LEADERSHIP DECISIONS FOR PROFESSIONAL DEVELOPMENT: A NARRATIVE RESEARCH STUDY EXAMINING HOW SCHOOL DISTRICT LEADERS MAKE DECISIONS ABOUT PROFESSIONAL DEVELOPMENT

A doctoral thesis presented by
Kimberly Rizzo Saunders

to
The School of Education

In partial fulfillment of the requirement for the degree of
Doctor of Education

Dr. Corliss Brown Thompson
Advisor

College of Professional Studies
Northeastern University
Boston, Massachusetts
March 2019
Abstract

This narrative study, examined the experiences of six school district leaders related to decision-making about professional development for a research-based instructional strategy in their school districts. The study incorporated James G. March’s, Organizational Decision-making as a framework. A central research question guided this study: How do school district leaders make decisions about professional development for research-based instructional strategies? The findings revealed that the experiences of the six school district leader participants related to decisions about professional development for research-based instructional strategies were highly complex and involved numerous decisions. The findings indicated that the six participants made decisions about professional development consistent with their beliefs, for specific purposes including; moving forward the mission, vision, and strategic plan of their districts providing high quality learning outcomes for students meeting specific goals and achieving specific desired outcomes and to improve teacher practice. Furthermore, the six school district leaders also considered demographics, resources, and the contextual attributes of their organizations and communities when they made decisions professional development-related decisions for research-based instructional strategies in their school districts. The findings of this study also indicated that the six school district leaders’ decision-making process for professional development involved a balance of optimizing and satisficing. Their decisions were more consistent with the concept of exploitation and constraints and context were both considered when they made such decisions.

Keywords: decision-making, professional development, district leaders, research-based instructional strategies
Dedication

For my courageous son, Parker.
Mommy’s homework is all done now.
Acknowledgements

My doctoral journey was not what I anticipated; the reasons I began and the reasons I finished are worlds apart. The road has been long and filled with interesting challenges and unanticipated growth academically, professionally, and personally. Completion of my doctoral program and writing this dissertation has been the single, largest academic challenge I have ever encountered. While it has been a more solitary expedition than I had imagined, it would never have been possible without my family, friends, colleagues, and professional associates.

The time, commitment, support, and dedication of a number of individuals factored into my ability to meet this challenge, and I want to take this opportunity to thank them. First and foremost, I have to thank my husband Robert. I long ago lost track of the number of loads of laundry washed and dried, the meals prepared, the cups of coffee made, and the days spent proofreading you have done for me. I could not have accomplished this without you. A simple ‘thank you’ seems completely inadequate; I am wholly in your debt. I also want to thank my son Parker. The notes of encouragement on my desk, the quiet hugs, and the understanding of my need to work never went unnoticed and I am grateful that I am your Mom every day.

I am deeply indebted to my advisor Dr. Corliss Brown Thompson and have greatly appreciated her constructive, kind feedback, her encouragement, and her patience. I truly appreciate every word you read, every conversation we had, and every draft you redlined as I worked toward my completion of each chapter. I also want to express my gratitude toward Dr. Kelly Conn who served on my committee and for provided feedback on both my proposal and my final thesis. I sincerely appreciate Dr. Scott Carpenter’s contributions as well. Thank you for serving as the third member of my committee. I am truly grateful that you took time out from
what I know to be a very busy schedule. Your act of kindness to help a fellow doctoral colleague was very generous.

I would be remiss if I did not thank Dr. Richard Bergeron who gave me the courage to start this process as well as Dr. Ann Forrest, who continued to encourage me and inquire regularly about my progress. I count myself fortunate that I have had such wonderful professional partners in each of them. Additionally, I could not have accomplished this without both the collective and individual support of the members of the ConVal School Board, thank you to each of you. Finally, a thank you to several of my colleagues, without whom I would have never been able to finish this work: Jerry Frew, Russell Holden, Kevin Johnson, Lori Landry, Christine Landwehrle, Mark MacLean, Jeffrey Taylor, Carrie Wallace, and Lisa Witte.
# Table of Contents

Chapter One: Introduction 8

Statement of the Problem and Topic 8
Research Problem 9
Justification for the Research Problem 10
Deficiencies in the Evidence 11
Relating the Discussion to the Audience 12
Significance of the Research Problem 13
Positionality Statement 14
Central Research Question 17
Theoretical Framework 17
  - Constraints and context 18
  - Optimizing and satisficing 18
  - Exploration and exploitation 19
  - Application of the theoretical framework 20
Chapter Summary 22

Chapter Two: Literature Review 23

Introduction 23
Examining Decision-making as a Discrete Process 24
  - Collaborative decision-making 26
  - Hierarchical decision-making 31
  - Participants in decision-making 33
  - Use of research in decision-making 34
How Purpose Informs Process 37
  - Resource allocation 38
  - Professional development 40
  - School improvement 44
  - Dilemma decisions 47
The Context of Decision-making 50
  - Micro-politics 51
  - Marco-political context 55
Summary 56
Chapter Summary 59

Chapter Three: Research Design 60

Introduction 60
Research Paradigm 60
Research Tradition and Rationale for Narrative Design 62
Participants 65
Recruitment and Access 65
Data Collection 68
<table>
<thead>
<tr>
<th>Chapter Summary</th>
<th>73</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chapter Four: Research Findings</td>
<td>74</td>
</tr>
<tr>
<td>Introduction</td>
<td>74</td>
</tr>
<tr>
<td>Grace</td>
<td>74</td>
</tr>
<tr>
<td>Spencer</td>
<td>92</td>
</tr>
<tr>
<td>Tyler</td>
<td>107</td>
</tr>
<tr>
<td>Abigail</td>
<td>122</td>
</tr>
<tr>
<td>Cara</td>
<td>139</td>
</tr>
<tr>
<td>Matthew</td>
<td>154</td>
</tr>
<tr>
<td>Chapter Summary</td>
<td>171</td>
</tr>
<tr>
<td>Chapter Five: Discussion of the Findings</td>
<td>172</td>
</tr>
<tr>
<td>Introduction</td>
<td>172</td>
</tr>
<tr>
<td>Findings as They Relate to the Research Question and Literature</td>
<td>174</td>
</tr>
<tr>
<td>Findings as They Relate to the Theoretical Framework</td>
<td>193</td>
</tr>
<tr>
<td>Reflections</td>
<td>201</td>
</tr>
<tr>
<td>Implications for Practice</td>
<td>204</td>
</tr>
<tr>
<td>Implications for Research</td>
<td>206</td>
</tr>
<tr>
<td>Limitations</td>
<td>207</td>
</tr>
<tr>
<td>Conclusion</td>
<td>208</td>
</tr>
<tr>
<td>REFERENCES</td>
<td>210</td>
</tr>
<tr>
<td>APPENDICES</td>
<td>230</td>
</tr>
</tbody>
</table>
Chapter One: Introduction

Statement of the Problem and Topic

It is generally accepted, and research has concluded, that the most effective way to improve student learning is to provide students with a highly effective, well-developed teacher (Chetty, Friedman, & Rockoff, 2014; Hanushek, 2011; Johnson, Kahle, & Fargo, 2007). Effective and well-developed teachers are credited with improving students’ learning, developing self-efficacy in students, raising achievement scores, and shrinking the achievement gap (Johnson et al., 2007; Max, Glazerman, & National Center for Education Evaluation and Regional Assistance, 2014; Stronge, Ward, & Grant, 2011). The use of research-based practices in the classroom, such as providing teachers with structures and instructional strategies that have been designed, implemented, and determined to be effective with students, can improve teacher effectiveness (Fox, 2013; Goddard, Hoy, & Hoy, 2000). When teachers use research-based practices they often see improvements in student learning, as well as increases in student achievement and student confidence (Fox, 2013; Johnson et al., 2007; Max et al., 2014; Stronge et al., 2011; Thomas & Green, 2015). Professional development as a tool for organizational learning is designed, in part, to prepare and support K-12 teachers to implement research-based practices in the classroom. Our knowledge of how children learn and how such knowledge can be leveraged continues to expand; this knowledge, in turn, can be applied to classroom instructional practice.

School district leaders are called on to provide direction and structure for instructional change (Feld, 1981; Jenkins, 2007; Johnson, 2009). The decisions that school district leaders make can result in policy change, instructional change, and even legislative change (Dryden, 2013). It therefore may follow that school district leaders, the decisions they make, and how
those decisions are made may impact the implementation, or lack thereof, of changes within a school district (Hyle, Ivory, & McClellan, 2010).

**Research Problem**

The challenge facing leaders of K-12 school districts is how to make decisions that ensure teacher effectiveness and development while simultaneously instituting instructional changes in an effective, efficient, and timely manner. A number of barriers factor into this challenge for school district leaders. First, a gap exists between research and practice (Biesta, 2007; Bulgren et al., 2006; Gersten & Brengelman, 1996; Gersten, Chard, & Baker, 2000; Korthagen, 2007; McIntyre, 2005; Miretzky, 2007). Second, teachers adopt classroom practice and make instructional decisions consistent with individual beliefs and preferences about teaching and learning (Roehrig, Kruse, & Kern, 2007). Additionally, beliefs about teaching and learning, which may or may not be research-based, are likely to be based on personal judgment, may continue even when contradicted by research, and are often persistently difficult to change (Boardman, Arguelles, Vaughn, Hughes, & Klingner, 2005; McIntyre, 2005; Roehrig et al., 2007; Smith & Southerland, 2007). Furthermore, resources or the lack thereof including, time, money, and support, may also present challenges. Many initiatives compete for teacher time and the financial resources of districts (Evans, Whitehouse, & Gooch, 2012; Guskey, 2009; Roehrig et al., 2007).

As school district leaders make decisions to support teachers’ effectiveness and development, each of the aforementioned barriers should be taken into consideration so that the decisions made result in instructional changes that are effective, efficient, and timely. School district leaders make decisions regarding professional development, how professional
development will be implemented in and across a school district, and how barriers might be mitigated.

**Justification for the Research Problem**

Despite these challenges, it is the school district leader’s responsibility to provide ways in which to best develop teachers and ensure that students are the recipients of the most effective instructional practices. Since school leaders must address the barriers that face districts to ensure that teachers learn and implement effective instructional strategies, developing a clearer understanding of how school district leaders make decisions about professional development may lead to a better understanding of how those decisions may or may not mitigate barriers to the implementation of research-based strategies in the classroom.

Previous research focused on school district leaders, specifically in regard to superintendents, and decision-making. Relevant literature has focused on four general themes: resource allocation, the decision-making process, the decision-making purpose, and the context surrounding decisions. Several studies specifically examined concerning resource allocation and found that the allocation of resources can create pockets of advantage and disadvantage in the populations of students and staff, as well as in specific schools (Dryden, 2013; Ewbank, 2011; Patterson, Koenigs, Mohn, & Rasmussen, 2006). Other studies have focused on school leaders’, decision-making process, particularly in terms of who is included and the values that drive those decisions (Brazer, Rich, & Ross, 2010; Brunner, 1998; Noppe, Yager, Webb, & Sheng, 2013). Such research has found that there is value in engaging whole communities in decision-making about changes that should be made to educational programs (Goldman & O'Shea, 1990; Touchton & Acker-Hocevar, 2011): as a result, many school district leaders spend time on community engagement efforts. Additionally, some studies examine decision-making in and for
specific purposes. For instance, in her study of 62 leaders across 10 states, Taylor (2010) looked at decision-making as part of leadership themes, while Katz (2012) examined how superintendents’ decisions promoted social justice. Other studies have focused on specific cases and situations related to decision-making, such as gender (Katz, 2012; Polka, Litchka, Calzi, Denig, & Mete, 2014), race (Beard, 2012; Katz, 2012), and demographics (Hyle et al., 2010; Jenkins, 2007).

**Deficiencies in the Evidence**

Despite that school districts are often the largest provider of professional development for teachers (Firestone, Mangin, Martinez, & Polovsky, 2005; Little, 1989), researchers have directed less attention toward school district leaders’ decision-making as it pertains to professional development (Brazer et al., 2010; Ewbank, 2011; Leithwood, Leonard, & Sharratt, 1998; Little, 1989). Existing studies have explored specific strategies, of interest, Mangin (2014) examines capacity building and the decision to implement instructional coaches using Weiss’ decision-making framework. Moreover, Abrego and Pankake (2011) investigate the decision-making that may result in the sustainability of a professional learning community.

Further examination of the school district leaders’ decision-making could improve our understanding of decision outcomes (Desimone, Porter, Birman, Garet, & Yoon, 2002; Firestone et al., 2005; Mangin, 2014). A qualitative investigation of school district leader decision-making, specific to professional development and designed to teach the implementation of specific research-based strategies, may provide views of decision-making in school district leaders’ own words (Creswell, 2013). Such a study may provide an understanding of the specific contexts in which decisions have been made, as well as school district leaders’ perspectives of
the decisions made that may mitigate barriers to the implementation of specific research-based practices (Firestone et al., 2005; Little, 1989; Mangin, 2014).

There is little evidence available that school district leaders’ decision-making, as it relates to professional development has been examined through the lens of March’s (1978, 1991) organizational decision-making theory. While there has been some examination of March’s theory as it relates to instructional leadership (Hallinger, Bickman, & Davis, 1996; Hallinger, 2003), it is limited to the role of the principal and does not expand to district level leaders. Using March’s theory to better understand school district leaders’ decision-making, particularly as it relates to professional development, may result in a more thorough understanding of how such decisions are made with consideration of outcomes, goals, context, effectiveness, efficiency, timeliness, limited resources as well as exploration and exploitation (Slater & Narver, 1995).

**Relating the Discussion to the Audience**

By using a qualitative investigation of school district leaders’ decision-making this study may contribute to professional practice by making school district leaders more aware of the decisions they reach regarding professional development for research-based strategies. The results of this study may provide guidance for decision-making to school district leaders, thereby proving useful to decision makers, particularly those involved in the implementation of professional development. The research may also contribute to professional practice in that it may increase school district leaders’ more awareness of how they reach such decisions, as well as the influences involved in their decision-making process. The results of the study may guide school district leaders to better align decision-making with the need, timeliness, and purpose of specific professional development. Additionally, professional development consultants may find
the work of this study relevant as it is related to how and when to approach school district leaders to aid in the decision-making process regarding professional development.

**Significance of the Research Problem**

Oftentimes it is determined that school district leaders do not make strategic decisions or have strategic processes to implement instructional changes (Stewart, Raskin, & Zielaski, 2012). While student underachievement may be detrimental to individual students, poor achievement and underachievement may also have a negative effect on both states and the country in a holistic way, by affecting our standing as a country and our long-term economic development (Gardner, 1983; Hanushek, 2011; Rising Above the Gathering Storm Committee (U.S.) Staff, National Academy of Sciences (U.S.) Staff, & National Academy of Engineering (U.S.) Staff, 2010). Instructional change, the work toward increasing student achievement and student learning, and its impact on the long-term prospects of how the United States is economically, politically, and globally positioned has become a topic referred to by writers, politicians, and even presidential candidates (Friedman, 2005; Friedman & Mandelbaum, 2011; Rappeport, 2016).

In districts that work explicitly toward improving instructional practice, by applying specific frameworks for decision making related to instructional improvement, there seems to be some progress toward instituting research-based practices in the classroom (Goldman & O'Shea, 1990; Mangin, 2014; Rasmussen & Karschney, 2012). Ensuring development of teachers and instituting instructional changes in an effective and efficient way is paramount to providing an effective solution for this problem (Abrego & Pankake, 2011; Chance & Cummins, 1998). By deepening the understanding of decision-making specifically as it applies to professional development, we may be better able to understand how to leverage decisions and guide decision-making of school district leaders around professional development.
Positionality Statement

I have worked in public education for more than 20 years. As a classroom teacher, I was not an early adopter of new strategies, but I was willing to try strategies and routines that had a clear research-base or involved working with the different learning styles of the students for whom I was responsible. Early in my career, administrators frequently asked me to present or develop workshops for other teachers on strategies and methods I was using in my classroom. I often found myself presenting to a much more experienced audience, whose members were not necessarily enthusiastic to be in attendance. However, I believed that as soon as they saw the impact of the instructional strategies or routines they would surely adopt them in their classrooms. I was wrong.

As I moved out of the classroom and into administration, my roles consistently included, as a primary focus, professional development. I repeatedly put on workshops, organized professional development days, and worked with consultants. As the Assistant Superintendent for Curriculum and Instruction, I worked with Sandra Jones, Executive Director of the Hanson Initiative for Language & Literacy (HILL) and co-author of Leading Literacy Change. Jones’ work has centered on how to train teachers in the explicit instruction of reading. Jones and I worked together on implementing research-based instructional strategies for kindergarten through grade 5 in my school district. The project spanned four years, and included ongoing professional development for administrators and teachers in the form of coursework, workshops, and job-embedded coaching with two experienced literacy coaches. The student results speak for themselves in my district and in other districts that adopted similar strategies and routines. Thought it has been several years since the end of the project, we still hold regularly scheduled workshops and have two literacy/writing coaches, but I am seeing a decline in the use of the
strategies. Teachers are returning to practices closely associated with whole language, which was the prevalent framework before the project began.

Presently I serve as Superintendent of the same large, rural school district in which I was Assistant Superintendent. In this role, I am called on to make decisions on a minute-by-minute basis. I have little time to exam how or why I am making those decisions; I simply try to assure that the decisions that I make are consistent with my educational values and my long-term vision for the district. While I may spend time reflecting on decisions, I do not feel that I have the luxury of spending time working within a clearly structured decision-making process. I often see my colleagues in similar situations and therefore have begun asking the questions of not only how the decision-making happens and why certain decisions are made over others, particularly when those other decisions come across as more desirable.

In my previous administrative roles, I often found myself frustrated by teachers when they would not adopt proven strategies. My present role of Superintendent has further exacerbated this frustration, as I am now even more aware of union grievances, specific teachers, and other administrators, all of whom appear to regularly contest decisions. Since part of my role has been, and remains, the development and implementation of specific and ongoing professional development opportunities for classroom teachers, the use of professional development to overcome instructional issues is quite often my immediate inclination. I have a clear bias toward the utilitarianism of professional development as a tool to improve and support the use of research-based practices in K-12 classrooms. Particularly in interviews and qualitative studies, I could potentially misconstrue the support for and usefulness of professional development in facilitating teachers with the adoption of research-based instructional practices.
I firmly believe the role of the practitioner-scholar should be prevalent in our educational system. Labaree (2003) asserts, “[L]earning to approach education as an intellectual problem, which can and should co-exist with a clear sense of the student as person” can happen without losing what it means to be a teacher (p. 20). Additionally, those in the education field should consistently evaluate what we do as teachers and educational professionals and apply research-based strategies that promote student learning. I do not anticipate that every teacher will be actively participate in research, but a clear desire to use research-based strategies should be a general characteristic of all teachers. Primarily, we should use the most proven methods and interventions and even more importantly apply them to classroom instruction.

My bias comes from my experiences. I have repeatedly observed many teachers be hesitant or refuse to adopt proven strategies, even after they have seen student data that demonstrates increased student learning associated with the strategies. These experiences lead me to the preconception that some teachers will likely resist adopting research-based strategies. According to Parsons (2008), I have to remain aware that, based on my experiences, I may construct an understanding of the world and perceive myself as occupying a particular location within the reality that I have created. In other words, based on what I have experienced, I may erroneously view teachers as resistant, when in fact they may be struggling with the implementation of research-based strategies.

In order to preserve a neutral position as a researcher, despite my biases and opinions, I practiced a number of strategies. First, in order to assure that I did not misplace causality, I carefully weighed any cause and effect statements against other possible correlations. Second, I looked at multiple alternatives before presenting conclusions from data and other source material. Third, as I researched how school district leaders make decisions about professional
development opportunities, I presented and addressed contradictory information, points of view, and evidence. Of the utmost importance was the design of my research methodology and the work and discussions with my advisor on recognizing and keeping my potential biases in mind as I researched and wrote my thesis.

Central Research Question

Qualitative research should concentrate on a central question supported by sub-questions (Creswell, 2013; Maxwell, 2008). The central question for this research study was: How do school district leaders make decisions about professional development for research-based instructional strategies? The central question was examined through the lens of March’s (1978, 1991) organizational decision-making framework. The purpose of the central question was to better understand how school district leaders make decisions about professional development when the purpose of the professional development is to train and support teachers in the use of research-based instructional strategies. Using March’s (1978, 1991) framework as a lens facilitated an examination of how school district leaders make decisions within the context of limited resources, their perceptions of efficiency, effectiveness, and sustainability of the research-based strategy.

Theoretical Framework

As previously mentioned, March’s (1978, 1991) organizational decision-making theory served as the primary lens to guide the study. March (1978) asserts that individuals and organizations form aspirations goals, targets, or ambitions they aim to achieve. How decisions happen within an organization is highly complex and decisions are bound by organizational constraints, limited rationality (decisions limited by difficulties in anticipating or considering all information or alternatives) and contextual rationality (the extent to which decision making
happens with other claims on the decision maker’s attention). In making decisions, decision-makers may use one of two processes; satisficing or optimizing. March (1991a) contends that decision-making is associated with a certain degree of risk-taking, which appears to be affected by the presence of resources. More resources is often associated with greater risk-taking, characterized by more relaxation of control, reduced fear of failure, institutional innovation and increased experimentation (March, 1978a, 1991a, 1991b). On the other hand, the availability of fewer resources results in risk-averse decision making characterized by greater control, and an emphasis on improvements related to efficiency and process. March (1978, 1991) also asserts that the desired degree of exploration or exploitation, as an outcome for an organization, affects the process through which decisions are made. Familiarity with each of the components of March’s theory is essential for an overall understanding of the theoretical framework for this study.

Constraints and context. March’s framework identifies the complexities that are part of decision-making for organizational learning and categorizes them as constraints, process, and outcomes. Constraints are the available resources, an organization’s present practices, as well as the present levels of organizational knowledge, the context of the organization, and the social context in which the organization exists (March, 1991a). The context and the constraints that inform the decision-making process are inextricable, no decision can be made within a vacuum (March, 1978a, 1991a, 1991b). According to March, the desired outcome is likely to influence the decision-making process.

Optimizing and satisficing. Building from the seminal work of Simon (1956), March refers to a process as satisficing if the constraints are considered during decision-making. A decision made through this process may not always seem reasonable if the constraints are removed (March, 1978a). The process
by which a decision is made to reach a specific metric or goal is referred to as optimizing. While
constraints and context may still play a role in the decision process, the goal or metric is paramount to the
process (March, 1978a). Further, according to March, decisions can be categorized based on degrees of
exploration or exploitation.

**Exploration and exploitation.** March (1978a) asserts that the concepts of exploration
and exploitation are present in organizational decision-making particularly in relation to
organizational learning. High degrees of exploration result in the gain of new information,
processes, or innovation to improve future outcomes. If more exploration is present, an
organization may have to allocate resources among uncertain alternatives. Doing so in turn, may
lead to initial reductions of the speed at which skills are acquired and improved, less certainly in
returns, and seemingly more distant benefits (March, 1991a). Conversely, a high degree of
exploitation may lead to refinement, continued implementation with greater efficiency, and the
ability to leverage present organizational knowledge and procedures to improve present practice.
March (1991a) explains this as investing in the understood present best alternative but asserts
that exploitation may discourage the introduction of new skills and it is possible for the emphasis
to be on maintaining the status quo. According to March (1991a) systems that engage in
exploration to the exclusion of exploitation are likely to find that they suffer the costs of
experimentation without gaining many of the benefits; systems that engage in exploitation to the
exclusion of exploration are likely to not make sufficient or reasonable progress. Maintaining a
balance between exploration and exploitation is important for managing risks and the continued
improvement of an organization and organizational learning (March, 1991). March asserts that
the concepts of exploration and exploitation are present in organizational decision-making,
specifically around organizational learning.
Application of the theoretical framework. March’s framework was used to examine how school district leaders make decisions as they relate to professional development as a tool for organizational learning. The theory provided valuable insights into the dynamics and considerations involved in how school district leaders make decisions related to professional development for a research-based instructional strategy (Edmondson & Moingeon, 1998; March, 1996; Slater & Narver, 1995). March’s theory is particularly applicable based on the research problem because of the constraints and context that school district leaders have to consider when making decisions regarding professional development.

A framework for how March’s organizational decision-making might occur is illustrated in Figure 1. The figure shows a simplification of how the constraints and processes result in a decision and how the decision is juxtaposed with the consideration of exploration and exploitation as they relate to degrees of risk-taking. Constraints and context simultaneously inform the process and the decision, and the process is dependent on both the constraints and the desired outcomes. The circles in the figure represent the constraints and context that a school district leader may consider, related to professional development for research-based practices. School district leaders have to consider constraints such as resources, present practice, organizational knowledge, and contextual attributes that exist as a result of the gap between research and instructional practice (Biesta, 2007; Bulgren et al., 2006; Gersten & Brengelman, 1996; Gersten et al., 2000; Korthagen, 2007; McIntyre, 2005; Miretzky, 2007). Additionally, school district leaders have to consider constraints related to organizational knowledge and present practice because teachers adopt classroom practice and make instructional decisions consistent with individual beliefs and preferences (Boardman et al., 2005; McIntyre, 2005; Roehrig et al., 2007; Smith & Southerland, 2007). Moreover, school district leaders must also
consider the social context that the school district exists within as well as the constraints of available resources such as time, money, and support (Evans et al., 2012; Guskey, 2009; Roehrig et al., 2007). The funnel is the process through which the decision is made. A satisficing process might be characterized by a focus on the constraints as they relate to each other and how they may be affected by the outcome of the decision. Conversely, an optimizing process might be focused on the constraints as they can be leveraged to reach the goal of the decision. The presence of exploitation and exploration as well as risk taking are all part of the decision outcome.

Figure 1. A model illustrating March’s Organizational Decision-making Theory as it might be applied to decision-making for professional development
March’s framework was used to design specific questions for a narrative research study of school district leaders. More specifically, the theoretical lens was used to design questions for a narrative study to exam the presence of satisficing and optimizing as well as exploration versus exploitation to understand general propensities of decision-making for professional development. The theory is particularly appropriate for a narrative research study because it provides a framework through which to specifically study the considerations that a school district leader must contemplate regarding constraints and context of decision; the process of decision-making; and the desired outcome as it relates to professional development as a tool for organizational learning.

Chapter Summary

As addressed in this chapter, the purpose of this qualitative study was to investigate how school district leaders make decisions related to the professional development of a research-based strategy. The goal of the study was to increase understanding of how school district leaders make decisions related to professional development, what they considered during the decision-making process. March’s organizational decision-making framework, when applied to this research, may enable school district leaders to better understand and improve how they make decisions for professional development of research-based strategies by identifying areas that can be considered and explored in the decision-making process.
Chapter Two: Literature Review

Introduction

School district leaders are expected to make decisions and provide organizational and instructional direction for the institutions they represent (Feld, 1981; Jenkins, 2007; Johnson, 2009). However, making decisions that are timely, efficient, and ensure teacher effectiveness may be challenging for leaders of K-12 school districts because of the research practice gap (Biesta, 2007; Gersten & Brengelman, 1996; Gersten et al., 2000; Korthagen, 2007; McIntyre, 2005; Miretzky, 2007), the beliefs teachers use to guide practice and how teachers adopt classroom practice, (Boardman et al., 2005; McIntyre, 2005; Roehrig et al., 2007; Smith & Southerland, 2007), as well as the ongoing competition for time, resources, and support across a district (Evans et al., 2012; Guskey, 2009; Roehrig et al., 2007). Oftentimes, the decisions that school district leaders make result in changes to instruction and policy (Dryden, 2013). How school district leaders make decisions, the purpose of the decisions, and the context of the decisions may impact the extent and efficacy of organizational and instructional change resulting from the decisions (Hyle et al., 2010).

The purpose of this chapter is to present a review of research and literature that examines school district leaders’ decision making. Specifically, the literature is analyzed through three general themes: the discrete process of decision-making, the decision-making process as it relates to a specific purpose, and how the process of decision-making may be informed by context. Throughout each section, there is an examination of how the literature relates to the theoretical framework for this study. This literature review is organized into the following sections Examining Decision Making as a Discrete Process, How Purpose Informs Process, The Context of Decision Making, and Summary.
Examining Decision Making as a Discrete Process

The process of decision-making has been examined by many scholars because it is a central topic for all organizations (Simon, 1993). Decision-making is central to all organizations because both day-to-day management and long-term planning are often accomplished through decision-making (Cohen, March, & Olsen, 1972; Jones, 1999; March, 1978a, 1991b, 1994). This is true of school districts as well as other organizations because school districts are often managed through decisions on the part of school district leaders (Boyland & Jarman, 2011; Casto & Sipple, 2011; Dryden, 2013; Feld, 1981; Hoy & Tarter, 2010; Lunenburg, 2010).

The decision-making process used by school district leaders can be examined as a discrete topic because there are a variety of ways in which school district leaders choose to make decisions. (Casto & Sipple, 2011; Coburn, Toure, & Yamashita, 2009; Farley-Ripple, 2012; Harris & Munley, 2002; Hooker, 2000; Hoy & Tarter, 2010). For instance, some school district leaders choose to make decisions collaboratively (Brazer et al., 2010; Clark & Clark, 2002), some choose to make hierarchical decisions (Hallinger, 2011; Hoy & Tarter, 2010; Langlois, 2004; Lasher, 1990; Lunenburg, 2010), still other school district leaders seem to be influenced by those who participate in the decision-making process (Brazer & Peters, 2007; Brazer et al., 2010; Casto & Sipple, 2011; Feld, 1981), while other school district leaders work to include inquiry and research as part of the decision-making process (Coburn et al., 2009; Farley-Ripple, 2012; Rasmussen & Karschney, 2012). The following section of this literature review will explore the literature that examines decision-making processes used by school district leaders.

School district leaders are responsible for making decisions for all aspects of their organizations including but not limited to programmatic (Ewbank, 2011; Feld, 1981), instructional (Brazer & Peters, 2007; Grissom, Kalogrides, & Loeb, 2015), financial (Boyland &
Jarman, 2011; Chance & Cummins, 1998; Dryden, 2013), professional development (Abrego & Pankake, 2011; Mangin, 2014), school improvement (Beard, 2012; Copland, 2003), and innovation (Brunner, 1998; Lasher, 1990; Stewart et al., 2012). Oftentimes these decisions are seen as extensions of a school district leader’s understanding of the context of the organization as it relates to community values, mission and vision of the school district, their own personal values, and an individual’s ability to lead a school district (Hyle et al., 2010; Jenkins, 2007). For this reason, it is not surprising that school district leaders attempt to develop decision-making processes that may be used in a variety of situations and with multiple stakeholders (Brunner, 1998; Copland, 2003; Farley-Ripple, 2012; Hyle et al., 2010; Langlois, 2004; Noppe et al., 2013; Pashiardis & Baker, 1992). Similar to an optimizing process, school district leaders often aspire to use a rational decision-making process in which the leader identifies the goal to solve a problem, generates alternatives, evaluates those alternatives, chooses from the options, implements the decision and then evaluates the decision (Lunenburg, 2010). Unfortunately, school district leaders are often bound within the decision-making process because they do not have complete information or the time to generate multiple alternatives before making a decision (Abrego & Pankake, 2011; Cohen, March, & Olsen, 2012; Cohen et al., 1972; Gigerenzer & Goldstein, 1996; Jones, 1999; Lunenburg, 2010; March, 1978a, 1994; Simon, 1991). Therefore, school district leaders routinely apply a variety of methods in order to make decisions (Farley-Ripple, 2012; Hoy & Tarter, 2010; Langlois, 2004; McLlellan, Hyle, & Ivory, 2010; Noppe et al., 2013), and these decisions often fall along a continuum of either optimizing decisions or satisficing decisions (March, 1991a; March, 1996; March, 1978a; March, 1991b; Noppe et al., 2013).
Noppe, Yager, Webb, and Sheng (2013), found that by school district leaders use various processes. In their quantitative study of 281 superintendents, they observed that there were school district leaders that attempted to make optimizing decisions, examining the goals of the decision outcome and the goals of the organization as primary to the decision-making process. Additionally, they found that when making decisions some superintendents used an incremental approach, making several small decisions that led to a larger decision. Other superintendents used a process of mixed-scanning, in which they looked at the data involved in the decision, considered some general facts, and looked for available choices. Still other school district leaders, make decisions without first proposing the reason for reaching the decision, in effect finding solutions for problems that were either not identified or did not exist, a term coined as garbage can decision-making, by Cohen, March, and Olsen (1972). These findings are consistent with March’s (1978,1991) framework particularly as it relates to the process of optimizing or satisficing. Furthermore, these findings support the earlier work of Hoy and Tarter (2010) which suggest that decision-making should be done in a satisficing way, finding the best decision that fits the context of the decision.

As outlined above, there are a number of discrete processes used by school district leaders to make decisions. While decision processes may be more satisficing or optimizing, the literature on school district leaders’ decision-making processes seems to emphasize the use of collaborative decision-making versus hierarchical decision-making. Additionally, the literature looks to examine who is involved in the process as well as whether research is part of the decision-making process.

**Collaborative decision-making.** Perhaps the most subscribed to process of decision-making by school district leaders can be defined as collaborative decision-making. While there
is a consistent use of the term collaborative decision-making, the definition seems to be a bit more elusive. Some scholars conclude that collaborative decision-making takes place whenever and however additional people are involved in the decision-making process (Johnson, 2009; Katz, 2012; Touchton & Acker-Hocevar, 2011), others assert that collaborative decision-making takes place only if all stakeholders are involved in making a decision (Ewbank, 2011; Goldman & O'Shea, 1990; Lorsbach, 2008), still other scholars contend that collaborative decision-making occurs when a group of selected individuals work in conjunction with the school district leader to reach a decision (Brazer & Peters, 2007; Brazer et al., 2010; Copland, 2003; Rasmussen & Karschney, 2012). Regardless of how collaborative decision-making is defined, it is clear that collaborative decision-making is a complex process that requires significant time and commitment from school district leaders and stakeholders (Touchton & Acker-Hocevar, 2011).

School district leaders approach collaborative decision-making in a number of ways. Some leaders work to formulate decisions collaboratively and then implement a decision using a traditional top-down approach (Brazer & Peters, 2007; Brunner, 1998). Other school district leaders attempt to work through an optimizing process by developing committees for a specific decision, setting goals for the decision, and then working together to implement the decision (Brunner, 1998; Ewbank, 2011; Goldman & O'Shea, 1990; Lorsbach, 2008). Some school district leaders define a collaborative decision-making process as simply having an open door and listening attentively to stakeholders (Katz, 2012) or as surveying the opinions of stakeholders (Johnson, 2009). Despite the multiple definitions, there appears to be distinct levels of collaborative decision-making that exist on a continuum from simple participation to highly collaborative (Copland, 2003).
In the beginning stages of collaborative decision-making, the decision makers often struggle with questions, what types of data to use to make decisions, what their role is in decision-making, and have difficulty getting decision-making off the ground (Copland, 2003; Hoy & Tarter, 2010; Johnson, 2009; Lorsbach, 2008). As collaborative decision-making is practiced, decision makers and school leaders become more proficient in asking questions, using data, defining roles, and improving the decision-making process (Copland, 2003; Ringwalt, Ennett, Vincus, Rohrbach, & Simons-Rudolph, 2004). These findings are consistent with the theoretical framework, in that present practices, organizational learning, and organizational knowledge are all vital parts that inform the decision-making process (March, 1991a, 1991b, 1996). Additionally, collaborative decision-making tends to use processes closer to optimizing, by setting goals, examining data, and developing a clear understanding of the decision outcome that is desired (Dryden, 2013; Ewbank, 2011; Goldman & O'Shea, 1990; Jayroe & Brenner, 2002; Lunenburg, 2010). As decision-making becomes more collaborative and decision makers more confident school district leaders note a shift in their roles from traditional authority to facilitation and framing questions (Copland, 2003; Ewbank, 2011). Despite the challenges of collaborative decision-making, it is a consistently subscribed to heuristic for school leader decision-making (Hoy & Tarter, 2010; Noppe et al., 2013).

As considered in relationship to the exploration-exploitation continuum of the theoretical framework and the management of risk, it appears that those school district leaders who are able to work through the complexity of collaborative decision making are able to reap significant rewards for their districts and perceptions of leadership efficacy (Copland, 2003; Ewbank, 2011; Goldman & O'Shea, 1990; Jenkins, 2007; Katz, 2012; Rasmussen & Karschney, 2012). When collaborative decision making is highly effective, it is credited with the benefits of
simultaneously making a decision, including multiple stakeholders in the decision-making process, aligning decisions with community goals and values, and garnering solid support for a decision (Jenkins, 2007; Johnson, 2009). School district leaders continue to use collaborative decision-making models because they believe that it is a positive way to develop the perception that decisions belong to the entire community and are not owned by the school leader (Copland, 2003; Ewbank, 2011; Goldman & O'Shea, 1990; Johnson, 2009).

While there is no definitive evidence that collaborative decision-making has an impact on student learning (Hallinger, 2011), the practiced and effective use of collaborative decision-making can lead to a culture of inclusivity and the development of positive and trusting relationships between school district leaders and the communities they serve (Copland, 2003; Ewbank, 2011; Goldman & O'Shea, 1990; Katz, 2012; Rasmussen & Karschney, 2012). In school districts where highly effective collaborative decision making occurs, decisions often defy anticipated outcomes because the district stakeholders believe that such decisions are consistent with the values of all stakeholders (Ewbank, 2011). Collaborative decision-making can lead to systematic inquiry into problems of practice by stakeholders, which can then become the vehicle by which to change past practice that has historically lead to inequities for students, teachers, and stakeholders (Katz, 2012; Rasmussen & Karschney, 2012).

Conversely, ineffective use of collaborative decision-making by school district leaders can have negative and potentially damaging results for both the district and the school leader (Brazer et al., 2010; Hallinger, 2011; Johnson, 2009; Patterson et al., 2006). Oftentimes while decisions are considered collaboratively made, implementation of those decisions is problematic because decision outcomes are consistent with what the school district leader favored (Brazer & Peters, 2007; Brazer et al., 2010). This is particularly true if the school district leader is viewed
as having used his or her positional authority to influence the decision (Brunner, 1998). While teachers involved in collaborative decision-making believe that school district leaders are key to implementation, if the implementation of that decision is directive and hierarchical, then it can interfere with the perceived benefits of collaborative decision making and the implementation of decisions (Brazer & Peters, 2007; Brunner, 1998; Patterson et al., 2006; Ringwalt et al., 2004).

Additionally, some research on collaborative decision making found that clarity of roles for participants is very important (Copland, 2003; Ewbank, 2011; Johnson, 2009). Organizational archetypes can lead to structural problems for collaborative decision-making and without a clear understanding of what their role in decision-making is, participants can be adamant about participating in making the decision, but not invested in taking responsibility for the decision (Rasmussen & Karschney, 2012). Furthermore, clarity about the collaborative decision-making process and roles is important to establish because without it, people want to be involved but do not want to put in the time necessary to review the root cause of problems, to learn how to use appropriate data for decision-making, or plan and implement decision outcomes (March, 1978a, 1991b; Touchton & Acker-Hocevar, 2011).

School district leaders’ use of collaborative decision-making can also be subject to the context or constraint of micro politics from within and from outside of the school district (Brazer et al., 2010; Grissom et al., 2015; Hallinger, 2011; Lorsbach, 2008; March, 1991a, 1991b). Teachers who have more years of classroom experience, school board members, and highly active community members can often put pressure on a collaborative decision-making process to favor the outcome that they desire (Brazer et al., 2010; Johnson, 2009; March, 1991b). Several studies have highlighted how such levels of pressure may lead to; inequities in services for students, practices that favored particular teachers or demographics, and political divisions
within and across communities (Brazer & Peters, 2007; Goldman & O'Shea, 1990; Grissom et al., 2015; Johnson, 2009; Lorsbach, 2008; Patterson et al., 2006). Furthermore, there is additional evidence that some participants in collaborative leadership believe that despite stakeholders being involved in decision-making, the results are often consistent with the school district leader’s desired outcome or particular values (Brazer & Peters, 2007; Hallinger, 2011; Hooker, 2000; Patterson et al., 2006).

Despite the problems that can result from the use of collaborative decision-making, drawbacks can be mitigated by carefully assessing the constraints and context of the decision and using the information to inform the decision-making process (March, 1991a, 1991b). Developing collaborative decision-making bodies based on expertise rather than interest was found to be one way (Touchton & Acker-Hocevar, 2011). Developing a systematic process of inquiry with clearly defined roles might also contribute positively to the success of a collaborative decision-making model (Rasmussen & Karschney, 2012). Spending time to develop clear relationships with all demographics and revisiting prior inequitable decisions, may also help to circumvent problems that can result from the ineffective use of collaborative decision-making models (Katz, 2012).

**Hierarchical decision-making.** When school district leaders make decisions outside of a collaborative process it may be referred to as top-down decision-making or hierarchical decision-making (Brunner, 1998; Noppe et al., 2013; Petersen & Short, 2001). As indicated above, while collaborative decision-making appears to be closer to optimizing, hierarchical decision-making may be closer to a satisficing processes of decision-making (Hoy & Tarter, 2010; Noppe et al., 2013). While school district leaders may see the benefits of collaborative
decision-making (Copland, 2003; Ewbank, 2011), they may, in specific situations, or based on preference, make decisions in a more hierarchical way (Noppe et al., 2013).

School district leaders assert that they make decisions that are consistent with the core values and mission of the school district for which they work (Chance & Cummins, 1998; Hyle et al., 2010). However, when decision-making is hierarchical, it may cause a variety of problems, from implementation to ownership of a decision (Brazer & Peters, 2007; Brazer et al., 2010; Johnson, 2009). Hierarchical decision-making processes may lead to the perception that there are biases toward a specific decision (Johnson, 2009). For example, in a financial crisis a school district leader’s decision may be perceived as developing efficiencies versus maintaining the quality of program (Boyland & Jarman, 2011). However, contrary to this concept is the work done by Langlois (2004), which found that school district leaders involved in complex decision-making, make decisions in stages, considering at each stage the impact that the decision will have on those involved and the context of the larger organization. This is consistent with the finding of Noppe et al (2013) that decisions are often made in an incremental way. Additionally, characteristic of satisficing, school district leaders may consider and prioritize how a decision might be received in the context in which it is made, as well as prioritize the mission and core values of the district for which they work (Lasher, 1990; Lunenburg, 2010; Major, 2013).

School district leaders perceptions of the decision-making process indicate that they consider a variety of contextual attributes when making hierarchical decisions (Hyle et al., 2010; McLellan et al., 2010). School district leaders consistently assert that decisions, no matter how they are reached, must be consistent with the vision of the school district (Hyle et al., 2010; Sansone, 1995). According to school district leaders they may also use the goal of maintaining high quality programs as a criterion for decisions (Boyland & Jarman, 2011). Additionally,
school district leaders consistently perceive the most important consideration for the decisions they make as the best interest of students (McLellan et al., 2010). While school district leaders may concede that cost efficacy does play a role in decision-making (Boyland & Jarman, 2011; Chance & Cummins, 1998), they also point to how decisions are bound by the need to balance competing priorities, resources, and research as considerations when making decisions (Farley-Ripple, 2012; Hyle et al., 2010). As such, hierarchical decision-making viewed through the lens of the theoretical framework might be perceived a more satisficing process, more consistent with exploitation than exploration, particularly in cases that pertain to fiscal concerns or when resource constraints are significant.

While hierarchical decision-making may not be received as well as collaborative decision-making by stakeholders, (Clark & Clark, 2002) there may be specific situations and reasons that school district leaders employ this decision-making process. Specifically, when the decision must be made quickly (Montz, Galluppi, Losego, & Smith, 2015), confidentially (Langlois, 2004), or the school district leaders views the decision as primarily his or her responsibility (Lasher, 1990). While there are times that hierarchical decision-making may be applicable (Hoy & Tarter, 2010), it appears that even during those occasions school district leaders will gather input, discuss possible decisions, and take counsel from others (Langlois, 2004).

**Participants in decision-making.** How a decision is made is not just about the structure of a particular decision; it also includes who has or does not have the opportunity to participate in either advising or making a decision. Decision-making by school district leaders rarely happens in isolation (Hallinger et al., 1996). School district leaders look to others for advice and counsel to better understand the context of the decision (Goldman & O'Shea, 1990; Hallinger et
al., 1996). At times, those that aid in decision-making are those closest to the school district leader, and at other times the school district leader looks to people within the district that have expertise in the decision area (Feld, 1981).

School district leaders may select or ask volunteers to participate in decision-making (Brazer et al., 2010; Feld, 1981). In such cases, it appears that those who share the leader’s view on what the decision outcome should be tend to have the most influence in the decision-making process (Brazer & Peters, 2007; Feld, 1981). In addition, when area experts are selected to aid in the decision-making process, they appear to have a high level of influence on the outcome of the decision (Brazer & Peters, 2007). Furthermore, the stakeholders involved in the decision-making process are often selected based on the roles that they play within the larger social context of the district (Goldman & O'Shea, 1990). Therefore, the individuals who participate in decision-making may set the course for whether decisions are normative, programmatic, or what is in the best interest of all students (Casto & Sipple, 2011). The opportunity to either advise in a decision, or make a decision has the potential to have a tremendous impact on the direction of the district as well as on the programming for students (Brazer et al., 2010; Johnson, 2009). Therefore, what participants consider in the process of decision-making, including data and research, is an important aspect to review (Farley-Ripple, 2012).

**Use of research in decision-making.** During the decision-making process there are a number of factors that are considered. However, at times, and consistent with an optimizing decision process, the use of research is imbedded (March, 1987; Rasmussen & Karschney, 2012). In particular districts, a clear cycle of inquiry is used that includes identifying the problem and researching specific aspects of the problem to develop research-based solutions (Farley-Ripple, 2012; Rasmussen & Karschney, 2012). Conversely, in other districts, the use of
research is limited to an endorsement by a publisher that a particular program is research-based (Coburn & Talbert, 2006; Lorsbach, 2008). Regardless of the way in which research is used, the application of research as part of the decision-making process may be a difficult undertaking for any district (Farley-Ripple, 2012; Rasmussen & Karschney, 2012).

The inclusion of research in the decision-making process can be examined in multiple ways. Coburn and Talbert (2006) examined four potential uses of research in school districts. First, instrumental use, the specific use of research as evidence. Secondly, political use, or manipulation of evidence for profit or gain. Third, conceptual use, in which research evidence is not directly cited, but influences outcomes. Finally, symbolic use, which involves the use of research to offer support and legitimacy for outcomes that are already favored. The use of research in decision-making by school district leaders, has been found to be more conceptual and symbolic than political or instrumental (Coburn & Talbert, 2006; Farley-Ripple, 2012). In other words, during the decision-making process, school district decision makers are more likely to use research outside of a formal cycle of inquiry (Farley-Ripple, 2012) and more likely to use it in a generalized way to offer support for a decision that has been made (Coburn & Talbert, 2006), at times using research after the fact instead of using research to drive the decision-making process (Coburn et al., 2009). Furthermore, the research that is used is often based on professional periodicals and professional organizations rather than academic journals and specific research studies (Farley-Ripple, 2012). Finally, school district leaders that use a cycle of inquiry as part of the decision-making process may have to rely on specific positions or offices within the school district, relying on individual strengths and the ability to resource a strong research office (Coburn et al., 2009; Mangin, 2014; March, 1991a).
This section of the literature review has concentrated on developing an overview and analysis of the decision-making processes that may be used by school district leaders, by examining quantitative and qualitative research studies as well as theoretical work around decision-making processes. Decision processes utilized by school district leaders may be hierarchical (Hoy & Tarter, 2010) or collaborative (Brazer et al., 2010) and may include varying degrees of incremental, mixed-scanning, and garbage can decision-making (Hoy & Tarter, 2010; Noppe et al., 2013). The literature reviewed seems to indicate that collaborative decision-making may be closer to an optimizing process, while hierarchical decision-making may be closer to a satisficing process (Hoy & Tarter, 2010; Noppe et al., 2013). Furthermore, exploitation seems to be more evident in hierarchical decision-making, while exploration seems to be more consistently found in collaborative decision-making (Hallinger et al., 1996; Lorsbach, 2008).

School district leaders’ decision-making processes, even when hierarchical, often include others in decision-making either directly through collaborative decision-making or seeking advice, or indirectly through positional proximity and expertise (Langlois, 2004). While in some districts the role of research in the decision-making process is more prominent and in other districts it tends to be more conceptual and symbolic in nature, the use of it in the decision-making process of school district leaders may be more of a means by which to justify actions to be taken, rather than a way in which to come to a decision on the best course of action (Coburn & Talbert, 2006; Coburn et al., 2009; Farley-Ripple, 2012). This section of the literature review has been dedicated to analyzing the literature through the discrete lens of process, the next section works to examine the literature to ascertain if and how the purpose of a decision may inform the decision-making process utilized by school district leaders.
How Purpose Informs Process

While school district leaders may use specific decision-making processes, the purpose of a decision may at times inform the process (Harris & Munley, 2002; Langlois, 2004; Lasher, 1990; Major, 2013; Montz et al., 2015). School district leaders make numerous decisions on a daily basis, doing so for a variety of purposes (Feld, 1981; Jenkins, 2007). The task of examining every decision for every purpose would not be possible. However, the literature reviewed provides some consistent themes for examination. Among the purposes researched by scholars, is the allocation of resources within a district (Dryden, 2013; Ewbank, 2011; Pankake & Bailey, 1986), within schools (Major, 2013; Pankake & Bailey, 1986; Watson, 2007), and within communities (Boyland & Jarman, 2011; Harris & Munley, 2002; Ingle, Johnson, & Petroff, 2012; Jack & Sludden, 2013). They have also investigated the implementation (Desimone et al., 2002), policy development (Desimone, Smith, & Phillips, 2007; Little, 1989; Spillane, 2000), and resource allocation (Fermanich, 2002; Miles, Odden, Archibald, Fermanich, & Gallagher, 2002; Miles, Odden, Fermanich, & Archibald, 2004) for organizational learning through professional development. How school district leaders make decisions about school improvement and the selection of products and the adoption of programs, is also a topic examined (Abrego & Pankake, 2011; Brazer & Peters, 2007; Casto & Sipple, 2011; Jayroe & Brenner, 2002). In addition, scholars have also turned their attention to decision-making for the purpose of resolving a dilemma (Noppe et al., 2013; Polka et al., 2014). The literature outlined in this section examines how purpose might inform the decision-making process, when the purpose of the decision is resource allocation, professional development, school improvement, or dilemma resolution.
**Resource allocation.** The availability or scarcity of resources is an important contextual constraint of the theoretical framework, and may be a fundamental aspect of the exploration/exploitation continuum particularly as it relates to risk taking and decision-making by school district leaders (Hallinger et al., 1996; Hallinger, 2011; March, 1991a, 1991b). When the purpose of decision-making is resource allocation, school district leaders may use a more hierarchical and satisficing processes for decision-making (Boyland & Jarman, 2011; Pankake & Bailey, 1986). School district leaders describe their decision-making in such cases as, at times incremental, but always driven by the vision and mission (Dryden, 2013; McIlellan et al., 2010). The description is consistent in cases that are in response to a decline in enrollments (Chance & Cummins, 1998), a decline in revenues (Dryden, 2013; Ewbank, 2011; Jack & Sludden, 2013), or a decline in available resources (Abrego & Pankake, 2011; Pankake & Bailey, 1986).

When school district leaders make decisions associated with resource allocation, it appears that they make these decisions using a satisficing process, which includes decisions to decrease budget lines as well as situations that involve school consolidation or school renovation (Boyland & Jarman, 2011; Harris & Munley, 2002; Pankake & Bailey, 1986). In a narrative study of 135 superintendents who encountered a 10% or greater decline in resources, Pankake and Bailey (1986) found that superintendents generally tried to find ways to manage decline without affecting students. However, notably consistent across the literature was how school district leaders make decisions to manage the decline of resources in ways that excluded multiple stakeholder groups and instead relied on the mission and vision of the district for which they worked to guide their decision-making (Dryden, 2013; Johnson, 2009; McIlellan et al., 2010; Patterson et al., 2006). Contradictory to this is evidence from multiple studies that indicate that the decision processes of school district leaders are bound by cost and efficiency and that these
two contextual factors have primary influence on decision-making during austere times (Chance & Cummins, 1998; Jack & Sludden, 2013; Pankake & Bailey, 1986). Additionally, these decisions were often incremental and based on the budgeting, bonding, or municipal laws that dictated how the school district leader could, or should make a specific decision (Harris & Munley, 2002; Patterson et al., 2006). Furthermore, for those decisions in which school district leaders did include other stakeholders, the stakeholders involved had a specific sphere of influence and often a specific desired outcome (Grissom et al., 2015; Hackmann, 2012; Patterson et al., 2006).

Decision-making regarding resource allocation may be more bound by context as well as the influence of those involved in the decision-making (Boyland & Jarman, 2011; Harris & Munley, 2002; Pankake & Bailey, 1986). When input into decision-making is limited to specific stakeholders, it follows that these stakeholders may have a more substantial influence on the decision outcome (Feld, 1981; Grissom et al., 2015; Ringwalt et al., 2004). At times, this may lead to an inequitable distribution of resources for students (Chance & Cummins, 1998; Grissom et al., 2015; Patterson et al., 2006). Several studies found that decision-making that lacks stakeholder input often leads not only to inequitable division of resources but also to difficulties in garnering support for future resources (Dryden, 2013; Johnson, 2009; Watkins & Stevens, 2010). Conversely, when decision-making involving resources is transparent it may lead to the immediate support of decisions as well as greater support for resource decisions in the future (Ewbank, 2011; Ingle et al., 2012; Katz, 2012; Major, 2013). Despite these findings when making decisions about resource allocation, school district leaders seem to depend on a smaller network of stakeholders and may listen more readily to those whose advice most closely align with school district leaders’ values (Lasher, 1990).
While school district leaders assert that they make decisions based on the district vision and mission (Dryden, 2013; Hyle et al., 2010; Jenkins, 2007; McIlluman et al., 2010; Patterson et al., 2006) there is some evidence that when making decision related to resource allocation school district leaders may align decision making with their own values and beliefs (Dryden, 2013; Ewbank, 2011; Feld, 1981). When examining resource allocation decision-making, those few individuals who are part of the decision-making process may only have an influence on the outcome when their input aligns with that of the school district leader (Brazer et al., 2010; Casto & Sipple, 2011). Additionally, it may also be true that there are times that even when stakeholder groups are diverse and include multiple stakeholders across multiple interest groups, the outcome still favors the position of the school district leaders (Goldman & O'Shea, 1990; Major, 2013). While resource allocation decision seem to inform a more satisficing process, it appears that a more mixed or incremental process of decision-making is employed related to the implementation of professional development (Mangin, 2014; Rasmussen & Karschney, 2012), the adoption of new products or programs (Brazer & Peters, 2007; Goldman & O'Shea, 1990; Lorsbach, 2008), and the work toward school improvement (Brazer et al., 2010; Copland, 2003).

**Professional development.** As part of the theoretical framework, professional development may be seen as an aspect of exploration (March, 1991a). The way professional development is implemented and funded may indicate the levels of exploration and exploitation that are present in an organization (March, 1991a). Additionally, the decision processes that school district leaders follow for the implementation of professional development, the design of policies for professional development, and allocation of resources for professional development may be to a greater or lesser degree optimizing or satisficing and incremental (Floden et al., 1988; Marsh, 2002; Marsh & Farrell, 2015).
Decisions made by school district leaders related to the implementation of professional development appear to be made either through negotiated agreements (Elmore, 2002), or through the inclusion of teachers on district level professional development committees (Desimone et al., 2002). However, this stands in contrast to the decision processes used by school district leaders related to policies and resource allocation for professional development (Firestone et al., 2005; Miles et al., 2002; Miles et al., 2004; Spillane, 2000). Furthermore, school district leader beliefs concerning teacher change and teacher learning may also influence decision-making related to professional development (Firestone et al., 2005; Leithwood et al., 1998; Little, 1989). The limited literature associated with school district leaders’ decision-making process for the purposes of professional development points to a mixture of optimizing, satisficing, and incremental decision-making processes (Floden et al., 1988; Marsh, 2002).

**Implementation decisions for professional development.** In a quantitative study of 111 teachers in 14 schools, Leithwood, Leonard, and Sharratt (1998) found that the implementation process of professional development may impact the extent to which teachers successfully adopt learned practices. School district leaders’ decision processes related to the implementation of professional development appears to be more optimizing (Crossan, Lane, & White, 1999; Desimone et al., 2002; Firestone et al., 2005). While often times professional development and professional development spending are part of negotiated benefits (Elmore, 2002; Miles et al., 2002; Miles et al., 2004), school district leaders attempt to involve teachers in the decision-making process for professional development in a variety of ways (Desimone et al., 2002; Firestone et al., 2005; Leithwood et al., 1998). Consistent with an optimizing process, school district leaders involve teachers in goal setting for professional development, needs assessments for professional development, and at other times teachers are involved in evaluation of
professional development (Desimone et al., 2002). Additionally, Little (1989) found that in two thirds of school districts, school district leaders made decisions regarding content, implementation, and goals for professional development in conjunction with teachers. Notably, Desimone, Porter, Birman, Garet, and Yoon (2002) had similar findings 13 years later. Yet, Little (1989) as well as several later studies point to school district leaders retaining decision-making authority and using a more satisficing decision-making process in regard to resources and spending (Elmore, 2002; Little, 1989; Miles et al., 2002; Miles et al., 2004), as well as policy interpretation and development (Elmore, 2002; Spillane, 2000).

**Resource and policy decisions for professional development.** While implementation decisions may be more consistent with an optimizing decision-making process (Desimone et al., 2002; Firestone et al., 2005), school district leaders appear to use a more traditional, satisficing process related to resource allocation for professional development (Little, 1989; Miles et al., 2002; Miles et al., 2004). Despite the fact that school districts invest considerable financial resources in exploration through professional development, with some districts spending up to 3% of the annual budget on professional development activities (Fermanich, 2002; Miles et al., 2002; Miles et al., 2004), it appears that spending decisions related to professional development are often made by either a single school district leader or a small group of school district leaders (Leithwood et al., 1998; Little, 1989). Additionally, expenditures are limited to district priorities as decided by school district leaders (Elmore, 2002; Little, 1989; Miles et al., 2002; Miles et al., 2004). Furthermore, and consistent with March’s (1978, 1991) theory of decision-making, school district leaders’ decision processes related to professional development are at times bound by the reliance and priorities of outside funding (Miles et al., 2004), the efficiency and availability of specific delivery methods, programs, and presenters (Little, 1989; Miles et al., 2002; Spillane,
2002), and the attempt to balance the delivery of professional development with the priority of instructional delivery (Schlechty & Whitford, 1983; Spillane, 2002). Given these constraints, school district leaders may give preference to specific large-group, one-time professional development strategies and programs rather than imbedded long-term professional development for individual teachers (Fermanich, 2002; Little, 1989; Miles et al., 2002; Miles et al., 2004; Spillane, 2002). Insomuch as these constraints may determine the decision processes used for resource allocation related to professional development, policy decisions related to professional development may also be made in a more satisficing way (Spillane, 2000, 2002).

Policies related to professional development include processes for professional development as well as priorities for professional development and are frequently bound by contextual constraints (Desimone et al., 2007; Elmore, 2002; Little, 1989; Schlechty & Whitford, 1983). Often school district leaders retain final approval of the plans, both individual and district-wide, for professional development, (Desimone et al., 2007; Little, 1989; Spillane, 2000). School district leaders also make policy decisions related to expectations on the use of the learning acquired through professional development (Desimone et al., 2007; Elmore, 2002). Additionally, decisions related to how policy is interpreted and implemented may be based on the understanding of individual school district leaders (Spillane, 2000; Spillane, 2002). Furthermore, decision-making related to policies for professional development appear to be based on school district leaders beliefs around teacher change, teaching practice and teacher learning (Spillane, 2002).

**District leaders’ beliefs and decisions for professional development.** The decisions that school district leaders make related to professional development may be closely tied to individual school district leaders’ beliefs (Firestone et al., 2005; Leithwood et al., 1998; Spillane,
2002). School district leaders’ decision processes related to professional development is often closely tied to their concepts of professional development and its role in the larger organization (Desimone et al., 2002; Little, 1989; Spillane, 2002), teacher growth (Firestone et al., 2005; Leithwood et al., 1998), and how teachers should participate in and implement their individual professional growth and development (Spillane, 2002). While the decision-making process for implementing professional development may be more optimizing (Desimone et al., 2002; Firestone et al., 2005; Floden et al., 1988; Marsh, 2002), the beliefs of school district leaders simultaneously bound by policy, resource allocation, and the multiple tasks may lead to a more satisficing decision-making process (Little, 1989; Spillane, 2002). In a multi-state study, Floden et al. (1988) found that while decision-making processes related to professional development are neither entirely optimizing nor entirely satisficing and these finding were built upon by Marsh (2002) who contends that the decision process used by school district leaders related to professional development is a mixed decision-making process. Interestingly, it may be that the decision-making processes of school district leaders related to professional development are a balance of optimizing and satisficing processes (Floden et al., 1988; Marsh, 2002).

**School improvement.** March’s (1978a, 1996) theoretical framework is applicable to the research on school improvement because it speaks clearly to all aspects of the framework. Resources constraints, organizational knowledge, and organizational context may inform the decision-making process (March, 1991b, 1996). Additionally, during the school improvement process, school district leaders may need to develop a balance between exploitation and exploration (March 1978b, 1991a, 1991b). By examining the existing literature related to decision-making by school district leaders informed by the purpose of school improvement, certain trends become apparent. When the purpose of school district leaders decision making is
centered on improvement through organizational learning for a change in strategy or on the adoption of a new product or program, their process of decision-making may be more optimizing, more systematic, and more focused more on quality as it relates to student experience and achievement (Brazer & Peters, 2007; Ewbank, 2011; Goldman & O'Shea, 1990; Taylor, 2010).

Consistent with an optimizing decision-making process, when school district leaders make decision related to school improvement, they appear to use an approach focused on a goal or outcome (Copland, 2003; Lorsbach, 2008; Ringwalt et al., 2004). The approach often includes committees made up of multiple stakeholders including other administrators, teachers, and community members (Brazer et al., 2010). Additionally, when the goal of a decision is school improvement, school district leaders look for a transparent and structured process to ensure that the improvement will align with a school district’s core values and will be supported despite the cycles of the economic state of a community (Ewbank, 2011).

School district leaders’ decision making related to the purpose of school improvement is often performed in a systematic way, which includes goal setting, examining data, and looking at research (Copland, 2003; Goldman & O'Shea, 1990; Jayroe & Brenner, 2002; March, 1991a; Sansone, 1995). When school improvement is the purpose of school district leaders’ decision-making, goals that align with the mission and core values of the school district are often explored and created with groups of stakeholders to decide on the outcomes of school improvement (Dryden, 2013; Goldman & O'Shea, 1990; Rasmussen & Karschney, 2012; Sansone, 1995). Additionally, when selecting a program, product, or strategy for school improvement the decision-process employed by school district leaders, may include a more structured analysis of
School district leaders’ development and use of a structured process for decision-making with the purpose of school improvement seems to be consistent despite the student achievement level or demographics of the school district (Pashiardis & Baker, 1992). While much of the literature found that school district leaders may engage in a structured decision process when the purpose is school improvement (Goldman & O'Shea, 1990; Jayroe & Brenner, 2002; Rasmussen & Karschney, 2012; Sansone, 1995), some of the literature suggests that even with a structured, systematic decision process, the examination of data and research may not be of high quality and may be limited to vendor-based research and examination of copyright dates (Lorsbach, 2008). Additionally, Abrego and Pankake (2011) assert that when a school district leader’s decision-making process related to school improvement is inadequate it may result in problems with implementation and the use of the specific strategies being adopted by teachers for classroom practice. While a systematic and structured process appears to be used by school district leaders when the purpose of decision-making is school improvement, the quality of student experience and achievement may be a primary consideration as part of the decision-making process (Taylor, 2010).

Decision-making processes applied by school district leaders for the purpose of school improvement appear to be optimizing in that they are focused on the goal of quality as it relates to students’ experience and achievement (Brazer & Peters, 2007). The maintenance and improvement of high quality programs appears to be consistent as a consideration across decision-making processes used by school district leaders for school improvement (Ewbank, 2011; Major, 2013). Additionally, the literature contends that student experience and
achievement is viewed as a paramount consideration in the decision-making process of school district leaders for school improvement, despite the presence of other contextual considerations such as adult comfort levels with the new strategy, product, or program (Taylor, 2010). However, while various studies emphasize the experience and achievement of students as the primary consideration of school district leaders in the decision-making process for school improvement (Ewbank, 2011; Major, 2013; Taylor, 2010), other literature points to a more satisficing decision-making process with the primacy dedicated to normative decisions that emphasize; lower costs, efficiency, community perceptions, potential budget increases and ease of use of the strategy, product, or program (Casto & Sipple, 2011; Jayroe & Brenner, 2002; Lasher, 1990). This apparent contradiction may be exacerbated when juxtaposed with the need for school district leaders to balance decision-making processes related to school improvement, which lend themselves to optimizing, systematic heuristics and decision-making processes used by school district leaders when faced with dilemmas (Langlois, 2004; Montz et al., 2015; Polka et al., 2014).

**Dilemma decisions.** An analysis of the literature results in the realization of an interesting juxtaposition to the decision-making processes used by school district leaders for school improvement and their decision-making process for the purpose of resolving dilemmas. Hoy and Tarter (2010) define a dilemma as having to make a decision that results in resolutions or outcomes that are equally undesirable. Unlike the decision-making process employed by school district leaders for school improvement, in which risk-taking and exploration are more likely, the decision process utilized when the purpose of decision-making is to resolve dilemmas appears to be risk adverse and closer to exploitation (Noppe et al., 2013; Polka et al., 2014). Therefore, it is not surprising to find that decision-making may be more satisficing and the
inclusion of others appears to be dependent on expertise and the circumstances of the dilemma (Boyland & Jarman, 2011; Langlois, 2004; Montz et al., 2015; Polka et al., 2014).

Research points to school district leaders employing a satisficing decision-making process for financial dilemmas, which may also include specific stakeholders such as school board members and key community members (Boyland & Jarman, 2011). Additionally, the decision-making process that school district leaders use for personnel dilemmas appears to be almost entirely satisficing (Langlois, 2004). Still different from the aforementioned is the decision-making process informed by dilemmas that call for the closing of schools in emergencies, such as inclement weather, which seeks to make a decision entirely upon the context as understood by those who have very specific expertise that the school district leader considers to make an informed decision (Montz et al., 2015). While the degree of satisficing and optimizing in the decision process may vary based on the type of decision, the literature seems to point to some consistencies across the decision-making processes applied by school district leaders for dilemmas. Specifically, the literature appears to support that school district leaders implement a satisficing, incremental decision-making process in which decisions are made as a series of small decisions for the purpose of resolving a dilemma (Hoy & Tarter, 2010; Noppe et al., 2013; Polka et al., 2014). According to Langlois (2004), an incremental approach can include up to eight overlapping stages, beginning with the choice to engage in the process of dealing with the dilemma to how the final decision will impact the organization overall.

Consistent with the theoretical framework and the constraints that may be considered in a satisficing or optimizing process, the literature asserts that the process of decision-making applied by school district leaders to resolve dilemmas is highly bound (Hoy & Tarter, 2010). Specifically, the decision must be made with the limited information that is available to the
school district leaders at the time (Lunenburg, 2010; March, 1991b). Also consistent with the theoretical framework, the research indicates that such information is often limited, so the decision being made is often the best that can be made given the circumstances and a satisficing process is used (Gigerenzer & Goldstein, 1996; Hoy & Tarter, 2010; Lunenburg, 2010; March, 1991b; Simon, 1956). Insomuch as decisions made during a dilemma have to be made quickly and are often solely owned by the school district leader, school district leaders may work toward higher degrees of exploitation to manage potential risk (Hoy & Tarter, 2010; Langlois, 2004; Lunenburg, 2010; March, 1991a; March, 1991b).

Interestingly, and of import, are the contradictions in the literature that exist regarding the role of gender in the decision-making process applied for dilemmas. While the literature appears to be consistent regarding the process that school district leaders employ to resolve dilemmas, which may result in an incremental, and highly bound process (Hoy & Tarter, 2010), there are questions as to the role gender plays (Brunner, 1998; Hackmann, 2012; Katz, 2008; Katz, 2004; Noppe et al., 2013; Polka et al., 2014). Noppe et al. (2013) contend that there may be differences in the process applied by male school district leaders as opposed to women school district leaders. The study found that men tended to employ a classic process that included their own experiences and expertise, while women employed a process more consistent with satisficing, and were more likely to include others both as advisors and as decision makers. Contrary to this, Polka, Litchka, Calzi, Denig, and Mete (2014), in their longitudinal mixed- method study of 258 superintendents over three years, found that there was no statistically significant difference ascribed to men and women school district leaders in the process selected for the purpose of resolving dilemmas. Instead, the findings suggest that differences that do exist are more dependent on the context of the dilemma than on the gender of the school district leaders.
This section of the literature review examined the literature as it relates to how the purpose of a decision can inform the process employed by school district leaders. The literature examined included quantitative, qualitative, as well as mixed-method research studies for themes specific to how the purpose of a decision may inform the decision-making processes utilized by school district leaders. Specifically, literature that analyzed the purposes of resource allocation, professional development, school improvement, and dilemma resolution were examined to see if there might be consistency in the type of decision-making process used for specific purposes.

The purpose of decisions appears to inform the decision-making processes used by school district leaders in that when the purpose is for resource allocation or dilemma resolution the processes employed tend to be more satisficing and incremental, with lesser degrees of exploration and risk taking (Hoy & Tarter, 2010; Noppe et al., 2013). Decisions regarding professional development appear to involve a mixed or more incremental decision-making process (Floden et al., 1988; Marsh, 2002). The processes employed for school improvement tended to apply a optimizing decision-making process, with greater willingness toward exploration and risk taking on behalf of school district leaders (Copland, 2003; Lorsbach, 2008; Ringwalt et al., 2004). While this section of the literature examined how purpose may inform decision-making, the next section of the literature review focuses on how the context of a decision may inform the decision-making process employed by school district leaders.

**The Context of Decision-making**

The theoretical framework for this study closely considers the contextual attributes of decision-making as fundamental to the decision-making process. For the purposes of this section of the literature review, context refers to the specific characteristics or attributes of the individual, community, or institution contributing or informing a decision. The context of
decisions is often an important variable for consideration (Hallinger et al., 1996; March, 1991b). School district leaders need to have a deep contextual understanding of the organizations for which they are responsible (Coburn et al., 2009). Many school district leaders contend that the context of the district informs the decisions that they make (McLlellan et al., 2010). The context surrounding a decision may inform the decision-making processes employed by school district leaders (Hallinger et al., 1996) and this section of the literature review sets out to investigate how different contexts may do so.

**Micro-politics.** Another lens to examine the context of decision-making by school district leaders is through the micro-political context. For the purposes of this examination the term micro-politics is used to describe the condition of the community context, the organizational context, and how the two may interact to inform the decision-making process (Iannaccone, 1991; Marshall & Scribner, 1991). A clear understanding of the context in which a school district exists may be important for school district leaders in order to leverage the decision-making process to garner support (Casto & Sipple, 2011; Coburn et al., 2009; Ingle et al., 2012). Additionally, the micro-political environment may have an impact on the decision-making process as well as the decisions made, particularly as decisions relate to instruction and finance (Casto & Sipple, 2011; Hallinger et al., 1996; Shelton, 1989). Furthermore, even when school district leaders describe their own decision-making process they recognize that the context of the community and the context of the organization both have a bearing on it (McLlellan et al., 2010). Therefore, the next section attempts to examine how the decision-making process may be informed through a micro-political community context, including when a community is considered rural, as well as the micro-political context of the organization, particularly when the organization is or is not in a financial crisis.
**Micro-political context of the community.** The micro-political context of the community may inform the decision-making process of school district leaders. It appears that when looking at new initiative school district leaders carefully consider the present micro-political context of the community. This is particularly true when there are potential budget implications for the decision (Lasher, 1990). In such cases, the school district leaders may be more likely to use a research-based framework as part of the decision-making process (Coburn et al., 2009; Farley-Ripple, 2012; Mangin, 2014). Interestingly, Pashiardis and Baker (1992) found that the higher the perceived performance level of the school district is, the less the micro-political context of the community informed the decision-making process. However, in general, it appears that school district leaders are constantly aware that the organization exists within the larger community; therefore, a decision-making process that will leverage the micro-political context may be to a greater degree satisficing as opposed to optimizing (Goldman & O'Shea, 1990; Hallinger et al., 1996; Watson, 2007). While there exists a micro-political context in most communities, the micro-political context within a rural community may be more likely to inform the decision-making processes of school district leaders (Grisson et al., 2015; Hooker, 2000; Marshall & Scribner, 1991).

School district leaders within a rural community may find that the micro-political context is more apparent and that decision-making is more visible to the community (Hooker, 2000; Touchton & Acker-Hocevar, 2011). Additionally, the micro-political context in a rural community may be bound by competing priorities and the priorities often change based on the needs of the community, the students, and the organization (Hyle et al., 2010). In such cases, the decision-making processes appears to tend toward a satisficing process, which is more likely to result in normative decisions (Casto & Sipple, 2011; Hyle et al., 2010; Jenkins, 2007; Polka et
al., 2014). In addition to the micro-political context of the community, the micro-political context of the organization itself is also present.

**Micro-political context of the organization.** While there are always contextual considerations from outside of the organization, the micro-political context within the organization may inform the decision-making process of school district leaders to an even greater extent (Stewart et al., 2012). Furthermore, in the organizations micro-political context, in order guarantee that there is support for particular changes to teaching strategies and learning environments, school district leaders may adopt specific research based frameworks as part of the decision-making process (Farley-Ripple, 2012; Mangin, 2014; Rasmussen & Karschney, 2012). According to school district leaders, the micro-political context may inform the decision-making process (Grissom et al., 2015; Iannaccone, 1991; Marshall & Scribner, 1991), but consideration of long term consequences of decision outcomes for the organization have to be carefully weighed (Osborne-Lampkin, 2010; Taylor & Chanter, 2008). Weighing the long-term ramifications of the decision-making process and decisions is particularly true in the micro-political context of an organization in financial crisis (Boyland & Jarman, 2011; Dryden, 2013; Marshall & Scribner, 1991).

A financial crisis creates a different micro-political context than other organizational contexts because school district leaders may have to take into consideration the short term and long term fiscal health of not only the organization but oftentimes the communities as well (Chance & Cummins, 1998). When considering the context of a financial crisis, oftentimes school district leaders will apply a decision-making process that is highly bound and more satisficing (Boyland & Jarman, 2011; Pankake & Bailey, 1986). The decision-making process in this particular context becomes highly structured, focused, and tends toward a satisficing process
with higher degrees of exploitation than exploration (Boyland & Jarman, 2011; March, 1991a; Pankake & Bailey, 1986). According to school district leaders, the decision-making process becomes bound by the desire to maintain core services for students, and school district leaders use the vision and mission of the organization to guide decision-making (Chance & Cummins, 1998; Dryden, 2013; Ewbank, 2011). However, some research has found that the decision-making process may be influenced by the micro-political context that exists within the organization based on the school district leaders’ values and beliefs (Brazer & Peters, 2007; Casto & Sipple, 2011; Feld, 1981).

In examining the micro-political context of an organization, the values and beliefs of school district leaders, as part of the micro-political context, may also inform the decision-making process (Iannaccone, 1991; Langlois, 2004; Marshall & Scribner, 1991). Those individuals within the organization who share the values and beliefs of the school district leader may be included more often in the decision-making process, and generally school district leaders favor decision outcomes that align with their values and beliefs (Brazer et al., 2010; Brunner, 1998; Patterson et al., 2006). Those school district leaders who value a more inclusive decision-making process tend to create opportunities for this type of decision-making (Beard, 2012; Katz, 2004; Katz, 2012), whereas school district leaders who value structured and incremental decision-making may adopt practices for decision-making that are more consistent with these heuristics (Hoy & Tarter, 2010; Noppe et al., 2013). Additionally, those school district leaders who value positional power may subscribe to more hierarchical processes (Brunner, 1998; Noppe et al., 2013). Therefore, it appears that the values and beliefs of the school district leader are part of the micro-political context of the organization as it relates to informing the process through which decisions for an organization are reached (Langlois, 2004; Marshall & Scribner,
Since the micro-political context of an organization may inform the decision-making process, it is worthwhile to examine if macro-political context of the organization may also inform the decision-making process.

**Macro-political context.** The macro-political context situates the educational organization not just within communities served but also in the larger context of a more global society (Bacharach & Mundell, 1993). The macro-political context refers to the regulations and influences from outside of a community such as state and federal influences that may require consideration during decision-making and may therefore inform the decision-making process (Bacharach & Mundell, 1993). The macro-political context often includes consideration such as state education finance, the state economy, and even the presidential election (Bacharach & Mundell, 1993). Insomuch as the macro-political context informs the decision-making process of school district leaders, it may be to a lesser extent than the micro-political context, race, or gender (Ingle et al., 2012; Stewart et al., 2012). Where it may inform the decision-making process is in making optimizing more difficult, as the decision is bound by the context, policies and environment that exists for the organization, community members and teaching staff (Bacharach & Mundell, 1993; Touchton & Acker-Hocevar, 2011).

This section of the literature review examined how context might inform the decision-making process of school district leaders by reviewing qualitative, quantitative, mixed-method and theoretical studies. The decisions that school district leaders make do not happen within vacuum and therefore context may inform the process by which school district leaders make decisions (Coburn et al., 2009; Hallinger et al., 1996; Hallinger, 2003, 2011). The context of race, and the context of gender both appear to inform the decision-making process of school district leaders (Beard, 2012; Katz, 2004, 2008, 2012). Additionally, the micro-political context
that informs the decision-making process appears to do so at the community level (Grissom et al., 2015; Iannaccone, 1991; Marshall & Scribner, 1991), particularly in rural communities (McLlellan et al., 2010; Williams, 2013), as well as at the organizational level of an educational institution (Bacharach & Mundell, 1993; Grissom et al., 2015; Iannaccone, 1991; Marshall & Scribner, 1991; Stewart et al., 2012). Notably when considering the intersection of a financial crisis as both a micro-political context (Bacharach & Mundell, 1993; Coburn et al., 2009; Dryden, 2013) and a dilemma for resolution (Boyland & Jarman, 2011; Hoy & Tarter, 2010; Polka et al., 2014), school district leaders seem to subscribe to a satisficing process with higher degrees of exploitation and to a less collaborative, more hierarchical process to make decisions (Boyland & Jarman, 2011; Hoy & Tarter, 2010; Noppe et al., 2013; Pankake & Bailey, 1986; Polka et al., 2014). Furthermore, as part of the micro-political context of an organization, school district leaders’ values and beliefs may also inform the decision-making process (Iannaccone, 1991; Langlois, 2004; Marshall & Scribner, 1991). To a lesser extent, the macro-political context of the organization may inform the decision-making process (Bacharach & Mundell, 1993).

Summary

The purpose of this literature review was to examine the decision-making processes employed by school district leaders, through the lens of March’s (1978,1991) theoretical framework as it relates to school district leaders’ decision-making as a discrete process, how purpose may inform the decision-making process of school district leaders, and how context may inform the decision-making process of school district leaders. School district leaders’ decision-making processes are often include aspects of both an optimizing and satisficing decision-making process (Abrego & Pankake, 2011; Hoy & Tarter, 2010; Noppe et al., 2013;
Pankake & Bailey, 1986; Polka et al., 2014). Through each examination it appears that school
district leaders decision-making processes are bound by context, resources, and individual
beliefs (Boyland & Jarman, 2011; Brazer et al., 2010; Brunner, 1998; Casto & Sipple, 2011;
Chance & Cummins, 1998; Coburn et al., 2009; Dryden, 2013; Grissom et al., 2015;
Hackmann, 2012; Hallinger et al., 1996; Hoy & Tarter, 2010; Lasher, 1990; Noppe et al., 2013;
Polka et al., 2014).

When decision processes were highly collaborative, resources were ample and school
district leaders beliefs consistent with collaboration, the decision process tended toward an
optimizing process and decision more consistent with exploration than exploitation (Abrego &
Pankake, 2011; Beard, 2012; Copland, 2003; Ewbank, 2011; Fermanich, 2002; Firestone et al.,
2005; Ingle et al., 2012; Katz, 2012; Leithwood et al., 1998; Major, 2013; Mangin, 2014; Miles
et al., 2002; Noppe et al., 2013; Rasmussen & Karschney, 2012; Ringwalt et al., 2004; Taylor,
2010). However, when decision were more incremental or hierarchical, resources were
insufficient, and school district leaders beliefs are based more on positional authority, the
decision process resulted in more frequent satisficing decision-making processes decisions more
consistent with exploitation than exploration (Boyland & Jarman, 2011; Brazer & Peters, 2007;
Chance & Cummins, 1998; Fermanich, 2002; Floden et al., 1988; Grissom et al., 2015;
Hackmann, 2012; Hoy & Tarter, 2010; Little, 1989; Mangin, 2014; Noppe et al., 2013; Taylor,
2010; Williams, 2013). This was consistent through the examination of the literature through
consideration of process, purpose, and context.

Collaborative decision-making heuristics often results in school district leaders working
with groups through what resembles an optimizing process that includes setting a specific goal
for a specific decision (Beard, 2012; Copland, 2003; Ewbank, 2011; Katz, 2012; Major, 2013;
Hierarchical decisions appear to be more highly bound particularly as they relate to time, context, and financial constraints (Dryden, 2013; Hoy & Tarter, 2010; Langlois, 2004; Montz et al., 2015; Noppe et al., 2013; Pankake & Bailey, 1986; Polka et al., 2014). As it informed the decision-making processes of school district leaders as either optimizing or satisficing, purpose also depended on context, resources and school district leaders beliefs (Harris & Munley, 2002; Hoy & Tarter, 2010; Major, 2013; Montz et al., 2015; Noppe et al., 2013; Polka et al., 2014), and exploration and exploitation appears to be tied more to context, resources and district leaders tolerance for risk (Desimone et al., 2002; Fermanich, 2002; Leithwood et al., 1998; Little, 1989; Miles et al., 2002; Miles et al., 2004). Furthermore, context seems to consistently inform a satisficing process (Bacharach & Mundell, 1993; Boyland & Jarman, 2011; Grissom et al., 2015; Hackmann, 2012; Hallinger et al., 1996; Hallinger, 2011; Ingle et al., 2012; Jenkins, 2007; Williams, 2013) while exploitation and exploration remain tied to the context, resources and tolerance for risk (Abrego & Pankake, 2011; Bacharach & Mundell, 1993; Casto & Sipple, 2011; Desimone et al., 2007; Elmore, 2002; Farley-Ripple, 2012; Fermanich, 2002; Jack & Sludden, 2013; Little, 1989; Lorsbach, 2008; Meyer, 2002; Miles et al., 2002; Miles et al., 2004; Rasmussen & Karschney, 2012; Schlechty & Whitford, 1983; Spillane & Thompson, 1997; Spillane, 2000).

This literature review provided an opportunity to better understand the decision-making processes school district leaders use. The current paucity of literature that examines school district leaders’ decision-making process as it relates to professional development provides an opening to allow school district leaders the opportunity to explain how they make decisions related to professional development for research-based strategies and the extent that satisficing, optimizing, exploration, and exploitation are present in their decision-making heuristics. By
allowing school district leaders to explain their decision-making process as described we may better understand how school district leaders make decisions for professional development within their organizational context, with their available resources, and consistent with their beliefs about teaching and learning.

Chapter Summary

The purpose of this chapter was to review the literature on the decision-making processes of school district leaders. The literature reviewed was looked at through the lens of the theoretical framework as well as through decision-making as a discrete process, how the purpose of a decision-making may inform the process used by school district leaders, and how context may inform the decision-making process. The literature reviewed included over 70 research studies. The research reviewed included qualitative, quantitative, and mixed method approaches. While there was ample literature to examine the decision-making process of school district leaders generally, there was a paucity of literature that pertained to the process of decision-making used by school district leaders for the purpose of professional development.
Chapter Three: Research Design

Introduction

The purpose of this qualitative study was to explore public school district leaders’ decision-making process related to professional development for specific research-based strategies. The study sought to understand the process that school district leaders utilize when the purpose of decision-making is to train and support teachers in the use of research-based instructional strategies. Qualitative research was appropriate for the purpose of this study for several reasons: a) the study involved the exploration of a clear topic, b) the variables involved in the decision-making process of individual school district leaders were numerous and were not easily measured, and c) decision-making processes are complex and a qualitative study may lead to a more detailed understanding that may only be achieved by talking with school district leaders (Creswell, 2013).

Qualitative research should concentrate on a central question (Creswell, 2013; Maxwell, 2008). To that end, the research question developed was designed to examine the decision-making processes of school district leaders through the lens of March’s (1978, 1991) framework of organization decision-making. The central question for this research study was: How do school district leaders make decisions about professional development for research-based instructional strategies? Using March’s (1978, 1991) framework as a lens provided the opportunity to examine how constraints and context may inform the decision-making processes of school district leaders.

Research Paradigm

A paradigm is the set of assumptions by which the researcher approaches the subject to be studied, including the tools used, the participants selected, and the methodological approach
adopted (Denzin & Lincoln, 2000; Ponterotto, 2005). A constructivist-interpretivist paradigm most closely aligned with my assumptions and placement of school district leaders as the principle unit of analysis for this study. This paradigm most closely aligned with the goal of developing an understanding of how school district leaders approach, work through, and make decisions as they experience day-to-day challenges of their work (Ponterotto, 2005; Rubin & Rubin, 2012). Furthermore, this paradigm allowed me to explore a variety of decision-making processes that are used by school district leaders and uncover themes in decision-making to better understand the decision-making processes for professional development (Ponterotto, 2005; Rubin & Rubin, 2012).

Paradigms are anchored by ontological, epistemological, and axiological philosophical assumptions (Creswell, 2013; Ponterotto, 2005). Understanding these assumptions and how each may inform a constructivist-interpretivist paradigm was essential in developing a methodological approach to my study (Creswell, 2013; Ponterotto, 2005; Rubin & Rubin, 2012). Ontological assumptions reflect on the nature of reality, a constructivist-interpretivist paradigm reflects my belief that reality can be seen in multiple ways and through multiple views and allowed consideration of the varied perspectives of school district leaders as they explained their decision-making processes (Butin, 2010; Creswell, 2013; Ponterotto, 2005; Rubin & Rubin, 2012).

Epistemological assumptions refer to the assumptions made about the relationship between the researcher and participants and what counts as evidence (Creswell, 2013; Ponterotto, 2005; Rubin & Rubin, 2012). A constructivist-interpretivist paradigm aligns with my understanding that reality is constructed through social interactions with others and circumstances of a situation (Butin, 2010; Creswell, 2013; Ponterotto, 2005). Additionally, the
paradigm allowed me to report on the multiple perspectives of school district leaders as they described and reflected on their decision-making process and the constraints on or context of their decisions, as well as potential themes that emerged in their perspectives and processes (Creswell, 2013; Ponterotto, 2005; Rubin & Rubin, 2012).

Axiological assumptions examine how the role of values relate to the researcher and the research process (Creswell, 2013; Ponterotto, 2005). A constructivist-interpretivist paradigm maintains that values are part of the research process and that bias are present (Creswell, 2013; Ponterotto, 2005). The constructivist-interpretivist paradigm allowed me, as the researcher, to recognize and discuss the role of values and include them as part of the description of the decision-making process as experienced by school district leaders (Creswell, 2013; Ponterotto, 2005; Rubin & Rubin, 2012).

**Research Tradition and Rationale for Narrative Design**

Narrative research was the methodology for this study. A narrative approach provided the opportunity to study the experiences of school district leaders with decision-making processes related to professional development (Creswell, 2013) and allowed me to examine the details of school district leaders’ experiences with decision-making (Creswell, 2013; De Fina & Georgakopoulou, 2008). Narrative research is used to collect stories from individuals (Clandinin & Connelly, 2000; Creswell, 2013) and examine the context in which experiences are developed (Clandinin & Connelly, 2000; Creswell, 2013; Gergen, 2004; Riessman, 2008). A narrative research approach effectively aligned with the study because it provided a lens through which school district leaders experiences with the process of decision-making related to professional development could be viewed (Creswell, 2013; Desimone et al., 2002; Firestone et al., 2005; Riessman, 2008). School district leaders’ experiences may inform their decision-making (Casto
& Sipple, 2011; Hyle et al., 2010; Jenkins, 2007; Noppe et al., 2013), therefore it was important to understand how their experiences with decision-making for professional development may inform and frame a decision-making process relative to professional development (Carter, 1993; Creswell, 2013; Mangin, 2014; Riessman, 2008).

A narrative methodological approach provides a way in which the context of the decision can be examined through the perspectives of the school district leader (De Fina & Georgakopoulou, 2008). A narrative approach was employed to better understand individuals’ accounts of using a decision-making process situated within the context of professional development. According to March (1978a, 1991b), the decision-making process is informed by both context and constraints. Reviewing accounts of school district leaders regarding decisions made in the context of professional development led to a deeper understanding of the decision-making processes as informed by this context (Clandinin & Connelly, 2000; Creswell, 2013). Furthermore, since the decision-making process also has constraints (March, 1978a; March, 1991b), examining school district leaders’ accounts of their decision-making processes for professional development provided an understanding of how the process is informed by these constraints. Using a narrative research methodology may have provided a way for individuals to make sense of the decision-making process that they utilized related to professional development and examine it based on the constraints and context that exist both within their organization and as suggested by the theoretical framework (Clandinin & Connelly, 2000; Creswell, 2013; Gabriel, 2015; March, 1991b).

The narrative approach provided the opportunity to extract data from experiences, perceptions, and perspectives of school district leaders regarding the decision-making process. It also allowed the data to be categorized consistent with the tenets of the theoretical framework
(Polkinghorne, 1995; Riessman, 2008). School district leaders’ decision-making process is informed by purpose as well as context (Brazer & Peters, 2007; Casto & Sipple, 2011; Cohen et al., 1972; Gigerenzer & Goldstein, 1996). This is consistent with the theoretical framework, and examining school district leaders’ accounts of decision-making and how decisions were made provided an opportunity to understand how purpose, desired outcomes, constraints and context, informed the decision-making process (De Fina & Georgakopoulou, 2008; Gabriel, 2015). Additionally, a narrative approach provided a way to examine the school district leaders’ beliefs, attitudes, and behaviors relative to decision-making and the decision-making process as they related to the theoretical framework (Gabriel, 2015; Hsieh & Shannon, 2005; Riessman, 2008). School district leaders’ values and beliefs play a role in the decisions that they make (Brazer et al., 2010; Casto & Sipple, 2011; Hyle et al., 2010). Examining their account of decision-making related to professional development led to a deeper understanding of the role that exploitation and exploration have in the decision-making process of school district leaders (De Fina & Georgakopoulou, 2011; Gabriel, 2015; March, 1991a; Riessman, 2008).

A narrative approach provided an opportunity to extract themes across individuals (Polkinghorne, 1995; Riessman, 2008). Since the goal of the study was to understand the process of decision-making employed by school district leaders, a narrative approach best situated the decision-making process utilized with the outcomes as viewed by the decision makers (De Fina & Georgakopoulou, 2008). This research design best fit the proposed research study and research questions to uncover themes in decision-making related to professional development by school district leaders in New Hampshire (Polkinghorne, 1995).
Participants

A stratified purposeful sample of six school district leaders from the New Hampshire was selected based on the following criteria to ensure districts of varying socio-economic status were represented and comparisons could be made (Kuzel, 1992; Patton, 1990): a) the school district leader was responsible for making decisions related to professional development for his or her school district; b) the school district leader had instituted ongoing professional development for a specific research-based practice; c) at least one school district leader was employed by a district in which free and reduced lunch was not greater than 15 percent, at least one school district leader was employed by a district in which free and reduced lunch was between 15 percent and 35 percent, and at least one school district leader was employed by a district in which free and reduced lunch was greater than 35 percent; and d) the district setting was rural, suburban, or urban as defined by the United States Census Bureau. Participants were selected using a snowballing strategy of direct professional contacts and referrals from participants. The use of six district leaders enabled the comparison of how decisions making occurred regarding professional development and if those decisions were consistent with the theoretical framework (Boeije, 2002; Hyde, 2000; Kuzel, 1992; Patton, 1990).

Recruitment and Access

The recruitment and access of participants for the study was through a multi-staged snowballing strategy beginning with direct professional contacts. First, I determined the districts that meet the aforementioned criteria of the stratified purposeful sample by using the New Hampshire Department of Education report, *Free/Reduced School Lunch Eligibility Rate by District* to determine which school district leaders I should contact to ensure a stratified sample (Appendix A). I reached out directly by email to contact those school district leaders with whom
I have a professional relationship (Appendix B). The email included a description of the proposed study and information regarding an incentive for potential candidates. I followed up on the email up with a phone call to potential participants to answer questions and determine if they were willing to participate (Appendix C). Second, I contacted the present interim director of NHSAA, Mr. Nathan Greenberg through email. He was the superintendent with whom I completed my superintendent certification and is a close professional contact and therefore an excellent candidate with whom to use the snowballing strategy. The email to Mr. Greenberg included a description of the proposed study and information regarding an incentive for potential candidates (Appendix D). Next, I emailed those participants that Mr. Greenberg suggested, (Appendix E) and then followed up with a phone call to determine interest of participants (Appendix F). The membership of NHSAA includes superintendents, assistant superintendents, program directors, and special education directors in the State of New Hampshire and Mr. Greenberg was likely to have direct contact with a large potential sample of willing participants.

Following the above steps, I did not have an adequate sample, so I presented the study information in person and in letter format to my colleagues in the “Southwesters”. The “Southwesters” is an informal group of superintendents and assistant superintendents from the southwest part of New Hampshire that meet once monthly to network, problem-solve, share resources, and discuss educational issues related to their school districts. I mentioned my study at a meeting and asked people if they might be interested in participating, (See Appendix G). I handed out a letter that they might be able to share with their professional contacts. The letter included a description of the proposed study and information regarding an incentive for potential participants (See Appendix H). While the “Southwesters” were a smaller potential sample, there were multiple school district leaders that might have been willing and able to participate.
Once I determined the school district leaders willing to participate, I sent a thank you letter each of these individuals (See Appendix I). In the letter I described the potential commitment, specified that they can withdraw from the study at any time during the process, provided my contact information, and indicated that I would contact participants by phone to answer questions and set up the first meeting (See Appendix J). During the phone conversation, I reiterated the purpose of the study, the potential commitment of time, and the ability to withdraw from the study. If, at that time, the participant wanted to continue I set up a time, sent them a confirmation email (See Appendix K), and a copy of the informed consent document that I asked them to sign at our first interview (See Appendix L).

Gaining approval from the Institutional Review Board of Northeastern University included participating in the mandatory training on Human Subject Research Protections. The training, which was completed in November of 2013 (See Appendix M), reviewed all university, state, and federal guidelines associated with protecting human subjects during the research process. In accordance with those regulations, participation was voluntary and participants were provided with an overview of the purpose and design of the study. Through the informed consent, participants were provided with an explanation of how the data would be used and how their identities and participation would be kept confidential. Participants would be referred to using pseudonyms, as would the school districts and towns in which the participants live and work. All participants were given applicable protections outlined in the Health and Human Services regulations for protecting human subjects, as well as the relevant procedures and protections outlined by the Northeastern University Institutional Review Board.
Data Collection

There are multiple ways to approach data collection for a narrative study (Creswell, 2013). For the purposes of this study, data collection followed a phased approach because data collection may be cyclical within each phase (Creswell, 2013). There were ten phases of data collection. Phase one included identification, recruitment and informed consent of participants. Phase two included a review and pilot of the first-round interview protocol prior to phase three, which included interviewing participants. During phase four participants reviewed initial transcripts for accuracy. Phase five involved the initial inductive coding of the interviews. Memoing and “restorying” took place during phase six, as did a review of memos and “restories” by the participants. The second-round interview protocol was reviewed and piloted during phase seven and interviews occurred during phase eight. Phase nine was the final round of memoing and “restorying”, and the final participant check in. The final data analysis was designed and implemented during phase ten.

Phase one. This phase of the data collection process identified a purposeful sample of five to seven participants through the aforementioned strategy criteria. Following the identification of participants, I made initial contact through phone calls (Appendix J) and scheduled an initial meeting to obtain informed consent documentation, develop rapport, provide an overview of the study, and answer any questions that the participant had (Rubin & Rubin, 2012). Following the phone call, I sent an email (Appendix K) to verify the date and time for our initial meeting. After consent was obtained (Appendix L) and the first interview was set up with each participant, I moved to phase two.

Phase two. The development of a reliable interview protocol is necessary to yield relevant and rich data (Miles, Huberman, & Saldana, 2014; Polkinghorne, 2005; Rubin & Rubin,
During phase two, the first-round interview protocol (Appendix N) was piloted with a colleague responsible for decision-making related to professional development. Piloting the interview protocol provided an opportunity to practice delivery and refine the interview protocol structure as necessary (Miles et al., 2014; Sampson, 2004; Seidman, 2013).

**Phase three.** The next phase of data collection was the first-round interview with participants. The interviews were face-to-face, semi-structured and followed the Responsive Interview Model of Rubin and Rubin (2012) utilizing the first-round interview protocol (Appendix M). Additionally, while narrative researchers primarily gather data through interviews (Creswell, 2013; Polkinghorne, 2005; Rubin & Rubin, 2012), documents can also be used to facilitate interview protocols, as well as provide data for context rich data collection (Creswell, 2013; Miles et al., 2014; Rubin & Rubin, 2012). As part of the first-round interview protocol, I gathered documents from those participants who provided them. However, the documents did not provide information that contributed to the study. The interviews were audio recorded using a digital audio recording device, and content and observation notes were taken. Following each interview, memos were created based on the notes, which provided me with the opportunity to reflect on the interview, refine the second-round interview protocol, and reflect on initial coding (Polkinghorne, 2005; Rubin & Rubin, 2012; Saldaña, 2015). Additionally, a transcription of the audio recording was performed and memos and transcripts were sent to participants for their review.

**Phase four.** To ascertain the accuracy and validity of the transcriptions, participants were asked to review the memos and transcripts from their interviews (Creswell, 2013). During this time, I asked that the participants verify the validity of the memos and transcripts.
Phase five and six. The initial inductive coding of interviews occurred during phase five of the data collection process. Coding was done using a computer assisted qualitative data analysis software (CAQDAS), specifically MAXQDA2018. The initial coding was reviewed and phase six was comprised of two parts; a) developing analytic coding memos and b) “restorying” was performed to incorporate artifacts, notes, and observations.

Phase seven. The second-round interview protocol was developed using March’s (1978, 1991) theoretical framework. Based on the coding memos and initial inductive coding, I reviewed the second-round interview protocol (Appendix O) using the memos, coding themes, “restories”, and code mapping (Creswell, 2013; Polkinghorne, 2005; Saldaña, 2015). Additionally, initial categories were developed from the first-round coding to review and refine the second-round interview protocol and pilot the protocol. After the review and pilot were complete, I scheduled times for the second round of interviews.

Phase eight and nine. These phases included the second round of interviews. Again, the interviews were audio recorded using a digital audio recording device, and content and observation notes were taken. Following the interviews, phase nine began, during which memos were created based on the notes and transcription of the audio recording. Within one week of the interview, memos, transcripts, and additional “restories” were digitally sent to participants to validate accuracy.

Phase 10. Final analysis of the data occurred during phase 10. All memos, restories, transcripts, and code maps were reviewed again and second round coding and memoing was completed. During this phase categories were identified and themes were determined based on those categories. (Creswell, 2013; Miles et al., 2014; Saldaña, 2015).
Data Analysis

Analysis of the data began with the first cycle coding of the interviews using descriptive coding and MAXQDA2018, which enabled the interviews to be categorized into topics (Saldaña, 2015). Following the first cycle of coding, the use of a Constant Comparative Method (CCM) was employed within each interview and initial categories were developed (Boeije, 2002; Saldaña, 2015). Memos were reviewed to reflect on initial coding and potentially recode in a more accurate way (Polkinghorne, 2005; Rubin & Rubin, 2012; Saldaña, 2015).

Following the first cycle of analysis, code maps were established to organize and condense the data (Miles et al., 2014; Saldaña, 2015). Second cycle coding employed Focused Coding to develop categories (Miles et al., 2014; Saldaña, 2015). This was followed by an analysis of categories using CCM across interviews, which allowed for some inductive analysis that was necessary for the research process to compare data (Boeije, 2002) and determine if there were relationships between and among the categories (Boeije, 2002; Miles et al., 2014; Saldaña, 2015).

The second-round interview transcripts were coded using deductive coding aligned with March’s (1978, 1991) theoretical framework (Fereday & Muir-Cochrane, 2006; Hyde, 2000; Joffe & Yardley, 2004). Provisional coding was employed during the first cycle and analytical memos were used to reflect on the first cycle of coding. Following this, CCM was applied to develop categories across interviews to determine themes (Boeije, 2002; Creswell, 2013; Miles et al., 2014; Rubin & Rubin, 2012). The final round of analysis resulted in interpreting the themes as they applied to the research question and representing the data in a condensed format (Creswell, 2013; Miles et al., 2014). Additionally, document analysis was attempted; however,
the documents were not what was anticipated and they were insufficient for analysis related to this study.

**Data Storage**

Data collected during the study included; documents and artifacts reviewed, transcripts, audio recordings, field notes, memos, restories, and notes on data analysis, were kept in a locked file safe throughout the study and were only available to the doctoral student researcher. Electronic files were stored in an encrypted, password-protected form on a computer accessible only by the doctoral student researcher. Physical and electronic media were backed-up on password protected cloud-based storage system to assure that it is protected from unforeseen circumstances. During the study, the principal investigator and the doctoral student researcher were the only people to have access to physical and electronic media related to the study. At the conclusion of the study all documents reviewed were destroyed or returned to the participants. Following the study, audio-recordings were either given to the study participants or destroyed in the presence of the participants.

**Trustworthiness**

Narrative study depends on participants telling their stories. However, this can make it difficult to determine if the participants’ stories are completely accurate. Bias was reflected by using the concept of bracketing and the triangulation of data (Creswell, 2013). The latter involved participants’ review of interview transcripts and the validation of data, which increased the internal validity of the study. Threats to internal validity and limitations of the study included the limited number of participants, the limited time period of the study, the subjectivity of respondents to interview questions, the researcher’s interpretation of the data. Moreover, predetermination of codes during the initial coding may have prevented other emergent ideas,
and inclusion of researcher bias as the researcher was a district leader responsible for professional development.

Chapter Summary

This chapter outlined the rationale for the qualitative study that explored the decision-making processes of school district leaders related to professional development. The reasons for the study’s inclusion of a constructivist-interpretivist paradigm were explained, as was the rationale for the use of a narrative methodology. The selection strategy for participants was also addressed in terms of how the participants would be recruited for the study. The chapter also provided a detailed outline of the data collection and analysis data strategies that were employed.
Chapter Four: Findings

Introduction

This narrative study was guided the central question: How do school district leaders make decisions about professional development for research-based instructional strategies? The six participants, each referred to by a pseudonym, are all employed by a school district (also referred to with a pseudonym) in New Hampshire. Each participants has a role in the central office of a New Hampshire school district and each makes decisions related to professional development for her or his respective school district. Each participant also has individual experiences and therefore beginning with a review of each participant’s background is worthwhile. Following the review of the participants’ background, the research findings are organized to review the beliefs of the participants, the purpose of their decision-making, the antecedents of their decision-making, and the context of their decision-making. While each participant has a unique experience and therefore a unique story related to decision-making, the interviews revealed some consistencies in decision-making approaches across the participants. The findings presented in this chapter outline the existence of multiple overlaps of beliefs, purposes, processes, and contexts in the narratives of the participants.

Grace

Background. Grace Mathers is the Superintendent of the Three Streams School District (TSD), a rural school district that serves just over 1,350 students with a free and reduced population of almost 47%. Based on the free and reduced population the TSD is in the poorest third of all school district in the state. Grace is a veteran superintendent who has been in the TSD for seven years. She came to the TSD following significant turnover of the central office administration, she was the third superintendent in two years. Grace has been working with the
TSD specifically on professional development for the implementation of competency-based educational strategies. Prior to coming to work for the TSD Grace’s background was primarily in the area of special education. Grace has experience as a special education teacher, a special education coordinator, and just prior to her work as the Superintendent of the TSD she worked for a public agency as a special education consultant. In total Grace has 30 years of professional experience in public schools. While professional development decision-making is now a constant part of her district leadership role, prior to this position, Grace’s role in professional development decision-making was generally ancillary and was often made in conjunction to specific special education initiatives. Grace’s narrative provides a detailed review of her beliefs and experiences with decision-making for professional development in the TSD. Table 1, Overview of Grace’s Narrative, provides a preliminary overview of Grace’s narrative.

Table 1

Overview of Grace’s Narrative

<table>
<thead>
<tr>
<th>Beliefs</th>
<th>Purpose(s) of Professional Development</th>
<th>Antecedent Decisions</th>
<th>Contextual Considerations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Decision-making should lead to continuous improvement</td>
<td>Move the vision of TSD forward</td>
<td>Reviewed student data</td>
<td>Varied demographics</td>
</tr>
<tr>
<td>Professional development should move the vision forward</td>
<td>Improve teacher practice and build on past practice</td>
<td>Reviewed staff needs assessments</td>
<td>Grant dependent</td>
</tr>
<tr>
<td>Cautious application of research</td>
<td>Increase student learning</td>
<td>Consulted outside experts, Historical poor performance</td>
<td></td>
</tr>
</tbody>
</table>

Beliefs. Grace shared her beliefs about decision-making, professional development and research. As she discussed her beliefs, she indicated that they were a result of her experiences
during the course of her own education and her many years as a professional public-school educator.

**Decision-making: Continuous improvement through systems.** During her interviews, Grace described her belief that decision-making should align to a vision of continuous improvement and moving the work of public education forward. Grace explained, “[Decision-making] is a matter of progression of wanting to always improve and also seeing that vision.” Grace also emphasized the importance of making decisions related to the vision by explaining that a vision provides direction for the district, the community, and the staff. Grace also believed that using the vision to inform decision-making is an iterative process rather than a linear one. Grace believed that “you go back and you figure out what really does work, and how you need to refine it to really get where you want to go, and if you don’t have that vision, you’re not going to get anywhere.” While Grace supported the idea that the vision should inform decision-making, she also believed that the process of decision-making should be inclusive.

Grace also described a clear system of working with her team to make decisions. According to Grace, it is important to include others in the decision-making process, not necessarily to make the decision, but to understand the decisions that are made. Grace believed that decision-making, as a collaborative, consensus-building process, that is “really important because we need to have support among our team, with our administrators, as well as with the school board.” Grace explained that the process is designed to obtain the most input from those impacted by the decision, as part of the process, so that productive conversations can occur. Grace believed that she is responsible for the outcome of the decision and therefore retains final decision-making as the superintendent; she believed that her team of administrators know and understand this. As she pointed out, “This is our process, and they’re fine with it. Maybe we
need to redefine what we want to do for the decision, but that's why we do it this way, because ultimately, I'm responsible.” Grace firmly believed that while her decisions should be inclusive, since she is responsible for the decision-making, she is the final arbiter of decisions for her district. Thus, she considers the promotion and movement toward the vision as highly important.

**Professional development: Promoting the vision and mission.** Grace defined professional development as a process of continuous learning and application to practice. Grace explained, “I think professional development [is] constant growth, constant learning. Looking at what we do and how we could use those skills to really impact the instruction in our classrooms.” Grace went on to explain her belief that professional development is paramount for promoting the mission and vision of the TSD. Grace described professional development as “the cornerstone of moving a district forward, it is so important for the continuation of the mission and working toward the vision.” Grace lamented that she felt that professional development in the TSD was not quite what she believed it needed to be to achieve the mission and vision of the TSD. Grace described professional development early in her TSD superintendency as follows, “what we originally did for PD when I first came was, at best, what I call a potluck, we had a little of this, a little of that, what people felt like, no follow up and no follow through.” Grace described professional development when she first arrived at the TSD as piecemeal, indicating that a comprehensive direction had not been established and therefore schools did various types of professional development on a variety of topics. Grace believed that during her first two years, professional development continued to be an area that needed further work. As Grace explained, “We were getting there, don’t get me wrong. We made a lot of changes during this time, and really improved the structural strategies that we use in the classroom, but it wasn't comprehensive enough.”
For the TSD, Grace believed that professional development continues to be a district-wide area of growth. Grace surmised, “Well, I think we're so focused on the end results, we don't really go back and reflect on our professional development decisions. It's more or less this self-reflection.” Grace believed that while professional development is important to move the mission and vision of the TSD forward, the District had not yet taken the necessary steps to focus professional development toward that outcome. To that end Grace spoke of how research may or may not be used to inform decision-making.

**Research: Cautious application.** According to Grace, research provides the foundation for instructional strategies and the application of those strategies to the classroom. She pointed out that “the groundwork is an understanding; it's a research base. Is it something that would benefit the students, and if so, how?” Grace believed that it is her responsibility to be familiar with the research to determine applicability to the TSD. Grace explained, “I always like to go back and read what the research tells me. It's tried and proven, then maybe you need to look at it a second time, and figure out how it can really work in your district.” Grace was also cautious about the use of research. She felt that while it is important to know and understand the research on instructional strategies for which the TSD planned to offer professional development, it is also important to determine if those instructional strategies are appropriate for students and teachers in the TSD. Grace explained, “Just because a program is research based, doesn’t mean it will be able to be implemented in our district, it might not be what’s best for our students or it might not be a good fit for our teachers.”

In addition, Grace emphasized the importance of teachers having the skills to implement instructional strategies at the proper time, with the appropriate students, and in a reliable way. Grace believed that if the proper implementation does not occur, then results do not necessarily
follow. Grace pointed out, “Something may be research based, and get great results, but, if it's not implemented with fidelity you don't get what you need for students.” Grace summarized her thoughts on research by explaining that research is a great place to start, but the application of that research to instructional strategies needs support from the professionals that are responsible for implementation in the classroom. Grace explained, “research gives us the groundwork to build from, but unless everybody's supporting it, it's not going to happen.” Grace believed that being familiar with research was an important responsibility as she makes decisions about professional development for research-based strategies, but that the support and abilities of teachers for the research and instructional strategies was of equal importance.

**Purpose.** Grace shared the myriad of purposes that she hoped to achieve in providing professional development, specifically professional development for competency-based instructional strategies. Grace spent time explaining the decisions that she made related to purpose and why she made those decisions.

**Vision driven.** Working toward the mission and vision was of paramount importance to Grace. She emphasized that professional development and the instructional strategies should move the TSD toward the mission and vision. According to Grace, “The vision of the graduate is the center of everything we want to do here, curriculum, instruction, competencies, grading and reporting, personalized learning, professional development. Everything works to that end.” According to Grace, competency-based instructional strategies aligned with the vision and mission of the graduate. Grace explained, “Competency-based instruction is the key to our vision; moving our students toward specific competencies and being able to say a graduate of the TSD knows and is able to do this, with mastery.” Annually, Grace and her administrative team examined professional development for competency-based instruction to be sure that it continued
to be one of the foundational skills moving the teachers, students, and the TSD toward the vision. For Grace the professional development that she selected had to move the district purposefully toward the vision of the graduate, and the goals and outcomes of professional development would align with the vision.

*A step toward goals and outcomes.* Grace explained that goals in the TSD are often set for individual schools. When it came to the purpose of achieving goals, professional development for competency-based instructional strategies was necessary to meet specific building-based goals. Grace described the goal setting at individual schools,

Each building set goals that they wanted to achieve, but instituting competency-based strategies had to be part of their goals, so schools might have a specific goal that reads like, 80% of staff will institute competency-based strategies and another building might have a goal that 50% of students will demonstrate mastery of skill X, but either way competency-based strategies were part of the picture.

Grace expanded on this by explaining that often, professional development is often named as part of the steps to achieve the long-term goal. Grace felt that by having professional development as part of incremental progress toward a goal, staff members are more confident about the work. Grace stated, “When we have target goals, as long as we hit target goals that are reasonable and people hear, they see, there's faith and there's trust, and then there's willingness for teachers to build on this.” Additionally, professional development provided an ongoing dialogue about competency-based instructional strategies, and according to Grace provided the district with the means to develop a common language and common views across the district.

Grace also emphasized the importance of professional development to achieve the longer-term outcome of competency-based instructional strategies. Grace explained that in order
to do this, professional development for competency-based educational strategies has to be part of the considerations for all new staff as well as returning staff. Grace conveyed the importance of ongoing professional development to provide new staff with clear direction and returning staff with a refresher of what was expected. Grace wanted to be sure that all staff understood the desired outcome and felt that professional development was one way to achieve that. Additionally, Grace wanted to be sure that teacher turnover did not result in a loss of momentum toward the desired outcome and goals and the professional development provided sustainability of competency-based instructional strategies. She explained that the reason she emphasized professional development for competency-based professional development was to provide a way that competency-based professional development was imbedded in the strategies, discussions, and focused on the educational mission. Grace explained that providing professional development gave the staff an opportunity to participate in working toward the goals and outcomes, and she speculated that it provided the staff with a common long-term goal that they all could participate in working toward as they built on past practice.

**Building on past practice.** Grace shared that while professional development is an effective way to institute new practices, she felt that the decision to provide professional development for competency-based instructional strategies was primarily to build on past practice and improve teaching practices. Grace commented “You [have to] build on the foundation you have. You can't introduce new items that don’t have any relationship or you’ll lose the trust and the forward motion. Build from the foundation or everything’s [going to] crumble.” According to Grace, improving practice requires professional development, patience, and a plan. Grace explained, “The fact that we had a professional plan that we developed, and a timeline for what our next steps were, we went gingerly, not pushing everybody, but [were]clear
that there were expectations at the end of the year.” Grace also shared the importance of the TSD moving forward together to improve practice, she felt this would increase the likelihood that the competency-based strategies would be institutionalized. She recollected that she wanted to be sure that the professional development provided strategies that could be implemented in the classroom and would be adopted by teachers as part of regular practice. Grace recalled, “I was looking for sustainability and a willingness for teachers to build on the practices they had.” She shared that she wanted to build from where teachers were comfortable, and enhance the good work that was already happening in the classroom in order to more deeply benefit students.

**Benefits for students.** Grace shared that the decision to provide professional development for competency-based instructional strategies was not solely to improve individual teacher practice or to move toward particular goals or the mission and vision. It was also designed to provide a framework for school improvement to help students. According to Grace, “I wasn’t looking to just make accomplishments. We were looking at what we were doing every day for the students and how we could make it more beneficial.” She explained she knew that providing professional development was going to be an ongoing challenge and that there was a chance that the professional development alone would not meet the purpose. Grace explained “I was very anxious for people to go and learn so I was sending some high school people and some middle school people and some elementary too, but it wasn’t enough. We hadn’t really developed to the next level.” Grace decided that professional development had to be imbedded as well as presented and she had staff begin to provide professional development to one another. This decision, Grace recalled, created the momentum for the staff to understand competency-based instructional strategies and the benefits these strategies would offer students. She stated that once teachers began watching one another they saw the connections between instructional
practices, assessments, higher-level thinking skills and how the new strategies would benefit students. According to Grace, one teachers saw these connections, they understood how moving toward competency-based instructional strategies would benefit all students in the TSD.

In addition, Grace explained that she had to decide to provide multiple tiers of training in order to move the purpose of professional development from the improvement of practice to whole school improvement. Grace recounted, “It was also important for us to communicate to let the whole attendance area [know], [and for] all the teachers [to] realize where we're at and where we expected them to be.” According to Grace, this helped focus professional development on the individual schools and on individual teachers. Grace distinctly recollected being able to explain what was going to happen for professional development building by building, what strategies teachers had mastered, what strategies teachers needed to refine, and what strategies needed to be introduced. She explained that as a result of deciding the professional development plan for each year and for each building, the professional development in competency-based instructional strategies worked to benefit students in the TSD by providing a framework for school improvement.

**Antecedents to deciding professional development.** Grace shared that there were multiple decisions and steps prior to providing professional development in her school district. She took the time to address professional development in general, as well as professional development for competency-based instructional strategies. Among these decisions were determining the need, providing an opportunity for input, examining research, and deciding how to implement the professional development.

**Determine needs by examining data.** Grace shared that examining various types of data was a major consideration in the TSD when determining the direction of professional
dev

development. Grace shared, “We look at the data, district-wide data, we use a lot of the [curriculum] maps data, [and] test scores data. We work to determine what our data [are] telling us.” Grace also mentioned that when determining professional development needs, the administrators spend time garnering staff input. Grace described the process as “prioritizing everything that teachers say meets their needs, because we really do want to hear from the teachers. Just because it's something that we think is really important, if they're not at that level it could backfire.” Additionally, Grace shared that part of the process of determining professional development needs involved conducting a needs assessment, reviewing that information, sharing that data and information with staff, and assisting staff in reflecting on the data. Grace offered this explanation,

I rely on the needs assessment and assessment of the data across the district. Looking at individual grade level scores, that tells a lot, especially when you see a trend, and we constantly go back. We look at comments and we also spend a lot of time meeting with staff and reflecting.

Grace also shared that following the examination of data with staff and examining the needs assessment, conversations took place at multiple levels to determine what staff believed were their needs for professional development. Grace articulated that determining professional development needs was a collaborative process that includes examining data, determining needs, and reflecting with staff members.

Grace described the process for determining the needs for professional development in competency-based instructional strategies in a similar way. As she recounted, “We looked at our testing data, we looked at our data in math, we looked at our data in ELA, we interviewed students, [and] we interviewed teachers, and from there I started to develop my plan of
reorganization and instructional change.” After examining the data, Grace also brought in an outside organization to assist with the needs assessment. Grace recalled, “With the League of Innovative Schools we did the needs assessment. They helped us look at teaching and learning, at equity, assessments, academics programs, relevancy practices, [and] at culture.” Grace remembered the large amount of data that resulted from that partnership, and recounted that it was that data that helped determine the direction professional development would take. Grace recollected,

I got student and staff reports, I got staff surveys, [and] I got student surveys, we took all the data, we wrote it down, we brought it back, we reflected on it, we interviewed students, and then we targeted where the PD needed to go, what we really needed to focus PD on.

Grace explained that it was data from student achievement and the needs assessment that helped teachers and administrators reflect and determine that professional development in competency-based instructional strategies was needed. She indicated that the data was important, but the process of reflecting with the teachers was what assisted in the decision-making the most.

**Community and teachers consulted.** Grace shared who was involved in the decision process after the need for professional development was determined. She explained that while the TSD recognized that professional development was needed for competency-based instructional strategies, the change to the classroom environment could be significant enough that she decided that she needed to include the community before additional steps were taken. As she recalled, “I did community forums, I went to every single school, and I really talked about what it really meant, how we got there. And I did a futuristic exercise with them. What would school look like in five years?” Additionally, Grace recounted that she worked with a
standing group of teachers to begin to move from what the professional development needs were to what the teachers would need for support. Following the meetings with teachers, Grace recounted that she worked with administrators to develop the next steps; Grace shared “From there, we developed our plan, our meetings, and our groups. I needed to keep all the principals together to understand where we were going.” Grace explained that teams were formed that would begin the tasks of research and planning for competency-based instructional strategies.

**Research from outside experts.** Grace recalled bringing in outside experts from the International Center for Leadership and Education to provide the research base for professional development in competency-based instructional strategies. She consulted with the group to come to the TSD and actually share the research base with the teachers in person. Grace recollected, “They came in and helped us understand the research and helped us put together our plan.” She added, “This group that came in wanted us to just focus on ELA, and I said no, because that’s not really what we needed to do. We needed to change the instructional strategies across the board.” Grace remembered that the group felt that providing professional development to all areas would be difficult, but she wanted to work on all instructional areas. Grace shared that the group helped them put together the plan for professional development, Grace recounted, “we used the Global Best Practice, and it is research-based, and there [are] three major areas. It was the teaching strategies, it was looking at organization, and it was also, I believe, looking at culture.” Grace explained that to understand the research on competency-based instructional strategies she had the TSD work with an outside agency to be sure that the decisions made regarding professional development would be appropriate for the district staff.

**Ongoing professional development.** Grace shared that once the decision was made that the TSD would be providing professional development in competency-based strategies, decisions
needed to be made about what the best strategies for professional development implementation would be. She recollected past professional development implementations and explained that she did not want those to be the model for implementation. She shared “I think at one time, we taught or we gave PD for the program, the skill, the initiative, like DOK, in pieces, and teachers never really got all the pieces together. We knew that couldn’t happen.”

Grace explained that she worked with the administrative staff for the TSD to plan professional development for competency-based strategies. She recalled, “We did some professional development with our administrators. We brought in our specialist in competency-based instructional strategies and we started to build the foundation.” Following the professional development with administrators, she and the administrators were able to discuss and decide what professional development would consist of for staff to ensure that the proper supports were in place for teachers to manage the large shift in instructional practice. Grace explained that the administrators and she planned a multi-year rollout of the professional development with embedded classroom support from coaches, and monthly follow-up sessions at faculty meetings. Grace recounted, “We were excited, we brought them [consultant] in to do the initial whole group training, following that we selected specific staff to be in-house coaches and they would run the monthly follow-up.” Grace shared that her description sounded simple, but that it was somewhat more complex: “You know it wasn’t just one session where we came up with the plan. It took about a month to put it together and then share it, get feedback, and revise.” As she pointed out, “I knew these were great ideas, but how does that turn into a movement for change? It’s more than a piece of paper: it’s follow-up and follow through. We aren’t there yet, but we make progress every day.”
**Contextual considerations.** Grace shared the considerations that informed her decision-making for professional development. Specifically, she discussed how the demographic makeup of the TSD, the resources that she has available to provide professional development, and the context of her community and organization all influence her decision-making related to professional development both in general and for competency-based instructional strategies.

**Differing demographics.** Grace shared that while demographics did not play a role in the decision to provide professional development for competency-based instructional strategies, demographics at times do play a role in professional development decision-making. Grace shared,

I think our needs in the district vary because we have one town that's pretty wealthy, and we have another town where I have one school that's 90% free and reduced lunch. I have others that are 50%, and 40%, and 60%, so consequently, some of the needs are different across the district.

Additionally, Grace stated that she has to be responsive to the different professional development needs related to the differing demographics across the TSD. She surmised, “There might be a need for one school to talk about and promote family engagement, and in another school I'm training about dealing with trauma and mental illness.” Grace implied that demographics provide information on decisions made about professional development. She speculated that the specific needs of students as well as the needs of particular demographics of students often drive decisions for different types of professional development. Additionally, Grace indicated that the socio-economic status of the community made resources for professional development an influential consideration.
**Grant dependent.** Grace communicated clearly that the TSD is highly dependent on grants. Grant funding, or lack thereof, is often a consideration in the decision-making related to professional development. Grace shared, “There is zero PD money in the annual budget. Thank god for grants.” Grace shared that she depends on grant dollars to be able to accomplish professional development. Grace articulated, “Everything that I have been able to do, I do off the grants. It's amazing if you can manage your grants well, you can make that dollar go very [far]. I also look for competitive grants.” Grace continued by sharing that recently the administrative team had recently participated in an exercise to prioritize professional development to be able to balance fiscal resources and time for professional development. Grace recalled,

> We had a problem where I had a lot of professional development going, and people didn't see the underlying commonality, [so] we had to make some hard decisions because we don’t have enough time or money for PD. We wrote down all the professional development initiatives, there [were] quite a lot. And we put them in the priority areas and narrowed it down.

Grace continued by sharing that while the administrators were able to narrow down the professional development so that fiscally the TSD would be able to manage, time continued to be an issue. Grace shared, “We don't have enough [time] for PD. We are finding that we can't build enough time. A lot of teachers are just over taxed; they can’t give any more time.” Grace contemplated that there are times that the resources of time and money are prominent considerations in the decision-making and prioritization of professional development opportunities in the TSD and they need to be balanced with the concept of the district as having poor performance.
**Historical poor performance.** Grace shared that the history of the TSD and the communities that it serves have been taken into consideration as part of the decision-making for professional development in general, as well as related to decision-making for professional development for competency-based instructional strategies. Grace explained the history that contributed to the decision-making, “When I came, I had six primary schools that were the lowest-performing; they were the bottom of the five percent in the state.” Additionally, Grace shared, “This district had been so many years with a superintendent every other year, and then had a part-time superintendent for a number of years. There was really no comprehensive plan to move the district forward.”

Grace recalled that when she first arrived in the TSD, the high school was reluctant to make any changes, and the community was frustrated about how the schools were performing. She recounted, “The community was angry about achievement, and the high school was hostile and defensive.” Grace shared she felt that in some ways the history made decisions for professional development easier for her to make. Grace recounted, “The community, the district, we all knew that we needed to make change.” She explained that she had to make decisions about professional development for competency-based instructional strategies to meet the demands of the community. Grace recalled, “The community expected that we would be moving to certain types of programming, and they wanted change, and they were telling that to our teachers and to our administrators.” According to Grace, the community pressure was what made the decisions for professional development in competency-based instructional strategies easier for staff to accept. Grace recounted, “That's how it really was initially accepted by everybody, because that was the first district-wide movement that the district had in a number of years.” Grace shared that the historical performance issues and pressure from the community to
increase student achievement created the leverage with the staff that Grace needed to make
decisions related to professional development for competency-based instructional strategies in
the TSD.

**Summary of Grace.** Grace discussed her beliefs that decision-making should provide
the opportunity to continuously improve districts and that it should be done in conjunction with
others. Grace shared her belief that professional development should promote the vision and
mission of the school district. Additionally, she explained that research should be applied
cautiously, indicating that while research is important and provides a foundation for practice it is
the implementation of strategies that should be the focus of professional development. Grace
indicated that in addition to moving the vision of the district forward, she made decisions related
to professional development for competency-based instructional strategies based on how well the
strategies would move the district toward goals and outcomes, how the strategies would provide
the opportunity to build on past practice, as well as how the strategies would benefit students.
Grace shared that she made multiple decisions prior to the implementation of professional
development for competency-based strategies as well as other types of professional development.
She indicated that to decide the area in which professional development was needed she
examined data from students as well as information from stakeholders and research from outside
experts. Additionally, Grace explained the importance of a multi-year roll out of professional
development for competency-based instructional strategies in her district, as well as developing
sustainability through opportunities for new and returning staff members. She indicated that at
times demographics play a role in professional development decision-making and that access to
grants is a major consideration in her decision-making. Grace also shared that for her district the
community and the historically poor performance of the district were major contributors to decisions regarding professional development in competency-based instructional strategies.

**Spencer**

**Background.** Spencer Davis is the Superintendent of the Millpond School District (MSD), a rural school district that serves approximately 400 students with a free and reduced population of 15%. Based on the free and reduced population the MSD is in the wealthiest third of all school districts in the state. Spencer has been with the MSD for six years. The MSD recently provided professional development for the use of new reading instructional strategies. Spencer came to the MSD following a long-term superintendent who helped found the District. Prior to working for the MSD, Spencer had been a physical education teacher, a high school assistant principal, a high school principal, and an assistant superintendent. Spencer brings 28 years of public-school experience to his district leadership role. Professional development decision-making has consistently been a part of the responsibilities related to the positions that Spencer has held. Spencer’s narrative provides a detailed review of his beliefs and experiences with decision-making for professional development in the MSD. Table 2, Overview of Spencer’s Narrative, provides a preliminary overview of Spencer’s narrative.

Table 2

*Overview of Spencer’s Narrative*

<table>
<thead>
<tr>
<th>Beliefs</th>
<th>Purpose (s) of Professional Development</th>
<th>Antecedent Decisions</th>
<th>Contextual Considerations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Decision-making should be data driven and collaborative</td>
<td>Move the strategic plan of the MSD forward</td>
<td>Determined needs for professional development</td>
<td>Small size of district</td>
</tr>
<tr>
<td>Professional development should move the district</td>
<td>Enrich present practice of teachers</td>
<td>Developed committee to review data and research</td>
<td>Community has high expectations</td>
</tr>
</tbody>
</table>
Beliefs. Spencer shared his beliefs about decision-making, professional development, and research. As he discussed his beliefs, Spencer shared that his beliefs were centered on the concepts of trust, professional respect, and collaboration.

Using data to provide opportunities for collaborative decisions. During his interviews Spencer illustrated that his beliefs regarding decision-making revolve around trust, data, and knowing when to step into the decision-making process. He believed that he should allow staff to share in decisions; he explained that while he wants to be informed, he does not want to own all decisions. According to Spencer “I have information about decisions, and I always feel like I'm very informed about their decisions, but I'm not directly controlling of them and I don't want to be.” Spencer continued by explaining, “I want my building principals and I want my teachers to make those decisions.” Spencer believed that part of his role in decision-making is directly related to having trust in employees to make the decision. He added, “I have to trust people that I work with, I trust everyone to be professional and I give them the latitude to make decisions, because I think that's my responsibility.”

Spencer also believed that decisions need to be driven by data. He believed that if data is not being used to drive decisions, it is his responsibility to step into the decision-making. Spencer illustrated this belief when he recounted a specific decision-making situation:

Our reading scores were so horrendous, and the reading folks had been looking at it and looking at it, and they just continue to just do the same thing. I had to finally step in
and go, time out, we stink at reading. We keep doing the same thing over and over again. We need to rethink what we're doing and how we're doing it.

Spencer explained that following his intervention, the reading teacher presented alternatives to him and he allocated resources. Once the decision-making is on track, Spencer believed that his role became more about approval and resource allocation.

Spencer also believed that decisions are usually made in the best interest of students. As he explained, “Typically we do something with good intentions. Maybe the outcome isn't what we expected, but it's never with the intent to do anything that isn’t good for students.” He went on to explain that he believed that in general the decisions that are made are not usually detrimental to students. Spencer described his belief by saying “at the end of the day, to me, and I've said this before, even if we make bad decisions, they're not awful we don't make a lot of bad decisions that hurt kids.” Spencer’s beliefs about decision-making are based on the concepts of professional respect, the presumption that data will inform all decisions, and the implicit concept that all decisions are made in the best interest of students; this includes decisions made for professional development.

**Professional development should be of value for the individual and district.** Spencer defined professional development as the process of “going out and digging deeper into either something that inspires you or that is based upon what it is you do, you need to learn a different way, or something new, or more about [something].” Spencer shared that he believed that professional development needs to be specifically applicable to the person that is participating in it for it to be of value to both the participant and the District. Spencer explained that professional development needs to be about what is valuable to teachers:
I can say [as a district leader], here [are] 10 great differentiated instruction workshops you should attend and you [as a teacher] may [say], well I don't need differentiated instruction, I’m great at that. If [teachers] don't find [selected professional development] as a value…, I'm wasting district money and time sending you to these things.

Spencer believed that in order for professional development to be worthwhile district leaders are responsible to ensure that it has value for the individual as well as the district. Spencer also believed that professional development needs to be of high quality to be of value. Spencer speculated, “It's not always you put in what you get out, you could put a lot in and get nothing of value.” Spencer believes that if professional development is not valuable, participants have an obligation to inform him, he explained, “If you go to something and it was god awful, come back and tell me, ‘you know that long 101 thing I went to? Don't send anyone. It’s not worth anybody's effort to go; it's not good professional development.’” Spencer believes that the value of professional development to the district is connected to the value it has to the individual, a belief he applies to professional development within the district.

Spencer believed that professional development in the MSD, since he has become the superintendent, has been driven by the curriculum and instructional review process. Spencer depends on the review process within his district to aid in decision-making about professional development. Spencer speculated that the review process is the part that brings value for both the individual and the MSD because the process begins by reviewing curriculum and instruction, provides an opportunity for staff to recommend changes, and then the recommendations inform the decision for professional development. Spencer feels that the MSD has done a good job of providing professional development opportunities that are of value for the individual and still
move the MSD forward. Additionally, Spencer indicated that he believes research also needs to be part of the process.

**Using research is important, but difficult.** Spencer began the conversation about research and its applicability to professional development for research-based instructional strategies, by discussing the responsibility that superintendents have to assure the use of research for good teaching. Spencer explained, “I think at this point, if we don't look at research for teaching, we're missing a huge piece of how to continue to hone the craft, and that is the key to getting good results with students.” Spencer also discussed the difficulty of communicating research to teachers and believed that the more veteran the teachers, the greater that difficulty was. He illustrated this belief by providing the following example:

> It's tough for me to get people to buy-in [to research] sometimes. It's hard, because they think they know a lot about how to teach. Most of them are good teachers, and many have been teaching for over 15 years, but I still think there's always stuff out there that we can revisit and relearn. Especially for some of my older teachers.

Spencer lamented that while he believed firmly in the importance of the use of research-based instruction, he often found it difficult to have the teachers of MSD be willing to participate in professional development for new strategies or strategies that they believed they had already mastered even if the strategies are considered research-based.

**Purpose.** Spencer indicated that there was a variety of purposes that drove his decision about reading instructional strategies in the MSD. Spencer spent time explaining the decisions he made related to the purposes for the professional development for reading instructional strategies.
Strategic plan driven. Spencer explained that the purpose of professional development for research-based reading strategies was to implement specific facets of the MSD’s strategic plan. Spencer explained, “Professional development at this point is being driven by the strategic plan. Our first strategic plan goal is to offer enriching and enthusiastic curriculum and to continue to enrich our curriculum.” Spencer explained that there are five goals in the strategic plan for the MSD and the decision to provide professional development for research-based reading instructional strategies was related directly to those goals. Spencer reasoned, “Our strategic plan is much more tangible and viable to our present-day goals and aspirations that we're trying to get our kids to achieve. The strategies fit; the professional development would help accomplish it.” Spencer felt that the strategic plan was developed, in part, to make sure students were getting what they needed academically; professional development for the implementation of research-based reading strategies was a way in which to move that forward.

Improving student achievement. Spencer clearly articulated that a primary function of professional development in the MSD was to work toward the long-term outcome of increasing student learning and student achievement. Additionally, he implied that all professional development should be to that end when he asked rhetorically, “Well, anything that you do to improve student achievement is the goal, right?” Additionally, Spencer postulated that “if you're going to take on professional development, it better be professional development that is with the idea of driving student achievement.”

Spencer explained that the professional development related to reading instructional strategies provided teachers a way to closely examine the needs of students. The professional development provided ways in which teachers could further differentiate instruction for students and Spencer felt that this was one way in which to help students achieve to higher levels.
According to Spencer, the professional development provided a way of “continuing to look at how we continue to differentiate and reach kids where they are and bring them where they need to be.” Spencer also explained that the professional development is part of the larger desired outcome of increasing reading achievement. Spencer felt that the professional development for reading instructional strategies had in fact begun to serve the purpose of increasing student achievement. Spencer provided evidence for this by explaining that the implementation of the professional development went well, and as the strategies were applied to teachers’ classrooms, others saw the success of the students, causing more teachers to take advantage of the professional development opportunities. Spencer speculated that the professional development for reading instructional strategies was designed and implemented to increase student achievement, and he felt positively that it had served this purpose and had improved teacher practices.

**Enriching present practice.** Spencer recollected that improvement of practice was paramount in the decision to introduce research-based instructional practices in reading. Spencer explained, “While the practices were new, we were really building upon strategies and kind of digging down into those strategies to improve them.” Spencer went on to explain that the professional development was not about going in a new direction, adopting a whole set of new strategies or changing current practice. Spencer went on to explain that the purpose of the professional development was for teachers to continue to improve upon the reading instructional strategies that they already knew. Spencer articulated, “We wanted people to continue to enrich based upon the sort of the framework of strategies that they already had and then building above and beyond that.” Spencer also recounted that since many of his teachers were already grounded in research-based reading instructional strategies, the professional development provided was
meant to reteach and help expand what teachers were already doing. Spencer surmised, “I think people in my district have a tendency to go back to what they know, the professional development offered was, it was re-teaching something that they learned and teaching them better.” Spencer also shared that because the teachers were enriching present practice, this provided consistency of classroom practice and an opportunity to build upon what teachers already did well to help student achieve at higher levels.

**Not necessarily for school improvement.** Spencer did not feel that his decision to provide professional development in reading instructional strategies was made with school improvement in mind. Instead, the purpose of the professional development was much more focused on students’ achievement and teacher practice. Spencer explained, “We're trying to get our kids to achieve, I guess that is school improvement, but that wasn’t a driver of the decision to offer professional development for reading instructional strategies.” Spencer thought that providing the professional development was an opportunity to expand the possibilities for students and teachers, and that might eventually move toward greater organizational knowledge and improved schools. Spencer explained, “If we can improve teacher instructional strategies, that raises all other attributes. We will have better schools, improved schools. We will have a greater base of knowledge among our teachers, and then we can move on from there.”

According to Spencer, he did not decide on professional development for reading instructional strategies to improve schools. Rather, he decided on the professional development to improve student learning and teacher practice that would lead to improved learning environments and schools.

**Antecedents to deciding professional development.** Spencer explained there were a number of decision areas he considered and worked through prior to making the decision to
implement professional development in general, and in particular professional development for research-based reading instructional strategies.

**Determining needs with administrative oversight.** Spencer explained that in the MSD, the process to determine professional development needs is fluid. Spencer articulated that data are examined and staff members make suggestions, but there is not a structured way to review the data or to collect staff input. Spencer then described the process of determining staff professional development needs as him being in communication with what people want to do for professional development and how they would like to accomplish the professional development. He went on to express some concern about the process when he shared, “Well my biggest problem with my decision-making for professional development is somebody presenting to me the idea or the conversation, the why we need to do something.” Spencer felt that he often has to ask individuals to move the MSD toward determining professional development needs. Spencer shared, “I will ask the committee and make it their responsibility, and then we will look at what they believe we need based on assessments.” Spencer shared he also will frequently ask teachers and staff members about specific strategies that are happening other places. Spencer articulated, “I look at what's going on at the state and the national level and ask why aren't we doing some of that? Like STEM, we're not offering STEM. Why not? Why have we not dug deeper there?” Spencer expressed that the determination of professional development needs is not structured, but instead relies on specific staff, particularly himself, asking pointed questions. He shared that he would like the process of determining professional development to include principals looking at staff evaluation and deciding what the staff are doing well and what areas, the staff needs to improve practice. Spencer believes that if principals used professional evaluation as a tool to determine professional development that he and other administrators could better recommend
specific professional development for individuals. From Spencer’s point of view, the decision-making related to determining professional development needs is not a structured process, but is reliant on data, administrative oversight, and some staff input.

When Spencer recounted the process to determine the need for professional development in reading instructional strategies in the MSD, he recalled a conversation with the reading specialist. Spencer recollected that after reviewing the data in conjunction with the reading specialist he asked her to review the data and reading instruction with a committee. Once the committee began looking at the data, Spencer said, “In looking at what it was that they felt that we needed based upon our assessments, they helped determine that reading instructional strategies should be a focus.” Spencer shared that following the review of information with the committee, the committee and he determined that there was a need to offer professional development in reading instructional strategies. Spencer recounted that other professional development had previously been prioritized, but once the data review was completed, reading instructional strategies became the primary focus. Spencer shared that the decision process for determining that professional development for reading instructional strategies was needed included reviewing the data, working with a committee, and prioritizing based on the committee recommendations.

Teacher committee driven. Spencer shared that teachers were specifically involved at every step of the decision-making process for professional development in the MSD and he believed that the decisions were primarily teacher driven. Spencer shared,

Part of the willingness [to participate in professional development] comes [because] they were the ones or their peers were the ones who made the decision. It wasn't shoved down
their throats. The K12 committee said, ‘Here’s what we feel is in our best interest and we're going to implement it.’

Spencer continued by explaining that he considers it part of the teachers’ responsibility to make decisions about the professional development in the MSD. According to Spencer, he expected the reading subcommittee, made up of teachers from all grade levels, to analyze the data and bring a recommendation forward. Additionally, Spencer shared that because of the committee structure, all teachers and professionals have the opportunity to provide input. Spencer generalized, “Depending on the professional development, everybody has sort of a say in that, so the decisions don't get made around you. It may not be input you want, but as it moves up the ladder, your input was given.” Additionally, Spencer noted that because of the small size of the MSD, he has the opportunity to include people both formally and informally in the decisions related to professional development. He explained that teachers drive the decisions related to professional development in MSD, but because of the size, he is able to have close supervision over the process, this helps him to guide the committee in its responsibilities.

**Research is a committee responsibility.** Spencer knew that research had been used to determine the reading instructional strategies for the professional development in the MSD. He shared that it was an ongoing committee responsibility to review that research before bringing a recommendation for professional development forward. Spencer shared, “So I can't say the sources, because that would be at the committee level . . . and that's their responsibility to go and do that research.” Spencer recollected that the committee shared with him that they had reviewed the research about reading instructional strategies. Spencer explained that the committee looked at the research and the potential programs and then decided what would be the best fit for professional development for the MSD. Spencer recalled, “The committee knew what
the students needed from the data and they knew what the teachers needed because they are colleagues, I had to trust the recommendations of the professionals that work for me.” Spencer shared that the committee did the research and made a recommendation for what reading instructional strategies were best supported by the research. Additionally, the committee helped Spencer plan how the professional development could best be implemented.

**Four-year plan.** Spencer shared that the committee and he together developed an implementation plan. Spencer shared, “We laid out a four-year plan for full implementation. So it was, year one it's this, year two it's this, year three you're here and now we're fully implemented.” Spencer explained that it was important to have clear steps and milestones and once they are set do what it takes to get there. Spencer recounted,

> It was systematic, we had to have somewhat of a systematic approach, because we did it at the K-five level, we just implemented and used professional development dates that are built into our calendar, and we said this is what we're going to do, then we used faculty days, after school time, to make sure it got done.

Spencer related that it was important to make it clear that this was the expectation and that the MSD would do everything necessary to provide the professional development and support for the new reading instructional strategies. Spencer recalled that the professional development was implemented in stages, an introduction, a book group, and follow up sessions at the building level. According to Spencer, the follow-up sessions were a collaborative decision between the committee and the principal. Spencer recalled, “The principal felt it was more valuable having that person go deeper at faculty meetings, where questions could be asked and teachers could learn from one another.”
Contextual considerations. Spencer shared how context was considered in his decision-making for professional development in research-based instructional strategies, as well as professional development in general. Demographics, resources, and the community that makes up the MSD were the contextual considerations that informed the decisions he made about professional development.

Size of the district. Spencer indicated that as a wealthy community, the MSD does not make decisions about professional development with socio-economic status in mind. He explained that the decision to provide professional development in reading instructional strategies was made because the teachers involved in the decision process believed that it would meet student needs. Spencer shared,

We were going to do this because this is what the direction of the committee, which is the teachers, wanted to do because it was in the best interest of our kids. I don't think our strategy to do professional development around reading had anything to do with free and reduced lunch. It had to do with what's in the best interest of all the children.

Spencer indicated that the socio-economic demographic is not a consideration as part of decision-making for professional development, however the size of the MSD does play a role in the decision-making for professional development.

Instead, Spencer indicated that the small size of the district played a greater role in his decision-making related to professional development. As he stated, “Because of the size of our district I'm in communication as far as what people want to do, how they want to do it, and why they want to do. There’s no red tape.” Spencer indicated that because of the small size of the MSD, decisions about professional development could include a large percentage of teachers in the decision process. He commented that if teachers want to be a part of the collaboration related
to professional development decisions, they are able to do so because there are so few staff members in the school district. According to Spencer, the small size of the district was leveraged for participation and despite the small size, resources are abundant.

**Resources are not a consideration.** Spencer shared that the resources in the MSD are not usually a consideration when making decisions in the MSD. Spencer shared that resources, specifically time and money are generally adequate for any professional development that the MSD considers. Spencer began by sharing, “If I or the committee thinks it is worthwhile then I'm buying [professional development], because there is a sufficient amount [of money], and because we typically have some excess money at the end of the fiscal year.” Spencer elaborated and shared that he is often able to spend generously on professional development. Therefore, at times the ample resources may allow him to make a decision to provide additional professional development. Spencer illustrated using an example from the professional development for reading instructional strategies:

I was able to look at [the] fund balance and take some of my fund balance money and put it towards the PD. There are things I can buy because of my district: for the reading PD I could buy a little deeper . . . there was a three-day package and there was a five-day package. The five-day package gave the teachers more time, [and] money was not going to be an obstacle, but the better training was going to be a positive.

Spencer also felt that time was not a consideration related to making decisions for professional development. Spencer shared that the annual calendar provided sufficient time. He explained, “It works. We have five district professional development days and we have found that to be fine.” Spencer articulated that the MSD has considerable financial resources and adequate time
so these factors are typically considerations when professional development decisions are being made. However, the expectations of the community are a major consideration.

**Experienced teachers and high expectations.** Spencer explained that the two most poignant attributes that contribute to decision-making for professional development are the veteran staff and the high expectations of the community. Spencer explained, “In our district, 90% of our kids are going off to four-year colleges. Parents expect [students to go to college] and we have to provide the experience for the students to make it happen.” Spencer indicated that the expectation is for teachers to have all students perform at high levels, and he has to be sure that the professional development opportunities are available to make that happen. Spencer added, “At the same time, a lot of my teachers don't want to be out of the classroom and they feel that they don’t need a lot of professional development because students generally do well.” Spencer also shared that having teachers involved in the decision-making for professional development is an example of how the attributes of the organization are considered. Spencer shared, “I have to trust the professionals to make those decisions.” In the MSD, both the high demands of the community and the experience level of the teachers need to be considered as part of the decision-making process for professional development.

**Summary of Spencer.** Spencer indicated that he believed that decision-making should be data driven and should be a collaborative process that is anchored by trust and respect in the professionals with whom he works. Spencer also shared that he believed that the value of professional development was found in the balance between moving the district forward and improving individual teacher practice. While spencer indicated that using research in making decisions was important it was often difficult, particularly when working with veteran staff members. Spencer indicated that there were multiple reasons why he decided to provide
professional development for research-based reading strategies. The purpose for the professional development was to drive the strategic plan forward, to improve student achievement, and to enrich the present practice of the teaching staff at the MSD. Spencer shared the different decisions that he made prior to the decision to provide professional development in general, but particularly in reading instructional strategies. These decisions included determining the needs for professional development, developing a teacher committee to review data and research, and developing a four-year implementation plan. Spencer indicated that the small size of the school district allows teachers to be collaboratively involved in the decisions related to professional development. Spencer also explained that the high expectations of the community drive decisions related to professional development and being a resource-rich district allows him to make decisions that enhance professional development.

Tyler

Background. Tyler Jack is the Director of Curriculum and Instruction of the Apple Tree School District (ASD), a rural school district that serves approximately 1,045 students with a free and reduced population of 40%. Based on the free and reduced population the ASD is in the poorest third of all school district in the state. Tyler has been with the ASD for 34 years. The ASD has recently provided professional development for implementing early literacy strategies. Prior to his work as the Director of Curriculum and Instruction, Tyler was Principal of one of the ASD elementary schools. Tyler became a principal in the ASD in which he had previously taught for 15 years. Professional development decision-making has consistently been part of the responsibilities that Tyler has had since he left his classroom in the ASD. Tyler’s 34 years in public, education has been entirely with the ASD. It is important to note that the Director of Curriculum and Instruction in the ASD is a part time district level position and a part-time
administrator position. In addition to his responsibilities as the Director of Curriculum and Instruction, Tyler also balances building administrator responsibilities. Tyler’s narrative provides a detailed review of his beliefs and experiences with decision-making for professional development in the ASD. Table 3, Overview of Tyler’s Narrative, provides a preliminary overview of Tyler’s narrative.

Table 3

*Overview of Tyler’s Narrative*

<table>
<thead>
<tr>
<th>Beliefs</th>
<th>Purpose (s) of Professional Development</th>
<th>Antecedent Decisions</th>
<th>Contextual Considerations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Decision-making should involve teachers</td>
<td>Provide better opportunities for student learning</td>
<td>Determined needs</td>
<td>Demographics</td>
</tr>
<tr>
<td>Professional development should be driven by student need</td>
<td>Increase student achievement</td>
<td>Reviewed who was available to review information and make recommendations</td>
<td>Collective bargaining agreement</td>
</tr>
<tr>
<td>Research is non-negotiable</td>
<td>Promote collegiality and provide more consistent instruction</td>
<td>What would satisfy Title 1 obligations</td>
<td>Staff mindset</td>
</tr>
</tbody>
</table>

**Beliefs.** Tyler shared his beliefs about decision-making, professional development, and research. As he discussed his beliefs, Tyler conveyed the importance of having teachers involved in decisions.

**Decision-making: Collaboration and feedback provide legitimacy.** Collaborative and site-based were the corner stone of the beliefs that Tyler expressed about decision-making. He explained, “Decisions should be totally collaborative. That is the only way they are legit.” Additionally, Tyler expressed that decisions should be primarily site-based in order for the decision to take each situation into context and to ensure teacher buy-in to the decision. Tyler illustrated this belief by consistently soliciting feedback from teachers about what decisions have
been made and what decisions should be made. He explained, “I want to hear feedback, and I want to provide what the teachers need, not what I think they need.” Tyler believed that by obtaining and sharing feedback, decisions that are consistent with the needs in the field can be made and will be supported. He explicitly solicits feedback from teachers through the use of Google forms. Tyler also believed that by sharing feedback, he could more easily move decisions forward because all participants can review what others think about a decision. For Tyler, decision-making is a collaborative process and that teachers should be included in both the input and feedback loops for decision-making. Additionally, decisions should have student needs at the forefront.

**Professional development should be student needs driven.** Tyler described professional development as “looking at the big picture of the school and then using the money to support teacher growth, to help students achieve more.” Tyler believes that professional development should be primarily driven by student needs and then providing professional development that equips teacher to meet those needs. Additionally, Tyler believed that professional development should be driven by research. Tyler explained, “If instructional strategies are going to be legitimate, then our professional development, our resources, and our programs have to be research-based.”

Tyler believed that the professional development program in the ASD has been well thought out and structured to meet the needs of the students. Tyler asserted, “We look at student needs, data, research, we don’t do anything if it isn’t research-based.” Additionally, Tyler believed that the structure of professional development in the ASD was strengthened by a clear and consistent feedback system with teachers. He explained, “We get feedback on all the professional development we do, not just what teachers thought, but how they see it working
with students, if it doesn’t get results, we don’t continue doing it.” Tyler feels that the ASD is on the right track with professional development and how well it prepares teachers to meet student needs. He indicated that part of that is related to his belief and application of research-based activities.

**Research is a non-negotiable.** Tyler believed that research is the foundation on which all instruction should be built. He explained that he spent significant amounts of time reading and reviewing research that was available to him. Tyler believed that it was his responsibility to apply that knowledge when making decisions about professional development for research-based strategies and when making decisions about purchasing specific programs or professional development packages. Tyler explained,

> Research counts for a, huge, huge, huge, amount now, there is an art and science of teaching, yes, I get it, love, kindness, compassion, empathy, no argument. But I have to make sure that what we do is research driven. I will not buy anything unless it's based on scientifically based research.

Additionally, Tyler believed that part of his job at the ASD is to prioritize professional development by using his reading and review of research. He described, “Any strategy that is scientifically based, that will help the teachers, becomes a top priority.” Tyler believed that providing the professional development and providing the tools was important, but that using the strategies had to be imbedded into teachers’ practice. Tyler ended his discussion about research by emphasizing his belief that he was responsible to ensure that the ASD purchased and implemented research-based materials and strategies by adding, “This district will not purchase anything, programs or professional development that is not scientifically-based.” Tyler believed
that if he was providing professional development on specific instructional strategies, it was imperative that those instructional strategies be research-based.

**Purpose.** Tyler shared that there were multiple purposes and reasons why the decision was made to concentrate professional development on early-literacy strategies, in particular the program called Fundations¹.

**Focused on opportunities more than vision.** When considering the mission, vision, and strategic plan, Tyler expressed disappointment. Tyler said, “Unfortunately when we think of moving those forward, we really don’t focus professional development toward that [vision].” Tyler instead discussed the concept of making sure that teachers have the skills that are necessary to provide opportunities for students, which he felt did fit the purpose of the mission, vision, and strategic plan, but those were not the first considerations. Tyler explained, “When I think about purpose, I really think more about how we are going to target weak instructional areas.” Tyler went on to also explain that as a poorer district, the mission, vision, and strategic plan were secondary to making sure that students got what they needed. Tyler was quick to point out that while the purpose of professional development in the ASD for early literacy strategies was not selected with the mission, vision, or strategic plan particularly in mind, professional development for early literacy strategies did align with the mission of the ASD. Tyler indicated that more importantly, the professional development would increase student achievement.

**Increase student achievement and promote collegial relationships.** Tyler articulated that in the ASD, professional development for early literacy instructional strategies was designed with the primary outcome and goal of increasing student learning and student achievement. Additionally, Tyler wanted to see more cooperation between and among the teachers regarding

¹ See https://www.wilsonlanguage.com/programs/fundations
ways in which to apply the early literacy strategies. Tyler explained, “Our goal was to improve student achievement, this was number one, and building a collegial professional relationship, [which] was number two.” Tyler was clear that in deciding to offer professional development for the purpose of increasing student achievement, he wanted to make the expected outcomes clear to teachers. Tyler recapped a conversation he had with teachers:

Okay, our priority is reading this year. We’re starting with Pre-K, 1, and 2. Let’s talk about this, our students, they're not college and career ready . . . how do we change that? I can't change [student achievement], but I can get you the professional development that will help you to change [student achievement].

Following this conversation with teachers, Tyler explained to early literacy teachers the purpose of the professional development and they were more willing to participate and move the strategies into the classroom. Tyler recounted, “So, we put everything else on hold. We weren’t going to introduce anything else.” According to Tyler the professional development help achieve the outcome, because the professional development went well and teachers implemented the new strategies in the classroom. Tyler related, “it went really well and I'll measure that because it was 100% implementation. We had a nice partnership for PD and we had teachers who ended up with high proficiency and delivery.” According to Tyler part of the purpose of providing professional development was to achieve greater student learning and more collegial relationships as well as consistent early literacy practices, and he believes that these outcomes were achieved in the ASD.

**Consistency of practice.** According to Tyler, the decision to provide professional development for early literacy to the teachers in the ASD was specifically made to provide consistency of practice and to build on the practices that teachers in kindergarten, first and
second grade were already using. Tyler recounted, “There wasn’t much discussion, we didn't even really pilot because we knew we were doing [Fundations], because our kindergartens were already using the strategies.” Tyler explained that the ASD wanted to be consistent across the early grades and teachers wanted to be consistent as well. Tyler recollected, “The teachers, they wanted to expand [Fundations] to grades one and two because the grades one and two were scattered, they weren't all doing the same thing.” Tyler recalls thinking that extending the practices that were already taking place in early grades would be a productive and worthwhile professional development. Tyler wanted to be sure that there was fidelity of early literacy practices and he knew that the professional development would provide the framework for that to happen. Tyler also recalled being somewhat concerned because he did not want teachers to think that they had been doing anything wrong, he wanted them to know that this was about being consistent and effective. Tyler shared, “I didn't want this to be a damaging thing, I didn't want people to feel picked on. I wanted people to feel empowered and effective as teachers.”

Tyler knew that the professional development had met the desired outcome when teachers began to implement the practices in their classrooms and have conversations about doing so. Tyler shared that teachers often discussed not just what they were doing, but why they were using the strategies. Tyler recollected a conversation with one teacher, “She said ‘I know I clap. I know I do phoneme segmentation but I didn't know it was phoneme segmentation. I just knew that we clap the sounds.’ I knew then that the PD was well worth the time.” Tyler surmised that teachers had the opportunity to bring together what they had been doing with the instructional strategies and core knowledge of the practices. According to Tyler, the professional development provided built consistency by giving early literacy teachers strategies that they either had learned and forgotten, or that they did not know. Tyler made the decisions for early
literacy strategies because the professional development would promote consistency of practice, improvement of practice, and a comfort level for teachers to implement the practices in the classroom to improve the early literacy of students.

**Improvement of early literacy.** According to Tyler, school improvement was not his focus when the decisions to provide professional development for early literacy instructional strategies were made. Tyler explained, “We were looking to improve early literacy and the skills of teachers, I don’t think we were thinking about comprehensive school improvement when we made the decision.” Tyler did feel that the professional development would improve knowledge base of teachers and organizational knowledge would increase as a result, but he explained that this was not the reason that the professional development was offered. According to Tyler, Everybody believed in the phonological awareness piece. Everybody from special education, regular education, Title 1, all believed in the brain development of the students. So, they all believed in the components of the early literacy strategies. It wasn’t a stretch for them to buy into the research, whether they knew it or not. They believed it.

Tyler shared that during the professional development “increasing teachers’ knowledge was going to happen, but it wasn’t the focus, getting the strategies used in the classroom was the focus.” Tyler explained that the decision to provide professional development was made to improve early literacy, the skills of teachers, and the learning of ASD students.

**Antecedents to deciding professional development.** Tyler shared the different types of decisions that he made prior to providing professional development in research-based early literacy strategies. Specifically, he discussed decisions related to needs, professional expertise, research, and the implementation of professional development.
Needs were staff and data driven. Tyler shared that the process for making a decision related to professional development needs begins with data analysis and includes significant input from staff. Tyler described the process as first determining the needs of the lowest performing student demographics. Tyler explained the first step of the process,

Well, basically, we look at data, . . . free and reduce lunch, . . . our gender, . . . IEP needs, ELL needs, and we base PD particularly to the groups where they're performing academically the lowest.

After determining the needs, Tyler began to gather input from staff, by collecting information from staff on what staff sees as priority areas. Tyler shared, “We ask the staff what is most important through Google forms and then we decide what our PD will be, so it's basically teacher driven after we look at the data.” Tyler also expressed that he works to be in touch with teacher needs by being present at committee meetings, reviewing feedback, and spending time in the school buildings. Tyler shared, “I spend time with committees and the face-to-face-interactions, I try to get in every building every day, I try to talk to teachers, and I listen to them.” Tyler shared that the ASD decides the needs for professional development this way because it provides buy-in to the decision at an early point of the process. Tyler conveyed, “I feel it's got to be bottom up, teachers have to want it.” Tyler expressed that the final determination of professional development needs is heavily influenced by what he hears from teachers and priorities that are collected in the Google forms.

Tyler recollected that the decision regarding the needs for professional development in early literacy instructional strategies came initially after a committee brought data forward on reading achievement in the ASD. Tyler shared, “It came up from the K-12 [committees], which has the reading specialist in the elementary, the reading specialist from the middle, and there
were reading people from the high school.” Tyler distinctly remembers the conversation that he had with the committee about professional development needs and reviewing the data of the kindergarten, first and second grades on the STAR assessment, which indicated that students were significantly below proficiency levels. Tyler also remembered that while the committee had a reading specialist from elementary, it did not have an early childhood teacher. Tyler and the committee realized that consulting with an early childhood specialist was a next step.

Following that realization, Tyler led the committee in determining what the focus area should be. Specifically he worked with the committee to assess what the professional focus should be by reviewing how the early literacy scores had been achieved and what were acceptable literacy benchmarks. Tyler recollected, “So, we're like, well, how is this happening? And then we looked at the information, the data and it was like, by November, first grade, here's where you should be as a group, and we were way down here.” According to Tyler, following that conversation the committee recognized that something had to happen, but they were not sure what. Tyler shared, “We knew it wasn’t good, but nobody knew what it meant for professional development, so we looked at the data from the STAR Early Literacy, assessment and we could see, students needed tier two support.” According to Tyler once the committee was aware that early readers needed tier two support, the professional development need was easier to determine. Tyler recollected, “We knew we had to focus PD on early literacy strategies for anything to change.” Tyler worked with the committee to examine data, consulted with an in-district specialist, and included teacher input from the committee to make a decision about professional development needs in the ASD. As the committee contemplated, they decided that they needed assistance from both local reading specialist and an outside consultant.
**Professional expertise.** Tyler explained that the decisions for professional development related to early literacy depended on the expertise of the teachers both in and outside of the ASD. Tyler explained, “Part of [decision-making] is calling upon the expertise of professionals that we develop within our building.” He also shared that, initially teachers from all levels involved, but as the professional development was narrowed to early literacy, there was greater dependence on early childhood teachers. Tyler recollected, “It wasn't an isolated activity. The middle and the high school teachers became involved initially as well. After we looked at the data, we knew we needed early childhood.” Tyler explained that the decision-making regarding the professional development was collaborative. Tyler recollected, “I think the teachers felt they decided, it was very collaborative, I gave them a pretty big leash because I knew the people and knew that they would make good decisions.” Tyler remembered that feedback was taken from different groups of people, including parents prior to making decisions related to professional development. Tyler shared, “We took the feedback from all the constituencies, we wanted to visit grades one and grades two and get feedback from the teachers and parents and all that, then we balanced that with real data and made a decision.” Once feedback and data had been examined, Tyler recalls that the teachers wanted to speak to a consultant. Tyler shared that he contacted a reading specialist from another district to work with the teachers. Tyler recounted,

She was a reading specialist, she had taught first grade for 17 or 18 years and she taught kindergarten for 14 or 15 years. They loved the fact that she was a reading specialist and she had multiple years teaching K and one. That was very important. She had huge credibility in their eyes.

Tyler shared that he combined the expertise and experience of the ASD teachers with the expertise and experience with an outside professional to make decisions about professional
development for early literacy instructional strategies in the ASD. According to Tyler, the experts reviewed research and the Title 1 list to make a recommendation.

*Research and the Title I list.* Tyler explained that research is not typically done in the ASD; instead, Tyler makes decisions related to specific instructional strategies based on those strategies and programs that appear on the Title 1 recommended list. Tyler explained, “We're receiving funds, there are the programs on the list, we have to have something that satisfies the grant money.” According to Tyler,

The research was all done; we used the research that Title 1 did. We took the approved program and strategies graph that they did, we found that for early literacy strategies, Fundations was the best and some teachers already had some professional development in those early literacy strategies. The early literacy people, Pre-K and K loved it. We were like, okay, it's got every box checked, let’s get started.

Tyler explained that considering the research as part of the decision-making process was fairly simplified, because much of the research had been completed by others and appeared as part of the Title 1 approved list. While the research aspect was simplified, according to Tyler, so was the plan for implementation plan.

*Ongoing professional development.* Tyler shared a multi-year professional development implementation that continues through the present time. Tyler explained that while there was not a decision to implement the professional development in a specific way, based on significant year of experience, he was not concerned about the implementation. Tyler reasoned, “Professional development has to be multi-layered, you have the initial training, then you have the coaching, discussions, and refreshers, you have to differentiate it for everyone.” Tyler recollected that the ASD early literacy professional development for Fundations began by
bringing in training to the teachers from a local reading specialist. Tyler remembered that following initial training some teachers went to the reading specialist’s school for a site visit to observe her using the strategies. According to Tyler, now there is ongoing professional development in the ASD with classroom coaches and refreshers at staff meetings. Tyler explained,

   We are three years in now. It is about sustainability and knowing where the teachers are.

   If you are a novice, we get you training. If you are hitting snags, we have a coach work with you. If you’re an expert we have you do the training for others.

Tyler views the implementation of the professional development as ongoing in the ASD in order to sustain the implementation of Fundations and the early literacy instructional strategies.

   Contextual considerations. Tyler shared the consideration that informed his decision-making for professional development. Tyler specifically reviewed demographics, resources, and community and organizational make-up.

   Demographics. Tyler explained that the demographics, particularly socio-economic status play a consistent role in decision-making for professional development. Tyler shared that professional development needs are often determined by the needs of the students. Tyler pointed out; there are times when he has to decide between professional development and specific student needs. Tyler illustrated the following example, “There are times when I have to reallocated dollars that might be used for professional development towards supporting students. That’s not a decision about professional development, but it is a decision that impacts professional development.” Tyler feels that the demographics of the ASD are consistently a consideration in the decisions both for determining what professional development is offered and
if professional development can be offered despite fact that there is a generous professional development budget.

*Large professional development budget.* Tyler began by explaining that the ASD has a generous district professional development budget and when combined with grants, fiscal resources are not usually a consideration when making decisions regarding professional development. Tyler shared “We are blessed with a very large PD budget, so for early literacy, our district budget provided the PD, no problem.” Tyler continued by sharing that relative to professional development, “I don't know how we managed to pull it off but I pretty much provided anything that we needed.” However, Tyler was less positive about time. Tyler shared, “The big thing was the time, finding time.” Tyler recalled that making a decision about providing professional development for early literacy strategies including prioritization. Tyler recounted,

We had PD days that we used and we had K-12 time that we used, but I'll tell you the truth, there wasn't a whole lot of time we had to rate our priorities. Then I communicated to the district, our priority is reading this year.

Tyler shared that time is a consideration in professional development decision-making. Tyler articulated, “I think time is always part of the decision, because I think they need more PD time.” He continued by explaining, “There’s these competing priorities, so it's basically taking all competing priorities, and are we making the best choice?” Tyler communicated that money is not usually a consideration in the ASD when it comes to make decisions about professional development, but time often is a resource that influences the decision-making for professional development in the ASD, a consideration that is made more difficult by the mindset of the teachers and the teachers’ work agreement.
**Tough teachers.** Tyler shared that the community in the ASD only begins to be a consideration in decisions related to professional development when there is poor student performance. Tyler shared, “When we decided to do professional development for early literacy strategies, the community had been pretty upset about how students had been doing.” However, Tyler shared that the staff mindset and the collective bargaining agreement (CBA) both have to be taken into account when decisions are being made that related to professional development. Tyler explained, “It's a tough crew down there. The elementary crew's very strong-willed, very veteran, very set in what they do is right.” Tyler shared that at times he has to go through the data very thoroughly with the staff and he often has to leverage the fact that the elementary schools are Title I schools. Tyler elaborated, “I have to show the data and do a pitch session, and use the Title I card.” Tyler shared his frustration about the CBA and how it has to be considered when make decisions about how to implement professional development. Tyler explained, “We have 10 professional days without students, but only five of those can be for PD, because the other five are allocated for other specific purposes so, we can't assign teachers for those five days on what they do.” Tyler elaborated further by sharing,

I think the CBA blocks it [professional development], actually, because we only have so many days, which are prescribed as district PD days. We can't run PD like after school, and I can't, I can run PD in the summer, but it has to be voluntary participation, and I have to pay.

Tyler implied that while community attributes were not often considered in the decision-making process for professional development, the teachers, and the CBA were constraints on the decision-making process.
**Summary of Tyler.** Tyler shared that a cornerstone of his beliefs about decision-making was the involvement of teachers in the decision-making process. Additionally, he believed that decision for professional development should be driven by student need. Tyler explained decisions should incorporate research and that research in education should be considered a non-negotiable. Tyler shared that the purposes of providing professional development in early literacy strategies for the ASD were, to provide students with better opportunities for learning, to increase student achievement, promote collegial relationships, and to provide more consistency in instructional practice. Tyler also explained that there were multiple decisions prior to making specific decisions for professional development for early literacy strategies in the ASD, specifically what were the needs, who was available to examine information and make recommendations, what would satisfy the obligations of Title I, and how would professional development be implemented. Tyler shared that while there is a large professional development budget in the ASD; demographics contribute considerably to the decision-making for professional development. Additionally, Tyler indicated that while the context of the community does not generally inform decisions related to professional development, the CBA and the staff mindset of the teachers in the ASD are often considerations when making decisions related to professional development in the district.

**Abigail**

**Background.** Abigail Francis is the Director of Curriculum, Instruction, and Professional Development of the Everpine Consolidated School District (ECSD), a suburban school district that serves approximately 2,100 students with a free and reduced population of 6.5%. Based on the free and reduced population, the ECSD is in the wealthiest third of all school districts in the state. Abigail has been with the ECSD for eight years. The ECSD has
recently provided professional development for teaching social and emotional learning. Prior to her current position, Abigail was the Assistant Director of Curriculum and Instruction for the ECSD. Additionally, Abigail has prior experience as a building assistant principal and a classroom teacher in another state. Abigail brings 20 years of experience in public education to her current role. Since leaving the classroom, professional development decision-making has been a significant part of her responsibilities. Abigail’s narrative provides a detailed review of her beliefs and experiences with decision-making for professional development in the ECSD.

Table 4, Overview of Abigail’s Narrative, provides a preliminary overview of Abigail’s narrative.

Table 4

*Overview of Abigail’s Narrative*

<table>
<thead>
<tr>
<th>Beliefs</th>
<th>Purpose(s) of Professional Development</th>
<th>Antecedent Decisions</th>
<th>Contextual Considerations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Decision-making should be thorough by including research and teacher point of view</td>
<td>Move the strategic plan of the ECSD closer to the vision</td>
<td>Determined what would be consistent with vision</td>
<td>Lack of time for professional development</td>
</tr>
<tr>
<td>Professional development should have a clear plan that includes how teachers will be supported</td>
<td>Add teacher toolkit</td>
<td>Involved teachers and principals in decision</td>
<td>Influence of community</td>
</tr>
<tr>
<td>Research is important, teachers do not have time use academic research studies</td>
<td>Improve classroom environments</td>
<td>Reviewed efficacy studies</td>
<td>High expectations</td>
</tr>
</tbody>
</table>
Beliefs. Abigail shared her beliefs related to decision-making, professional development, and research. As she discussed her beliefs, Abigail referred to her leadership experiences and her concern that leaders did not make well-informed, reflective, decisions.

Research and information for thorough decision-making. A reason that Abigail became a school district administrator was because of the beliefs she held about how school district leaders should make decisions. Abigail described, “I got into leadership because I felt like people made really poor decisions and I felt like I could do a better job.” Abigail believed that decisions were not always made carefully, were often made too quickly, and were made without input from teachers. Abigail believed that decisions should be thoughtful and should include gathering appropriate information about the decision being made such as through using research or talking with stakeholders. Abigail referred to a class she had taken on decision-making during her principal certification program that expanded her beliefs about decision-making. Specifically, Abigail described her belief about the importance of taking the time to make a decision:

In certain circumstances you need to make a fast decision about something but in most circumstances, I've actually found that taking the extra time to think through the unintended consequences of your decision is a really important piece and I think that leaders don't always [do this]; they feel pressured to make a quick decision, I believe that sometimes not making a decision right away is the best thing.

Abigail believed that decision-making should be thorough and inclusive of appropriate information, whether that means research gathered from appropriate sources or soliciting the input of teachers. Additionally, she believes that decisions related to professional development done this way will result in planned support for teachers.
**Professional development should include planning and support.** Abigail defined professional development as “any professional experience that deepens a teacher's understanding of what or how they teach in order to have better outcomes for their students.” Abigail shared that she believed that it is critical to have a clear plan for professional development needs and to communicate that plan with teachers so that they are able to discern how it is tied to the strategic plan and vision of the district. Abigail believed that coaching and support of the implementation of new practices is paramount for success of new instructional strategies. She explained,

> Without ongoing support, practice doesn't change and every individual teacher is in a different place so if you're not also trying to individually support them in their own development, helping to move them forward, you're only kinda doing half of the work.

By providing a clear pathway and ongoing support, Abigail believed that instructional strategies are more readily adopted by teachers. She pointed out that “an instructional coach can really provide that ongoing support for teachers that's needed to make sure that the training is actually been implemented.” While Abigail believed that the ECSD was on track regarding the professional development plan, she is concerned about the ongoing support aspect of professional development in the ECSD.

Abigail believed that the ECSD had done a good job initially of creating the professional development plan. She shared, “[We] built a committee together, providing the deep rich research to the committee, and I've worked really hard to support them and create the professional development plan for the year.” Abigail believed that the loss of an instructional coach has hurt the professional development plan in the ECSD. She expressed that “we had those four great days in the summer, then we were implementing and then something was off during the year, and we had lost the instructional coach and it was hard to get it back on track.”
She also added, “I’ve noticed more and more about how critical it is to have that ongoing professional development and support.” Abigail’s experience in the ECSD strengthened her belief that a professional development plan that includes ongoing support are the cornerstones of solid implementation.

**Research needs to be district, culture-based.** Abigail believed that it was important that a district value research in order for research to play a role in decisions related to professional development. Abigail surmised, “Research is central, [I] feel like we're a district that highly values research, and we've always been, which is really nice to have that culture.” She further explained that if research is a central tenet of the work in a district, then it becomes embedded in the culture and makes it easier to relate to teachers and the community because it becomes part of the expectations of the work being done with students and the work being done with teachers. Abigail speculated, “If the district has that culture of using research and if the teachers know that the decision-making is based on research, and that research is brought into practice when needed, this will help find a path forward.” Abigail feels that in order to achieve a district culture of research that a primary purpose of her role was to work to provide that research to teachers in order to promote it as a district culture expectation.

While having a district culture was important, Abigail also believed that having teachers reading and reviewing research was not always possible, though it is a primary function of her role. She explained that teachers are often too busy with their classrooms to effectively review and apply research and that a central part of her role was to provide a way in which to bring research to teachers, instructional strategies, and the district culture. Abigail surmised:

I think teachers sometimes don't even fully understand the research and how it applies to their classroom. So, I've found that one of the best things is providing research or
providing information, providing readings, whatever it is that I need to, but I wonder about how much, how realistic it is to expect a teacher to do that on their own?

Abigail is committed to developing a district culture of research driven decisions for instruction, but she believed that is was a primary function of her role to ensure that culture is established.

**Purpose.** Abigail shared the central purposes that were the drivers for the decision-making related to professional development, specifically professional development for Responsive Classroom\(^2\) in the ECSD.

**Toward the vision.** Moving the vision of community and student agency forward was a significant consideration for providing professional development for specific strategies for social and emotional learning, namely Responsive Classroom. According to Abigail, “So in looking at all of these pieces, we're supporting deeper learning and that's actually creating different structures in the classroom. We felt strongly about the idea of community and culture within the classroom and school.” Abigail felt that in order for the ECSD to move closer to the vision, teachers needed to acquire more strategies for how to create social and emotional learning and communities within the classroom. When she describes the reason for professional development for social and emotional learning in the classroom, Abigail purported that “teachers need a pretty big tool kit on how to structure [social-emotional learning] and how to create a community that supports that, so in [the decision] was really the social emotional learning part and having that community piece.” Abigail feels that the continuation of professional development for Responsive Classroom has provided a way for teachers to structure classrooms that are representative of the larger vision and focused on the concept of community. According to Abigail, the professional development provided a way to close the gap between present practice

\(^2\) See https://www.responsiveclassroom.org/
and the vision for practice of the ECSD. She conveyed that aligning the purpose of the professional development to the vision is important to accomplish the long-term goals and objectives of the ECSD to provide teachers with better strategies related to behavior management.

**Adding to the toolkit.** Abigail related that behaviors in the classroom had become a growing concern in the ESCD and teachers needed more tools to implement in the classroom. In order to give teachers what they needed to productively manage challenging behaviors, the ESCD began to offer professional development in Responsive Classroom strategies. Abigail recounted, “We felt pretty strongly that Responsive Classroom would be a really important tool in our teacher's toolkit to be able to prevent some of the challenging behaviors.” The goal, according to Abigail was to provide teachers with the tools to prevent behaviors and provide a nurturing classroom for students. She explained that the purpose of the professional development was to provide a way for teachers to “not just respond to behaviors, but stop them, if you're looking at it from a safe and supportive learning environment for all students.” Abigail shared that many teachers were concerned about students and the behaviors that students were displaying, professional development for Responsive Classroom gave the teachers the ability to work toward a more productive classroom environment.

Abigail recalled, prior to the professional development, teachers had indicated they were struggling to manage student behavior. She also recounted that following the professional development some of those issues had begun to dissipate. Abigail explained, “There was a change in classrooms. We were seeing more orderly and safe environments in classrooms”. Abigail felt that the purpose of providing the professional development was in part to provide strategies for teachers to create classroom environments and structures to prevent some of those
challenging behaviors from emerging. Abigail shared, “I think Responsive Classroom was one piece in being able to help and see a change in our classrooms and to have teachers feel that they had strategies to help students with challenging behaviors.” Abigail shared that she felt that the professional development had successfully provided teachers with the opportunity to implement strategies and refine practices to create learning environments that were better for students and more comfortable for teachers.

**Refining practice.** Abigail speculated that while the decision to hold professional development in Responsive Classroom was to provide teachers with new tools, it was also about refining classroom management techniques and practices. Abigail shared that “unfortunately, teachers end up getting classroom management strategies more haphazardly and not comprehensively.” She speculated that many teachers received feedback on classroom management, but this was not a very systematic way of developing classroom management tools. Abigail believed that many of the strategies from Responsive Classroom would be new for some teachers but she also knew that some teachers had previously been trained in Responsive Classroom. She explained that the decision supported the purpose of the professional development which she described as “help [for teachers to] refine the toolkit they already had but they needed new tools too, because teachers were at a loss of how to deal with some of these challenging behaviors.” Abigail wanted to be sure that teachers were comfortable with the new strategies and that the professional development provided a way in which to reassure teachers that they would have ample management strategies. Abigail recollected,

I think it's pretty important that some of these were probably brand-new ideas or strategies to teachers. There were a lot of 'ah-ha's' during training, or, 'oh!’. We felt that that's an important piece because if teachers feel like something is being thrown out and
something else is being brought back in and everything has to change, it can feel really
disruptive. So, in minimizing some of that change, we wanted to bring in something that
aligned nicely with what some teachers already had.

Abigail surmised that while the professional development for Responsive Classroom provided
new tools, the teachers were able to refine the classroom management strategies that were
already in place and supplement those strategies to refine how they managed challenging
behaviors in their classrooms and how they could improve the classroom environments in the
ECSD.

**Improved classroom environment.** Abigail explained that part of the decision to provide
professional development for Responsive Classroom, was for the purpose of classroom and
school improvement, specifically in regards to the environment. Abigail reflected back on the
decision to provide the professional development, “We felt [behaviors] were almost at critical
level, so we felt that we needed to have a multi-pronged approach to be able to provide support
from various places.” Abigail explained that the decision for the professional development was
to help teachers with the classroom aspects of the environment and this would help the overall
atmosphere of the schools. Abigail recounted, “I thought Responsive Classroom was one piece
in being able to help and see a change in our classrooms.” She stated that the purpose was to
support teachers, and make sure that the concepts spread throughout the building and make sure
that the implementation was not just in singular classrooms. As she explained, “Our principals
got training that first year. Actually one had been trained previously, and I felt that that was a
critical piece because this will just be in pockets if you just train teachers and don't train
administrators.” Abigail explained that the purpose of the professional development was to
improve teacher strategies in the classroom to improve the environment in both the classroom and the schools.

**Antecedents to deciding professional development.** Abigail reviewed the multiple decisions that she made prior to providing professional development in the ECSD. Abigail discussed decisions related to professional development in general as well decisions related to professional development for Responsive Classroom.

**Determining need.** Abigail conveyed the decision-making process to determine professional development needs as a determination of what practices will close the gap between the present strategies and strategies more consistent with the long-term vision for the district. Abigail explained, “I go back to our-long term vision or strategic plan and then look at where our staff actually are, their strengths and their weaknesses. And then look at the vision. How do we bridge that gap?” Abigail shared that once she can determine the gap; she will begin to determine the professional development needs. However, before she will complete the decision-making process to determine needs, she will consult with teachers and principals and bring them into the process. Following speaking with teachers and principals, Abigail will make the final determination related to the needs for professional development.

Abigail shared the decision-making process related to determining that professional development was needed for Responsive Classroom. Abigail recounted that she began to hear that teachers were in need of new classroom management strategies. Abigail recalled first hearing about the need,

It came about almost from two different places, maybe even three different places. I think one [place it was heard] was . . . from parents. Parents were hearing more and more from their own children that there were disruptive children in the classroom. So, it
kind of was a buzz that went around the community, really more of a concern in how can we support teachers and we want this to be a positive, safe and supportive learning environment for all students.

Abigail was also hearing from teachers that the student population was changing and had greater needs and more challenges with social and emotional learning that the teachers were unable to meet. Abigail shared that for the ECSD, hearing from the community that some students were not having their needs met was counter to the vision in the district of having strategies that were driven by high levels of student agency. Abigail recalled that the district started hearing from the community and the school board about needing to better support our teachers in the area of social and emotional learning. Abigail speculated, that at this point, the decision had not reached Responsive Classroom particularly yet, first Abigail brought in teachers to help her determine the plan.

Principals and teachers in decision-making. Abigail explained that while concern regarding classroom environment began with the community, administrators and teachers drove the decision regarding professional development in Responsive Classroom. Abigail explained, “A lot happened through committee work, which involved principals, teachers, and me. I oversaw and supported and organized that committee, that's a big piece there. But the committee really made the decisions after I gave them the research.” Abigail went on to explain that the roles of principals were important in the decision-making process. Abigail recounted, “That building leadership piece was critical in being able to support Responsive Classroom’s professional development, so for example that first year we talked about what we were putting in place district-wide for Responsive Classroom.” Abigail felt that principals and teachers were an important part of the planning related to professional development for Responsive Classroom.
Additionally, Abigail wanted to be sure that the principals and teachers had reliable information related to the efficacy of Responsive Classroom.

*Information from a research collaborative.* Abigail shared that reviewing research is one of her primary roles. According to Abigail when providing professional development in Responsive Classroom first came up, she began doing research to determine the efficacy of the strategies that the teachers would be learning. Abigail recounted, reviewing the available research studies from the National Center for Response to Intervention at the American Institutes for Research. Abigail shared that after reviewing the research as part of the decision-making process for professional development for Responsive Classroom, she believed it may be a good fit for the ECSD, but before a decision about professional development could be made, she wanted to share the research she had found with other administrators and teachers. Abigail recounted,

> I shared the Responsive Classroom efficacy study, so they actually looked at the impact and the benefits . . . It was clear to the team, that it was research-based and... that it has an impact. So, it was really the research base as well as the research studies that had been done that really made us feel comfortable because Responsive Classroom is expensive.

Abigail explained that having shared that research with others as part of the decision-making process was important because the ECSD wanted to be sure that what they implemented in the classroom was going to be effective. Abigail believes that considering research for professional development in Responsive Classroom was a significant contributing factor in the decision-making process.

*Purchased training and embedded coaching.* Abigail explained she and the administration decided that a well-communicated implementation plan for professional
development in Responsive Classroom was necessary based on the feedback from the community and teachers on behaviors in the classrooms. Abigail recalled, “We kept hearing from the community that we needed to do something. We knew we needed to implement the professional development quickly but as an optional training to begin with.” Based on the community and teacher feedback Abigail decided that summer sessions training sessions would take place by purchasing training. Abigail recounted that she held summer training the first year with key teachers and administrators, which resulted in positive changes to a number of classrooms. Based on the success, Abigail decided she would purchase a comprehensive training package. Abigail explained, “The package gives you onsite coaching, which is really important for looking at your implementation and being able to make changes.” Abigail explained that the decision to purchase onsite coaching was important because the coach helped her plan a systematic roll out of the professional development for all teachers and administrators through middle school. Abigail shared, “The decision to have an onsite coach was important, the coach went in and observed different teachers and provided feedback, and talked about next steps and how building leadership might be able to better support those teachers [when] implementing.” Abigail shared that the decision for beginning with optional participation was to leverage early adopters to encourage others. Abigail recalled that she and others felt that a slow roll out would be more comfortable for teachers, particularly because it builds teacher confidence and increases their willingness to participate in the professional development and implementation.

**Contextual considerations.** Abigail shared the contextual considerations that informed her decision-making for professional development. Specifically, she discussed the role of demographics as it related to Title IIA, the lack of time available for professional development,
and the role community played in the decisions related to professional development for Responsive Classroom.

**Demographics.** Abigail shared that overall demographics in the ECSD did not have a major role in decision-making related to professional development for Responsive Classroom. She explained that demographics play a role in the Title IIA allocation, which is how demographics might be a consideration. Abigail shared, “[Demographics] really only impacted our funding and ability to offer the training. Because we have such a small number of students on free and reduced lunch, it doesn't typically impact our decision-making around . . . professional development.” Abigail suggested that demographics may play a role in decision-making for professional development at a school level, but it is more likely to be a consideration for direct support to students. Abigail conveyed,

I feel like [demographics] comes in more at the school level with supports we provide, because our population [of free and reduced lunch] is so low. The only other piece and it really doesn't have much to do with free and reduced lunch necessarily, is social and emotional learning, so sometimes those children might be in situations where they need a little extra support.

Overall, Abigail did not feel that demographics played a role in decision-making for professional development at the ECSD; instead, she suggested that demographics would play a role in direct supports received by students. Instead, Abigail indicated that time was a significant consideration related to decision-making for professional development in Responsive Classroom.

**Lack of time.** Abigail shared that while money can at times be a factor in making decisions regarding professional development, time is more of a consideration. Abigail used the decisions related to professional development for Responsive Classroom as an example.
shared, “Because the community came to us with worries [about student behavior], so in that respect money really wasn’t a consideration, we determined what we would do, budgeted future [dollars] and also used budget savings to offer [Responsive Classroom] right away.” Abigail shared that the resource consideration, that could affect the financial resources was time. Abigail explained, “We only have two in-service days a year, the only way to get this work done is by pulling the teachers so we definitely end up using release time probably more than other districts would tolerate.” Abigail elaborated that professional development in the ECSD often means releasing teachers from class to attend professional development to learn strategies that all teachers are expected to implement Abigail shared that because of the concerns about releasing teachers from class during the school day the ECSD often leverages summer to provide professional development. Abigail shared, “Summer is what's most critical, but if we offer something in the summer it can become expensive quickly because we have to pay each teacher their per diem.” Using the per diem for every teacher, Abigail explained, can become expense for the ECSD quickly because the teachers in the district are among the highest paid in the state.

Abigail clarified that while money is not usually a consideration in making professional development decisions, because of the lack of time during the school year money can become a consideration depending on how many teachers attend professional development during release time and how many opt for summer professional development. Abigail elaborated further that time is the larger resource consideration for professional development because of the lack of time scheduled in the school year calendar for professional development. Abigail expressed frustration at the lack of time that is available for professional development in the ECSD and felt that it is a major consideration when making decisions about professional development as well as the pressure from the community to resolve the perceptions of ongoing classroom disruptions.
**Influential community.** Abigail explained that the community in the ECSD is a significant consideration both generally when making decisions about professional development as well as when decisions were being made for professional development in Responsive Classroom. She explained that the community highly values education and has progressive concepts of what educated should be able to do for their children. Abigail elaborated,

> For example, we have parents who say to us why can't my student move on, they're ready. We're not yet designed for that, we support as much as we can and we make adjustments, so just the idea of how progressive our community is around education, gives us direction in professional development, and it helped form our strategic plan and all of the professional development we do is aligned to that strategic plan.

Additionally, Abigail reported that the decision to pursue Responsive Classroom came in part from student need, but also from the community. Abigail recounted,

> The [community] definitely impacted our structure and format for professional development because we felt [behaviors] had reached a critical level, critical sounds really strong. It wasn't like kids are jumping out windows and, you know, throwing desks. Their children were coming home and sharing about disruptive students in the classroom, and parents felt learning was being impacted by the disruptions. It was just more for our community. It felt critical, and we felt we needed to offer this right away.

Abigail also shared that staff within the organization also influenced the decision-making for the Responsive Classroom professional development. Abigail felt that both the community and the staff within the organization were considerations during the decision-making process for professional development in the ECSD.
Summary of Abigail. Abigail shared her beliefs that research and input from teachers are both important aspects of decision-making for professional development. She also shared that she believes professional development should have a clear plan that includes how teachers will be supported in the implementation of the new practices. Abigail explained that while she believes that research is important, teachers often do not have the time to develop understanding of academic research and research studies. When the decisions to have professional development for Responsive Classroom were being made, Abigail explained that she in conjunction with others were making decisions that they believed would move the district closer to the vision, would add to teacher toolkits for strategies for behavior management, and would refine present practices for social, emotional learning that would lead to improved classroom environments. Abigail shared that prior to making the decision to have professional development for Responsive Classroom, there were a number of decisions that were made including determining what professional development would be consistent with the long-term vision of the district and that principals and teachers would be involved in making the decision. Abigail also shared that she reviewed efficacy studies on Responsive Classroom prior to the decision to provide professional development. Additionally, Abigail explained that she and other administrators decided to develop and share a multi-year implementation plan that included a purchased package of training that included on-site coaching. Abigail explained that while demographics may have played a role in the resources that were available for Responsive classroom professional development through entitlement grants based on free and reduced lunch, generally the greater contextual considerations are the lack of time available for professional development in the school year calendar and the influence of the community on decisions in the ECSD.
Cara

**Background.** Cara O’Connell is the Superintendent of the Summit School District (SSD), a rural school district that serves approximately 1,450 students with a free and reduced population of 34%. Based on the free and reduced population the SSD is considered part of the middle third of all school districts in the state. However, it is noteworthy to add that while the SSD is within the middle third of all school districts statewide, one-member town of the SSD is considered the poorest in New Hampshire. Cara has been with the SSD for four years as the superintendent. The SSD has recently provided professional development for instructional strategies related to reading comprehension. Prior to becoming Superintendent of the SSD, Cara was a director of curriculum and instruction for another New Hampshire school district; she has also worked as a school district federal project manager, an assistant principal, and a classroom teacher. Cara has been working in public education for 25 years. Cara’s involvement in decision-making related to professional development has been primarily in her more recent roles of superintendent and director of curriculum and instruction, prior to these roles Cara’s involvement in decision-making related to professional development was ancillary. Cara’s narrative provides a detailed review of her beliefs and experiences with decision-making for professional development in the SSD. Table 5, Overview of Grace’s Narrative, provides a preliminary overview of Cara’s narrative.

Table 5

*Overview of Cara’s Narrative*

<table>
<thead>
<tr>
<th>Beliefs</th>
<th>Purpose (s) of Professional Development</th>
<th>Antecedent Decisions</th>
<th>Contextual Considerations</th>
</tr>
</thead>
</table>
Beliefs. Cara shared her beliefs related to decision-making, professional development, and research. Specifically, Cara emphasized the use of team decision-making, clear planning for professional development, and the use of anecdotal evidence rather than research.

Team decision-making. During her interview, Cara expressed her belief about the importance of including others in decision-making. Cara explained that, “the only times where I find that I really make bad decisions is when I make decisions and I don't talk to anybody else.” While Cara hesitated to use the word collaborative because she felt that it is over used, she explained that she believed that decisions are best made as a team. Cara believed that even when she has already made a decision, she should discuss it with her administrative team so she can get their feedback. Cara articulated her belief by saying, “So even if I already know what I'm [going to] do, even if I am convinced this is best, I float it out there so that I can get kicked in the butt before I put it out there for the whole district.” Additionally, Cara believed that not only should she be including others in her decision process, but also that it is a responsibility of her position to use an appropriate process for decision-making.

Professional development should improve practice. Cara defined professional development, as “it's just anything that helps you do better at what you do, whatever impacts what you do, whatever ideally improves your practice.” Cara believed that at times professional
development is not specific enough and leaves participants unsure of what to implement in the classroom. Cara shared “I think you can have professional development that is just way too broad and you walk away with something, but you're not quite sure what it is and you don’t really know what to do next.” Additionally, Cara believed there are times professional development doesn’t lead to better instruction but the importance of a willingness to participate in professional development is crucial. Cara asserted, “In reality not everything you pursue improves your practice. Sometimes you're like ‘Yeah that didn't help me at all.’ And that's okay. I think you pursue it because you want to be a good professional, and if you don't want to pursue it then you don't belong in the field.”

Cara explained that the SSD consistently has conversations regarding what professional development is and is not. According to Cara, “the debates we have had over what counts as professional development boggled my mind, because it's like if it worked for you then it was professional development.” Cara believed that the SSD was able to leverage the conversations about professional development to create a clear professional development plan that was targeted to the needs of staff. Cara believed that the well-planned professional development plan was a key to teachers feeling comfortable to implement learned strategies.

**Broad perspective of research.** Cara believed that research in education is a difficult concept. She consistently looks at research, but often feels that there are holes in how that research can be applied to specific work or purposes within the classroom. Additionally, Cara believed that research can be manipulated to make or negate particular assertions. Cara speculated that:

> I guess it depends on how you define research, in the era of No Child Left Behind, and even still now, there's a heavy emphasis on using strategies that there's evidence to
support that they work, and it makes sense. But data is data, evidence is evidence, you can spin it any way you want.

Cara continued to explain that while research may be important, anecdotal information of how something works within a district may be just as important, if not more important Cara reasoned, “I think that certainly, peer-reviewed evidence or what have you is important, but there's also just the evidence of anecdotal evidence. Evidence that you know this particular thing works for your students. Cara believed that application in a district and the anecdotal data that is gathered from that application is often overlooked. She explained,

I think that anecdotal data gets dismissed too easily. We had Fast Forward in our district, and depending on who you talked to or what you read Fast Forward is great. Fast Forward sucked in our district, I don't care what the data said, and we got rid of it, because it wasn't effective for us.

Cara believed that research may be a starting point, but that is can cause people to limit their thinking and make assumptions about how instructional strategies may or may not work. Cara explained, “You have to have a broader perspective on what research is, saying it has to be some sort of peer-reviewed study, allows for some things to not ever be tried, that could potentially be very effective.” She believed that while many look at research, it can be a limiting factor that causes people to make assumptions about what instructional strategies will work and for whom the strategies will be most applicable, for Cara a broader concept of research was more desirable.

**Purpose.** Cara shared that there were multiple reasons for her decision to provide professional development in research-based reading comprehension strategies. According to her, the purpose of offering the professional development in the SSD was to create a comfort level
with the strategies for teachers, to build internal capacity for the use of the strategies, and to increase the organizational knowledge for teaching reading comprehension.

No direct correlation to mission, vision, or strategic plan. Cara did not think that the professional development implemented for research-based reading comprehension strategies was provided with the distinct purpose of moving the mission or vision of the SSD forward and did not feel that she could draw a direct correlation between the mission and vision and the ongoing training. Cara did assert that insomuch as the mission and vision is related to student learning, the professional development selected did support that purpose. Cara felt that every decision that was made related to the mission and the vision and therefore the purpose of professional development for research-based reading comprehension helped meet objectives toward accomplishing the mission and working toward the vision. She explained, “Continuing the professional development on reading comprehension supports our current mission and vision, but it more closely supports our goal to provide opportunities for all kids and offering a variety of ways for all students to learn.” Cara did not think that the purpose for professional development needed to be directly tied to the mission and vision. She felt that moving toward the mission and vision was an on-going process and only achieved through the culmination of multiple decisions not just what professional development was offered.

Goal: Competent and comfortable teachers. Cara recounted that the goal of professional development for reading comprehension strategies offered in the SSD was for teachers be able to implement the strategies with efficacy and confidence. Cara explained, “We wanted to have as many teachers as we could be competent and comfortable working with the strategies and working with struggling readers.” She also recalled that a secondary desired outcome for providing the professional development was for teachers to be able to assess when to provide
reading intervention to students and how to implement intervention. Cara recounted, “The other outcome we were hoping, was that we would have folks that were able to recognize when it was appropriate to use intervention and to feel comfortable implementing it.” As Cara discussed the professional development, she recalled that while it did make teachers comfortable with the strategies, she seemed doubtful that it instilled confidence around intervention. She explained,

I think that we've done a good job providing professional development for the reading comprehension strategies that are researched based and that are effective, maybe not with 100% of students, but that certainly have demonstrated a level of success.

Interestingly, we ended up on the other side of that where we ended up with some folks who were super, hyper-focused on following the strategies in terms of literacy intervention, and so we've had to sort of have to back up a little bit and explain this is one of our tools, not the only tool.

While the goal and desired outcome was that the professional development would provide teachers with the competence and confidence to institute the new reading comprehension strategies, Cara speculated that while the teachers became competent they did not necessarily become confident. Cara implied that instead the teachers became highly dependent on the learned strategies and were hesitant to use other intervention strategies. Cara recognized that the professional development offered would need to create greater capacity for addressing reading comprehension issues.

**Building capacity.** Cara recalls the decision for the SSD to begin professional development for reading comprehension strategies was also to build capacity of the teachers to deliver a well-balanced literacy program. Cara explained, “At this point, in the last few years, really, it's been making sure that we continue to build to our capacity for folks to be able to
implement solid reading comprehension strategies.” Cara felt that the professional development that had been implemented was designed to make sure teachers had a variety of strategies by which to provide instruction. Cara described that she wanted to provide classroom teachers with the ability to build on the tools that they had, and cull some of the tools that were not as effective. According to Cara,

    Part of what we needed to do was to figure out how, if, and when the reading comprehension strategies fit into the whole construct. But we also learned and had to recognize that we needed to start phasing out some of the emphasis on guided reading, because folks were getting a little bit too much of the tunnel vision.

Cara explained that the professional development that the SSD provided on reading comprehension strategies had been ongoing so that all staff had the opportunity to build their capacity to use research-based reading comprehension strategies. Cara reasoned, “You can never have enough tools in your toolkit, and I struggle with our most veteran teachers. They think they have all the tools, but many of them don’t have toolkits for today's kids.” Cara described building capacity as knowing what to do for students and when to do so. Cara speculated that “improving practice, that’s paramount, we don’t just want folks to implement the strategies, we want folks to recognize when it's appropriate and when it's not, it's not just about being able to implement, it’s being able to understand.” Cara expressed a desire to have teachers deeply understand the reading comprehension strategies so that they could build on their capacity as professionals and core organizational knowledge to deliver timely and meaningful instruction to students.

    Greater organizational knowledge. Cara did not purport that her decision to provide professional development in reading comprehension strategies was made for the purpose of
school improvement; instead, Cara explained that creating greater organizational knowledge and understanding was more of the focus. Cara was clear that it was not just about building the organizational knowledge of the reading comprehension strategies, but to be sure that it was also maintained. Cara recalled, “It was not just building the capacity, but making sure that as folks came into the district, because of turnover, that they're trained at the same level as other folks.” Cara continued by sharing, “We didn’t just train our new staff; we made sure that our current staff was being refreshed. So, not just trying to catch the new people up, trying to keep everybody fresh.” Cara felt that by providing ongoing professional development in the reading comprehension strategies the SSD was building and maintaining internal capacity for the strategies and organizational knowledge about the strategies.

**Antecedents to deciding professional development.** Cara shared the different decisions that took place in her school district prior to offering professional development for research-based reading comprehension strategies. Among these decisions was determining needs, providing opportunities for input, and deciding how the professional development would be implemented.

**Needs: Data, consults, and obligations.** Cara shared that making decisions about needs related to professional development is a combination of looking at data, consulting with teachers and administrators, and being sure to meet the obligations that are set out for school districts in New Hampshire. Cara explained,

> We collect and examine data, as well as what I become aware of and where it seems like there might be needs, also what principals voice as things that they'd like to see, what Jackson, [the Director of Curriculum], might voice the district needs. In addition, I have to be cognizant of what's happening at the state level.
Cara shared that once these are considered she makes a determination of what the needs are related to professional development.

Cara shared that in making the determination that reading comprehension instructional strategies were a professional development need, Cara recounted that the data was the clear driver. Cara recalled, “Our student [reading] test scores were awful, not just one group, they were all over the place, we knew we needed to do something.” Cara shared that she met with building principals and the Director of Curriculum and asked them to talk to teachers to determine what teachers believed was the greatest need for professional development. Cara recounted, “everyone seemed unsure, so we spoke to a reading consultant, who ran data groups for us and helped give everyone some direction.” Cara distinctly remembered when she realized the professional development need.

I was with a group and we were looking at fluency and accuracy scores, they were fine, then we looked at reading comprehension and I thought, this is it, the students can decode, but they aren’t taking in what they are reading. I knew then, I still had to talk to teachers and include them in the process, but I knew reading comprehension was the professional development need.

Cara shared that shortly after her realization; the team she was working with came to the same conclusion, that reading comprehension instructional strategies were where the greatest professional development need was. Cara looked to the local expertise on the team to help with decision-making.

**Reading specialists participated in decision-making.** Cara recounted that reading specialists were very involved in the decisions related to professional development for reading instructional strategies, particularly once the needs for professional development in that area was
determined. Cara recalled that, “the district literacy specialist, kept me up to speed on where they were, developing and implementing a district-wide plan.” Cara also shared that reading specialists were the primary group that she and Jackson, the Director of Curriculum, discussed the next steps for professional development. Additionally, Cara explained that Jackson also worked with principals to make sure that she was aware of what principals and teachers felt about the professional development plans. Cara shared, “Jackson met with principals regularly, and had conversations with about what they're hearing at the building levels, and then he was able to come back and say ‘Here's what's coming from the field, this is what they’re looking for’.” Additionally, Cara worked to make sure that Jackson, the Director of Curriculum, had significant input into the decision-making process for the professional development. Cara shared, “Buck stops with obviously me, but Jackson, he's that final lens, that's his job. He's demonstrated that he has good judgment, that he uses what I feel are acceptable processes for coming to a decision.” Cara recollected that decision-making involved working with the administration, working closely with the expertise of the reading specialist, and gathering information from the staff, to make decisions related to professional development for reading instructional strategies in a collaborative way. However, research did not necessarily have to be part of that process.

Did not need research because strategies had previous established efficacy. Cara felt that it was not necessary to do new research as part of the decision process related to the professional development for reading comprehension strategies in the SSD. Cara explained, “I was pretty well-versed in the strategies before I came here and the reading specialist was also well-versed.” Cara shared that she did not think that as part of the decision-making process for the professional development, the reading specialist, and administrators needed to spend time on
reviewing research because the strategies already had significant research support that was generally known and accepted. Cara shared, “I already had a good foundational understanding of the strategies and how it fit into the larger picture. So, it was really more drawing on our experiences and consulting any current research.” Cara shared that when she and Jackson, the Director of Curriculum, reviewed the current research she decided that the group could move on in the decision-making process. Cara recalled, “We looked at the current research and it was still pretty consistent that it's effective.” Cara shared that re-establishing and reviewing research was not a necessary step in the decision-making process for the professional development because the efficacy of the strategies had already been established. The primary consideration that remained was how to implement the professional development.

**Implementation: Local expertise and outside coaching.** Cara explained that a specific long-term plan for professional development was not decided on for reading comprehension strategies in the SSD. However, Cara did share the decisions that were made to regarding the implementation of the professional development. Cara summarized, “What we have done is really our reading specialists were our main, our primary implementers of professional development I would say.” Cara encouraged others to become trained, but there was tentativeness on behalf of the reading specialist about doing so. Cara recalled, “We tried to encourage others to provide professional development once they were trained as well, but the reading specialists were a little hesitant. They feel like no one can do it like they can, I think.” More recently, Cara decided to bring in a consultant to act as a coach, she explained, “We wanted to see more coaching in the classrooms, so the consultant did a lot of coaching.” Cara’s decision to provide coaching was based in her belief that it is a highly effective way to provide embedded professional development. Cara explained, “The stand and deliver is great, but then to
kind of just go and do it on their own without someone there next to them that's where you start to lose some of that consistency and implementation.” Cara explained that she and the Director of Curriculum reconsidered decisions about the direct instruction professional development because they wanted the reading comprehension strategies to be implemented with fidelity. Cara recalled, “we went back to the drawing board and looked at what had worked for us, it was someone who could build relationships with teachers and actually be in their classrooms, so we brought in a coach.” Cara’s decisions related to coaching were able to create a new level of professional development for the reading comprehension strategies in the SSD.

**Contextual considerations.** Cara discussed the context of the demographics in her district and the resources available for professional development. Additionally, Cara discussed how her decisions are situated in the context of one of the poorest towns in New Hampshire.

**Demographics play a central role.** Cara explained that demographics play a central role in decision-making for professional development in the SSD. Cara stated quite clearly, “demographics definitely comes into play, it enters into our conversation regularly about what services we have in place, what we're already doing for students and staff. Actually, it comes into the conversation a lot.” Cara continued by explaining the economic circumstance of one of the towns in the SSD. Cara shared, “We have one town in our district that's one of the poorest in the state, students come less prepared, and teachers are not always ready for those students.” Cara continued by sharing that in her district, parent involvement of students with a lower socio-economic status is often not as high as other students. Cara stated, “The higher your free and reduced percentage the lower your support from parents is.” Cara continued to explain that at times decisions related to professional development are made specifically based on demographics. Cara shared,
We have to help our staff better understand the needs of their kids, recognizing kinda what these kids have, what they're coming from and how that impacts their ability to attend in school. We've done a lot of training, because if we see that there's a school or there's a group of teachers, or whatever, that doesn't really seem to understand their clientele. Then we need provide professional development that will help out with that.

Cara shared that in regard to the professional development for reading comprehension instructional strategies, that demographics may have played a role in the need to provide the professional development. Cara surmised, “With our lower SES [socio-economic status] students, there are less books being read at home, less exposure to literature, those types of things. So, it's part of our typical conversations related to what we need to offer teachers.” Cara elaborated by explaining that demographics is a central part of the conversation. Cara articulated, “it's a focus for us, knowing our population, we look at the kiddos who come to us in kindergarten and first grade, and the wide variation in the skills that they come to us with, it has to be part of the conversation.” Cara reasoned that demographics is a central part of the conversations that take place in the SSD related to professional development because it is important to be sure that teachers are ready to support the students in the SSD. The socio-economic situation in her district is always a consideration for Cara, particularly when it comes to resources.

**Dependent on grant funds.** Cara shared that the SSD is dependent on grants to fund their professional development and therefore financial considerations are part of the decision-making process. Cara explained, “District professional development initiatives tend to be mostly funded through IIA. So, keeping an eye on that and recognizing that if we allocate a chunk out of title IIA for this, what are we not able to allocate a chunk out of Title IIA for?” Cara
continued by explaining that there are specific parameters that the professional development has to meet in order to be grant funded. Cara elaborated, “So, we can use the money, but we have to make sure that it will qualify for the grant, which was fine with the reading [because] the big part is that it be research-based.” Cara further elaborated by explaining that the limited grant funds cause the decision process to include prioritization. Cara illustrated using the example of the professional development for reading comprehension strategies. Cara shared,

We have had to start to try to back away and kind of step down our training, so that we can allocate funds elsewhere, making sure that we still have the capacity within our district to meet the goals but to offer some other things as well.

Cara indicated that the SSD has to consider financial resources as part of the decision-making for professional development; however, time is less of an issue for the SSD.

Cara indicated that lack of time is not a consideration when making decisions about professional development, because the SSD has significant professional development in the annual professional calendar. Cara explained, “We're fortunate that we have a calendar now that I don't have to worry about time for professional development, student days are by hours so we have 12 days for professional development.” Cara acknowledged that while she does not particularly care for the hours-based calendar for students, she does appreciate that it provides sufficient time for the SSD to offer professional development opportunities. Cara believed that time was an abundant resource for professional development, but a constant consideration was the poverty and tax rate in one of the SSD towns.

**Poor community, high taxes.** Cara shared that attributes of the community, specifically the poorer town, was something that she frequently took into consideration. Cara explained, “We know that when those kids come in, that there will be some kiddos who are gonna require
more because they aren't necessarily exposed to the same opportunities as some of their peers.” She implied that this is part of her decision-making for professional development. Additionally, Cara expressed concern about one of her communities,

    We have one town in our community that's one of the poorest in the state, and their tax rate has skyrocketed in the last few years just because of the funding, you know adequate adequacy funding and stuff like that, so there's been a lot of bickering, there's been a lot of finger pointing. They are watching our spending really closely, even when we use grants, they ask questions about why we do professional development, I have to have solid answers.

Cara indicated that the structure of the organization did not necessarily play a role in decision-making for professional development beyond resources and calendar. Cara speculated, “We can do more professional development during the professional year than most districts, which is something I can count on when we make professional development decisions.” Cara articulated that the community financial situation, particularly one town, were factors that she and the SSD have to take into consideration when making professional development decisions.

**Summary of Cara.** Cara discussed her belief that decisions should be made as part of a team decision-making process. Cara also shared that professional development should provide the necessary attributes to improve practice of teachers. Additionally, Cara shared her belief that research is not necessarily able to replace the anecdotal information that is available in school districts. Cara’s school district invested in professional development for reading comprehension strategies, and she explained that the district did so improve learning and opportunity for students, to build capacity within the district with the strategies so that teachers would become more comfortable and confident in applying the practices. Additionally, she indicated that in
order to build capacity across the district the professional development was also offered create and expand core organizational knowledge about reading comprehension strategies. Cara and the SSD made a number of decisions prior to deciding that professional development was necessary for reading comprehension strategies. She indicated that after working with a reading consultant, the district decided the needs for the professional development based on student learning data. Cara worked in conjunction with reading specialists to determine the types of professional development that would be offered and how the professional development would take place.

Matthew

Background. Matthew Carr is Superintendent of the Dell School District (DSD), a suburban school district that serves approximately 2,200 students with a free and reduced population of 28%. Based on the free and reduced population the District is considered in middle third of all school districts in the state. Matthew has been the superintendent of the DSD for five years. The DSD has been providing professional development for the use of technology to aid instruction for the last several years. Prior to coming to the DSD, Matthew was an assistant superintendent for another New Hampshire school district. Additionally, when Matthew was a classroom teacher, he frequently provided professional development for multiple school districts on how to use technology in the classroom. Matthew brings 22 years of public-school experience and while he is the least veteran of the participants, he is the only participant who was involved with professional development decision-making in all of his public education roles. Matthew’s narrative provides a detailed review of his beliefs and experiences with decision-making for professional development in the DSD. Table 6, Overview of Matthew’s Narrative, provides a preliminary overview of Matthew’s narrative.
Table 6

Overview of Matthew’s Narrative

<table>
<thead>
<tr>
<th>Beliefs</th>
<th>Purpose (s) of Professional Development</th>
<th>Antecedent Decisions</th>
<th>Contextual Considerations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Decision-making should be highly collaborative</td>
<td>Move the DSD strategic plan forward</td>
<td>Formed committee</td>
<td>Balance time</td>
</tr>
<tr>
<td>Professional development should improve teacher practice</td>
<td>Empower teachers to take risks</td>
<td>Selected pilot teachers</td>
<td>Resources</td>
</tr>
<tr>
<td>Research is important, but may be difficult for some professionals to manage</td>
<td>Increase organizational knowledge with an innovative imitative</td>
<td>Reviewed different sources of research</td>
<td>Highly engaged staff</td>
</tr>
</tbody>
</table>

Beliefs. Matthew shared his beliefs about decision-making, professional development, and research. As he discussed his beliefs, he spoke about his ability to make decisions in conjunction with others as well as independently.

Decision-making: Multiple perspectives, collaboration, and communication. The ability to make decisions, according to Matthew, is one of the reasons that he became a school district leader. Matthew explained that he is not hesitant to make difficult decisions and he expressed his belief that often school district leaders earn their positions because they are not reticent to make decisions. Matthew continued to elaborate that he believes that, at times, decisions are not made and the unfortunate result is that districts do not progress because decisions have not been made.

While others look to school district leaders to make decisions, Matthew believed that it is the responsibility of school district leaders to communicate and collaborate about decisions and decision-making. According to Matthew, the best decisions are made when the decision maker
surrounds himself or herself with a strong cross section of points of view and perspectives.

Matthew shared his thoughts about his belief by saying,

I think decision-making is extremely important but it has to be well communicated [and] collaborative… When I'm in a room with my leadership team and there's 17 to 20 people at the table all with unique experiences, and education levels, and varied perspectives, what they say is much more important than what I say, based on what's going to work with their stakeholders, and their groups, and their communities, and their teachers, and their students. So, the biggest resource for decisions is the collection of minds that you have at the table.

Matthew believed that the decision outcome is his responsibility. Matthew explained, “You got to back it up, if you're going to make decisions, you better be the one to take the hits if it doesn't go well, and put others in front of you when it does go well.” Matthew believed that not only should the decision-making be a collaborative and shared process, but that the credit for the outcome of the decision, if it is positive, should be shared as well. Matthew indicated that when making decisions related to professional development, improving practice should be the key tenet.

**Professional development should be about improvement of practice.** Matthew defined professional development as “activities, collaborations, networking, whether they're on campus formal or informal, or off campus that are responsive to teacher needs, provide them with skills, mindsets, and strategies that they can use to impact students in more meaningful ways.” Matthew believed that professional development has to have a perceptible outcome that affects teaching and learning, he stated,
It's not just sitting in a session and hearing about something without having a strategy or something that you can try to put into place. I think professional development has to provide some sort of tangible skill that you can employ or strategy that you can use in your planning, and in your instruction, and in your assessment that you can reflect on and determine whether or not it's having impact on the students. So, it makes you more effective in your job.

Matthew believed that professional development must improve practice. According to Matthew, “After all is said and done the most impactful thing, we can do to improve student performance is put a skilled teacher in front of them.” Matthew also believed that if professional development is not for the improvement of practice, then it was not worthwhile. Matthew shared, “I think if it's not timely, it's not well planned, and you're doing it to check something off on a box you should skip it.”

Matthew believed that since coming to the DSD, that improvement of practice through professional development has been emphasized. He pointed out, “It's always what we're focused on continually and consistently delivering messages to people about the fact that professional development is providing opportunity for specific and individualized pedagogical professional development all with an eye towards improving practice.” Matthew also believed that DSD has used creative ways to bring professional development to teachers. Matthew explained “We try to think of the most effective way to bring it to teachers, and maybe that's by doing focus groups that teachers lead themselves.” Additionally, Matthew believed DSD professional development was designed to be supportive of teachers. Matthew explained that the DSD’s approach is designed to “make sure that our instructors have skill and feel like they can continue to evolve and grow in their profession, and have plans and resources, and a background that allows them to
implement a strategy.” Matthew believed that in order to improve instruction and teacher skill the DSD created a supportive system of professional development that led to the improvement of practice. Improvement of practice, according to Matthew, should also take research into consideration.

**Depends on the level of research.** Matthew believed that research is important to inform practice and decision-making, but he cautioned that the type of research was important to consider. He explained that consideration of research “depends on the level of research, like if we're talking about heavy academic research, I think it would be overwhelming for people. There are some folks that are equipped for it and there's other folks that aren't.” Matthew believed that if people become overwhelmed with research, they can have difficulty understanding how that research is embedded in specific instructional strategies.

Matthew believed in every system there need to be people who understand and can explain how research informs particular instructional strategies. Matthew emphasized that in order to be sure that research-based instructional strategies are applied with fidelity, professional development for those strategies needs to include “people in the system who are equipped and ready to dive in [to research], but then they need to be able to parse it out [research] to people in meaningful ways.” Matthew believed that the level of research needs to be appropriate to the audience so that the professional development or the instructional strategies do not become subjugated to people attempting to understand and internalize the research.

**Purpose.** Matthew indicated that there was a variety of purposes for the decision to provide professional development in technology-based instructional strategies to the teachers of the DSD. In his explanation, Matthew indicated that the strategic plan, the empowerment of
teachers, and being innovative were all reasons for pursuing professional development in technology-based instructional strategies.

**Major part of the strategic plan.** The purpose of developing and implementing professional development for technology-based instructional strategies was driven almost entirely by the strategic plan for the DSD, according to Matthew. Matthew explained that since technology-based instructional strategies were so clearly part of the strategic plan that the professional development offered had to meet that purpose. Matthew explained that following the development of the strategic plan, “it bubbled to the surface as a priority area, [so] we had to have professional development for technology-based instructional strategies, or there would be no way to accomplish the objectives of the plan.” While Matthew did not mention the mission or vision, he did indicate that the strategic plan was the way in which they were moving toward the mission and vision of the DSD. Matthew did not appear to think that the purpose of professional development was exclusively to work toward the mission and vision, but he did feel that without professional development for technology-based instructional strategies, the strategic plan would not be accomplished. Additionally, Matthew believed that the professional development would begin to more the DSD toward empowering teachers.

**Goal: Empower teachers.** Matthew summarized that the purpose of professional development for technology-based instructional strategies in the DSD was to empower teachers to effectively engage students. When explaining how the professional development helped to reach this goal, Matthew shared that the DSD set annual goals and among those annual goals was the goal to “empower teachers to use technology in effective and engaging ways to augment their instruction and to increase learner engagement and outcomes.” Matthew recollected that the professional development provided an opportunity to focus teachers on the effective use of
technology as an instructional tool. He articulated, “The best way to improve student outcomes is to empower, evolve, and grow staff. By committing time, energy, and resources towards our staff, to improve their skills with technology, I hoped that it would be the case.” Matthew believes that the professional development did not disappoint him, according to Matthew, the follow up surveys, discussions with teachers, and work produced by students has indicated that the desired outcome was achieved. Matthew indicated,

People felt very professionally engaged and we surveyed their students, those surveys, the results, were overwhelming that not only did the students feel like their experience was engaging, the teachers felt empowered. That was one of the things that we were looking to do in both cases, was empower our professionals and further engage our students.

Matthew shared that the feelings of success from teachers and students have turned into a way to scaffold professional development for others. He recounted that following one or two successful lessons teachers would share with other teachers what they had done and how it had worked. Matthew feels that the desired outcome was achieved, he explained, “At their building level, teachers would showcase to their colleagues what they were doing. Some of them hosted professional development because they were feeling good about what was going on, so they were able to share that.” He also speculated that based on the success in the past, the DSD would continue to provide professional development in technology-based instructional strategies.

Matthew shared, “We'll continue to look at our professional development calendar with an eye towards the long-range plan which includes our effective use of technology-based instructional strategies.” Matthew elaborated that the DSD would begin to look at both internal and external
professional development providers to continue to work toward the goal of having teachers feel empowered to use technology as an instructional tool in their classrooms.

**Innovate and take risks.** Matthew articulated that part of the decision to provide professional development for technology-based instructional strategies was to encourage innovation and risk-taking on the part of teachers. According to him, professional development should always improve practice, but at the same time, being innovative can help teachers grow and evolve and educational practice grow and evolve. Matthew surmised, “Our PD was a blend of what's always worked, but also what can make you sharper or make practice better or more efficient through a different venue.” Matthew wants to encourage teachers to use new and different strategies and he believes that technology-based instructional strategies are the key to doing this. According to Matthew,

I use [professional development] not only in a new and innovative way, but as a let's work smarter not harder kinda way and here's a new tool for your toolbox that may replace four old tools. So, I try to highlight the efficiency along with the engagement and the new just because it was best practice before doesn't mean it's a best practice now, they used to put kids in rows and group them by ability level all the time.

Matthew used the professional development provided for technology-based instructional practices to encourage teachers to try new strategies. He wanted teachers to know “that we're there to support them and that we'll support innovative risk taking and we're not doing things to catch them making mistakes.” Matthew explained that this is not always easy, because teachers are hesitant to stop using practices that have been successful. Matthew explained that in the DSD “people are sometimes loathe to get rid of something out of their tool box.” However, through professional development for technology-based instructional strategies, Matthew
postulates that he may be able to assist teachers in being flexible to meet student needs. Matthew explained, “We're trying to serve a need and needs aren’t black and white, they’re ever evolving, and we want to make sure that we're nimble and agile enough to pivot and to meet those needs.” Matthew made the decision to provide professional development in technology-based instructional tools to give teachers the opportunity to practice and engage in taking risks to improve classroom practice and to use new tools for student engagement.

*Increase internal knowledge.* Matthew did not share that his decisions for professional development in technology-based instructional strategies were made for the purpose of school improvement. Instead, Matthew focused on the concept of organizational knowledge, which he referred to as internal knowledge, as the purpose of professional development for technology-based instructional strategies. According to Matthew, his decision to provide the professional development was, in part, to build organizational knowledge. Matthew explained, “We [kind of] tried to build and foster that internal knowledge.” Matthew also explained that the expectation of teachers participating in the professional development was to share that knowledge following the sessions. Matthew recounted, “then we in turn say, this is how you're going to pay that forward, we've invested time and resources into you and this is what we're asking you to do.” Matthew shared that this was successful: the teachers who had participated in the initial training were able to share the new knowledge with other teachers. According to him, “Then they hosted professional development at their own levels, through a faculty meeting or showing a strategy that they used in their class, so they provided professional development in various ways to 100% of the faculty.” Additionally, Matthew shared that the DSD is committed to maintaining and growing the organizational knowledge related to technology-based strategies for new and returning teachers. Matthew explained, “We have an official mentor program that we use as our
platform for providing professional development for all of our new employees to the district.” He also explained that the DSD would maintain and grow its organizational knowledge using a variety of professional development strategies. Matthew pointed out, “Whether that's connecting them with someone who's already doing it, whether that's providing some more discreet professional development, giving the baseline knowledge that they need, then we'll make that happen and we'll continue to provide formal training as well.” Matthew was confident that the decisions to offer a variety of professional development opportunities would serve, in part, the purpose of growing organizational knowledge related to technology-based instructional strategies.

**Antecedents to deciding professional development.** There was a variety of decisions that Matthew shared that lead up to the DSD offering professional development for technology-based instructional strategies. Matthew indicated that deciding what to do and how to implement it were among these decisions. Additionally, Matthew discussed who was involved in the decision-making and what research was used to support decision-making.

**Data informed, needs driven.** Matthew explained the decision process for determining professional development needs that he followed in the DSD. Matthew shared that he begins by looking at data and having discussions with staff about goals and initiatives. Matthew indicated that often those two steps indicate professional development need areas for the DSD. Matthew relayed, “We try to be data informed but we also do it based on what the leadership group is looking at and what the overarching goals and initiatives within the district are.” Matthew shared that it is not unusual for him to spend time with his administrative staff examining teacher evaluation data as a way to make a decision regarding professional development needs. Matthew shared, “We use data from the evaluation system, our elements are pretty specific and discreet
within our rubric, so if it shows where teachers are struggling and we can target professional development based on that. Matthew also conveyed that he looks to see what the trends in education are nationally and statewide when determining the professional development needs for the DSD. Matthew shared,

I often ask people to talk to their groups or to network outside of their group to find out what other people in similar situations have used or leveraged for effective professional development. So, as you know we'll reach out to neighboring districts and say, "Hey what have you done?"

Matthew indicated that speaking to other districts was how the DSD began to focus specifically on technology-based instructional strategies. Matthew explained, “We knew that there were districts that had begun to really leverage technology in a new way in the classroom, we knew that would be a good fit for the DSD.” Matthew recalled that reviewing other districts’ initiatives was not the singular determinant that led to the decision that technology-based instructional strategies were an area that called for professional development. Matthew recalled, “We certainly used data formally, anecdotally, and informally in the way that we came to the decision.” Matthew recounted coming to the conclusion with his administrative team,

So, all of it was determined collaboratively at the table, we had the strategic plan, we had building goals, we had professional development goals, we had information that was provided via our supervision and evaluation platform. So, we had the data we had the goals, and we determined that that there was a professional development need.

Matthew recollected that the determination of need for professional develop in technology-based instructional strategies was a combination of reviewing data, reviewing needs of teachers from
evaluations, and looking at the direction of instruction at the state and national level. Matthew also shared that he decided to use a committee format and pilot teachers to move forward.

**Brought in committee and pilot teachers.** Matthew recalled that following the decision that there was a need for professional development in technology-based instructional strategies, the next steps were made by a committee that included administrators and teachers, but a major role in the decision-making process belonged to a group of teachers that would be piloting the professional development. Matthew recounted, “The decision-making process on that, as most decision-making processes are in the [DSD] was very collaborative.” Matthew summarized by sharing the following,

All of that came through the professional development committee which has folks from all walks on it, and then that got reported out at administrative level meetings as well, and all of that kind of infiltrated the ultimate decisions that were made for professional development. We identified who our pilot teachers at each level we're going to be and provided them with some more discreet training so that they could help us make decisions about the professional development for the whole staff.

Matthew shared that having multiple types of staff members involved helped move the decision-making regarding professional development on in a collaborative and inclusive way.

**Institute and vendor research.** Matthew shared that research from two separate entities, the International Association for K-12 Online Learning (iNACOL) and Scholastic were reviewed as part of the decision-making process for professional development related to technology-based instructional strategies. Matthew recalled, “we looked a lot at a study from Scholastic that talked about the effective use of technology in the classroom and some may have earned some initials as a result of it, and we reviewed the work done by iNACOL.” Matthew pointed out the both
Scholastic and iNACOL had done significant work around technology-based instruction and he felt strongly that their work needed to be part of the decision-making process. Matthew shared, “So they're the leading authorities on technology-based instruction, whether it's a station rotation model, whether it's a lab approach, whether it's a whole classroom approach.” Matthew recalled that the administrators, committee members, and pilot teachers looked extensively at the research that the two groups had done. Matthew recounted, “We had a wide research and knowledge base on effective use of technology through the two, and they were the two largest factors that have impacted what we did.” Matthew believed that after reflecting on the research, the decision about what to do for professional development became more focused. Furthermore, he discussed how the professional development was instituted.

**Implement with resident experts.** Matthew shared that there was a fluid plan for the implementation of professional development related to technology-based instructional strategies in the DSD. Matthew recalled, “I knew, and as did everyone else around the table when we were talking about it, that training was extraordinarily important, so there really wasn't a defining moment where we decided, hey we should train people.” Matthew explained that the professional development implementation decisions began with Matthew and his assistant superintendent. Matthew recalled, “Both myself and the assistant superintendent are tech guys, we've used technology in the past successfully. Both have consulted using technology, so we were also able to host some of the initial trainings.” Matthew decided to begin by training pilot teachers who would then in turn train others. Matthew explained “We had 20-ish pilot teachers from all different levels, all different buildings across the district, and they served as pilot teachers we trained these teachers, we met with them.” Matthew explained that the next step was for those pilot teachers to share what they were doing in faculty meetings and to offer to train
Matthew shared, “The decision to have teachers train teachers was about teacher self-efficacy, if a teacher sees another teacher doing something, they believe they can do it too.” Matthew decided that having the pilot teachers offer training was a practical approach that he believed would be successful. Matthew recounted, “We had people do a self-assessment as to where they were and allowed them to sign up for differentiated professional development that was hosted by their colleagues.” Matthew explained the decision to differentiate the professional development,

I truly recognize the fact that if you don’t use it, if you're not a practitioner of it, then you feel like it's hard to get connected to it. So, therein came one of the reasons why we differentiated our approach to it for our professionals, and we want to cultivate and support a culture of appropriate risk taking too.

Matthew feels that the decision to keep the professional development plan fluid allowed the DSD to respond appropriately to the different needs of the professionals involved in learning to implement technology-based instructional strategies.

**Contextual considerations.** Matthew discussed the contextual considerations that affect his decisions in the DSD, particularly as they related to professional development. Throughout the conversation, Matthew indicated that the contexts of the community and the organization generally work in favor of positive and progressive decisions related to professional development.

**Demographics.** Matthew shared that demographics did not play a role in the decision process to provide professional development in technology-based instruction, but it does play a general role in decision-making about other professional development opportunities in the DSD. Matthew began by sharing, “Well, we certainly looked at the book *Teaching with Poverty in*
Mind, so we know that poverty impacts us in various ways. We make decisions that allow us to provide general, as well as targeted professional development.” Matthew continued by explaining that he has to make decisions related to professional development that are cognizant of demographics. Matthew explained,

It certainly makes us aware of certain aspects of what we should be focusing on, whether it's mental health or transition, or working with students’ unique needs based on their demographic or impacts on individual students and what's happening with their family structure.

Matthew related that professional development decisions in the DSD are generally made with demographics in mind, but that was not the case in the decision to provide professional development for technology-based instructional strategies. Matthew indicated that time and funding are greater considerations than demographics when making decision related to professional development.

**Balancing time and grants.** Matthew expressed that resources do play a role in decisions related to professional development in the DSD, particularly in trying to balance time and money across competing priorities. Matthew shared, “With grant funds and PD resources embedded in your budget, it really kind of depends on the time of year and what funds have been spent already, [as well as] how you can balance what needs to be done with other priorities.” Matthew indicated that the DSD has to prioritize the use of fiscal resources and time to be sure that it meets the grant obligations and simultaneously completes initiatives that it has begun. Matthew explained,

We'll continue to make sure that we have the resources to support those needs, while not inundating those with other requests we'll continue to look at our professional
development calendar this year with an eye towards the long-range plan, which includes our effective use of technology in instruction.

Additionally, Matthew indicated that while the annual professional calendar has time for professional development, time is still a consideration when making decisions related to professional development. He shared “We have embedded professional development days, we have people that are captive for lack of a better term, for professional development but we use that time quickly, there never seems to be enough.” Matthew continued by saying, “You know as a district leader yourself, we are time bound to the amount of professional development we can require teachers to partake in, we have six professional development days embedded as part of our contract, we make it work.” Matthew shared that when making decisions for professional development in the DSD, he has to consider time, grant parameters, and priorities that compete for those resources in the DSD. Another consideration for Matthew is the highly engaged staff in the.

Engaged staff. Matthew counted himself fortunate in that the considerations during the decision-making process for professional development tend to be how he can best meet the needs of his highly engaged staff, particularly when it came to professional development for technology-based instructional strategies. Additionally, Matthew indicated that as long as he continues to be able to access grants, the community has been generally supportive of the direction of the DSD and is not a consideration when making professional development decisions. Matthew shared, “We had the resources, the time, and the manpower, the space, and we had active participants that are professionals who were engaged and that they were willing to put forth the effort that's required to be successful.” Matthew did indicate that he has plans to more actively engage the community in the decision-making process and he anticipates that this
may have some impact on professional development decisions in the DSD. Matthew shared, “We're looking to find efficient ways to get various perspectives from stakeholders. The days of holding an open house and open forum I think are probably behind us, because often times people don't show up for those.” Matthew feels that he is able to leverage the high levels of engagement of his staff when he is making professional development decisions, and he is seeking ways to better engage his communities in the decision-making process.

**Summary of Matthew.** Matthew shared his belief that decision-making should be a highly collaborative process that includes multiple perspectives. Matthew also shared his belief that professional development should be designed to improve teaching practice. Matthew believed that research was important, but indicated that different types of research may be more manageable to apply than others. When considering the purpose for professional development in technology-based instructional strategy, Matthew indicated that the decisions were made because the professional development would move the DSD forward in the strategic plan, empower teachers, create an innovative initiative, and increase the organizational knowledge of the DSD. Before deciding to offer professional development in technology-based instructional strategies, Matthew and his colleague in the DSD made a number of other decisions. The need for the professional development was reviewed by looking at a number of different data sources, a committee was formed and pilot teachers were selected, research from iNACOL was reviewed and the DSD decided to do a fluid implementation for the professional development with local resident experts. When making decisions related to professional development for technology-based instructional strategies, Matthew considered several contextual elements specifically, how to balance time and resources as well as how to provide for the highly engaged staff of the DSD.
Summary

This chapter summarized the narratives and findings of the interviews with six school district leaders in New Hampshire as they shared their experiences of making decisions related to professional development for a research-based instructional strategy. The decision-making process of each school district leader was described in detail as were their thoughts and beliefs related to professional development, decision-making, and research. Four major themes emerged related to school district leaders’ decision-making processes for professional development of a research-based strategy. The first theme was the role of beliefs in the decision-making of school district leaders. The second theme was the importance of purpose for the professional development in the decision-making process of the school district leaders. The third theme was the number of antecedent decisions that school district leaders considered during the decision-making process. Finally, the role of context and contextual considerations was a theme in the school district leaders’ decision-making process for professional development. Each theme had a number of sub-themes that surfaced in the participants’ narratives. Moreover, there were similarities and differences across the participant narratives. Major ideas that emerged within the narratives will be discussed in Chapter Five.
Chapter Five: Discussion of the Findings

Introduction

This purpose of this narrative study was to examine the experiences of school district leaders related to decision-making for professional development, specifically the professional development for research-based instructional strategies that the school district leaders had recently implemented in their districts. Six participants were involved in the study. Table 7, Backgrounds of Participants, reviews the information of each participant and the districts in which they work.

Table 7

*Backgrounds of Participants*

<table>
<thead>
<tr>
<th>Participant</th>
<th>Role</th>
<th>District Population</th>
<th>Free and Reduced</th>
<th>Years in position</th>
<th>Research-based strategy</th>
<th>Professional development decision-making</th>
</tr>
</thead>
<tbody>
<tr>
<td>Grace</td>
<td>Superintendent</td>
<td>1,350</td>
<td>47%</td>
<td>7</td>
<td>Competency-based instruction</td>
<td>Little previous PD decision-making</td>
</tr>
<tr>
<td>Spencer</td>
<td>Superintendent</td>
<td>400</td>
<td>15%</td>
<td>6</td>
<td>Reading Instruction</td>
<td>Consistently in administrative roles</td>
</tr>
<tr>
<td>Tyler</td>
<td>Director of Curriculum</td>
<td>1,045</td>
<td>40%</td>
<td>19</td>
<td>Fundations-early literacy</td>
<td>Consistently in administrative roles</td>
</tr>
<tr>
<td>Abigail</td>
<td>Director of Curriculum</td>
<td>2,100</td>
<td>6%</td>
<td>8</td>
<td>Responsive Classroom</td>
<td>Significant in administrative roles</td>
</tr>
<tr>
<td>Cara</td>
<td>Superintendent</td>
<td>1,450</td>
<td>34%</td>
<td>4</td>
<td>Reading comprehension</td>
<td>In two most recent roles</td>
</tr>
<tr>
<td>Matthew</td>
<td>Superintendent</td>
<td>2,200</td>
<td>28%</td>
<td>5</td>
<td>Technology-based instructional strategies</td>
<td>In all roles of his career</td>
</tr>
</tbody>
</table>
The central question for this research study was: How do school district leaders make decisions about professional development for research-based instructional strategies? This chapter discusses the findings of the research study by reviewing them in relation to the research question and the literature, as well in relation to the theoretical framework. Additionally, this chapter discusses the implications for practice, the implications for research, and the limitations of the study. The chapter reviews the four major themes and each of the sub themes of the findings as they relate to the research question and the literature, reviews the findings as they relate to the theoretical framework, discusses reflections, implications, and limitations of the study, and ends with conclusion of the research performed.

In Chapter Four, the findings from interviews with six school district leaders were examined to explore the research question for this study, how do school district leaders make decisions about professional development for research-based instructional strategies? By examining each of the narratives of the participants, answers to the research question surfaced in the form of themes. Four major themes emerged, (1) role of beliefs (2) the primacy of purpose, (3) antecedents to deciding professional development, and (4) contextual considerations. Additionally, each theme also had a number of sub themes as shown in Table 8, Summary of Themes and Sub-themes.

Table 8

*Summary of Themes and Sub-themes*

<table>
<thead>
<tr>
<th>Theme</th>
<th>Sub-theme 1</th>
<th>Sub-theme 2</th>
<th>Sub-theme 3</th>
<th>Sub-theme 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Role of beliefs</td>
<td>Importance of collaboration</td>
<td>Professional development for growth and development of teachers and district</td>
<td>Professional development should improve teacher practice</td>
<td>Role of research in decision-making for professional development</td>
</tr>
</tbody>
</table>
This chapter is organized in the following sections, findings as they relate to the research question and literature, findings as they relate to theory, reflections, implications for practice, implications for research, limitations of this study, and a conclusion.

**Findings As They Relate to the Research Question and Literature**

In examining the findings as they relate to the research questions this section will review the themes that emerged from the school district leaders’ narratives. Additionally, this section will review how the findings and the themes relate to the literature regarding decision-making by school district leaders, particularly where the literature aligned with the findings and conversely where the literature and the findings may be contrary.

**Theme one: Role of beliefs.** The six participants shared their individual beliefs regarding decision-making, professional development, and research. The beliefs that the participants shared emphasized the importance of collaboration in decision-making, that professional development should be designed for the growth of teachers and improvement of practice, and that research was important in the decision-making for professional development. When examining the narratives of the participants, the decisions that they shared were most often consistent with the beliefs that they professed. All of the participants evidenced this multiple
times across their narratives. For instance, Grace discussed the importance of moving the district toward the vision and she consistently revisited this concept when she was discussing her decision-making and the decision of the TSD to provide professional development in competency-based instructional strategies. Additionally, Spencer emphasized the importance of collaboration and he spoke often about how the decisions related to providing professional development for reading instructional strategies were made in conjunction with a committee of teachers. There were numerous examples of alignment of beliefs with the practice of the school district leaders in this study and this is consistent with the literature on decision-making by school district leaders (Brazer et al., 2010; Jenkins, 2007; Major, 2013; Marshall & Scribner, 1991; Patterson et al., 2006). Also consistent with the literature (Brazer & Peters, 2007; Hallinger, 2011; Hooker, 2000), the outcomes of the decisions in their individual districts also seemed to be aligned with the values of the school district leaders that participated in this study. The most poignant example of this was Matthew who shared the belief that there should be multiple perspectives involved in decision-making and the outcome was that there were many people involved in a variety of ways, with the decision of the DSD to provide professional development in technology-based instructional strategies.

**Importance of collaboration.** Each of the district leaders shared the belief that collaboration was essential to decision-making. The decision makers discussed the different reasons they believed it was important to have others involved in decision-making. Grace and Tyler discussed that having others involved in the decision-making helped teachers understand the decision made and added legitimacy to the decisions, while Spencer and Abigail discussed the value of teacher input into the decision-making process. Moreover, Cara discussed the importance of working with other to ensure that her decision-making was appropriate and to
obtain feedback on her decisions. Matthew found value in the multiple perspectives that others brought to the decision-making process. While each of the school district leaders had a different way of looking at collaboration, all of the school district leaders found ways in which to work collaboratively as part of the process for decision-making for professional development in the research-based strategies in their district.

Spencer involved teachers the most in his decision-making about both the research-based strategies and the professional development that would be offered. This is contrary to the literature that indicated that male superintendents tended to use a more hierarchical approach to decision-making (Brunner, 1998), but consistent with the literature regarding collaborative decision-making built on core values (Ewbank, 2011). Additionally, Grace and Cara involved administrators to a greater extent than teachers and indicated that the decision outcome was often dependent on what each of them as leaders could support. This is consistent with the literature that asserted that school district leaders work collaboratively, but the decisions are often still what the school district leaders favors (Brazer & Peters, 2007; Brazer et al., 2010). Also consistent with the literature Abigail and Tyler were successful at promoting decisions and collaboration when they worked to gather input from teachers on potential decisions and to also get feedback on the decisions that were made (Clark & Clark, 2002). While the school district leaders differed in how they approached collaborative decisions, and to a certain extent what qualified as a collaborative decision, all of the school district leaders valued collaborative decision-making as part of the decision-making process for professional development and consistent with the literature instituted decision-making processes that aligned with this value (Brazer et al., 2010; Jenkins, 2007; Major, 2013; Marshall & Scribner, 1991; Patterson et al.,
2006). Similarly, some of the school district leaders believed that professional development was a tool that helped teachers grow.

**Professional development for growth of teachers and the district.** A majority of the participants shared that they believed that professional development should help teachers grow and develop while simultaneously supporting the long-term mission and vision of their districts. Grace emphasized, professional development in her district was the cornerstone of moving the district toward that long-term vision, an idea that is consistent with the literature that organizational learning is important for working toward strategic outcomes (Crossan et al., 1999). Additionally, Spencer and Abigail both discussed their belief that there was an individual aspect to professional development that has to be addressed in order for the professional development to provide value to the district. Furthermore, Abigail and Cara both discussed the importance of having a plan that specifically outlined how professional development would help the district reach targets and how the teachers would be supported as part of that professional development. By working from their belief that professional development would help teachers as well as the district grow, the school district leaders were aligning their practice with their beliefs as well as with the literature that asserts that organizational learning is important for both the individual and the institution (Crossan et al., 1999; Edmondson & Moingeon, 1998). While the majority of the school district leaders indicated that they believed that professional development should grow both the teacher and the district, all of the participants believed that professional development should improve teacher practice.

**Professional development should improve teacher practice.** Each of the participants communicated the belief that professional development should improve teacher practice and provide the opportunity for growth (Firestone et al., 2005; Fox, 2013; Goddard et al., 2000;
Leithwood et al., 1998). The way that each of the school district leaders defined growth differed, nevertheless, there was a consistent emphasis on increasing the skills of teachers as the function of professional development (Guskey, 2009). While the opinions on what qualified as improvement differed, the beliefs of the school district leaders were consistent with the literature. Tyler and Matthew viewed improvement as related to better equipping teachers to meet student needs (Goddard et al., 2000), while Grace and Abigail looked at improvement as teachers being able to be reflective and recognizing what they need to accomplish to improve their skills (Leithwood et al., 1998). Spencer and Cara viewed improvement as developing specific skills related to both the individual and the district (Firestone et al., 2005; Hanushek, 2011).

Furthermore, all of the participants acted on their belief, provided professional development with the improvement of practice in mind, and specifically discussed this as a purpose of their decision-making for professional development in the research-based strategies in their districts.

**Role of research in decision-making for professional development.** Participants all shared the belief that research should drive teacher practice (Johnson et al., 2007; Max et al., 2014; Stronge et al., 2011; Thomas & Green, 2015). Additionally, all participants regarded research as a part of the decision-making process for professional development, specifically research related to the instructional strategies for which the professional development was being implemented. The beliefs that were held by the school district leaders regarding what counted as research varied (Coburn & Talbert, 2006). While Tyler believed that research based instructional strategies could improve teacher effectiveness, (Fox, 2013), Grace and Cara believed that research is foundational and may or may not apply to their districts or in certain situations (Boardman et al., 2005). Additionally, Spencer, Matthew, and Abigail all discussed their belief that research-based practice was important, but each was concerned about the
capacity and willingness of teachers to review and apply research to practice (Evans et al., 2012; Guskey, 2009). The alignment of the participants’ beliefs with their practices was interesting to note.

Consistent with her belief that research is foundational, Grace brought in a non-profit organization that had a thorough understanding of the research-base for competency education. This helped the district better understand the research and align the research to how practices would be implemented in the TSD (Coburn & Talbert, 2006; Coburn et al., 2009; Farley-Ripple, 2012). In line with her beliefs, Cara applied the research-base that she and other members of the district were already familiar with to the SSD (Coburn et al., 2009). Additionally, Matthew and Abigail, congruent with their beliefs, worked to review research and share that research with teachers (Farley-Ripple, 2012). Conversely, Spencer, consistent with his ability to oversee a small district but seemingly contrary to his belief that teachers may be less willing to participate in research, expected his teacher-driven committees to perform the research related to reading instructional strategies (Copland, 2003). Regardless of their belief about what constituted research or the way in which the participants included research in their selection of practices for which they would be offering professional development, each participant included the use of research in their decision-making (Coburn & Talbert, 2006; Coburn et al., 2009; Farley-Ripple, 2012). The participants’ beliefs about decision-making, professional development, and research were all considerations in their process to decide on professional development for research-based strategies in their district. Additionally, another consideration in their decisions related to professional development was why each was offering the professional development, in other words what was the purpose of the professional development.
**Theme two: Primacy of purpose.** Participants spent considerable time explaining and discussing the decisions that they made related to the purpose of the professional development for research-based instructional strategies in their districts (Firestone et al., 2005; Mangin, 2014). Participants’ decisions related to the purpose of professional development were consistent with the literature in that their decisions were made for the purposes of; moving the district closer to the mission, vision, and strategic plan of their school districts (Chance & Cummins, 1998; Hyle et al., 2010; Sansone, 1995), providing high quality learning environments for students (Boyland & Jarman, 2011; Elmore, 2002; Feld, 1981; Johnson et al., 2007; Taylor, 2010), accomplishing specific goals and desired outcomes (Desimone et al., 2002; Goldman & O'Shea, 1990; Noppe et al., 2013), and improving teacher practice (Elmore, 2002; Max et al., 2014; Stronge et al., 2011). Each of the purposes played a role in the decision-making process for the professional development. Some, such as improvement of teacher practice, were consistently part of the purposes related by the participants, while others such as mission, vision, and strategic plan were not as prevalent.

**Movement toward the mission, vision, and strategic plan.** Each of the participants discussed the mission, vision, and strategic plan and the decisions for professional development. Consistent with the literature, it was evident that the mission, vision, and strategic plan played a role in decision-making and was a major consideration for some of the participants (Chance & Cummins, 1998; Sansone, 1995). However, contrary to the literature, other participants did not assert a connection between the mission, vision, or strategic plan and their decision-making as more than incidental.

More than the other participants, Grace and Abigail specifically referred to a primary purpose of their decision to offer the professional development for research-based instructional
practices in their school districts was to affect movement toward the mission and vision of their districts (Dryden, 2013; Hyle et al., 2010). Similarly, the decisions that Matthew and Spencer made related to professional development for research-based instructional strategies were aligned with the strategic plans in their districts (Hyle et al., 2010). All four participants discussed and could relate their decisions for professional development directly to a specific part of their mission, vision, or strategic plan. In Grace’s case, this was toward the vision of the graduate in a competency-based system, while Abigail discussed the decisions that she made for professional development as they related to the role of student agency. Additionally, Spencer noted a specific objective to enrich curriculum, and Matthew discussed technology-enhanced instruction as part of the DSD strategic plan. Conversely, Tyler and Cara both viewed the alignment of the mission, vision, and strategic plan as convenient but not a driver of their decisions. While not all of the participants drew a connection between their decision-making and the movement of the mission, vision, and strategic plan, a majority of them affirmed that this was a reason for their decision to offer professional development in research-based instructional strategies for their districts (Chance & Cummins, 1998; Dryden, 2013; Hyle et al., 2010; Sansone, 1995). However, all of the participants discussed the connection of high-quality learning environments and their decisions to offer professional development in research-based instructional strategies.

**Provide high quality learning environments for students.** Each participant related the purpose of their decision to offer professional development in research-based instructional strategies as informed by the need to provide high quality learning environments for students (Boyland & Jarman, 2011). Each participant made his or her decision in a different way and was informed by different factors within their individual districts, but each discussed, at length, the importance of high-quality learning environments for students as a driver for their decision.
Consistent with the literature Grace, Spencer, Cara, Matthew, and Tyler all worked to provide professional development for research-based instructional strategies specifically to improve student learning outcomes (Elmore, 2002; Johnson et al., 2007). Additionally, Matthew and Abigail specifically looked to provide professional development that would enhance the environment in which the students were learning (Taylor, 2010). Matthew sought to offer a more technology-rich environment, and Abigail aimed to provide a more structured approach to classroom management and a more nurturing environment for students. Despite the differences in what was provided, the decision made by each of the school district leaders was specifically informed by the purpose of providing high quality learning environments for students. Similar to this the participants’ decisions to offer professional development in research-based instructional strategies were each informed by specific goals and desired outcomes.

**Role of goals and desired outcomes.** The participants all maintained that clear goals or specific desired outcomes were also part of the purpose for each of their decisions to provide professional development in the specific research-based instructional strategies. While consistent with more recent literature (Desimone et al., 2002; Goldman & O'Shea, 1990; Noppe et al., 2013), the affirmation of specific goals and desired outcomes as part of the decision-making process may be contrary to the assertion of Cohen, March, and Olsen (1972) that in educational institutions goal ambiguity leads to ineffective decision-making processes.

Specifically, Grace related her decision for professional development in competency-based instructional strategies was explicit to the long-term outcome of a competency based system in the TSD (Dryden, 2013; Hyle et al., 2010). Spencer and Tyler explained that their goal in providing professional development in research-based instructional strategies was to increase student achievement (Elmore, 2002; Johnson et al., 2007). Abigail indicated that the
goal that informed her decisions about professional development for Responsive Classroom was to increase the tools available to teachers related to classroom management so that pro-social behaviors in classrooms would increase (Boyland & Jarman, 2011). Further, Cara and Matthew both indicated that their decisions were made to provide professional development to empower teachers to make decisions that would lead to higher levels of student engagement in learning (Copland, 2003). Once again, there were nuanced differences in each of the goals and desired outcomes of the participants, but all of them used a goal or specific desired outcome to inform the decisions that they made for professional development (Desimone et al., 2002; Goldman & O'Shea, 1990; Noppe et al., 2013). Additionally, consistent with their beliefs, a purpose that informed all of the participants’ decisions to provide professional development for research-based instructional strategies was the improvement of teacher practices.

**Improvement of teacher practices.** As aforementioned, all of the participants believed that professional development should improve teachers practice (Elmore, 2002; Max et al., 2014). Consistent with their beliefs (Hallinger, 2011; Major, 2013), most of the participants decided to provide professional development in the research-based professional strategies for the purpose of improving teacher practice in their school districts (Firestone et al., 2005; Guskey, 2009). With the exception of Matthew, all of the school district leaders indicated that refining practice, creating consistency of practice, or building on past practice were ways in which the improvement of practice affected their decision-making related to professional development for the research-based instructional practices in their school districts (Copland, 2003; Stronge et al., 2011). Grace eloquently stated the reason for her decision: “You [have to] build on the foundation you have. You can’t introduce new [practices] that don’t have a relationship.” Moreover, Abigail indicated that providing additional tools for teacher practice was important
(Goddard et al., 2000), but it was only Matthew that saw his decision to provide professional development as affected not only by the desire to improve practice but also the desire to innovate teacher practice by leveraging technology.

The concept subscribed to by the school district leaders regarding the improvement of practice as a main function for professional development is consistent with the literature on decision-making (Dryden, 2013; Feld, 1981), the literature on professional development (Firestone et al., 2005; Guskey, 2009; Leithwood et al., 1998), and the literature related to effective teaching (Chetty et al., 2014; Fox, 2013; Hanushek, 2011). As previously outlined, improving teacher practice was important to the school district leaders as a part of their core beliefs about professional development as well as a consistent consideration provided by the school district leaders as a purpose for their decisions to offer professional development for research-based instructional strategies in their school districts. Purpose for professional development was a primary consideration in the school district leaders’ decision-making; additionally, there were several antecedent decisions that the school district leaders discussed that were also important in their processes to make decisions for the research-based instructional strategies in their school districts.

**Theme three: Antecedents to deciding professional development.** During the decision-making process, the participants made numerous antecedent decisions (Noppe et al., 2013) related to what professional development they would be offering, who participated in decision-making, and how the professional development would be implemented. In order to make decisions, the participants determined needs (Jayroe & Brenner, 2002), examined data (Montz et al., 2015; Osborne-Lampkin, 2010), and gathered input from a variety of resources including staff (Ringwalt et al., 2004) and varying types of research (Farley-Ripple, 2012).
Use of data and staff input to determine needs. Consistent with the literature, the participants used a variety of data to make decisions (Jayroe & Brenner, 2002; Montz et al., 2015) about what research-based strategies their districts would be pursing and the professional development that would result. Participants referred to the use of student learning data to drive decision-making related to professional development (Guskey, 2009; Marsh & Farrell, 2015). The type of student learning data examined differed from district to district. For instance, Grace, Tyler, and Cara all spoke of specific achievement data, benchmark assessments, as well as annual student assessment to identify the research-based instructional strategy that would result in professional development (Marsh & Farrell, 2015; Rasmussen & Karschney, 2012).

Moreover, Spencer knew that student data were examined, but he was unsure of what data were used. Conversely, Abigail and Matthew did not use student learning data. Matthew used data from staff evaluation (Guskey, 2009; Mangin, 2014) and Abigail used anecdotal information from staff and community members (Grissom et al., 2015; Hallinger et al., 1996) regarding student disruptions and challenging behaviors.

Staff input was also considered by participants (Grissom et al., 2015). Interestingly, Grace went so far as to bring in an outside agency to help the district perform a needs assessment and review the data and input prior to making a decision to provide professional development in competency-based instructional strategies. Conversely, Spencer, because of the small size of his district, was able to determine staff input through less formal measures and he depended on input from a specific staff member with expertise (Jenkins, 2007). Tyler emphasized that once the student data were reviewed the teachers drove the decision-making Tyler claimed, “[Professional development] is basically teacher driven after we look at the data.” Abigail worked with administrators to determine what staff would need to help them manage behaviors in the
classroom (Grissom et al., 2015) and Matthew worked with other administrators to review the direction of instruction that was occurring at the national, state, and local levels (Hallinger, 2003; Hallinger, 2011). Again, each school district leader had a different approach to gathering input and the extent to which it was gathered also differed. However, in making a determination of needs for the research-based strategy that would lead to professional development within their districts, the school district leaders were consistent with the literature in that the majority of them used student data (Guskey, 2009; Marsh & Farrell, 2015) and two garnered input from staff members (Grissom et al., 2015). A similar pattern emerged when reviewing the use of research by the school district leaders.

Use of research to determine research-based instructional strategies. The participants each professed to using research in their decision-making to determine the research-based instructional strategies for which they would offer professional development (Coburn & Talbert, 2006; Coburn et al., 2009; Farley-Ripple, 2012; Rasmussen & Karschney, 2012). Consistent with the literature, how the research was used and the type of research that was considered varied considerably (Farley-Ripple, 2012). Abigail and Tyler used research in what, according to the literature, would be considered an instrumental use. They looked specifically at either efficacy studies or the synopsis of efficacy studies and reviewed the evidence of the research-based instructional strategy (Farley-Ripple, 2012). Conversely, though still consistent with the literature, Cara looked for what was consistent with what she knew about reading instructional strategies and what was already widely accepted as effective (Coburn & Talbert, 2006; Farley-Ripple, 2012). Grace, brought in an outside agency to share the research base for competency-based education and applied the research the agency shared in what the literature refers to as symbolic use, despite the fact that the agency indicated that only one subject area should move
toward competency-based instructional strategies at a time, Grace wanted to move all academic areas to competency-based instructional strategies simultaneously (Farley-Ripple, 2012). Spencer and Matthew both preferred to use research that was more practitioner friendly and they garnered their research from professional organizations, vendors, and professional periodicals (Farley-Ripple, 2012; Lorsbach, 2008). All of the participants were inconsistent with the concept of predetermination that was indicated by the literature (Farley-Ripple, 2012), while the source of the research differed (Farley-Ripple, 2012; Jenkins, 2007; Lorsbach, 2008) all of the participants examined to some extent the research prior to reaching a decision about the research-based instructional strategies in which their district would be offering professional development. The school district leaders considered research in their decision-making and they also included others in the decision-making for the professional development in their school districts.

Participants in decision-making. Each of the school district leaders brought others into the decision process for professional development related to the research-based strategies in their school districts. According to the literature, most school district include teachers in decision-making related to professional development (Desimone et al., 2002; Firestone et al., 2005; Leithwood et al., 1998). While the collaborative decision process varied across the six school district leaders, all of the school district leaders, consistent with their beliefs, involved others in the decision-making process for professional development (Desimone et al., 2002; Firestone et al., 2005; Leithwood et al., 1998). Spencer, consistent with the literature on collaborative decisions (Ewbank, 2011; Goldman & O'Shea, 1990; Lorsbach, 2008) as well as the literature on consulting expertise (Brazer & Peters, 2007; Feld, 1981), had a committee of teachers, led by a reading specialist, make the decision regarding professional development in reading instructional strategies. This was also true with Cara, who involved reading specialists within her district with
the professional development decision-making (Brazer & Peters, 2007; Feld, 1981). Similarly, Matthew worked with a committee and a group of pilot teachers to make decisions about the professional development for technology-based instructional strategies in his district (Brazer & Peters, 2007; Brazer et al., 2010; Copland, 2003; Rasmussen & Karschney, 2012). Also in line with the literature Grace, Tyler, and Abigail included teachers in the professional development decision-making (Johnson, 2009; Touchton & Acker-Hocevar, 2011) and consulted outside experts (Brazer & Peters, 2007; Feld, 1981). Interestingly, as was depicted in the literature, the extent to which others were brought into the decision-making process varied district to district (Brazer & Peters, 2007; Brazer et al., 2010; Copland, 2003; Johnson, 2009; Touchton & Acker-Hocevar, 2011) with Spencer conferring the decision-making to teachers (Copland, 2003; Lasher, 1990; Rasmussen & Karschney, 2012), Matthew including others directly in the professional development planning process (Brazer & Peters, 2007; Brazer et al., 2010; Copland, 2003; Rasmussen & Karschney, 2012), and Cara, Tyler, Grace and Abigail leveraging expert advice (Brazer & Peters, 2007; Feld, 1981) and gathering input from other staff members (Johnson, 2009; Touchton & Acker-Hocevar, 2011). While the school district leaders’ practice of including others in the decision-making process for professional development related to the research-based instructional strategies in their districts, they were less aligned about the decision of how to implement professional development.

Structured versus fluid professional development implementation. Consistent with the literature that indicated that teachers view the implementation of professional development as a responsibility of administrators, the six school district leaders developed implementation plans for the professional development in the research-based strategies for their school districts (Ringwalt et al., 2004). Contrary to the literature that most districts institute whole-group, one-
time professional development (Fermanich, 2002; Miles et al., 2002; Miles et al., 2004) all of the school district leaders instituted professional development over multiple sessions and in multiple ways. Consistent with the literature on resource allocation for professional development implementation, Grace, Abigail, Tyler, Cara, and Matthew retained decision-making authority related to implementation (Elmore, 2002; Leithwood et al., 1998; Little, 1989; Spillane, 2002), while Spencer worked to include teachers in the implementation decisions. However, of note, were the distinct differences in the structured, systematic, multi-year implementation plans of Grace, Spencer, and Abigail, each of whom hired an outside provider and included coaching as part of the professional development (Mangin, 2014; Miles et al., 2004; Spillane, 2002), and the fluid implementation plans Cara, Tyler, and Matthew offered. Contrary to the literature (Boardman et al., 2005; Roehrig et al., 2007; Smith & Southerland, 2007) these leaders assumed that teachers would be able to indicate the level of professional development that was necessary for them as individuals. Consistent with the literature most decisions related to the professional development appeared to be made in a collaborative way (Desimone et al., 2002; Firestone et al., 2005; Leithwood et al., 1998). However, when it came time to make decisions about how to implement the professional development the school district leaders generally depended on groups of administrators to make the decisions (Elmore, 2002; Leithwood et al., 1998; Little, 1989; Spillane, 2002). As this section indicates, the school district leaders made a number of decisions prior to implementing professional development for research-based strategies in their school districts; in the next section, the interplay of contextual considerations in their decision-making is discussed.

**Theme four: Contextual considerations.** Consistent with the literature there were contextual considerations that each school district leader had to consider during their decision-
making (Coburn et al., 2009; Hallinger et al., 1996; Hallinger, 2003; Hoy & Tarter, 2010; Hyle et al., 2010; March, 1991b; McLlellan et al., 2010). Specifically, the six school district leaders in this study each discussed the context of their districts as it related to demographics (Coburn et al., 2009), resources (Lasher, 1990; Marshall & Scribner, 1991), and the individual attributes of their districts and communities (Marshall & Scribner, 1991; Pashiardis & Baker, 1992) and how those contextual factors were taken into consideration as they made decisions about professional development for research-based instructional strategies for their school districts.

**Role of demographics.** Demographics were a consistent consideration for most of the school district leaders in general decision-making for professional development (Coburn et al., 2009). Consistent with the literature, the school district leaders in districts with higher free and reduced lunch populations were more concerned about the skill level of teachers working with specific types of students (Grissom et al., 2015). Specifically, Cara, Grace, Tyler, and Matthew discussed concerns that certain segments of their demographic had specific needs that, at times, led to specific professional development decisions. In contrast, Spencer, one of the school district leaders that represented a district with a low percentage of students qualifying for free and reduced lunch, indicted that the high expectations of his demographic was a consideration when he was making decisions regarding professional development (Casto & Sipple, 2011)

While demographics were a consideration for most of the school district leaders as they made decisions about professional development, so too were the resources available in their school districts.

**Role of fiscal resources and time.** The findings indicated, as did the literature, that resources, both fiscal resources and time, were central considerations in the decision-making process for professional development (Chance & Cummins, 1998; Evans et al., 2012; Guskey,
The findings regarding the consideration of fiscal resources indicated that two of the school district leaders, Cara, and Grace had to prioritize what was offered for professional development based on their districts dependence on grants (Bacharach & Mundell, 1993), while a third school district leader, Tyler, received significant grants but also had what he believed was an adequate professional development budget. Furthermore, Tyler had to make specific decisions about professional development and programs based on the restrictions of the Title I grant that he received (Bacharach & Mundell, 1993). With the exception of Spencer, and consistent with the literature, all of the district leaders indicated that balancing competing priorities and resources was a consideration in their decision-making for professional development (Elmore, 2002; Hyle et al., 2010; Little, 1989; Miles et al., 2002). Moreover, with the exception of Spencer and Cara, the school district leaders indicated that time, as outlined by the literature, was a significant consideration in making decisions for professional development (Guskey, 2009; Miles et al., 2004). Insomuch as the findings and the literature indicated that resources were a consideration in the decision-making for school district leaders, the individual attributes of the districts and communities, in which the school district leaders worked were also a consideration in the decision-making for professional development.

**Individual attributes of districts and communities.** Consistent with the literature, the findings of this study indicated that the six school district leaders each considered and contended with specific attributes that were unique to their districts and communities when making decisions about professional development for research-based instructional strategies (Hoy & Tarter, 2010; Iannaccone, 1991; Marshall & Scribner, 1991; McLlellan et al., 2010). The contextual considerations that the school district leaders weighed were well documented within the literature. For instance, Grace, Tyler, and Spencer had to consider the resistance they might
receive from staff as they were making decisions about professional development (Boardman et al., 2005; Roehrig et al., 2007; Smith & Southerland, 2007). Conversely, and contrary to the findings about teachers being resistant to instituting new research-based practices (Boardman et al., 2005), Matthew had to consider the highly engaged mindset of his staff when he was making decisions related to professional development for technology-based instructional strategies. Also documented in the literature was the consideration during the decision-making process that Spencer and Abigail had to give related to the expectations of student achievement from their communities (Hallinger et al., 1996; Ingle et al., 2012; Major, 2013). Despite the fact that constraints from teachers’ unions and the impact they have on professional development are well documented in the literature, Tyler was the only school district leader to indicate that this was a contextual consideration during his decision-making for professional development (Elmore, 2002; Marshall & Scribner, 1991). Contrary to the literature indicating that performance levels of schools do not affect decision-making processes (Pashiardis & Baker, 1992), Grace discussed, at length, the consideration that was given to the previous poor academic performance of her school district. Additionally, Cara consistently had to consider the context of her community’s financial difficulties when making decisions related to professional development (Major, 2013; Pankake & Bailey, 1986). While there was significant variance in what the six school district leaders had to consider, each of the six school district leaders had to take the context of his or her district and community into consideration when making decisions about professional development for research-based instructional strategies.

The findings of this revealed that the experiences of the six district leaders were consistent with the literature that the decision-making processes are complex and involve a number of decisions (Hoy & Tarter, 2010; Langlois, 2004; March 1978a; Noppe et al., 2013).
Furthermore, the six participants made decisions about professional development that were consistent with their beliefs (Brazer & Peters, 2007; Hallinger, 2011; Hooker, 2000). In addition, the participants made decisions for specific purposes including; moving forward the mission, vision, and strategic plan of their districts (Chance & Cummins, 1998; Hyle et al., 2010; Sansone, 1995), to provide high quality learning outcomes for students (Boyland & Jarman, 2011; Elmore, 2002; Feld, 1981; Johnson et al., 2007; Taylor, 2010), to meet specific goals and achieve specific desired outcomes (Desimone et al., 2002; Goldman & O'Shea, 1990; Noppe et al., 2013), and to improve teacher practice (Elmore, 2002; Max et al., 2014; Stronge et al., 2011).

Furthermore, the six school district leaders also had to consider demographics (Coburn et al., 2009), resources (Lasher, 1990; Marshall & Scribner, 1991), and the contextual attributes of their organizations (Hoy & Tarter, 2010; Iannaccone, 1991; Marshall & Scribner, 1991 2010) and communities (Hoy & Tarter, 2010; McLellan et al., 2010), when they made decisions related to professional development for research-based instructional strategies in their school districts.

**Findings as they Relate to the Theoretical Framework**

March’s (1978, 1991) organizational decision-making theory served as the primary lens to guide this study. The theory provided valuable insights into the dynamics and considerations involved in how school district leaders make decisions related to professional development for a research-based instructional strategy (Edmondson & Moingeon, 1998; March, 1996; Slater & Narver, 1995). The findings of this study indicate that there is evidence of the fundamental concepts of the theory in the decision-making of the six school district leaders about professional development for research-based strategies. March (1978) asserts that individuals and organizations form aspirations, goals, targets, or ambitions for achievement. In making decisions, each of the school district leaders spent significant amounts of time discussing the purposes for
their decisions related to professional development for the research-based strategies in their school districts. Consistent with March’s theory, the findings of this study indicated that the decision-making of six school district leaders related to professional development was highly complex (Gigerenzer & Goldstein, 1996; Hoy & Tarter, 2010; March 1978a, 1991b; Noppe et al., 2013) and decisions are bound by organizational constraints, limited rationality, and contextual rationality (Gigerenzer & Goldstein, 1996; Jones, 1999; March 1978a, 1991b; Noppe et al., 2013; Polka et al., 2014). Furthermore, the findings also indicated that there was evidence that school district leaders made decisions on a continuum of satisficing (March 1978a; Polka et al., 2014) and optimizing (March 1978a; Noppe et al., 2013). Additionally, the findings of the study provided evidence that the participants made decisions related to professional development for research-based instructional strategies with higher degrees of exploitation (March, 1991a) and with the exception of one participant, with lower degrees of exploration (March, 1991a; Polka et al., 2014). Furthermore, this study found limited evidence related to risk-taking associated with the school district leaders’ decisions regarding professional development for research-based practices in their school districts.

**Optimizing and satisficing.** According to March (1978), decision processes can be referred to as satisficing if constraints are considered during decision-making. Conversely, the process by which a decision is made to reach a specific metric or goal is referred to as optimizing. While constraints and context may still play a role in the decision process, the goal or metric is paramount to the decision-making process (March, 1978a). The findings of this study indicated that the school district leaders’ decision about professional development for a research-based strategy in their school districts falls on a continuum of optimizing and satisficing (March 1978a; Noppe et al., 2013; Polka et al., 2014).
Evidence of optimizing. Each of the school district leaders discussed several purposes for their decisions to provide professional development for a research-based instructional practices in their school districts. Each of the school district leaders indicated that these purposes were desired outcomes of his or her decision to provide professional development in research-based instructional strategies. Table 9, Summary of Desired Outcomes, indicates the different desired outcomes or purposes that the school district leaders provided for their decision. While the findings of this study did not indicate that the school district leaders designed specific metrics for their desired outcome (March 1978a, 1978b, 1991b), as described in Chapter Four, the purpose for their decisions were a primary consideration of each of the school district leaders. As desired outcomes of their decision to provide professional development in the specific research-based strategies in their school districts, the focus on purpose as paramount provides evidence that optimizing was part of the decision-making process (March 1978a), particularly since March (1978a) indicates that considering constraints may still be part of an optimizing process and that the indicator of an optimizing process is the focus on the desired outcome.

Table 9

Summary of Desired Outcome

<table>
<thead>
<tr>
<th>School District Leader</th>
<th>Desired Outcome</th>
</tr>
</thead>
<tbody>
<tr>
<td>Grace</td>
<td>Move district toward vision</td>
</tr>
<tr>
<td></td>
<td>Accomplish specific school-based goals related to competency-based instructional strategies</td>
</tr>
<tr>
<td></td>
<td>Improve teaching practices</td>
</tr>
<tr>
<td></td>
<td>Expand organizational learning of competency-based instructional strategies</td>
</tr>
<tr>
<td>Spencer</td>
<td>Accomplish goals from the strategic plan</td>
</tr>
<tr>
<td></td>
<td>Improve student achievement</td>
</tr>
<tr>
<td></td>
<td>Improve teaching practices</td>
</tr>
<tr>
<td><strong>Tyler</strong></td>
<td>Provide learning opportunities for students</td>
</tr>
<tr>
<td>-----------</td>
<td>------------------------------------------</td>
</tr>
<tr>
<td><strong>Abigail</strong></td>
<td>Close the gap between practice and the district vision</td>
</tr>
<tr>
<td><strong>Cara</strong></td>
<td>Offer a variety of learning opportunities for students</td>
</tr>
<tr>
<td><strong>Matthew</strong></td>
<td>Accomplish objectives of the strategic plan</td>
</tr>
</tbody>
</table>

**Evidence of satisficing.** The findings of this study were less consistent with March’s concept of satisficing. According to March (1978a), a satisficing process might be characterized by a focus on the constraints as they relate to each other and the outcome of the decision may affect them. Each of the school district leaders considered contextual constraints related to demographics, resources, and the attributes of the organizations and communities in which they worked (March 1978a). However, the school district leaders considered these constraints in relation to the decision outcome. The study found limited evidence that the school district leaders considered how the decision outcome might affect the constraints or context. One exception are the findings from Grace: Her district had historical poor performance, and this was part of the contextual considerations for her decision to move toward competency-based instructional strategies. If the competency-based instructional strategies change the trajectory of the historical performance, then the outcome of Grace’s decision would provide evidence for satisficing.
The findings of this study may indicate that when school district leaders make decisions about professional development for a research-based strategy their process is less consistent with satisficing (March 1978a). School district leaders’ decision-making related to professional development may also fall on a continuum that may be categorized by degrees of exploration or exploitation.

**Exploration and exploitation.** According to March (1978, 1991) the concepts of exploration and exploitation are present in organizational decision-making particularly in regard to organizational learning. If more exploration is present, an organization may have to allocate resources among uncertain alternatives and often this may result initial reductions of the speed at which skills are acquired and improved, returns are often less certain, and benefits are often seen as further away (March, 1991a). Conversely, a high degree of exploitation may lead to refinement, continued implementation with greater efficiency, and the ability to leverage present organizational knowledge and procedures to improve present practice (March, 1991a). The presence of exploitation and exploration are part of the decision outcome (March, 1991a). The findings of this study indicated that the school district leaders’ decision about professional development for a research-based strategy in their school districts falls on a continuum of exploitation and exploration, leaning more toward exploitation with the exception of one school district leader.

**Evidence of exploitation.** The findings of this study indicate that the decision outcome to provide professional development in a specific research-based instructional strategy by the school district leaders was closer to exploitation. According to March (1978,1991) the indication of exploitation is to build on or improve present practice. Most of the school district leaders indicated that the improvement of present practice was part of the decision about providing
professional development for research-based instructional strategies. Furthermore, most of the school district leaders indicated that they were leveraging present organizational knowledge within their school district to aid in the decision-making for professional development. Spencer, Cara, and Tyler all indicated that the discussions around practice began with teachers. Additionally, Cara and Spencer both indicated that they leveraged the knowledge of their reading specialists as they made the decisions related to professional development. Moreover, Grace discussed the desire to build from present practice. While Abigail indicated that she wanted to introduce some new practices for classroom management, she also discussed the refinement of tools to manage student behavior. The findings of this study as they relate to the theoretical framework indicate that most of the school district leaders’ decisions about professional development for research-based instructional strategies appear to be closer to exploitation rather than exploration.

**Evidence of exploration.** There was limited evidence in this study of one school district leader, Matthew, making decisions about professional development for research-based instructional strategies consistent with the concept of exploration as outlined by the theoretical framework (March, 1991a). Matthew specifically discussed that part of his decision for professional development in technology-based instructional strategies was for innovation. Specifically, Matthew indicated that he wanted to give teachers “a new tool for [the] toolbox that may replace four old tools.” The decision of Matthew to replace past practice with what he believed was new and more efficient, effective practice provides evidence that the concept of exploration as outlined in the theoretical framework may have been part of the decision that Matthew made about professional development for technology-based instructional strategies (March, 1991a).
**Constraints and context.** According to the theoretical framework for this study, constraints are the resources available, the context of the organization, and the social context in which an organization exists (March, 1991a). The context and the constraints that inform the decision-making process are inextricable, no decision can be made within a vacuum (March, 1978a, 1991a, 1991b). As evidenced in this study school district leaders must also consider the social context in which the district exists, as well as the constraints of available resources (Evans et al., 2012; Guskey, 2009; Roehrig et al., 2007).

**Evidence of constraints and context.** This study provided evidence of the considerations of constraints and context (March, 1978a, 1991a, 1991b), as identified as part of the theoretical framework, in the decision making that school district leaders made about professional development for research-based instructional strategies. While the constraints and contextual considerations of each of the district varied, the consideration of context was a theme that emerged from the study. A sample of the constraints and contextual considerations that each of the school district leaders discussed is provided in Table 10, Sample of Contextual Considerations. As Table 3 illustrates, aligned with March’s theoretical framework, each of the school district leaders considered constraints and contextual attributes as part of the decision-making about professional development for research-based strategies (March, 1978a, 1991a, 1991b).

Table 10

*Sample of Contextual Considerations*

<table>
<thead>
<tr>
<th>School district leader</th>
<th>Contextual Consideration</th>
</tr>
</thead>
<tbody>
<tr>
<td>Grace</td>
<td>Student demographics, socio-economic differences</td>
</tr>
<tr>
<td></td>
<td>Dependence on grant funding</td>
</tr>
<tr>
<td></td>
<td>Historic poor performance</td>
</tr>
</tbody>
</table>
**Risk taking.** Contrary to the theoretical framework, limited evidence was found of risk taking. According to March (1991) decision-making happens with a certain degree of risk taking, which appears to be affected by the presence of resources. More resources is often associated with greater risk taking, (March, 1978a, 1991a, 1991b). Less resources results in risk averse decision-making characterized by higher controls, and an emphasis on improvements in efficiency and process. While Matthew indicated that he wanted to encourage risk taking on behalf of his staff to institute technology-based instructional strategies in their classrooms, no theme related to risk-taking emerged during the study, and no other participant brought up or eluded to risk-taking as part of the decision-making about professional development for research-based instructional strategies.

The findings of this study, consistent with the theoretical framework, indicated that school district leaders use a balance of optimizing and satisficing related to decisions for professional development in research-based strategies in their school districts (March 1978a, 1991a, 1991b; Noppe et al., 2013; Polka et al., 2014). Additionally, most of the school district leaders made decisions more consistent with the concept of exploitation, improving or expanding the practices that were already in place (March, 1991a). The exception to this was Matthew, who
was specifically looking to change practice and replace it with new practice leveraging technology (March, 1991a). Also consistent with the framework, constraints and context are both significant considerations for school district leaders when they make decisions about professional development for research-based strategies. Contrary to the theoretical framework (March, 1991a), risk-taking was not a prevalent concept that emerged during the study.

**Reflections**

**Incremental nature of participants’ decision-making.** An interesting observation that coincides with the findings in the literature is that school district leaders decision-making is often incremental in nature (Hallinger, 2011; Langlois, 2004; Noppe et al., 2013). During the course of the interviews and in reviewing the narratives of the participants, the decisions for professional development of the research-based strategies in their districts appeared to be incremental. The participants did not refer to a sequential order of decisions for professional development, instead the decisions that the participants discussed were multi-stepped. All of the participants conveyed this in different ways. Grace began her decision-making toward competency-based instructional strategies as she was examining student data and the district’s overall performance, while Spencer recognized a specific problem in his district and referred it to committee for review. Tyler began his decision-making when he began responding to the findings of a committee, while Abigail began with significant concerns shared by the community and staff. Cara began with data related directly to performance, and Matthew began with the desire to move his district forward in a specific way.

The school district leaders in this study appeared to make incremental decisions that were related to answering questions related to their districts, their students, and their teachers. Spencer, Tyler, Grace, Abigail, and Cara all identified a problem or challenge that was facing
their district, the exception to this was Matthew, who did not discuss or present a problem. Additionally, all of the school district leaders made decisions about who should be involved in decision-making related to both the research-based strategy and the professional development, as well as deciding on the purpose that the professional development would serve for their school districts. Additionally, at some point in each of the school district leaders’ decision-making processes they decided utilized data and research to support the decision to move forward with the professional development in the specific research-based strategies they identified, what fiscal resources were available to support the professional development, and how the professional development could and would be implemented within their districts. While this does not describe the complexity of the decision-making processes of the school district leaders, it does demonstrate the incremental nature of their decision-making and provides additional support to the findings of several previous studies on school district leaders decision-making (Langlois, 2004; Lunenburg, 2010; Noppe et al., 2013; Osborne-Lampkin, 2010).

**Research about effective professional development.** Interestingly, the research that was referred to, by every participant, related to the research-based instructional strategy not the professional development they provided. While some of the participants discussed organizational learning as synonymous with professional development, none of the participants discussed or referred to research related to providing or implementing professional development or research around adult learning during the discussion. The implementation planning for professional development, particularly when it related to research-based practices, might benefit from a clearer understanding of adult learning and the research regarding effective professional development. Moreover, while the participants all indicated plans for implementation, some structured some fluid, none of the participants referred to a written implementation plan or
indicated that an implementation-planning document was used. Nevertheless, an implementation plan may provide clarity for teachers and staff about the professional development for research based instructional strategies and the associated expectations, timeline, and opportunities for growth. While the school district leaders indicated that research about instructional practices were important, considering research for professional development practices may be a next logical step for the school district leaders to assist them in making decisions related to professional development. Additionally, developing a definition for research may also be helpful.

**What counts as research?** Each of the school district leaders indicated that he or she believed that the use of research was an important practice in making decisions for professional development for research-based strategies. However, the variance in terms of what constitutes research was considerable. One of the school district leaders reviewed efficacy studies, another specifically looked at vendor-related research, and a third depended on teachers to conduct research. The research-practice gap in education is a well-established phenomenon. As such, by establishing a definition of what counts as research in regard to making decisions related to professional development for research-based strategies, school district leaders may be able to better provide clear evidence of why an improvement or change in instructional practice is warranted.

**No specific process.** As aforementioned, the decisions that the six school district leaders made for professional development in research-based practices were incremental. Additionally, there did not seem to be a specific process or sequence to the incremental decisions across the school district leaders. According to the literature, school district leaders make a significant amount of decisions on a regular basis. Some of these decisions have to be made in a more
satisficing way. However, in this study, since school district leaders’ decisions for professional development seem to be closer optimizing, a process for decision-making related to professional development in research-based practice may be helpful to the participants in the study.

**Implications for Practice**

Findings from this study indicated that a process or protocol for decision-making related to professional development for research-based instructional practice might be helpful for school district leaders responsible for professional development decisions (Farley-Ripple, 2012; Langlois, 2004; Lunenburg, 2010; Rasmussen & Karschney, 2012). While the school district leaders in this study made their decisions incrementally, there was not a common sequence to the decisions that they made. However, as indicated by the themes that emerged in this study, there were commonalities about the types of decisions that the school district leaders made related to professional development for research-based instructional strategies. Since the six school district leaders might benefit from an incremental process, a proposed protocol is outlined in Figure 2. The proposed protocol derives from the common decisions that emerged from the experiences related by the six school district leaders in this study. The process begins with school district leaders determining needs in conjunction with reviewing the strategic plan of the school district (Bryson, 2018). The process ends with a communicating and implementing the professional development. Having a structured protocol to guide professional development decision-making may help school district leaders in their decision-making related to professional development for research-based instructional strategies (Farley-Ripple, 2012; Langlois, 2004; Lunenburg, 2010; Rasmussen & Karschney, 2012).
Findings from this study also indicated that school district leaders may benefit from a normative agreement of what does and does not count as research and what reliable and valid sources of research are. As indicated by this study and supported by the literature, there is a wide array of what counts as research and what does not. Developing a way in which school district leaders can better access scholarly research and determine what resources are most reliable maybe one way to accomplish this. Additionally, the development of a central repository that is made available to school district leaders at no cost may also be a way in which to establish general agreement on what are and are not research-based practice.

Considering the importance of purpose that was related by the literature, as well as the different perspectives of how professional development was implemented, school district leaders may benefit from a deeper understanding of adult learning and research on professional development implementation. This may help school district leaders better align the purpose of
the professional development with how that professional development is implemented. While the school district leaders discussed, at length, the necessity of research as it related to instructional practices, they did not discuss research related to the implementation of professional development or the concepts related to adult learning. School district leaders’ practice related to the implementation of professional development might benefit from a review of how to best institute professional development initiatives as they relate not only to students but also to adults.

Furthermore, school district leaders would benefit from a process through which they are able to review their beliefs and how those beliefs are reflected in practice. Doctoral students are introduced to the concept of positionality and how it can affect the lens through which individuals filter information. School district leaders may benefit from a similar concept so that they understand how and when their belief systems affect their decision-making as it relates to professional development, research, instructional strategies, and even the process of decision-making in and of itself.

**Implications for Research**

Findings from this study indicated that the participants had a variety of interpretations as to what research-based meant. Each of the six participants defined research and what qualified as research differently. A study related to what is considered research-based, and what counts as research would be an informative study from both a scholarship point of view, as well as a normative standpoint. Findings from this study, as well as in the literature, suggest that there are a number of definitions for collaborative decision-making, this range of definitions for collaborative decision-making may indicated that research into what are and what are not collaborative decisions would provide guidance. The six participants were evenly split regarding the implementation format for their professional development, three subscribed to a structured
implementation, while three others preferred a fluid implementation. This finding suggests that deeper research into how the implementation of professional development affects the outcomes and application to the classroom may be worthwhile.

Based on the scope of the study and the limited nature of the participants, a fourth area of possible research would be to expand this study to include a greater cross section of school district leaders. A similar study might be appropriate, particularly if it included school district leaders from a larger geographic area, with greater racial diversity, and with school districts with greater populations of students. Analyzing how school district leaders outside of New Hampshire make decisions related to professional development may be beneficial to all school district leaders.

**Limitations**

This narrative research study was limited to six school district leaders in New Hampshire. The data collected reflected the experiences of these six school district leaders and their individual decision-making processes related to professional development for research-based instructional strategies. The data were based on their stories only and as such this research-study is limited to only their experiences and therefore cannot be generalized to all school district leaders. Additionally, this research study looked specifically at the decision-making processes related to professional development for research-based instructional strategies, it therefore cannot be generalized to other types of decisions made by school district leaders.

While there were discussions with participants about professional development for research-based strategies and how demographics may or may not be taken into consideration by the school district leaders during decision-making, the school district leaders identified demographics by socio-economic status as measured by free and reduced lunch percentages.
There is some correlation in New Hampshire between free and reduced lunch and the wealth status of individual school districts. However, this study is limited because there is not a specific way to rate the wealth index of the individual districts and free and reduced lunch percentages were not necessarily indicative of what was budgeted specifically for professional development in some of the school districts. Furthermore, spending on professional development was not assessed on a student-by student-basis and the adequacy of professional development spending was based on the perception of the school district leader.

Participants volunteered and were selected because they had recently implemented professional development for what they believed were research-based strategies. Therefore, the school district leaders may have been more cognizant of their decision-making at the time of the study and thus able to reflect more easily on their decision-making practices. A larger study may or may not have participants with the same proximity to their recent decisions. Additionally, all but one of the school district leaders had extensive experience in planning and implementing professional development. Their decisions may therefore be more informed by the trial and error they would have encountered prior to their more recent decisions related to professional development for research-based instructional strategies. Finally, because New Hampshire is a small state, with a limited number of school district leaders. Hence, the participants may have employed socially appropriate responding as the interviewer was a colleague and also a school district leader in New Hampshire.

Conclusion

This narrative study examined the experiences of six school district leaders related to decision-making about professional development for a research-based instructional strategy in their school districts. During the course of the study, as a scholar-practitioner I learned the
importance of reflecting on the affect my beliefs may have on the way in which I implement professional development. Furthermore, I also learned from the process of conducting the study that purpose or the “why” is a central tenet of decision-making as it is related to professional development. In talking with other educational leaders about their experiences, I realized that I need to be more cognizant of my own decision-making process, the role of my beliefs, and how the desired outcomes align with not only the decisions I make, but also the process I use to make them. My next steps as a scholar practitioner are to share my findings with my colleagues through collegial conversations, formal presentations, and to share the process designed to aid decision making related to professional development for a research-based strategy.
References


Friedman, T. L., & Mandelbaum, M. (2011). *That used to be us: How america fell behind in the world it invented and how we can come back*. Macmillan.


doi:10.1108/09513541011045272


doi:10.1177/1741143214537229


doi:10.1108/09578230210446027


Appendix A
Free/Reduced School Lunch Eligibility Rate by District

New Hampshire Department of Education
Division of Education Analytics and Resources
Bureau of Educational Statistics
101 Pleasant St., Concord, NH 03301-3852
Telephone (603) 271-2775 Fax (603) 271-3875

Free/Reduced School Lunch Eligibility by District, 2017 - 2018
As of October 31, 2017 data collection through i4See and Direct Certification

<table>
<thead>
<tr>
<th>District Name</th>
<th>Enrollment 10/01/2017</th>
<th>Free/Reduced Eligible</th>
<th>% Eligible</th>
</tr>
</thead>
<tbody>
<tr>
<td>State Average Gr 1-12</td>
<td>159,664</td>
<td>42,192</td>
<td>26.43%</td>
</tr>
<tr>
<td>9 Allenstown</td>
<td>325</td>
<td>135</td>
<td>41.54%</td>
</tr>
<tr>
<td>15 Alton</td>
<td>376</td>
<td>120</td>
<td>31.91%</td>
</tr>
<tr>
<td>17 Amherst</td>
<td>1,166</td>
<td>62</td>
<td>5.32%</td>
</tr>
<tr>
<td>19 Andover</td>
<td>230</td>
<td>55</td>
<td>23.91%</td>
</tr>
<tr>
<td>23 Ashland</td>
<td>135</td>
<td>68</td>
<td>50.37%</td>
</tr>
<tr>
<td>29 Auburn</td>
<td>557</td>
<td>45</td>
<td>8.08%</td>
</tr>
<tr>
<td>31 Barnstead</td>
<td>414</td>
<td>126</td>
<td>30.43%</td>
</tr>
<tr>
<td>33 Barrington</td>
<td>802</td>
<td>115</td>
<td>14.34%</td>
</tr>
<tr>
<td>35 Bartlett</td>
<td>158</td>
<td>51</td>
<td>32.28%</td>
</tr>
<tr>
<td>39 Bath</td>
<td>69</td>
<td>17</td>
<td>24.64%</td>
</tr>
<tr>
<td>41 Bedford</td>
<td>4,195</td>
<td>203</td>
<td>4.84%</td>
</tr>
<tr>
<td>51 Berlin</td>
<td>1,066</td>
<td>571</td>
<td>53.56%</td>
</tr>
<tr>
<td>53 Bethlehem</td>
<td>117</td>
<td>40</td>
<td>34.19%</td>
</tr>
<tr>
<td>57 Bow</td>
<td>1,561</td>
<td>78</td>
<td>5.00%</td>
</tr>
<tr>
<td>63 Brentwood</td>
<td>266</td>
<td>17</td>
<td>6.39%</td>
</tr>
<tr>
<td>71 Brookline</td>
<td>440</td>
<td>28</td>
<td>6.36%</td>
</tr>
<tr>
<td>75 Campton</td>
<td>259</td>
<td>82</td>
<td>31.66%</td>
</tr>
<tr>
<td>79 Candia</td>
<td>274</td>
<td>64</td>
<td>23.36%</td>
</tr>
<tr>
<td>93 Chester</td>
<td>453</td>
<td>31</td>
<td>6.84%</td>
</tr>
<tr>
<td>95 Chesterfield</td>
<td>249</td>
<td>57</td>
<td>22.89%</td>
</tr>
<tr>
<td>99 Chichester</td>
<td>181</td>
<td>29</td>
<td>16.02%</td>
</tr>
<tr>
<td>101 Claremont</td>
<td>1,600</td>
<td>800</td>
<td>50.00%</td>
</tr>
<tr>
<td>105 Colebrook</td>
<td>294</td>
<td>125</td>
<td>42.52%</td>
</tr>
<tr>
<td>111 Concord</td>
<td>4,187</td>
<td>1,505</td>
<td>35.94%</td>
</tr>
<tr>
<td></td>
<td>Town</td>
<td>Population</td>
<td>Members</td>
</tr>
<tr>
<td>---</td>
<td>-------------------------------------------</td>
<td>------------</td>
<td>---------</td>
</tr>
<tr>
<td>112</td>
<td>Contoocook Valley</td>
<td>1,966</td>
<td>502</td>
</tr>
<tr>
<td>113</td>
<td>Conway</td>
<td>1,666</td>
<td>578</td>
</tr>
<tr>
<td>115</td>
<td>Cornish</td>
<td>73</td>
<td>16</td>
</tr>
<tr>
<td>117</td>
<td>Croydon</td>
<td>22</td>
<td>5</td>
</tr>
<tr>
<td>127</td>
<td>Deerfield</td>
<td>423</td>
<td>54</td>
</tr>
<tr>
<td>131</td>
<td>Derry Cooperative</td>
<td>3,002</td>
<td>768</td>
</tr>
<tr>
<td>141</td>
<td>Dover</td>
<td>3,667</td>
<td>873</td>
</tr>
<tr>
<td>142</td>
<td>Dresden</td>
<td>1,097</td>
<td>39</td>
</tr>
<tr>
<td>149</td>
<td>Dunbarton</td>
<td>204</td>
<td>24</td>
</tr>
<tr>
<td>153</td>
<td>East Kingston</td>
<td>123</td>
<td>5</td>
</tr>
<tr>
<td>165</td>
<td>Epping</td>
<td>867</td>
<td>184</td>
</tr>
<tr>
<td>167</td>
<td>Epsom</td>
<td>387</td>
<td>100</td>
</tr>
<tr>
<td>171</td>
<td>Errol</td>
<td>15</td>
<td>2</td>
</tr>
<tr>
<td>173</td>
<td>Exeter</td>
<td>825</td>
<td>138</td>
</tr>
<tr>
<td>172</td>
<td>Exeter Region Cooperative</td>
<td>2,945</td>
<td>262</td>
</tr>
<tr>
<td>174</td>
<td>Fall Mountain Regional</td>
<td>1,351</td>
<td>632</td>
</tr>
<tr>
<td>175</td>
<td>Farmington</td>
<td>783</td>
<td>381</td>
</tr>
<tr>
<td>185</td>
<td>Franklin</td>
<td>930</td>
<td>490</td>
</tr>
<tr>
<td>187</td>
<td>Freedom</td>
<td>48</td>
<td>19</td>
</tr>
<tr>
<td>189</td>
<td>Fremont</td>
<td>354</td>
<td>46</td>
</tr>
<tr>
<td>191</td>
<td>Gilford</td>
<td>1,079</td>
<td>170</td>
</tr>
<tr>
<td>195</td>
<td>Gilmanton</td>
<td>359</td>
<td>60</td>
</tr>
<tr>
<td>199</td>
<td>Goffstown</td>
<td>2,622</td>
<td>436</td>
</tr>
<tr>
<td>203</td>
<td>Gorham Randolph Shelburne Cooperative</td>
<td>377</td>
<td>100</td>
</tr>
<tr>
<td>208</td>
<td>Governor Wentworth Regional</td>
<td>2,150</td>
<td>660</td>
</tr>
<tr>
<td>211</td>
<td>Grantham</td>
<td>183</td>
<td>18</td>
</tr>
<tr>
<td>215</td>
<td>Greenland</td>
<td>369</td>
<td>24</td>
</tr>
<tr>
<td>223</td>
<td>Hampstead</td>
<td>766</td>
<td>68</td>
</tr>
<tr>
<td>225</td>
<td>Hampton</td>
<td>977</td>
<td>166</td>
</tr>
<tr>
<td>227</td>
<td>Hampton Falls</td>
<td>210</td>
<td>12</td>
</tr>
<tr>
<td>233</td>
<td>Hanover</td>
<td>390</td>
<td>21</td>
</tr>
<tr>
<td>235</td>
<td>Harrisville</td>
<td>41</td>
<td>8</td>
</tr>
<tr>
<td>238</td>
<td>Haverhill Cooperative</td>
<td>596</td>
<td>232</td>
</tr>
<tr>
<td>245</td>
<td>Henniker</td>
<td>340</td>
<td>97</td>
</tr>
<tr>
<td>247</td>
<td>Hill</td>
<td>56</td>
<td>14</td>
</tr>
<tr>
<td>251</td>
<td>Hillsboro-Deering Cooperative</td>
<td>1,042</td>
<td>417</td>
</tr>
<tr>
<td>255</td>
<td>Hinsdale</td>
<td>495</td>
<td>233</td>
</tr>
<tr>
<td>257</td>
<td>Holderness</td>
<td>147</td>
<td>21</td>
</tr>
<tr>
<td>259</td>
<td>Hollis</td>
<td>581</td>
<td>17</td>
</tr>
<tr>
<td>260</td>
<td>Hollis-Brookline Cooperative</td>
<td>1,225</td>
<td>52</td>
</tr>
<tr>
<td>261</td>
<td>Hooksett</td>
<td>1,192</td>
<td>223</td>
</tr>
<tr>
<td>263</td>
<td>Hopkinton</td>
<td>870</td>
<td>68</td>
</tr>
<tr>
<td>Place</td>
<td>Pop</td>
<td>Electors</td>
<td>Turnout</td>
</tr>
<tr>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------</td>
</tr>
<tr>
<td>Hudson</td>
<td>3,180</td>
<td>515</td>
<td>16.19%</td>
</tr>
<tr>
<td>Inter-Lakes Cooperative</td>
<td>928</td>
<td>254</td>
<td>27.37%</td>
</tr>
<tr>
<td>Jackson</td>
<td>37</td>
<td>5</td>
<td>13.51%</td>
</tr>
<tr>
<td>Jaffrey-Rindge Cooperative</td>
<td>1,253</td>
<td>348</td>
<td>27.77%</td>
</tr>
<tr>
<td>John Stark Regional</td>
<td>663</td>
<td>99</td>
<td>14.93%</td>
</tr>
<tr>
<td>Kearsarge Regional</td>
<td>1,597</td>
<td>260</td>
<td>16.28%</td>
</tr>
<tr>
<td>Keene</td>
<td>3,055</td>
<td>988</td>
<td>32.34%</td>
</tr>
<tr>
<td>Kensington</td>
<td>89</td>
<td>13</td>
<td>14.61%</td>
</tr>
<tr>
<td>Laconia</td>
<td>1,734</td>
<td>868</td>
<td>50.06%</td>
</tr>
<tr>
<td>Lafayette Regional</td>
<td>107</td>
<td>21</td>
<td>19.63%</td>
</tr>
<tr>
<td>Landaff</td>
<td>14</td>
<td>3</td>
<td>21.43%</td>
</tr>
<tr>
<td>Lebanon</td>
<td>1,517</td>
<td>359</td>
<td>23.67%</td>
</tr>
<tr>
<td>Lempster</td>
<td>93</td>
<td>34</td>
<td>36.56%</td>
</tr>
<tr>
<td>Lincoln-Woodstock Cooperative</td>
<td>282</td>
<td>80</td>
<td>28.37%</td>
</tr>
<tr>
<td>Lisbon Regional</td>
<td>306</td>
<td>142</td>
<td>46.41%</td>
</tr>
<tr>
<td>Litchfield</td>
<td>1,205</td>
<td>105</td>
<td>8.71%</td>
</tr>
<tr>
<td>Littleton</td>
<td>655</td>
<td>279</td>
<td>42.60%</td>
</tr>
<tr>
<td>Londonderry</td>
<td>3,941</td>
<td>425</td>
<td>10.78%</td>
</tr>
<tr>
<td>Lyme</td>
<td>174</td>
<td>17</td>
<td>9.77%</td>
</tr>
<tr>
<td>Madison</td>
<td>117</td>
<td>53</td>
<td>45.30%</td>
</tr>
<tr>
<td>Manchester</td>
<td>12,257</td>
<td>7,090</td>
<td>57.84%</td>
</tr>
<tr>
<td>Marlborough</td>
<td>154</td>
<td>65</td>
<td>42.21%</td>
</tr>
<tr>
<td>Marlow</td>
<td>27</td>
<td>9</td>
<td>33.33%</td>
</tr>
<tr>
<td>Mascenic Regional</td>
<td>956</td>
<td>282</td>
<td>29.50%</td>
</tr>
<tr>
<td>Mascoma Valley Regional</td>
<td>1,035</td>
<td>317</td>
<td>30.63%</td>
</tr>
<tr>
<td>Mason</td>
<td>56</td>
<td>10</td>
<td>17.86%</td>
</tr>
<tr>
<td>Merrimack</td>
<td>3,427</td>
<td>331</td>
<td>9.66%</td>
</tr>
<tr>
<td>Merrimack Valley</td>
<td>2,228</td>
<td>616</td>
<td>27.65%</td>
</tr>
<tr>
<td>Middleton</td>
<td>110</td>
<td>40</td>
<td>36.36%</td>
</tr>
<tr>
<td>Milan</td>
<td>91</td>
<td>38</td>
<td>41.76%</td>
</tr>
<tr>
<td>Milford</td>
<td>2,201</td>
<td>390</td>
<td>17.72%</td>
</tr>
<tr>
<td>Milton</td>
<td>474</td>
<td>138</td>
<td>29.11%</td>
</tr>
<tr>
<td>Monadnock Regional</td>
<td>1,433</td>
<td>489</td>
<td>34.12%</td>
</tr>
<tr>
<td>Monroe</td>
<td>74</td>
<td>14</td>
<td>18.92%</td>
</tr>
<tr>
<td>Mont Vernon</td>
<td>154</td>
<td>14</td>
<td>9.09%</td>
</tr>
<tr>
<td>Moultonborough</td>
<td>457</td>
<td>134</td>
<td>29.32%</td>
</tr>
<tr>
<td>Nashua</td>
<td>10,049</td>
<td>4,097</td>
<td>40.77%</td>
</tr>
<tr>
<td>Nelson</td>
<td>56</td>
<td>25</td>
<td>44.64%</td>
</tr>
<tr>
<td>New Boston</td>
<td>492</td>
<td>49</td>
<td>9.96%</td>
</tr>
<tr>
<td>New Castle</td>
<td>48</td>
<td>3</td>
<td>6.25%</td>
</tr>
<tr>
<td>Newfields</td>
<td>103</td>
<td>2</td>
<td>1.94%</td>
</tr>
<tr>
<td>Newfound Area</td>
<td>1,118</td>
<td>473</td>
<td>42.31%</td>
</tr>
<tr>
<td>Code</td>
<td>Town</td>
<td>New</td>
<td>Old</td>
</tr>
<tr>
<td>------</td>
<td>-----------------------</td>
<td>-----------------</td>
<td>-----------------</td>
</tr>
<tr>
<td>391</td>
<td>Newington</td>
<td>39</td>
<td>3</td>
</tr>
<tr>
<td>399</td>
<td>Newmarket</td>
<td>935</td>
<td>210</td>
</tr>
<tr>
<td>401</td>
<td>Newport</td>
<td>908</td>
<td>434</td>
</tr>
<tr>
<td>405</td>
<td>North Hampton</td>
<td>321</td>
<td>24</td>
</tr>
<tr>
<td>407</td>
<td>Northumberland</td>
<td>312</td>
<td>150</td>
</tr>
<tr>
<td>411</td>
<td>Northwood</td>
<td>340</td>
<td>76</td>
</tr>
<tr>
<td>413</td>
<td>Nottingham</td>
<td>473</td>
<td>49</td>
</tr>
<tr>
<td>423</td>
<td>Oyster River Coop</td>
<td>2,028</td>
<td>129</td>
</tr>
<tr>
<td>425</td>
<td>Pelham</td>
<td>1,800</td>
<td>220</td>
</tr>
<tr>
<td>427</td>
<td>Pembroke</td>
<td>1,434</td>
<td>314</td>
</tr>
<tr>
<td>428</td>
<td>Pemi-Baker Regional</td>
<td>676</td>
<td>184</td>
</tr>
<tr>
<td>435</td>
<td>Piermont</td>
<td>55</td>
<td>15</td>
</tr>
<tr>
<td>437</td>
<td>Pittsburg</td>
<td>86</td>
<td>32</td>
</tr>
<tr>
<td>439</td>
<td>Pittsfield</td>
<td>510</td>
<td>249</td>
</tr>
<tr>
<td>441</td>
<td>Plainfield</td>
<td>180</td>
<td>14</td>
</tr>
<tr>
<td>447</td>
<td>Plymouth</td>
<td>361</td>
<td>130</td>
</tr>
<tr>
<td>449</td>
<td>Portsmouth</td>
<td>2,455</td>
<td>364</td>
</tr>
<tr>
<td>450</td>
<td>Profile</td>
<td>228</td>
<td>52</td>
</tr>
<tr>
<td>453</td>
<td>Raymond</td>
<td>1,153</td>
<td>298</td>
</tr>
<tr>
<td>461</td>
<td>Rochester</td>
<td>3,879</td>
<td>1,671</td>
</tr>
<tr>
<td>463</td>
<td>Rollinsford</td>
<td>129</td>
<td>8</td>
</tr>
<tr>
<td>467</td>
<td>Rumney</td>
<td>96</td>
<td>40</td>
</tr>
<tr>
<td>471</td>
<td>Rye</td>
<td>357</td>
<td>23</td>
</tr>
<tr>
<td>473</td>
<td>Salem</td>
<td>3,292</td>
<td>538</td>
</tr>
<tr>
<td>476</td>
<td>Sanborn Regional</td>
<td>1,453</td>
<td>227</td>
</tr>
<tr>
<td>485</td>
<td>Seabrook</td>
<td>586</td>
<td>242</td>
</tr>
<tr>
<td>486</td>
<td>Shaker Regional</td>
<td>1,188</td>
<td>393</td>
</tr>
<tr>
<td>491</td>
<td>Somersworth</td>
<td>1,408</td>
<td>661</td>
</tr>
<tr>
<td>493</td>
<td>Souhegan Cooperative</td>
<td>787</td>
<td>40</td>
</tr>
<tr>
<td>495</td>
<td>South Hampton</td>
<td>70</td>
<td>1</td>
</tr>
<tr>
<td>499</td>
<td>Stark</td>
<td>25</td>
<td>9</td>
</tr>
<tr>
<td>501</td>
<td>Stewartstown</td>
<td>64</td>
<td>34</td>
</tr>
<tr>
<td>503</td>
<td>Stoddard</td>
<td>63</td>
<td>25</td>
</tr>
<tr>
<td>507</td>
<td>Strafford</td>
<td>371</td>
<td>43</td>
</tr>
<tr>
<td>509</td>
<td>Stratford</td>
<td>57</td>
<td>47</td>
</tr>
<tr>
<td>511</td>
<td>Stratham</td>
<td>446</td>
<td>28</td>
</tr>
<tr>
<td>515</td>
<td>Sunapee</td>
<td>376</td>
<td>57</td>
</tr>
<tr>
<td>525</td>
<td>Tamworth</td>
<td>172</td>
<td>81</td>
</tr>
<tr>
<td>531</td>
<td>Thornton</td>
<td>180</td>
<td>70</td>
</tr>
<tr>
<td>534</td>
<td>Timberlane Regional</td>
<td>3,199</td>
<td>402</td>
</tr>
<tr>
<td>539</td>
<td>Unity</td>
<td>99</td>
<td>41</td>
</tr>
<tr>
<td>543</td>
<td>Wakefield</td>
<td>374</td>
<td>153</td>
</tr>
<tr>
<td></td>
<td>Location</td>
<td>Total</td>
<td>Non-</td>
</tr>
<tr>
<td>---</td>
<td>------------------------------</td>
<td>-------</td>
<td>------</td>
</tr>
<tr>
<td>549</td>
<td>Warren</td>
<td>63</td>
<td>30</td>
</tr>
<tr>
<td>551</td>
<td>Washington</td>
<td>34</td>
<td>12</td>
</tr>
<tr>
<td>553</td>
<td>Waterville Valley</td>
<td>18</td>
<td>3</td>
</tr>
<tr>
<td>555</td>
<td>Weare</td>
<td>929</td>
<td>186</td>
</tr>
<tr>
<td>559</td>
<td>Wentworth</td>
<td>50</td>
<td>25</td>
</tr>
<tr>
<td>563</td>
<td>Westmoreland</td>
<td>124</td>
<td>15</td>
</tr>
<tr>
<td>568</td>
<td>White Mountains Regional</td>
<td>1,001</td>
<td>434</td>
</tr>
<tr>
<td>572</td>
<td>Wilton-Lyndeborough Cooperative</td>
<td>492</td>
<td>125</td>
</tr>
<tr>
<td>573</td>
<td>Winchester</td>
<td>348</td>
<td>191</td>
</tr>
<tr>
<td>575</td>
<td>Windham</td>
<td>2,753</td>
<td>84</td>
</tr>
<tr>
<td>581</td>
<td>Winnacunnet Cooperative</td>
<td>1,051</td>
<td>201</td>
</tr>
<tr>
<td>582</td>
<td>Winnisquam Regional</td>
<td>1,325</td>
<td>412</td>
</tr>
</tbody>
</table>
Appendix B

Email to Professional Colleagues

Dear *****

As you know, I am presently a doctoral candidate at Northeastern University and I am conducting a study on decision-making by school district leaders. The purpose of the study is to explore school district leaders’ decision-making processes related to professional development for research-based strategies.

My intention is to recruit 5-7 school district leaders as participants and I am hoping that you would consider participating in this study. Participants will meet with me individually a minimum of two times to discuss decision-making and professional development. Each participant will receive a 50-dollar gift card as a token of gratitude for participating in the study.

I will conduct interviews individually with participants. Participant names, work places, school districts, staff names, and all identifiable information will be referred to with pseudonyms, participation will be confidential, and you can withdraw from the study at any time.

I will call by the end of the week to answer any questions that you might have about potential participation.

Have a wonderful day,

Kimberly Rizzo Saunders
Doctoral Candidate
Northeastern University
Appendix C

Follow-up Telephone Script

Hello ******,

How are you? I am following up on the email I sent on [Day], [Date]. I am hoping that you are willing to participate. Do you have any questions that I can answer about potential participation?

[Answer questions]

I just want to add that participation is completely voluntary, participant names, work places, school districts, staff names, and all identifiable information will be referred to with pseudonyms, participation will be confidential, and you can withdraw from the study at any time. Also, participants will receive a $50-dollar gift card for participating in the study.

Do you think you would like to participate?

Yes, that’s great. I will send a letter through email with more information to you and I will give you a call in the next couple of days to set up our first meeting.

OR

No, I certainly understand how busy everyone is and I really appreciate you taking the time to talk with me today.

Have a good day,
Good-bye
Hi Nate,

As you know, I am presently a doctoral candidate at Northeastern University and I am conducting a study on decision-making by school district leaders. The purpose of the study is to explore school district leaders’ decision-making processes related to professional development for research-based strategies.

My intention is to recruit 5-7 school district leaders as participants. I am hoping that you might have some suggestions on who might be interested in participating in the study. I am looking for school district leaders that meet the following:

a) are responsible for making decisions related to professional development for his or her district  
b) the school district leader has or will be instituting ongoing professional development for a specific research-based practice,  
c) at least one participant who works in a school district in which free and reduced lunch is not greater than 15 percent  
d) at least one participant who works in a school district in which free and reduced lunch is lunch between 15 percent and 35 percent  
e) and at least one participant who works in a school district in which free and reduced lunch is greater than 35 percent

Participants will meet with me individually a minimum of two times to discuss decision-making and professional development. Each participant will receive a 50-dollar gift card as a token of gratitude for participating in the study.

If you know of potential participants could you please send me their contact information including name, school district name, email address, and phone number, by replying to this email.

As always thanks for your continued support,

Kimberly Rizzo Saunders  
Doctoral Candidate  
Northeastern University
Appendix E
Email to potential candidates through Nate Greenberg

Dear *******,

Please allow me to introduce myself, my name is Kimberly Rizzo Saunders, I am presently a doctoral candidate at Northeastern University and I am conducting a study on decision-making by school district leaders. The purpose of the study is to explore school district leaders’ decision-making processes related to professional development for research-based strategies.

Mr. Nate Greenberg sent me your name as an individual who might be interested in participating in this study. Participation in the study will include a commitment of two, 1-hour audio-recorded meetings with me to discuss your decision-making and professional development in your school district. Following the meetings, I will ask you to verify and confirm information that I captured on the audio recording. You will have the opportunity to elaborate on the information you provided and ask follow up questions that you might have at any time during your participation in the study. Participants, work places, school districts, staff names and all identifiable information will be referred to with pseudonyms, participation will be confidential, and you can withdraw from the study at any time. You will receive a 50-dollar gift card as a token of gratitude for participating in the study.

I will be reaching out to you in the next few days by telephone to answer any questions you might have.

Best,

Kimberly Rizzo Saunders
Doctoral Candidate
Northeastern University
Appendix F

Follow-up Telephone Script

Hello *****,

How are you? I am following up on the email I sent on [Day], [Date]. Nate Greenberg had given me your name as someone who might be interested in participating in my study. I am hoping that you are willing to participate. Do you have any questions that I can answer about potential participation?

[Answer questions]

I just want to add that participation is completely voluntary, participant names, work places, school districts, staff names, and all identifiable information will be referred to with pseudonyms, participation will be confidential, and you can withdraw from the study at any time. Also, participants will receive a $50-dollar gift card for participating in the study.

Do you think you would like to participate?

Yes, that’s great. I will send a letter through email with more information to you and I will give you a call in the next couple of days to set up our first meeting.

OR

No, I certainly understand how busy everyone is and I really appreciate you taking the time to talk with me today.

Have a good day,
Good-bye
Appendix G

Script for announcement at Southwesterns

As many of you know I am presently a doctoral candidate at Northeastern University and I am conducting a study on decision-making by school district leaders. The purpose of the study is to explore school district leaders’ decision-making processes related to professional development for research-based strategies.

My intention is to recruit 5-7 school district leaders as participants. I am hoping that some of you might consider participating, or providing me with contact information for someone that you believe might be interested in participating. Participants would be eligible for the study if they:

a) are responsible for making decisions related to professional development for his or her district
b) the school district leader has or will be instituting ongoing professional development for a specific research-based practice,
c) at least one participant who works in a school district in which free and reduced lunch is not greater than 15 percent
d) at least one participant who works in a school district in which free and reduced lunch is lunch between 15 percent and 35 percent
e) and at least one participant who works in a school district in which free and reduced lunch is greater than 35 percent

I will conduct interviews individually with participants on at least two occasions, the interviews will be about decision-making, specifically decision-making around professional development. Participants, work places, school districts, staff names and all identifiable information will be referred to with pseudonyms, participation will be confidential, and you can withdraw from the study at any time. If you think you might be interested please reach out to me following our meeting, email me, or call me. Each participant will receive a 50-dollar gift card as a token of gratitude for participating in the study.

Thank you for your support.
Appendix H

Handout Southwesterns

Dear Colleague,

I am presently a doctoral candidate at Northeastern University and I am conducting a study on decision-making by school district leaders. The purpose of the study is to explore school district leaders’ decision-making processes related to professional development for research-based strategies.

My intention is to recruit 5-7 school district leaders as participants. Participants would be eligible for the study if they:

a) are responsible for making decisions related to professional development for his or her district
b) the school district leader has or will be instituting ongoing professional development for a specific research-based practice,
c) at least one participant who works in a school district in which free and reduced lunch is not greater than 15 percent
d) at least one participant who works in a school district in which free and reduced lunch is lunch between 15 percent and 35 percent
e) and at least one participant who works in a school district in which free and reduced lunch is greater than 35 percent

Participants will meet with me individually a minimum of two times to discuss decision-making and professional development. Each participant will receive a 50-dollar gift card as a token of gratitude for participating in the study. If you think you would be interested in participating, or would like more information, please contact me at saunders.k@husky.neu.edu or 603-490-7236.

Thank you for your support.

Best,

Kimberly Rizzo Saunders
Doctoral Candidate
Northeastern University
Appendix I
Letter to Potential Participants

(Name)
(Position)
****** School District
(Street)
(City, State, Zip Code)

(Month) (Day), 2018

Dear ********,

Thank you for your interest in the study I am conducting on decision-making by school district leaders. The purpose of the study is to explore school district leaders’ decision-making processes related to professional development for research-based strategies.

Participation in the study will include a commitment of two, 1-hour audio-recorded meetings with me to discuss your decision-making and professional development in your school district. Following the meetings, I will ask you to verify and confirm information that I captured on the audio recording. You will have the opportunity to elaborate on the information you provided and ask follow up questions that you might have at any time during your participation in the study. Participants, work places, school districts, staff names and all identifiable information will be referred to with pseudonyms, participation will be confidential, and you can withdraw from the study at any time. You will receive a 50-dollar gift card as a token of gratitude for participating in the study.

I will be reaching out to you in the next few days to confirm your continued interest, to answer any questions you might have and to set up our initial meeting. In the meantime, if you have any questions or concerns you can reach me through email at saunders.k@husky.neu.edu or by phone at 603-490-7236. I look forward to meeting you. Thank you for your willingness to participate in this study.

Best,

Kimberly Rizzo Saunders
Doctoral Candidate
Northeastern University
Appendix J

Initial Conversation Phone Script

Good Afternoon *******,

Thank you for expressing interest in participating in my research study. As I outlined in the letter I sent, your participation will include two meetings of approximately one hour each and we will be discussing your decision-making processes as they relate to professional development in your school district. I will also send you transcripts and notes that result from our meetings. This will give you the opportunity to elaborate or ask questions. Your participation in the study is voluntary and you may withdraw at any time.

Do you have any questions?

When and where are you available to meet?

Thank you, I look forward to seeing you on [Date] at [Place] beginning at [Time].

Have a great day!
Appendix K

Email follow up

Thank you for speaking with me earlier today. I am looking forward to meeting with you.

We will be meeting on (Date), (Time) at (Location). The interview will take approximately 1 hour. Attached to this email please find a review copy of the informed consent document that I will be asking you to sign at our meeting. I will bring a hard copy to our meeting for you to sign.

If you have any questions or need to cancel our meeting, please call me at 603-490-7236.

Have a wonderful day,

Kimberly Rizzo Saunders
Doctoral Candidate
Northeastern University
Appendix L

Informed Consent Document

Northeastern University, Department: College Of Professional Studies
Name of Investigators:
Dr. Corliss Thompson Brown, Principal Investigator
Kimberly Rizzo Saunders, Doctoral Student Researcher
Title of Project: Leadership Decisions and Professional Development: Examining how
school district leaders make decisions about professional development.

Informed Consent to Participate in a Research Study
We are inviting you to take part in a research study. This form will tell you about the study, but
the researcher will explain it to you first. You may ask this person any questions that you have.
When you are ready to make a decision, you may tell the researcher if you want to participate or
not. You do not have to participate if you do not want to. If you decide to participate, the
researcher will ask you to sign this statement and will give you a copy to keep.

Why is this research study being done?
The purpose of this study is to explore the decision-making processes of school district leaders it
relates to professional development for research-based strategies.

Why am I being asked to take part in this research study?
You are being asked to participate in this research study because you are a school district leader
that makes decisions about professional development for your school district.

What will I be asked to do?
If you decide to take part in this study, we will ask you to answer questions about your decision-
making related to professional development. There will be two semi-structured interviews that
will last approximately 60 minutes in total and will be recorded. You will be asked to review
materials associated with your interview to ensure accuracy, this will take 60 minutes. Your
name, your school district name, your place of work, where you reside, and any other identifiable
information will not appear in the interview transcript, pseudonyms will be used.

Where will this take place and how much of my time will it take?
You will be interviewed in place that is convenient for you. The two interviews will take
approximately 60 minutes each for a total of 120 minutes. You will be asked to review materials
associated with your interview to ensure accuracy, this will take 60 minutes. Total participation
in the study will be not exceed 3 hours.

Will there be any risk or discomfort to me?
There will be no personal or physical risk to you. All data collected will be strictly confidential.
You will be assigned a pseudo name as will any person or place you mention. The information
collected will be stored safely and following the completion of the study will be destroyed. You
will be allowed to read the transcript when it is transcribed and coded to check it for validity.
You are allowed to withdraw from the study at any time.

Will I benefit by being in this research?
You will receive a 50-dollar gift card for participating in the study. Additionally, the information gained may provide an opportunity for you to reflect on decision-making. Furthermore, the study may contribute to the current body of knowledge on decision-making by school district leaders.

<table>
<thead>
<tr>
<th>Who will see the information about me?</th>
</tr>
</thead>
<tbody>
<tr>
<td>Your part in this study will be confidential. Only the researchers on this study will see the information about you. No reports or publications will use information that can identify you in any way or any individual as being of this project. The data collected in the audio-recording, transcript, and interview notes will be given a pseudo name and an identification number. Your name, the name of others, and the names of places mentioned will not be used in this study. The data will be stored securely on a memory stick and locked in a file cabinet. No unauthorized persons will be allowed to read the data collected or materials affiliated with it. Authorized members in the Northeastern University Institutional Review Board would be permitted to see the information, if required.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>What will happen if I suffer any harm from this research?</th>
</tr>
</thead>
<tbody>
<tr>
<td>There are no foreseeable reasons for you to suffer any harm. No special arrangements will be made for compensation or for payment for treatment solely because of participation in this study.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Can I stop my participation in this study?</th>
</tr>
</thead>
<tbody>
<tr>
<td>Your participation in this research is completely voluntary. You do not have to participate if you do not want to and you can refuse to answer any question. Even if you begin the study, you may withdraw at any time.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Who can I contact if I have questions or problems?</th>
</tr>
</thead>
<tbody>
<tr>
<td>If you have any questions about this study, please feel free to contact Kimberly Rizzo Saunders, Doctoral Student Researcher, at <a href="mailto:saunders.k@husky.neu.edu">saunders.k@husky.neu.edu</a>, Dr. Corliss Thompson Brown, the Principal Investigator, at <a href="mailto:co.brown@husky.neu.edu">co.brown@husky.neu.edu</a>.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Who can I contact about my rights as a participant?</th>
</tr>
</thead>
<tbody>
<tr>
<td>If you have questions about your rights in this research, you may contact the Institutional Review Board Coordinator at Northeastern University, at 617-373-6659. You may call anonymously if you wish.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Will I be paid for my participation?</th>
</tr>
</thead>
<tbody>
<tr>
<td>You will be receiving a $50 gift card for your participation in the study.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>I agree to take part in this research.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Signature of person agreeing to take part</td>
</tr>
<tr>
<td>Printed name of person above</td>
</tr>
<tr>
<td>Signature of person who explained the study to the participant above and obtained consent</td>
</tr>
<tr>
<td>Printed name of person above</td>
</tr>
</tbody>
</table>
Appendix M

Completion Certificate

Protection Human Research Participants

Certificate of Completion

The National Institutes of Health (NIH) Office of Extramural Research certifies that Kimberly Saunders successfully completed the NIH Web-based training course “Protecting Human Research Participants”.

Date of completion: 11/12/2013

Certification Number: 1325631
Appendix N

First Round Interview Protocol

I am a doctoral candidate at Northeastern University. The final part of my program requires that I conduct a research study and write a dissertation. The purpose of the study I am conducting is to explore the decision-making processes of school district leaders as it relates to professional development for research-based strategies. As part of that exploration, I am conducting an interview with you today that will last approximately one hour. Before we get started, I just wanted to remind you of a few important points: a) your participation in this research is confidential, your identity, your place of employment, and all other identifiable information will be referred to using pseudonyms; b) any data that includes your identity will be stored in files only accessible to the principal researcher and myself, the doctoral student; c) your participation is completely voluntary and you can choose to withdraw at any time.

I would like to audio-record our conversation today, could I have your permission to do so? After I transcribe the audio recording, I will give you a copy to review. Do you have any questions before we begin?

Context:

1. Tell me a little bit about yourself. How and why did you become a school district leader.
2. Please describe the leadership structure for your school district.
3. What is the mission and vision for your school district?
4. Do you presently have a strategic plan? What are the key priorities of the strategic plan?
5. Could you describe for me the roles you have had related to professional development decision-making prior to coming to work for [district name]?
6. You are responsible for making decisions about professional development for [district name], how did this become your role and what specifically does your role around professional development involve?
7. What is the annual allocation for professional development in your district? Do you believe that this is a sufficient amount? Why or Why not?
8. How are decisions related to allocation of resources for specific types of professional development made?
9. Can you outline how the negotiated agreement in your district may or may not impact your decisions related to professional development?
10. What role, if any, does being a district with [number] percent free and reduced lunch have in your decision-making for professional development?

Beliefs and Values:

1. How would you define professional development?
2. What are your perspectives about professional development?
3. What role do you think research should play in teacher practice?
4. What are your perspectives on decision-making?
5. Describe for me the resources that you believe are relevant to your decision-making related to professional development.
6. What role does the mission and core values of the school district play in your decision-making around professional development?
7. What role do community values and needs play in your decision-making around professional development?
8. How are policy decisions for professional development made?
9. How are resource allocations decision for professional development made?
10. Could you describe for me the importance of improvement of practice when you are making decisions related to professional development?
11. Could you describe for me the importance of providing teachers with new and different strategies when you are making decisions related to professional development?
12. Can you describe the consideration you give to the need for balance of instructional time and the need for professional development when you are making decisions regarding professional development?

Process:

1. What do you consider the most important antecedents for making a decision related to professional development?
2. How do you make decisions about what professional development is needed for [district name]?
3. What contributes to your decisions regarding the kinds of professional development you offer in [district name]?
4. Are there other people involved in making decisions about professional development for [district name], if so, how do you decide who is involved, and what role do they play in the decision(s) for professional development? How do you clarify roles when there are multiple people involved?
5. When deciding on what types of professional development to offer, what steps do you take?
6. Are goals developed for professional development? If so, how does this happen?
7. What are the most recent professional development priorities that you have determined for [district name]?
8. Is there anything else you would like to share regarding how you make decisions related to professional development?

The next time we meet, I would like to discuss more about your decision to offer professional development for [research-based strategy]. Could you bring documents associated to the decision process, allocation process, and implementation of the professional development for [research-based strategy]?
Appendix O

Second Round Interview Protocol

I am a doctoral candidate at Northeastern University. The final part of my program requires that I conduct a research study and write a dissertation. The purpose of the study I am conducting is to explore the decision-making processes of school district leaders as it relates to professional development for research-based strategies. As part of that exploration, I am conducting an interview with you today that will last approximately one hour. Before we get started, I just wanted to remind you of a few important points: a) your participation in this research is confidential, your identity, your place of employment, and all other identifiable information will be referred to using pseudonyms; b) any data that includes your identity will be stored in files only accessible to the principal researcher and myself, the doctoral student; c) your participation is completely voluntary and you can choose to withdraw at any time.

This is the second of two interviews and as I did previously, I would like to audio-record our conversation today, could I have your permission to do so? After I transcribe the audio recording, I will give you a copy to review. Do you have any questions before we begin?

The last time we met I asked you to bring documents associated to the decision process, allocation process, and implementation of the professional development for [research-based strategy]? If you were able to locate those documents, you should feel free to refer to those as needed throughout our conversation today.

Decisions related to what professional development was provided:

1. Walk me through the decision-making process for providing professional development to teachers on [research-based strategy].
2. Could you describe for me the role that the district mission and vision played in your decision-making to offer professional development for [research-based strategy]? 
3. When did you first realize that you needed to provide professional development for [research-based strategy]?
4. What information made you come to that realization?
5. What type of research did you do around [research-based strategy] prior to deciding to provide this professional development? If you did research, how did you come across this research and what sources did you use for information?
6. Once you realized that professional development was needed for [research-based strategy] what did you do next? Why was that the next step you took?
7. Please describe for me the outcome that you were anticipating when you made the decision to offer professional development for [research-based strategy]
8. How did that desired outcome help you in your decision-making?
9. Could you describe for me the importance of improvement of practice when you are making decisions when you made the decision to provide professional development for [research-based strategy]?
10. Could you describe for me the importance of providing teachers with new and different strategies when you made the decision to provide professional development for [research-based strategy]?

11. What role did resources play in your decision to provide professional development for [research-based strategy]?

12. Could you describe how being a district with [number] percent free and reduced lunch is considered in your decision-making for professional development for [research-based strategy]?

Decisions related to the implementation of professional development for the specific research-based strategy:

1. How did you go about implementing the professional development for [research-based strategy]?
2. Why did you decide that this was the best way to implement professional development for [research-based strategy]?
3. How much time did you decide what was necessary to implement professional development for [research-based strategy], how did you decide on this much time?
4. How much did it cost the district to provide professional development for [research-based strategy], how did you decide to make this allocation? Why did you decide to allocate that much?
5. Describe the success of your implementation of professional development for [research-based strategy].
6. What do you attribute to the level of success of the professional development for [research-based strategy]?
7. What percent of your teaching staff participated in professional development for [research-based strategy]?
8. How will you decide on how to implement professional development for [research-based] strategy for teachers new to your district?
9. Thank you for bringing these documents with you today. Is there anything that you want to point out to me related to the professional development for [research-based strategy] within these documents? Is there anything in them specific to the professional development decisions that you have made related to [research-based strategy] that we have not already discussed?
10. Is there anything else you would like to share regarding how you made decisions related to professional development for [research-based strategy] in your school district?