WHY TEACHERS STAY IN THE CLASSROOM:
A CASE STUDY OF A LOW-ATTRITION ALASKAN SCHOOL DISTRICT

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Abstract

Research shows that the United States has a teacher shortage and that one major cause is low teacher retention. The problem is especially dire in the US state of Alaska, where some districts face annual teacher attrition rates as high as 85%. Many studies have questioned teachers who leave the classroom about why they left, but few have asked those who stay why they stayed. Most research has also focused on school districts with high attrition and used survey instrumentation and quantitative analysis. This qualitative case study investigates a rural Alaskan school district with very low teacher attrition and seeks to discover why the teachers there stay. It is based in Self-Determination Theory’s understanding of motivation and uses a modified version of the Basic Psychological Need Satisfaction at Work Scale (BPNSWS) survey to conduct semi-structured interviews investigating the teachers’ reasons for staying in the classroom and in the district for as long as they have. Additional data are also collected on teacher demographics, pay, and personal traits. Results show that a very strong sense of teacher autonomy was the strongest driver of retention. Further study is called for both in using the BPNSWS scale in qualitative research and in investigating the motives of teachers who stay in the classroom directly.

Keywords: Teacher Retention, Teacher Autonomy, Self-Determination Theory, Basic Psychological Needs Theory, Basic Psychological Need Satisfaction at Work Scale, Rural Schools
Dedication

This project is dedicated to my father, Dr. R. Kent Sargent, a man of great learning and intelligence – a man of wit and charm. You have taught me so much about life, learning, and knowledge. I can only hope to someday make as large a mark on the world as you have.
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I would like to acknowledge the massive amount of support my wife Yoshimi has provided me as I planned, performed, and wrote about this project – up to and including agreeing to watch our toddler alone for a week while I flew to Alaska.

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Chapter One: Introduction

The United States has a dire shortage of teachers, and the shortage will continue to grow if we do nothing. American schools struggle to fill vacant teaching positions, and this contributes to lower student achievement. This difficulty was originally thought to be due to a lack of qualified teachers entering the field (Fernet, Guay, Senécal, & Austin, 2012; Ingersoll & May, 2011; Ingersoll & Smith, 2003), but more recently the teacher shortage problem has been found to be due to a larger factor – high attrition (Droogenbroeck, Spruyt, & Vanroelen, 2014; Haynes, 2014; Ingersoll, 2001; Ingersoll & Perda, 2010; Ingersoll & Smith, 2003; NCTAF, 2003).

On average across the United States more than 40% of teachers will leave the classroom within their first five years (NCTAF, 2003). In some areas of rural Alaska, school districts face the loss of 85% of their teachers every year (Adams & Woods, 2015). This large attrition creates too many vacancies for the schools to reliably fill and means that the teachers who are in the classrooms are very often new to the profession. While some programs have been put in place to increase the number of teachers entering the field through recruiting drives, alternative credentialing, and even the lowering of licensure standards, the results have simply been more novice teachers entering the classroom and leaving quickly (Ingersoll & Smith, 2003). As long as attrition remains at unsustainable levels, recruiting will be the least efficient way of solving the problem.

A great deal of research has been performed in the attempt to uncover why so many teachers choose to leave classroom teaching positions. The vast majority of these studies have investigated why teachers leave and have thus been performed at schools with the highest attrition rates or using state-wide or national datasets. This study took a different approach as it
investigated a single rural Alaskan school district with a very low teacher attrition rate and sought to discover why teachers there stay in the classroom. It employed qualitative case study analysis and was based in the understanding of motivation put forth in Self-Determination Theory (SDT). According to SDT, humans are born with a natural inclination to explore, to understand the world, to connect with others, and to become autonomous. As such, it has been used extensively to describe adults’ motivation at work and their decision to leave or remain in work positions. As such, it was expected to help explain the teachers in the ASD’s decision to stay in the classroom for so long.

**Purpose of the Study**

The purpose of this case study was to understand why teachers at a rural K-12 school district in the American state of Alaska, called here by the pseudonym Alaskan School District (ASD), choose to remain in classroom teaching positions longer than those in similar school districts. The results of this study were expected to help guide school district leaders in similar settings as they deal with their own teacher retention issues.

**Justification**

Teacher trainers, school leaders, and educational officials are all stakeholders in solving the teacher attrition problem, while students, parents, and members of the communities that schools serve are affected by the issue as well. Discovering why teachers in one district choose to stay at higher rates than those in other, similar, districts was intended to create a baseline set of reasons and motivations for these teachers remaining in the classroom. Once this baseline was established, a larger study could compare several districts and uncover what some districts do to keep teachers that other districts could emulate. On the smaller scale, the district under study
could benefit from knowing what motivates, and does not motivate, their teachers. This information may be helpful in drafting future district policy.

Additionally, there exists a great deal of quantitative research investigating why teachers have left the classroom. The majority investigates what aspects of teachers’ histories, beliefs and values, or what characteristics of the school settings, have motivated teachers to leave. There is very little qualitative data and even less research asking teachers why they have stayed in the classroom.

**Deficiencies in the Evidence**

There exists a gap in the knowledge regarding why some teachers choose to stay in teaching longer than average, and what conditions exist in districts with low rates of teacher attrition. This gap seems to be due to a near-exclusive focus on quantitatively surveying those who leave while ignoring those who stay. Without including teachers who stay and those in low-attrition districts in the datasets, researchers have been forced to make the assumption that these teachers stay because whatever convinced those who left to do so is not present for them. Actual data regarding why teachers choose to stay is not present in the literature. This study was an attempt to begin to fill this gap.

**Significance and Context**

It is well established that there are not enough qualified teachers in the United States to meet the needs of our students (Adams & Woods, 2015; Ingersoll, 2001; Ingersoll & May, 2011; Ingersoll & Perda, 2010; Ingersoll & Smith, 2003, 2003). The problem exists nation-wide but is especially dire in some areas. In some areas of rural Alaska, for example, school districts lose up to 85% of their teachers every year. This leaves many schools with an unstable teaching
population in which large numbers of teachers are new and many do not stay long enough to build strong bonds to the school, the students and the community (Adams & Woods, 2015; Ingersoll, 2001; Ingersoll, Merrill, & Stuckey, 2014; Ingersoll & Smith, 2003). Without these bonds, students do not benefit from truly differentiated and tailored instruction, as the teachers don’t know them. In addition, no bond of trust can be built between teachers and the community, and in turn the teachers may feel that they are not trusted and respected as professionals. This, in turn, may lead them to want to leave their teaching position and further exacerbate the teacher shortage.

It is unsurprising, then, that a great deal of research has been conducted that investigated why teachers have left the classroom. However, very few studies have been conducted with teachers who have decided to stay in the classroom. Any insights into what motivates teachers to stay in the K-12 classroom might help school leadership better understand and retain their teachers, might help school districts better understand what teachers need and want, and might help state and national leaders better understand the daily life and struggles of the teachers who stay.

**Positionality**

I work at a school of education, where we run courses for teachers in all stages of their careers, from new teachers who need to clear a credential to seasoned veterans ready to move into school leadership positions. Thus while I am not a K-12 teacher, and never have been, I am deeply connected to the realm of K-12 teaching. In the course of my work, I have found myself looking down on the novice teachers who we teach at times. It is easy to fall into the trap of thinking K-12 teachers are somehow “less” than university teachers, when the truth is nothing of
the sort. I needed to be aware of this bias and force myself to reflect on just how hard these teachers work and how amazing it is that they have chosen a job I would never be willing or able to do.

Also, I come from the ethnically monotonous area of rural Maine, where non-White people are rare and the median income is low. I am thus fairly familiar with life in disadvantaged areas, life in areas with majority White populations, and life in somewhat isolated areas. I left Maine to live in Tokyo, Japan for most of my adult life. There, my experiences were those of massive urbanization and of being one of the very few non-Japanese people. Leaving Maine was a very good decision for me personally and economically. So, while doing research in rural Alaska is in some ways a homecoming for me, I do need to be conscious of the fact that while I chose to leave a similar area, I need to be careful not to judge people who have chosen to stay in such an area.

I have worked in education for all of my adult life but have consistently chosen not to teach in a K-12 setting. I find it intimidating and have no interest in doing so. Thus, while the primary research question for this study is asking why teachers stay in a K-12 setting, I need to be sure I do not allow my own refusal to do so to influence my data collection. I am reassured, however, by Briscoe’s conviction that while I am not a K-12 teacher, and in fact would not qualify if I applied to be one, I do not have to be one to study them. So long as I can keep in mind my otherness and build strong bonds of trust, and acknowledge my own built-in biases, I believe I can gather quality data (Briscoe, 2005).

If I am able to stay aware of these biases, I believe I will be able to gather accurate data. Having a better understanding of why K-12 teachers choose to teach and stay in the classroom
will both support others in their attempts to solve the teacher attrition crisis in the US and also help me to understand teachers better. I hope it will improve both the world and my own understanding of it.

**Research Question**

The research question for this study is: What keeps the teachers in this rural district in Alaska in the classroom for so long? This question was investigated by use of qualitative semi-structured interviews with teachers.

**Theoretical Framework**

This study was conducted with a grounding in Self-Determination Theory (SDT) as described by Deci and Ryan (Deci et al., 2001, 2001; Deci, Ryan, & Williams, 1996; Deci, Vallerand, Pelletier, & Ryan, 1991; Deci & Ryan, 1985, 1991; Guay, Senécal, Gauthier, & Fernet, 2003; Sheldon, Ryan, Deci, & Kasser, 2004). In an early description of the theory, Deci and Ryan (1992) argued that humans have an evolved and intrinsic motivation to explore, learn, and solve problems. This, they claimed, is a product of evolution inborn to all humans, and one that is too often ignored by Behaviorist approaches to motivation. In 2000, they wrote that humans are, from the moment of birth “active, inquisitive, curious, and playful creatures, displaying a ubiquitous readiness to learn and explore, and they do not require extraneous incentives to do so” (Deci & Ryan, 2000a, p. 56). This curiosity is what Deci and Ryan mean by Intrinsic Motivation.

This intrinsic motivation to learn, do, and explore is fragile though. According to SDT, a person must feel that they have sufficient sense of Self-Determination to maintain their natural
level of intrinsic motivation for a task (Baard, Deci, & Ryan, 2004; Callens, 2008; Deci et al., 2001; Deci & Ryan, 2000a; DeHaan, Hirai, & Ryan, 2016; Droogenbroeck et al., 2014; Emery, Toste, & Heath, 2015; Grouzet, Vallerand, Thill, & Provencher, 2004; Guay et al., 2003; Vansteenkiste, Lens, & Deci, 2006). This is often described in the literature as somewhat antithetical to the Behaviorist viewpoint in which all actions must be in response to external stimuli (Callens, 2008; Deci & Ryan, 2000b; Deci et al., 1996; Guay et al., 2003; Vansteenkiste et al., 2006). One’s sense of Self-Determination is in turn supported by and dependent on one’s sense of Autonomy, Competence, and Relatedness to others. These core needs are described in Basic Psychological Needs Theory (BPNT) - a sub-theory of SDT - and are described in detail below.

**Autonomy**

Autonomy was the first element described in Deci and Ryan’s foundational 1987 work. In 2000, Deci and Ryan again used the term Autonomy but noted that their use of the word was similar to how DeCharms had used the term Self-Determination (DeCharms, 1968; Deci & Ryan, 2000a). While Deci and Ryan chose to use DeCharms’ term in the title of the theory, they opted to replace it with the term Autonomy everywhere else in their research. In SDT, Autonomy is meant to infer neither a sense of disconnectedness from others nor a lack of desire to include others. Instead, it is used to mean that one perceives an internal locus of control – an ability to make one’s own decisions and choose one’s own actions (DeCharms, 1968; Deci & Ryan, 1985). Having sufficient Autonomy allows one to feel in control of one’s actions, which in turn supports intrinsic motivation.

**Competence**
Deci and Ryan have defined Competence somewhat differently over time. The authors first wrote that their definition of Competence was related to the term Effectance as used by White (Deci & Ryan, 1985; White, 1959) and included only the idea that tasks must be possible, as both terms meant a sense that one is good enough at something to contribute to the completion of tasks. They expanded this by adding the idea that if a task is too simple it can be boring, which can also lower one’s intrinsic motivation to perform it. Optimal support for intrinsic motivation is thus provided when tasks are somewhat challenging but accomplishable (Deci & Ryan, 1987; Deci et al., 1996; Pink, 2009; White, 1959).

**Relatedness**

Deci and Ryan also linked their use of the term Relatedness to those used by other writers. They have cited the term Affiliation as used in Harlow (Deci & Ryan, 1987; Harlow, 1958) and also Belongingness as used by Baumeister and Leary (Baumeister & Leary, 1995; Deci, Olafsen, & Ryan, 2017) to define Relatedness. In SDT, Relatedness is meant to define a sense that one belongs to a community or something larger than oneself. It encompasses both a sense of being on a team one does not want to let down and a sense of being a professional who should not fail at a task. It also encompasses a desire to meet the expectations placed on members of groups to which one belongs in order to cement one’s belonging in that group.

**Basic Psychological Needs Theory Assessment Tools**

To assess the degree to which subjects’ intrinsic motivation is being supported, Deci, Ryan and others developed the Basic Psychological Need Satisfaction at Work Scale (Deci et al., 2001; Ilardi, Leone, Kasser, & Ryan, 1993; Kasser, Davey, & Ryan, 1992). The original scale was intended to be used as a survey and consisted of 21 questions, seven about each of three
basic needs: Autonomy, Competence, and Relatedness. Each question contained a prompt and asked the participant to state a level of agreement or disagreement via a 5-point Likert scale ranging from Strongly Disagree to Strongly Agree. This tool has been widely used and validated in various contexts (Baard et al., 2004; Deci et al., 2001, 2017; Emery et al., 2015; Gunnell, Crocker, Wilson, Mack, & Zumbo, 2013; Milyavskaya & Koestner, 2011).

Method

The target of investigation of any case study is a bounded system (Hamel, Dufour, & Fortin, 1994; Merriam, 1988; Yin, 2014). Merriam (1988) noted that a case must be well defined and that choosing and defining a case involves the selection of a time, location, people, and events to observe. This case study’s boundaries were that it included seven teachers who work in one district and who were interviewed during one week in late 2017.

The goal of these interviews was to elicit rich information about these participants’ professional lives and choices as they saw them, rather than on attempting to disprove a hypothesis. Hamel, Dufour, and Fortin (1994) noted that observations made of the actors in a case, and of data such as artifacts, might be highly objective but that case study also necessitates ascribing meaning, motivation, and reasoning to those observations, which is unavoidably subjective. They did not, however, see this as a weakness of case study, but rather as a strength. Case studies, they said, are able to set observations in situations in ways that, for example, survey research is rarely able to (Hamel et al., 1994) This claim was accepted for this study and semi-structured interviews were used in this case study rather than surveys.
As such, the instrument was not distributed as a survey to all teachers but instead used as a template for semi-structured interviews. Semi-structured interviews allow the freedom needed for inductive research while still providing some structure. They also provide the rich data needed for qualitative research (Merriam, 1988; Yin, 2014).

Teachers were first asked to use a 5-point Likert scale to state their level of (dis)agreement with each prompt and were then asked why they answered as they did, with follow-up questions given as needed. This naturally took much longer than completing the instrument as a survey. For this reason, the total number of questions was reduced from 21 to 12, allowing four questions related to each basic psychological need, rather than the original seven.

Collecting data from multiple sources in case studies in order to triangulate, or vector, any conclusions drawn from those data is vital (Hamel et al., 1994; Merriam, 1988; Yin, 2014). In order to achieve this vectoring of information, data collection in this study took place in three stages. Firstly, data was collected about the district from its website, public records, and state assessments. Then the school district superintendent was interviewed and information about the district was collected. This information included details about the structure, finances, and demographics of the district. Finally, an email was sent to all teachers in the district offering them a chance to be interviewed for the study; a total of seven of the 35 teachers in the district volunteered and were interviewed.

Assumptions, Limitations, and Scope

The development of this study necessitated several key assumptions. Firstly, it must be assumed that the teachers were honest about their experiences and motivations. If a participant chose to give false information, there was little that could be done to detect or counter this.
Teachers in this study had no reason to lie, as it was an anonymous study with no likely direct effect on their lives, positive or negative. It must also be assumed that the seven teachers who volunteered were representative of the other 28 teachers in the district. While this was a small study that made no claims of generalizability beyond the district, it is true that not all teachers in the district could be interviewed and as such it must be assumed that the interviewed teachers were more or less representative of the district as a whole.

This study also had some inherent limitations. As stated, this was a small, exploratory study so generalizability beyond this one school district was low. It is possible that this district is unique in some way and thus irrelevant to other, even nearby, districts. While the surrounding districts are similar in demographics, geography, finances, and structure, none of them have the low teacher turnover numbers that the ASD has. It is possible, though, that there is some aspect not yet accounted for that explains this difference. Thus, this study was not intended to represent all teachers everywhere in the world or even everywhere in Alaska. It was also representative of only a snapshot in time. This is an integral limitation of all small case studies using qualitative methods (Yin, 2014).

**Definition of Terms**

The term “teacher” was defined as someone with regularly scheduled classes at a school in the district. This included pre-K teachers only if the teacher also taught regular kindergarten classes; various support teachers such as substitutes who covered a class for three or more months, and part-time teachers who had regularly scheduled lessons. It did not include leadership (principals, superintendent, etc.), support staff (administrators, nurses, librarians who did not teach regularly scheduled courses), or part-time substitutes. This definition of teacher was
originally used by the National Commission on Teaching and America’s Future (NCTAF, 2003) and was adopted for this study.

**Audience and Stakeholders**

This study was not meant to discover what schools around the world or even around Alaska should emulate to retain teachers. It was meant only to investigate why these teachers in this district have such minimal attrition. The stakeholders, then, were the teachers and leadership in the district of study, the students in the district, the parents and community around it, and myself as a researcher. It was hoped that giving leadership in the district a better idea of what their teachers liked and disliked about their context would help them better serve the teachers. I was also a stakeholder, as I hoped to gain a better insight into why people choose to be K-12 teachers.

Finally, other SDT researchers might find the study of interest because it was the first study to adapt the Basic Psychological Need Satisfaction at Work Scale (BPNSWS) for qualitative research. If others follow a similar pattern and investigate many more districts, it is possible some durable pattern will emerge. This might help teachers in varied contexts reflect on what motivated them and help frame a discussion between those teachers and their school leadership regarding the teacher shortage.

**Conclusion**

The issue of poor teacher retention, especially in Alaska, is a major problem. While many experts have investigated why teachers leave the classroom, few have spent any time asking why teachers stay. The district in question has a much lower attrition rate than other geographically, demographically, and financially similar school districts. This study explored the lives as lived
and described by the teachers at the ASD from a SDT perspective. To gather data, information was collected about the district from publicly available information and state records, the superintendent was interviewed and seven of the 35 teachers in the district were interviewed using qualitative semi-structured interviews. These interviews used 12 of the original 21 prompts from the BPNSWS survey to assess teachers’ sense of support for Autonomy, Competence, and Relatedness as described in Basic Psychological Needs Theory (BPNT) and SDT on which BPNT is based.

The next chapter is a focused review of the literature regarding SDT, followed by a review of the teacher shortage and its effects, the problem of teacher attrition and the variables found in the literature to correlate with teacher attrition and retention.
Chapter Two: Literature Review

Based on the amount of literature on the subject, it was vital to maintain clear boundaries regarding what would be included. In essence, the goal of this review was to establish what the research had revealed about why teachers stay in teaching positions, why they might choose to leave the classroom, and what Self-Determination Theory (SDT) might lend to the understanding of these motivations. While much research was found, a serious gap was also uncovered. Many studies have looked at school districts with high teacher attrition rates and asked teachers why those chose to leave. However, very few studies have looked at districts with low teacher attrition rates and very few have investigated what makes teachers stay in classroom teaching positions.

Permeating the popular media as well as the scholarly research is the idea that US children’s performance at school suffers when their schools cannot find sufficient numbers of highly trained and experienced teachers. While some choose to blame teachers’ unions, or demographics, or funding levels, nearly all agree that there is a shortage of teachers and that this is a major issue (Borman & Dowling, 2008; Ingersoll, 2001; Ingersoll & May, 2011; Ingersoll et al., 2014; Ingersoll & Perda, 2010; NCTAF, 2003).

One of the core questions of the teacher shortage is why people choose to be, or not be, teachers. As such, an adult motivation theory needed to be included in this review. In that one of the commonly cited reasons found in the literature that teachers leave the classroom is a lack of autonomous control over the classroom (Fernet et al., 2012; Ingersoll, 2001; Ingersoll & May, 2011; NCTAF, 2003), SDT was chosen as the theoretical framework for this study. SDT is reviewed below, followed by a summary of the studies that examined employee retention from
an SDT mindset. Non-SDT research done regarding the teacher shortage, including its causes and what characteristics have been found to correlate with high or low attrition is also reviewed.

In an effort to narrow the focus of this review of the literature, it is restricted to publications in peer-reviewed journals, books published by foundational authors in those journals, and opinion pieces from those authors. While some of the foundational elements of SDT have origins in the mid-1950’s, the majority of the publications in this review date from the 21st century.

This review covers the studies that have been done and highlights gaps in the literature when they are revealed. It will begin with a summary of the literature investigating the overall teacher shortage, and of that which specifically addresses teacher retention. This will be followed by reviews of SDT, as well as the sub-theories of Organismic Integration Theory (OIT) and Basic Psychological Needs Theory (BPNT).

**Research into the Teacher Shortage**

For decades researchers have found that there are not enough qualified teachers in the US (Adams & Woods, 2015; Ingersoll, 2001; Ingersoll & May, 2011; Ingersoll & Perda, 2010; Ingersoll & Smith, 2003, 2003) and efforts to have enough qualified teachers in the classroom have proven inefficient (Fernet et al., 2012; Ingersoll, 2007; Ingersoll & Smith, 2003). This leaves too many American classrooms with teachers who are inexperienced and who do not stay long enough to build relationships with the school, the students and the community (Adams & Woods, 2015; Droogenbroeck et al., 2014; Ingersoll, 2007). Replacing teachers who leave the classroom also costs schools large amounts of money in recruiting and overtime. In fact, current
estimates of the total cost of this problem range from US $2 Billion to US $2.2 Billion per year nationally (Borman & Dowling, 2008; Haynes, 2014, 2014; Ingersoll et al., 2014).

In an early attempt to measure and define the problem, Ingersoll (2001) described it as a revolving door through which far too many qualified professionals enter and then quickly leave classroom teaching. Ingersoll and Smith (2003) stressed that classrooms are dependent upon teacher commitment to students, cohesion between teachers, and continuity in curricula: all of which are jeopardized by high teacher attrition. They thus referred to this level of teacher attrition as both unsustainable and severe (Ingersoll & Smith, 2003). Other literature has supported this claim and found that nation-wide, an average of 30% of new teachers leave the profession within two years and 40% either leave the profession entirely or move out of the classroom within their first five years (Goldring, Taie, & Riddles, 2014; Gray & Taie, 2015; Marvel et al., 2007; Odell & Ferraro, 1992). In some areas, such as rural Alaskan schools, the annual attrition can reach 85% (Adams & Woods, 2015). The unsustainability of this attrition rate caused the NCTAF to refer to the problem as a national crisis (NCTAF, 2003).

Cochran-Smith (2004) described teacher shortages as both periodic and cyclical and found that administrative bodies typically deal with them by finding, training, and hiring more teachers rather than by focusing on retaining the teachers they already employ. A shortage being experienced in 2004, she noted, was different in two key ways. Firstly, it was not a shortage caused by simply having too few teachers graduating from training programs. She found that the shortage had more to do with retaining teachers than hiring them. Secondly, the shortage in 2004 was much deeper in hard-to-staff schools, meaning those in urban, lower income neighborhoods...
(Cochran-Smith, 2004). Later, Torres (2012) found that the 2004 shortage described by Cochran-Smith had became self-sustaining and was still ongoing on in 2011.

While there was initially debate in the literature over how serious the teacher shortage was, and how real it was (Cochran-Smith, 2004; Freedman & Appleman, 2009; Guarino, Santibanez, & Daley, 2006; Ingersoll & May, 2011; Ingersoll & Perda, 2010; Ingersoll & Smith, 2003), by 2009 Freedman & Appleman would insist that there was no longer any real argument among scholars and researchers that “Our nation’s high-poverty, urban schools are in urgent need of dedicated and skilled teachers who are willing to commit to these schools long enough to make a significant difference in school quality and student performance” (Freedman & Appleman, 2009, p. 323). This acknowledgment of the shortage as being both real and different than previous demographically-caused shortages led researchers to begin theorizing about what was causing it.

Over the years there have been several theories as to the main underlying cause of the teacher shortage. Some investigators have focused on attempts to establish what personality and demographic traits teachers who leave share (Borman & Dowling, 2008; Cochran-Smith, 2004; Goldring et al., 2014; Gray & Taie, 2015; Guarino et al., 2006), so that they might be screened or possibly given assistance to keep them in teaching. Other researches have instead focused on the school environments, asking what elements and characteristics of the school might be driving people away (Adams & Woods, 2015; Fernet et al., 2012; Gray & Taie, 2015; Guarino et al., 2006). To date, substantially less research has been done on schools with abnormally high teacher retention rates, and what they might be doing to retain teachers. Some of the key studies and variables found to correlate with teacher attrition are described in the next section.
Proposed Root Causes of the Teacher Shortage

There have been many studies describing and analyzing the American teacher shortage. In 2001, Ingersoll published such an analysis, in which he described the shortage as being the result of two separate forces; difficulty in getting people to become teachers, and difficulty retaining teachers after they enter the classroom (Ingersoll, 2001). He argued that retention was the bigger, yet less attended to, problem. He described numerous government programs, such as ‘troops-to-teachers’, which attempt to recruit more teachers (Ingersoll, 2001). However, with such a high attrition rate, these programs must recruit ten teachers to retain six of them for five or more years. He wrote that “Teacher turnover is a significant phenomenon, and a dominant factor behind the demand for new teachers and the difficulties schools encounter adequately staffing classrooms with qualified teachers” (Ingersoll, 2001, p. 501). Thus, he argued, resources would best be expended building better retention before wasting efforts on higher recruitment.

Teacher attrition itself, Ingersoll (2001) went on to argue, can be roughly divided into two root causes: factors having to do with the teacher and factors having to do with the school or environment. He wrote that the school factors had, at the time, been largely ignored by researchers who instead had focused on the demographic, intellectual, and emotional traits shared by teachers who leave the profession. Ingersoll did not, however, advocate investigation of teachers who stay or of low-attrition districts.

Ingersoll and Smith (2003) continued Ingersoll’s (2001) earlier line of argument, provocatively entitling their article “The Wrong Solution to the Teacher Shortage”. In it they described the notion that the teacher shortage was due to large numbers of teachers retiring from the profession combined with a rise in the number of school-aged children. They dismissed this
idea, writing that increases in both student enrollment and teacher retirement were a factor but that a more significant contributing factor was teacher attrition – especially among teachers in their first few years of service. They advocated further investigation into teacher retention, but did not mention the need to describe why teachers stay, only the need to discover more about why they leave (Ingersoll & Smith, 2003).

Also in 2003, the NCTAF published a report on the teacher shortage. In it the NCTAF referred to teacher attrition as a crisis and marked teacher attrition as the primary cause of the teacher shortage (NCTAF, 2003). Cochran-Smith (2004) furthered this argument and expanded on it by stating that the attrition crisis was more severe in urban or rural school districts, as well as those with many poor and minority students (Cochran-Smith, 2004). Freedman and Appleman (2009) took a similar position and argued that teacher education and preparation programs must do more to prepare teachers to teach in high-poverty, urban schools.

Ingersoll joined with Perda to revisit the issue in 2010 and attempted to add more data to the debate between recruitment and retention advocates. They divided the teaching population by fields taught, and found that math and science teachers were both the hardest to hire and to retain (Ingersoll & Perda, 2010). The next year, Ingersoll and May (2011) divided the teaching population by self-reported race. The investigation revealed that while non-White teachers joined the profession at a higher rate than their White colleagues, they also suffered from higher rates of attrition, meaning there existed a shortage of non-White teachers (Ingersoll & May, 2011).

Few studies can be found after 2011 that argue against the need for a focus on teacher retention. It would seem that the idea took root, became noncontroversial, and needed little further debate. The majority of studies began to focus on the causes of, rather than the
importance of teacher retention. Many categorized novice teachers into general outcome groups, such as those who leave the classroom for non-teaching jobs or those who stay in the classroom. Numerous studies investigated the teachers who leave teaching (Borman & Dowling, 2008; Goldring et al., 2014; Gray & Taie, 2015; Ingersoll, 2001; Luekens, Lyter, & Fox, 2004; Marvel et al., 2007; Pucella, 2011; Rones, 2011; Torres, 2012; H. Wang, Hall, & Rahimi, 2015) and some looked into the relationship between schools with high attrition rates and the teachers who leave (Aggarwal & D’Souza, 2012; Boyd et al., 2011; Olsen & Anderson, 2007; Ping-qing, Weizheng, & Li-xing, 2013; Swars, Meyers, Mays, & Lack, 2009). Nevertheless, there seems to be a dearth of research looking at the teachers who stay in the classroom and of research investigating districts with low levels of attrition.

**Research on Teacher Attrition**

Once teacher retention had been identified as a major cause of the shortage, and thus worthy of research, many scholars devoted time to investigating the causes of the high attrition rate experienced in many school districts. Some of the best data available were from the National Center for Educational Statistics (NCES), which had been surveying teachers for decades (Goldring et al., 2014; Ingersoll et al., 2014; Luekens et al., 2004; Marvel et al., 2007). They had not, however, done much to survey teachers who stayed in teaching and instead focused on those who left the classroom. As a result, much of the research efforts expended by others followed this pattern as well.

**Focus on those who leave.** As early as 1997, the NCES was publishing survey results about the teacher shortage, included several findings about how many teachers left and why (Ingersoll & May, 2011; Luekens et al., 2004; Marvel et al., 2007; S. D. Whitener, 1997).
However, the publication included only one note about the teachers who stayed, that being that these teachers reported that higher salary would make them even more likely to stay. This near exclusive focus on teachers who leave classroom positions is reflected in other publications as well. In Ingersoll’s vehement (2001) argument that teacher attrition was a major issue, that it was not simply an effect of demographic change, and that the school environment must be examined to see why teachers leave, he at no point asked why teachers might stay in a position, and thus failed to examine this potentially important area.

This is possibly because Ingersoll based his 2001 investigation on survey data collected and published by the NCES, in which teachers who had decided to leave a position were asked to list on a survey as many contributing factors as they felt were accurate. Teachers who had chosen to stay in their positions were not surveyed (Ingersoll, 2001). As a result of the dataset used, the study necessarily focused on the teachers who left positions and excluded those who stayed. In looking at the data, Ingersoll found that among those teachers who leave the profession, even temporarily, personal reasons including pregnancy and childbirth were the largest reported contributing factors, being involved in 45% of total attrition. Other commonly reported contributing factors were poor salary, unsupportive school leadership, and a lack of student motivation. The finding that feeling unsupported by leadership correlated with teachers choosing to leave the classroom was later confirmed by other researchers (Guarino et al., 2006; Ingersoll, 2007; Kaplan & Madjar, 2017; Luekens et al., 2004; Swars et al., 2009)

The preference in the published research for investigations into those teachers who leave can also be seen outside of the NCES’s data and the studies based on them. Luekens, for example, asked three major research questions; who is likely to leave a teaching position, why do
these teachers leave, and where do they go when they leave (Luekens et al., 2004). Striking by omission is a query as to why some teachers stay in classroom teaching positions.

The NCES’s later publications continued the pattern. In their 2007 publication of the results of surveys in 2004 and 2005, the selected findings page notes that 84% of the teachers surveyed had stayed in the same teaching position over the previous two years. This was the only information reported on those who stay, with the rest of the publication focusing on those who move or leave teaching (Marvel et al., 2007). This pattern continues with the NCES’s most recent publication, in which the selected findings page broke down the percentage of teachers who move or leave after two, three, and five years of teaching, but made no mention of why the teachers who stay do so (Gray & Taie, 2015). Additionally, no effort has ever been made by the NCES to divide the field into districts with high, average, and low levels of attrition and to look for patterns in this way.

**Categorization of teachers’ career paths.** The NCES performs periodic surveys to assess the status of the teaching population in the US and the attrition thereof. In its published summary of this survey data for the 2000-2001 school year, teachers were grouped into three categories: Stayers, Movers, and Leavers (Luekens et al., 2004).

Stayers were the teachers who, for the 2000-2001 school year, had regularly scheduled classes at the same schools at which they had had such classes in the 1999-2000 school year. This included teachers who had moved to teaching different grade levels or subjects at the same schools, but not teachers who had moved to different schools. It also included pre-K teachers if they also taught kindergarten. Also included were various support teachers such as substitutes
who covered a class for three or more months, school librarians, administrators, and part-time teachers who had regularly scheduled lessons but not those who did not.

Teachers who moved schools, even within a district, were categorized as Movers, as long as they met the teaching requirements listed above. This category, like the Stayer category, included pre-K teachers if they also taught kindergarten, substitutes who covered a class for three or more months, school librarians, administrators, and part-time teachers who had regularly scheduled lessons at a new school.

Those who left the classroom, including those who left education entirely, who retired, or who otherwise stopped working, were categorized as Leavers. This included teachers who became part-time with no scheduled lessons, on-call substitutes, student teachers, or teachers’ aides.

In their report on the survey data for the 2004-2005 school year a new category, Unknowns, was added to clarify the results (Marvel et al., 2007). These were the teachers that were reported to have left their teaching position but that for whom no further data was given. Thus, all Unknowns are either Movers or Leavers, but it was unclear which. This category was used again to report the results of the 2012-2013 school year data (Goldring et al., 2014).

In the 2015 update to this data, the Unknowns category was removed, likely because these data were simply excluded. A new category, Returners, was added to capture teachers who had once taught in the classroom, who had not taught for some period of time, but who were now back in the classroom. All Returners are former Leavers or Unknowns, as former Movers were not considered to have left teaching.
In his 2001 publication on teacher attrition, Ingersoll also divided teachers who left the classroom into Movers and Leavers (Ingersoll, 2001). Movers included any teachers who had moved schools, much like the NCES category. Ingersoll specified that his Leaver category included both those teachers who had left voluntarily, such as by retiring or quitting, and those who had not, such as in the case of firings, layoffs, and school closings. While this is likely the case in the NCES category, it has never been explicitly stated. Ingersoll, interested in attrition, chose not to include in his results any teachers who stayed in the classroom. The exclusion of teachers who stay in the classroom became a common theme in the research as the majority of research interest focused on finding out why teachers left, not why they stayed.

One set of authors who looked at why teachers might stay was Olsen and Anderson (2007). They published a qualitative study of teacher-trainees graduating from a teacher training program and entering the classroom. In it, they described the variety of career plans the group held. Some of the teachers had not yet decided if they wanted to stay in the classroom, and were thus labeled as Uncertains. Some planned on staying in the classroom indefinitely, and were thus categorized as future Stayers. Other teachers already had plans to leave the classroom. The authors stressed that the teachers who were already planning on leaving the classroom should not all be considered future Leavers, because they most often planned on leaving the classroom for administrative or leadership positions in schools. Olsen and Anderson thus proposed the term Shifters for this population. It is unclear what, if any, difference exists between Olsen and Anderson’s Shifters and Ingersoll’s Movers. It is also unclear why such a category would be needed, in that the NCES system would count a teacher who moved to an administrative or
leadership position as a Stayer, not a Leaver (Goldring et al., 2014; Luekens et al., 2004; Marvel et al., 2007).

Nevertheless, Freedman and Appleman (2009) adopted the term Shifters in their investigation into teacher retention in urban schools. However, they choose to define it differently. In their study, Shifters were teachers in urban districts who left the classroom for administrative or leadership positions in the same urban district. Freedman and Appleman also introduce a new category, Drifters, made up of those teachers who leave an urban district for a classroom position in a non-urban or wealthier district (Freedman & Appleman, 2009). Like many such studies, Freedman and Appleman (2009) choose to focus on teachers who leave the classroom and to exclude those who stay.

The fact that so much effort has been put into dividing and describing the various groups of teachers who leave the classroom, and that those who stay have generally been either ignored or treated as a uniform population illustrates the literature’s near exclusive focus on those who leave. This is a gap in the literature.

**Factors found to correlate with attrition.** Schaefer, Long, and Clandinin performed a review of the literature on teacher retention and attrition from 1999 to 2010 (Schaefer, Long, & Clandinin, 2012). They described the body of literature as consisting of two general camps, one viewing teacher attrition as a problem associated with individual factors of teachers, and the other associating the issue with contextual or environmental factors. This dichotomy had previously been described by Ingersoll (2001).

Among the studies reviewed that investigated teachers’ individual factors, it was found that there were general patterns in the elements described. Some of these were related to the
demographic information of the teachers, such as age, race, and gender (Schaefer et al., 2012). Other studies investigated elements of teachers’ opinions and values, such as a sense of isolation from other teachers and community, feeling trusted and empowered as professionals, wanting to help children and communities, a life-long desire to be a teacher, a willingness to work hard to achieve one’s career goals, and a strong self-identity as a teacher (Schaefer et al., 2012). Among the studies that investigated teachers’ work environments, factors included managerial support of teacher autonomy, salary, access to professional development, and the strength of collaboration and community among teachers. A review of the teacher-centric and environmental factors found in the literature to be related to teacher retention and attrition is below.

**Teacher-centric factors.** In a large review of the literature regarding teacher retention, attrition, and recruitment, Guarino et al. concluded that teaching had a much higher attrition rate than similar professions (Guarino et al., 2006). Also, the research showed that younger teachers were the most likely to leave teaching, followed by older teachers, and with mid-career teachers the least likely to leave. This U-shaped attrition curve was later supported by other research (Borman & Dowling, 2008; Gray & Taie, 2015; Roness, 2011; Torres, 2012). However, while this pattern was found to be fairly common, none of the studies made any explicit efforts to find school districts with different attrition patterns.

Borman and Dowling published a review of the literature covering 34 studies published from 1980 to 2005 and which together had investigated 63 variables which affected teacher attrition, or “attrition moderators” (Borman & Dowling, 2008). The studies included a mix of survey and observational data, and all were quantitative. The studies confirmed the U-shaped attrition curve. Borman and Dowling also found that male teachers were less likely to leave
teaching than female teachers and that teachers with masters’ degrees or doctorates were more likely to leave the classroom, though it is unclear if this is an effect of teachers moving into leadership positions.

Boyd et al. (2011) also performed a large study which investigated the relationship between teacher retention and the teachers’ personal and demographic characteristics, the demographic characteristics of the student body, the characteristics of the school itself and the actions and policies of school leadership. The authors found that teachers’ backgrounds and demographics had a strong predictive effect on attrition. They reconfirmed the U-shaped attrition curve and also found that teacher training and preparation programs had an influence on retention but noted that this might be just as much to do with the teacher candidates these programs select as with the programs themselves. The authors also found that teachers who had better grades in, and degrees from, more prestigious universities were more likely to leave teaching. They posited that these teachers might have more higher paying or more prestigious non-teaching opportunities available to them when compared with the general population of teachers.

In one of the few studies that asked why teachers stay in teaching, Freedman and Appleman (2009) investigated the connection between teacher education programs and the attrition of those who had attended those programs. The authors followed 26 graduates of a teacher preparation program in California for five years post-graduation. They found a remarkably low attrition rate among the sample, with roughly 4% of the teachers leaving the classroom teaching after one year, indicating an extremely low rate of attrition (Goldring et al., 2014; Ingersoll, 2001; Luckens et al., 2004). This population of teachers seemed more resistant
to attrition and was thus the subject of closer examination. The authors conducted qualitative interviews and asked why these teachers had stayed in teaching. The answers included a felt sense of mission, an existent disposition for hard work and persistence, a teacher preparation program which included both the practical and the academic sides of teaching, training in how to take on the reflective stance of a teacher researcher, and ongoing support from members of the cohort and others (Freedman & Appleman, 2009).

Ingersoll and Strong performed a meta-review of 15 other studies on the subject of the effects of support, guidance, and orientation programs for new teachers, referred to in general as induction programs (Ingersoll & Strong, 2011). They described correlation between teacher participation in induction programs and several dependent factors including student test scores, classroom practice, and teacher retention. The authors found significant effects of induction on classroom practice and student success, but no significant change in teacher retention. They thus called for revision of induction programs in ways that might help retain teachers.

Pucella (2011) investigated the rationale of teachers who had earned National Board for Professional Teaching Standards (NBPTS) certifications. The study sought to learn why teachers with the certification were less likely to leave teaching, or as she referred to it, to burn out. Pucella found that teachers’ reasons for seeking and earning NBPTS certification included professional pride, a desire to improve one’s teaching skills, new responsibilities and duties in the school, and higher salary. From the study, it would seem that these goals might be more prevalent in those teachers who are resistant to burnout / attrition.

Ingersoll, Merrill, and May (2012) used NCES-published surveys of first year teachers of various fields to ascertain if teacher preparation programs which taught pedagogy in addition to
the subject matter had an effect on teacher retention in the first year of teaching. In the study, pedagogy was defined as teaching how to teach material, and subject matter was described as the material to be taught. The study was narrowly focused, focusing only on the first year of teaching. Nevertheless, patterns emerged.

The data showed that the way in which programs prepare new math and science teachers differed from the preparation given to other teachers. Math and science teachers were more likely than other teachers to have received their undergraduate degree in their field, namely math or science, rather than in education. They were also more likely to have entered teaching through an alternative credentialing program than a traditional teacher training program. These factors meant that these teachers were less likely than other new teachers to have received much pedagogical training.

Additionally, the type of college from which a teacher received a bachelors’ degree and the route by which a teacher entered the field showed no effect on attrition. This finding ran counter to Boyd et al.’s 2011 finding of the importance of the school teachers had attended. Only the number of courses or hours learning pedagogy showed positive correlation with retention. These courses included topics such as teaching methods, learning theory, child psychology, and materials selection.

Hughes performed a large survey project in an attempt to discover the correlation between teacher characteristics, school or organizational characteristics, and teacher motivation to remain in classroom teaching positions (Hughes, 2012). Teacher characteristics were described as factors such as age, gender, ethnicity, or academic achievement. Teacher motivation was measured by the teachers’ response on the survey questions related to how long they
intended to remain in teaching. The findings were generally consistent with previous research. Overall, of the 789 teachers surveyed, nearly 84% indicated that they planned to teach until retirement, nearly 7% planned on leaving the classroom to advance into school leadership, 3% indicated that they wanted to pursue a career outside of education, and 4% stated that they would leave teaching, perhaps temporarily, for family reasons. Among all the teachers who planned to leave education for any reason, 14% said they wanted to return to it eventually. It was again found that younger and older teachers were more likely to express a desire to leave, which conforms to the U-shaped attrition curve. Hughes’ results also showed that if a teacher’s basic needs such as safety and enough salary to live comfortably in the area were not being met, little could convince those teachers to stay in the setting (Hughes, 2012). Teachers’ educational achievement, as measured by GPA and highest degree earned, did not show a statistically significant effect on desire to leave. This last finding was also in direct opposition to Boyd et al.’s conclusions (Boyd et al., 2011).

Surveying 282 teachers who had participated in the program as mentees, Adams and Woods were able to calculate retention rates. Overall, only 56% of the teachers who participated in the program were still in the classroom after five years. Remarkably, this is a much higher retention rate than was found for teachers who had not participated in the program (Adams & Woods, 2015). The authors came to believe that increased efficacy was the reason for the higher level of retention, which they described as a feeling of being well prepared and enabled to teach and which would be described in SDT or BPNT as a sense of Competence. Adams and Woods described several factors which seemed to boost efficacy. These were feeling prepared to teach, socializing with the community, feeling a sense of professionalism, and being student-focused.
Feeling prepared to teach, in the study, was described as combining one’s teaching preparation and education with one’s love of, and commitment to the communities of, rural Alaska. It seemed that if a novice teacher did not love the community and area they were less likely to want to remain in teaching positions. A sense of professionalism was defined as a sense of being part of a team or unit within the school. It encompassed the concepts of teamwork, consultation, and cooperation. The third factor, socializing with the community, was described as a connection to the local community outside of the school. The data suggested that the more teachers felt part of and supported by the community outside of the school the less likely they were to leave. The final factor, being student-focused, was made up of elements such as a desire to build teacher-student relationships and to see progress in students over time.

**Environmental factors.** In 2007, Ingersoll reflected on all the research he had conducted on teacher retention and laid out all the reasons he felt that teachers might be leaving teaching so often. Among these were a decline in the amount of autonomy and respect a teacher can expect from society in general as represented by the amount of high stakes testing and teacher evaluations created by legislators with no teaching experience (Ingersoll, 2007). Also on his list were the low level of influence teachers have over curricula and testing and a perception that teachers in low-income schools are punished for a lack of student success which is actually caused by poverty (Ingersoll, 2007). Once again, his comments focused only on why people might leave teaching and made no mention of why a teacher might stay in the face of such difficulties.

Borman and Dowling (2008) also investigated factors related to the school/work environment and found them to be very important in teachers’ retention decisions. Among
variables related to schools that the authors found were support for the idea that small class sizes reduced teacher attrition, that a high percent of economically disadvantaged students increased it, and that schools with fewer than 1,000 students lost more teachers than larger schools. They found that one of the most important factors influencing teachers’ decision to stay or leave the classroom was a sense of Autonomy and control over classroom decisions (Borman & Dowling, 2008). This would seem to support SDT’s central claim of the importance of a sense of Autonomy in employee motivation (Boyd et al., 2011; Deci & Ryan, 1987, 2000b, 2000a; Rigby, Patrick, Deci, & Ryan, 1992; Vansteenkiste et al., 2006).

Borman and Dowling’s findings also supported Ingersoll’s earlier and long-term argument that context is vital to the retention decision (Ingersoll, 2001, 2007; Ingersoll & Smith, 2003). Borman and Dowling argued that these environmental aspects had been undervalued in the literature. They also found that the important factors involved were school size, administrative support for Self-Determination, opportunities for advancement, and opportunities to collaborate with colleagues (Borman & Dowling, 2008). This was later supported by Fernet, Guay, Senécal, and Austin’s (2012) findings that teachers’ sense of eroding autonomy and control over the classroom was a major demotivator.

Pucella conducted a survey project to compare the retention rates of teachers who did and did not have national board certification (Pucella, 2011). Of note was the board certified teachers who left teaching cited reasons included dropping levels of respect for teachers in society, dismissive or demeaning attitudes of parents and students towards teachers, inadequate support from school leadership, and increasingly violent classrooms (Pucella, 2011). The fact that Pucella found a major reason for teachers choosing to leave the classroom was a reduction in, or
lack of, respect for the teaching profession in society at large is consistent with Self-Determination Theory’s claim that Relatedness with the community and a sense of Competence at work are major drivers of motivation (Deci & Ryan, 2000b).

Boyd et al. (2011) also examined general school contextual factors. They found several elements which were associated with attrition including, among others, teacher influence. This was defined as the amount or extent to which teachers felt they had autonomous control over the daily goings on in the classroom. The more control they felt they had, the less likely they were to leave teaching. Another important factor was administrative support. Teachers in contexts in which they felt valued, trusted, and supported by school leadership were less likely to leave. Additionally, the relationship among the teachers and staff was found to be important. If the body of teachers and staff worked together well and acted as a team, attrition fell (Boyd et al., 2011). With regard to the student population, the authors found that high levels of low-income, low-achieving, and / or minority students correlated with high levels of teacher attrition. They posited that some of this flight of teachers from low-income and underperforming schools to those with more money and success might be related to a desire to be associated with these more prestigious schools. Further statistical analysis revealed that low salary, high workload, poor relationships with students’ parents, and the unavailability of technology increased teachers’ reported desire to leave the classroom.

Torres (2012) published a study based on interviews with 50 teachers. The results were similar to that of Ingersoll (2001), finding that the most common reasons novice teachers gave for leaving the profession were salary in comparison to that which could be earned outside of
teaching, leadership which provided appropriate workloads, the status and respect of teaching in the community, and the availability of jobs outside education.

In Alaska, Adams and Woods (2015) published a review of the efficacy of the Alaska Statewide Mentor Project (ASMP). This was a joint initiative between the Alaskan government and the University of Alaska which attempted to address high rates of teacher attrition in Alaska, which is on average 33% annual attrition but sometimes as high as 85% annual attrition. The authors noted that this high rate of attrition was associated with low rates of teacher-efficacy, which they defined as the quality of feeling successful as a teacher (Adams & Woods, 2015) and which would be described by BPNT as a sense of Competence (Rigby et al., 1992). They cited Hughes (2012) to support the idea that low self-efficacy was related to high attrition, though this idea was subsequently reinforced by others (H. Wang et al., 2015). The authors also argued that novice teachers in Alaska may be leaving because they do not feel supported in the difficult environment of rural Alaskan school districts. Therefore, the ASMP was a mentoring program developed to match new teachers in rural and/or low-income districts with experienced teachers, who acted as mentors and general support.

**Self-Determination Theory**

This study was primarily an investigation into the motivations of adults. As a result, a foundational theory that applies to and describes employee motivation to work and remain at work was needed. SDT describes how employers who want to help nurture employees’ intrinsic motivation to solve problems and learn new things need to provide an environment in which employees believe that their efforts are not in vain and in which the employees believe they have the training, ability, and tools they need to accomplish the tasks at hand (Baard et al., 2004;
Cuevas, Ntoumanis, Fernandez-Bustos, & Bartholomew, 2018; Deci & Ryan, 1987; Deci et al., 1991; Milyavskaya & Koestner, 2011; Schultz, Ryan, Niemiec, Legate, & Williams, 2015). This was judged to be a good fit with the research question of the study, and thus SDT was chosen as the theoretical basis of this study. The research on the theory of SDT is described below, followed by a review of the studies that have used SDT as a lens in investigations into teacher attrition and general employee retention.

SDT began as the work of Deci and Ryan (Deci et al., 2001, 2001, 1996, 1991; Deci & Ryan, 1985, 1991; Guay et al., 2003; Sheldon et al., 2004) and has since been taken up by other researchers. Deci and Ryan's (1992) core premise for SDT is that humans have an evolved and intrinsic motivation to “explore, understand, and assimilate their environment” (p. 180). SDT believes this to be a product of evolution inborn to all humans, and one ignored by Behaviorist approaches to motivation. In 2000, Deci and Ryan wrote that humans are born “active, inquisitive, curious, and playful creatures, displaying a ubiquitous readiness to learn and explore, and they do not require extraneous incentives to do so” (Deci & Ryan, 2000a, p. 56). This was echoed when Sheldon and Shuler (2004) wrote:

In other words, it is logical that evolution would reward us with positive feelings when we do something that has adaptive significance, such as producing or succeeding at something, experiencing a close relationship and alliance with another person, or becoming more behaviorally autonomous and self-regulating (p. 2).

In a later writing, Deci, Olafsen and Ryan (2017) summarized SDT as the argument that;

When individuals understand the worth and purpose of their jobs, feel ownership and autonomy in carrying them out, and receive clear feedback and support, they are likely to
become more autonomously motivated and reliably perform better, learn better, and be better adjusted (p. 20).

Deci and Ryan reject behaviorism, which they have described for decades as assuming a default state of non-motivation which must be overcome with a stimulus to provoke action (Deci et al., 1996). Instead, they claim humans have a default state of intrinsic motivation that must be constantly maintained. Actions provoked by this intrinsic motivation are said to be undertaken for the experience of doing them, with no external reward needed. Therefore, not all actions are intrinsically motivated, as some are instead extrinsically motivated. Extrinsically motivated actions, they have argued, are performed as a result of some external force, be it a consequence or a reward.

According to Deci and Ryan, extrinsic motivation is easy to instill, requiring only a reward or stimulus (Deci & Ryan, 1987; Rigby et al., 1992). Conversely, intrinsic motivation, while the default state, is easily lost and requires careful nurturing to maintain. This nurturing requires that the person have a sense of Self-Determination, which the authors borrow from DeCharms (DeCharms, 1968) and have described as the ability to make autonomously initiated actions, or those with an internal perceived locus of control (Deci & Ryan, 1987).

Deci and Ryan also noted that SDT is not a theory concerned with the origin of intrinsic motivation, nor one interested in creating it. This is due to SDT’s acceptance of intrinsic motivation as the evolutionary default status of humans. Rather than focusing on the origin or creation of intrinsic motivation, SDT examines ways that this default state of intrinsic motivation can be maintained and nurtured (Deci & Ryan, 2000b).
Deci and Ryan also explained that false choices did not fall under their Self-Determination Theory. They gave the example of an anorexic person refraining from eating. While on the surface this would seem to be a choice with an internal locus of control, it is in fact a compulsion caused by the disease and thus not the kind of choice the authors are describing (Deci & Ryan, 1987). Intrinsic motivation was thus defined as requiring that one feel a sense of unpressured willingness to perform an act (Deci et al., 1996).

In 1991, Deci and Ryan expanded on the theory and wrote that while it is vital to the nourishment of intrinsic motivation to provide situations in which subjects’ actions are perceived as being related directly to outcomes, this alone is insufficient. A person must also believe that s/he is competent enough to achieve desired outcomes.

Over the years, SDT evolved and expanded into an overarching meta-theory (Deci & Ryan, 2000b) which ties together and informs several sub-theories. These sub-theories are generally the product of research using SDT as a framework, and are thus all consistent with but also separate from it (Deci et al., 2001; Deci & Ryan, 2000a; Droogenbroeck et al., 2014; Gunnell et al., 2013). Below is a summary of two major theories found in the reviewed literature. It begins with Basic Psychological Needs Theory (BPNT; Deci et al., 2001; Rigby et al., 1992), which describes the necessary basic psychological needs that must be met to maintain one’s sense of Self-Determination, and in turn one’s intrinsic motivation. These include a sense of Autonomy, Competence, and Relatedness to others. Then a second sub-theory is reviewed; Organismic Integration Theory (OIT) describes the process by which completely extrinsic motivation can over time become integrated and internalized.

**Basic Psychological Needs Theory (BPNT)**
Basic Psychological Needs Theory (BPNT) is an SDT sub-theory which argues that optimal psychological wellbeing requires one to experience a sense of Autonomy, Competence, and Relatedness to maintain one’s sense of Self-Determination and in turn one’s natural level of intrinsic motivation (Baard et al., 2004; Callens, 2008; Deci et al., 2001; Deci & Ryan, 2000a; DeHaan et al., 2016; Droogenbroeck et al., 2014; Emery et al., 2015; Grouzet et al., 2004; Guay et al., 2003; Martela & Ryan, 2016; Vansteenkiste et al., 2006). There is confirmation of BPNT in the research. Baard, Deci, and Ryan (2004) investigated employees in two work settings and were able to show that employees’ levels of felt Autonomy, Competence, and Relatedness correlated with those employees’ performance reviews and scores on general psychological adjustment tests. More recently, Kaplan and Madjar (2017) investigated the predictive value of support for Basic Psychological Needs across two very different cultures – Israeli and Arab students – and found the effect to be nearly identical in both groups.

Not all BPNT research has found perfect alignment. Emry, Toste, and Heath (2015) investigated children who suffered from depressive symptoms and found that while all three basic needs correlated with general mental health, only the sense of Autonomy correlated strongly. So, while BPNT is well supported in the literature, there has been some disagreement regarding the relative importance of the three basic needs. Some research undertaken with an BPNT stance has indicated that while Autonomy, Competence, and Relatedness all contribute to general wellbeing and workplace morale (Baard et al., 2004; Callens, 2008; Deci et al., 2001; Guay et al., 2003; Milyavskaya & Koestner, 2011; Rigby et al., 1992; Sheldon & Schuler, 2011; Vansteenkiste et al., 2006) the Autonomy element might be the most influential (Deci et al., 1991; Emery et al., 2015; Sheldon & Schuler, 2011). Other research disagrees with this
contention. When Trenshaw, Revelo, Earl, and Herman (2016) surveyed university students, they found Relatedness to be the strongest motivator, and Autonomy to be the weakest. There is also some research arguing that Autonomy, Competence, and Relatedness are not a complete list. For example, Martela and Ryan (2016) suggested that Benevolence should be added to the list. However, this suggestion does not seem to have been taken up, as of yet, by other researchers. As a result, only the three core elements of Autonomy, Competence, and Relatedness are described below.

**Autonomy.** In 1996, Deci and Ryan noted that their use of the word Autonomy is similar to how DeCharms had used the term Self-Determination (DeCharms, 1968; Deci et al., 2017). So, while Deci and Ryan chose to use DeCharms’ term in the title of Self-Determination Theory, they opted to replace it with Autonomy in their research involving BPNT. They use the term Autonomy to mean one of the three core needs which supports Self-Determination, though the two are similar.

SDT’s Autonomy, much like DeCharms’ Self-Determination, is meant to infer neither a disconnectedness from others nor a lack of desire to include others (DeCharms, 1968; Deci & Ryan, 1987). Instead, it is used to mean that one perceives an internal locus of control – an ability to make one’s own decisions and choose one’s own actions (DeCharms, 1968; Deci & Ryan, 1987). Having sufficient Autonomy allows one to feel in control of one’s actions, which in turn supports one’s sense of being self-determined and one’s in-born intrinsic motivation. Deci and Ryan, among others, draw a strong line between SDT and the Behaviorist viewpoint which argues that all actions must be in response to external stimuli (Callens, 2008; Deci & Ryan, 2000b; Deci et al., 1996; Guay et al., 2003; Vansteenkiste et al., 2006).
**Competence.** Exact definitions of Competence vary even among SDT researchers. Deci and Ryan have defined it somewhat differently over time as well. In Deci et al. (1996), they noted that their definition of Competence was related to White’s term Effectance (Deci et al., 2017; White, 1959), meaning a sense that one has the skills, time, and tools needed to accomplish assigned tasks. They later revised and expanded the definition and added that if a task is too simple it can be boring, damaging one’s intrinsic motivation to perform it. Thus tasks that are somewhat challenging, but accomplishable best support one’s intrinsic motivation towards them (Deci & Ryan, 1987, 2000a; White, 1959).

**Relatedness.** Deci and Ryan again linked their use of Relatedness to previous research when they cited the terms Affiliation, as used in Harlow (Deci & Ryan, 1987; Harlow, 1958), and Belongingness, as used by Baumeister and Leary (Baumeister & Leary, 1995; Deci et al., 2017). SDT’s Relatedness, like Affiliation and Belongingness, involves a sense that one belongs to a community or something larger than oneself and a sense of being on a team or in a community one does not want to let down. Unlike Belongingness or Affiliation, SDT’s Relatedness also explicitly encompasses a sense that one should do what is expected of people who are members of certain groups as a way of maintaining membership in those groups (Deci & Ryan, 1987, 2000b; Gunnell et al., 2013; Milyavskaya & Koestner, 2011).

**Organismic Integration Theory (OIT)**

SDT defines intrinsic motivation as the default state of all humans, but also acknowledges the existence of extrinsic motivation. A sub-theory of SDT, OIT, describes four levels of extrinsic motivation. These start with a completely external set of rules that one simply complies with and end with a fully accepted set of rules and values that one believes are
important. They note that this is not a new idea, having been described by Kelman (1958) and again by O’Reilly and Chatman (1986).

Rigby, Patrick, Deci and Ryan (1992) built on these earlier works and described three general states of motivation people might feel in relation to any particular task. People can be amotivated, motivated to do the task extrinsically at various levels ranging from simple compliance to general agreement with an external pressure, or they can be intrinsically motivated to accomplish the task regardless of external pressures. Deci and Ryan (2000) later adopted this set of levels and illustrated them with Amotivation on the left and Intrinsic Motivation on the right, with the various levels of Extrinsic Motivation in the middle. A simplified version of this illustration is below, followed by a description of each state.

**Table 1.** Motivational levels in OIT, adapted from Deci and Ryan (2000).

<table>
<thead>
<tr>
<th>Amotivation</th>
<th>Levels of Extrinsic Motivation</th>
<th>Intrinsic Motivation</th>
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<tr>
<td></td>
<td>External Regulation</td>
<td>Introjected Regulation</td>
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**Movement along the spectrum.** One key element of OIT is the concept that a person’s level and type of motivation towards a given task can and does change over time. Deci and Ryan (1996) argued that the longer one is exposed to extrinsic motivation to perform a task, the more likely it becomes that one will integrate that motivation and thus move towards a state of Integrated Motivation. Deci and Ryan pointed to a sense of community or interpersonal relationships with others on the job, i.e. Relatedness, as the primary driver of this integration (Deci & Ryan, 2000b). They described this process as starting with a sense that one should do what one’s colleagues expect and building to a sense of membership in a community which behaves in certain ways (Deci & Ryan, 2000b).
This has implications for new employees, who might begin their career simply following rules and obeying commands, but who might, over time, come to internalize those rules and regulations and enter a state of Integrated Motivation which compels them to behave in such a way so as to conform to the expectations of their now internalized role. People who have stayed in the same job for a long time, then, might show higher levels of Integrated Motivation with relation to actions which were, at first, Introjected (Rigby et al., 1992).

Amotivation. This was described by Rigby et al. (1992) as a state of having no desire or motivation to perform a task, either through apathy or unawareness. It would include both a person seeing a task as moot or pointless and a person not knowing a task exists. This amotivation through simple unawareness is thus the default state people have for all tasks until they learn about them. This is not to be confused with the Behaviorist idea of amotivation. In OIT it is wholly possible to be amotivated towards a task that one would be intrinsically motivated to perform if one knew about it. No external force, reward or punishment is required to move out of an amotivated state and into one of the other states of motivation in OIT.

External Regulation. This is the first level of motivation and is entirely extrinsic. Rigby et al. (1992) described these behaviors as those “regulated by contingencies overtly external to the individual” (p. 169). The authors gave the example of a child in a classroom striving to get a good grade on a seemingly meaningless test only to earn a gold star from the teacher. These behaviors, while intentional, would not be initiated if not for the external controlling force and are thus non-volitional (Deci et al., 1991). Rigby et al. (1992) also used a narrower definition of external regulation than Deci et al. (1991). Deci et al. (1991) pointed out that this regulation can
be positive or negative and gave the example of a student working on an assignment both to receive praise from the teacher and to avoid punishment from parents.

**Introjected Regulation.** At the second level of motivation, internal pressures or self-identities initiate behaviors. These actions are undertaken to conform with external expectations of those with the identity in question, even if there is no clear reward or punishment. The example given by Rigby et al. (1992) was a child who feels compelled to study hard for a test because she believes that her parents want her to be a good student and that society expects good students to study hard and get good test scores. The authors were careful to note that while motivations of this level no longer require overt external rewards or punishments, Introjected Regulation is still not intrinsic because both the identities and the actions required of those identities are still controlled or regulated by external forces.

**Identified Regulation.** This type of motivation is similar to Introjected Regulation, but the identity involved in the action has been fully integrated into one’s sense of self, along with the belief that the societal expectations of people with that identity should thus be obeyed (Deci et al., 1991). In Rigby’s running example, the student studies hard for the test because she believes that she is a good student and that society expects good students to study hard for tests and get good scores on them (Rigby et al., 1992). Identified Regulation is thus different from Introjected Motivation because the role or identity, such as ‘good student’, is fully accepted and internalized by the one performing the task. The duties, expectations, and requirements associated with that identity, though, are still externally imposed (Rigby et al., 1992; Vansteenkiste et al., 2006). Rigby et al. makes no mention of what would happen if one were to internalize the requirements made of members of a group while not entirely self-identifying with
that group. It is unclear, then, in OIT, how to describe a person who believes good students should study hard and earn good grades but also still believes that while others want her to be a good student, she is not actually one.

**Integrated Regulation.** This is the type of extrinsic motivation closest to true intrinsic motivation. In it, the same self-identity exists as in Identified Regulation, but the condition of societal or external expectation becomes irrelevant (Deci et al., 2001; Rigby et al., 1992). In the above example of the child and the test, she would believe that she is not only a good student but also that good students study hard for and earn good scores on tests, regardless of what others might believe about who she is or the behavior of good students. Rigby et al. (1992) pointed out, though, that while she studies hard because she believes she should, she is still only studying hard to earn a good grade. She is not studying because she finds studying a fulfilling and rewarding pastime in of itself (Rigby et al., 1992). Thus, Integrated Regulation is still different from intrinsic motivation because Integrated Regulation causes Instrumental Motivation aiming to achieve a certain goal, while Intrinsic Motivation is fully autotelic (Rigby et al., 1992).

Deci et al. (1991) added to this research stating that people can have various identities, giving the example of a young person identifying as a good student and also as a good athlete. The final stage of the integration of regulation is when all the various expectations placed on a person merge and are no longer in conflict. Only then, Deci argued, can any of the expectations be considered fully integrated.

**Intrinsic Motivation.** This motivation is the final type covered in OIT. It is the in-born or default desire of all humans to explore the world, to interact with it, and to understand it. Deci and Ryan (2000b) argued that it is, in fact, one of the primary evolutionary advantages of
humans. In Rigby’s student example, intrinsic motivation is the state in which the student enjoys studying and finds it to be a rewarding way to spend her time (Rigby et al., 1992), as opposed to doing it to get a good grade as she would if compelled by an Integrated Motivation.

**Evidence for OIT.** There have been several studies that showed evidence for OIT’s effectiveness in predicting the motivation and dedication to tasks in several groups of people. Wilson et al. (2013) investigated adults’ motivation to exercise more after being advised to do so by a doctor. They found that the level of identification or regulation people felt, i.e. how far towards Integrated Regulation they were with regard to exercise was the strongest correlative variable with how long they actually did exercise (Wilson, Sabiston, Mack, & Blanchard, 2012). Later, Gaston et al. used OIT to investigate the motivations of pregnant women towards exercising more. They showed that women who had more strongly integrated the need for exercise did in fact exercise more than those who had not done so (Gaston, Wilson, Mack, Elliot, & Prapavessis, 2013). Recently, Wang, Hall, and Rahimi investigated students in Singapore and was able to use OIT to predict which students would and would not feel motivated to study math (C. K. J. Wang et al., 2017). Coincidentally confirming the running example in Rigby et al. (1992), those with more integrated motivations also studied more and performed better on tests.

**Self-Determination Theory Investigations of Employee Retention**

Over the years since the introduction of SDT there have been many studies using it as a base from which to investigate the retention and motivation of employees in several fields. Common to these studies is an acceptance of Deci and Ryan’s argument that some workplaces are supportive of Self-Determination and some are thwarting, or “controlling” as Deci and Ryan put it (1987). Deci and Ryan have noted that this claim is, in turn, based on the work of scholars
such as Rotter (1966) or Miller and Seligman (1975). The core of the idea is that in work situations where employees do not feel they have an internal locus of control, or Self-Determination, or where they do not feel that they have the skills, tools, and time to accomplish assigned tasks, their natural intrinsic motivation to learn, work, explore, and solve problems will be reduced (Deci & Ryan, 1987, 2000a; Miller & Seligman, 1975; Rotter, 1966, 1966). SDT indicates that work environments can support workers’ Self-Determination by giving employees the agency to make decisions and the tools to carry them out, or at the other end of the spectrum, work environment leaders can attempt to control everything the employee does or deny them the tools they need at the cost of those employees’ intrinsic motivation to work (Baard et al., 2004; Deci et al., 2001, 2017; Schultz et al., 2015).

This assertion by Deci and Ryan has been tested and evidence has been found to support it. Deci and Ryan joined with Baard and showed that SDT explained employee satisfaction as well as any other theory, and that employees’ scores on a test of BPNT correlated well with both satisfaction and intent to continue employment with the company (Baard et al., 2004).

Milyavskaya and Koestner (2011) surveyed 203 working adults about their motivation, Basic Psychological Needs Satisfaction, and sense of Self-Determination across domains ranging from friends and family to work and pleasure activities. They found that those who reported well-satisfied Basic Psychological Needs also reported higher levels of a sense of Self-Determination and better overall motivation across all domains. They thus concluded that their data supported the use of BPNT testing in areas of life outside the workplace. Fernet, Guay, Senécal and Austin (2012) chose to investigate the support of all three basic needs of BPNT, i.e. Autonomy, Competence, and Relatedness, and found that this support was very similar to overall
support for Self-Determination. This, they argued, supported the claim that testing BPNT elements was a valid way to test for a sense of Self-Determination among employees.

Ryan joined with Schultz and others in a 2015 study investigating employee wellbeing by distributing a Basic Psychological Need Satisfaction at Work Scale (BPNSWS) survey to 259 working adults. (Schultz et al., 2015). The survey asked respondents how mindful they were in a typical day, how supporting of their autonomy they perceived their workplace to be, and also about burnout, intent to quit, and absenteeism. The study confirmed that people in workplaces with environments perceived to be more controlling were also more likely to burnout, want to quit, and be absent (Schultz et al., 2015). Additionally, it seemed that high levels of mindfulness seemed to ameliorate the effect of highly controlling environments (Schultz et al., 2015).

Cuevas, Ntaumanis, Fernandez-Bustos, and Bartholomew (2018) surveyed teachers in Spain and found that when their annual teacher evaluations were based on student test scores, the teachers felt less Self-Determination and less motivation. This result, the authors concluded, was likely due to a reduced feeling on an internal locus of control – that they were being judged based on something they did not have complete control over. This finding was consistent with a sense of Self-Determination supporting workplace morale. Also studying teachers were Fernet et al. (2012), who studied burnout in teachers and found that one of the largest suppressors of teachers’ intent to stay in the classroom was a sense that their autonomy was being eroded by more and more testing, regulation and external interference in the classroom (Fernet et al., 2012). Cuevas et al. (2018) and Fernet et al. (2012) were somewhat rare in that they studied teachers who had remained in the classroom, rather than teachers who had already left the classroom.
While not explicitly an SDT study, and not a study focusing on teachers who have stayed in the classroom, Ingersoll’s 2007 summary of the reason teachers leave the classroom also found that a lack of autonomy in decision-making was a major factor in teacher attrition. In the paper, he noted that when compared to teachers, other professionals have much more control over their own daily decisions. He compared the control over professional decisions to that of nurses, lawyers, and accountants and found that teachers had by far the least control over their jobs. He also wrote that in his research he had found that at schools with environments which did not support teacher autonomy, the attrition rate could reach 20% annually, whereas in schools which did support teacher autonomy that rate might be 5% (Ingersoll, 2007). His study used a 6-point scale to judge the amount of autonomy teachers felt in the classroom and found that “schools with higher levels of faculty decision-making influence and autonomy have lower levels of turnover. A 1-unit difference in reported teacher influence between schools (on a 6-unit scale) is associated with a 26% difference in the odds of a teacher departing.” This is a finding he later confirmed when writing with May (Ingersoll & May, 2011). Ingersoll was not using SDT as a declared basis for either paper but the idea that a failure to support autonomy would greatly increase employee attrition is consistent with SDT and might be considered a triangulating data point supporting SDT.

Summary

The literature can be described as rich in the area of reasons teachers leave. SDT investigations have found that teachers who do not feel support for their sense of Self-Determination, Autonomy, Competence, and Relatedness are more likely to leave teaching.
Research has found several demographic characteristics, as well as several teacher beliefs which correlate with high levels of teacher attrition.

Teachers who are new to the classroom, near retirement age (Borman & Dowling, 2008; Boyd et al., 2011; Gray & Taie, 2015; Guarino et al., 2006; Roness, 2011; Torres, 2012), female, or non-White, have been shown to have higher rates of attrition (Hughes, 2012; Schaefer et al., 2012). Those with a master’s degree or doctorate also leave more often (Borman & Dowling, 2008). On the other side, those with a life-long desire to be a teacher, a willingness to work hard to achieve one’s career goals, a desire to help children and communities, and a strong self-identity as a teacher have been shown to leave less often (Schaefer et al., 2012). Teachers who; had attended teacher training programs which included both pedagogic and classroom management skills, had good grades from prestigious universities, or had earned any board certifications have also been shown to be more likely to stay in the classroom (Borman & Dowling, 2008; Boyd et al., 2011; Freedman & Appleman, 2009), though there is still some discussion with regard to the importance of the grades teachers received while in university or the level of the university which they attended (Hughes, 2012).

Research has found higher attrition rates correlated with school districts with fewer than 1,000 students; large class sizes; high levels of low-income, low-achieving, and / or minority students; low teacher salary; high teacher workload; poor relationships with the community; and little available technology (Borman & Dowling, 2008; Boyd et al., 2011; Hughes, 2012; Ingersoll, 2001; Ingersoll & Strong, 2011).

The literature has also found that high attrition correlates with school working environments in which teachers feel separated from of the community they serve; untrusted by
school leadership; unsupported by the parents of their students; unable to control their classrooms; punished for factors outside their control such as poverty; unable to influence the school, district, curriculum, and testing used; unable to collaborate freely with colleagues; or generally overworked – these environments all face higher teacher attrition rates (Borman & Dowling, 2008; Boyd et al., 2011; Fernet et al., 2012; Hughes, 2012; Ingersoll, 2001, 2007; Ingersoll et al., 2014; Ingersoll & Strong, 2011; Odell & Ferraro, 1992; Schaefer et al., 2012; Torres, 2012).

The assumption in the literature is that teachers who stay in the classroom must have opposite characteristics, motivations, or experiences to the teachers who leave and that districts with low attrition will be those that are the opposite of those with high attrition. The following chapter will provide an articulation of the selected methodology for this research project.
Chapter 3: Methodology

Research Paradigm

For this study, an Interpretivist Research Paradigm was chosen. This paradigm is based on a relativist ontology; it is compatible with a case study’s use of interviews and the negotiation of meaning between researcher and participants. It is also based on subjectivist epistemology, since the data collected was assumed to involve elements of both what the participants know and believe about the world and elements of what the interviewer knows and believes about the world. This potential issue was acknowledged and is compatible with qualitative case study methodology (Hamel et al., 1994; Merriam, 1988).

Research Method

In the design stage of this project, it became clear that the primary research question was a “what” or “why” question, as opposed to “how often” or “how many” question. Coupled with the fact that any control over the behavior of the participating teachers would have been impossible, and the fact that any study done would necessarily be ex post facto, case study was a natural approach (Bassey, 1999; Merriam, 1988; Yin, 2014). The term “case study” is used in medical research, law research, and even in the business world. It is also used to describe a research study in which one attempts to describe and explain the actions of people in certain circumstances and in a certain setting (Creswell, 2012; Stake, 1995; Yin, 2014).

Population and Recruitment

This was a qualitative case study investigating the reasons teachers in one school district in the US state of Alaska, the ASD, choose to stay in classroom teaching positions at higher rates than teachers in similar, and even neighboring, districts. The district was selected through a
contact who worked at one of the schools and who knew that the new superintendent was seeking more information about how to best support the teachers in the district and would be open to participating in a study.

All 35 teachers in the district were asked to volunteer for the project via email. Of those, seven teachers volunteered to be interviewed and all were included in the study. For the purpose of the study, “Teacher” was defined as any person who had regularly scheduled classes in both the Spring and Fall of 2017 semesters. Teachers with regularly-scheduled classes were studied because part-time substitute teachers, school leaders, and non-teaching staff are generally not included in the nationally published numbers of teacher attrition (NCTAF, 2003).

An email explaining the study was sent to the superintendent of the district then forwarded by Blind Carbon Copy (BCC) to every qualifying teacher in the district. The initial email included detailed information about the role participants would take, their rights, and protections. In addition, at the beginning of the face-to-face interviews, participants were given two printed copies of the consent form, one of which they signed and returned and the other of which they kept.

At no time did school leadership or anyone outside the research team know who participated and who did not. The email sent to teachers as well as the release form and signed document were all submitted and approved by Northeastern University’s Institutional Review Board.

**Sampling Strategies and Criteria**
Given the small size of the population of 35 teachers, no sampling other than participant self-selection was needed. All teachers were invited to participate, seven teachers volunteered, and all were included, meaning the sample was entirely self-selected.

**Procedures**

Data collection, storage, and analysis is at the heart of any case study. The way in which this study collected and stored data, and the instruments used to do so, are described below.

**Data Collection and Storage.** Participants received an initial email describing the study and offering them a chance to volunteer to participate in an interview. Those who volunteered were contacted to arrange a time and date for the initial interview. These were 90-minute in-person interviews conducted in late 2017. Those who were included in the study were interviewed in person, at the school site or elsewhere if they preferred to remain more anonymous. All interviews were audio recorded and transcribed. The participants were offered a copy of the transcription of their interview as well as a copy of the final publication.

This study used an adapted version of the BPNSWS survey, first developed by Deci and Ryan (Deci et al., 2001; Ilardi et al., 1993; Kasser et al., 1992) and separately validated by others (Baard et al., 2004; Cordeiro, Paixão, Lens, Lacante, & Luyckx, 2016; Gunnell et al., 2013). The original instrument asked a series of questions about support for Autonomy, Competence, and Relatedness in the workplace. Participants were asked to use a 5-point Likert scale to show (dis)agreement with 12 statements, four from each of the three basic needs described in BPNT. Follow-up questions were then asked to frame a semi-structured interview about the teachers’
response to each of the prompts. This was done to allow more in-depth questioning about why the participant agreed or disagreed with each statement.

The instrument was designed to be used as a survey, with scores from 1-5 assigned to each answer. Some prompts were negatively worded and were meant to have participant’s answer scores reversed (Deci et al., 2001; Ilardi et al., 1993; Kasser et al., 1992). A later evolution of the instrument called the Basic Psychological Need Satisfaction and Frustration Scales – Work Domain (BPNSFSWD) included two separate scores, one for the positive, supporting prompts and one for the negative, thwarting prompts (Chen et al., 2015). This study also used a semi-structured interview and did not attempt to statistically analyze the answers to the prompts, as the difference was moot.

Signed consent forms were scanned and are kept digitally. The originals have been micro-shredded. Recordings are kept as MP3 files. The master document with the real name / pseudonym matches is kept as a word document. All of these digital files are stored exclusively on a 128-bit encrypted hard drive with military-spec password protection and will be for six years, then they will be completely destroyed with at least three passes of a data eraser such as KillDisk software.

**Reflexivity Journal and Field Notes.** Data was collected in the form of artifacts in and around the school district; these were written notes during the interviews with teachers and the superintendent and transcribed recordings of those interviews. Due to privacy concerns in the school district, no photographic evidence was collected.

**Data Coding and Analysis.** This study followed the data analysis process for instrumental case studies laid out by Yin (2014), in which he pointed out that data analysis is one
area of case study practice that is still in need of development. He stated that in qualitative data analysis, “Unlike statistical analysis, there are few formulas or cookbook recipes to guide the novice” (Yin, 2014, p. 133). Yin’s general method for data analysis in case studies started with what he called playing with the data. For analyzing transcriptions of interviews, this involves the researcher looking at the data collected and striving to see patterns and categories emerge. This stage also involves the re-reading of any notes or observations made during the interviewing process.

This stage is quite similar to what Miles, Huberman, and Saldaña (2013) called the first cycle of data analysis. Once the data has been looked over and a rough few categories for codes and perhaps a general idea of meaning are formed, Yin (2013) recommended going back and re-checking or re-coding.

After the transcripts have been coded, Yin recommended consulting the case study’s theoretical framework for insight into how the collected data might better be grouped and used to answer the research questions. He recommended creating some preliminary answers to those questions, and then looking at the data to see if opposite answers can also be supported. This study adopted Yin’s methods.

**Ethical Considerations**

Crowe et al., among many others, stressed the importance for the researcher to think through the ethical implications of any case study (Crowe et al., 2011). To this end, the reciprocity offered to participants in this study is described below. Then, the efforts made to ensure the trustworthiness of the study are discussed. Finally, a review of the protections offered to the human participants in the study is made.
Reciprocity. There were few immediate benefits to teachers who participated in this study. Talking about why they have decided to remain in a teaching position might have helped participants reflect upon and become more in touch with their own motivations. It might also have helped them more clearly articulate the benefits of being a teacher when they discuss their career choices with others. Finally, if these teachers’ motivations and opinions are read and understood by school leadership, a better sense of community between leadership and teachers might develop. Several of the teachers did request that the final study be sent to state legislators in the hopes that they would better understand the needs and struggles of teachers in Alaska.

This study also benefited non-teachers. Once the motivations of this small group are better understood, secondary and larger studies might be able to replicate the collection methods and look for generalizable trends in teacher motivation. These studies will further explain why teachers choose to teach and how that decision can be supported. If this is the case, it is possible some teacher attrition can be prevented.

Trustworthiness. Several methods were employed in this study to maintain the trustworthiness of the data collected. Firstly, triangulation was employed in the form of the collection of data from multiple sources - namely the district’s official documentation, state reports about the district, interviews with leadership, and interviews with teachers.

Another method employed to boost the study’s trustworthiness was the reflection on and acknowledgment of the biases and preferences of the researcher. While these biases cannot be removed, they can be understood and their effect on the data can be minimized.

Trustworthiness was also established by providing participants with the opportunity to be interviewed wherever they felt the most comfortable. While all of the interviews were conducted
in person, in an effort to help participants maintain anonymity all teachers were offered the chance to be interviewed off site from the school if they were more comfortable doing so. Only one took advantage of the offer and was interviewed in her home. The others all preferred to be interviewed in their classrooms.

Finally, the instrument used contained several terms and phrases that were understood very differently by some participants. To ensure participants’ values and positionality were honored, each teacher was asked how they would prefer to define these terms and their definition was noted and used in their interview. As an example, one prompt asked the extent to which each teacher felt they were “close” to their colleagues and while one teacher chose to define this as anyone in his phone’s address book, another chose to define it as anyone she had invited to her birthday party.

Protection of Human Subjects. Participants had the purpose of the study explained to them via a standard statement which was read to them at the beginning of the interview. This reiterated that their participation was voluntary and anonymous, and that they could choose to leave at any time. Since teachers were explaining the good and the bad about their work environment, fear of reprisal from coworkers or leadership was a possibility. Thus, names were changed in the transcription process and management was not informed of who participated and who did not.

There was a slight risk that teachers might reveal something negative about the district and feel that they might be punished or ostracized. This was unlikely to occur, in that this was an emerging best practices case study and the positive elements of the district were far more likely
to be discussed. Also, this is a small, tight-knit group of teachers and leaders so all negatives are likely known.

Additionally, teachers could theoretically have been punished for participating or not participating. This risk was reduced by having the superintendent communicate to all teachers and principals that this was a wholly optional study and that participation was entirely up to the teachers. If any teacher comes to believe that he or she has been punished for participation or non-participation, the superintendent stated that she will work to ameliorate any damages and de-escalate any conflicts.

To further the protections offered to participants, all recordings were transcribed, after which the original recordings were destroyed. These transcripts were analyzed, and short sections were quoted in the study. Pseudonyms were used in the transcriptions, and one file is maintained with the real name / pseudonym matches. This file, along with the transcriptions, is kept on an encrypted hard drive with military-spec password protection. Six years after publication of the study, the name / pseudonym matching list will be destroyed.

Limitations and Bounding

There are several limitations in what this study can hope to achieve. Naturally, as a small case study, generalizability was limited. However, this was expected and is not considered a true flaw. This study was an attempt to get quality, in-depth, information about a small group rather than a generalizable dataset about a large population.

Another limitation is that in-depth data was negotiated between the participants and myself. As a result, my own biases and lived history likely had an unconscious influence on the data collected. I have consistently chosen not to teach children or teens, and this study involves
asking teachers why they have chosen to do so. Little could have been done about these biases other than to recognize and take note of them.

There are also some structural limits to what can be done with this case study. All participants were volunteers, and thus might have represented a selection bias towards the more dedicated and motivated teachers in the population. The fact that their initial interaction with the study was in the form of an email from the superintendent might also have meant that only those teachers who are more likely to read an email from the superintendent, and more likely to look favorably on any study she is informing them of, might apply to participate. Short of random selection and forced participation, there was not much that could be done to avoid this limitation other than to acknowledge it.
Chapter 4: Analysis of Findings

The purpose of this case study was to understand why teachers at a rural school district in the American state of Alaska, called here by the pseudonym Alaskan School District (ASD), choose to remain in classroom teaching positions longer than those in otherwise similar school districts.

This study was based in SDT as originally developed by Deci and Ryan (1987). Central to SDT is the idea that humans are best motivated if they feel a sense of Self-Determination, meaning an internal perceived locus of control and a sense that one’s actions have a direct influence on the outcome of tasks. Self-Determination is supported by a sense of Autonomy, Competence, and Relatedness to others. A sub-theory involving the study of these elements, Basic Psychological Needs Theory (BPNT) was the base theoretical lens for a publicly available instrument called the Basic Psychological Need Satisfaction at Work (BPNSWS) Survey (Deci et al., 2001; Ilardi et al., 1993; Kasser et al., 1992). The BPNSWS survey measures workers’ sense of the amount of support for these three needs that exists in their work environment. In this study, the BPNSWS was adapted for qualitative research and used as conversation prompts for a series of semi-structured interviews with seven of the 35 teachers in the district.

The overall research on teacher attrition and retention has uncovered factors correlated to attrition rates related to both the teachers themselves and the environments in which they work. As a result, data was collected both about the teachers and their characteristics and about the extent to which they perceived their work environment to be supportive or thwarting of their sense of Autonomy, Competence, and Relatedness. A short description of the setting (including the community and the school district) is below, followed by results of the investigation into the
teachers’ personal characteristics. The results of the investigation into the teachers’ perceptions of their work environment are also presented.

**Setting**

This case study took place in a rural Alaskan school district, referred to as the ASD. To maintain anonymity and privacy, any numbers that could be used to identify the district or the teachers in the study have been rounded off or generalized.

The community the ASD served consisted of 3,500 people, and was 80% White, with subgroups of Alaskan Native / Native Americans, and a small Asian population. The community’s median household income was $50,000 per year, which put it well below the Alaskan average of $76,440 (U.S. Census Bureau, 2017). The school district served 475 students and employed 35 teachers working in three schools. The schools included one elementary school, one junior high, and one high school which together covered grades K-12. The total budget for the district in 2018 was $8.5 million, which calculated to roughly $18,000 per student. This is believed to be well below the Alaskan average, which was $20,172 in 2013, the most recent data published (U.S. Census Bureau, 2015). Teacher attrition in the district was minimal, with the superintendent recalling only one teacher retiring, but staying on as a substitute, in the previous five years. The pay scale for teachers and staff was average for the area and was described by the superintendent as “middle of the road” and by Teacher Two as “typical for Alaska.”

District leadership was made up of a superintendent and three principals. The superintendent taught outside the district, in another state, before joining it as a principal. She was promoted to superintendent two years before the study. The three current principals were all
teachers in the district before being promoted (one due to the superintendent leaving her position as principal to become the superintendent).

All 35 full time teachers in the district were offered a chance to participate in the study, and seven chose to do so, creating a sample size of 20% of the entire population. Table Two below describes the age range of all seven teachers in the study. This was listed as a range in part to protect anonymity, and in part because some participants were only comfortable reporting their age as such. The teachers ranged from early-career to post-retirement age, and thus included all stages of the U-shaped Attrition curve (Borman & Dowling, 2008; Gray & Taie, 2015; Ingersoll, 2001; Roness, 2011; Torres, 2012).

Table Two also lists the number of years each teacher had been teaching, and the highest degree they had attained. All of the teachers had at least a bachelors’ degree, a requirement for teacher licensing in Alaska. While some had a masters’ degree as well, others had more than enough hours to earn one but not all in one field or program and as a result had never finished a master’s program. The teacher with the least classroom teaching experience had five years.

Ingersoll and others have commented that the first five years of a teachers’ career are when they are most likely to leave the classroom, followed by the five years near retirement age (Ingersoll & Smith, 2003). While it may have been helpful to have a teacher in the district with fewer than five years of experience, no such person volunteered.

Finally, Table Two includes which of the NSTAFs teacher history categories the teachers in the study would fall into (Cochran-Smith, 2004, 2004; Ingersoll, 2001; Ingersoll & Smith, 2003; NCTAF, 2003; S. D. Whitener, 1997). All were either Shifters, those who had moved between schools but remained in the district, or Returners, those who had left the district or even
teaching and returned to it later (NCTAF, 2003). The most common reason given for leaving and later returning to the district was childbirth / childcare.

Table 2. Summary of demographic data.

<table>
<thead>
<tr>
<th>Teacher Number</th>
<th>Age Range</th>
<th>Years of Teaching</th>
<th>Highest Degree</th>
<th>Race</th>
<th>Gender</th>
</tr>
</thead>
<tbody>
<tr>
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<td>Female</td>
</tr>
<tr>
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<td>BA + 60</td>
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<td>Male</td>
</tr>
<tr>
<td>3</td>
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<td>25</td>
<td>MA</td>
<td>White</td>
<td>Female</td>
</tr>
<tr>
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<td>30-34</td>
<td>5</td>
<td>BA</td>
<td>White</td>
<td>Female</td>
</tr>
<tr>
<td>5</td>
<td>45-49</td>
<td>15</td>
<td>MA</td>
<td>White</td>
<td>Female</td>
</tr>
<tr>
<td>6</td>
<td>45-49</td>
<td>14</td>
<td>BA +120</td>
<td>White</td>
<td>Female</td>
</tr>
<tr>
<td>7</td>
<td>35-39</td>
<td>14</td>
<td>MA</td>
<td>White</td>
<td>Male</td>
</tr>
</tbody>
</table>

The Community

The community is a small town with a main street full of small shops and service providers. There were three stores selling groceries, a book shop, some restaurants, and two souvenir shops.

Teacher One described the culture of the community as one in which everyone can, and is encouraged to, try new things and offer any help they can to others. She described it as, “You can be the city councilman. You can run for any office here. You can jump in and do as much as you want to do. You can take over the whole recycling program because there is always a need for help.” This was supported by the observation that several of the members of the school board are also members of the board of trade for the town. When asked about this cross-over, one local resident remarked that these were the people who had the time to volunteer for everything and were thus elected to most boards.
Observation of the community was made difficult by weather. During the week of observations heavy snows and cold were the norm. One community event was able to be observed, which was an arts event that took place at the junior high school’s auditorium. It was well attended by locals who sold tickets through a volunteer group appointed by the local chamber of commerce. The group putting the performance on had hired a performer to come to the town and perform, and ticket sales were expected to cover costs but not generate much profit. Since the group didn’t anticipate having much money to spend on a venue, the local junior high school’s auditorium was used. When asked if it was the norm for the school to open its doors to non-educational non-profit events, those in charge said it was. They seemed surprised some schools would not do so in other places. This illustrated the connection between the community and the schools.

**The School District**

The school district spent less than the Alaskan average per student and had economically disadvantaged students representing more than half of its total student body. The district achieved a graduation rate higher than 90% and the high school provided an Advanced Placement (AP) class in every subject. Average AP test scores in the district were roughly 30% better than the state average. The ASD was listed as one of the best districts in Alaska. As such, the ASD did not conform to the predictions made by Boyd et al. based on the level of poverty in the district (Boyd et al., 2011).

The district also offered a full slate of extracurricular activities, from music, to swimming, to a micro-agriculture club. These were mentioned by the teachers as being vital for building connections with students; the superintendent described their importance as follows:
We're not going to quit having kids learn how to play the trumpet so that they can be drilled and drilled somewhere for six hours or something. We will never be that district. It will never happen. And I think people believe that, if that makes sense. I think our teachers believe that, I think our parents believe that, and I think our kids believe that.

This comment illustrated both the district’s commitment to extracurricular activities and connection to the community. During a follow-up interview, the Superintendent noted that the district was in the process of creating an “e-Sports” team in which students could practice and compete in the playing of competitive video games. This was something the students had requested, and a teacher had agreed to be the coach for. She explained that it would be treated like any other sport, and that if student interest was strong, it could grow into a fully funded and supported sport just like any other. Not only did this illustrate the forward-thinking nature of the district with regard to technology, it also demonstrated the student-focus present in the ASD.

The district employed 35 teachers for 475 students, which meant relatively small class sizes were the norm. The superintendent described these as, “We don't have ridiculous class sizes here and we never have . . . elementary-wise, we have a few larger classes over there but I mean a ‘larger size’ here is when you have 22 kids in a classroom.”

This sense that teachers are trusted and respected was common throughout every interview. The sense of the community supporting the schools and teachers was also mentioned by Teacher One, who described her sense of Autonomy as:

I know that other districts, particularly people who traveled away and come back and told us that . . . as a teacher, you have to be on a certain page in a curriculum at a certain time, and we have nothing like that . . . There's a lot of freedom within that. Everybody knows
that there will be some basic concepts that are taught and that we will use good practices and we'll hit the standards, but that it might be done in a way that the teacher felt most comfortable doing it. There's a basic understanding of that. Nobody goes back and says, ‘Hey, you're supposed to teach that unit in the first!’ and ‘What do you mean your kids didn't get that?’

The strongly supported sense of Autonomy as described by many of the teachers is consistent with Ingersoll’s (2001) findings that one of the major reasons teachers leave was a lack of Autonomy in the classroom. The Autonomy in the ASD was also described by the superintendent. When asked about district control over the teachers’ actions in the classroom, the superintendent, who had also been a principal in the district before being appointed superintendent, replied:

We don't do pacing guides here. We never fell into that trap . . . as a principal, when I would go to conferences years ago . . . that was the big thing. Anchorage had every day mapped out. I remember sitting in conferences, in meetings about that and saying as a principal, ‘How can we have just sat through a half day training on individualizing instruction for children and then spend the next half of the day on pacing guides?’

Teacher Four also made it clear that teachers had a great deal of control over the classroom. She was asked if the district had pacing guides or exerted external control over the classroom and replied:

No, no. That's what we have going for us here. And that, I would argue, is the cornerstone of why you want to be in a place like this. ‘Cause you have the freedom to be on whichever page, doing whatever you want . . . You have a lot of power as a teacher
here because you are seen as a professional and the principal will say ‘Well, how you wanna do it?’ and ‘Would you mind if we try this?’ Very much our profession is honored by the administration, I feel.

Similarly, Teacher Seven was asked if he felt the district supported his sense of Autonomy well, and replied:

We get to direct a lot of what we are creating. We feel like we have a role in the school that matters, that changes the school. We can change it for the better, and so I feel like there's a very clear sense of purpose and I'm also working to create something that I think will be good for my own children . . . We are allowed to make mistakes, we are encouraged to experiment with stuff. We are given lots of technology to try to do stuff when we have the money. We are encouraged to experiment, try this and that, and see what will work well. And I feel like there's not anybody standing over me monitoring what I'm doing.

This demonstrated the culture of the district as seen by several of the teachers. They all felt that they were supported, respected, and valued as professionals and none of them felt that they were at all controlled in classroom practice. Several teachers mentioned the high availability of teacher development opportunities, which made them feel like they had all the skills they needed to teach and meet the community expectations well. Many teachers contrasted this with other districts at which they had worked as justification of why they chose to stay in the ASD. The research has found strong correlation between a lack of autonomy and teachers deciding to leave the classroom (Deci & Ryan, 1987; Ingersoll & Smith, 2003; Ingersoll & Strong, 2011; Schaefer et
Thus, the existence of a strongly supported sense of Autonomy in the ASD - with its very low attrition rates - is consistent with the research. The research has found that teacher attrition correlates with several variables. Among those are teacher-centric details such as biographical details and personality types, and also environmental variables having to do with both the numeric details of the school such as the percent of families in poverty and with more intangible details such as teachers’ sense of being supported. These are all discussed in more detail below.

**Teacher-centric Characteristics**

This study involved seven of the 35 teachers as well as the superintendent of the district. The superintendent was interviewed not as a normal participant, but to offer context and insight into the district as a whole. As such, she was not given the same questions as the teachers and her commentary is not included in the analysis of the teachers’ motivation below.

Research has shown that several traits are correlated with higher or lower teacher attrition. Teachers who are new to the classroom, near retirement age, female, or non-White have been shown to have higher rates of attrition (Borman & Dowling, 2008; Boyd et al., 2011; Gray & Taie, 2015; Guarino et al., 2006; Hughes, 2012; Schaefer et al., 2012; Torres, 2012). Teachers who have not attended teacher training programs which included both pedagogic and classroom management skills and who have not earned any board certifications have also been shown to be more likely to leave the classroom (Borman & Dowling, 2008; Boyd et al., 2011; Freedman & Appleman, 2009). In addition, teachers who do not feel a strong desire to help children learn, who do not have a particularly strong disposition towards hard work, or who are not student-focused have been shown to quit more often.
The assumption in the literature is generally that teachers who stay in the classroom are simply the opposite of the teachers who leave. This study was, in part, a test of this assumption. The section below describes the demographics, backgrounds, relationships, personalities, and beliefs of the interviewed teachers and compares each to the traits found in the literature to affect teacher retention.

**Teacher Demographics.** Research has shown that teachers new to the classroom and those near retirement age leave the classroom more, with mid-career teachers leaving the least often (Borman & Dowling, 2008; Boyd et al., 2011; Schaefer et al., 2012; Torres, 2012). None of the teachers interviewed were at the beginning of their careers, and the group had an average of over 21 years of teaching experience. The interview with the superintendent revealed that only one teacher in the entire district has fewer than five years of teaching experience. While this U-shaped attrition curve would predict that teachers near the end of their careers would be very likely to leave the classroom, two of the teachers in the study were over 65, the age at which they could have retired. During their interviews, both of these teachers acknowledged this fact and stated that they would retire if it became clear they could no longer be as effective as teachers. Teacher Two summarized this as “You don’t want to be the guy who should have retired last year.”

All of the teachers identified themselves as White. In that the community was also majority White, the literature would predict that teacher attrition would be lower (Hughes, 2012; Schaefer et al., 2012). This was the case for the ASD.

The literature also states that female teachers are more likely to leave the classroom, most often due to childbirth and raising children (Hughes, 2012; Ingersoll, 2001). Of the five female
teachers, three had left earlier in their careers for periods of time due to childbirth. The findings of the literature, then, are consistent with the sample.

Overall, the results support some of the findings in the literature. Gender seemed to correlate with the teachers having left and returned to teaching after childbirth / childcare, as predicted in the literature. The fact that all of the teachers were White is also consistent with the literature’s predictions. However, the U-shaped attrition curve was not wholly supported by the data collected, in that two of the teachers were post-retirement age.

**Teacher Backgrounds.** Research has shown that having attended a teacher preparation course which includes classroom management techniques as well as pedagogy is associated with higher rates of teacher retention (Freedman & Appleman, 2009). A district with very low attrition rates might be expected to have mostly teachers with this type of preparation. Contrary to the research, only two of the teachers had attended a formal teacher preparation course which covered pedagogy as well as classroom techniques: Teacher One and Teacher Seven. The other five teachers had all studied under mentor teachers and learned classroom management and pedagogic skills “on the job.”

The literature has suggested that teachers with master’s degrees are more likely to leave, meaning the teachers in the ASD might be predicted to have only bachelor’s degrees. This was not supported in by the data. Four of the seven teachers had master’s degrees, and two had more than enough graduate credit hours to have earned a master’s degree if they had wanted to. Neither teacher expressed any interest in earning a masters’ degree, being instead interested only in learning new things to use immediately in their classrooms. This might in part be a result of the fact that the ASD salary schedule for teachers treats having a bachelors’ degree and 80 hours
of post-graduate study the same as having a masters’ degree plus 32 hours of additional post-graduate study.

The data collected in this study do not support the claims found in the literature. The literature would predict that teachers in low-attrition districts would have attended pedagogic training programs, and would have no post-graduate schooling (Pucella, 2011). Neither of these were found to apply to the teachers in the study.

Teacher Personalities and Beliefs. Research has shown that a desire to help children succeed, a disposition to hard work, a fully formed identity as a teacher, and a focus on the needs of students are all correlated with reduced teacher attrition. The teachers in the ASD collectively expressed all of these traits.

Teacher Four illustrated a dedication to students and a disposition to hard work when she described the teaching community in the ASD as one in which “You come early, you stay late. Your display in the hallway is perfect and changed frequently . . . We do the best we possibly can.” It was clear that the community was very strongly in favor of high standards and did not accept anything less than a full effort from teachers. It is worth noting that she used ‘we’ to describe this group of highly dedicated teachers, showing a fully internalized identity as a member of the group. She also described joining the district as a new teacher and being told how hard everyone worked to ensure good teaching, and how a similar amount of effort was expected from all new teachers, that “This is what we do.” It seems, then, that Teacher Four has both fully adopted her identity as a teacher in the district and the demands for high quality teaching and dedication that are expected of a member of the teaching team in the ASD, as is described in OIT. Teacher Six also exemplified a propensity to hard work when she noted, “I don’t like to
talk about my successes as much as figure out how to improve upon them.” Upon further questioning, she stated that this feeling had always been part of her personality and was not something imposed on her by the teaching team in the district. This belief would not be an integrated extrinsic motivation as described by OIT.

Teacher Two demonstrated a student-focus. Responding to the idea of school leadership observing his class to assess him, he remarked that “Every day you have got an audience that expects you to be capable - and it’s not the administration, it’s the kids. They expect you to do your job.” He also demonstrated a strong predisposition to hard work when he described the pressure he felt at work as “I'm not getting any pressure from anybody else, but I pressure myself to make sure I'm doing the best possible job I can possibly physically and mentally do. And when I'm not, it's time to quit.” When asked where this work ethic had developed he said it had been drilled into him during military service. This would be another example of an integrated belief as described in OIT.

Teacher One exemplified the idea of having always wanted to be a teacher. When asked what she would be doing if she were not a teacher, she was unable to even think of an answer. She commented that not being a teacher was something she had never in her life considered.

Overall, the data support the idea that teachers in low attrition districts are likely to have a focus on student achievement, to be naturally hard workers, and have fully self-identified as professional teachers (Rigby et al., 1992). The teachers in the ASD collectively expressed all of these traits.

**Teacher Relationships.** Research has shown that a sense of being bonded to the other teachers in the school, the school leadership, and to the community at large is associated with
reduced teacher attrition. All teachers expressed a sense of being strongly supported by the community, the school leadership, and other teachers. Teacher Five described the community as “Like in the 80’s, back in the 80’s how the parents were. Where they held the kids accountable and didn’t blame you for everything. That’s what I’ve encountered here.” This clearly illustrated a sense that the community trusted and supported teachers as professionals and did not blame teachers for student achievements problems unrelated to the classroom.

Teacher One explained that the community of teachers made a concerted effort to find, acknowledge, and praise teachers who took on extra duties, who accomplished great things, or who had great ideas. “We’re clappers” she said, meaning they were never afraid to give someone a public round of applause.

Teacher One also described her connection to the community and her coworkers by stating “. . . I came here and stayed here because of the people who are here.” She explained that her spouse had once wanted to move away, but she had refused to leave because the ASD was a healthy environment for her to be in and that she could not move. She added that the community was very supportive of the school, and that interactions with parents were much easier and less stressful than in other districts in which she had worked.

Teacher One then went further, suggesting that with regard to how classrooms were run, the teachers were “the creators of the district” and that leadership strongly supported teachers in this. This idea was echoed by Teacher Two, who was thankful to have an administrator he felt not only listened to him, but also reacted to what he said. This sentiment was described by Teacher Seven as having administrators who allowed teachers to take risks and make mistakes in the classroom without fear of a leader punishing them for trying something new, even if it failed.
Teacher Two supposed that the strong relationship between teachers and parents in the district might in part be due to the small size of the district and the town. A close connection between families in the community and the teachers allowed teachers to know the students as individuals and to build better relationships with them. He argued that this meant the students and parents trust and respect the teachers. Teacher Two went on to suggest that the ASD was in a very stable community, where not a lot of families move in or out in any given year. That stability, he said, lends itself to building long-term bonds between generations of families and teachers. There is a certain amount of trust, he added, when the parents of a child in his class had also had him as a teacher when they themselves were children.

The research suggests that teachers in low-attrition districts will have a strong interpersonal connection to the other teachers in the school, the school leadership, and to the community at large (Boyd et al., 2011; Deci et al., 2017; Droogenbroeck et al., 2014; Hughes, 2012). All of these were found to be true for the teachers in the study, and the data can thus be said to support these predictions.

**Environmental Support for Basic Psychological Needs**

The BPNSWS survey (Deci et al., 2001; Ilardi et al., 1993; Kasser et al., 1992) was adapted for use in semi-structured interviews. This entailed reducing the total number of questions from 21 to 12. The 12 questions that were used included four related to each of the three core needs described by BPNT - Autonomy, Competence, and Relatedness. Within each set of four prompts, two were chosen which were positive, meaning agreeing with them would indicate support for the element, and two were negative, meaning agreeing with them would indicate a thwarting of the need (Cordeiro et al., 2016; Rocchi, Pelletier, & Desmarais, 2017).
The survey’s original unforced 5-point Likert scale was retained. Answers including Strongly Agree (SA), Agree (A), No Opinion (NO), Disagree (D), and Strongly Disagree (SD) were first recorded. The participant was then asked why they had answered in the way that they did, and a short semi-structured interview was conducted. A complete tally of the teachers’ chosen answers to the prompts is below:

<table>
<thead>
<tr>
<th>Polarity</th>
<th>Basic Need</th>
<th>Prompt #</th>
<th>Teacher Number</th>
</tr>
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<tr>
<td>Positive</td>
<td>Autonomy</td>
<td>1</td>
<td>SA SA SA SA SA SA SA</td>
</tr>
<tr>
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<td>Autonomy</td>
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</tr>
<tr>
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<td>Competence</td>
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</tr>
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<td>Competence</td>
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</tr>
<tr>
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<td>Relatedness</td>
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<td>Relatedness</td>
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</tr>
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<td>Autonomy</td>
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<td>SA A A A SA SA A</td>
</tr>
<tr>
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</tr>
<tr>
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<tr>
<td>Negative</td>
<td>Relatedness</td>
<td>12</td>
<td>SD A SD D A SD D</td>
</tr>
</tbody>
</table>

The teachers’ beliefs regarding the amount of support they felt for each of the three core elements of BPNSWS - Autonomy, Competence, and Relatedness - are each discussed in detail below.

**Autonomy**

Autonomy is defined in the literature on SDT as the perception of an internal locus of control – an ability to make one’s own decisions and choose one’s own actions and the belief that one’s actions have a direct influence on the outcome of tasks (DeCharms, 1968; Deci & Ryan, 1985, 1987). It does not refer, in this context, to working alone or in a disconnected manor.
from others, meaning one can have a sense of Autonomy without being entirely on one’s own. A sense of Autonomy can thus exist where there are standards, expectation, and guidance, but there must be a sense that one has the freedom to achieve those standards and goals by whatever means one chooses (DeCharms, 1968; Deci & Ryan, 1985, 1987). It is a sense that even if given the ‘what’, one can still make meaningful decision about the ‘how’. Teachers who feel a strongly supported sense of Autonomy might be given standards to meet but would be allowed to meet them in whatever way they saw fit.

Overall, the teachers in the study described a solid sense of Autonomy. Teacher Two confirmed this by saying “I get to make my own curriculum . . . it gives me motivation, and purpose . . . and that keeps me here.” Teacher Seven noted that teachers in the district have plentiful chances to try whatever they can to “see what works” and that this was one of the reasons he stayed in the district. He described being able to introduce new materials, new teaching methods, or even an entirely new curriculum as long as he met the learning goals by the end of the semester. This was very different than what he had experienced teaching on other districts and was a strong draw for him to come to and remain in the ASD. He also mentioned leadership. He argued that while other districts may or may not claim to value teachers, the ASD’s leadership created an environment which fosters a sense of teacher independence and buy-in by eliciting teacher opinions and then actually taking observable actions based on that input. This is consistent with Deci and Ryan’s (1995) definition of a work environment supportive of Autonomy, as well as White’s (1959) use of the term Effectance, on which Deci and Ryan partially based their definition of Autonomy. This is also consistent with Ingersoll’s
findings that environments unsupportive of teacher Autonomy are a major cause of teacher attrition (Ingersoll & Smith, 2003).

Several teachers expressed appreciation for the autonomy they had. However, Teacher Six warned that while teachers in the district still have a great deal of autonomy, it was steadily being eroded by state and federal standards and requirements. She described these requirements as forces external to the classroom telling her “You now have no more money, but you need to teach this . . . You now have no more time, but you also have to teach this.” This increase in requirements without any accompanying increase in time or resources was deeply demoralizing to teachers and is consistent with Deci and Ryan’s (1991) description of a thwarting of Autonomy by disjoining worker actions and results through setting impossible tasks and making any effort to achieve them moot.

According to Teacher Four, this external encroachment on autonomy was ameliorated by school leadership, who she said had struck a good balance between giving teachers freedom and giving them guidance of what end products were expected by the community, district, state, and federal regulators. She added that she would not want to try to teach and develop curricula with no guidelines of what was expected. She worded it as:

I feel like there is a balance here in this district between having freedom to instruct how you want to instruct and . . . you know what the community wants, you know how the community wants the school run . . . in other places you might just have them telling you what to do and no freedom, or just freedom and nobody telling you what they want . . . there’s a balance.
All of the teachers had worked in other school districts, and several had worked in non-teaching fields. Open reflection of the other schools they had worked in, the amount of Autonomy in the ASD was regarded as rare by the teachers. None of the teachers preferred the other districts. Teacher Three, for example, described a much larger district she had worked at in which teachers were given excessively specific classroom direction, including what page of what textbook to cover on what day. She described this as having no control or leeway to differentiate or adapt instruction to each students’ needs. She contrasted this with the ASD where she felt empowered to choose each day what she thought her students were ready, willing, and able to learn on that day. Teacher Five had a similar comparison, and also described teaching in another district and being constantly micromanaged. This feeling is strongly inconsistent with the establishment of the perceived internal locus of control (DeCharms, 1968; Deci et al., 1996) and is an example of a controlling work environment (Deci & Ryan, 1991). That environment forced Teacher Five to abandon what she believed to be good teaching principles in favor of simple adherence to this excessive regulation. She described her feelings as a teacher there as “Oh god, triple check everything but don’t worry about being a good teacher . . . just stay out of trouble.” This was, as could be expected, demotivating to her because it robbed her of the sense of Autonomy described by Ingersoll and Smith (Ingersoll & Smith, 2003). She took pains to be clear that she felt none of this thwarting at the ASD, which was one of the reasons she had chosen to stay there.

While none of the teachers described thwarting of Autonomy in the ASD, there were some issues raised. One issue in the district was described by Teacher Six, who noted that school leadership sometimes seemed too eager to help:
I was discussing with a colleague. We were just kind of, I felt like, having a casual conversation and just processing a change that was going to be happening. And I had an administrator come to me and say, ‘Hey, are you concerned about X, Y, and Z?’ And I said, ‘No, not particularly.’ And they kept pushing it. And finally they said, ‘Well, I know you talked to such and such about this.’ And I said to them, ‘Yeah, but I was just thinking through . . . I'm not worried about this. We were discussing different things and different ramifications that would happen. If I was worried about it then I would have come and talked to you. I'm not gonna come talk to you about everything I'm worried about or processing.’

It seems that while these unnecessary offers of assistance might be a result of leadership’s strong sense of Relatedness they could actually be unintentionally hindering the teachers’ sense of Autonomy (Deci et al., 1996).

**Support for Autonomy.** The teachers’ sense of working in an environment which was supportive of Autonomy was examined with two prompts. Their replies to each of these prompts is discussed in detail below.

**Control over the classroom.** The teachers’ sense of being supported in their Autonomy in their work setting was assessed with two prompts in the interview. The first was prompt one, which was “I feel like I can make a lot of inputs to deciding how my job gets done.” All teachers strongly agreed with this prompt. The most common sentiment was that the teaching staff was given almost total freedom in how they wanted to achieve the standards and expectations set by the community, leadership, and those outside the district such as state and federal regulators. Teacher Five’s comment that “I think they trust that we’re good teachers and they let us go”
summed up many of the teachers’ comments. Teacher One went on to explain that the overall curriculum, course syllabi, and classroom plans and materials were all teacher developed and went on to describe that this gave her a real sense of Autonomy, or as she described it, “freedom”. Interestingly, Teacher Four also used the word “freedom” to describe how teachers were allowed to make choices in their classrooms. Additionally, Teacher Three also used the word “freedom”:

    Yeah. I have national standards, state standards that I have to address, but no one tells me how to address them. They might give suggestions, but they don't tell you how . . . I think I have the control to do it however I think is best, and it seems to be working well. So I enjoy my freedom.

Teacher One went further, suggesting that with regard to how classrooms were run, the teachers were “the creators of the district” and that leadership strongly supported teachers in this. This was echoed by Teacher Two, who was thankful to have an administrator he felt not only listened to him, but also reacted to what he said. This sentiment was described by Teacher Seven as having administrators who allowed teachers to take risks and make mistakes in the classroom without fear of a leader punishing them for trying something new, even if it failed. Praise for district leadership was in fact common among the teachers. Teacher Four summed her opinion of the superintendent as “There is probably a richer statement I could make, but she just rocks.” Teacher Three seemed to agree, and referred to the superintendent as a “superhuman goddess”. In that a strong positive relationship between teachers and leadership has been shown to correlate with teacher retention (Boyd et al., 2011), this comment is fully consistent with the low attrition rates in the district.
Teacher Two believed that a large part of the reason that teachers were given so much autonomy was that the community supported and trusted them. This is consistent with Deci & Ryan’s (1996) description of a well-supported sense of autonomy. Teacher Two also described the small size of the community as being conducive to good relationships between teachers and parents, describing parent support as “tremendous”. He described a life in which he might see one of his students’ parents in the grocery store, or at the post office, and take a moment to say something (always) positive about the student. This was a way to establish his gravitas as a professional teacher and to establish a trusting relationship with the parents. That, in turn, allowed the parents to trust him to teach well and to respect his opinions. Prompt one, then, showed that the teachers felt a strongly supported sense of autonomy, in the form of control over classroom decisions and a sense of being respected and trusted to make these decisions.

**Self-expression.** The next prompt to assess a sense of autonomy was prompt eight, which was “I am free to express my ideas and opinions on the job.” This was one of the prompts with a wide range of answers. Two teachers answered that they strongly agreed, two agreed, two had no opinion, and one disagreed. If this prompt had been given only as a survey, it is unlikely much could have been gleaned from this. However, upon discussion of the prompt after each teacher had answered it, it became clear that every one of them had understood the word ‘opinions’ differently. Those who expressed no opinion about, or disagreed with, the prompt were including non-school opinions, such as religion, politics, or football in their consideration. With one exception, those who had agreed with it were considering only pedagogic or professional opinions. This might be a weakness of this survey question as it was originally used.
Among those who described being uncomfortable sharing non-work opinions was Teacher Four, who interestingly noted that part of her hesitance was because she considered herself to be too new to the district to share such opinions without being overruled by the teachers who had decades more experience in the district. Counterbalancing this was Teacher One, who described her reluctance to share pedagogic opinions or make school-affecting decisions because she was near retirement as “I hesitate to always give my opinion because of my longevity and I know that within two years’ time, I’m going to be out of there.” Teacher Three also mentioned not being able to give opinions in her classroom and noted that she taught science, and that opinions were not taught in science - only established facts.

Across several answers there was an undercurrent of teachers knowing what the group believed about teaching and learning, and not wanting to contradict that. Teacher Five noted that expressing opinions that ran counter to the group’s beliefs would sometimes cause upset and disharmony among the teachers – and thus she didn’t do so very often. This was similar to Teacher Seven’s comment that he kept some suggestions about changes that could be made to himself “mostly because I don’t think they’ll happen.” This, perhaps, shows a disadvantage to having the teachers share so much with each other and form such a tight-knit community of practice. It might be suppressing minority options, especially among new or near-retirement teachers. This sense of hesitation in sharing opinions would be consistent with an atmosphere thwarting of Autonomy.

While prompt eight was meant to assess the comfort that the teachers felt in sharing opinions as it relates to a sense of Autonomy, these teachers seemed to consider interpersonal relationships and Relatedness more in their answers. Nevertheless, all but one teacher described
feeling supported and autonomous enough to share work-related opinions, meaning that the group overall felt well supported in this aspect of Autonomy.

SDT predicts that teachers in low-attrition districts will feel that the environments in which they work support their sense of Autonomy. Overall, the interviews following prompts one and eight demonstrated that the teachers felt that their autonomy was strongly supported in ASD. They felt near total control over what happened in the classroom, and that they were free to find, share, and test new ideas as they saw fit. These results support SDT’s predictions.

**Thwarting of Autonomy.** The teachers’ sense of working in an environment which was thwarting of Autonomy, or “controlling” (Deci & Ryan, 1987), was examined with two prompts. Their replies to each of these prompts is discussed in detail below.

**External regulation.** The first prompt testing for the suppression of a sense of Autonomy category was prompt five, which was “I feel pressured at work.” All teachers agreed or strongly agreed with this prompt, which would normally indicate strong thwarting of Autonomy. However, the interviews provided insight into how the teachers had understood the word ‘pressured’. Teachers One, Two, Three, and Seven each noted that they felt a great deal of pressure, but that it was almost all self-imposed. Whereas Teachers Four, Five, and Six all said they felt little pressure from leadership and had not considered self-imposed pressure in their answer. They all did express feeling some pressure to be good at teaching, or to at least be as good at their colleagues, who they saw as highly skilled. This difference in understanding of the question would seem to be a flaw in the use of this prompt as a survey question without follow-up interviews, as a simple tabulation of survey answers would have given the opposite result.
Some teachers, though, did mention externally imposed pressures. The teachers mentioned a sense that the district had spent a lot of money on technology and thus expected teachers to use it and use it well. Teacher One explained that this pressure to use the technology wasn’t put on teachers for no reason; that it was more about leadership wanting teachers to either use the technology or not, and in the latter case the money would be reallocated to something else. Thus, this pressure was perceived as having been born of leadership’s desire to allocate funds effectively, not a desire to control teachers’ actions. Teacher Six also felt pressure around technology usage, but said it was more about there being so much technology available that there was no way to use it all. She asked, “There is so much [technology] there, how do you know when to go home at night?” While she described this as a technology-related pressure, it seems that it is also related to a desire to teach in the best way possible, and not to miss out on any tool that would improve one’s teaching. Teacher Three also mentioned pressure from this large amount of work to do and large number of decisions she needed to make:

I think we have more and more put on our plates . . . When a teacher retires, we haven't always replaced them . . . It's right, but over the years, it adds up to teachers having more to do. And the state requirements, and the state mandates, and the state training, and curriculums that you have to write, [chuckle] and paperwork you have to fill out, and meetings you have to go to . . . Yeah, it's just getting it done.

Thus, while this pressure surely exists, it seems to be more related to a fully developed sense of Competence, and a desire to maintain that Competence, than to a weak sense of Autonomy.

An intense pressure to teach well, be it self-imposed or peer-imposed, was mentioned by several teachers. Teacher Two described feeling like he had to teach at least as well as his
colleagues, and that he would retire when he no longer could. Teacher Four described the teaching community as one in which “You come early, you stay late. Your display in the hallway is perfect and changed frequently . . . We do the best we possibly can.” Her use of the word “we” here illustrated that she had fully internalized her identity as a member of the community and fully integrated the expectations of the members of this community. Teacher Four described joining the district as a new teacher and being told how hard everyone worked to ensure good teaching, and how a similar amount of effort was expected from all new teachers, that “This is what we do.” At the time, she noted, she felt this was externally imposed and felt a sense of being forced to do things. At the time of the interview, though, she felt that these expectations were completely valid and normal – showing how fully she had integrated them into her identity.

This pattern of initially externally imposed standards becoming internalized over time is described in Organismic Integration Theory (OIT; Deci & Ryan, 1991; Rigby et al., 1992). In this case, it seems that the teachers who join the district are at first told how the group expects them to behave and over time internalize those requirements and integrate them into their own idea of what good teaching is and how good teachers should behave (Deci & Ryan, 1991; Rigby et al., 1992).

Teacher Two had a slightly different take on this pressure to teach well; describing being deeply impressed by what some coworkers were doing in the classroom and feeling a need to copy some of the most effective techniques so as not to fall behind. The teaching staff of the ASD were involved in what might be described as a ‘pedagogic arms race’ in which teachers in the district felt a pressure to constantly improve their own practice so as not to be outdone by their colleagues. Teacher Two described it as “I wanna be like that one, do what he’s doing. I
like that. Or I wanna do what she’s doing, that’s great.” The pressures described by teachers, then, were almost all self-imposed or imposed by identification as a member of the teaching group. Little to no pressure from outside the classroom to do certain things inside the classroom was described, which is consistent with teachers who have fully developed their identity as a member of the teaching community at the ASD and fully integrated the beliefs and expectations made of the members of this group (Deci & Ryan, 1991; Rigby et al., 1992).

**Compliance.** The next prompt testing for the suppression of a sense of Autonomy was prompt 10, which was “When I am at work, I have to do what I am told.” This was another prompt that if assessed purely by score would give a very different image than reality. One teacher strongly disagreed with the prompt – which would reflect as strongly supported sense of Autonomy. All the others agreed or strongly agreed with this prompt. In the survey as it was originally designed to be scored, this would indicate that the teachers almost all felt demotivated about this aspect of Autonomy.

In reality, all of the teachers had drawn a line between being told what to do and being told how to do it. Most teachers agreed with the statement either out of a general sense that an employee should do what the boss asks or by considering things like bell schedules, classroom locations, and legal requirements as doing what one is told. There was also a sense that teachers should do what the community wanted, and most of the teachers counted that as doing what they are told. Teacher Two, for example, strongly agreed with the prompt and listed the things he was being told to do as including bell schedules, sick leave policies, assigned parking spaces, and teaching in a way which met the demands of the community and needs of the students. But when asked about whether these externally imposed requirements included any aspects of classroom
practice, he quickly said they did not. Teacher Four also agreed with the prompt, and when asked if the things she was being told to do included being on a certain page on a certain day, she replied:

No, no. That’s what we have going for us here. And that, I would argue, is the cornerstone of why you want to be in a place like this. ‘Cause you have the freedom to be on whichever page, doing whatever you want . . . You have a lot of power as a teacher here because you are seen as a professional and the principal will say ‘Well, how you wanna do it?’ and ‘Would you mind if we try this?’ Very much our profession is honored by the administration, I feel.

Teacher Seven took the prompt as describing pressure to teach in a certain way coming from leadership and strongly disagreed. He said the teachers were never told to do specific things in the classroom because they all knew what needed to be done and how do it. Teacher Five similarly commented that she saw her job as “to teach these kids the best way possible” and added that she didn’t “need somebody to tell [her] to do that.” She further summarized this idea by adding “I don’t feel like I need to be told to do my job.”

Some teachers did list some external pressures. While Teacher Six was sure to draw the line between being told to do something, which was common, and being told how to do something, which was unheard-of, she did mention pressure external to the classroom in the form of state of Alaska standards or federal requirements. This, she described, was a worsening problem; stating that she felt the introduction of state-wide teaching standards had caused a lot of these externally imposed tasks. She was careful to clarify her belief that the school leadership had done a “good” job shielding teachers from the worst of it. Teacher Seven stated almost
exactly the same thing, describing Alaska’s introduction of state-wide teaching standards as having a lot of “unrealistic requirements” for teachers, but that the district had met with the teachers to see which requirements could be met immediately and what resources the teachers would need to meet the rest of the requirements “eventually.”

Other teachers described being told to do things by other members of the teaching community itself. Teacher Four described “getting in trouble” by unknowingly breaking a social convention about which area of the playground kids were to be taken to for certain activities. This, Teacher Four noted, “wasn’t in the handbook” but was instead knowledge the group handed down to each new generation of teachers. She added that she had since learned these rules and felt no objection to them, perhaps indicating that she had fully integrated them. Teacher One said most of the pressure and rules of teaching in the district were teacher-driven. This implies that she had accepted, internalized, and in fact felt ownership over these rules and norms.

SDT predicts that teachers in a low-attrition district will likely not feel that there is much external control over their actions in the classroom. The interviews following prompts five and ten showed this to be the case in the ASD. These teachers felt very little, or even no, external control over their classroom actions. While state standards were demotivating to the teachers in the ASD, they felt that school leadership had done well in shielding them from the worst of the effect. They also felt a pressure to teach well, but that pressure was generally self-imposed. These results are consistent with SDT’s predictions.

Summary. Deci and Ryan have used the term Autonomy for decades, first citing the term Self-Determination as used by DeCharms (1968) a definition (Deci & Ryan, 1987). This illustrates the central notion of Autonomy in SDT. As such, in any population of teachers with a
very low attrition rate, one would expect to find a strongly supported sense of Autonomy. This supposition was confirmed by the data. The teachers all expressed a very strong sense of Autonomy and reported minimal imposed external regulation. This finding is also consistent with Ingersoll’s findings that teachers who leave the classroom often cite controlling environments that are not supportive of teacher Autonomy as a contributing factor, and the assumption that the teachers who stay would feel the opposite (Ingersoll, 2001, 2007).

Competence

A sense of Competence is often defined in the literature as a sense of being good enough at something to contribute to the completion of tasks (Baard et al., 2004; Boyd et al., 2011; Deci & Ryan, 1987, 2000a; Rigby et al., 1992). However, as Deci and Ryan (1996) write, if a task is too simple it can be boring, which can also lower one’s intrinsic motivation to perform it. Optimal support for intrinsic motivation is thus provided when tasks are somewhat challenging, but accomplishable (Deci & Ryan, 1987; Deci et al., 1996; White, 1959).

On the whole, teachers expressed a sense of Competence. None of them said they had felt this at the beginning of their careers, and all said that it was supported by elements of the ASD. These included leadership and a teaching community that was quick to recognize teacher achievement, a community which respected and honored the art of teaching, and students who demand good teaching and who generally seemed happy with the teaching they received. This is consistent with Deci & Ryan’s (1992) description of a well-supported sense of Competence.

One vital aspect of Competence mentioned by several teachers was the ability to learn from other teachers. Teacher Two shared a key moment in his own professional development. He described starting his career being very strict with students attempting to turn in late work, giving
them no credit for assignments even hours late. This changed when another teacher commented to him that while his policy was certainly teaching responsibility, she wondered if it was actually teaching the students the subject matter. He described this as a major moment of change in his outlook on teaching and credited it to this one observation from a colleague. Given how strongly teacher to teacher learning was supported by the district and school site leadership, and it is unclear if this change in teaching perspective would have happened if that were not the case.

**Support for Competence.** The teachers’ sense of working in an environment which was supportive of a sense of Competence was examined with two prompts. Their replies to each of these prompts are discussed in detail below.

**Praise.** The teachers’ sense of Competence in their work was assessed with two prompts. The first was prompt four, which was “People at work tell me I am good at what I do.” The teachers all agreed or strongly agreed with this prompt. However, some agreed in different ways. Teacher Four’s answer was typical. She noted that she received “comments about having me around and appreciative comments about how I work with kids from other teachers.” This would seem to be the type of positive feedback the survey was intending; however, some teachers understood the prompt differently. Teacher Five explained that she did not receive any overt feedback from other teachers or leadership, but that having been invited to present her ideas to other teachers was a form of reinforcement that felt affirming. Teacher Six confessed that she had received positive feedback early in her career, but after a while her coworkers had learned that she was not naturally comfortable receiving compliments. To avoid embarrassing her, they had more or less stopped complimenting her and instead showed support by asking her to show
them how she had accomplished things in her classroom. She added “I don’t like to talk about my successes as much as figure out how to improve upon them.”

This prompt also spurred discussion of the current annual teacher evaluation and feedback system. Common among the answers from all teachers was the idea that it provided little useful feedback, and for that reason it was not valued by teachers. Teacher Seven even described it as not “serving any purpose for teaching kids,” which meant the teachers did not “put much stock in it.” Teacher Six’s sentiment was similar when she noted that the annual reviews were “a little discouraging” because they took so much time and were of so little value to the teachers themselves. These evaluations might, then, be described as external regulation that has not yet been integrated by the teachers. This might, in turn, be described as a threat to the teachers’ sense of Autonomy.

**Learning opportunities.** The next prompt to evaluate a sense of Competence was prompt nine, which was “I have been able to learn interesting new skills on my job.” All of the teachers strongly agreed with this prompt. Teacher Two’s reply was typical, “I think that’s one of the strengths here. They are strong in supporting education . . . . The teacher training is huge.” Teacher Six described the ASD as a “growth place” where she could learn and grow “emotionally, educationally, spiritually, and intellectually.”

Most of the teachers mentioned technology training as being a large part of what they had been learning on the job recently. This could be because the core classroom teaching and pedagogical skills new teachers need to learn had all been learned earlier in their careers. This technology training included weekly Friday afternoon Professional Development (PD) sessions, sometimes run by and for teachers but normally run by school site leadership. Teacher Two gave
the example of a teacher leaning a new instructional technology tool and sharing it with her colleagues. The amount and quality of opportunities to grow as a teacher were greatly valued by all teachers. Teacher Five called it “so awesome” to have the power to see a tool and ask school leadership about it, to have that request be honored, and to have training provided as needed. She described leadership’s attitude regarding providing this on-call training as “If you want to learn this, let me know,” which illustrated both her sense of Competence and of having enough Autonomy to direct her own professional development.

Professional growth opportunities were not limited to these weekly PD sessions though. Most teachers mentioned that they felt able to, and supported to, attend conferences and off-site trainings. Teacher Two noted that he has been given paid days off to attend state-wide trainings, and that he felt the district supported him well in doing this. Teacher Four expanded this by adding that the district also provided books and software that the teachers felt would help them improve their teaching.

SDT predicts that teachers in low-attrition districts will likely feel well supported in their sense of personal Competence. The interviews related to prompts four and nine showed yielded responses which were consistent this type of environment. The teachers in the ASD felt strongly competent in the classroom, though many mentioned that this had not been the case when they taught in other districts or when they were new teachers. The data support SDT’s predictions.

Thwarting of Competence. The teachers’ sense of working in an environment which was thwarting of a sense of Competence was examined with two prompts. Their replies to each of these prompts is discussed in detail below.
Feeling incompetent. The first prompt testing for the suppression of a sense of Competence was prompt three, which was “I do not feel competent when I am at work.” All teachers disagreed or strongly disagreed with this prompt. Teacher Four described the basis of her Competence as being the fact that she clearly understood what was expected of her, in the same way she believed her students understood what was expected of them. She went on to explain that this clarity of expectations served to support the teachers’ comfort in sharing what they did in the classroom with each other. She noted that “When you are more confident about what you’re doing, you understand your job, then it’s easier to share what you’re doing with others.” This, in turn, meant that the teachers could all see what had worked in other classrooms and use that to improve their own practice. All this exchange resulted in a feeling among the teachers that they were able to put to use the best practices any of them had found and made the entire teaching team feel and be more competent.

One of the core ideas most teachers expressed was that they felt competent because leadership did not seem to be primarily interested in finding fault in their teaching. Teacher One described it as “No one’s going to come in and criticize me no matter what. I can fail for the day or whatever and it’s acceptable because it’s part of learning.” Several teachers described working in other districts where leadership was in the business of finding fault in all teachers. Teacher Five explained the struggle she had gone through with a previous district outside Alaska:

I’ve worked for places where [the principal] would come in and check your planner . . . and you better have that standard posted on the board and it better match. And then, at the end of the month, we had to [write out] ‘On November 12th, I taught this standard’, and they would check it off, and you had to teacher every single standard by a certain date . . .
you had to submit at the beginning of every month ‘I will teach this standard on Tuesday and I will teach this standard on the following Wednesday’. It was so micro-managed and you spent so much time doing that, that you didn’t have time to be creative at all in teaching.

Teacher Five later referred back to this previous district, “That place I told you about where [The principal] would make us micro-manage, like write everything down? She would also do things like get on the intercom if she was upset with you and just berate you in front of the whole class.” This was demotivating to Teacher Five, who added that “If they never say you’re doing anything right, you don’t feel competent . . . and you could quickly become incompetent.” This is clear evidence of Deci and Ryan’s (1991) controlling work environment, which is suppressive of worker Autonomy and a sense of Competence. She added that she felt none of this micromanagement at the ASD, and that this was an important factor in her decision to stay there.

**Lack of recognition.** The second prompt testing for the suppression of a sense of Competence was prompt 11, which was “On my job, I do not get much of a chance to show how capable I am.” All teachers disagreed or strongly disagreed with this prompt. Teacher One said that the teaching community actively sought out, acknowledges, and praises teachers who took on extra duties, accomplished great things, or who had good ideas. “We’re clappers” she said, meaning public rounds of applause and praise were common. Teacher Two also believed that the community was one where everyone was free to try new things and demonstrate any skills they had. In the community, he added, one “. . .can be a city councilman . . . you can run for any office here . . . you can jump in and do as much as you want to do.” This, he said, was the same
in the district resulting in abundant chances for teachers to try new things and demonstrate their skills.

Another chance to demonstrate and receive recognition for Competence that teachers mentioned was observing or being observed by other teachers. Teacher Six explained that her school leadership encouraged teachers to visit each other’s classes, and even offered to cover their classroom if they wanted to do so. However, she added, this was rarely done. Teacher Four also noted that coworker observations were encouraged, but that they took extra time in planning for the substitute. She suggested that having teachers record parts of their lessons that they thought others might want to see, and making those recordings available to all teachers, might be a good way to ameliorate the problem.

Responding to the idea of school leadership observing his class to assess him, Teacher Two remarked that “Every day you have got an audience that expects you to be capable: and it’s not the administration, it’s the kids. They expect you to do your job.”

SDT predicts that teachers in low-attrition districts are unlikely to feel that their professional competence is being thwarted by their work environment. The results from prompts three and 11 made it clear that all of the teachers interviewed had experienced controlling environments outside of the ASD and that they had chosen to move to and stay at the ASD in part because they felt it had an environment supportive of teachers’ sense of competence. These results are thus consistent with SDT’s predictions.

**Summary.** A sense of being competent enough to accomplish the tasks one undertakes is a core element of SDT. SDT proposes that a population of teachers with low attrition is likely to experience a strongly supported sense of Competence at work. This was confirmed by the data,
as all of the teachers expressed this belief. They based this on praise and feedback from other teachers and leadership, both explicit and indirect. Also mentioned was being given the opportunity to share what they knew with others. It was clear that while the teachers appreciated being given the chance to learn new things, and that this supported their sense of Competence, it was the honor of being asked to teach colleagues that truly cemented their sense of Competence. While they reported minimal thwarting of Competence, all mentioned that they had felt incompetent when they were novice teachers, or when they had taught at other districts which were not supportive of teachers.

**Relatedness**

The sense of Relatedness is described in the literature as a sense that one belongs to a community or something larger than oneself. It also encompasses a sense of being on a team one does not want to let down or a sense of belonging to a group which is expected to behave in certain ways (Deci & Ryan, 1987; Harlow, 1958).

All of the teachers described having a strong professional connection to the other teachers, and some also described out-of-school social bonds with those teachers. All teachers described good relationships with the leadership. Teacher One went so far as to refer to the other teachers as family, while Teacher Two noted that the strong family-like bonds existed among all the teachers who had been in the district a long time, but remarked that some newer teachers probably still struggled to build these strong relationships. All teachers reported strong positive relationships between the school and the community at large. Teacher Five described the community as “Like in the 80’s, back in the 80’s how the parents were. Where they held the kids accountable and didn’t blame you for everything. That’s what I’ve encountered here.” This
demonstrated her belief that the parents in the community trusted teachers and did not blame them for things beyond their control. Teacher Two supposed that the strong relationship between teachers and parents in the district might in part be due to the small size of the district and the town. This, he added, allows teachers to know the students as individuals and to build better relationships with them. He gave an example, “Well, you go to a bigger school, you don't know anybody. If we go to Anchorage, they've got 30,000 kids. You don't even know the kids. How do you know their background? How do you know where they're coming from so you at least have some empathy for how kid A's sleeping in school besides yelling at him and making him stand up? At least you could have some empathy for him. If you know, he's got no... He's couch surfing, kind of thing.” This understanding of each student’s context, he argued, means the students and parents trust and respect the teachers. Teacher Two went on to suggest that the ASD was in a very stable community, where not a lot of families move in or out in any given year. That stability, he said, lends itself to building long-term bonds between generations of families and teachers. There is a certain amount of trust, he added, the parents he is working with were former students of his.

**Support for Relatedness.** The teachers’ sense of working in an environment which was supportive of a sense of Relatedness to other teachers, students, and the community at large was examined with two prompts. Their replies to each of these prompts is discussed in detail below.

**Interpersonal bonding.** The first prompt to assess the support for Relatedness in the environment was prompt two, which was “I really like the people I work with.” All teachers agreed or strongly agreed with this prompt. Teacher One set the tone by stating “… I came here and stayed here because of the people who are here.” She went on to explain that her spouse had
once wanted to move away, but she had refused because the ASD was a “healthy environment for me to be in” and that she could not leave it. She added that the community was very supportive of the school, and that interactions with parents were much easier and less stressful than in other districts in which she had worked.

When asked, all teachers said that they liked the other teachers, the staff, the leadership, and the parents. Teacher Two described a complete lack of “back-stabbing” among the teachers, which had been an issue in other districts in which he had taught. Teacher Five went on to describe a previous district she had worked in as having a “clique-ness” among the teachers where there existed an “us and them” attitude with regards to non-teaching staff and leadership. This, she noted, was absent at the ASD.

However, teachers for the most part drew a line between professional and social relationships. Teacher Four pointed out that she had great professional relationships with everyone in the school, but that she did not spend much time with colleagues outside of school. She supposed that this was true for several teachers. One common idea among several teachers’ replies was that some of the town was very religious and some was very much not. There seemed to exist in the district a truce in which this topic was not brought up. This truce seemed to improve relationships, but did solidify two distinct social groups - the theistic and atheistic. It was unclear if the locals who were agnostic were in one of these groups or if they felt separate from both.

**Group integration.** The next prompt to search for support of a sense of Relatedness was prompt six, which was “I get along with the people at work.” All teachers agreed or strongly agreed with this prompt. Teacher One summed it up by saying “I stay here because this group is
like my family. They really are . . . I’ve grown up and lived in this group.” Teacher Four described her relationships with the other teachers as being “open enough . . . that you can talk about something that isn’t going well” when prompted, she clarified that this meant something inside or outside the classroom.

This sentiment was not universal, however. Teacher Five described some teachers as not having these strong bonds with the other teachers and posited that part of this might be that some of those teachers were newer, and had not grown up in the town. She added that “A lot of these people have been here their whole lives. So they have their established friends.” She then explained that given enough time, it was likely that these newcomers would also fully integrate and build strong bonds with colleagues. Teacher Seven also noted this difficulty, stating that “When you’re new, especially if you’re not from here or you don’t have any connection here, it’s hard to come in . . . people are friendly, but you have to be here a while.” This extended period of time required to fully join the social group of teachers in the ASD might be dampening new teachers’ sense of Relatedness.

SDT predicts that teachers in a low-attrition district would be likely to feel a strong sense of Relatedness to each other, to the leadership of the schools, and to the community at large. Prompts two and six produced data that indicated that these teachers did feel this strong sense of connection to these groups. While these bonds were not as strong for some as for others, none of the teachers described having no relationship or a poor relationship with their colleagues, leadership, or the community. This is consistent with and supports the prediction made by SDT.
 **Thwarting Relatedness.** The teachers’ sense of working in an environment which was thwarting of a sense of Relatedness to other teachers, students, and the community at large was examined with two prompts. Their replies to each of these prompts are discussed in detail below.

 **Isolation.** The first prompt testing for the suppression of a sense of relation to a sense of Relatedness was prompt seven, which was “I pretty much keep to myself when I am at work.” Two teachers agreed with this prompt and the rest disagreed. Teacher Three disagreed and noted that she spoke to students most of the time, and thus needed adult interaction during the day, which resulted in her seeking out coworkers for conversation whenever possible. This she described as “I need other adults to talk to” and that if she could not speak to adults at work, she would “go to the Taco Bell drive through and have an entire conversation or something.” The other teachers who agreed described a work setting in which they would like to spend more time talking to coworkers but were unable to do so due to time constraints.

Teacher Six explained that if she spent 10 minutes in the break room chatting with a colleague, it meant ten more minutes after school planning the next day’s lessons, and consequently ten fewer minutes with her family before bed. Time pressures caused most of the teachers to avoid some social interaction, no matter how much they enjoyed it. Teacher Six noted that socializing during the day would make completing all of her work on time impossible, so she chose to eat lunch in her classroom to be efficient. Teacher Two had struck a balance by consciously deciding to be social in the mornings, but to dedicate lunch and break times to work. Teacher Seven also struck a balance, but between a natural introversion and a professional need to collaborate and communicate with other teachers. When asked if this included non-work chatting, he stated that there was no time for such. It was clear that this time pressure was
resulting in a diminished ability of the teachers to build teacher-to-teacher relationships and maintain their sense of Relatedness. This may be a contributing factor in the slow relationship building experienced by new teachers.

Separation. The last prompt testing for the suppression of a sense of Relatedness was prompt 12, which was “There are not many people at work that I am close to.” The teachers split on this prompt, seemingly based on how long they have lived in town. Two agreed, two disagreed, and three strongly disagreed. During the interviews it became clear that the word “close” had been understood differently by each teacher. Prompt 12, then, might be another prompt that would have yielded less information in its original quantitative form.

Teacher Six strongly disagreed and explained the depth of her connections as “I went to school in this building with some of these teachers. I go to church with them. I had children in playgroups with them. I am related to some of them.” Teacher Four was careful to point out that she understood some of the teachers were not from the town, and acknowledged that this made relationships with coworkers very different from those who had known each other for all of their lives. She also pointed out that while she was close professionally to the other teachers, and would enjoy going to conferences or other engaging in other professional activities with them, she did not spend much time with any of them outside of a school or professional setting. Teacher Two echoed this, stating that he was just not a very social or outgoing person, meaning he did not socialize with coworkers much, but was clear that he had close professional relationships with many of his colleagues.

SDT predicts that teachers in low-attrition districts would be unlikely to feel that their work environment thwarted their sense of Relatedness to each other, to the leadership, and to the
community. Prompts seven and 12 produced data which was only partially consistent with this prediction. It seemed that while the teachers do, in fact, feel connections to their colleagues, they do not have enough time to truly cement or maintain these bonds to the extent they desire. This inability to collaborate with and observe other teachers has been found to cause reduced teacher effectiveness and professional development over teachers’ careers (Ostovar-Nameghi & Sheikahmadi, 2016; Rothberg, 1986) and is thus seemingly inconsistent with the high quality teaching and low attrition of the ASD.

**Summary.** Relatedness is one of the three basic needs in BPNT and SDT. In these theories, it is given equal importance as Autonomy and Competence, and is even considered the most important element of another SDT sub-theory, OIT. Thus, SDT would predict that teachers in the ASD would feel a strong sense of Relatedness to the other teachers in the district, the school leadership, and the community, and that their sense of Relatedness to others in the district would help them both fully identify as members of the community and to integrate the demands placed on teachers in the district. This was partially confirmed in the data. Teachers in the ASD described strong professional relationships, but many noted that they did not have enough time to collaborate or peer-observe as much as needed. Additionally, most teachers drew a line between professional activities such as lesson planning, collaboration, and attending conferences, and more personal activities such as fishing trips and birthday parties. They did not, generally, spend a lot of time with other teachers and school leadership outside the work setting. They did, however, describe having been able to fully identify as professional teachers and to fully integrate the demands placed on members of the ASD teaching team.

**Synthesis of Results**
This study attempted to uncover why teacher attrition in the ASD was lower than in surrounding similar districts. To this end, it examined both the teacher-specific characteristics that had been found in the literature to correlate with teacher attrition and also administered a modified version of the BPNSWS survey to assess the work environment as experienced by the teachers. The BPNSWS was modified from a quantitative tool with 21 questions and unforced Likert scale answers to a 12-prompt guide for qualitative semi-structures interviews. This modified tool was still used to assess the degree to which the teachers felt a well-supported sense of Autonomy, Competence, and Relatedness.

The teacher-specific information was only partially consistent with what the literature had predicted would exist in a low-attrition environment. The literature predicted that teachers who stay in the classroom would be more likely to have a strong work ethic, would have wanted to be a teacher since childhood, would feel a connection to the community, would collaborate well with others, and would be student-focused. This was all found to be the case in the teaching population at the ASD.

However, the literature also described a U-shaped attrition curve, in which at or near 65 years old would be very likely to have left the classroom. The teaching population at the ASD seemed resistant to this U-shaped curve, in that very few teachers retire - even when they are old enough to do so. According to the superintendent, those who do retire almost all stay on as substitutes and classroom assistants, even in volunteer positions. The fact that so many retired teachers volunteer at the district demonstrates that these retiring teachers are not desperate for an income and thus refusing to leave. The literature also predicted that a low-attrition district would have teachers who had attended teacher training courses which covered both pedagogic
knowledge and practical classroom management skills. This was not confirmed by the data. Several of the teachers had not attended any teacher preparation courses, and one mentioned that hers had not covered anything about classroom management. The literature has also suggested that teachers with master’s degrees leave more often. This would predict that the teachers at the ASD would mostly have bachelor’s degrees. However, four of the seven teachers had master’s degrees, and two more had more than enough graduate credits to have earned one.

This lack of confirmation of the predictions of the data should not be taken to disprove the research however. Most of these predictions are based on large quantitative samples and it is wholly possible that the sample size in this study was simply too small to conform to these predictions.

SDT correctly predicted the teachers’ strong sense of Autonomy, Competence, and Relatedness. Teachers described strong support from colleagues, school leadership, and the community for teacher Autonomy. Most teachers mentioned that when they had worked in other districts, this had not been the case and several teachers explicitly stated that this was the reason they worked in the ASD and “would never leave.” They also described feeling a strong sense of Competence, though several mentioned that they had not felt this when working for other districts or when they were new teachers. Finally, the teachers all described strong sense of Relatedness in the form of strong professional, if not social, relationships with other teachers and school leadership. The only deficits described by the teachers were in the area of Relatedness and Autonomy. Autonomy was threatened by state-wide mandatory standards and testing. Relatedness was threatened by not having enough time in a day to actually collaborate or peer-observe. The data collected in this study were, however, generally consistent with SDT’s
predictions. The data also seem to support the claim that Autonomy, not Relatedness, was the most important factor driving these teachers’ sense of Self-Determination (Boyd et al., 2011; Deci & Ryan, 1987; Trenshaw, Revelo, Earl, & Herman, 2016).

**Reflexivity**

I have grown to understand K-12 teachers more. In my experience they are often overworked and underappreciated, are too often demoralized by a thankless and extremely difficult job, and sometimes regret becoming teachers. In the ASD I saw teachers as they are meant to be: motivated, dedicated, and involved. These teachers still work many hours, but they seem to have internalized these requirements and seem to see them as normal.

I went to the ASD thinking I would be writing a case study about what the district leadership was doing to retain teachers, but the data showed teachers to be the primary drivers of the conditions that have led to the low attrition rate in the district. The leadership was found to be a somewhat ancillary, yet vital, stakeholder group whose primary contribution was the support and protection of teacher autonomy in the classroom. I think I was expecting to find some magic I could use to swoop in and improve the lives of teachers, but what I really found was the power of teachers themselves.

The implications of the study are that teacher Autonomy is very successful in the ASD and that teachers list it as a primary reason that they stay there. It is possible this idea could be considered whenever school leadership is trying to retain teachers. These are discussed in more detail in Chapter Five.
Chapter Five: Implications

This study attempted to uncover why teacher attrition in the ASD was markedly lower than the average for rural Alaskan districts. To this end, it examined both teacher-specific and district-specific characteristics, and administered a modified version of the BPNSWS survey to assess the work environment as experienced by the teachers. This modified BPNSWS tool was used to assess the degree to which the teachers felt a well-supported sense of Autonomy, Competence, and Relatedness. The focus of the study was the teachers who had stayed in the classroom, rather than those who had left. This was done to begin to fill a gap in the literature, which has a strong focus on quantitative research examining the motivations of teachers who leave the classroom.

The teacher-specific and district-specific information was only partially consistent with the quantitative literature. The literature predicted that teachers with low attrition rates would have wanted to be teachers since childhood, would be student-focused, and would have a strong work ethic. This was all found to be the case in the teaching population at the ASD. However, the literature also predicted that teachers with low attrition rates would be mid-career, would have attended teacher training courses with both pedagogical and classroom management instruction, would be more likely to be male, and would teach in a district with low poverty rates. None of these elements were found at the ASD. With a sample size of only seven, it is not surprising that some of the quantitative data-derived predictions did not materialize.

The BPNSWS survey and SDT, on which it was built, correctly predicted the teachers’ strongly supported sense of Autonomy, Competence, and Relatedness. Teachers described strong support for teacher Autonomy from colleagues, school leadership, and the community. Most
teachers mentioned that when they had worked in other districts, this had not been the case and several teachers explicitly stated that this was the reason they worked in the ASD and would never leave. They also described feeling a strong sense of Competence, though several mentioned that they had not felt this when working for other districts or when they were new teachers. Finally, the teachers all described strong sense of Relatedness in the form of strong professional (if not social) relationships with other teachers and school leadership. The data collected in this study are consistent with all of SDT’s predictions. The findings of the study are discussed in more detail below.

**Investigation of Teachers Who Stay**

A great deal of research has been conducted asking teachers who have left the classroom why they have chosen to do so. However, little research has been done with teachers who have chosen to stay. Rather than simply assuming that the teachers who stay do so because they feel the opposite of those who leave, this study directly asked these staying teachers about their motivations. The data show that the teachers who stay are not simply the opposite of those who leave. These teachers, for example, defied the research’s predictions about the longevity of teachers who have not attended formal preparation programs with an emphasis on reflective teaching. The results of this study indicate that more research needs to be done to gather data directly from this population.

**The Importance of Teacher Autonomy**

The research is consistent in finding that one of the largest factors for teachers who leave the classroom is a lack of a sense of Autonomy. This would predict that the teachers in this study would feel a strong sense of Autonomy, as would SDT itself. This was indeed the case, as these
teachers directly stated that they had a great deal of Autonomy and that this was one of the main reasons they chose to remain in the classroom and in the district. While some research has suggested that a sense of Relatedness to others may be more important than a sense of Autonomy, this was not supported by the data.

Support for Self-Determination Theory

Results from many studies were included in the list of elements examined in this study. While some of the predictions of the research were supported by the evidence in this study, some were not. SDT’s sub-theory of Basic Psychological Needs Theory (BPNT) proved to be a very accurate predictor of how these teachers would feel about the amount of support in their work environment for Autonomy, Competence, and Relatedness.

Use of the BPNSWS Survey as a Qualitative Tool

A modified version of the BPNSWS survey was used. The prompts from the survey were used as prompts for semi-structured interviews. Time constraints required the number of prompts to be reduced from 21 to 12. The study demonstrated that the survey can be used in this way, and that this usage might in fact help to improve the data collected, due to some unclear terms in the prompts which might have led to unclear or incorrect conclusions if used in survey form. For example, teachers’ interpretations of ‘pressure’ in prompt five, “I feel pressured at work” varied greatly from teacher to teacher. Some included self-imposed pressure to do one’s best, others did not but did include a desire to be as good as one’s colleagues, and still others considered only pressure from leadership and forces outside the school. Another example was prompt 10, “When I am at work, I have to do what I am told.” Some teachers included rules such as assigned parking spaces and bell schedules when answering and others considered only external pressure
on classroom practice in their answers. In the future, the BPNSWS survey should be adapted more for use in qualitative research, and the data thus gathered could be used to clarify some of these troublesome prompts.

**Further Research**

This was a small case study studying teachers who choose to stay in the classroom using a modified version of the BPNSWS Survey. Further surveys of teachers who stay in the classroom should be performed and will possibly lead to themes in what motivates teachers to stay in the classroom across many different contexts. Follow-up qualitative research could also use a similarly modified version of the BPNSWS survey.

The evidence gathered in this study supports the argument that teachers enjoy and are motivated to stay in the classroom by a sense of well supported Autonomy. State, federal, and school district leadership make use of this finding and train all school leadership to fully support teacher Autonomy. This single step of ensuring teacher autonomy seems likely to be a key in dealing with America’s teacher shortage.

In addition, other low-attrition districts should be sought out and studied to discover if they are also supportive of teacher autonomy. This could further substantiate the findings of this study and allow the creation of a series of best practices school district leaders could put in place at their districts to ensure teacher autonomy and thereby reduce attrition.

**Recommendations for the Alaska School District (ASD)**

This study yielded in-depth data about the teachers, their histories, and their experiences working in the ASD. Dominating the conversations was the theme that these teachers enjoyed and were grateful for the large amount of autonomy they felt in the classroom. This was the
central reason several of the teachers cited for staying in the district. The teachers also felt that this autonomy was steadily being eroded by state-mandated testing, standards, and other rules and regulations external to the district. ASD leadership, then, should continue to make efforts to protect the teachers from these effects and to ameliorate the restrictions of classroom autonomy they cause.

Teachers’ sense of Competence in the classroom was also well supported, but more could be done to support teachers if they want to observe each other. The primary impedance to this was time. Multiple teachers expressed a desire to observe their coworkers but said that they could not because it would require preparing for a substitute teacher, which would take a prohibitive amount of time. The suggestion of video recording parts of teachers’ lessons, and sharing those recordings with the teaching staff, was made and should be adopted.

Teachers’ sense of Relatedness to each other, to the leadership, and to the community was well-supported. However, time pressures hindered their ability to fully bond and form the close connections that are needed to truly support their sense of Self-Determination and intrinsic motivation to teach. Leadership must find a way to give these teachers more time to co-plan, co-teach, and build social and professional relationships with each other.

Finally, the current teacher evaluations were not described as useful or helpful by the teachers. They are considered the evaluations to take a great deal of time and to be of little value. ASD leadership is recommended to work with the teachers to investigate ways to either make these evaluations take less time, make them more valuable to the teachers, or both.

Conclusion
This investigation set out to discover why the teachers at one rural Alaskan school district choose to stay in classroom teaching positions at a much higher rate than in other surrounding districts. It was discovered that the district didn’t pay teachers more than other districts, and that it didn’t spend more per student than the Alaskan average. In fact, it spent less.

Through interviews with the teachers, it was discovered that they felt a very strong sense of autonomy in the classroom, and that this factor was what they cited the most often as why they have stayed in the district for so long. They also expressed a sense of being trusted and valued by school leadership and the community. Finally, they felt a bond to each other.

However, the teachers also expressed a sense that their autonomy in the classroom, while strong now, was being slowly eroded by increasingly prescriptive state and federal mandates and standards. They felt that their school leadership was protecting them from most, but not all, of this influence. They also described an environment in which their social bonds to other teachers were strained by a lack of time due to excessive paperwork.

 Leaders in other districts might learn from this that teachers value their autonomy, and in the case of the ASD are attracted to districts with strong teacher autonomy. These leaders might want to be aware of this as they cope with their own teacher shortage.

This study also began to fill a gap in the literature caused by excessive focus on the study of teachers who leave the classroom and an ignoring of those who stay. The teachers in this study were not simply the opposite of those who leave. Further study should pay attention to this population and study it directly.
References


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Appendix A: Interview Protocol

Interview Questions

(Read to participant)

You have been selected to speak with us today because you have been identified as a teacher in the district who is teaching both in the Spring 2017 and Fall 2017 semesters.

Our research project focuses on the experience of teachers in the district with a particular interest in understanding their reasoning for choosing to work in, and to continue to work in, the classroom. Through this study, we hope to gain some insight into why teachers in this district tend to stay in the classroom longer than in other nearby districts.

So, because your responses are important and I want to make sure to capture everything you say, I would like to audio record our conversation. Do I have your permission to record this interview?

IF PARTICIPANT AGREES:

I will also be taking written notes. I can assure you that all responses will be confidential and only a pseudonym will be used when quoting from the transcripts. The researchers in this study will be the only ones privy to the tapes which will be eventually destroyed after they are transcribed and will be encrypted until then. To meet our human subjects requirements at the
Either way, there is a copy for you to keep.

Essentially, this document states that: all information will be held confidential, and your participation is voluntary and you may stop at any time if you feel uncomfortable, also we do not intend to inflict any harm. Please read it carefully and if you choose to participate in the study, please sign one of the copies and keep the other one.

Do you have any questions about the interview process or how the data will be used before we start?

IF PARTICIPANT AGREES AND SIGNS:

Alright, so we've planned this interview to last no longer than about 90 minutes. During this time, I have several questions that I would like to cover. If time begins to run short, it may be necessary to interrupt you in order to push ahead and complete this line of questioning. Do you have any questions about the flow, or the process that we're using with today?

ANSWER ANY QUESTIONS:

The following questions concern your feelings about your job during the PAST 4 WEEKS. Please indicate how much you agree with each of the following statements given your experiences on this job. Remember that nobody but you and I will ever know how you responded to the questions.
There are six statements, please answer on a scale from one to five, with one being “Strongly Agree” and five being “Strongly Disagree”. You can look at the key if you forget which scores mean what. I will also be asking you about why you answered what you did. If you feel you would like to go back and change an answer after you give it, please let me know, and also why you are doing so.

Finally, please feel free to give me examples or tell me any relevant stories that helped you decide how to answer – but please know that I will be changing any names you give me to pseudonyms to protect the privacy of students, other employees, and members of the community.

(Show key to participant)

Questions

(Read one at a time, asking follow-up and “why” questions for each. If time runs short, do NOT rush the questions)

1. I feel like I can make a lot of inputs to deciding how my job gets done.
2. I really like the people I work with.
3. I do not feel very competent when I am at work.
4. People at work tell me I am good at what I do.
5. I feel pressured at work.
6. I get along with people at work.
7. I pretty much keep to myself when I am at work.

8. I am free to express my ideas and opinions on the job.

9. I have been able to learn interesting new skills on my job.

10. When I am at work, I have to do what I am told.

11. On my job I do not get much of a chance to show how capable I am.

12. There are not many people at work that I am close to.

**Scale (Show to participant)**

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