or her socioeconomic status or zip code, deserves a chance at success. In the classroom, that chance begins with a quality teacher. Teacher evaluation programs such as Danielson's Framework for Teaching have the potential to not only evaluate teachers, but also help teachers develop into more effective practitioners. This Framework for Teaching can, as Danielson (2007) stated, "transform what is generally the rather meaningless ritual of supervisory evaluation into a powerful process of thinking about instructional excellence" (p. 177). It is difficult for evaluators, trainers, or teachers to focus on all 66 elements in the Framework for Teaching. From the results of this study, exemplary educators from across the country agreed that the elements in Danielson's Framework for Teaching are important to effective teaching and learning, but that not each of the 66 elements bear the same level of importance. The participants of this study indicated that there are significant differences between the importance of the four domains and the elements within each domain.

Therefore, to use the Framework for Teaching both to evaluate teachers and further develop teachers' effectiveness, emphasis should be placed on those elements demonstrated in this study to be significantly most important. In doing so, not only might teacher effectiveness be more accurately measured, but also teachers may have the

opportunity to focus on what truly matters to improve academic achievement, thereby improving their practice, and moving step-by-step, one teacher at a time, closer to a high quality teacher in every classroom in America.

References

- Aaronson, D., Barrow, L., & Sander, W. (2007). Teachers and student achievement in the Chicago public high schools. *Journal of Labor Economics*, *25*(1), 95–135. doi: 10.1086/508733
- Al-Huneidi, A. M., & Schreurs, J. (2012). Constructivism based blended learning in higher education. *International Journal of Emerging Technologies in Learning*, *7*(1), 4–9. doi: 10.1007/978-3-642-35879-1_74
- Babbie, E. R. (2007). *The practice of social research*, Belmont, CA: Thomson Wadsworth.
- Backe, A. (2001). John Dewey and early Chicago functionalism. *History of Psychology*, *4*(4), 323–340. doi: 10.1037//1093-4510.4.4.323
- Bahadori, M., Sadeghifar, J., Peyman, H., Shams, L., Sayemiri, K., & Nejati, M. (2012). The relationship between teachers' evaluation scores and the students' academic performance: A case study in Iran. *TTEM- Technics Technologies Education Management*, *7*(4), 1635–1640. Retrieved from <http://www.ttem.ba/>
- Baker, B. D., Oluwole, J. O., & Green, P. C. (2013). The legal consequences of mandating high stakes decisions based on low quality information: Teacher evaluation in the race-to-the-top era. *Education Policy Analysis Archives*, *21*(4/5), 1–68. Retrieved from <http://epaa.asu.edu/ojs/>
- Bandura, A., Barbaranelli, C., Caprara, G. V., & Pastorelli, C. (2001). Self-efficacy beliefs as shapers of children's aspirations and career trajectories. *Child development*, *72*(1), 187–206. doi: 10.1111/1467-8624.00273

- Barber, M., & Mourshed, M. (2007). *How the world's best performing school systems come out on top (McKinsey Report)*. McKinsey Institute. Retrieved from http://www.mckinsey.com/clientservice/socialsector/resources/pdf/Worlds_School_Systems_Final.pdf
- Basch, C. E. (2011). Teen pregnancy and the achievement gap among urban minority youth. *Journal of School Health, 81*(10), 614–618. doi:10.1111/j.1746-1561.2011.00635.x
- Belfield, C., & Levin, H. (2007). *The price we pay: Economic and social consequences of inadequate education*. Washington, DC: Brookings Institution Press.
- Benedict, A. E., Thomas, R. A., Kimerling, J., & Leko, C. (2013). Trends in teacher evaluation. *Teaching Exceptional Children, 45*(5), 60-68. Retrieved from <http://journals.cec.sped.org/tec/>
- Benoit, S., Schwartz, M., Lachey, J., Hagan, M., Rushing, P., Blake, K., Danhoo, W. (2000). A novel selective melanocortin-4 receptor agonist reduces food intake in rats and mice without producing aversive consequences. *The Journal of Neuroscience, 20*(9), 3442–3448. Retrieved from <http://www.jneurosci.org/content/20/9/3442.short>
- Bingham, H. (1920). *An explorer in the air service*. New Haven, CT: Yale University Press. Retrieved from http://www.shsu.edu/~his_ncp/AirWWI.html
- Borman, G. D., & Kimball, S. M. (2005). Teacher quality and educational equality: Do teachers with higher standards- based evaluation ratings close student

achievement gaps? *Elementary School Journal*, 106(1), 3–20. doi:

10.1086/496904

Bosch, M., Tavender, E., Bragge, P., Gruen, R., & Green, S. (2013). How to define “best practice” for use in knowledge translation research: a practical, stepped and interactive process. *Journal of Evaluation in Clinical Practice*, 19(5), 763–768.

doi:10.1111/j.1365-2753.2012.01835.x

Bransford, J. D., Brown, A. L., & Cocking, R. R. (2000). *How people learn*. National Academy Press Washington, DC. Retrieved from

<http://www.csun.edu/~SB4310/How%20People%20Learn.pdf>

Bredin, S. S. D., & Warburton, D. E. R. (2013). Physical activity line: Effective knowledge translation of evidence-based best practice in the real-world setting.

Canadian Family Physician Médecin De Famille Canadien, 59(9), 967–968.

Retrieved from <http://www.cfp.ca/>

Brown, E. (2014, April 14). Nine Atlanta educators in test-cheating case are sentenced to prison. *The Washington Post*, Retrieved from

<https://www.washingtonpost.com/local/education>

Brooks, J. G., & Brooks, M. G. (1999). *In search of understanding the case for constructivist classrooms*. Alexandria, VA: Association for Supervision and Curriculum Development.

Bruner, J. S. (1960). *The process of education*. Cambridge, MA: Harvard University Press.

Bruner, J. (1986). *Actual minds, possible worlds*. Cambridge, MA: Harvard University

Press.

Carless, D., Salter, D., Yang, M., & Lam, J. (2011). Developing sustainable feedback practices. *Studies in Higher Education, 36*(4), 395-407.

doi:10.1080/03075071003642449

Chu Chih Liu, & Ju Chen, I. (2010). Evolution of constructivism. *Contemporary Issues in Education Research, 3*(4), 63–66. Retrieved from

<http://journals.cluteonline.com/index.php/CIER>

Clotfelter, C. T., Ladd, H. F., & Vigdor, J. L. (2010). Teacher credentials and student achievement in high school a cross-subject analysis with student fixed effects.

Journal of Human Resources, 45(3), 655–681. Retrieved from

<http://jhr.uwpress.org/content/45/3/655.short>

Cobb, P. (1994). Where is the mind? Constructivist and sociocultural perspectives on mathematical development. *Educational researcher, 23*(7), 13–20. doi:

10.3102/0013189X023007013

Cogshall, J. G., Rasmussen, C., Colton, A., Milton, J., & Jacques, C. (2012). *Generating teacher effectiveness: The role of job-embedded professional learning in teacher evaluation*. National Comprehensive Center for Teacher Quality. Retrieved from

<http://www.gtlcenter.org/sites/default/files/docs/GeneratingTeachingEffectiveness.pdf>

Cole, A., & Ishiyama, J. (2008). Who produces the great teachers? Evaluating graduate political science programs via teaching awards. *Conference Papers -- American*

Political Science Association -- Teaching & Learning, 1-20.

- Collinson, V., Kozina, E., Kate Lin, Y.-H., Ling, L., Matheson, I., Newcombe, L., & Zogla, I. (2009). Professional development for teachers: A world of change. *European Journal of Teacher Education*, 32(1), 3–19. doi: 10.1080/02619760802553022
- Council of Chief State School Officers. (2013). About the national teacher of the year program. *National Teacher of the Year*. Retrieved December 3, 2013, from http://www.ccsso.org/ntoy/About_the_Program.html
- Creswell, J. W. (2013). *Research design: Qualitative, quantitative, and mixed methods approaches*. Los Angeles, CA: Sage Publications.
- Cronbach, L. (1984). *Essentials of psychological testing* (4th ed.). New York, NY: Harper Row.
- D'Alfonso (2006). *Practical concerns of suburban teachers towards Charlotte Danielson's four domains of teacher evaluation*. (Dissertation). Available from ProQuest Dissertations and Theses database. (UMI No. 3239885)
- Danielson, C. (1996). *Enhancing professional practices: A Framework for Teaching*. Alexandria, VA: Association of Supervision and Curriculum Development.
- Danielson, C. (2007). *Enhancing professional practices: A Framework for Teaching* (2nd ed.). Alexandria, VA: Association of Supervision and Curriculum Development.
- Danielson, C. (2011a). Evaluations that help people learn. *Educational Leadership*, 68(4), 35–39.
- Danielson, C. (2011b). *The Framework for Teaching evaluation instrument*. Princeton, NJ: The Danielson Group.

- Danielson, C. (2013). *The Framework for Teaching: Evaluation instrument*. Princeton, NJ: Danielson Group.
- Danielson, C., & McGreal, T. (2000). *Teacher evaluation to enhance professional practice*. Alexandria, VA: Association for Supervision and Curriculum Development.
- Darling-Hammond, L. (2000). Teacher quality and student achievement. *Education Policy Analysis Archives*, 8, 1. Retrieved from <http://epaa.asu.edu/ojs/article/view/392>
- Darling-Hammond, L. (2010). *The flat world and education: How America's commitment to equity will determine our future*. New York, NY: Teachers College Press.
- Darling-Hammond, L. (2013). *Getting teacher evaluation right: What really matters for effectiveness and improvement*. New York, NY: Teachers College Press.
- Darling-Hammond, L., Amrein-Beardsley, A., Haertel, E. H., & Rothstein, J. (2011). *Getting teacher evaluation right: A background paper for policy makers*. National Academy of Education.
- Darling-Hammond, L., Amrein-Beardsley, A., Haertel, E., & Rothstein, J. (2012). Evaluating teacher evaluation. *Phi Delta Kappan*, 93(6), 8-15.
- Darling-Hammond, L., Newton, X. A., Haertel, E., & Thomas, E. (2010). Value-added modeling of teacher effectiveness: An exploration of stability across models and contexts. *Education Policy Analysis Archives*, 18(23). Retrieved from <http://eric.ed.gov/?id=EJ913473>

- Desimone, L. M. (2011). A primer on effective professional development. *Phi Delta Kappan*, 92(6), 68–71. Retrieved from <http://intl.kappanmagazine.org/content/92/6/68.short>
- Dewey, J. (1916). *Democracy and education: An introduction to the philosophy of education*. New York, NY: Macmillan.
- Dewey, J. (1938). *Experience and Education*. New York, NY: Simon and Schuster.
- Dikkers, S. M. (2012). *The professional development trajectories of teachers successfully integrating and practicing with new information and communication technologies*. (Doctoral dissertation). Retrieved from ProQuest Dissertations and Theses. (Accession Order No. 3513241261).
- Doerr, S. E. (2012). *Charlotte Danielson's theory of teacher evaluations: A quantitative study of teachers' perceptions on the four domains*. (Doctoral dissertation). Available from ProQuest Dissertations and Theses database. (UMI No. 3499681).
- Doherty, K., & Jacobs, S. (2013). *State of the states 2013 connect the dots: Using evaluations of teacher effectiveness to inform policy and practice*. Washington, DC: National Council on Teacher Quality. Retrieved from http://www.nctq.org/dmsView/State_of_the_States_2013_Using_Teacher_Evaluations_NCTQ_Report
- Druian, G., & Butler, J. (1987). *Effective Schooling and at-risk youth: What the record shows*. Portland, OR: Northwest Regional Educational Laboratory.

- Dzerviniks, J., & Poplavskis, J. (2012). Acquisition of physics in comprehensive school: accents of constructivism approach. *Problems of Education in the 21st Century*, 45, 10–17. Retrieved from http://www.jbse.webinfo.lt/Problems_of_Education.htm
- Economist Intelligence Unit. (2012). *The learning curve. Lessons in country performance in education*. London, England: Pearson. Retrieved from <http://thelearningcurve.pearson.com/the-report>
- Einot, I. & Gabriel, K. R. (1975). A study of the powers of several methods of multiple comparisons. *Journal of the American Statistical Association*, 70, 574-583.
doi:10.2307/2285935
- Ferguson, E., & Cox, T. (1993). Exploratory factor analysis: A users' guide. *International Journal of Selection and Assessment*, 1(2), 84–94.
doi:10.1111/j.1468-2389.1993.tb00092.x
- Fink, A. (2009). *How to conduct surveys: A step-by-step guide*. Los Angeles, CA: Sage Publications, Incorporated.
- Fowler, F. (2009). *Survey research methods* (4th ed.). Los Angeles, CA: Sage Publications, Incorporated.
- Franz, V. H., & Loftus, G. R. (2012). Standard errors and confidence intervals in within-subjects designs: Generalizing Loftus and Masson (1994) and avoiding the biases of alternative accounts. *Psychonomic bulletin & review*, 19(3), 395–404.
Retrieved from <http://link.springer.com/article/10.3758/s13423-012-0230-1>

- Friedman, T. L. (2007). *The world is flat 3.0: A brief history of the twenty-first century*. New York, NY: Macmillan Publishing.
- Fullan, M. (2009). Large-scale reform comes of age. *Journal of Educational Change*, 10(2/3), 101-113. doi:10.1007/s10833-009-9108-z
- Fullan, M. (2011). *The moral imperative realized*. Thousand Oaks, CA: Corwin Press.
- Gardiner, M., & Dras, M. (2012). Valence shifting: Is it a valid task? In *Australasian Language Technology Association Workshop 2012* (p. 42). Retrieved from <http://www.newdesign.aclweb.org/anthology/U/U12/U12-1007.pdf>
- Gates Foundation (2012). *Primary Sources: America's teachers on the teaching profession*. Seattle, WA: Bill & Melinda Gates Foundation Retrieved from www.scholastic.com/primarysources
- Glaserfeld, E. (1995). *Radical constructivism: A way of knowing and learning*. *Studies in mathematics education series 6*. Bristol, PA: Falmer Press, Taylor & Francis Inc. Retrieved from <http://www.eric.ed.gov/ERICWebPortal/recordDetail?accno=ED381352>
- Goldacre, B. (2013). *Building evidence into education*. London, United Kingdom: Department for Education. Retrieved from <https://www.gov.uk/government/news/building-evidence-into-education>
- Hanushek, E. A., Peterson, P. E., & Woessmann, L. (2012). *Achievement growth international and U.S. state trends in student performance*. Cambridge, MA: Harvard's Program on Education Policy and Governance. Retrieved from <http://bibpurl.oclc.org/web/46701>

- Hanushek, E. A., & Rivkin, S. G. (2010). Generalizations about using value-added measures of teacher quality. *The American Economic Review*, *100*(2), 267–271. Retrieved from <http://www.jstor.org/stable/10.2307/27805002>
- Hanushek, E. A., & Woessmann, L. (2012). Do better schools lead to more growth? Cognitive skills, economic outcomes, and causation. *Journal of Economic Growth*, *17*(4), 267–321. doi: 10.1007/s10887-012-9081-x
- Hemphill, F. C., & Vanneman, A. (2011). Achievement gaps: How Hispanic and white students in public schools perform in mathematics and reading on the national assessment of educational progress. Statistical Analysis Report. NCES 2011-459. *National Center for Education Statistics*. Retrieved from <http://www.eric.ed.gov/ERICWebPortal/recordDetail?accno=ED520960>
- Hoffman, S. D., & Maynard, R. A. (Eds.). (2008). *Kids having kids: Economic costs & social consequences of teen pregnancy*. Washington, DC: The Urban Institute.
- Hunter, M. (1982). *Mastery teaching*. Thousand Oaks, CA: Corwin Press.
- Jacob, A. (2012). Examining the relationship between student achievement and observable teacher characteristics: Implications for school leaders. *International Journal of Educational Leadership Preparation*, *7*(3). Retrieved from <http://editlib.org/j/ISSN-2155-9635/>
- Javidi, M., Downs, V. C., & Nussbaum, J. F. (1988). A comparative analysis of teachers' use of dramatic style behaviors at higher and secondary educational levels. *Communication Education*, *37*(4), 278. doi: 10.1080/03634528809378729
- Jefferson, T. (1786, August 13). [Letter to George Wythe]. The Thomas Jefferson Papers

Series 1, General Correspondence, 1751-1827. American Memory Collection at the Library of Congress. Retrieved from <http://hdl.loc.gov/loc.mss/mtj.mtjbib002184>

- Kahlenberg, R. (2012). Public Schools Have a Public Purpose. *New York Times*. Retrieved November 8, 2013, from <http://www.nytimes.com/roomfordebate/2012/01/24/should-parents-control-what-kids-learn-at-school/public-schools-have-a-public-purpose>
- Kane, T., & Staiger D. (2012). Gathering feedback for teaching: Combining high-quality observations with surveys and achievement gains. Retrieved from <http://www.metproject.org/reports.php>
- Kane, T., McCaffrey, D., Miller, T., & Staiger, D. (2013). *Have we identified effective teachers? Validating evaluation of effective teaching using random assignment*. Bill and Melinda Gates Foundation. Retrieved from http://www.metproject.org/downloads/MET_Validating_Using_Random_Assignment_Research_Paper.pdf
- Keller, B. (2005). 'Disney' teachers cite factors to stimulate student achievement. *Education Week*, 24(44), 10. Retrieved from <http://www.edweek.org/ew/index.html>
- Kelly, D., Xie, H., Nord, C.W., Jenkins, F., Chan, J. Y., & Kastberg, D. (2013). Performance of U.S. 15-Year-Old Students in Mathematics, Science, and Reading Literacy in an International Context: First Look at PISA 2012 (NCES 2014-024). U.S. Department of Education. Washington, DC: National Center for Education

Statistics. Retrieved from

<http://nces.ed.gov/pubsearch/pubsinfo.asp?pubid=2014024>

Kember, D., & Leung, D. P. (2008). Establishing the validity and reliability of course evaluation questionnaires. *Assessment & Evaluation in Higher Education*, 33(4), 341-353. doi:10.1080/02602930701563070

Kember, D. (2009). Promoting student-centered forms of learning across an entire university. *Higher Education*, 58(1), 1-13. doi:10.1007/s10734-008-9177-6

Keppel, G. (1982). *Design and analysis: A researcher's handbook* (2nd ed.). Englewood Cliffs, NJ: Prentice Hall.

Kimball, S., & Milanowski, A. (2009). Examining teacher evaluation validity and leadership decision-making within a standards-based evaluation system. *Educational Administration Quarterly February 2009* (45)1, 34-70. doi:10.1177/0013161X08327549

Kupermintz, H. (2003). Teacher effects and teacher effectiveness: A validity investigation of the Tennessee Value-Added Assessment System. *Educational Evaluation and Policy Analysis*, 25(3), 287-298. Retrieved from <http://epa.sagepub.com/content/25/3/287.short>

Ladner, M., & Myslinski, D. (2013). *Report card on American education: Ranking state K-12 performance, progress, and reform*. Washington, DC: American Legislative Exchange Council. Retrieved from <http://www.alec.org/publications/report-card-on-american-education/>

- Lenth, R. V. (2006-9). Java applets for power and sample size (Computer software). Retrieved December 18, 2013, from <http://www.stat.uiowa.edu/~rlenth/Power>
- Looney, J. (2011). Developing high-quality teachers: Teacher evaluation for improvement. *European Journal of Education, 46*(4), 440-455. doi:10.1111/j.1465-3435.2011.01492.x
- Mangiante, E. (2011). Teachers matter: Measures of teacher effectiveness in low-income minority schools. *Educational Assessment, Evaluation & Accountability, 23*(1), 41–63. doi:10.1007/s11092-010-9107-x
- Markow, D. & Pieters, A. (2010). *The MetLife survey of the American teacher: Collaborating for student success*. New York, NY: MetLife Foundation. Retrieved from https://www.metlife.com/metlife-foundation/about/survey-american-teacher.html?WT.mc_id=vu1101
- Markow, D. & Pieters, A. (2012). *The MetLife survey of the American teacher: Teachers, parents and the economy*. New York, NY: MetLife Foundation. Retrieved from https://www.metlife.com/metlife-foundation/about/survey-american-teacher.html?WT.mc_id=vu1101
- Marriott, F. H. C. (1990). *A dictionary of statistical terms* (5th ed.). Longman Scientific & Technical.
- Marshall, K. (2009). *Rethinking teacher supervision and evaluation: How to work smart, build collaboration, and close the achievement gap*. San Francisco, CA: Jossey-Bass.
- Marzano, R. (2003). *What works in schools: translating research into action*. Alexandria,

VA: Association for Supervision and Curriculum Development.

Marzano, R. (2012). The two purposes of teacher evaluation. *Educational Leadership* 70(3), 14-19.

Marzano, R. J., Frontier, T., & Livingston, D. (2011). *Effective supervision: Supporting the art and science of teaching*. Alexandria, VA: Association for Supervision and Curriculum Development.

Marzano, R. J., & Toth, M. (2013). *Teacher evaluation that makes a difference: A new model for teacher growth and student achievement*. Alexandria, VA: Association for Supervision and Curriculum Development.

McKinsey. (2009). *The economic impact of the achievement gap in America's schools*.

McKinsey & Company. Retrieved from <http://mckinseysociety.com/the-economic-impact-of-the-achievement-gap-in-americas-schools/>

McREL International. (2013). McREL's teacher evaluation system. *McREL Making a Difference*. Retrieved from <http://www.mcrel.org/products-and-services/services/service-listing/service-04>

Mid-continent Research for Education and Learning (McREL). (2009). *McREL's teacher evaluation system*. Denver, CO: Author.

Mihaly, K., McCaffrey, D. F., Staiger, D. O., & Lockwood, J. R. (2013). A composite estimator of effective teaching. Seattle, WA: Bill & Melinda Gates Foundation.

Retrieved from

http://www.metproject.org/downloads/MET_Composite_Estimator_of_Effective_Teaching_Research_Paper.pdf

Minnesota Department of Education. (2013a). *Schools and districts*. (Author). Retrieved from <http://w20.education.state.mn.us/MdeOrgView/districts/index>

Minnesota Department of Education. (2013b). *Teacher evaluation work group summary results*. (Author). Retrieved from <http://education.state.mn.us/MDE/Welcome/AdvBCT/TeacEvalWorkGrp/index.html>

Minnesota Department of Education. (2013c). *The teacher development, evaluation, and peer support model*. (Author). Retrieved from <http://education.state.mn.us/MDE/EdExc/EducEval/TeachEval/>

Minnesota Statute §§ 122A.40 -122A.41 (2012). Retrieved from <https://www.revisor.mn.gov/statutes/?id=122A.40>

Mvududu, N., & Thiel-Burgess, J. (2012). Constructivism in practice: The case for English language learners. *International Journal of Education*, 4(3), 108–118. doi:10.5296/ije.v4i3.2223

National Board of Professional Teaching Standards. (2013). *The beginnings of a movement*. (Author). Retrieved October 21, 2013, from <http://www.nbpts.org/beginnings-movement>

National Board for Professional Teaching Standards. (1991). *Toward high and rigorous standards for the teaching profession (3rd ed.)*. Detroit, MI: Author.

National Center for Educational Statistics. (2011). NAEP state mathematics, grade 8. *National Center for Education Statistics*. Retrieved October 31, 2013, from <http://nces.ed.gov/nationsreportcard/naepdata/report.aspx>

- National Commission on Excellence in Education. (1983). *A nation at risk: The imperative for educational reform*. Washington, DC: U.S. Department of Education.
- National Council on Teacher Quality. (2011). *State of the states: Trends and early lessons on teacher evaluation and effectiveness policies*. Retrieved from <http://www.nctq.org/statePolicyHome.do>
- National Council on Teacher Quality. (2012). *State of the states 2012: Teacher effectiveness policies*. Washington DC: Author. Retrieved from http://www.nctq.org/dmsStage/State_of_the_States_2012_Teacher_Effectiveness_Policies_NCTQ_Report
- National Governor's Association. (2013). Closing the achievement gap. *NGA Center for Best Practices*. Retrieved October 30, 2013, from <http://www.subnet.nga.org/educlear/achievement/>
- National Governors Association Center for Best Practices & Council of Chief State School Officers. (2012). Common Core State Standards Initiative: Preparing America's Students for College & Career. *Common Core State Standards Initiative*. Retrieved November 8, 2013, from <http://www.corestandards.org/>
- National Network of State Teachers of the Year (NNSTOY). (2013). About NNSTOY. Retrieved from <http://www.nnstoy.org/>
- Newman, F., Secada, W., & Wehlage, G. (1995). *A guide to authentic instruction and assessment: Vision, standards, and scoring*. Madison, WI: Wisconsin Center for Education Research. Retrieved from <http://www.wcer.wisc.edu/>

No Child Left Behind (NCLB) Act of 2001, Pub. L. No. 107-110, § 115, Stat. 1425

(2002).

OECD (2013), *PISA 2012 Results: what students know and can do: Student performance in mathematics, reading and science (Volume 1)*, PISA, OECD Publishing. doi: org/10.1787/9789264201118-en

Palardy, G. J., & Rumberger, R. W. (2008). Teacher effectiveness in first grade: The importance of background qualifications, attitudes, and instructional practices for student learning. *Educational Evaluation and Policy Analysis*, 30(2), 111–140. doi:10.3102/0162373708317680

Pallas, A. M. (2010). Measuring what matters. *Phi Delta Kappan*, 92(4), 68-71.

Piaget, J. (1952). *The origins of intelligence in children*. New York, NY: International Universities Press.

Piaget, J. (1971). *Science of education and the psychology of the child*. New York: Viking Press.

Rice, C., & Klein, J. (2012). U.S. education reform and national security. *Council on Foreign Relations*. Retrieved October 30, 2013, from <http://www.cfr.org/united-states/us-education-reform-national-security/p27618>

Rothstein, J. (2010). Teacher quality in educational production: Tracking, decay, and student achievement. *Quarterly Journal of Economics*, 125(1), 175–214. doi:10.1162/qjec.2010.125.1.175

Salant, P., & Dillman, D. A. (1994). *How to conduct your own survey*. New York, NY: Wiley.

- Sanders, W. L., & Horn, S. P. (1998). Research findings from the Tennessee Value-Added Assessment System (TVAAS) database: Implications for educational evaluation and research. *Journal of Personnel Evaluation in Education*, 12(3), 247–256. doi: 10.1023/A:1008067210518
- Sartain, L., Stoelinga, S. R., & Brown, E. R. (2011). *Rethinking teacher evaluation: Lessons learned from classroom observations, principal-teacher conferences, and district implementation*. Chicago, IL: Consortium on Chicago School Research. Retrieved from <http://ccsr.uchicago.edu/sites/default/files/publications/Teacher%20Eval%20Report%20FINAL.pdf>
- Schneider, M. C., & Gowan, P. (2013). Investigating teachers' skills in interpreting evidence of student learning. *Applied Measurement in Education* 26(3), 191-204 doi: 10.1080/08957347.2013.793185
- Scriven, M. (1994). Duties of the teacher. *Journal of personnel evaluation in education*, 8(2), 151–184. doi: 10.1007/BF00972261
- Seymour, D., & Seymour, T. (1992). *America's best classrooms: How award-winning teachers are shaping our children's future*. Princeton, NJ: Peterson's Guides.
- Shagrir, L. (2012). How evaluation processes affect the professional development of five teachers in higher education. *Journal of The Scholarship of Teaching & Learning*, 12(1), 23-35. Retrieved from <http://josotl.indiana.edu/>
- Shulman, L. (1987). Knowledge and Teaching: Foundations of the new reform. *Harvard Educational Review*, 57(1), 1-22. Retrieved from

<http://hepg.org/main/her/Index.html>

- Shulman, L. (2004). *The wisdom of practice; Essays on teaching, learning, and learning to teach*. San Francisco, CA: Jossey-Bass.
- Stodolsky, S. (Nov., 1984). Teacher evaluation: The limits of looking. *Educational Researcher* 13(9), 11. Retrieved from <http://edr.sagepub.com/content/13/9/11.extract>
- Stronge, J. H. (2010a). *Effective teachers = student achievement: What the research says*. Larchmont, NY: Eye on Education.
- Stronge, J. H. (2010b). *Evaluating what good teachers do: Eight research-based standards for assessing teacher excellence*. Larchmont, NY: Eye on Education.
- Stronge, J. (2012). Teacher effectiveness performance evaluation system handbook 2012-2013. Stronge and Associates Educational Consulting. Retrieved from <http://www.mcvea.org/extras/StrongeBook.pdf>
- Sweeley, T. M. (2004). Teachers' attitudes towards Charlotte Danielson's four domains of teacher evaluation (Doctoral dissertation). Available from ProQuest Dissertations and Theses database (UMI No. 3120736)
- Sykes, G., & Bird, T. (1992). Teacher education and the case idea. *Review of Research in Education*, 18, 451-521. doi: 10.2307/1167305
- Task Force on Teaching as a Profession. (1986). *A nation prepared: Teachers for the 21st century*. New York, NY: Carnegie Forum on Education and the Economy.
- Taylor, E., & Tyler, J. (2012). The effect of evaluation on teacher performance. *American Economic Review*, 102(7), 3628-3651. doi: 10.1257/aer.102.7.3628

- Teachscape (2012). *Framework for Teaching adoption*. Retrieved from <http://www.teachscape.com/frameworkforteaching/home>
- Thapa, A., Cohen, J., Guffey, S., & Higgins-D'Alessandro, A. (2013). A Review of School Climate Research. *Review of Educational Research*, 83(3), 357–385. doi: 10.3102/0034654313483907
- Tomsho, R. (2009, April 22). Study tallies education gap's effect on GDP. *The Wall Street Journal*. Retrieved October 31, 2013, from <http://online.wsj.com/news/articles/SB124040633530943487>
- Ullman, E. (2012). Rethinking teacher evaluations. *Technology & Learning*, 33(1), 46–48. Retrieved from <http://www.techlearning.com/features/0039/schoolcio-rethinking-teacher-evaluations/52763>
- U.S. Census Bureau. (2012). Table no. 232. Mean earnings by highest degree earned: 2009. In *Statistical abstract of the United States: 2012*. (p. 151). Washington, DC: U.S. Census Bureau. Retrieved from <http://www.census.gov/compendia/statab/2012/tables/12s0232.pdf>
- U.S. Department of Education. (2010). *A blueprint for reform: The reauthorization of the Elementary and Secondary Education Act*. Washington, DC: Department of Education.
- U.S. Department of Education. (2013). What works clearinghouse. *What Works Clearinghouse*. Retrieved from <http://ies.ed.gov/ncee/wwc/>
- Vanneman, A., Hamilton, L., Anderson, J. B., & Rahman, T. (2009). Achievement gaps: How black and white students in public schools perform in mathematics and

- reading on the national assessment of educational progress. *Statistical Analysis Report. NCES 2009-455*. National Center for Education Statistics. Retrieved from <http://www.eric.ed.gov/ERICWebPortal/recordDetail?accno=ED505903>
- Varlas, L. (2012). Rethinking Teacher Evaluation. *Education Update*, 54(12), 1-6. Retrieved from <http://www.ascd.org/publications/newsletters/education-update/dec12/vol54/num12/toc.aspx>
- Vygotsky, L. (1978). *Mind in society: The development of higher psychological processes*. Harvard University Press.
- Wadhwa, V., Gereffi, G., Rissing, B., & Ong, R. (2007). Where the engineers are. *Issues in Science and Technology*, 23(3), 73–84. Retrieved from http://www.researchgate.net/publication/228123263_Where_the_Engineers_Are/file/32bfe50d85b7e50088.pdf
- Washington, G (1784, December 15). [Letter to George Chapman]. Founders Online, National Archives Retrieved from <http://founders.archives.gov/documents/Washington/04-02-02-0149>
- Wendorf, C. A. (2012). Drawing inferences from multiple intervals in the single-factor design: Derivations, clarifications, extensions, and representations. *Methodology: European Journal of Research Methods for the Behavioral and Social Sciences*, 8(4), 125. doi:10.1027/1614-2241/a000045
- Whitaker, T. (2012). *What great teachers do differently: Seventeen things that matter most* (2nd ed.). Larchmont, NY: Eye on Education.
- Worley, D., Titsworth, S., Worley, D. W., & Cornett-DeVito, M. (2007). Instructional

communication competence: Lessons learned from award-winning teachers.

Communication Studies, 58(2), 207-222. doi:10.1080/10510970701341170

Yeager, D. S., & Dweck, C. S. (2012). Mindsets That Promote Resilience: When

Students Believe That Personal Characteristics Can Be Developed. *Educational*

Psychologist, 47(4), 302–314. <http://doi.org/10.1080/00461520.2012.722805>

Appendix A: Framework for Teaching Survey

FRAMEWORK FOR TEACHING SURVEY

The purpose of this survey is to gain a better understanding of what teachers consider important in terms of effective teaching and learning. The results will be analyzed collectively and individual responses will be help confidential and anonymous.

Directions are as follows:

Please indicate the extent to which you agree that the following elements are important to effective teaching and learning. If you do not understand the meaning of the statement please indicate by circling the DU response.

To indicate your responses to the survey questions, please choose one of the choices.

Strongly Agree	Agree	Disagree	Strongly Disagree	Don't Understand
SA	A	D	SA	DU

PLEASE TURN THE PAGE TO CONTINUE

SURVEY QUESTIONS

1. Teacher displays a solid content knowledge.
2. Teacher's plans reflect an understanding among relationships and concepts taught.
3. Pedagogical practices reflect current research.
4. Teacher displays an understanding of developmental characteristics of students.
5. Teacher displays solid understanding of different learning styles.
6. Teacher displays knowledge of students' skills and knowledge.
7. Teacher displays knowledge of students' interests or cultural heritage.
8. Student goals are valuable in their level of expectation.
9. Most goals are clear and permit viable methods of assessments.
10. Goals are suitable for most students in the class.
11. Goals reflect several different types of learning opportunities.
12. Teacher is aware of all resources available throughout the school or district.
13. Teacher is aware of how to gain access, for students, to school and district resources.
14. Learning activities are suitable for students and instructional goals.
15. Materials and resources support instructional goals and engage students.
16. Instructional groups are varied and appropriate.
17. Lessons and units have clearly defined structure that activities are organized around.
18. The teacher's instructional goals are assessed through his/her proposed lesson plan.
19. Assessment criteria and standards are clear and are communicated to students.
20. Teacher uses assessment results to plan for individuals and groups of students.
21. Teacher-student interactions are friendly, demonstrate general warmth, caring and respect, and are appropriate to developmental and cultural norms of students.
22. Student interactions with teacher are generally polite and respectful.
23. Teacher conveys genuine enthusiasm for the subject, and students demonstrate commitment to its value.
24. Students accept teacher insistence on work of high quality and demonstrate pride in that work.

SURVEY QUESTIONS CONTINUED

25. Instructional goals, activities, interactions, and classroom environment convey high expectations for achievement.
26. Tasks for groups are organized and students are engaged.
27. Transitions occur smoothly.
28. Routines for handling supplies occur smoothly.
29. Efficient systems for performing non-instructional duties are in place.
30. Volunteers and paraprofessionals are productively engaged during class.
31. Standards of conduct are clear to all students.
32. Teacher is alert to student behavior.
33. Teacher response to misbehavior is appropriate and respectful of the student's dignity.
34. The classroom is safe and the furniture is a resource for learning activities.
35. Teacher uses physical resources skillfully, and all learning is equally accessible to all students.
36. Teacher directions and procedures are clear to students and contain an appropriate level of detail.
37. Teacher's spoken and written language is clear and correct as well as appropriate to students' age and interests.
38. Teacher's questions are of high quality and adequate time is available for students to respond.
39. Classroom interaction represents true discussion, with teacher stepping to the side when appropriate.
40. Teacher successfully engages all students in the discussion.
41. Representation of content is appropriate and links well with students' knowledge.
42. Activities and assignments are appropriate to students and are engaging.
43. Instructional groups are productive and appropriate.
44. Instructional materials and resources are suitable to instructional goals.
45. Lessons have clearly defined structure around which the activities are organized.

SURVEY QUESTIONS CONTINUED

46. Teacher feedback to students is of high quality.
47. Feedback to students is provided in a timely manner.
48. Teacher is able to make an adjustment to a lesson, and the adjustment occurs smoothly.
49. Teacher accommodates students' questions or interests.
50. Teacher persists in seeking approaches for student who have difficulty learning.
51. Teacher makes an accurate assessment of a lesson's effectiveness and the extent to which it achieved its goal.
52. Teacher is able to make specific suggestions on how a lesson might be improved.
53. Teacher's system of maintaining information on student completion of assignments is effective.
54. Teacher's system for maintaining information on student progress in learning is effective.
55. Teacher's system for maintaining information on non-instructional information is effective
56. Teacher provides frequent information to parents about the instructional program.
57. Teacher communicates with parents about students' progress on a regular basis.
58. Teacher's efforts to engage families in the instructional program are frequent and successful.
59. Teacher's relationship with colleagues is cooperative and supportive.
60. Teacher volunteers to participate in school events making a substantial contribution.
61. Teacher volunteers to participate in school and district projects making a substantial contribution.
62. Teacher seeks out opportunities for professional development to enhance content knowledge and pedagogical skill.
63. Teacher participates actively in assisting other educators.
64. Teacher is moderately active in serving student needs.
65. Teacher works within a particular team or department to ensure that students receive a fair opportunity to succeed.
66. Teacher maintains an open mind and participates in team or departmental decision-making.

Please provide the following information about yourself.

1. Years of teaching experience ____
2. Years in current position ____
3. Current status as an educator:
 - Teacher
 - Administrator
 - Other position in education
 - Retired (or no longer employed in education)
4. Current teaching assignment: (If you are not currently teaching, the primary assignment during your career in the classroom), Please check all that apply.
 - Elementary
 - Middle School
 - High School
5. Grade levels you currently teach (If you are not currently teaching, the primary grade levels you taught during your career in the classroom): Indicate all that apply.

Pre K K 1 2 3 4 5 6 7 8 9 10 11 12
6. Subject(s) you teach _____
7. Highest level of education:
 - Bachelor's Degree
 - Master's Degree
 - Doctorate
8. Gender: Male__ Female ____
9. Are you familiar with Charlotte Danielson's Framework for Teaching?
 - Yes
 - No

THANK YOU FOR PARTICIPATING IN THIS SURVEY

Appendix B: Permission to Use Framework for Teaching Survey

MARPLE NEWTOWN HIGH SCHOOL
120 Media Line Road
Newtown Square, Pennsylvania 19073-4696
(610) 359-4215 • Fax: (610) 356-2194

January 8, 2014

To Whom this May Concern:

This letter serves as permission to allow Derek Olson to use the survey; I created for use in May, 2004, entitled the Framework for Teaching Survey. Mr. Olson has permission to use this survey for the purposes of collecting data for his dissertation at Walden University entitled, "Award-Winning teachers perspectives on the components of Danielson's Framework for Teaching." In closing, I also would like to wish Mr. Olson the best of luck with his research and data collection.

Sincerely,

Tina M. Sweeley, Ed. D.
Tina M. Sweeley, Ed.D.

Appendix D: Letter from MN Commissioner of Education



September 13, 2013

Derek,

Congratulations on your work toward earning a doctorate in education. It is quite rewarding and an accomplishment that will provide you with a strong foundation in research, data analysis and practice. Continuing your education and becoming a learner for life is truly what captures the spirit of being a professional educator. Teaching and learning go hand in hand for both adults and students.

We at the Minnesota Department of Education are very interested in the findings of your research on award winning teachers perspectives on the characteristics of teacher effectiveness and the components of teacher evaluation. I understand you intend to survey state teachers of the year from around the country on their perspectives on the impact on teacher effectiveness of each element in Danielson's framework for teaching.

Your research is timely and relevant to Minnesota. We have worked over the past year in collaboration with our teachers and key stakeholders on a new teacher evaluation framework. As you know, in 2011, the state of Minnesota enacted a new teacher and principal evaluation law that requires all districts to use effective teacher evaluation systems based on student achievement, engagement and observation. As we move through our pilot implementation this school year, your research could provide further national evidence that could inform our current model as we work to make it even more relevant and meaningful to our teachers.

In addition to the findings of your research, we would be interested in learning more about any projects you have planned to use your research and how it might better the work of evaluating teachers across the state.

I know you have been in touch with our teacher evaluation team here. If you would like to support our efforts in the future regarding the implementation of effective teacher evaluations, we never turn down volunteers!

Again, all my best to you and your research project,

Sincerely,

A handwritten signature in black ink that reads "Dr. Brenda Cassellius". The signature is written in a cursive, flowing style.

Dr. Brenda Cassellius
Commissioner