INSTITUTIONAL NORMS THAT MAINTAIN EARLY EDUCATOR'S CREDENTIALING

REQUIREMENTS IN MASSACHUSETTS, A CASE STUDY.

A thesis presented

by

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Abstract

The purpose of this study was to figure out what were the institutional norms in place that contribute to making educational requirements for early educators lower when compared to their counterparts in elementary and secondary education in Massachusetts and how do these norms keep education lower for early educators. Taking social rule systems theory as a theoretical framework and a Yin case study approach, the researcher interviewed six individuals who work in an educational policy in Massachusetts and read over 80 publicly available documents from the Massachusetts Department of Early Education and Care to determine what the institutional norms are and how they keep early educator requirements lower. The researcher identified five findings. First, that the history of early education departments in Massachusetts play a direct role in early educator education requirements. Second, that early education in Massachusetts has been mainly a care based system and has been, in recent years, transitioning to an education based system. Third, there are less early education college programs than elementary and secondary education college programs in Massachusetts. Fourth, retention of early educators in Massachusetts has been focused on voucher reimbursement rates. Fifth, training and resources towards early educators are focusing on early educators with as little overhead as possible to reach the maximum number of educators.

Keywords: Early Childhood Teachers, Teacher Requirements, Birth to Age Five

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Chapter One: Introduction

Research into early education is wide-ranging with many topics that have been researched for over a hundred years. More recently, within the last fifteen to twenty years, researchers have been looking into the credentialing of early educators. Early educators, as defined as educators working with children from birth to age five, in many states throughout the United States require little more than a high school diploma to work with our youngest children while most states require a Master's degree and professional licensure to work with children in elementary school (Son, Kwon, Jeon, & Hong, 2013).

This case study looks specifically at early educator credentialing in Massachusetts, what the differences are between early educator and elementary educator credentialing, and the attitudes of the people creating the policy in Massachusetts on credentialing early educators. Through the lens of systems theory as a theoretical framework, the goal is to deepen the understanding of the credentialing discrepancy between early educators and their counterparts in elementary education and the attitudes of policymakers on credentialing inconsistencies.

Chapter one begins with a statement of the problem with credentialing in the early education field, and why this is significant within the area of early education. Focusing on Massachusetts, the statement and significance of the problem will work within the context of Massachusetts. We will then examine the central research question and how social rule system theory is used as a theoretical framework for the case study.

Statement of the Problem and Significance

Children aged birth through age five have been entering formal child care settings in increasing rates over the last 20 years, rising by 39% from 1993 to 2002 (Press & Woodrow, 2005). Lam, Klein, Freisthler, and Weiss (2013) estimates, through the US Census, that nearly 7

million, or roughly 35% of American children are in some partial day child care settings with an additional 4.7 million children attending public head start programs. Aside from parents and immediate family members, childcare is the primary place for children to be cared for and to develop (Sosinsky, Lord, & Zigler, 2007).

With the increase in children in child care settings, this has increased the number of teachers working with children. The US Department of Labor (DOL, 2018) estimates that the current number of jobs at over 1,200,000 with a job outlook from 2016-2026 increasing at a rate of 7%. However, with reduced benefits, low wages, and few opportunities to advance within the field, many have become discouraged and choose to avoid the field of early education or leave the field of education for other job opportunities. Untrained and inexperienced personnel have put in the place of these experienced teachers who have left the field (Roseman, 1999). Each state has different requirements to work in child care settings throughout the United States. DOL (2018) notes that the entry into child care is often a high school diploma.

Research has shown that higher teacher qualifications in early childhood education are associated with higher quality classroom environments but also notes that the level of that qualification is less than clear to work effectively with young children (Vu, Hyun-Joo, & Howes, 2008). With no clear answer as to the level of qualifications in early education classrooms, states have had to rely on state legislatures to come up with solutions. Only in recent years has early educators been credentialed in some way, and in some states, not at all. These usually include some college-level classes, often at community colleges, and time working in early education (Vu et al., 2008).

These qualifications are in stark contrast to elementary educators requirements for being credentialed. While each state has its own set of provisions in the United States to become an

elementary school teacher, they are more stringent and require a significant amount more college education than that of early childhood educators, often requiring a Master's degree and taking state-level tests. Karp (2005) notes that early educators as a collective group are less educated and less well prepared for teaching than any other group of teachers in any other form of education. Karp (2005) also notes that early educators may have more influence on children than any other group of educators at any different age.

Context within Massachusetts

Massachusetts's education field is overseen by the Executive Office of Education. Within the Executive Office of Education are several departments that supervise credentialing of educators as well as establish regulations for each form of education. For early education, through small/large group child care and family child care, it is overseen by the Department of Early Education and Care (EEC). For elementary and secondary education, it is managed by the Department of Elementary and Secondary Education (DOESE). While both are under the umbrella of the Executive Office of Education, each has separate mandates and commissioners to fit the students and educators in his or her respective forms of education. Each has widely different requirements for teacher certification/licensure.

  department of early education and care.

EEC was formed in 2005 when the Massachusetts legislature combined the Office for Child Care Services and the Early Learning Services Unit within the Massachusetts Department of Education to create a single department that provides financial assistance for low-income families, parenting support, referral and information services, professional development services for educators, and oversees and licenses all small/large group and family child care programs throughout Massachusetts (Massachusetts Department of Early Education and Care [EEC],

2010). EEC is overseen by the Board of Early Education and Care, which is comprised of 11 members, nine of which are appointed by the Governor of Massachusetts. The other two include the Commissioner of EEC and the Secretary of Health and Human Services. Regulations are approved through the board and implemented through the department. Within these regulations are the requirements for teacher certification to work with children birth through age five.

EEC has several certification levels including Teacher, Lead Teacher, Director I, and Director II. For this study, the researcher will only examine the requirements of Teacher certification. To receive Teacher certification through EEC, one must have a high school diploma, completed a three-credit college course in child growth and development with nine months of full time work experience, and/or have a Child Development Associate (CDA) credential, or successfully graduated from a two year high school vocational program in early education approved by EEC (EEC, 2010). There are two specialties within Teacher certification. Infant/Toddler (I/T) which focuses on children birth to two years and nine months and Preschool (P) which applies to work with children aged two years nine months through age eight. These certifications only apply to EEC licensed small/large group child care settings as family child care settings, which are in homes, has different requirements and will not be discussed in this study.

department of elementary and secondary education.

Martin (1904) sketched the early years of trying to set up a public district system for education in Massachusetts. It was abolished three times by the Massachusetts legislature in 1853, 1859, and 1869 before finally becoming set in 1882. In more recent history, the Department of Elementary and Secondary Education (DOESE) was formed to oversee K-12 education throughout Massachusetts. DOESE licenses educators in K-12, distributing state and

federal funds, as well as monitoring schools and districts in Massachusetts (Massachusetts Department of Elementary and Secondary Education [DOESE], 2018a).

DOESE licenses a wide range of teachers and professionals for various age groups and subject matter. For this study, we will be looking at the Academic Teacher: Early Childhood, PreK-2 license as it is closest to EEC's Teacher certification by age. There are two forms of license. Initial and Professional. Initial licensure requires a Bachelor's degree in education, passed all required Massachusetts Tests for Educator Licensure (MTEL) and has completed an approved educator preparation program. It is valid for five years of employment and can be extended once for an additional five years. A professional license requires that the person hold an initial license in the same field as the professional license that is sought after. They must be employed under the initial license for at least three years, completing a one-year induction program with a mentor and at least 50 hours of mentored experience since that first year, and hold a Master's degree with at least 12 credits of graduate level courses in subject matter knowledge for the license sought (Massachusetts Department of Elementary and Secondary Education [DOESE], 2018b).

Research Problem and Question

With the differences in teacher certification/licensure known, the purpose of this study was to find out *what are the institutional norms in place that contribute to making educational requirements for early educators lower when compared to their counterparts in elementary and secondary education and how these norms keep education lower for early educators?* By interviewing policymakers, gathering publicly available documents from EEC, and putting in a few FOIA requests, those contributing factors will begin to come together.

Key Definitions

Assistant Teacher – A paraprofessional who does not have the requirements for EEC Teacher certification in Massachusetts. This paraprofessional can work with children but may not be left alone with any group of children and must be supervised by at least an EEC Teacher in the classroom.

BEEC – Board of Early Education and Care in Massachusetts. A political appointment by the Governor of Massachusetts, for nine of the members, is required to serve on the board. The board consists of eleven members.

DOESE – Department of Elementary and Secondary Education in Massachusetts.

Early Educator – A teacher or paraprofessional who works with children from birth to age five.

EEC – Department of Early Education and Care in Massachusetts.

FOIA – Freedom of information act request. Requests are made through email to the Department of Early Education and Care in Massachusetts.

IT/P – Infant, Toddler, and or Preschool. Applies to EEC Teacher and EEC Lead Teacher certification. Infant Toddler is a separate certification from Preschool for EEC Teacher and EEC Lead Teacher certification. Applicants can apply for IT, P, or IT/P for each certification type though have slightly different requirements for Infant Toddler than that of Preschool.

MTEL – Massachusetts Tests for Educator Licensure. Required test(s) for elementary and secondary educators to receive initial licensure through the DESE.

Theoretical Framework

This study uses a subset of systems theory, social rule systems theory, as a theoretical framework for the development, interpretation, and subsequent analysis of data and research gathered. Social rule systems theory takes an institutionalist approach to explain how culture, laws, and society are developed over time. An institutionalist approach considers norms, rules,

and routines that have been established by social behavior to create a social structure. For the purposes of this dissertation, the institution being studied is early education in Massachusetts.

Social Rule Systems Theory

Social rule systems theory, developed out of the want to analyze social rules as they relate to systems, is a part of systems theory. Fleshed out in the 1970s and 1980s by several researchers including Tom R. Burns, Helena Flam, and Thomas Baumgartner, Burns and Flam culminated the work with their 1987 book *The Shaping of Social Organization: Social Rule System Theory with Applications.* Using systems theory as a base, these researchers wanted to look more closely at how social rules affect organizations. By making it an applied systems approach, it provides the systems theory application with a specific set of organization in the theory.

Systems theory has been part of the university lexicon for generations. Noting that systems theory has initially been part of engineering science, Bertalanffy (1968) showed that systems theory could apply in many forms from engineering to math to organizations. Today, there are dozens of different systems perspectives that all began as a result of general systems theory (Ball, 1978). Bertalanffy, arguably, is the father of the modern systems theory movement through his text *General Systems Theory: Foundations, Development, Applications* in 1968, though can be traced back to precursors such as Karl Marx, Saint Simon, and Friedrich Engles throughout the 1800s into the early to mid-1900s. In 1954 Bertalanffy helped to establish the Society for the Advancement of General Systems Theory and renamed in 1956 to the Society for General Systems Research.

Systems theory looks at how systems, relationships, and elements develop over time (Dekkers, 2015). Systems theory works on the principle that there are general laws, beliefs, or

models that exist as general systems that developed and interconnect over time (Bertalanffy, 1968). Systems theory then looks at these interlinked systems to understand the broader topic. Dekkers (2015) notes that there are two main principles for examining systems which include starting with the system as a whole and only looking at the external relationships of the system with the environment to understand the system behaviors or taking on the system from a holistic perspective using aggregation strata, either is acceptable for exploring a system.

Social rule systems theory looks at analyzing social organization within modern societies. This can include policymaking systems, bureaucracies, markets, expert systems, and sociotechnical systems (Rowan, 1993). Social rules are produced by groups of humans and then reproduced thus creating a culture that will follow these social rules over time (Burns & Dietz, 1992). Burns and Flam (1987) note that society as made up of these humans, which they call actors, are essential to social regularity and as a result force structure onto on to systems and human activity. The occurrence of these rules are determined by members of the population that frequently use these rules, and that cultural change is when there is a change in the frequency of the distribution of the rules to the population over time (Burns & Dietz, 1992). These are universal in societies and are the building blocks of culture and institutional formation. Everything from language, norms, laws, customs, codes of conduct are included (Burns & Devillé, 2017).

Critics of the Theories

Wirt (1977) does not consider systems theory to be a theory at all. He found that it had to provide for the basis of testable hypothesis which systems theory does not fall within in his opinion. He talks to the idea that it is a single framework for analysis and as such, limits the language used in theory and that because of this, language limits thought. Lopreato (1970) found

systems theory to be nothing more than a déjà vu feeling and that there is something to gain somehow by treating it as if there is a system when there may not be, to begin with. Ball (1978) comments that because systems theory consists of literally dozens of different systems perspectives that it can be considered a cluster of strategies of inquiry rather than a distinct look through the use of a specific theory.

Rowan (1993) finds social rule systems theory problematic due to inadequate knowledge among actors as to how to implement rules. The rules are often contested, negotiated, persuaded, or conflicted in action causing rules systems to change, structuring rules systems that fit actors with different interests. Moreover, rules systems can become contradictory within the same action.

Rational of Using Social Rule Systems Theory

Social rule systems theory gives a robust framework for this study. This theory provides the ability to understand how societal rules over time have/had an effect on the early education industry from a societal standpoint, and more specifically within the early education field in Massachusetts and the Department of Early Education and Care in Massachusetts. Social rule systems theory fits well when trying to understand what the institutional norms are that make professional qualifications to become a certified early education teacher in Massachusetts lower than their counterparts in elementary and secondary education. Many of the norms surrounding attitudes of education can be traced back generations and are reinforced over and over. An example would be the disconnect between the low salaries of early educators and still providing quality early education programs (Washington, 2013). A second example would be how men avoid the profession. With 97% of women in the early education workforce, men are reluctant to

accept a low social status and substandard wages that come with careers in early education (Press & Woodrow, 2005; Roseman, 1999).

Policymakers make up a huge component of what is deemed acceptable in early education. They create the regulations that are required to be adhered to throughout the state. As a result, early educators require less education. This system has been in place for decades though numerous studies and publications have noted that early educators have less education than their peers and that part of the reason is lack of respect for the field of early education as actual education from a societal standpoint (DOL, 2018; Karp, 2005; National Academies of Sciences, 2015; Washington, 2013). Because it is associated closer with babysitters or parenting, society has deemed it not real education when early education could be the most formative education a child can receive (Karp, 2005; National Academies of Sciences, 2015).

Application of Using Social Rule Systems Theory

Application of social rule systems theory is a multi-dimensional process. First, the researcher needs to know who the individuals are that influence the field of early education in Massachusetts. In this study, the researcher looked at the policymakers as they have the direct ability to produce and adjust the requirements of early educators education requirements. Their attitudes towards the differences in the requirements of early educators and elementary and secondary educators have a direct effect on how what policy is made.

Second, the researcher took a look at the actual policies, regulations, and documentation from the policymakers and contributors. Those policies give concrete examples of how the system operates at the moment. In this case, it is the Department of Early Education and Care in Massachusetts. Knowing what they are, helps to guide the conversation with the policymakers thus allowing us a more in-depth look at the system as a whole.

The third is looking at outside influences that affect policymakers. These outside influences could include groups like the National Association of the Education of Young Children [NAEYC], as well as things like wages, turnover, the privatization of the industry, and professional development within the field as a whole. These influences have an indirect effect on Massachusetts, and in some instances have a direct impact.

Chapter One Conclusion

This chapter gave an overview of the central problem of the study: *what are the institutional norms in place that contribute to making educational requirements for early educators lower when compared to their counterparts in elementary and secondary education and how these norms keep education lower for early educators?* By using social rule system theory as a theoretical framework, this study explores the Department of Early Education and Care in Massachusetts as a system with the policymakers in Massachusetts. Chapter 2 gives an overview of the literature on some of the contributing forces surrounding the central question by looking at the external influences affecting Massachusetts early education: privatization of the early education industry, staffing problems such as low wages and education, and how professional development works in early education.

Chapter Two: Literature Review

This literature review takes a look at several external factors that affect the system of early education in Massachusetts. Strand one focuses on the privatization of early education. Looking at parent cost and ownership structures, the first strand gives an overview of the big business that early education is and how it affects the field of early education. Strand two is about professional development and how it is implemented in early education. This strand looks at degree programs in early education, the Child Development Associate (CDA) credential, in-service professional development and the addition of online training that has exploded into professional development in recent years. The third strand is about staffing problems and issues that are typical in early education which include lack of qualifications and education, low wages often on par with fast food workers, and one of the highest turnover rates in any industry.

Strand One: Privatization of Early Education

Privatization of industries is nothing new in the United States. Early childhood education is no different as it is a mixed-delivery, market-driven sector that uses market mechanisms and private sector firms to provide early education services (Adamson & Brennan, 2014; Gomez, Kagan, & Fox, 2015). In order to stay competitive in a market-dependent business, child care centers compete for the same customers in a small geographic area that is close to where families work and live (Ackerman, 2006).

There are a diverse amount of types of early education programs that vary from how they are funded, such as through contracts, vouchers, and direct program funding, to how they are regulated and monitored in the United States (Gomez et al., 2015). Some states invest heavily in early education at the state and local level while others rely solely on federal funding and market sector income (Gomez et al., 2015). The 2018 Massachusetts fiscal budget recommendation for

all early education services is $584,081,878. This includes $5,686,617 for the Department of

Early Education and Care, voucher reimbursement rate increases to child care centers at

$7,000,000, and access to early education for low-income families at $255,389,495 (Governor's

Budget FY 2018, 2018).

To understand the business of early education, we need to understand the ownership

structures of child care centers and its cost to parents. There are three categories of early

education structured that will be explored: for-profit, not-for-profit organizations, and public

child care.

Child Care Ownership Structure

Lam et al. (2013) estimate that there are over 75,000 child care centers throughout the

United States. Of these, 71% are for-profit incorporated business (39% are corporations; 25% are

sole/individual proprietorships; 7% are partnerships; 1% are other forms of legal organization)

and 29% are not-for-profit or government-run centers.

For-profit centers are businesses that exist to make money for their shareholders and or

owners. They take on a wide range of legal structures including sole proprietorships,

corporations, partnerships, or limited liability companies. Not-for-profits are defined legally as

501c organizations under the IRS tax code and have a range of designations such as 501c(3)

public charities, 501c(4) that provides community benefit such as volunteer fire departments, and

501c(5) member serving organizations such as labor unions. Government child care centers,

while not-for-profit, are government entities that are directly funded by tax dollars such as public

schools or hospitals. They are considered to be distinct from charitable not-for-profits because

they provide a service to a broader range of the population where charitable not-for-profits

provide services to a specific community, base, or population (Lam et al., 2013; Sosinsky et al.,

2007). The childcare as an industry is reliant on this mix of for-profit, not-for-profit and

government providers in the United States (Press & Woodrow, 2005), as the government has

limited interest in or influence child care center setups, how child care is delivered, and

maintained (Young, 2015).

       parent cost.

       In the market for early education, childcare services are considered a commodity with

parents treated as consumers. They shop for services that are provided by a range of competing

organizations (Young, 2015). However, the choice is limited by availability and affordability as,

and for-profit centers are looking to gain the same clientele due to the reliance on market supply

and demand. (Press & Woodrow, 2005). Allvin (2016) found that voters overwhelmingly believe

that increased access to high-quality early education is a high priority across demographic,

geographic, and political lines. Much of that support is for increased federal and state investment

in early education.

       Parents are not always aware of what they are purchasing for childcare regarding quality.

While parents are most concerned about issues surrounding health and safety, they are less likely

to recognize what a high-quality program looks like and the importance of licensing and training

of teachers (Press & Woodrow, 2005; Roseman, 1999). Parents tend to overestimate the quality

of child care at a center as they have no objective measures of quality and a general lack of

knowledge about what to look for (Press & Woodrow, 2005).

       Parent cost ranges in each of these organizations as some centers receive direct assistance

from the government, some receive tax breaks based on the type of child care center, and others

rely on actual users to pay for the cost of child care with approximately 60% of overall costs

going to parents (Ackerman, 2006). The type of child care center can influence the distribution

within the budget. Vu et al. (2008) note that not-for-profit child care centers have more diversified revenue streams and spend more on labor and food where for-profit centers receive very little public funding and spend more on operating costs and facilities. Roseman (1999) found that low-income families, struggling with costs of living, spend upwards of 23% of their total income on child care.

        for-profit.

For-profit centers make up the majority of all centers in the United States at roughly 71% of the industry (Lam et al., 2013; Sosinsky et al., 2007). The majority of for-profit centers (70%) are independent providers that are typically small for-profit businesses that are owned and operated by individual families (Sosinsky et al., 2007). Large corporate chains, such as Bright Horizons Family Solutions and KinderCare Education, make up 28% of for-profit centers and 13% of all centers nationwide with the four largest chains having a capacity of over half a million children combined (Sosinsky et al., 2007). For-profit child care centers have primary commercial interests in getting a good return on capital for their shareholders and owners (Lloyd & Penn, 2014). It should be noted that of each sector of early education, for-profit centers and chains were often lower in child care quality and never highest in child care quality (Sosinsky et al., 2007).

For-profit centers work on the expectation that the market will create better consumer choice and competitive pricing (Lloyd & Penn, 2014). This is also supported through public funds to private companies in the form of vouchers, tax credits and other types of subsidies (Lloyd & Penn, 2014). Press and Woodrow (2005) note that as a result of the shift from public to private for-profit education in early education, the for-profit sector now provides most long day child care centers and that this could be considered a consolidation of privatization and private

sector power that has publicly supported infrastructure that is now dependent on the market to survive. For-profit centers have been known to have a disadvantage monetarily however as they cannot accept charitable contributions and carry facility costs that can be as much as twice as high as not-for-profit centers (Sosinsky et al., 2007).

not for profit organizations.

Not-for-profit child care centers are centers operated by organizations that include but are not limited to religious organizations, private schools, colleges, cooperatives, community agencies, public, and independent providers (Sosinsky et al., 2007). Religious organizations run about one-third of all not for profit centers at roughly 15% (Sosinsky et al., 2007).

Due to the overwhelming amount of for-profit child care centers, not-for-profit child care centers operate on similar business principles by competing for clientele by marketing themselves within the community for which the center resides (Press & Woodrow, 2005). However, not-for-profit centers have an advantage over for-profit centers as they are exempt from property and income taxes, as well as access to additional funding streams such as grants from foundations, and donations from individuals (Lam et al., 2013). Not-for-profit centers are more than likely set in low-income neighborhoods and serve as a resource for the community that also connects parents to each other and other service providers (Lam et al., 2013). These child care centers have been documented as generally having better qualifications among not-for-profit center staff (Lam et al., 2013).

public childcare.

Publicly funded child care originated in the 1960s on the federal level starting with investment into the Head Start program (Hustedt & Barnett, 2011). The concept on the federal level was to create programs that accomplished specific objectives such as education for children

with disabilities or to allow access to the workforce for mothers rather than create a national early education system (Hustedt & Barnett, 2011). There was the Comprehensive Child Development Act of 1971, which would have provided voluntary access to all children in the early years nationwide. This was passed by the U.S. Senate and House but was vetoed by President Richard Nixon (Hustedt & Barnett, 2011). In 1980, only four states had public subsidized preschool programs with small programs. From 1983 through 1987, 11 states started subsidized preschool programs, and by 2011, 40 states had public preschool programs (Cascio & Schanzenbach, 2013). Before 1980, most public child care was covered by Head Start, which targets and assists low-income families (Cascio & Schanzenbach, 2013).

Each form of funding, federal, state, or local, has its requirements with public child care providers blending different funding sources to create a classroom, with sometimes conflicting regulations (Hustedt & Barnett, 2011).

head start.

Head Start is a federal program funded through the U.S. Department of Health and Human Services with an annual budget of US$6.88 billion. It provides three to five-year-olds a mixture of nutritional, health, educational, and social services (Hustedt & Barnett, 2011). All Head Start programs are funded directly by the federal government and must follow federally mandated standards (Hustedt & Barnett, 2011). Eligibility is determined by family income below 100% of the federal poverty level with the 2007 reauthorization for Head Start allowing a guarantee to serve children with family income up to 130% of the federal poverty level (Hustedt & Barnett, 2011). The Head Start budget cannot and is not currently sufficient to serve all children nationwide for family incomes up to 100% of the federal poverty level (Hustedt & Barnett, 2011).

other federal funds.

The U.S. Department of Health and Human Services also operates the Child Care and Development Fund (CCDF) and Temporary Assistance to Needy Families (TANF). These funds are mainly distributed through the states to use as vouchers that states give out to families that are below 85% of the state median income level (Hustedt & Barnett, 2011). Most states match what they receive from the funding of these sources as a federal requirement to receive funding from these funds (Hustedt & Barnett, 2011).

public pre-k.

States have started to increase their investment in public pre-k programs with the percentage of four-year-olds having doubled since 2002 (Bassok, Miller, & Galdo, 2016). With this increase showed that there was a marked drop in private preschool participation among middle and high-income families and an increase in public pre-k participation for the same groups (Bassok et al., 2016). In 2011, more than 1.3 million children attended pre-k programs that are publically funded which equaled 28% of the United States four-year-old population. This is nearly double the 2003 numbers at 700,000 children, or 14.8%, of the nation's four-year-olds (Artz & Welsch, 2016). While there is variation in each state on the requirements to enter public pre-k programs, most programs only admit four-year-olds while only 13% consists of three-year-olds (Cascio & Schanzenbach, 2013).

Conclusion

This first strand focused on the various forms of early education centers and funding sources for each. Knowing that the majority of centers in the United States are for-profit ventures, we will be expanding upon this in strand two. Strand two will build upon this with the

professional development of early educators and how the type of center these professionals work at can affect the professional development credentials and requirements for these educators.

Strand Two: Professional Development

Strand two focuses on how early educators are developed through various uses of professional development. This includes in-service training, online training, degree programs, and the Child Development Associate (CDA) credential. In-service training includes training that happens in the workplace that is a non-degree style mass training of staff that are often in staff meetings. Online training is training that provides the educator with material similar to in-service training but through the use of the computer. Degree programs explore the Associate and Bachelor degree programs and their differences and similarities. Finally, strand two will explore the CDA credential and how it has developed as a primary credential for early educators to receive to gain basic understandings of early education.

Professional Development

Teachers should have an extensive knowledge of child development and early childhood best practices to work with young children (Saracho, 2013). Karp (2005) notes that while the United States has an extensive child development database, more than any country in the world, that there is a gap between what we know and what we implement into early childhood classrooms. The early education field is prioritizing professional development of early educators as a pivotal component to enhance programs for young children (Lunn Brownlee et al., 2015). Teacher's education does affect children's outcomes both in the home and in the classroom (Russell, 2012) and with many early education teachers not experiencing a comprehensive preparation that includes foundations in language, reading, and literacy development (Karp, 2005), the question becomes what forms of professional development do early educators receive

to work with children from birth through age five? Due to the demand and accountability for links between early educators and student outcomes becoming more of the norm in recent years, professional development has become more prevalent than ever before (Benner & Hatch, 2012). With a lack of professional development opportunities and the ill-defined nature of early educators work, teachers often lead to decisions based on what feels correct rather than decisions based on theoretical knowledge (Heisner & Lederberg, 2011). Not all staff in a child care setting who are certified are similarly qualified due to state certification requirements (Bogard, Traylor, & Takanishi, 2008).

Professional development systems for early educators are a combination of work training, degree programs, and the CDA credential (Son et al., 2013). Some are required, others optional. It is a state to state requirement as to what forms of education are needed for early educators with policy makers and implementers in-consistent with the requirements (Albrecht & Engel, 2007; Lobman & Ryan, 2007; Vujičić & Čamber Tambolaš, 2017). Nearly all US states (48 of 50) require that early educators participate in some form of early education professional development each year, though this professional development can be drastically different from state to state (Gomez et al., 2015). Because of the varied forms of professional development an early educator can receive from year to year, there is rarely a smooth transition for teachers to advance their knowledge and skill level (Huss-Hage & Cox Mitchell 2013; Karp, 2005) though Vu et al. (2008) does note that professional development outside of traditional academic education can enhance the effectiveness of the early educator.

It is universally accepted that teacher candidates working in early education need to be informed of current and sound educational policies and practices (Saracho, 2013). However, those policies and practices vary from state to state with the National Association for the

Education of Young Children (NAEYC) taking the lead in developing professional standards and basic understandings across the United States for states and individual child care centers to adopt (Stone-Macdonald & Douglass, 2015). What early educators learn in professional development matters with child development being the primary knowledge that studies have found of importance (Karp, 2005; Lobman & Ryan, 2007; Saracho, 2013). Diversity training ranked high on professional development; however, many teachers did not recognize training in diversity as important (Lobman & Ryan, 2007).

Recommendations by NAEYC link their standards to professional preparation and is recommended as a starting point for professional development activities rather than random conferences, workshops, and seminars (Albrecht & Engel, 2007; Stone-Macdonald & Douglass, 2015). NAEYC has its book by Lutton (2012) dedicated to their standards and guidelines for professional development. This book lays out NAEYC's standards for early education professional preparation programs, workforce designs for state early education professional development systems, as well as a code of ethical conduct, statement of commitment, and a supplement for early childhood adult educators. Lutton (2012) states that NAEYC has a long history, of over 80 years, convening leaders in the field of early education to develop national standards and guidelines for implementation in early education across the nation.

The main body of knowledge for current early educators was established first in the early 1970s when a host of organizations lead by NAEYC established core competencies to gain a Child Development Associate (CDA) credential (Lutton, 2012). While the CDA credential is aligned with NAEYC standards to prepare early education professionals, not all states embrace the credentials nor integrate them into their professional development systems (Lutton, 2012). As

a result, there is a patchwork system of training and development across the United States (Lutton, 2012).

In-Service Training

Considering that most early educators receive the majority of their training in-house rather than through formal educational opportunities like degree programs, there are not many studies that have examined the influence of in-service trainings when it comes to the outcomes of children or the effectiveness of this form of professional development towards teacher knowledge (Son et al., 2013). Son et al. (2013) define in-service training as learning and training opportunities early educators receive once they enter the workforce and can include informal training and educational opportunities as an alternative to formal education and degree programs as well as coaching opportunities. Coaching, in particular, has been shown to lead to better early education classroom practices and can work effectively as a form of professional development (Son et al., 2013). Coaching has also been shown to be useful in intervention programs designed to improve practices in classrooms and some child development domains such as early literacy practices and language (Son et al., 2013).

Karp (2005) postulates that any form of training, including in-service training, should include research, rigor, and respect and they are needed for the field of early education to receive the respect that it deserves. Karp (2005) also recommends that topics for professional development should stop including topics that have little to no focus on developing early educator teacher skills. By evaluating and providing time for teachers to practice new skills, it would assist the field more than focusing didactically on topics (Karp, 2005). There is a gap between what NAEYC preparation recommends and actual professional development preparation of the vast majority of early educators in the workforce (Albrecht & Engel, 2007).

There is a further lack of articulation from the training of entry-level to higher levels of training for early educators forcing early educators to learn entry levels skills over and over with little chance of learning more (Albrecht & Engel, 2007). With in-service professional development being a form of increasing early educator knowledge, minimum qualifications for most early educators is the norm in this market-driven, mixed delivery system (Gomez et al., 2015). One reason for in-service trainings constituting the majority of early educator professional development could be due the high rate of educator turnover, low compensation packages, and uncertain opportunities to develop through professional development and move into other positions within early education (Bridges, Fuller, Huang, & Hamre, 2011; Gomez et al., 2015).

Online Training

Online learning for professional development is a widely accepted option for educational delivery (Stone-Macdonald & Douglass, 2015). Online training has the ability for sustainable development and educational opportunities for states that have financial or geographically issues and allows users the flexibility to access material at their own pace and time (Stone-Macdonald & Douglass, 2015). Several states, including Massachusetts, are starting to offer professional development for early educators online, especially on basic training such as state regulations and standards (Stone-Macdonald & Douglass, 2015). Online learning opportunities are gaining attention as a method for those working to improve access to quality professional development for early educators (Stone-Macdonald & Douglass, 2015). Colleges and universities across the United States are now offering online courses and in many cases, entire degrees online compared to just ten years ago when many colleges were beginning to offer online courses (Faulk & King, 2013).

38.8% of rural U.S. households and 53.8% of urban households currently have broadband access in their homes with access changing to 12.7% of rural U.S households and 19% of urban households where their education is less than a high school education (Stone-Macdonald & Douglass, 2015). Early educators enjoy the convenience and flexibility that comes with online learning, but many are also worried about their lack of technological experience and skills (Donohue, Fox, & Torrence, 2007; Stone-Macdonald & Douglass, 2015). Online learning requires different demands on the learner from that on face-to-face learning including becoming dependent on their writing and reading skills and their competency using a computer (Donohue et al., 2007). Reliable access to a computer, with internet access, along with competent computer skills are essential to e-learners to begin using online learning. It should be noted that while many found online professional development worthwhile, many still preferred face-to-face settings from professional development (Stone-Macdonald & Douglass, 2015). Online learning has been found to be as effective as face-to-face education (Stone-Macdonald & Douglass, 2015).

Degree Programs

There is a relationship between developmentally appropriate practices and early educator teacher education with the suggestion that early educators who participated in courses in early childhood education were not only more knowledgeable in early education but also more involved with the children and more sensitive to the needs of the children than those who lacked courses in early education (Norris, 2010; Roseman, 1999). The current estimate of early educators with associate degrees is 7-12%, with 11-17% having their bachelor's degree and only 2-4% obtaining an advanced degree in early education or a related field (Gomez et al., 2015). Up to 15% of preschool teachers have only completed high school or have never received a degree

(Bridges et al., 2011). Historically, early educators have not needed to obtain a college degree to work in the early education field (Gomez et al., 2015). This has begun to change in recent years with various U.S. states requiring new minimum requirements for the early education workforce (Gomez et al., 2015). As a result, there has been an increased demand for degree programs, particularly at the associate degree level (Gomez et al., 2015). There has been an argument for early educators to have a more sophisticated understanding of working in a classroom more responsively; something degree programs integrate into their programs (Lobman & Ryan, 2007).

       associate degree programs.

       Associate degrees, offered at two-year colleges provide an introduction to higher education for many in early education (Gomez et al., 2015). These two-year colleges offer degrees that are heavily reliant on skill sets that are required for direct practice (Gomez et al., 2015). In 2006, NAEYC launched an accreditation system to help promote excellence in early childhood teacher education programs (Huss-Hage & Cox Mitchell, 2013). 156 institutions of higher education in 30 states have earned this accreditation from NAEYC called the Early Childhood Associate Degree Accreditation (ECADA) (Huss-Hage & Cox Mitchell, 2013). Currently, the following community colleges in Massachusetts are accredited under ECADA: Cape Cod Community College, Greenfield Community College, Massachusetts Bay Community College, Massasoit Community College, Middlesex Community College, North Shore Community College, Northern Essex Community College, and Quinsigamond Community College (Huss-Hage & Cox Mitchell, 2013). This accreditation has been shown to increase faculty knowledge of aligning learning outcomes of students to course assessments and assignments, having students have more opportunities to demonstrate national standards for early educator professional preparations, helped to create partnerships with the stakeholders in the

community, and that engagement among students has increased with active and collaborative learning (Huss-Hage & Cox Mitchell, 2013). NAEYC urges against terminal associate degrees in early childhood education as they maintain that associate degree programs should have the ability to transfer from associate to bachelor and graduate degree programs (Lutton, 2013).

bachelor degree programs.

NAEYC works with the Council for the Accreditation of Educator Preparation (CAEP), known previously as the National Council for Accreditation of Teacher Education (NCATE), to recognize programs in early childhood education at the baccalaureate and graduate levels (Huss-Hage & Cox Mitchell, 2013). Bachelor degrees in early childhood education are becoming more of a baseline requirement for lead teachers in Head Start programs and state-funded pre-k programs (Gomez et al., 2015). These bachelor programs in colleges and universities are more likely to focus on children in primary school (kindergarten through grade three) rather than from birth to age five (Gomez et al., 2015). Unlike in associate degree programs at two-year colleges, only 11% of full-time bachelor degree students in early education were employed full time while taking courses (Norris, 2010) and this has been dropping with early educators with bachelor's degrees dropping 43 percent in 1983-85 to only 30 percent in 2002-2004 (French, 2010).

additional information on degree programs.

Karp (2005) argues that not only professional development, but degree programs specializing in early education should begin to start focusing on research, rigor, and respect and notes that without linking the professional development of early educators to elementary school professional development, young children would come to school unprepared to succeed. It is recommended that all preschool classrooms have a qualified teacher holding a bachelor's degree and specialized training in early education as it was necessary for professional preparation and

higher quality classrooms (French, 2010; Goin, 2016; Jeon, Buettner, & Hur, 2016; Lobman & Ryan, 2007; Vu et al., 2008).

CDA Credential

The Child Development Associate (CDA) credential was first launched in 1971 with a heavy reliance on the field of early education and care as a foundation for professional development within the field (Washington, 2013). It cannot be considered a terminal degree and was never envisioned as the primary qualification for educators in early education (Karp, 2005). To receive the CDA credential, early educators must have 120 hours of formal training, mainly online today, a professional portfolio, 480 hours of work experience, an on-site observation, a family questionnaire, and a computer-based exam (Washington, 2013). In 2013, these were updated to also include an updated knowledge base, a candidate reflection, and the creation of a professional development specialist nationwide network, helping to assess the candidate's competencies (Washington, 2013).

Many states have relied on the CDA credential as an entry into early education considering it akin to that of an associate's degree (Albrecht & Engel, 2007). The CDA credential is considered a "national" credential and is recognized by all 50 states as a valid type of credential to working with young children and is portable from state to state (Gomez et al., 2015). For many early educators, the CDA credential is a step towards a formal degree program, others it represents a precursor to joining the early education workforce, and others obtain it while working in the classroom (Gomez et al., 2015). The CDA credential has been awarded to over 200,000 early educators since 1971 (Heisner & Lederberg, 2011) with many states financially supporting the CDA (Gomez et al., 2015).

Conclusion

Higher quality classroom environments have been linked to the higher the level of teacher qualifications the early educator has received though it has been noted that it is unclear what level is necessary to effectively teach children in early education settings (Vu et al., 2008). There are a clear connection and relationship between high-quality professional development and teaching outcomes for young children (Gomez et al., 2015). However, it is not clear what forms of professional education are required with many states only requiring bare minimum requirements to work with the youngest of children. Strand two focused on professional development requirements. Strand three will be focusing on additional issues that face early educators on a daily basis, from low wages to high turnover rates.

<center>**Strand Three: Staffing Problems**</center>

Strand three focuses on a few specific problems that staff of early educators faces throughout their work with young children. This includes low wages, benefits, and a high turnover rate that affects not only the staffing but the children who go to these child care centers. Early educators work long hours with pay on par with fast food workers and are mainly not unionized like their counterparts in elementary and secondary education.

The Field of Early Education

The field of early education is predominantly women, comprising 94.8% of all early educators in the United States (Gomez et al., 2015). Males have, generally, turned away from a career in early education due to low salaries, the stereotype that education is the work of women, fear of being accused of sexual abuse, and other discrimination against male caregivers (Anliak & Beyazkurk, 2008). While there has been a gradual increase in male participation in early education, most early educators are female (Anliak & Beyazkurk, 2008).

There are significant variations in attitudes about the work of early educators with many considering the work of early education with that of babysitters (Gomez et al., 2015). Voters believe that early educators who have vital qualities such as passion for the work and patience define a high-quality early educator with early educators agreeing but also agreeing that early educators should have a baseline of skills, in exchange for higher wages and benefits (Allvin, 2016). While public spending has increased for early education in recent years, it has mainly been to increase expansion and not to help programs compensate, attract, and retain well-educated early educators (French, 2010). Early educators feel overwhelming that a lack of respect for the difficulty and importance of their work which is at odds with voters who overwhelmingly support quality early education (Allvin, 2016). High levels of stress for early educators can result in weak interactions with children and lower professional commitment that can contribute to the high rates of turnover (Buettner, Jeon, Hur, & Garcia, 2016).

For many for-profit and community-based child care centers are staffed below the regulatory standards through a policy allowing for temporary approval (Press & Woodrow, 2005). It has been documented that better-qualified staff members work in not-for-profit centers than in for-profit centers and develop higher quality environments in classrooms (Lam et al., 2013; Vu et al., 2008). Head Start programs require at least 50% of their teachers in center-based child care to have a bachelor's degree or above (Son et al., 2013). However, only 11-17% of all early educators throughout the United States have received a bachelor's degree (Gomez et al., 2015) complicating the ability to gather high-quality educators to programs.

Wages and Benefits

The average annual wages for early educators range from $22,000 to $27,000 in Massachusetts compared with elementary school teachers who have an entry-level salary of

$40,000 annually (Hooley & Marcelo, 2018; King et al., 2016). While it varies from state to state, some states pay early educators less than $18,000 per year (Gomez et al., 2015). Staff wages represent 70% of the total operating cost of a child care center (Roseman, 1999). The strongest predictor for quality child care was early educator wages (Brooks, 2003). Less than 5% of early educators in the United States are unionized (Brooks, 2003).

There has been no real increase in earnings for early educators since 1997 when accounting for inflation (Phillips, Austin, & Whitebook, 2016). Only 14% of centers in Massachusetts offer fully paid health insurance to educators (Deutsch & Riffin, 2013), and women make 41% less in early education than working in any other field (Barron & West, 2013). The lack of qualified early educators has not resulted in improved wages with the opposite happening due to profitability and viability of the child care centers (Press and Woodrow, 2005).

Low wages contribute to a variety of problems facing early educators. Low wages can make it difficult for educators to pay for coursework leading to a degree (Ackerman, 2006). Often, early educators who suffer these low wages until their money and patience run out (Roseman, 1999). Low wages for early educators can lead to an inability to pay for basic expenses, which can lead to financial stress for the early educator (King et al., 2016). Benefits are typically low and variable depending on the center with an estimated one-third of early educators receiving paid benefits/sick leave (Gomez et al., 2015) though some benefits give early educators a level of security such as health, disability, and retirement and does impact the retention rates of early educators (Hall-kenyon et al., 2014) Hall-kenyon et al. (2014) notes that nearly all studies they looked into concluded that low wages and benefits had a negative impact on early educators. Low compensation has been associated with early educator burnout, less

sensitivity to children, quality of instruction, and less developmentally appropriate practices (King et al., 2016). There are some state compensation initiatives including stipends for compensation; however, they are limited to specific states and often must be applied for on a yearly basis with some tied to short-term funding mechanisms (Ackerman, 2006). They are not permanent wages for the field as a whole as a result.

Turnover

Turnover rates of early educators are between 30-40% per year in the United States (Gable, Rothrauff, Thornburg, & Mauzy, 2007; Gomez et al., 2015; Roseman, 1999; Sosinsky et al., 2007; Torquati, Raikes, & Huddleston-Casas, 2007). Approximately 18% of early educators in center-based programs leave the field of early education entirely per year (Gable et al., 2007). Some states have turnover rates as high as 50% per year in early education (Ackerman, 2006). Fast-food businesses are the only other field to report higher levels of annual turnover (Whitebook & Sakai, 2003). Turnover rates annually are significantly higher in for-profit centers compared with turnover rates in not-for-profit centers at the 24 and 36-month marks (Sosinsky et al., 2007). There are high rates of public school turnover as well with approximately two-fifths of K-12 teachers leave the field of education within five years but nowhere as close to early educators (Bridges et al., 2011) as the annual rate of turnover is at roughly 7% (Whitebook & Sakai, 2003).

High turnover rates add to the costs of the operation of child care programs and can render many in-service training programs as ineffective for program improvement (Bogard et al., 2008). High levels of turnover can place a child care center in jeopardy and impede efforts to improve quality at the child care center (Whitebook & Sakai, 2003). Childcare compensation in a child care center is a reliable predictor of staff turnover (Gable et al., 2007). Hall-kenyon et al.

(2014) note that because early education funding is discretionary, early education positions have less stability leading to a higher turnover rate.

Higher wages and cash incentives have been associated with lower turnover among staff members (Holochwost, DeMott, Buell, Yannetta, & Amsden, 2009). Other factors that impact early educators intentions to remain in the field of early education include age, marital status, education level, and experience (Holochwost et al., 2009). Early educators most likely to remain in the field of early education are those in the 40-55-year-old age range (Holochwost et al., 2009).

Conclusion

Early educators contend with a lot of external challenges. Low wages and benefits that lead to financial and other forms of stress, professional development systems that are not linked to one another, and a privatized industry that goes through staff at one of the highest rates of any industry. These factors add into a complicated industry focused on the youngest children and their educators that work with them.

<div align="center">

Chapter Two Conclusion

</div>

Chapter two looked into external factors that affect early educators from their wages and benefits to the privatization of the field of early education. The literature review strands look into the three major components that affect early educators the most across the industry with data collected from many sources. Early education is mainly a privatized, for-profit industry that keeps wages and benefits low and has few requirements for education of its workforce. With wages stagnant since the late 90s and a staff turnover rate between 30-40%, early educators have to contend with companies and states making choices for their workforce that rival that of fast food workers. Early educators have little education compared to that of elementary and

secondary educators, and have little incentive to gain more education. Educators leave early education in droves and those who do stay make 42% less than in other industries.

      Chapter three outlines the case study proposal examining these issues and will look into why early educators do not require the same levels of education as their counterparts in elementary and secondary education specifically from Massachusetts policy on educator requirements. Through publicly available data and interviews with policy makers in Massachusetts, the study design outlined in chapter three will help to answer these questions.

Chapter Three: Research Design

Qualitative Research Approach

This study took a case study approach to conducting qualitative research. Known as one of several forms of social science research, case study research focuses on contemporary research that asks "how" and why" questions (Yin, 2013). Investigating a phenomenon, known as the "case," then noting that the boundaries between the phenomenon and context may not be seen as evident (Barela, 2007; Yin, 2013) is the first part of case study research. This is followed by relying on multiple sources of evidence that when used in conjunction with each other allows for results (Yin, 2013). This all begins with a question and following a rigorous methodological design through the use of the literature review and research questions. Case studies can be around one case or multiple cases. It has been noted that case study research has been confused with other types of research and as a result, there has been little consensus as to what constitutes case study research and how it should be done (Merriam, 1998). As a result, Yin, Stake, and Merriam have been at the forefront of defining what case study research is and how it should be conducted.

Three leading scholars have come up when looking into case study research. These scholars include Robert Stake, Robert Yin, and Sharan Merriam. While case study research has been used since the late 1800's, Yin, Stake, and Merriam have become known for their seminal works in case study research (Yazan, 2015). Yazin (2015) does a great job in making distinctions between Yin, Merriam, and Stake's perspectives on case studies. Noting that there is no full consensus on the implementation or design of a case study, it has the distinction of having perspectives that are both different and yet come together in areas within case study

methodology. It is recommended that coming up with a perspective that is combined among the three to serve the scholar best while doing case study research (Yazin, 2015).

All three have conflicting definitions of what a case and case study is. An example of this includes Yin, who defines a case as a phenomenon that is contemporary within a real-life context and the researcher has little to no control over the context or the phenomenon (Yin, 2013), and Stake who defines a case as inquiring into an object rather than a process (Stake, 2005). Moreover, yet again with Merriam who finds a case to be an entity, thing, or a unit that has boundaries (Merriam, 1998). Even in the case study design, there are conflicting thoughts. Yin focuses on a tighter structure where Stake looks for it to be more flexible (Yazin, 2015).

A case study approach developed by Yin was appropriate for the central question guiding the research into early educator credentialing in Massachusetts. A Yin case study allowed for a narrow focus on the subject, in this case, the Department of Early Education and Care in Massachusetts, and allowed material from interviews, documents from EEC, publicly available video of meetings, and other materials to be triangulated concisely to be presented. A case study approach, with additional guidance from Creswell's (2012) guidelines for providing quality qualitative research, allowed for a look at EEC at this time and place while providing a historical lead up to the here and now through a robust literature review.

Participants

While the bulk of the data collected was through publicly available documents and data on the Massachusetts Department of Early Education and Care website and Freedom of Information requests (FOIA) to the Department of Early Education and Care, the researcher sought interviews with individuals who create early education policy throughout Massachusetts. This included requests to the Executive and Legislative branch individuals as well as the

Executive Office of Education and the Department of Early Education and Care. A list of 17

individuals had been identified and kept up to date through the 2018 election cycle. The

researcher updated the list with current policymakers after the 2018 election taking into account

individuals who lost the election or were no longer serving as an educational policy maker in

Massachusetts.

Each identified was emailed to schedule an interview once Northeastern's Internal

Review Board (IRB) approved this researchers application. The goal was to have six to eight

individuals interviewed across the various branches of Massachusetts government with a specific

focus on the Department of Early Education and Care as they directly oversee early educator

teacher education requirements in Massachusetts. Due to these individuals being public figures

within Massachusetts, each interviewed had the option to include their name and title in the case

study when they signed the informed consent release before the interview began. If they chose

not to have their name listed, a pseudonym was used in its place, though their title will remain

and documented in this case study.

Data Gathering and Procedures

Many items can be used for data gathering which includes observations, interviews,

video, and reviewing relevant documents (Stake, 1981, 1995). To begin with, the researcher will

have to organize the gathering of the data, gain access and permissions for data gathering, and

create a system to keep the data confidential (Kruse, 1998; Stake, 1995). Data collection should

always be supplemented with reminding oneself of their central research question(s) (Yin, 1981)

and it has been noted that there are limitations to what case studies can and can not produce. Due

to time and money data collection can be a daunting task and may not allow for the production of

quality data gathering for the desired case study (Merriam, 1998). Merriam and Stake diverge

from Yin in data where Merriam and Stake feel that it should all be qualitative data where Yin feels that there can be a combination of qualitative and quantitative data (Yazin, 2015).

The following sections will go through specific guidelines regarding data collection and procedure. Creswell (2012) identifies that there are six steps to quality research: identifying the research problem (chapter one of this proposal), reviewing the literature (chapter two of this proposal), specify a purpose for the research (chapter one of this proposal), collecting the data, analyzing and interpreting the data, and reporting and evaluating the research.

Institutional Review Board

Northeastern University has specific guidelines, rules, and regulations regarding interviewing human subjects. Upon completion of the thesis proposal, an application was presented to Northeastern University's Institutional Review Board (IRB) for review before any interviews with human subjects began. The board requires all researchers to comply with federal, state. Local, and Northeastern University regulations regarding human subjects and maintaining data.

This researcher has taken an online course in protecting human research participants (Appendix C) as required by IRB. IRB requires information on the goals of the research, any organizations, recruitment procedures, consent process, study procedures, risks, and confidentiality along with a signed form from the Principal Investigator. The information for this application is in this dissertation, and this application was written upon completion of the proposal and then placed as Appendix D.

Interview Procedures

All interviews followed a strict protocol form (Appendix A) that outlines information about affirmative consent to interview and record the interview, the reason for the interview, as

well as questions to ask. Before the interview began, each interviewee signed two copies of the

consent form (Appendix B) with the researcher signing both copies as well. The interviewee

received one copy for their records with the researcher receiving the other copy for their records

that will be maintained for three years. The researcher will keep copies of this signed consent

form in a safe in the researchers home during the three year period. If the interviewee refused to

sign the consent form, the interview ended immediately, the interviewee thanked, and the

researcher left. If the interviewee agreed to sign, the recording began and followed the protocol

form. The interviewee had the opportunity to ask any questions before the recording began.

Additional questions may have come up in the course of the interview that was not on the

protocol form, and the researcher acknowledges that there were moments where probing further

was required to gather the data necessary for this case study.

All interviews were and continue to be kept confidential, and due to these individuals

being public figures within Massachusetts, each interviewed had the option to include their name

and title in the case study when they signed the consent release before the interview began. If

they choose not to have their name listed, a pseudonym was used in its place, though their title

remained and was documented on the release form. All interviews were transcribed using a

transcription service, Rev.com, and all interviews were kept according to the researcher's data

storage standards (see Data Storage Procedures). Interviewees had the option to see a copy of

their transcript before any data analysis began and amend their interview accordingly. The

researcher provided this information at the beginning of the interview and followed up with each

interviewee to see if they would like to see a copy of their transcript once the transcript was

received.

Data Storage Procedures

There are multiple pieces of data collection for this case study including interviews, interview transcripts, publicly available documents, and publicly available videos that was analyzed. All data was stored in two central locations. First was the researcher's password-protected computer in a DropBox password protected folder. Second, all research was backed up onto a password-protected flash drive. This backup flash drive was in a safe in the researchers home. The data was analyzed using NVivo software. While this software is not password protected, the researcher's computer was and was not accessed by anyone while the study was being conducted. At the conclusion of the case study, all documents, interviews, and all other data was deleted from the researchers hard drive, DropBox account, and flash drive. All signed consent forms will be kept in a safe in the researcher's home for the required three year period as specified by IRB.

Other Data Collection Procedures

The researcher gathered data other than that of just interviews. This included publicly available data, FOIA requests to the Department of Early Education and Care and other departments in Massachusetts, publicly available video recordings of EEC board meetings, etc. All data collected was maintained similar to interview data with the same level of confidentiality and deletion as other forms of data. Collection of publicly available data was collected using the internet and any FOIA requests were conducted through email unless otherwise specified by the department where the data was being requested.

Data Analysis and Presentation

Much like the rest of case study methodology, Yin, Merriam, and Stake have different methods of analyzing data in a case study. Yin (2013) wants scholars to be able to competently analyze qualitative and quantitative data using testing, categorizing, and tabulating the evidence

(Yazin, 2015; Yin, 2013). Stake (2005) looks at analysis as a way of looking at first impressions as well as in the final compilation. Impressions and knowledge should cut down on misperceptions. Merriam's has been known to compliment both Yin and Stake's approach to analyzing data (Yazin, 2015).

This researcher took Yin's approach to the case study. Using NVivo software, all data was input into NVivo for coding. Using Saldaña (2016) as a reference, the researcher began to assign keywords to transcripts and data to develop patterns in the data. This was done through a multi-coding process where the first coding sequence was using keywords directly from the data. Pattern coding was the second coding process and was followed by additional rounds of coding to narrow the research into a few major and minor topics/themes. These themes were then explored more closely and coded within each topic/theme. Each topic/theme was related back to the central question of the case study and through the lens of social rule systems theory.

There are several methodological structures to present case studies. They include comparative, theory building, un-sequenced, linear analytic and suspense building (Yin, 2013). Case studies can also be presented as independent work or as part of a mixed methods study. Case studies are presented as a report while given a choice in regards to disclosure or anonymity of the identities in the case (Yazin, 2015; Yin, 2013; Yin & Davis, 2007). The researcher took an un-sequenced, thematic approach to present the case study in chapter four.

Criteria for Quality Qualitative Research

Creswell (2012) states that quality data should be gathered through a rigorous data collection which includes multiple forms of data, extensive data collection, and a long period for gathering such data. This data should include multiple perspectives which employs a tradition of

inquiry that should start with a single focus on a central question/phenomenon. Creswell (2012) goes on further, making sure that there is a strategy to confirm the accuracy of the study.

Creswell (2012) has a checklist of criteria for ensuring quality when performing qualitative research. Set in seven parts, Creswell (2012) specifies during these seven parts specifics in each to ensure that the research conducted is proper: title for the study, problem statement, review of the literature, purpose and research questions, data collection, data analysis and findings, and writing.

Title for the Study

Creswell's (2012) checklist for the title of the study includes if the title reflects the phenomenon being studied and if the title reflects the people and site being studied. For this study, the title reflects the phenomenon, early educator credentialing, and the people and the site being studied, policymakers for early educator credentialing. The case study name reflects the central focus questioning the attitudes of policy makers in Massachusetts to why early educators need less education than elementary and secondary educators.

Problem Statement

Creswell's (2012) checklist for the problem statement includes if it is an educational issue to study, if the author has provided evidence that this is an important issue, if there is an indication that the author located the issue through personal experience or past literature, if the research fits a qualitative approach, and if there is an assumption that the study is consistent with a qualitative approach. The statement of the problem is identified in chapter one of this proposal and is an educational issue to study. Chapter two's literature review provides evidence that early educator credentialing is an important issue. In chapter three, talks to the researchers' personal

experiences in early education and, along with literature, helped define the central question (See Self-Reflexivity and Transparency**).** The qualitative approach fit is within chapter 3.

Review of the Literature

Creswell's (2012) checklist for review of the literature includes if the author has provided a literature review of the research problem, if it is based on the preliminary findings or tentatively based on the finding, and if it follows APA format. This researcher has provided a three strand literature review in chapter two based on the research problem identified in chapter one. The researcher's literature review is based on preliminary findings before the start of this case study. Chapter two, along with all chapters, follows APA format.

Purpose and Research Questions

Creswell's (2012) checklist for the purpose and research questions includes if the author does have a purpose and central question, if the purpose and central questions speak to the people, site, and phenomenon for where the study is conducted, and speaks to data analysis. Chapter one talks explicitly about the purpose and central questions with both questions speaking to the phenomenon, people, and site. Both questions imply a data analysis approach which is further spoken of in chapter three.

Data Collection

Creswell's (2012) checklist for data collection includes whether the author has taken steps to gain access to people and sites, a sampling strategy, clear data collection protocol, and if there is a protocol for recording data. The researcher took steps, with IRB approval, to gain access to individuals with a clear data collection and recording protocol as outlined in chapter three (see Data Gathering and Procedures) and Appendix D.

Data Analysis and Findings

Creswell's (2012) checklist for data analysis and findings includes if appropriate steps were taken to analyze the data into themes, categories, or perspectives, if there was sufficient evidence gathered for each, if multi-layered themes developed, if the findings answer the research question, are the findings accurate and realistic, were the findings represented so that multiple perspectives can be seen, and were the findings represented in narrative discussions/visually. The researcher's protocols allowed for a robust amount of evidence to be analyzed. Multi-layered themes developed throughout data analysis with three main themes emerging (see Chapter Four). With assistance of the first and second readers, and the outside observer, the findings in chapter five were considered accurate and realistic and answered the research question.

Writing

Creswell's (2012) checklist for writing includes if the account with written convincingly and persuasively, if it is consistent with other writings (a case study), if it includes literary approaches such as complexity, detail, and surprises, was it written using a point of view that is personal, and was it intended for appropriate audiences. The researcher has a vested interest in this case study and has focused on writing that includes all of the above.

Ethical Considerations

Creswell's (2012) seven-step checklist identifies that these seven steps provide not only quality qualitative research but also ethical research. Making sure that each of the seven steps aligned to the case study provides an ethical approach to conducting research. Additionally, adhering strictly to Northeastern University's Institutional Review Board guidelines and regulations will assure that all participants in this case study have been treated with a strict code of ethics while conducting this research.

There are additional considerations made specific to this case study. For each participant in the case study, confidentiality is of utmost importance, making sure that each participant is identified as identified in the informed consent form (Appendix B). Data storage guidelines identified in chapter 3 (see Data Storage) are adhered to, with all data being destroyed at the completion of the case study. The researcher's bias, identified later in chapter three, will not interfere with the results of the study. Creswell (2012) also identifies some ethical issues that could arise such as making sure to obtain permissions, not disrupting sites, making sure to communicate the purpose of the study, and avoiding deceptive practices.

Credibility

In order to maintain credibility throughout the case study, the researcher understands that first a research problem, justification for the research problem, and a robust literature review must be maintained. This shows that a problem exists, in this case, that there is a gap in educational requirements between early educators and elementary educators in Massachusetts. When the case study began, in order to maintain any sense of credibility, the researcher conducted himself as a professional with all persons interviewed, maintained confidentiality with all requested parties, and followed all rules and regulations from federal, state, local, and Northeastern University. All data is maintained to the highest standards (See Data Storage Procedures), with a clear internal audit, and follow Creswell's (2012) checklist for maintaining quality qualitative research. Further, any conclusions drawn from the data will be truthful to the data given with any limitations acknowledged.

Transferability

It is the responsibility of the researcher to generalize the material for the potential transferability to other context or settings. This is done through well thought out and thick

descriptions so that conclusions can be drawn into other contexts. Writing a throughout research context and central assumptions allows for another person to transfer the results into a different context. The researcher generalized material using Creswell's (2012) checklist questions to maintain transferability throughout the entire case study.

Internal Audit

The researcher maintained an internal audit of all materials pertaining to the case study including the research question, audio tapes, research field notes, table of themes, annotated transcripts, draft reports, the final report, and all materials gathers during the case study for review. This allows an independent auditor to audit the case study and review the researcher's activities. Any reader will be able to follow the evidence chain, leading to the final report, with the exception of any confidential information which will be redacted.

The researcher maintained all records and materials electronically (see Data Storage Procedures) and any requests to audit the case study will also be on file electronically by date and individual requesting to audit the materials from the case study. Data storage waskept for all materials until the completion of the case study and acceptance by Northeastern University with the exception of the signed informed consent form (Appendix B) which will be kept by the researcher for the required number of years as required by Northeastern University's Institutional Review Board.

Self-Reflexivity and Transparency

The researcher has been in early education for over 17 years. He started learning about child development by accident. When he was a 15-year-oldd sophomore in high school, he was accidentally placed into a child development class. His high school in Massachusetts had, at the time, two child care centers within it. The school was a technical-vocational school, allowing

him to study not only child development but to major in child studies for two years. As the first male to successfully complete the child studies program in his high school, he received his birth to age five teacher certification at age 17. Since then, he has received his Associate's Degree in Early Childhood Education from MassBay Community College, a Bachelor's Degree in Human Development from Wheelock College, a Master's Degree in Educational Studies with a certificate in Organizational Leadership from Wheelock College, as well as Lead Teacher, Director I, and Director II certifications from the Massachusetts Department of Early Education and Care.

In early education, he has been an assistant k-1 after school teacher, a toddler teacher, lead-pre-k teacher, program specialist, education coordinator, assistant center director, program director, and now a behavior therapist. He has worked with hundreds of early educators throughout Massachusetts and through two years in Wilmington, NC. He has seen issues develop for staff members on many occasions. Many of the staff members have left the industry altogether. Some due to lack of a livable wage (King, et al, 2016), others due to the physical cost to body working with young children (King et al, 2016), while others use it as a path to working with children in elementary settings (Hall-Kenyon, Bullough, Mackay, & Marshall, 2014). Whatever the reason, staffing issues develop over time.

When thinking about the problem of staffing in early education, Briscoe (2005) came up when she spoke about how her topic came up as a result of a conversation, in her case a panel discussion. The researcher too was part of a conversation with a group of educators about how privatization affects staffing. He has a significant amount of experience in hiring staff members for the centers that he has worked. Carlton Parsons (2008) used her race as her rational for the potential study. He has done the same, though looking at the topic of interest through his

professional experiences. As a result, he feels that this experience influences his thoughts and ideas on how the privatization of the industry affects teacher qualifications.

He has several strong opinions on this issue. First, he does feel that the industry has been affected by the privatization of early education in comparison to the public sector education. Second, the work done with children in early education is just as important as the work done in elementary education. The work is just as challenging, engaging, and meaningful. These opinions could be construed as bias. Because he has worked in early education and not significantly in elementary education, this too could be taken as a bias. Jupp and Slattery's (2006) article, recognized that as educators, they had firm opinions as to teachers in relation to students of color but wanted to avoid the appearance of being bias. This bias allowed this researcher to look at his bias realistically. Recognizing bias and trying to avoid bias is difficult under the best of circumstances and needs great care to avoid. The first step in isolating his personal thoughts, feeling, and bias is to acknowledge that he, like everyone else has feelings. Knowing what he personally thinks will allow for the exploration of the topic and to keep an eye on what is verse what he believes should be.

Limitations

A case study approach allows for the look at a specific phenomenon or in this case organization at a specific time and place (Yazan, 2015). Due to the nature of case study research, the information in this case study only applies to the time, place, and data gathered during this case study and could be different by someone replicating this case study in the future. The interviews gathered during this case study represent opinions by those individuals and the data gathered as a result of the interviews may differ in the future. Due to the use of social rule

systems theory, this case study only looks through that theories lens and can be approached from

other frameworks.

Chapter Four: Case Study Results

This case study looked at *what are the institutional norms in place that contribute to*

making educational requirements for early educators lower when compared to their

counterparts in elementary and secondary education and how these norms keep education lower

for early educators. With the institution being early education in Massachusetts and knowing

that there are external and internal norms, through the lens of social rule systems theory, the case

study results look at the internal norms specific to Massachusetts. The researcher has conducted

interviews (see Table 1) and reviewed a range of documents from the Massachusetts Department

of Early Education and Care (see Table 2) and additional documentation (see Table 3) to conduct

this case study.

Interviews (Table 1) were conducted in March and April 2019 and represent the

Department of Early Education and Care (EEC), the Department of Elementary and Secondary

Education (DESE), and the Massachusetts Legislature. Additionally, Amy O'Leary represents

Table 1
List of Persons Interviewed

Name of Person	Position
Alicia Wells	EEC Associate Commissioner of Audits and Teacher Qualifications
Megan*	EEC Associate Commissioner of Workforce Development
Amy O'Leary	EEC Subcommittee Member, Adjunct Professor, EEA Director
Pam Roux	EEC Workforce and Educational Technology
Elizabeth Losee	DESE Director of Education Effectiveness Policy
James*	MA State House Representative, Member of Joint Education Committee

*Pseudonym used

both an EEC subcommittee member and an adjunct professor at the recently formed Boston

University's Wheelock College of Education and Human Development, a merger of Boston

University and Wheelock College in 2018. (Note: the researcher on this case study is an alumnus

of Wheelock College.) Alicia Wells and Megan (a pseudonym used) are both Associate

Commissioners within EEC with Alicia as Associate Commissioner of Audits and Professional

Qualifications and Megan as the Associate Commissioner of Workforce Development. Elizabeth

Losee is the Director of Education Effectiveness Policy within DESE. James (a pseudonym

used), is a Massachusetts State House Representative, is a current member of the 2019-2020

Joint Education Committee. Pam Roux represents EEC as the person responsible for Workforce

and Educational Technology.

Table 2 represents all of the documents that have been reviewed from the Department of

Early Education and Care. All of the government documents, videos, and website are publicly

Table 2
List of EEC Materials Reviewed

Type of Material	Name of Material
Government Document	2018 Child Care Market Rate Survey Final Results
Government Document	Child Care and Development Fund Plan 2016-2018
Government Document	Core Competencies for Early Education and Care Educators
Government Document	Economic Impact of Child Care in MA
Government Document	EEC Annual Reports 2013-2017 (5 documents)
Government Document	EEC Regulations 2010
Government Document	EEC Strategic Plan 2014-2019
Government Document	EEC Workforce Development System Update March 2009
Government Document	Policy Statement: Orientation to EEC
Government Document	Policy Statement: Professional Development
Government Document	Professional Development System Study: Interim Report
Government Document	Professional Development System Study: Year 1 Report
Government Document	Professional Qualification Certification Application
Government Document	QRIS Center-Based/School-Based Standards
Government Document	Recommendations: EEC Operations and Finance
Government Document	Report on the Federal Preschool Expansion Grant
Public Records Request	EEC Board Minutes 1/2015 through 1/2019 (39 documents)
Public Records Request	PQ Registry and LM Data
Video	EEC Board Meeting: October 10, 2017
Video	EEC Board Meeting: November 14, 2017
Video	EEC Board Meeting: January 9, 2018
Video	EEC Board Meeting: February 13, 2018
Video	EEC Board Meeting: April 10, 2018
Video	EEC Board Meeting: May 8, 2018
Video	EEC Board Meeting: September 12, 2018

Video	EEC Board Meeting: December 11, 2018
Video	EEC Board Meeting: January 8, 2019
Website	MA Department of Early Education and Care

available on EEC's website. Additionally, several public record requests had been sent to EEC

for additional data on EEC activities pertinent to the research including meeting minutes from

the Board of Early Education and Care, which oversees the department, and data regarding

certification levels of early educators from EEC's Professional Qualification Registry. This

registry is required of all early educators and provides EEC data on certification levels, degree

completion, and professional development workshops taken by each early educator throughout

Massachusetts. Except for the public record requests, all documents, videos, and website were

reviewed before interviewing anyone from EEC or DESE and helped to shape the questions

asked of each participant.

A third list of materials (Table 3), represents additional materials reviewed for the case

study, including proposed bills and current laws pertaining to early educators in Massachusetts.

Many of these materials were used to help conduct the interview with James, as his committee,

Table 3
List of Additional Materials Reviewed

Type of Material	Name of Material
State Bill	MA House Bill 470, 2019
State Bill	MA House Bill 507, 2019
State Bill	MA House Bill 552, 2019
State Bill	MA House Bill 553, 2019
State Bill	MA Senate Bill 240, 2019
State Bill	MA Senate Bill 265, 2019
State Bill	MA Senate Bill 288, 2019
State Law	Chapter 15D: Department of Early Education and Care
State Law	Chapter 215 (2008): An Act Relative to Early Education and Care
Website	MA Department of Elementary and Secondary Education
Website	MA Legislature
Website	National Center for Education Statistics

will be voting to approve these bills to the whole for a vote in the 2019-2020 legislative session.

Main Themes

After a review of the transcripts of each interview and a review of all documentation,

three main themes have emerged, each with several sub-themes. Theme one focuses on the

historical perspectives of early education in Massachusetts including the formation of the

Department of Early Education and Care (EEC) in 2005, the development of the Quality Rating

and Improvement System (QRIS) for EEC, the switch from care based focus to a more

educationally focused system within EEC, and the disconnect between EEC and the Department

of Elementary and Secondary Education. Theme two revolves around quality and retention of the

workforce in Massachusetts including looks at current credentialing, a new credentialing system

currently in development at EEC, and voucher funding reimbursement. Theme three gives

attention to higher education and professional development in early education, specific to

Massachusetts.

Theme One: Historical Perspectives

Throughout many of the interviews conducted and materials gathered, the history of early

education and EEC had been commented on to discuss parts of early education within

Massachusetts. These historical perspectives comment on the formation of the Department of

Early Education and Care in 2005, the public/private debate between early education and

elementary and secondary education, and the push over the last 10 to 15 years for the Quality

Rating and Improvement System (QRIS) in early education programs throughout Massachusetts.

  care, education, or both?

The Department of Early Education and Care (EEC) was formed in 2005 to succeed and

combine the Office of Child Care Services (OCCS) with five Department of Education programs

including Community Partnerships for Children, Early Childhood Special Education Allocation

Grants, the Massachusetts Family Network and the Parent/Child Home Program, Early

Intervention through the Department of Public Health, and Head Start through both the

Department of Education and the Administration on Children, Youth, and Families (Rennie

Center for Education Research and Policy, 2008). According to EEC 2017 Annual Report to the

Legislature (2018), the department was established:

> …to provide "the foundation that supports all children in their development as lifelong
>
> learners and contributing members of the community, and supports families in their
>
> essential work as parents and caregivers." The Department of Early Education and Care
>
> serves as the entry point of Massachusetts' birth to 21 education pipeline. "Early
>
> education and care" includes formal programs for infants, toddlers, preschoolers, and
>
> school-age children during out-of-school time; group homes; foster care and adoption
>
> placement agencies; and residential schools for children with special needs; as well as
>
> programs in informal settings such as home visiting, and community-based family
>
> engagement networks that provide literacy and other developmental activities for children
>
> and parents in libraries and adult education centers. The Department of Early Education
>
> and Care endeavors to deliver the most effective high-quality, comprehensive early
>
> learning and development system in the nation. This requires ensuring that the 9,000
>
> programs we license meet safety and best practice standards through regulatory review,
>
> technical assistance, and monitoring, and are supported in advancing to higher levels of
>
> quality through a system of standards and support. At the heart of a high-quality and
>
> comprehensive early education and care system are its educators, and the Department
>
> works to build the knowledge, competencies and career pathways of the 100,000

educators who comprise our workforce and are key to closing the early achievement gap

and ensuring that all of our children enter school ready to succeed.

When asked about the evolution of early education in Massachusetts, Alicia noted that there had

been a change in recent years from a care based system to a focus on early education:

> I think the history has been, we've been an agency that provides care. We give a voucher
>
> so someone can go and have care somewhere, so that a parent can go to work and I think
>
> that's evolving. And it's changing and I think it needs to change. But I think once that
>
> kind of mindset has changed, then I think funding is key.

Amy agreed with Alicia and went a step further to talk about societal norms of early education:

> I think it comes down to the historical context. I think it comes down to a belief in society
>
> that was easier to take care of little kids. I think the compensation piece, obviously is
>
> essential to this, and if we're only paying people $23,000 a year. What can we expect
>
> from them to pursue higher education? I'm sure the unions have played a part and then
>
> making sure, you know, the elementary schools teachers are, you know, have a union and
>
> have collective bargaining and education can be used as a lever in those negotiations. So I
>
> think as early education becomes more organized and maybe understand the connection
>
> between higher education, better credentialing to sums and outcomes for children. I think
>
> we have a lot of work to do. I think history plays a large part of it.

Part of the change in early education comes from demographics, as Pam noted:

> The demographics of the field were very different at the time as were the economics of
>
> living in the world, right? So the demographics of the field at the time were almost
>
> exactly the opposite of what they are now, about 80% of the people that came into early
>
> Ed were people that had a degree. However, they were by and large people who had an

elementary Ed or a K through 12 degree. And oftentimes it's predominantly women, that

hasn't changed, the demographic.

Pam also noted that parents with young children preferred the hours of working in early

education as well:

And often times they came into this field pretty frankly because they had ... they were

teachers, they had young children, and they needed the kind of hours at work for a parent

with young children. However, what they didn't have, because there were very few early

education and care type of degree programs at the time, are early Ed specific associates

and bachelor's program.

early education and care vs. elementary and secondary education.

Early education has been separate from elementary and secondary education. EEC states

that one of their strategic goals is that "All young children in the Commonwealth will be ready to

enter the K-12 education system" (EEC, 2014b), but in doing so is still disconnected from the

other department. Part of the disconnect between early education and elementary and secondary

education has been around accountability and clear standards, Elizabeth notes:

I'm not sure we're there yet, but I think that those efforts are under way to have less

differences between the expectations. I think that there's more accountability in K-12 to

be honest. Good or bad, however you want to see that.

Elizabeth mentioned that with ESE, there are clear curriculum frameworks in place that may not

be in place for early educators working in EEC licensed centers:

I think one of the things that I want to make sure I'm really clear on is that when I say

what expectations are, that's based on our curriculum framework and not necessarily

MCAS and I think it's really important that we stay focused not on the assessment but on

the framework and the standards of which we're saying kids need to know because if the

kids are being taught the framework, MCAS is just one of the assessments that teachers

should be using among many others and not the thing that you're actually teaching

around, but you're teaching based on what's in the framework.

Elizabeth went on further:

Because of just having greater clarity, for lack of anything better, is that the clarity in

which we've defined what content expectations look like at each one of the grade levels it

then allows the teachers to know the kinds of things that they should be making sure that

they're including in their curriculum and in their teaching.

Amy commented that there are many reasons why there is a disconnect, mainly starting with the

public:

What we have learned is that the local level, most people have no idea how many

children there are in the community, where they are, what they need. I think as advocates,

that has been very jarring to us and so while we continue to advocate kind of broadly for

state funding, we believe that the way this is going to get done is by looking at Holyoke

and understanding what the Holyoke means and then coming up with the funding to

support that, because the mixed provider system can be very complicated because

availability is not equal across the state. It's really about local communities trying to solve

the problem, and with the support of the school districts because I think we've seen it as

an, us versus them, which is ridiculous.

Amy continued, talking about how the lack of useful data has not helped matters:

I think it's the memorandums of understanding between the public system and the private

system, and we've been doing a lot more work looking at the local community level and

we don't have good data. So how can we kind of solve that early ed system locally to think about children birth through five, what do they need, what do the families want and need, what does the current workforce look like to get to that need? And then kind of what's the work that we have to do?

Other states have started the push for developing relationships between the public and private education systems as Amy notes:

We've watched other states as they have used mixed providers systems around pre k developing relationships with the districts where then you can have bigger economies of scale purchasing power. We've seen some of those without losing the unique identity and kind of why people choose smaller centers, you know, some people choose, but there should be enough support, you know, everybody has a role to play and there should be a level of support no matter if you're public or private.

Amy concluded:

There's enough work for everyone to play a role, but I think where we have struggled is to make sure we're valuing the birth to five community as part of that system, and we have seen progress and superintendents and mayors who understand that even if they never serve that child, they care about that child because they're eventually going to come to the district.

qris push.

The Quality Rating and Improvement System (QRIS) is a systematic approach to quality in early education programs, used in many states across the United States. Amy spoke to what the need for the Quality Rating and Improvement System (QRIS) approach was in Massachusetts:

[It] was about, agreeing on what quality was, and so it was a degree use of an assessment tool, use of a curriculum, it was kind of like they had years of discussion to get there, and then that funding basically supported programs who were already doing these things with no support from the state. Right? Because you could do that or you can help support programs that aren't doing anything, you know, to get to the next place.

Amy continued, talking that QRIS was something not done in Massachusetts before 2010 with many other states using the system to increase quality. She noted that it did not come until Massachusetts participated in a federal grant program *Race to the Top*:

Then when the race to the top came to town, which you had to have a QRIS system to get that money. So as a result, we had 50 different QRIS's in the state. There's no across the board measure of quality. Everybody has their own. So, yeah. So I think we're always going to have some sort of measurement, but you know with anyway accreditation now states are like why would we get accredited in some states, and then accreditation and they're curious like states like ours did not. So then there's this kind of an onus on the providers. It's like well what do you do? And what does quality mean? And I think we've seen states like Pennsylvania, North Carolina that have used QRIS as like an infrastructure to move quality and we just, and they funded it and we just haven't done it.

QRIS appears to have mixed support in Massachusetts, including in funding. Megan notes:

The only thing I've heard is that, yes, there have been prior mandates, mainly within QRIS as well, but there were a lack of supports to really help folks to accomplish those higher goals. And so it became sort of a ... not unfunded ... Well, in QRIS, it felt like the BA was to be aspired to, but then the supports weren't behind it.

The standards themselves could be to blame without a support network for programs to access. Megan continued:

I think there's certainly ambitious standards that programs were asked to meet, and I think there was a struggle in terms of accessing enough supports to help them attain those higher standards. And we know that any requirements around staff are really a challenge for programs.

Amy also spoke of the challenges of using QRIS within Massachusetts:

But I think there is a challenge still that we have to, I think we'll always have some measure, but I think the acronym QRIS, who knows how long that will last. You know, we're still struggling like our first QRIS had like a million indicators. And we were on that committee and people talked about hand washing. We have the highest licensing standards. So sometimes our licensing standards are higher than levels of QRIS in other states. So it is a challenge when they think across the board. I think we'll always have a measure, but I think we've gotten stalled because no one's demanding it. Parents aren't demanding it, you know, programs aren't demanding it. So I think there's a lot behind that.

As of the end of 2017, only 28 programs have achieved QRIS Level 4, which is considered the highest quality in QRIS as identified by Massachusetts. 219 programs have achieved QRIS level 3, which represents high quality in QRIS as identified by Massachusetts. 1,522 programs have achieved QRIS level 2 and 3,462 programs are at a QRIS level 1 (EEC, 2018). These numbers are represented in Table 4. Large and small group programs are required to participate in QRIS, however are not required to progress beyond QRIS level 1. QRIS level 1 represents basic licensing requirements as required in the 2010 regulations (EEC, 2010, 2014c).

Table 4
QRIS Level by Number of Programs in Massachusetts at End of 2017

QRIS Level	Number of Programs in Massachusetts
QRIS Level 1	3,462 Programs
QRIS Level 2	1,522 Programs
QRIS Level 3	219 Programs
QRIS Level 4	28 Programs

Note: Adapted from *"2017 Annual Report to the Legislature."* by Massachusetts Department of Early Education and Care, 2018, p 21.

QRIS standards in Massachusetts have specific sections dedicated to educational requirements of staff. QRIS level 1 has no set educator requirements aside from basic licensing regulations. QRIS level 2 requires 50% of classrooms to have an educator with a bachelor's degree or higher who work in a full day program. All educators also must have a minimum of three college credits in early childhood education courses. QRIS level 3 programs must have 75% of classrooms to have an educator with a bachelor's degree or higher who work in a full day program with all educators receiving professional development annually on assessment including

Table 5
QRIS Workforce Qualifications by QRIS Level

QRIS Level	Qualifications
QRIS Level 1	No requirement aside from licensing regulations: Educators have 1 class in child development and 9 months of work experience to receive certification.
QRIS Level 2	50% of classrooms have an educator with a bachelor's degree or higher who work in a full program day, all educators have a minimum of 3 college credits in early education courses.
QRIS Level 3	75% of classrooms have an educator with a bachelor's degree or higher who work in a full program day, educators receive professional development in assessment including screening, observation and use of assessment protocols.
QRIS Level 4	100% of classrooms have an educator with a bachelor's degree or higher who work in a full program day, educators have a

| | minimum of 30 credits in early education, educators have annual professional development in mentoring/coaching/supervision and curriculum. |

Note: Adapted from *"MA QRIS Center-Based/School-Based Standards."* by Massachusetts Department of Early Education and Care, 2014c.

screening, observation, and use of assessment tools. QRIS level 4 requires 100% of classrooms to have an educator with a bachelor's degree or higher who works in a full day program and all educators have to have a minimum of 30 credits in early childhood education college level courses. Educators must also have annual professional development in mentoring, coaching, supervision, and curriculum (EEC, 2014c).

Theme Two: Quality and Retention

Theme two focuses on quality and retention within early education with a specific look at the current credentialing system for early educators in Massachusetts and a conversation around a new credentialing system in the works at EEC. The last section looks into how voucher reimbursement rates affect the quality and retention of early educators in Massachusetts.

current credentials.

The current credentialing system in Massachusetts, as outlined in the 2010 regulations have not been changed in the last 40 years, throughout the various EEC predecessors, according to Pam:

These requirements haven't been changed since, as far as I know, the inception of our predecessor agency. It started out with OFC [Office for Children] I think 38, 39 years ago. OFC and then it was OCCS [Office of Child Care Services] and now it's EEC with always some additional changes along the way.

The process of receiving the EEC teacher certification has primarily remained the same as well over the last 40 years. Alicia says that it is "still the paper process of submitting your work experience and your transcripts."

One issue that has been worked on over the last few years was in trying to clarify the requirements for educators to become credentialed at each level. Alicia noted:

They weren't sure if they were wanting to be certified at what level or sometimes they would just submit the transcript and not an application. The work experience form wasn't completed. So it was just, there was no clarity on the actual process. And so people were being denied on things like if they would've known ahead of time, they would have understood. Another aspect is not understanding the courses and how they were linked to the categories of study that were required under the certification process. It's just the list. 13 categories, no real definition of what those mean. So back in the day, you just assumed that if you took this course, it met that category.

More recently, this has changed as Alicia has stated:

So now we have those objectives. So now if you're looking at program planning and environments and you're looking at the course that you'll take, does that correlate with the objectives that we put in place? So that has shone a light on a lot of people to know, okay, if I take this course, where does it fit in the category? But also it helps the staff to know, to provide assistance to educators as well on the other end.

When asked about teacher requirements at its current level, James said: "I think they should be a bit more stringent, or the standards should be a little, bit higher." This statement was reflected in what was some of the most important things early educators should know. Megan noted that "it's certainly a nuanced and balanced one in which there is acknowledgment that, because of the demands of the work, the demands of the educators should also be commensurate." Alicia noted several important requirements:

It's a combination of the education and work experience that's key. I think child growth and development speaks to caring about the child and understanding their emotional status and kind of that psychological thing, that speaks to care. And so that's what was in that 2010 regulations and that's why it's from back there. And so we've evolved where we do provide in early education I believe, I believe it. Yeah. I think additional education is required because if we're asking for a curriculum to be taught in the classroom and the lead teacher may oversee it, but then the teachers are actually doing the work then yes. So I agree that more education is required for, because if, I think that is almost the assistant level, assistant teacher level is that child growth and development and some work experience. But once you move to teacher level, I think additional, whether it's intro to early education, early childhood education is the course or what have you, whatever those intro courses may be. Program planning, classroom management, you're a teacher, you still would need to know how to manage the classroom. So all those courses that are at lead teacher, I think right now where we are, it should be at teacher level.

Amy agreed:

I think knowledge of child development. So I would say making sure that you have a good foundation of child development, making sure you understand how to differentiate, you know, curriculum, work with families, classroom management. And I would also include working with other adults, which I think gets overlooked. I do think the child development is the key part.

There was some talk about requiring a Bachelor's degree to the requirements for early educators as Amy notes:

The 2008 Workforce Development Task Force, which was created, I can't remember when, but that group would not recommend to BA. There was so much back and forth about it. It was crazy. I do think there's also been some hesitation about setting requirements that would be unattainable and think about the incumbent workforce and what it might look like if everybody was 22 years old and had a BA degree. I think there would be unintended, well, some intended consequences for that.

Megan noted that not all degree programs are created equal. The Child Development Associate (CDA) credential and Associate degree programs often have more content for early educators than that of Bachelor degree programs.

There's a strong evidence that the CDA is a very effective training credential in that it does focus squarely on the child development and the work of the educator in the program and in the classroom. And then we know also that the AA embodies much more early education content than BAs necessarily…we really feel that preparation for the work needs to be centered in practice, and so that's something that we're talking a lot with our higher education partners about, how they can embed more practice-based experiences within their programs of study.

Alicia did note that educators from out of state are looking to get certified in Massachusetts:

We've even seen people out of state who don't anticipate moving here or living here or wanting our certification because it holds some value in some other states. It is very interesting to us because we think our certification needs a lot more. But they were like, no, like they want it, they want to take that, or they moved like, can I get a copy of my certification because I can use it here but we don't take any other state certification.

new credential development.

There is a new educational credentialing system being developed by EEC for early educators in Massachusetts. With the current system being a certificate that does not need renewal, Pam explains:

We're going to change it from a certificate to a credentialing system. So credentialing system is renewable. Right now the certificate is not renewable, and it's going to move more broadly to all program types.

Megan said that this system will expand across the complete early education workforce in Massachusetts.

[EEC is] …expanding the current certification system into a credentialing system for all of the workforce moving forward. And within that work, we'll be outlining the requirements for each level of certification. And we will be looking to enhance those requirements to better match the expectations of the roles. And that's going to be quite a lift for the field, but it's something that we want to aspire to and also support the transition to over time.

When further asked about what a transition to the new credentialing system would be like, Megan stated:

The transition's going to look differently for different segments of the workforce. So right now, center-based staff are used to a certification process, so this would be a revision to that. And the enhanced requirements would require additional support. But we would look to grandfather in existing staff and give them time to either progress through the career ladder or, if they so choose, stay at their current level. I think it's going to be much different for family childcare and out of school times staff in that this would be a wholly new process for them. And so we'll have to think about acclimating those folks to really

formalize credentialing roles within our system. And also, at the same time, aspiring to

meet enhanced qualifications as well.

Alicia has also been involved in the process of creating this new system:

I've been involved in a lot of the career lattice piece. And so what that is looking at is

how can we bring, add on additional levels to the credentialing process? So not everyone,

you get to lead teacher and there's director. Not everyone wants to be a director of a

program. They love being in the classroom. So do we add an advanced teacher level or a

master teacher level? So that's what we're looking at. So you're a director, but are you

more of administrator rather than a director in that role? Or can someone be a coach or

can we bring them through that training and those, those are the things we're looking at

the career lattice, and also add an apprenticeship role. I think right now it's like you can

be an assistant teacher at 16. You're in the classroom with a teacher that's before you

become teacher level.

There is not a designated timeline as to when this new credentialing system would be complete

as there are competing factors involved. Megan explains:

We envision this is multi-year work that we would because we're using a points-based

system, inherent in that will be some flexibility in which people can aspire to the higher

qualifications. So we're trying to make it as flexible as we can, give folks time to meet

enhanced requirements so that we don't destabilize the field.

While EEC is on a multi-year plan to create and implement the credentialing system, the

Massachusetts Legislature may be on a different and quicker timeline. Massachusetts House Bill

553 (2019) would require that this credentialing system be complete by December 31, 2019, with

a report sent to the Joint Education Committee by the date. As of this dissertation, the bill has not

been voted out of committee. Ultimately, the new system is complicated and needs to be done correctly, accordingly to Megan:

> [It] is weighed against the challenges that we know exist in the field already around recruitment, retention, compensation. And so this idea of enhancing qualifications needs to also be balanced against those challenges as well. So the conversation is a very complicated one.

voucher funding for retention.

Voucher reimbursement rates are state-funded rates that child care centers receive for taking a child who is considered low income. These reimbursement rates are dictated per year by the Massachusetts legislature and are required to go towards rate increases for educators in centers that take vouchers, as it is not required of child care centers to take on any children with vouchers. Any child care center that chooses to take children with vouchers are contracted as Alicia explains:

> So there are contract requirements, so there is a rate, will be called a rate reimbursement certification form that providers do have to sign that say, they agree and attest to that this funding, there was only three areas that they can apply it to, which was salaries and raises, fringe benefits and professional development.

When asked how EEC keeps track of this, Alicia stated:

> We have two auditors. So the ones that are directly contracting with EEC, what we've done is ask them to submit that information to us. The list of staff who received the raises. Well, the raise percentages and what, kind of the end result of that because they have to do that by the end of the fiscal year, each year, every time there's a shift. So there's another one this year, so then they have to present that information by the end of

the fiscal year. So anyone that has a voucher agreement or a contract that is the requirement that they, and then, so if we hear a complaint that that has not happened, then we have the authority to go and investigate because that re-certification agreement says if you did not apply those ones, we could take all those ones back.

Megan notes that EEC only has limited ability to provide increases:

We do try to address some of the compensation issues through wage increases. And recently, in recent years, we've been doing that consistently. But that's still in the context of a broader issue, in that we don't set private wage scales.

James, as a member of the Massachusetts House, commented that "we did provide some raises, I believe, for early educators. We are spending more time on improving quality than we are on expanding access right now." The rates increases from 2013-2017 are outlined in Figure 4, with an increase between zero percent and eight percent depending on the year. The language as to how Massachusetts dictates voucher funding is spent feels loose according to Amy:

I mean, it is that the language is very loose and other states have kind of asked us like if we're fools to trust the legislature, but we know that's where the money has to go because that's where they have to, we could probably do a better job, but being more prescriptive. But it's not like anyone's buying Cadillac's.

Figure 1. Subsidized Rate Increase by Year, 2013-2017

Subsidized Rate Increase by Year

Rate Percentage

10

7.5

5

2.5

0

3   FY 13
FY 14
1.394   FY 15
3.6   FY 16
8   Fy 17
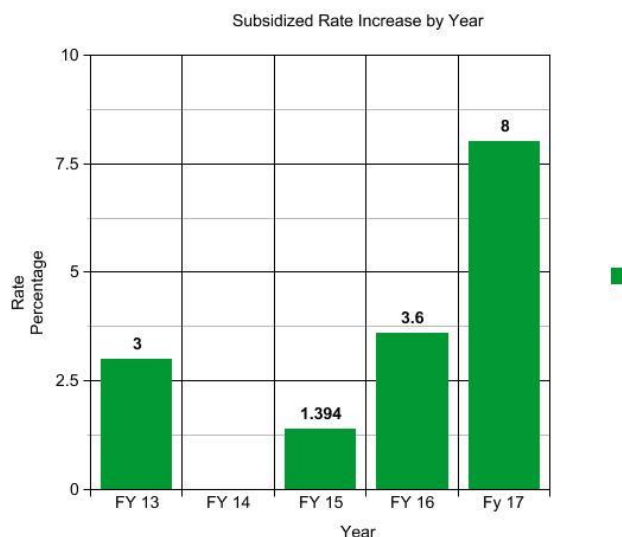
Year

Figure 1. Subsidized Child Care Rate Increase to Child Care Centers by Year in Massachusetts, Fiscal Years 2013-2017 (Compiled from EEC Annual Reports 2013-2017)

It was recommended by the Special Commission on Early Education and Care Operations and Finance Report (2013) that "EEC should analyze its current method of reimbursement and consider adopting other rate structures." This would include:

> Any new rate structure should have a method of how to best incorporate quality into its rate structure. Any new rate structure should take into account the true supply and demand of child care. Any new rate structure should take into account the median salary of a first year public preschool teacher with comparable educational background. Any new rate structure should take into consideration the impacts of EEC's affordability policies on all families and providers.

Theme Three: Higher Education vs. Professional Development

There were multiple conversations around higher education and professional development in early education including access to training and resources, whether degree programs meet the needs of early educators, and if professional development without degree programs is enough to meet the demands of early education.

professional development.

Professional development represents not only colleges and university level courses but also sessions held by an individual or group to gain further knowledge in a subject matter. Required by EEC to have all full time educators working in large group child care settings to have 20 hours of professional development per year (EEC, 2012), Amy noted that we do not always know who is providing professional development to early educators:

I do think some professional development opportunities can help insight and spur some further interests, but I think we've seen mentoring, coaching and I think there are some dangers around that because it becomes like an equal opportunity employment act for people who think that their coaches, but it's, you know, some kind of, we don't have a professional training for trainer registry and they're like, who is delivering the training?

James noted that more access to training and resources should be available to people of color:

[I] believe that the access to the training and resources needed to meet the expectations that we have for early education teachers should be more available to focus particularly in low-income communities, so that they can even begin to have access to the training and education needed. One of the lessons that I think we can learn from the qualifications that are needed for general educations, K-12, is that while the standards are so high is great. A lot of times that may be a barrier for people of color, people coming from communities that don't have the resources or the institutional support, to go out and get their master's and then pass an MTEL, and do all the other things that are required.

Pam mentioned that technology could provide more pieces of training across the state:

Just seeing the 21st century and economies of scale, it's fairly clear to me that with our very ambitious agenda and such a large workforce, that it's really not realistic to continue

to do everything face-to-face. It's resource-heavy, we don't have a lot of ability to do that,

and we have a huge workforce. And so, I'm marrying all the work that I'm doing with

workforce development, which is a number of things under workforce development, with

moving us forward into the technology space. Because it's year to year we think about

"This is how we're sending our dollars that we have allocated for professional

development for workforce. Are we sending them correctly? What do we want to tweak?

What do we want to overhaul?" It's a constant process I think for us.

Pam concluded that:

Given our limited resources how do we really think more strategically about our

resources to support our educators? How do we build things into our programs to say,

alright it's not enough to say: Here is this great new CDA plus model with our

community colleges that you can go to, that give you the CDA plus support to get you on

a pathway. But how do we recognize who our workforce is and say let's add some

additional funding for stipends or books that we know they can't afford and travel. Cause

guess what, they have to pay for parking at some of these colleges.

Some professional development opportunities are accessed by the early education workforce

through EEC. These continuing education opportunities change in number per year (Table 6).

Table 6
Professional Development Opportunities Supported Through Funding

	Number of PD Opportunities	Number of People Attended
FY 2014:	262 PD Opportunities	3,950 People Attended
FY 2015:	Over 200 PD Opportunities*	5,000 People Attended
FY 2016:	195 PD Opportunities	Just over 4,500 People Attended*
FY 2017:	195 PD Opportunities	6,300 People Attended

81

Notes: *EEC estimated these and exact numbers are unknown. Compiled from EEC Annual Reports 2013-2017.

In fiscal year 2014, there were 262 professional development opportunities with 3,950 attending. In fiscal year 2015, this grew to over 200 professional development opportunities with 5,000 people attending. Fiscal years 2016 and 2017 both saw 195 professional development opportunities with just over 4,500 people attending in 2016 and 6,300 people attending in 2017 (Compiled from EEC Annual Reports 2013-2017).

degree programs.

Degree programs have been a back and forth concept for a requirement for early educators since the inception of EEC. Amy mentions:

I think there has been a discussion about whether a BA degree is the answer, and I think what we have seen in higher ed as they have responded to the need, we have seen places be innovative and you know, thinking about what skills are needed on the ground and then what that looks like in Higher Ed. From my teaching, I would say that a practicum has to be included, and whether that's through higher ed or higher ed is part of someone's work experience so that there's a kind of structure to it.

Amy went further noting that community college has been filling the void for early education in a way that other colleges have not.

I think what we found was a community college was filling that void, and being, like I said, more innovative. So I think it's a financial thing. I think it's also, I mean it's interesting right now with Wheelock and BU, because I think there's some question about what that looks like, because I think Wheelock has a stronger early ed program, but the politics of, you know, what does that look like at a BU where I think the promise is huge. We need a big urban university that has a good big program.

Wheelock and Boston University merged in 2018 to create the Boston University's Wheelock College of Education and Human Development, merging Wheelock College with Boston University's School of Education. Amy also noted the fact that as Massachusetts was setting up an early educator scholarship, many colleges and universities were closing their early education programs.

> [Massachusetts] create[d] the early educator scholarship, and what we were seeing is that colleges were closing their early ed programs, because why would you go rack up hundreds of thousands of dollars of debt when you were going to make 23?

Noting the fact that colleges have been merging, the researcher did some additional research as to how many early education programs are in Massachusetts colleges and universities compared to elementary and secondary programs. Figure 2 shows degree programs by type: associate, bachelor, and advanced. There are 13 associate degree programs in early education compared to 12 in elementary and secondary education. Bachelor degree programs with an early

Figure 2. Degree Programs by Type
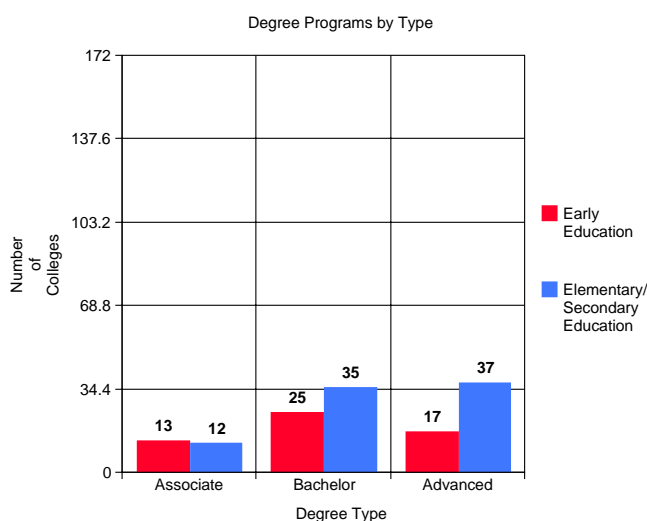
Figure 2. Number of Colleges in Massachusetts with Early Education Degrees vs. Elementary/Secondary Education by Degree Type. (Compiled from https://nces.ed.gov/collegenavigator)

education focus have 25, while elementary and secondary have 35 in Massachusetts. At the

advanced level, meaning master's and doctoral level degree programs, 17 focus on early

education while 37 focus on elementary and secondary education (Compiled from

https://nces.ed.gov/collegenavigator). When looking from a program comparison (Figure 3),

Figure 3. Program Comparison

Program Comparison
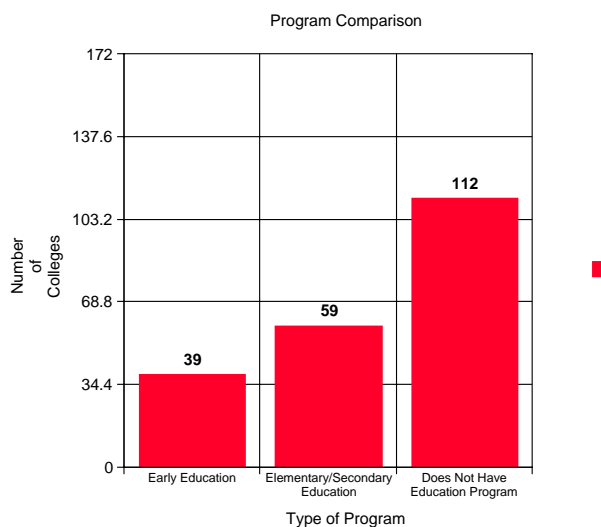
Figure 3. Number of Colleges in Massachusetts with Education Degrees (Compiled from
https://nces.ed.gov/collegenavigator)

Thirty-nine colleges in Massachusetts have a degree of some type in early education, 59 colleges

have a degree of some type in elementary and secondary education, and 112 do not have an

education degree of any type in any form (Compiled from https://nces.ed.gov/collegenavigator).

Travel to these colleges, mentioned by Pam at the end of *professional development,* lead

to some additional research into where early education programs are throughout the state of

Massachusetts. Figure 4 represents all of the colleges and universities that provide early

education degree programs. Most are concentrated in the immediate Boston, Massachusetts area,

with three representing the South Shore, one in Cape Cod, five north of Boston, and a nine in

Western Massachusetts. (Compiled from https://nces.ed.gov/collegenavigator). This represents

22.67% of all colleges and universities in Massachusetts. Figure 5, which represents all of the

colleges and universities in Massachusetts that have a focus on elementary and secondary,

showcases more options with the 59 schools represented throughout a more substantial portion of

the state.

While the bulk of the colleges are still in the immediate Boston, Massachusetts area,

Western Massachusetts received significantly more colleges at 15. Overall, colleges and

universities that provide a degree in elementary and secondary education represent 34.30% of

colleges in Massachusetts (Compiled from https://nces.ed.gov/collegenavigator).

Figure 4. Map of all Early Education Colleges/Universities in MA

Figure 4. The 39 Schools that Provide Any Type of Degree in Early Education, representing
22.67% of colleges in Massachusetts. (Compiled from https://nces.ed.gov/collegenavigator).
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When splitting higher education programs into three separate categories, associates, bachelors,

and advanced degrees, where the programs are wide ranging within Massachusetts. In Figure 6, a

map of all the associate degree programs throughout Massachusetts shows that the there is a

Figure 5. Map of all ESE Colleges/Universities in MA

Figure 5. The 59 Schools that Provide Any Type of Degree in Elementary/Secondary Education, representing 34.30% of colleges in Massachusetts. (Compiled from https://nced.ed.gov/collegenavigator). Image Copyright 2019 Mapline.com. Used with permission.

program available throughout much of the state, though most are in the immediate Boston area

and none are on the South Shore. When you compare that with associate degree programs for

Figure 6. Map of Early Education Associate Degree Colleges/Universities in MA
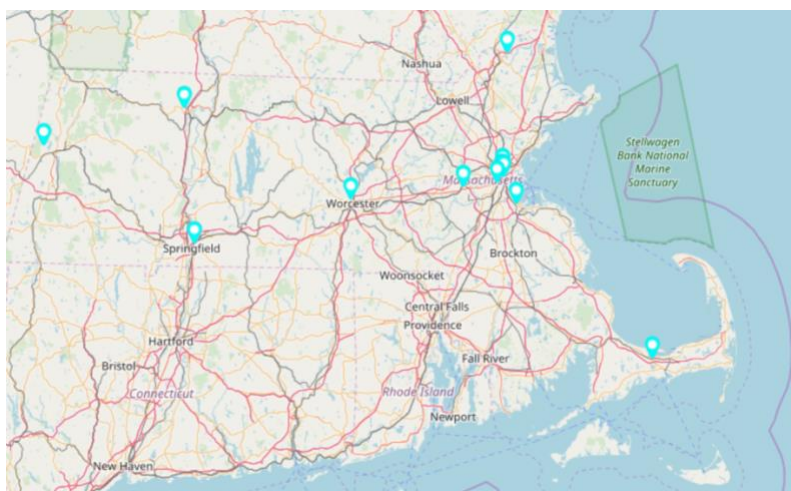
Figure 6. The 13 Schools that Provide Associate Degrees in Early Education representing 7.56% of colleges in Massachusetts. (Compiled from https://nces.ed.gov/collegenavigator). Image Copyright 2019 Mapline.com. Used with permission.

elementary and secondary programs in Figure 7, it is more evenly spread out throughout

Massachusetts with the exception of far Western Massachusetts which does not have an

associates program. There are also more programs North of Boston and one in the South Shore.

Associate degree programs in early education represent 7.56% of the total colleges in

Massachusetts compared to 6.98% of total colleges that have associate degree programs in

elementary and secondary education (Compiled from https://nces.ed.gov/collegenavigator).

Figure 7. Map of ESE Associate Degree Colleges/Universities in MA

Figure 7. The 12 Schools that Provide Associate Degrees in Elementary/Secondary Education representing 6.98% of colleges in Massachusetts. (Compiled from https://nces.ed.gov/collegenavigator). Image Copyright 2019 Mapline.com. Used with permission.

The number of schools has gone up in for bachelor degree programs in Massachusetts.

Figure 8 represents bachelor degree programs in early education in Massachusetts. The bulk are

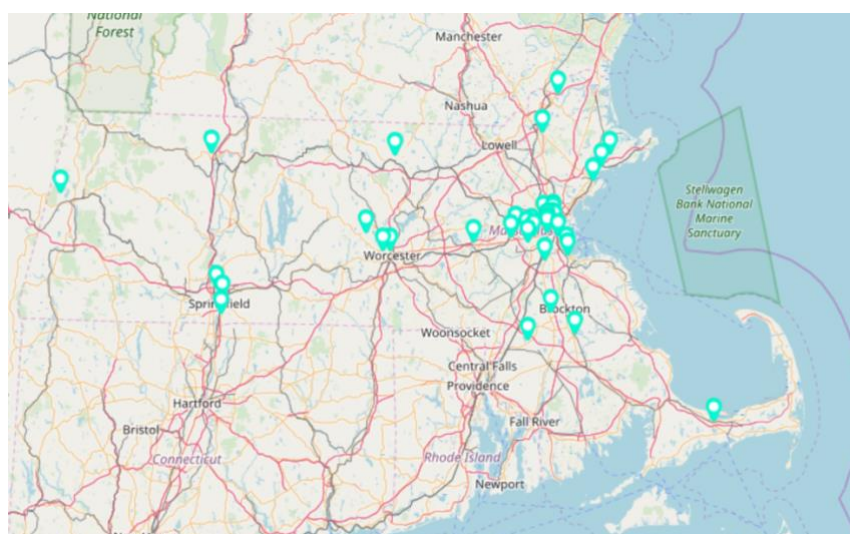Figure 8. Map of Early Education Bachelor Degree Colleges/Universities in MA
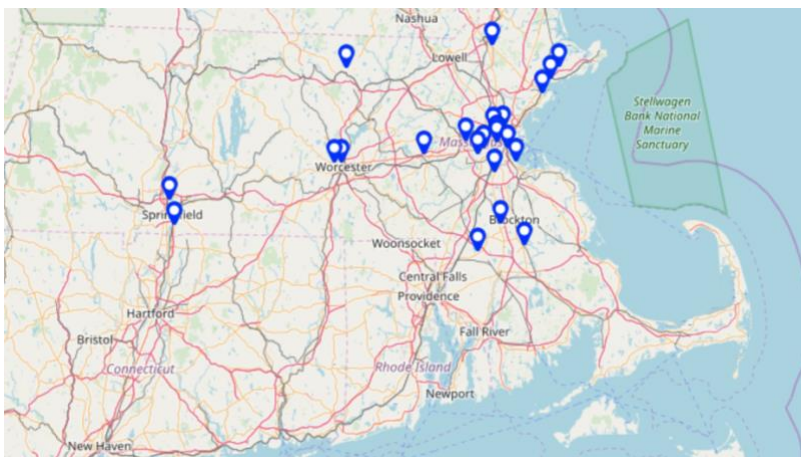
Figure 8. The 25 Schools that Provide Bachelor Degrees in Early Education representing 14.53% of colleges in Massachusetts. (Compiled from https://nces.ed.gov/collegenavigator). Image Copyright 2019 Mapline.com. Used with permission.

in the immediate Boston area with none on Cape Cod and two in Western Massachusetts.

Compared to Figure 9, which represents bachelor degree programs throughout Massachusetts,

you see more programs in Western Massachusetts with an additional program in Fall River.

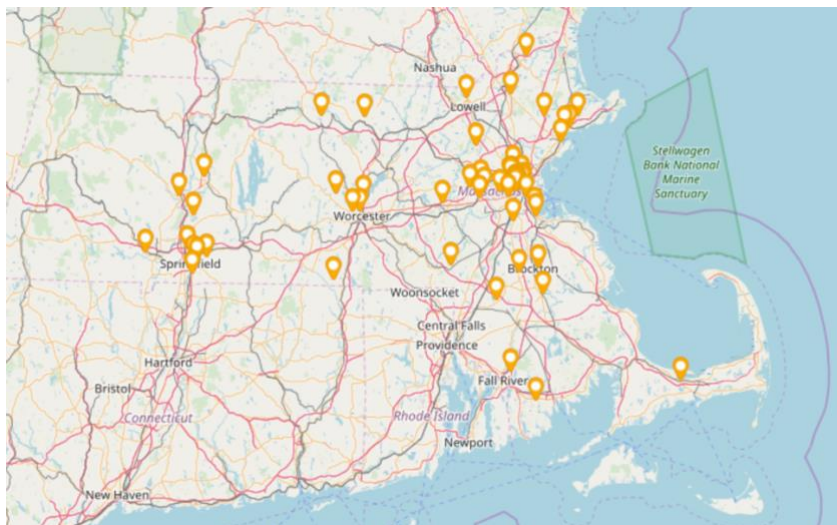Figure 9. Map of ESE Bachelor Degree Colleges/Universities in MA
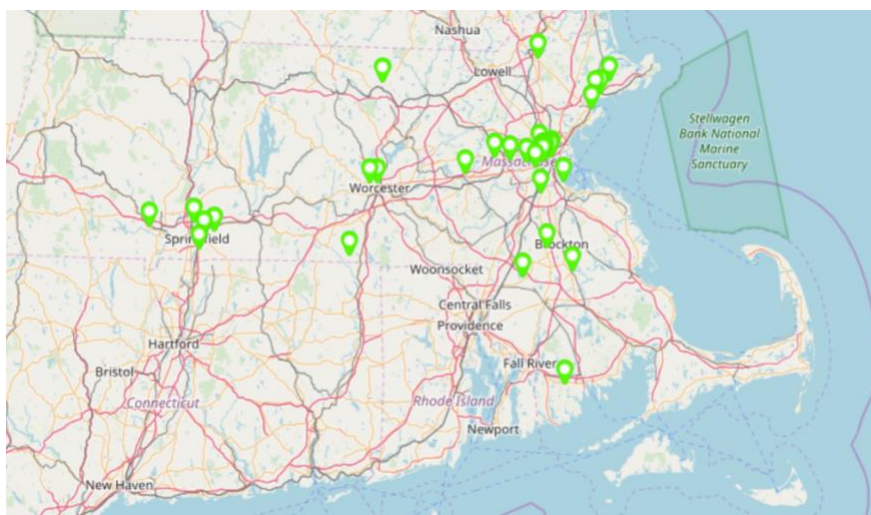
Figure 9. The 35 Schools that Provide Bachelor Degrees in Elementary/Secondary Education representing 20.35% of colleges in Massachusetts. (Compiled from https://nces.ed.gov/collegenavigator). Image Copyright 2019 Mapline.com. Used with permission.

The twenty-five schools that have bachelor degree programs in early education represent 14.53%

of total colleges in Massachusetts. The thirty-five bachelor degree programs in elementary and

secondary education represent 20.35% of total colleges in Massachusetts (Compiled from

https://nces.ed.gov/collegenavigator).

Figure 11 represents advanced degree programs in early education throughout

Massachusetts. Pretty evenly distributed throughout Massachusetts only one college is on the

Figure 10. Map of Early Education Advanced Degree College/Universities in MA
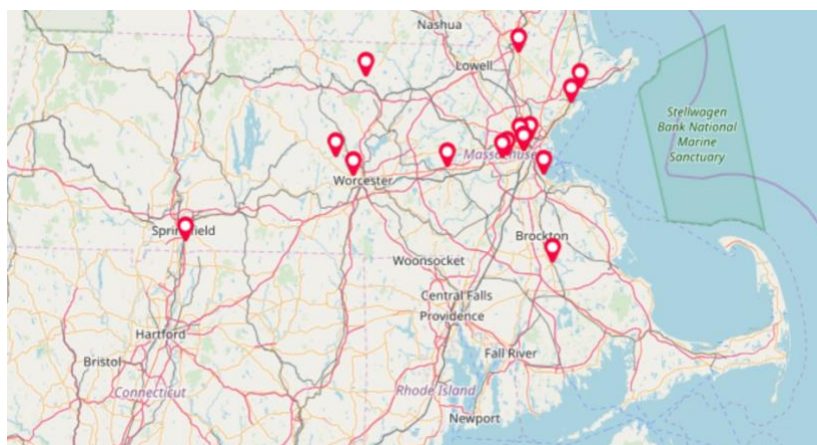
Figure 10. The 17 Schools that Provide Advanced Degrees in Early Education representing 9.88% of colleges in Massachusetts. (Compiled from https://nces.ed.gov/collegenavigator). Image Copyright 2019 Mapline.com. Used with permission.

South Shore, none on Cape Cod, and one in Western Massachusetts. Comparing that to Figure

11, which represents advanced degree programs in elementary and secondary education, you see

a significant increase in the number of colleges in Western Massachusetts at six. It also adds a

program in Fall River and an increase North of Boston. Early education advanced degree

programs represent 9.88% of total colleges in Massachusetts with their 17 programs. Elementary

and secondary education advanced degrees represent 21.51% of total colleges with 37 programs.

(Compiled from https://nces.ed.gov/collegenavigator).

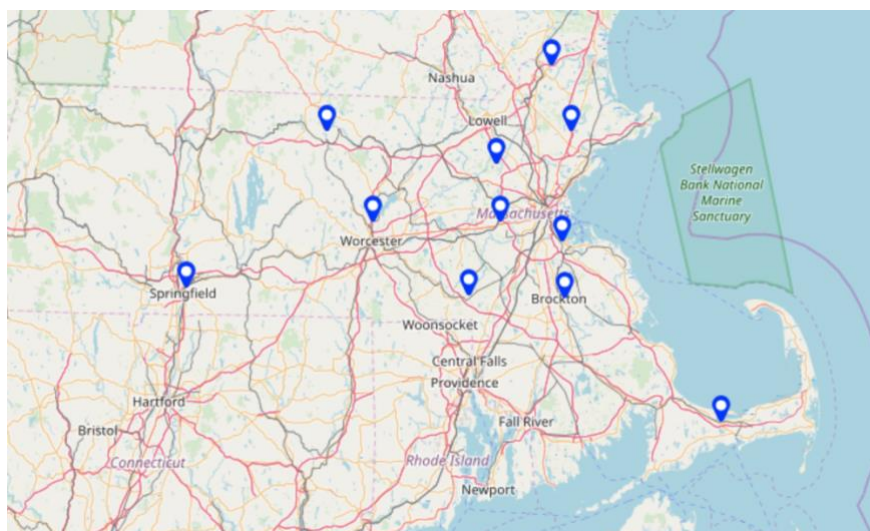Figure 11. Map of ESE Advanced Degree College/Universities in MA
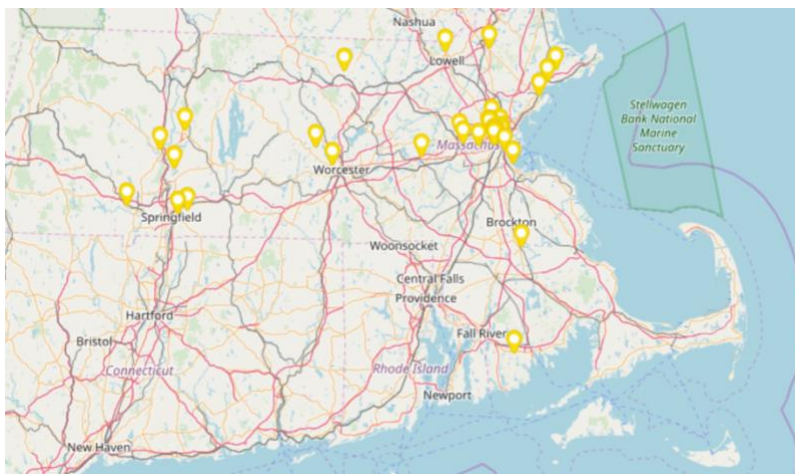
Figure 11. The 37 Schools that Provide Advanced Degrees in Elementary/Secondary Education representing 21.51% of colleges in Massachusetts. (Compiled from https://nces.ed.gov/collegenavigator). Image Copyright 2019 Mapline.com. Used with permission.

The Department of Early Education and Care does provide scholarships to students taking early education courses in Massachusetts through its Educator and Provider Support services (EPS). The number of courses changes per year (Figure 12) as it depends on the number of people seeking the scholarship per year and what courses are available throughout the state. For fiscal year 2014, EEC has paid for educators to attend 101 classes, 100 in fiscal year 2015, 120 in fiscal year 2016, and 115 in fiscal year 2017 (Compiled from EEC Annual Reports 2013-2017).

Figure 12. EPS Classes Supported by Year

EPS Classes Supported By Year
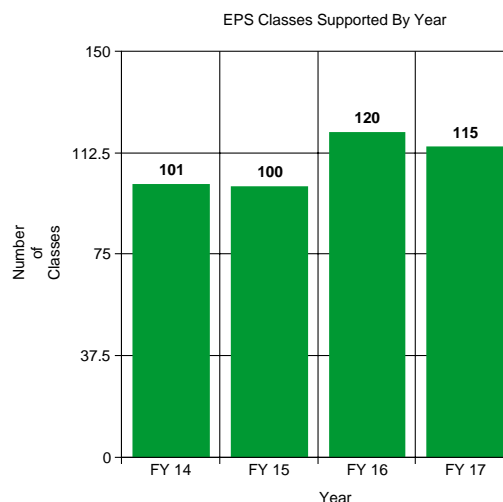
Figure 12. Classes Supported by EEC through Grants, Fiscal Years 2014-2017 (Compiled from EEC Annual Reports 2013-2017).

The number of educators taking advantage of these courses through grant funds includes 1,733 in

fiscal year 2014, 2,878 in fiscal year 2015, 1,939 in fiscal year 2016, and 1,200 in fiscal year

2017 (Compiled from EEC Annual Reports 2013-2017).

Table 7
Students Supported Through EPS College Course Grants

Fiscal Year	Students Supported
FY 2014	1,733 Students
FY 2015	2,878 Students
FY 2016	1,939 Students
FY 2017	1,200 Students

Note: Compiled from EEC Annual Reports 2013-2017.

Alicia mentioned one last piece about how funding has kept early educators from

attaining degrees in the field and that many early educators who do go for degree programs tend

to switch to elementary or secondary education at some point:

I think our workforce is still not where it needs to be only because of funding. I think it's

a funding thing. And then what happens is once some people, I think it's happening in

both ways. You have students who may start like, so take our high school students, they give, they go through their process. They have two years of child development in high school. They get certified, they can articulate to a community college. Then there's a two way program. They get that associate's, then they go forward. They go to Bridgewater State and they get their Pre-K-K license. They go at elementary in education. So no longer do we have them in the early Ed because they see there's money to having that Pre-K3 licensure. So they're working at the public school. But we've also seen the opposite happen on equal. I don't know if it's equal because we're not, we don't have a tracking really of the high school that, but we've seen a lot more people come back to say, the title of public school methodology, and they see value in coming in. So they're taking their licensure and they're automatically lead teacher.

Additional Notes

potential laws.

The researcher reviewed a number of potential laws under consideration in the 2019-2020 Massachusetts Legislative session. MA House Bill 470 (2019) states:

Notwithstanding any general or special law to the contrary, the Commonwealth shall take steps to assure (1) that all children in Massachusetts have access to affordable, high quality early education and child care, including care during non-standard work hours; and (2) appropriate professional development and compensation for early education and care providers.

MA House Bill 507 (2019) would establish a study of requirements for bachelor's degrees for educators in preschool classrooms. It states:

There shall be a special commission established to study and report on a

potential requirement of bachelor's degrees for early education professionals and whether

such a requirement would then lead to more effective early education classrooms. The

commission shall consist of 9 members, as follows: the commissioner of early education

and care or their designee, who shall serve as the chair of the commission; the

commissioner of education or their designee; the commissioner of higher education or

their designee; the house and senate chairs of the joint committees on education and

higher education; a member of the house appointed by the house minority leader; and a

member of the senate appointed by the senate minority leader.

Massachusetts Senate Bill 288 (2019) states:

Notwithstanding any general or special law to the contrary, the

 commonwealth shall take steps to assure: (1) that all children in Massachusetts have

access to affordable, high quality early education and child care, including care during

non-standard work hours; and (2) appropriate professional development and

compensation for early education and care providers.

board meeting minutes.

The researcher has reviewed meeting minutes for the Board of Education and Care from

January 2015 through January 2019 (39 documents) and video of nine board meetings from

2017-2019. While most information of note in these documents and videos were also used in the

annual reports to the legislature, there is a section dedicated to public comments. Over a four

Table 8
Public Comments by Year to Board of EEC

Year	Public Comments
2014	42 Public Comments
2015	50 Public Comments
2016	58 Public Comments

2017	31 Public Comments
Total Comments:	181 Public Comments

Note: Compiled from EEC Board Meeting Minutes 2015-2018.

year period, 2015 through 2017, there were 181 public comments with 42 comments coming in

2014, 50 in 2015, 58 in 2016, and 31 in 2017 (Compiled from EEC Board Meeting Minutes

2015-2018). Of these comments, topics arose from each (Table 9). Topics from the public

Table 9
Comment Categories from EEC Board Meetings 2015-2018

Year	Category	Number of Public Comments
2015	Congratulations/Appreciation	2
2015	Funding	7
2015	Presentations	7
2015	QRIS	2
2015	Reimbursement Rates	9
2015	Turnover/Pay	11
2015	Universal Pre-K	3
2015	Vote to Approve	1
2016	Background Checks	1
2016	CCDGB	2
2016	Educators Receive Higher Education	2
2016	Family Help	5
2016	Funding	4
2016	Head Start	1
2016	Kindergarten	1
2016	Mental Health of Children	1
2016	Presentations	7
2016	Public Policy	1
2016	QRIS	6
2016	Reimbursement Rates	8
2016	Training of Educators	2
2016	Turnover/Pay	7
2016	Violence/Community Engagement	1
2017	Affordability of Care	1
2017	Closing of Early Education Program	1
2017	Affordability of Care	1
2017	Educators Receive Higher Education	1
2017	Funding	20

2017	Healthy Eating	1
2017	IEPs for Young Children	1
2017	Presentations	4
2017	QRIS	14
2017	Reimbursement Rates	9
2017	School Readiness	2
2017	Training for Educators	2
2018	CCDBG	5
2018	Funding	4
2018	Homelessness in Families	1
2018	Parent Assistance	11
2018	Presentations	3
2018	QRIS	2
2018	Reinstate License to Center	1
2018	Turnover/Pay	1

Note: Compiled from EEC Board Meeting Minutes 2015-2018.

changed each year, though a few have remained staples including QRIS, reimbursement rates for vouchers, and funding. Turnover/pay, while a staple in 2015 and 2016 has gone down over a four year period, notably missing in 2017 from public comments and only brought up once in 2018 (Compiled from EEC Board Meeting Minutes 2015-2018).

List of Findings

The following are a list of findings from the results of the case study. These findings represent institutional norms identified from the data, and each institutional norm is focused on in much greater detail in chapter five of the dissertation.

1. The history of early education departments in Massachusetts play a direct role in early educator education requirements.

2. Early education in Massachusetts has been predominantly a care based system, and has, in recent years, been transitioning to an education based system.

3. There are less early education college preparation programs than elementary and secondary education college preparation programs in Massachusetts.

4. Retention of early educators in Massachusetts has been focused on voucher reimbursement rates.

5. Training and resources towards early educators are focusing on early educators with as little overhead as possible to reach the maximum number of educators.

Chapter Five: Findings and Implications

Revisiting the Problem of Practice

The purpose of the case study was to find out *what are the institutional norms in place that contribute to making educational requirements for early educators lower when compared to their counterparts in elementary and secondary education and how these norms keep education lower for early educators in Massachusetts?*

Early educators currently are required to have a high school diploma, completed a three-credit college course in child growth and development with nine months of full-time work experience, and/or have a Child Development Associate (CDA) credential, or successfully graduated from a two year high school vocational program in early education approved by EEC (EEC, 2010). This is in contrast to the requirements of elementary and secondary educators which includes two forms of license. Initial and Professional. Initial licensure requires a Bachelor's degree in education, passed all required Massachusetts Tests for Educator Licensure (MTEL) and has completed an approved educator preparation program. It is valid for five years of employment and can be extended once for an additional five years. A professional license requires that the person hold an initial license in the same field as the professional license that is sought after. They must be employed under the initial license for at least three years, completing a one-year induction program with a mentor and at least 50 hours of mentored experience since that first year, and hold a Master's degree with at least 12 credits of graduate-level courses in subject matter knowledge for the license sought (Massachusetts Department of Elementary and Secondary Education [DOESE], 2018b).

Review of Methodology

The methodology took the form of a case study with a theoretical framework of social rule systems theory to conduct qualitative research. Social rule systems theory takes an institutionalist approach to explain how culture, society, and laws are developed over time. The research used an approach by Yin to conduct the case study. This allowed for a narrow focus on the subject, the Massachusetts Department of Early Education and Care, and allowed for material from publicly available EEC documents, videos of meetings, and interviews to be triangulated concisely to be presented.

There were six interviews conducted throughout the case study. These interviews followed the interview protocol form and Institutional Review Board policies (see appendix A and D). These six individuals were identified as individuals who create and implement educational policy throughout Massachusetts including the Department of Early Education and Care, the Department of Elementary and Secondary Education, and the Massachusetts Legislature. These individuals were emailed once Northeastern's Institutional Review Board approved the researcher's application.

All interview transcripts and other documents and materials were, and continue, to be kept confidential, were transcribed using Rev.com and stored on the researcher's password-protected computer in a DropBox password-protected folder. All research was additionally backed up on a password-protected flash drive. At the completion of the study and acceptance, all transcripts will be destroyed.

Discussion of Major Findings

There were five major findings of this case study. These findings are considered institutional norms in regards to the theoretical framework, social rule systems theory, which will be referenced further in this chapter.

1. The history of early education departments in Massachusetts play a direct role in early educator education requirements.

2. Early education in Massachusetts has been predominantly a care-based system, and has, in recent years, been transitioning to an education-based system.

3. There are less early education college preparation programs than elementary and secondary education college preparation programs in Massachusetts.

4. Retention of early educators in Massachusetts has been focused on voucher reimbursement rates.

5. Training and resources towards early educators are focusing on early educators with as little overhead as possible to reach the maximum number of educators.

The History of Early Education Departments in Massachusetts Play a Direct Role in Early Educator Education Requirements

All departments that oversaw education requirements for early educators kept the same requirements shows that Massachusetts found it easier to keep lower requirements than to adjust them to the changes in research over the last 40 years. As Pam had noted:

These requirements haven't been changed since, as far as I know, the inception of our predecessor agency. It started with OFC [Office for Children] I think 38, 39 years ago. OFC and then it was OCCS [Office of Child Care Services] and now it's EEC with always some additional changes along the way.

Amy stated, "I think it comes down to a belief in society that [it] was easier to take care of little kids." This shows that requirement changes were not considered a priority as taking care of children birth through age five was, from a societal standpoint, easier than educating children in elementary and secondary education.

The OFC, OCCS, and now EEC have had control over the regulations that they put forward for childcare settings servicing children birth through age five. While the departments have changes over the years, the base regulations for educator requirements have not. Massachusetts can make changes to match current research in early education and child development. History has shown that Massachusetts has not kept up with current research into educator requirements for early educators. This may be changing with the new credentialing system currently being worked on at EEC, but to what degree, is yet unknown.

in relation to theoretical framework.

Social rule systems theory analyzes social organization within modern societies. The Department of Early Education and Care is a social organization that can be analyzed as being created by groups of humans and reproduced over time, in this case through the predecessors to EEC, and created rules over a time frame, roughly 40 years. Burns and Flam (1987) note that society is made up of actors that force structure onto systems. For Massachusetts, they've maintained the same system for early educator teacher requirements, regardless of other changes made to regulations over the 40 years. Burns and Dietz (1992) note that it is the population that uses these rules that determine when it is time for a change and that cultural change over time can affect change. With the new credentialing system that EEC is forming, there could be change on the horizon for early educator requirements, which would lead into institutional norm two, talking about the transition from a care-based system to an education-based system.

in relation to literature review.

Lutton (2012) noted that the main body of knowledge currently for early educators was first established in the early 1970s, led by organizations such as NAEYC, established core competencies. This lines up with EEC continuing to use credentialing requirements from the

1970s. Current requirements do not require a degree to gain certification in Massachusetts. Considering that the current estimate of early educators with associate degrees us at 7-12% and bachelor degrees between 11-17% (Gomez et al., 2015) there is no reason for early educators to gain college-level education, creating a culture in the field of early education in Massachusetts where college-level courses are not pursued at the levels of elementary or secondary educators. There are also variations in attitudes about the work of early education with many considering the work of early educators with that of babysitters (Gomez et al., 2015). This could lead to requirements being lower over the last 40 years.

Early Education in Massachusetts has Been Predominantly a Care Based System, and has, in Recent Years, Been Transitioning to an Education Based System

QRIS has been Massachusetts main focus to transitioning early education programs from a predominantly care based system to an education-based system. Amy noted that:

> [It] was about, agreeing on what quality was, and so it was a degree use of an assessment tool, use of a curriculum, it was kind of like they had years of discussion to get there, and then that funding basically supported programs who were already doing these things with no support from the state.

It was not done before a federal grant program in 2010, *Race to the Top*, which provided states who were participating in a QRIS system with federal funds to increase quality in early education programs. While there has been a transition, QRIS is optional in Massachusetts above level 1. Level 1 meeting the requirements for licensing in Massachusetts. Table 4 shows that of the higher requirements only 1,522 programs meet level 2, 219 meet level 3, and 28 meet level 4 QRIS requirements for quality. 3,462 programs meet level 1 requirements. Programs appear to

have only slowly embraced higher requirements for QRIS. This could be due to it being a voluntary program above Level 1.

 The new credentialing system being created by EEC would potentially help transition the field from care based to a more education-based system. Megan noted:

> we'll be outlining the requirements for each level of certification. And we will be looking to enhance those requirements to better match the expectations of the roles. And that's going to be quite a lift for the field, but it's something that we want to aspire to and also support the transition to overtime.

Alicia noted:

> I think additional education is required because if we're asking for a curriculum to be taught in the classroom and the lead teacher may oversee it, but then the teachers are actually doing the work then yes. So I agree that more education is required for, because if, I think that is almost the assistant level, assistant teacher level is that child growth and development and some work experience. But once you move to teacher level, I think additional, whether it's intro to early education, early childhood education is the course or what have you, whatever those intro courses may be. Program planning, classroom management, you're a teacher, you still would need to know how to manage the classroom. So all those courses that are at lead teacher, I think right now where we are, it should be at teacher level.

Teachers have been required to do more in the classroom over the last 20 years. QRIS is a system to provide the state with a way to provide a structure to teacher qualification education. The transition has been slow going as QRIS is still voluntary beyond level 1. The new

credentialing system, as we will see when it is implemented, could be included in future QRIS revisions.

in relation to theoretical framework.

This institutional norm showcases how culture is produced by social rules that are produced by groups of humans over time (Burns & Dietz, 1992). Since cultural change is when there is a change in the frequency of the distribution of the rules to the population over time (Burns & Dietz, 1992), the transition from a care based to an education-based system in early education in Massachusetts can be considered a cultural change that has occurred over the last 40 years. This is a universal concept that are the building blocks that makeup the culture and institutional formation and change (Burns & Devillé, 2017).

in relation to literature review.

Karp (2005) notes that while the United States has an extensive database on child development, more than any other country in the world, there is still a gap between what we know and what we implement into classrooms of early education. This is a good showcase of Massachusetts slowly taking research into account when switching from care based to an education-based system. There is still a gap, but progress is being made, ever so slowly. Russell (2012) found that teacher's education does affect outcomes for children in the classroom and at home. The new credentialing system that Massachusetts is creating would agree with Russell in that teacher's education requirements will be increased beyond one class in child development. To what degree the requirements will require additional education is still being talked about at EEC. It could include online training, which allows users the flexibility to access material at their own pace and time (Stone-Macdonald & Douglass, 2015).

There are Less Early Education College Preparation Programs than Elementary and Secondary Education College Preparation Programs in Massachusetts

Historically, Pam noted that "there were very few early education and care type of degree programs." While the programs in early education have moved up since the 1970s, there is still a gap in programs when compared with elementary/secondary college degree programs in Massachusetts. Figure 2 shows that while there is one more Associate degree program in early education in Massachusetts compared to elementary/secondary education, there is a ten program difference in favor of elementary/secondary education at the Bachelor degree level and a twenty program difference in favor of elementary/secondary education programs at an advanced degree level. Figure 3 shows that 39 colleges have early education programs of any type and 59 colleges that have degree programs in elementary/secondary education. 112 colleges do not have any education programs at all. Part of this is due to accountability, Elizabeth notes:

> I'm not sure we're there yet, but I think that those efforts are under way to have less differences between the expectations. I think that there's more accountability in K-12 to be honest. Good or bad, however you want to see that.

Elizabeth continued that there are much clearer frameworks in place for elementary and secondary educators:

> Because of just having greater clarity, for lack of anything better, is that the clarity in which we've defined what content expectations look like at each one of the grade levels it then allows the teachers to know the kinds of things that they should be making sure that they're including in their curriculum and in their teaching.

Amy noted that:

[Massachusetts] create[d] the early educator scholarship, and what we were seeing is that colleges were closing their early ed programs, because why would you go rack up hundreds of thousands of dollars of debt when you were going to make 23?

Better preparation frameworks and requirements do make sense in having more college programs in elementary and secondary education. Amy's note about making less than $30,000 a year for early educators also should be weighed here. If it is not profitable for early educators to get higher education, then higher education institutions would have to look to see if early education programs would be profitable for them. Northeastern University, for instance, does not have a dedicated early education degree, yet, has other degree programs dedicated to other forms of education.

This researcher's alma mater, Wheelock College, was dedicated to education and social work, and due to financial circumstances, had to merge with Boston University in 2018 to become Boston University's Wheelock College of Education and Human Development. Students were unwilling to spend $40,000 a year in a small private college to become educators and social workers not making that money back. This researcher was on the alumni board when merger talks began and listened to the conversations from then-President David Chard. He stated that smaller colleges were suffering from many potential students unwilling to pay higher rates with smaller and smaller returns.

in relation to theoretical framework.

Systems are developed and interconnected over time (Bertalanffy, 1968). To look at early education in Massachusetts as an institution, one has to look at the external relationships of the system with the environment to understand the system behaviors (Dekkers, 2015). Having less

early education programs connects to early education as a whole, as having fewer programs for college education in early education, affects the requirements for early educators.

in relation to literature review.

There is a small disconnect between this institutional norm and the literature. Gomez et al. (2015) state that there has been an increased demand for degree programs in early education, mainly due to new requirements for the early education workforce. This researcher has found no evidence in the case study to prove or disprove this, however, the case study results show that there are less higher education institutions who offer early education degree programs compared to their counterparts in elementary and secondary education. Gomez et al. (2015) did note that the current estimate of early educators with associate degrees is 7-12%, bachelor degrees at 11-17%, and advanced degrees at 2-4%. This does line up with the case study results due to location and amount of higher education institutions offer early education degrees.

Retention of Early Educators in Massachusetts has Been Focused on Voucher Reimbursement Rates

Alicia noted that there are reimbursement rates for taking children with vouchers. These reimbursements rates can only apply to three areas "salaries and raises, fringe benefits, and professional development." However, childcare centers are not required to take on children with vouchers and many do not. Megan notes though that EEC has a limited ability to provide wage increases and is the primary focus to retain early educators:

> We do try to address some of the compensation issues through wage increases. And recently, in recent years, we've been doing that consistently. But that's still in the context of a broader issue, in that we don't set private wage scales.

Because of this, the retention of early educators in Massachusetts is limited at best from EEC. James noted that "we did provide some raises, I believe, for early educators. We are spending more time on improving quality than we are on expanding access right now." These raises are inconsistent, as shown in Figure 1. They affect only childcare centers with voucher children, and the rate increase has ranged from zero in the fiscal year 2014 to eight percent in the fiscal year 2017.

in relation to theoretical framework.

Social rule systems theory analyzes social organization within modern societies. Burns and Flam (1987) note that society is made up of actors who force structure onto a system. Reimbursement rates were made up by the EEC to help structure rate increases among early educators, similar to Burns and Flam's concept. This rate structure changes in frequency as the rules change over time (Burns & Dietz, 1992).

in relation to literature review.

While there is a lot of data on turnover for early educators, this researcher has not been able to find any literature focusing on voucher reimbursement rates as a way to retain early educators. As a result, there is a gap in the literature. Turnover rates for early educators are between 30-40% per year in the United States (Gable, Rothrauff, Thornburg, & Mauzy, 2007; Gomez et al., 2015; Roseman, 1999; Sosinsky et al., 2007; Torquanti, Raikes, & Huddleston-Casas, 2007). Childcare compensation is a reliable predictor of staff turnover in a childcare center (Gable et al., 2007). Not-for-profit childcare centers are more likely to be set in low-income neighborhoods and are more likely to take vouchers (Lam et al., 2013).

Training and Resources Towards Early Educators are Focusing on Early Educators with as Little Overhead as Possible to Reach the Maximum Number of Educators

Massachusetts is looking to focus their resources toward training early educators with as little overhear as possible to reach the maximum number of educators. Pam noted:

> Just seeing the 21st century and economies of scale, it's fairly clear to me that with our very ambitious agenda and such a large workforce, that it's really not realistic to continue to do everything face-to-face. It's resource-heavy, we don't have a lot of ability to do that, and we have a huge workforce. And so, I'm marrying all the work that I'm doing with workforce development, which is a number of things under workforce development, with moving us forward into the technology space. Because it's year to year we think about "This is how we're sending our dollars that we have allocated for professional development for workforce. Are we sending them correctly? What do we want to tweak? What do we want to overhaul?" It's a constant process I think for us.

It makes sense for EEC to focus its funding where it will do the most good for the largest population it can, with technology being the easiest way to train early educators. This does take away from the face-to-face communication of traditional trainings but has the advantage of uniformly reaching larger groups of early educators in a uniform setting.

in relation to theoretical framework.

Burns and Dietz (1992) determined that the occurrence of rules are determined by the members of the population that frequently use these rules. Massachusetts has taken an approach where training and resources are focused to reach the maximum number of early educators while maintaining as little of overhead as possible. By determining how to use the resources available, the population (in this case EEC) has determined how to allocate those resources. Burns and Flam (1987) note that these rules are made by actors to force structure onto the system, in this case, early educators.

in relation to literature review.

There is much research on the topic of online training, which is something Massachusetts sees as a potential to maximize the number of early educators trained. Stone-Macdonald and Douglass (2015) state that online learning for professional development is widely accepted as an option for educational delivery. They also note that it provides sustainable opportunities for states that have financial issues to consolidate their funds towards a system that can maximize educational delivery. Colleges and universities across the United States offer online courses and, in many instances, entire degrees. (Faulk & King, 2013). Massachusetts online format could potentially keep teachers informed of current educational policies and practices (Saracho, 2013). Lutton (2012) noted that there is a patchwork system of training and development across the United States, and Massachusetts is heading towards bringing that patchwork system into a more uniformed system.

Significance of the Study

The potential significance of this study goes beyond early education in Massachusetts. Understanding the institutional norms that allow early educators to have fewer education requirements than their peers in elementary and secondary education gives state education departments a starting point towards equalizing education requirements while at the same time provide opportunities for conversation on other issues revolving around early educators such as pay disparity. Each institutional norm identified above could be taken individually to affect real change for early educators while at the same time elevate the field of early education by transforming the workforce into college-educated experts in the field.

Early education is big business (Lam et al., 2013). Early education companies and corporations such as Bright Horizons and Kinder Care Education, could use this study to

understand their business models and adjust to help transform the workforce, understanding that early education is, slowly, becoming an education-based system, as states have become more aware that care based systems are systems of the past and that combining the two allows for children to gain the proper skills to be successful in elementary and secondary education.

Recommendations

After a review of the research findings, the researcher offers the following recommendations for the Massachusetts Department of Early Education and Care to consider.

1. Massachusetts should complete the new credentialing system, with a focus on early educators requiring more college education courses, eventually leading to degree requirements.

2. Training offered by Massachusetts should include online college courses in conjunction with the community college or UMass systems.

3. Massachusetts should create a multi-tiered approach to the early educator retention problem.

4. Massachusetts should institute college-level early educator preparation requirements similar to the Department of Elementary/Secondary Education for elementary and secondary educators.

Massachusetts Should Complete the New Credentialing System, with a Focus on Early Educators Requiring More College Education Courses, Eventually Leading to Degree Requirements.

The Massachusetts Department of Early Education and Care should finish their work and implement the new credentialing system that they have been working on. There should be a focus on requiring early educators to have more college-level early education courses with an

eventual requirement of having first an associate degree followed by a bachelor degree several years later. Alicia noted:

> Yeah. I think additional education is required because if we're asking for a curriculum to be taught in the classroom and the lead teacher may oversee it, but then the teachers are actually doing the work then yes. So I agree that more education is required for, because if, I think that is almost the assistant level, assistant teacher level is that child growth and development and some work experience. But once you move to teacher level, I think additional, whether it's intro to early education, early childhood education is the course or what have you, whatever those intro courses may be. Program planning, classroom management, you're a teacher, you still would need to know how to manage the classroom. So all those courses that are at lead teacher, I think right now where we are, it should be at teacher level.

By focusing on college-level course requirements, EEC is stating that early educators are an important part of the education system and that early educators are prepared to work with children aged birth through age five. There has been hesitation from EEC as noted by Amy:

> The 2008 Workforce Development Task Force, which was created, I can't remember when, but that group would not recommend to BA. There was so much back and forth about it. It was crazy. I do think there's also been some hesitation about setting requirements that would be unattainable and think about the incumbent workforce and what it might look like if everybody was 22 years old and had a BA degree. I think there would be unintended, well, some intended consequences for that.

This focus on college-level courses would allow for the elevation of the field as a whole and become a model for other states to increase their standards while providing a boost to the early education community at large.

Training Offered by Massachusetts Should Include Online College Courses in Conjunction with the Community College or UMass Systems.

The Massachusetts Department of Early Education and Care should partner with the Massachusetts community college system and the UMass college system to offer online college courses to early educators. This would streamline the college course requirements currently required for early educators and would become an asset when switched to the new credentialing system. Pam noted:

> Just seeing the 21st century and economies of scale, it's fairly clear to me that with our very ambitious agenda and such a large workforce, that it's really not realistic to continue to do everything face-to-face. It's resource-heavy, we don't have a lot of ability to do that, and we have a huge workforce. And so, I'm marrying all the work that I'm doing with workforce development, which is a number of things under workforce development, with moving us forward into the technology space.

Since EEC is focusing its limited resources towards professional development with online training, this would be an extension while at the same time increase the number of people taking college-level courses in the Massachusetts community colleges and UMass systems.

Massachusetts Should Create a Multi-Tiered Approach to the Early Educator Retention Problem.

Massachusetts needs a multi-tiered approach to retaining early educators beyond just voucher reimbursement rate increases. This should happen through a partnership with EEC, the Massachusetts Legislature, and the Massachusetts Governor's office. Megan noted:

> We do try to address some of the compensation issues through wage increases. And recently, in recent years, we've been doing that consistently. But that's still in the context of a broader issue, in that we don't set private wage scales.

Funding for any multi-tiered approach will have to be allocated to help retain early educators with very specific language put into it. Amy noted:

> I mean, it is that the language is very loose and other states have kind of asked us like if we're fools to trust the legislature, but we know that that's where the money has to go because that's where they have to, we could probably do a better job, but being more prescriptive. But it's not like anyone's buying Cadillac's.

A public media campaign to encourage people to work in early education would be recommended with any multi-tiered approach to gaining and retaining early educators.

Massachusetts Should Institute College Level Early Educator Preparation Requirements Similar to the Department of Elementary/Secondary Education for Elementary and Secondary Educators.

The final recommendation is for the Massachusetts Department of Early Education and Care to require, within 15 years, college-level early educator preparation requirements similar to the Department of Elementary and Secondary Education's requirements for elementary and secondary educators. Elizabeth noted:

I'm not sure we're there yet, but I think that those efforts are under way to have less

differences between the expectations. I think that there's more accountability in K-12 to

be honest. Good or bad, however you want to see that.

EEC has stated that their goal is that "all young children in the Commonwealth will be ready to

enter the K-12 education system" (EEC, 2014b). This would require EEC to reevaluate college-

level course requirements, work with the Department of Higher Education and the Department of

Elementary and Secondary Education to identify, design, and implement preparation programs

throughout Massachusetts to meet their goal for getting all children in Massachusetts ready to

enter K-12.

Validity of the Study

The researcher has ensured that the results of the study were valid through the following

methods and inclusions. All interviews followed a strict protocol form (Appendix A) that

outlines about affirmative consent to interview and record the interview, the reason for the

interview, as well as questions to ask. This form was reviewed by Northeastern University's

Institutional Review Board when applying for approval before beginning the research.

Northeastern's IRB approval is in Appendix D. Those interviewed signed two copies of the

consent form with one copy kept by the researcher, to be maintained for three years after the

completion of the study.

The researcher identified individuals who had direct knowledge of early education in

Massachusetts, three of which works for the Department of Early Education and Care, one who

was on a workgroup for the EEC, one who works for the Department of Elementary and

Secondary Education, and one who is a member of the Massachusetts Legislature. All interviews

are kept confidential and kept according to the researcher's data storage standards (see Data

Storage Procedures). All additional data gathered included publicly available data through the internet and FOIA requests to various departments in Massachusetts.

Data analysis was done through a Yin multi-coding process using NVivo software. Using Saldaña (2016) as a reference, the researcher began to assign keywords to transcripts and data to develop patterns in the data. This was done through a multi-coding process where the first coding sequence was using keywords directly from the data. Pattern coding was the second coding process and was followed by additional rounds of coding to narrow the research into a few major and minor topics/themes. These themes were then explored more closely and coded within each topic/theme. Each topic/theme was related to the central question of the case study and through the lens of social rule systems theory.

Limitations of the Study

There are several limitations of this study that should be considered upon a reading of this study. First, the design of this study had a narrow focus through the use of social rule systems theory. This is one of many approaches that could be used to study educator requirements and social rule systems theory as a specific framework could miss other concepts and opportunities for potential research that other theories could gather. Second, this study focused on early educators in Massachusetts. There could be other factors that affect early educators in other states and countries that may or may not be a factor in Massachusetts. Third, this study had six interviews, which should be taken as their view points at this point. Others may have a different view point either now or in the future and this study should be taken as institutional norms that affect early educators education requirements at the time of this study. As a result, this may not apply in the future as requirements change as society changes.

Future Research Considerations

There are several areas for additional study and research based upon this research study.

1. Additional research on voucher rate reimbursement for early educator rate increases.

2. Additional research on colleges who offer early education courses.

3. Additional research on the retention of early educators.

Additional research on voucher rate reimbursement for early educator rate increases.

This researcher recommends additional research on how the voucher reimbursement rate increases through state legislatures affects early educator retention. This researcher could not find any meaningful research on voucher reimbursement rates and how it affects rate increases and retention for early educators. With states, including Massachusetts using voucher reimbursement rates as the primary way to retain early educators with pay increases, additional research is highly recommended.

Additional research on colleges who offer early education courses.

Additional research is recommended on colleges who prepare early educators to work with children aged birth through age five, preferably understanding the course difference between an early educator and elementary educators and how that affects educators who work with each group. Understanding the preparation process for each type of educator will help align and reevaluate how colleges prepare early educators for working with children aged birth through age five.

Additional research on the retention of early educators.

While there has been much research on why early educators leave early education, additional research is recommended on methods to retain early educators. This coincides with the recommendation to research voucher reimbursement rates for educator rate increases. Other methods to retain early educators beyond the rate increases through voucher reimbursements is

recommended to be studied. This researcher has found limited research into additional

recommendations, and none within the last ten years of researched.

Appendix A

Interview Protocol Form

Institution:_____

Interviewee (Title and Name):_____

Interviewer:_____

Time and Date:_____

Venue:_____

Research Question: why are the institutional norms in place that contribute to educational requirements for early educators lower when compared to their counterparts in elementary and secondary education?

Part I:

Introductory Session Objectives (5-7 minutes): Build rapport, describe the study, answer any questions (under typical circumstances an informed consent form would be reviewed and signed here).

Introductory Protocol

You have been selected to speak with us today because you have been identified as someone who has a great deal to share about teacher's education in early childhood education. *My research project focuses on the experience of* individuals and policy makers who create educational educators education requirements in Massachusetts. *Through this study, we hope to gain more*

insight into what the differences are in early educator credentialing requirements compared to

elementary educators and why? *Hopefully this will allow us to identify ways in which we can*

look into how Massachusetts manages teacher qualifications for early educators.

Because your responses are important and I want to make sure to capture everything you say, I

would like to audio tape our conversation today. Do I have your permission to record this

interview? **[if yes, thank the participant, let them know you may ask the question again as you**

start recording, and then turn on the recording equipment]. *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 unless you decide to consent to having your name and title in the

case study. I will be the only one privy to the tapes which will be eventually destroyed after they

are transcribed. You will have an opportunity to review the transcript of today before I begin

data analysis once I receive the transcript if you wish. To meet our human subjects requirements

at the university, you must sign the form I have with me **[provide the form].** *Essentially, this*

document states that: (1) all information will be held confidential, (2) your participation is

voluntary and you may stop at any time if you feel uncomfortable, and (3) we do not intend to

inflict any harm. Do you have any questions about the interview process or how your data will

be used?

This interview should last about 45 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 at this time?

Part II: Interviewee Background and Questions with Potential Prompts

1. What is your current position within the Massachusetts government and how does your position affect policy in Massachusetts?

2. What are the most important requirements to become a certified early educator?

3. Do you feel that the requirements meet the workplace demands placed on educators in early education?

4. What incentives have been done to get more college educated early educators into the early education workforce in MA?

5. How often is workforce development studied at the Department of Early Education and Care *(EEC)*?

6. Does workforce development get reported to the MA legislature/Executive branch? How often if so?

7. *(EEC specific)* What workforce development plans does EEC currently have in place?

8. *(if in elected office)* Has any early education company lobbied for more EEC teacher education requirements? Less? The same?

9. What type of workforce oversight does your office (or committee) have over early educators?

10. EEC had a plan in place to increase teacher education requirements to an Associates and then a Bachelors degree but this was never implemented. Why was it held off?

11. *(To elected)* What economic impact is there to the MA economy with the current EEC teacher requirements?

12. *(To elected)* Would requiring EEC teachers to have an Associates or Bachelors degree have an economic impact on the MA economy? If positive, how so? If negative, how so?

13. Upon looking at the requirements for early educators to be teacher certified and

   elementary education, there is a dramatic difference in the requirements. Why are the

   requirements different? *(Provide a copy of the differences)*

Ask participant if they have any questions and thank them for their participation.

Appendix B

Informed Consent Form

1

Northeastern University

College of Professional Studies Graduate School of Education

Name of Investigators: Andrew Anderson, Ed.D Principal Investigator; Daniel Gonzalez, M.S Student Researcher
Title of Project: Early Educator Credentialing in Massachusetts

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

Why Am I Being Asked to Take Part in This Research Study?
We are asking you to participate in the study because you have been identified as an educational policy maker in Massachusetts.

Why is This Research Study Being Done?
The purpose of this research study is to understand the differences between early educator teacher credentialing requirements and those of elementary educators, how the differences have developed over time, and the attitudes and understandings of policy makers in Massachusetts in regards to these differences.

What Will I Be Asked to Do?
If you decide to take part in this study, we will ask you questions regarding early education credentialing requirements and your opinions on those requirements.

Where Will This Take Place and How Much of My Time Will it Take?
You will be interviewed at a time and place that is convenient for you. The interview will take about 45 minutes.

Will There be Any Risk or Discomfort to Me?
There is no foreseeable risk or discomfort.

Will I Benefit by Being in This Research?
There will be no direct benefit to you for taking part in this study. However, the information learned from this study may help the field of early education in Massachusetts in regards to credentialing and certification requirements.

Initials_____

2

Who Will See the Information About Me?

Your part in this study will be confidential. Only the researchers on this study will see the information about you unless you consent to having your name and title used. No reports or publications will use information that can identify you in any way or any individual as being of this project without your express informed consent. All data will be maintained on the researchers hard drive and all data, including any audio tapes, will be destroyed at the conclusion of the study.

In rare instances, authorized people may request to see research information about you and other people in this study. This is done only to be sure that the research is done properly. We would only permit people who are authorized by organizations such as the Northeastern University Institutional Review Board to see this information.

Can I Stop My Participation in This Study?

Your participation in this research is completely voluntary. You do not have to participate if you do not want to and you can refuse to answer any question. Even if you begin the study, you may quit at any time. If you do not participate or if you decide to quit, you will not lose any rights, benefits, or services that you would otherwise have [as a student, employee, etc].

Who Can I Contact if I Have Questions or Problems?

If you have any questions about this study, please feel free to contact **Daniel Gonzalez, Email:** ▮▮▮▮▮▮▮▮▮▮▮▮, **Tel** ▮▮▮▮▮▮▮▮, the person mainly responsible for the research. You may also contact **Andrew Anderson, Email:** ▮▮▮▮▮▮▮▮▮▮▮▮, the Principal Investigator.

Who Can I Contact About My Rights as a Participant?

If you have any questions about your rights in this research, you may contact **Nan C. Regina**, Director, Human Subject Research Protection, Mail Stop: 560-177, 360 Huntington Avenue, Northeastern University, Boston, MA 02115**. Tel:617.373.4588, Email: n.regina@neu.edu**. You may call anonymously if you wish.

Will It Cost Me Anything to Participate?

No.

Is There Anything Else I Need to Know?

You must be at least 18 years old to participate.

Initials_____

3

I agree to participate in this research using my name and title. [   ]

I agree to participate in this research using only my title and pseudonym. [   ]

_____   _____
Signature of person agreeing to take part   Date

_____
Printed name of person above

_____   _____
Signature of researcher   Date

_____
Printed name of person above

Appendix C

Certification in Protecting Human Research Participants

Certificate of Completion

The National Institutes of Health (NIH) Office of Extramural Research certifies that
Daniel Gonzalez successfully completed the NIH Web-based training course
"Protecting Human Research Participants".

Date of completion: 01/06/2017.

Certification Number: 2256946.

Appendix D

IRB Application and Approval

Northeastern

NOTIFICATION OF IRB ACTION

Date: February 4, 2019   IRB #: CPS19-01-04

Principal Investigator(s):   Andrew Anderson
Daniel Joseph Gonzalez

Department: Doctor of Education Program
College of Professional Studies

Address: 20 Belvidere
Northeastern University

Title of Project: Case Study on Early Educator Credentialing in
Massachusetts

Participating Sites: N/A

Human Subject Research
Protection

Mail Stop 560-177
360 Huntington Avenue
Boston, MA 02115

617/373.7570
fax 617.373.4595

northeastern.edu.churp

DHHS Review Category: Expedited #6, #7

Informed Consents: One (1) signed consent form

Monitoring Interval: 12 months

APPROVAL EXPIRATION DATE: FEBRUARY 3, 2020

Investigator's Responsibilities:

1. The informed consent form bearing the IRB approval stamp must be used when recruiting participants into the study.
2. The investigator must notify IRB **immediately** of unexpected adverse reactions, or new information that may alter our perception of the benefit-risk ratio.
3. Study procedures and files are subject to audit any time.
4. Any modifications of the protocol or the informed consent as the study progresses must he reviewed and approved by this committee **prior to being instituted.**
5. Continuing Review Approval for the proposal should be requested at least one month prior to the expiration date above.
6. This approval applies to the protection of human subjects only. It does not apply to any other university approvals that may be necessary.

C. Randall Colvin, Ph.D., Chair
Northeastern University Institutional Review Board

Nan C. Regina, Director
Human Subject Research Protection

Northeastern University FWA #4630

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For NU IRB use:

Date Received: _____ *1/7/19*   *NU IRB No.* *CPS19-01-04*

Review Category: _____   *Approval Date* _____

APPLICATION FOR APPROVAL FOR USE OF HUMAN PARTICIPANTS IN RESEARCH

Before completing this application, please read the Application Instructions and *Policies and Procedures for Human Research Protections* to understand the responsibilities for which you are accountable as an investigator in conducting research with human participants. The document, *Application Instructions*, provides additional assistance in preparing this submission. ***Incomplete applications will be returned to the investigator. You may complete this application online and save it as a Word document.***

If this research is related to a grant, contract proposal or dissertation, a copy of the full grant/contract proposal/dissertation must accompany this application.

Please carefully edit and proof read before submitting the application. Applications that are not filled out completely and/or have any missing or incorrect information will be returned to the Principal Investigator.

REQUIRED TRAINING FOR RESEARCH INVOLVING HUMAN SUBJECTS

Under the direction of the Office of the Vice Provost for Research, Northeastern University is now requiring completion of the NIH Office of Extramural Research training for all human subject research, regardless of whether or not investigators have received funding to support their project.

The online course titled "Protecting Human Research Participants" can be accessed at the following url: http://phrp.nihtraining.com/users/login.php. *This requirement will be effective as of November 15, 2008 for all new protocols.*

Principal Investigators, student researchers and key personnel (participants who contribute substantively to the scientific development or execution of a project) must include a copy of their certificate of completion for this web-based tutorial with the protocol submission.
****

X Certificate(s) Attached

X Certificate(s) submitted previously – on file with the NU's Office of Human Subject Research Protection

---

A. Investigator Information

Principal Investigator (**PI cannot be a student**) Andrew Anderson _____

Investigator is: NU Faculty __X__   NU Staff _____ Other _____

College: _____ College of Professional Studies _____

Department/Program Graduate School of Education – Ed.D Program _____

Address 20 Belvidere, 360 Huntington Ave Boston MA 02215 _____

Office Phone ████████████ _____   Email ████████████ _____

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Is this student research? YES __X__ NO _____ If yes, please provide the following information:

Student Name Daniel Joseph Gonzalez_____ Anticipated graduation date 12/19/19

Undergrad ___ MA/MS ___ PhD ___ AuD ___ EdD __X__ DLP ___ Other Degree Type ___

College:_____ College of Professional Studies_____

Department/Program _Graduate School of Education – Ed.D Program_____

Full Mailing Address ███████████████████████████

Telephone ____██████████_____ Primary Email ████████████████_____

Cell phone ____██████████_____ Secondary Email████████████████_____

B. Protocol Information

Title Case Study on Early Educator Credentialing in Massachusetts_____

Projected # subjects __6-8__

Approx. begin date of project 01/15/19   Approx. end date 12/01/19
        month, day, year   month, day, year

It is the policy of Northeastern University that no activity involving human subjects be undertaken until those activities have been reviewed and approved by the University's Institutional Review Board (IRB).

☐ **Anticipated funding agency/source for project (or none)** _____None_____ ____

☐ **Has/will this proposal been/be submitted through:**
- NU's Office of Research Administration and Finance (RAF) _No_____
- Provost _No_____
- Corp & Foundations _No_____
- Other _No_____

☐ **Grant Title:** _____N/A_____ _____

☐ **Grant ID:** _____N/A_____ _____

C.

Will Participants Be:	Yes	No		Does the Project Involve:	Yes	No
Children (<18)		X		Blood Removal?		X
Northeastern University Students?		X		Investigational drug/device?		X
Institutionalized persons?		X		Audiotapes/videotapes?	X	
Prisoners?		X				
Cognitively Impaired Persons?		X				
Non or Limited English Speaking Persons?		X				
People Living outside the USA?		X				
Pregnant Women/Fetuses?		X				
Other? *(Please provide detail)*	X					

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Please answer each of the following questions using non-technical language. Missing or incomplete answers will delay your review while we request the information.

D. What are the goals of this research? Please state your research question(s) and related hypotheses.

Research Question – Why are the institutional norms in place that contribute to educational requirements for early educators lower when compared to their counterparts in elementary and secondary education in Massachusetts?

E. Provide a brief summary of the purpose of the research in non-technical language.

The purpose of the research is to understand why early educators require less education and other requirements to become certified teachers than elementary educators in Massachusetts. Teacher certification for birth to age five only needs one class in child development to become certified where elementary educators require a Master's degree.

F. Identify study personnel on this project. Include name, credentials, role, and organization affiliation.

1. Andrew Anderson, Ed.D – Principal Investigator – Northeastern University
2. Daniel Joseph Gonzalez, M.S. – Student Researcher – Ed.D. Dissertation – Northeastern University
3. Rashid Mosley, Ed.D. – Second Reader for Dissertation – Northeastern University
4. Rev.com – Transcription Service – Transcribing interviews

G. Identify other organizations or institutions that are involved. Attach current Institutional Review Board (IRB) approvals or letters of permission as necessary.

N/A All recruits will have publicly available contact information.

H. Recruitment Procedures

Describe the participants you intend to recruit. Provide all inclusion and exclusion criteria. Include age range, number of subjects, gender, ethnicity/race, socio-economic level, literacy level and health (as applicable) and reasons for exempting any groups.

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Describe how/when/by whom inclusion/exclusion criteria will be determined.

Participants – Elected and appointed officials in Massachusetts within the following departments/committees: Massachusetts Department of Early Education and Care, Massachusetts Department of Elementary and Secondary Education, Executive Office of Education in Massachusetts, Massachusetts Joint Committee on Education, Massachusetts Governor's Office.

Criteria – Officials must have been elected or appointed to one of the department/committees above and have knowledge of educator requirements within Massachusetts. Each participant must have worked on educator requirements in some capacity as an elected or appointed official.

Exclusion – Any elected or appointed official who does not work with or in one of the departments above and/or is not on a committee related to educator requirements. Exclusion will be determined prior to recruitment. Any individuals that have been identified but switch departments and/or committees not related to the departments/committees above after recruitment begins will be excluded on an ass needed basis.

Describe the procedures that you will use to recruit these participants. Be specific. How will potential subjects be identified? Who will ask for participation? If you intend to recruit using letters, posters, fliers, ads, website, email, PsyLink description, HIT, etc., copies must be included as attachments for stamped approval. Include scripts for intended telephone recruitment.

Identification of Participants – All participants will be identified through mass.gov website. Emails and phone numbers for all subjects as well as their title/department/committee are identified through mass.gov website. All participants must work directly with the departments/committees identified above.

Asking for Participation – Daniel Joseph Gonzalez, student researcher, will be recruiting participants through email and/or phone. Scripts for email and telephone recruitment are attached. The only email address that will be used is Gonzalez.d@husky.neu.edu.

What remuneration, if any, is offered?

N/A

I. Consent Process

Describe the process of obtaining informed consent*. Be specific. How will the project

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and the participants' role be presented to potential participants? By whom? When? Where? Having the participant read and sign a consent statement is done only after the researcher provides a detailed oral explanation and answers all questions. Please attach a copy of informed consent statements that you intend to use, if applicable. **Click here for consent form templates.**

If your study population includes non-English speaking people, translations of consent information are necessary. Describe how information will be translated and by whom. You may wait until the consent is approved in English before having it translated.

Presentation to Participants – Participants will be informed of their role prior to their oral agreement in participating in this research through email and/or phone. Just before conducting the research, each participant will also sign the informed consent form in person to begin research.

By Whom – Daniel Joseph Gonzalez, Student Researcher.

When – Email/Phone for initial conversation prior to agreeing to participate. Informed consent form directly before research with participant begins.

Where – Informed consent form will be signed directly before research for each participant. Participant will decide, with student investigator assisting, where the interview will take place.

Additional Information – Informed consent form is attached.

If your population includes children, prisoners, people with limited mental capacity, language barriers, problems with reading or understanding, or other issues that may make them vulnerable or limit their ability to understand and provide consent, describe special procedures that you will institute to obtain consent appropriately. If participants are potentially decisionally impaired, how will you determine competency?

N/A

*If incomplete disclosure during the initial consent process is essential to carrying out the proposed research, please provide a detailed description of the debriefing process. Be specific. When will full disclosure of the research goals be presented to subjects (e.g., immediately after the subject has completed the research task(s) or held off until the completion of the study's data collection)? By whom? Please attach a copy of the written debriefing statement that will be given to subjects.

N/A

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J. Study Procedures

Provide a detailed description of all activities the participant will be asked to do and what will be done to the participants. Include the location, number of sessions, time for each session, and total time period anticipated for each participant, including long term follow up.

Activities – Participants will be verbally interviewed with audio recordings of the interview being retained afterwards.

Location – Determined by the participant with assistance of student investigator.

Number of sessions – One per participant.

Time for Session – 35-45 minutes per session.

Total Time Period for Participant – 1 hour (includes potential follow up).

Who will conduct the experimental procedures, questionnaires, etc? Where will this be done? *Attach copies of all questionnaires, interview questions, tests, survey instruments, links to online surveys, etc.*

Daniel Joseph Gonzalez, Student researcher.

Location is determinate by participant.

All interview questions are attached.

K. Risks

Identify possible risks to the participant as a result of the research. Consider possible psychological harm, loss of confidentiality, financial, social, or legal damages as well as physical risks. What is the seriousness of these risks and what is the likelihood that they may occur?

Potential risks could include loss of confidentiality and work (political) related damage. While very serious, the likelihood of either of these happening are minimum. The informed consent form gives the option to provide full name and title or simply a title for identification due to their status as political figures. The political risk, while present, is known to the participants and they can opt out at any time.

Describe in detail the safeguards that will be implemented to minimize risks. What follow-up procedures are in place if harm occurs? What special precautions will be

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instituted for vulnerable populations?

All data is retained on the student investigator's laptop and a password protected flash drive in the student researcher's home safe. Identification is based on the preference of each participant. The student researcher will assign codewords for each participant to minimize the risks of a breach of confidentiality beyond the scope of the research and the consent form.

On the off chance that harm does occur, the student researcher will immediately contact the Principle Investigator, and IRB to determine the amount of harm and what to do next. At a minimum, the participant will be notified immediately.

L. Confidentiality

Describe *in detail* the procedures that will be used to maintain anonymity or confidentiality during collection and entry of data. Who will have access to data? How will the data be used, now and in the future?

Confidentiality Procedures – While filling out the informed consent form, each participant has the option to choose if their full name and title are used or just their title is used for the dissertation. This form will be on file in the student researcher's home for up to 3 years after the completion of the project.

Audio recordings/transcripts will be filed by the option chosen by each participant (name/title or title) on the student researcher's computer. This data will be password protected at all times.

Who will have access to data – Only members of the study personnel will have access to the data collected: Andrew Anderson, Daniel Joseph Gonzalez, and Rashid Mosley.

How will data be used – Data collected will be analyzed and reported on for Daniel Joseph Gonzalez's Ed.D dissertation. After the dissertation, this data may be used for an academic paper based on the Ed.D dissertation.

How and where will data be stored? How will electronic data be encrypted? When will data, including audiotapes and videotapes, be destroyed? If data is to be retained, explain why. Will identifiers or links to identification be destroyed? When? Signed consent documents must be retained for 3 years following the end of the study. Where and how will they be maintained?

All data will be stored electronically on student investigator's password protected computer. All data is in a password protected folder with a backup folder of data on a password protected flash drive. This flash drive is held in a safe in the student investigator's home residence.

All audiotapes/data collected will be destroyed upon completion and acceptance of the student investigator's Ed.D. dissertation by Northeastern University. All identifiers will be destroyed at this time as well.

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Signed consent documents will be retained for 3 years following the end of the study in the student investigator's safe in his home residence.

M.   If your research is HIPAA-protected, please complete the following; Individual Access to PHI

Describe the procedure that will be used for allowing individuals to access their PHI or, alternatively, advising them that they must wait until the end of the study to review their PHI.

N/A

N. Benefits

What benefits can the participant reasonably expect from his/her involvement in the research? If none, state that.   What are potential benefits to others?

Benefits to Participants – None.

Potential Benefits to Others – To further the field of early education in Massachusetts.

O. Attachments

Identify attachments that have been included and those that are not applicable (n/a).

X	Copy of fliers, ads, posters, emails, web pages, letters for recruitment *
X	Scripts of intended telephone conversations*
N/A	Copies of IRB approvals or letters of permission from other sites
X	Informed Consent Form(s)* (see our templates for examples)
X	Debriefing Statement*
X	Copies of all instruments, surveys, focus group or interview questions, tests, etc.
X	Signed Assurance of Principal Investigator Form *(required)*
X	NIH Human Subject Training Certificate(s) *(required if not already on file at HSRP)*

(Approved forms must be stamped by the IRB before use)

P. Health Care Provision During Study

Please check the applicable line:

___X___   I have read the description of HIPAA "health care" within Section 4 of the Policies & Procedures for Human Research Protection. I am not a HIPAA-covered health care provider and no health care will be provided in connection with this study.

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_____ I am a HIPAA-covered health care provider or I will provide health care in connection with this study as described in Section 4 of the Policies & Procedures for Human Research Protection. This health care is described above under "Study Procedures," and the Informed Consent and Health Information Use and Disclosure Authorization form will be used with all prospective study participants.

If you have any questions about whether you are a HIPAA-covered health care provider, please contact Nan C. Regina, Director, Human Subject Research Protection at n.regina@neu.edu or (617) 373-4588.

Completed applications should be submitted to Nan C. Regina, Director, Human Subject Research Protection *with the exception of applications from faculty and students of the College of Professional Studies, which should be submitted to Kate Skophammer, IRB Coordinator for CPS.*

| Nan C. Regina, Director
Northeastern Univ., Human Subject Research Protection
360 Huntington Ave., Mailstop: 560-177
Boston, MA 02115-5000
Phone: 617.373.4588; Fax: 617.373.4595
n.regina@northeastern.edu | **CPS applications only**
Kate Skophammer, IRB Coordinator
Northeastern Univ., College of Professional Studies
Phone: 617.390.3450;
k.skophammer@northeastern.edu |

The application and accompanying materials may be sent as email attachments or in hard copy. A signed Assurance of Principal Investigator Form may be sent as a scan, via fax or in hard copy.

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Attachment A

Recruitment Email(s)

Dear XXX,

My name is Daniel Gonzalez and I am a doctoral candidate at Northeastern University studying early educator teacher qualifications in Massachusetts as part of my Ed.D. dissertation. I am looking for participants to be interviewed about early educator requirements and I have identified you (your boss) as someone knowledgeable about the topic. The interview lasts for typically 45 minutes and covers information from your knowledge base as it related to early educators. Your participation will assist in my analysis for my Ed.D dissertation and help to further early educators in Massachusetts.

If you are interested, please feel free to reach out to me at ▮▮▮▮ or ▮▮▮▮▮▮ Participation is entirely voluntary.

Thank you for your consideration.

Daniel Gonzalez

Student Researcher

Ed.D Candidate – Northeastern University

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Attachment B

Script of Intended Phone Conversation(s)

<u>Script for Recruitment Over the Phone</u>

My name is Daniel Gonzalez and I am a doctoral candidate at Northeastern University studying early educator teacher qualifications in Massachusetts as part of my Ed.D. dissertation. I am looking for participants to be interviewed about early educator requirements and I have identified you (your boss) as someone knowledgeable about the topic. The interview lasts for typically 45 minutes and covers information from your knowledge base as it related to early educators. Your participation will assist in my analysis for my Ed.D dissertation and help to further early educators in Massachusetts. Participation in this study is entirely voluntary. When would be a great time to schedule an in person or over the phone interview with you (your boss)? Do you have any questions about the study before the interview?

<u>Script for Phone Interview</u>

Script will follow interview protocol form in Attachment E. The only difference is that *the informed consent form would be emailed, signed, scanned, and returned to student researcher who will sign, scan, and return a copy to the participant through email. All consent forms would then be printed and filed accordingly.* The script would continue as written otherwise.

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Attachment C

Informed Consent Form

Please see attached word document in email.

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Attachment D

Debriefing Statement

Thank you for your participation in my case study on early educator's education requirements in Massachusetts. Your interview will be one of several that will assist in my Ed.D dissertation. If you have any further questions about the interview or the dissertation, please feel free to reach out at ████████ or ████████████

-Daniel Gonzalez

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Attachment E

Interview Protocol Form

Institution:_____ _____

Interviewee (Title and Name):_____

Interviewer:_____ _____

Time and Date:_____

Venue:_____ _____

Research Question: why are the institutional norms in place that contribute to educational requirements for early educators lower when compared to their counterparts in elementary and secondary education?

Part I:

Introductory Session Objectives (5-7 minutes): Build rapport, describe the study, answer any questions (under typical circumstances an informed consent form would be reviewed and signed here).

Introductory Protocol

You have been selected to speak with us today because you have been identified as someone who has a great deal to share about teacher's education in early childhood education. *My research project focuses on the experience of* individuals and policy makers who create educational educators education requirements in Massachusetts. *Through this study, we hope to gain more*

insight into what the differences are in early educator credentialing requirements compared to elementary educators and why? *Hopefully this will allow us to identify ways in which we can* look into how Massachusetts manages teacher qualifications for early educators.

Because your responses are important and I want to make sure to capture everything you say, I would like to audio tape our conversation today. Do I have your permission to record this interview? **[if yes, thank the participant, let them know you may ask the question again as you start recording, and then turn on the recording equipment].** *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 unless you decide to consent to having your name and title in the case study. I will be the only one privy to the tapes which will be eventually destroyed after they are transcribed. You will have an opportunity to review the transcript of today before I begin data analysis once I receive the transcript if you wish. To meet our human subjects requirements at the university, you must sign the form I have with me* **[provide the form].** *Essentially, this document states that: (1) all information will be held confidential, (2) your participation is voluntary and you may stop at any time if you feel uncomfortable, and (3) we do not intend to inflict any harm. Do you have any questions about the interview process or how your data will be used?*

This interview should last about 45 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 at this time?

Part II: Interviewee Background and Questions with Potential Prompts

Northeastern University, 560-177
Northeastern University
Human Subject Research Protection
360 Huntington Avenue
Boston, MA 02115-5000
Tel: 617.373.7570; Fax: 617.373.4595

1. What is your current position within the Massachusetts government and how does your position affect policy in Massachusetts?

2. What are the most important requirements to become a certified early educator?

3. Do you feel that the requirements meet the workplace demands placed on educators in early education?

4. What incentives have been done to get more college educated early educators into the early education workforce in MA?

5. How often is workforce development studied at the Department of Early Education and Care *(EEC)*?

6. Does workforce development get reported to the MA legislature/Executive branch? How often if so?

7. *(EEC specific)* What workforce development plans does EEC currently have in place?

8. *(if in elected office)* Has any early education company lobbied for more EEC teacher education requirements? Less? The same?

9. What type of workforce oversight does your office (or committee) have over early educators?

10. EEC had a plan in place to increase teacher education requirements to an Associates and then a Bachelors degree but this was never implemented. Why was it held off?

11. *(To elected)* What economic impact is there to the MA economy with the current EEC teacher requirements?

12. *(To elected)* Would requiring EEC teachers to have an Associates or Bachelors degree have an economic impact on the MA economy? If positive, how so? If negative, how so?

13. Upon looking at the requirements for early educators to be teacher certified and

elementary education, there is a dramatic difference in the requirements. Why are the

requirements different? *(Provide a copy of the differences)*

Ask participant if they have any questions and thank them for their participation.

Northeastern University
Human Subject Research Protection
Northeastern University, 560-177
360 Huntington Avenue
Boston, MA 02115-5000
Tel: 617.373.7570; Fax: 617.373.4595

Attachment F

Signed Assurance of Principle Investigator Form

Northeastern University
Human Subject Research Protection

IRB # _____

Northeastern University
Institutional Review Board

ASSURANCE OF PRINCIPAL INVESTIGATOR

Investigator(s): Andrew Anderson, Daniel Joseph Gonzalez

Title of Proposal: Case Study on Early Educator Credentialing in Massachusetts

To give assurance, please read and initial each statement, then sign below.

1. I have read and understand Northeastern University's *Policies and Procedures Concerning the Protection of Human Subjects* and the *Federal Wide Assurance*. I give my assurance that I, and all members of the research team, will adhere to the policies in this research.

2. I assure that no participants will be recruited or enrolled, and no data will be collected, without current, written approval from Northeastern University, and other sites as required.

3. I assure that the rights and welfare of all participants will be protected according to the procedures approved for this project by the NU IRB.

4. I assure that all risks or discomforts to subjects will be clearly explained, and that I will demonstrate how risks are outweighed by potential benefits to the subject or by the importance of the knowledge to be gained.

5. I assure that the informed consent of all participants will be obtained by methods that meet the requirements of Northeastern University's policy and assurance procedures.

6. I assure that no changes in research activity will be initiated without prior NU IRB review and approval, except where necessary to eliminate apparent immediate hazard to the subjects.

7. I assure that I will report any problems involving risks to human subjects or others promptly to the Office of Human Subject Research Protection.

8. I assure that there are no financial or other relationships (e.g., stock ownership, advisory board, speaker's bureaus, honoraria) that might be viewed as creating a conflict of interest.

Signature: _____ Date: 12.27.18
Principal Investigator / Faculty Advisor

For student research, the faculty advisor is the principal investigator for the study and is primarily responsible for the ethical conduct of the research. Faculty must review and approve student research prior to submission for NU IRB review. Student investigators must sign this Assurance also.

Signature: _____ Date: 12/27/18
Student Investigator

DEPARTMENT CHAIR/PROGRAM DIRECTOR SIGNATURE *(Required)*

I am aware that this protocol is being submitted to the Northeastern University IRB. I do not make any assertions about human subject protections for this research project.

Signature: _____ Date: _____
Department Chair or Program Director

Please return completed form to Nan C. Regina, Director, Human Subject Research Protection *with the exception of forms from faculty and students of the College of Professional Studies, which should be submitted to Kate Skophammer, IRB Coordinator for CPS.*

Nan C. Regina, Director
Northeastern Univ., Human Subject Research Protection
360 Huntington Avenue, Mailstop: 560-177
Boston, MA 02115-5000
Tel: 617.373.4588; Fax: 617.373.4595;
n.regina@northeastern.edu

CPS forms only
Kate Skophammer, IRB Coordinator
Northeastern University, College of Professional Studies
Tel: 617.390.3450; k.skophammer@northeastern.edu

NU HSRP - Rev. 2-7-2017

Northeastern University
Human Subject Research Protection

Northeastern University, 560-177
360 Huntington Avenue
Boston, MA 02115-5000
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Attachment G

NIH Human Subject Training Certificate

Certificate of Completion

The National Institutes of Health (NIH) Office of Extramural Research certifies that
Daniel Gonzalez successfully completed the NIH Web-based training course
"Protecting Human Research Participants".

Date of completion: 01/06/2017.

Certification Number: 2256946.

Attachment A

Recruitment Email(s)

Dear XXX,

My name is Daniel Gonzalez and I am a doctoral candidate at Northeastern University studying early educator teacher qualifications in Massachusetts as part of my Ed.D. dissertation. I am looking for participants to be interviewed about early educator requirements and I have identified you (your boss) as someone knowledgeable about the topic. The interview lasts for typically 45 minutes and covers information from your knowledge base as it related to early educators. Your participation will assist in my analysis for my Ed.D dissertation and help to further early educators in Massachusetts.

If you are interested, please feel free to reach out to me at ████████ or ██████████████ Participation is entirely voluntary.

Thank you for your consideration.

Daniel Gonzalez

Student Researcher

Ed.D Candidate – Northeastern University

Attachment B

Script of Intended Phone Conversation(s)

Script for Recruitment Over the Phone

My name is Daniel Gonzalez and I am a doctoral candidate at Northeastern University studying early educator teacher qualifications in Massachusetts as part of my Ed.D. dissertation. I am looking for participants to be interviewed about early educator requirements and I have identified you (your boss) as someone knowledgeable about the topic. The interview lasts for typically 45 minutes and covers information from your knowledge base as it related to early educators. Your participation will assist in my analysis for my Ed.D dissertation and help to further early educators in Massachusetts. Participation in this study is entirely voluntary. When would be a great time to schedule an in person or over the phone interview with you (your boss)? Do you have any questions about the study before the interview?

Script for Phone Interview

Script will follow interview protocol form in Attachment E. The only difference is that *the informed consent form would be emailed, signed, scanned, and returned to student researcher who will sign, scan, and return a copy to the participant through email. All consent forms would then be printed and filed accordingly.* The script would continue as written otherwise.

College of Professional Studies Graduate School of Education

Name of Investigators: Andrew Anderson, Ed.D Principal Investigator; Daniel Gonzalez, M.S Student Researcher
Title of Project: Early Educator Credentialing in Massachusetts

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

Why Am I Being Asked to Take Part in This Research Study?
We are asking you to participate in the study because you have been identified as an educational policy maker in Massachusetts.

Why is This Research Study Being Done?
The purpose of this research study is to understand the differences between early educator teacher credentialing requirements and those of elementary educators, how the differences have developed over time, and the attitudes and understandings of policy makers in Massachusetts in regards to these differences.

What Will I Be Asked to Do?
If you decide to take part in this study, we will ask you questions regarding early education credentialing requirements and your opinions on those requirements.

Where Will This Take Place and How Much of My Time Will it Take?
You will be interviewed at a time and place that is convenient for you. The interview will take about 45 minutes.

Will There be Any Risk or Discomfort to Me?
There is no foreseeable risk or discomfort.

Will I Benefit by Being in This Research?
There will be no direct benefit to you for taking part in this study. However, the information learned from this study may help the field of early education in Massachusetts in regards to credentialing and certification requirements.

Who Will See the Information About Me?
Your part in this study will be confidential. Only the researchers on this study will see the information about you unless you consent to having your name and title used. No reports or publications will use information that can identify you in any way or any individual as being of this project without your express informed consent. All data will be maintained on the researchers hard drive and all data, including any audio tapes, will be destroyed at the conclusion of the study.

In rare instances, authorized people may request to see research information about you and other people in this study. This is done only to be sure that the research is done properly. We would only permit people who are authorized by organizations such as the Northeastern University Institutional Review Board to see this information.

Can I Stop My Participation in This Study?
Your participation in this research is completely voluntary. You do not have to participate if you do not want to and you can refuse to answer any question. Even if you begin the study, you may quit at any time. If you do not participate or if you decide to quit, you will not lose any rights, benefits, or services that you would otherwise have [as a student, employee, etc].

Who Can I Contact if I Have Questions or Problems?
If you have any questions about this study, please feel free to contact **Daniel Gonzalez,**
Email:▓▓▓▓▓▓▓▓▓▓▓▓▓, **Tel**▓▓▓▓▓▓▓, the person mainly responsible for the research. You may also contact **Andrew Anderson, Email:**▓▓▓▓▓▓▓▓▓▓▓▓▓ the Principal Investigator.

IRB# CPS19-01-04
Approved: 2/4/19
Expiration Date: 2/3/20

<u>Who Can I Contact About My Rights as a Participant?</u>
If you have any questions about your rights in this research, you may contact **Nan C. Regina**, Director, Human Subject Research Protection, Mail Stop: 560-177, 360 Huntington Avenue, Northeastern University, Boston, MA 02115**. <u>Tel:617.373.4588</u>, Email: n.regina@neu.edu**. You may call anonymously if you wish.

<u>Will It Cost Me Anything to Participate?</u>
No.

<u>Is There Anything Else I Need to Know?</u>
You must be at least 18 years old to participate.

I agree to participate in this research using my name and title. [   ]

I agree to participate in this research using only my title and pseudonym. [   ]

_____   _____
Signature of person agreeing to take part   Date

_____
Printed name of person above

_____   _____
Signature of researcher   Date

_____
Printed name of person above

Appendix E

List of Figures and Tables

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