

EXAMINING KINDERGARTEN TEACHERS' BELIEFS ABOUT THE RELATIONSHIP
BETWEEN PLAY-BASED LEARNING AND
CHILDREN'S SELF-REGULATION

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by

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Authors Declaration

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Master of Arts

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ABSTRACT

Interactions in play-based learning between the children and the materials, the children with each other and the children with the teacher is not something that can be scripted or packaged. However, these complex interactions can be closely examined to ensure the learning is maximized including children's development of self-regulation competencies. The study used action research to examine teachers' beliefs about the connections between play-based learning and children's self-regulation and their thinking about practice. Findings indicated that when teachers moved away from a didactic model they stopped themselves from listening for a predetermined skill. Instead the participants used strategies such as putting a critical lens on the amount of teacher talk, waiting more for children to respond or even speak first, observing how children co-construct their learning and thinking more deeply about the children who are communicating non-verbally. As a result, the teachers observed and learned about children's extensive knowledge, sophisticated thinking and self-regulation during their play.

Key words: 'Play-based learning', 'self-regulation', 'teachers' beliefs', 'Kindergarten', 'early-learning', 'action-research', 'teacher-researcher' 'co-construction'

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Table of Contents

Author's Declaration	ii
Abstract	iii
Acknowledgments	iv
Dedication	vi
Table of Contents	vii
List of Appendices	x
CHAPTER I: Introduction 1	
Overview of the Issues	1
Significance of the Study	3
Definitions of Terms	5
Play-based learning	5
Self-regulation	6
CHAPTER II: Review of the Literature	
Introduction	7
Play and the School Environment	9
Play, Self-regulation, and the Social-Cultural Context	11
The Consequences When Teachers Separate Play and Learning	12
Self-regulation and the School Environment	14
Interconnectedness of Play and Self-regulation in the Area of Cognition.....	16
Interconnectedness of Play and Self-regulation in the Area of	
Social and Emotional Development	18
Research Questions	21
CHAPTER III: Methodology	
Overview	22
Research Design	23
Theoretical Framework	23
Research Approach	25
Research Strategy	25
Participation and Protection of Human Participants	27

Recruitment and Sampling.....	27
Participant Demographics	28
Data Collection	31
Unstructured Interview	32
Focus Groups	33
Data Analysis	34
Authenticity and Trustworthiness	36
Voice of the Researcher	37

CHAPTER IV: Findings

Beginning the Action Research Journey: Uncovering Beliefs

about Play-Based Learning	39
Belief #1: Breaking free from didactic models.....	40
Belief #2: In play children are empowered and engaged, then learning is revealed.....	42
Belief #3: Engagement leads to self-regulation.....	43
Belief #4: Moving from managing behaviour to supporting self-regulation.....	45

Continuing the Action Research Journey: Choosing a Practice to Change

Belief #1: Making room for children's voices and stories.....	47
Belief #2: Stepping back and letting go.....	48
Belief #3: Rethinking what it means to co-construct learning.....	50

Completing the Action Research Journey: Reflecting on the Effects

of the Action on Practice	53
Belief #1: Learning to listen differently.....	53
Belief #2: Shifting minds and sharing power.....	54
Belief #3: Finding congruence between beliefs and practices.....	55
Belief #4: Taking action and changing learning.....	57

CHAPTER IV: Discussions and Recommendations

Different Paths to Similar Places: Maximizing the Full Value of Play.....	59
Breaking with Tradition	61
Sharing Power Sharing Learning	62

Moving Away from Social Engineering Children to Supporting Self-Regulation 63

Limitations..... 65

Directions for Further Research..... 66

Recommendations..... 67

Appendix A- Ryerson University Consent Agreement for Teacher Participation..... 69

Appendix B- Principal Letter of Support 74

Appendix C- Participant Information Letter 76

Appendix D- Appendix D- Data Collection Tool - Interview Question Guide 77

Appendix E- Focus Group 1 Questions 78

Appendix F- Focus Group 2 Questions 79

Appendix G- Focus Group 3 Questions 80

References 83

List of Appendices

Appendix A- Ryerson University Consent Agreement for Teacher Participation.....	69
Appendix B- Principal Letter of Support	74
Appendix C- Participant Information Letter	76
Appendix D- Appendix D- Data Collection Tool - Interview Question Guide	77
Appendix E- Focus Group 1 Questions	78
Appendix F- Focus Group 2 Questions	79
Appendix G- Focus Group 3 Questions	80

CHAPTER I

Introduction

Overview of the Issues

Current research shows that children learn through play and yet it is disappearing from Kindergarten classrooms across Canada and the United States (Miller & Almon, 2009; Ranz-Smith, 2007; Sherwood & Reifel, 2010; Trawick-Smith & Dziurgot, 2010; Whitebread, Coltman, Jameson, & Lander, 2009). The vast majority of Kindergarten children spend their days completing teacher-directed literacy and numeracy activities and are only permitted to play once their academic requirements are completed. Proponents and critics of play-based learning agree that where play remains situated in Kindergarten classrooms it can often be misunderstood (Miller & Almon, 2009; Nicolopoulou, Barbosa, Ilgaz, & Brockmeyer, 2010; Whitebread et al., 2009). The play debate stretches beyond the walls of the Kindergarten classroom.

Throughout three decades of research, Elkind (2007) has been sounding alarm bells warning that the consequences of society ignoring the benefits of play are enormous and far reaching. He believes parents of young children are pressured to sacrifice play time to emphasize academics. Elkind (2007) maintains this has led to parents over-structuring children's time and purchasing of an abundance of ineffective electronic toys that promise benefits that are unsubstantiated. These trends showing the disappearance of play should call policy makers, governments, academics and educators to action.

Taking action is particularly pivotal given that in September 2010, the province of Ontario in Canada undertook a momentous change in the way Kindergarten was delivered across the province. The Ontario Ministry of Education moved to a full-day early learning model. As a

result four and five year olds registered for Kindergarten in Ontario will be in school all day every day (Ontario Ministry of Education 2010; Pascal, 2009). The Full-Day Early Learning-Kindergarten program “will be phased in gradually over time, as of September 2010. Up to 35,000 four- and five-year-olds in 579 schools will benefit from the first phase of the Full-Day Early Learning Kindergarten Program in September 2010” (Ontario Ministry of Education, 2010- 2011, p.1). It is important to continually to examine Kindergarten programs as the province phases in Full-Day Kindergarten.

Over the last decade, a significant number of Kindergarten teachers reported that more than half of the children in their class had difficulty with self-regulation (Shanker, 2009; Shonkoff & Phillips, 2000; Toronto Data Analysis Coordinators, 2009). Play-based learning has been linked to Kindergarten children’s development of self-regulation (Cheng & Stimpson, 2005; Elias & Berk, 2002; Miller & Almon, 2009; Samuelsson & Carlsson, 2008; Whitebread et al., 2009, Shanker, 2010). Self-regulation is a decidedly complex construct that describes the processes and skills involved in controlling, directing, modulating and planning emotions, behaviour and cognition in various contexts (Blair & Diamond, 2008; Post, Boyer & Brett, 2006; Shanker, 2009). Making the transition to a teacher-directed academic Kindergarten classroom requires children to be highly regulated at the Kindergarten threshold in order to achieve success in school. Conversely, children who are poorly regulated are at significant risk for school failure (Blair & Diamond, 2008; Rimm-Kaufman, Curby, Grimm & Brock, 2009; Shanker, 2009).

An important factor in the Kindergarten learning environment is the teacher’s beliefs (File & Gullo 2002; Rimm-Kaufman et al., 2009; Wishard, Howes, & Ritchie, 2003). Wilcox-Herzog (2002) describes teacher beliefs as “a contextual filter through which teachers screen

their classroom experiences, interpret them, and adapt their subsequent practices” (p. 82). This study was designed to co-investigate with teachers their beliefs about the connections between play-based learning and children’s self-regulation and how the understanding of the connections affects their thinking about practice.

Significance of the Study

Miller & Almon (2009) state that “early academics are pushing play out of kindergarten, to the detriment of our children” (p. 6). They describe an increasing context where “Kindergarten children are now under intense pressure to meet inappropriate expectations, including academic standards that until recently were reserved for first or second grade” (p. 6). The literature reviewed supports Miller and Almon’s findings that the suppositions and policies that result from the pushing down of academics have imposed a reduction and, in some cases, eradicated opportunities for play in kindergarten (Nicolopoulou et al., 2010; Sherwood & Reifel, 2010; Whitebread et al., 2009).

Running parallel to this academic pushdown is the documented reporting by Kindergarten teachers that children are increasingly less able to self-regulate (Blair & Diamond, 2008; Rimm-Kaufman et al., 2001; Shanker, 2009; Toronto Data Analysis Coordinators, 2009). Can this observation be attributed to the children themselves or is it more likely the changing conditions of Kindergarten classrooms? There is an abundance of literature that illustrates the complex and diverse learning that occurs in play and how play creates the optimum condition to support the development of self regulation (Boyer, 2006; Nicolopoulou et al., 2010; Shanker, 2009; Sherwood & Reifel, 2010; Vygotsky, 1978). It is evident from the literature reviewed that learning happens and self-regulation thrives in play. Yet this does not easily translate into

classroom practice. This study is significant as it investigates this disconnect between the literature showing the positive learning benefits of play, and the increasingly more academic kindergarten environments, in collaboration with Kindergarten teachers.

This study is also personally significant. In the past my role as an Early Years Coordinator for a school board and more recently, I heard first hand accounts from teachers about how they feel pressured to collect data in literacy and numeracy. They attribute this focus on data collection to why they plan minimal, if any, time for play. I witness many children never getting the opportunity to play because they have not completed their work, getting sent out of group time because they are not able to sit still, and teachers expressing frustration that increasingly more children are unable to self-regulate.

Another pervasive circumstance I have observed is teachers reporting that their program is incongruent with what they believe is best for young children. These teachers express a belief that play is important for young children, yet children spend time completing generic worksheets (e.g., fill in the blank or circle the correct response) or standardized crafts (e.g., holiday themed turkeys or Easter eggs). This illustration of a typical Kindergarten classroom is frequent and reflected in the literature (Leseman, Rollenberg, Rispen, 2001; Miller & Almon, 2009; Nicolopoulou et al., 2010; Parker & Pritchett-Neuharth, 2006).

What do Kindergarten teachers believe about play and self-regulation? Is there a disconnect between what teachers believe should be practiced and what they believe they are actually practicing? This study places in context the significance of teaching and learning in a Kindergarten classroom. I have also observed a small number of Kindergarten programs with rich, complex, and self-regulated sustained learning through play. What role do teachers' beliefs play in these classroom practices?

This research situates the teachers as central to providing understanding of the teaching and learning process by engaging them as co-investigators. This process of collaboratively planning, acting, and reflecting with teachers on their beliefs towards play-based learning and the connection to how they foster children's self-regulation could ultimately serve to reconceptualize teachers' understanding of the role they play in the early learning environment. Therefore, this study is opportune as it will contribute to the provincial discourse as Ontario moves forward in the phasing in of Full-Day Early Learning.

Definitions of Terms

Play-based learning.

Nicolopoulou et al., (2009) describe play as a “powerful matrix” that should not be limited to cognitive development but include the “dimensions of social competence such as self-regulation, cooperation, and interpersonal perspective taking” (p.43). Definitions are difficult and varied (Elias & Berk, 2002; Ranz-Smith, 2007; Sherwood & Reifel, 2010). Play is often described using characteristics, forms and places where children play.

For the purpose of this study the following defining characteristics of play are used: ideas and thinking come from the child, materials used and the focus of the play are negotiated and shared between the child and the adult, experiences are positive and pleasurable, choice is provided, symbolic activity and representations, active engagement of both the mind and the body, and the process is more valued than a product (Woods, 2009). This study is situated in a school setting. Therefore, the role of the adult in children's play must be considered. According to Woods (2009), the adult role is based on “theoretical and conceptual frameworks which propose that a range of strategies can be used for different purposes” (p.168). For the purposes of this study the role of the adult as a facilitator of and in children's play will be explored.

Self-regulation.

Researchers define self-regulation from multiple perspectives. Boyer (2009) describes a self-regulated person as “someone who can comply with a request, to initiate and cease activities according to situational demand” (p.175). She goes on to describe how a sophisticated cognitive system assists the child in delaying or modulating behaviour without the presence of an external monitor. Boyer (2009) suggests this definition describes self-regulation at its “apex” and does not consider the child’s developmental paths to self-regulation (p.175).

The range and complexities in the development of self-regulation is acknowledged in the literature. This study will focus on the broad construct of self-regulation that defines it as a complex set of processes and skills involved in controlling, directing, modulating and planning emotions, behaviour and cognition in various contexts. This set of interdependent skills including emotion, behaviour and cognition act in combination and are foundational to success in Kindergarten (Blair & Diamond, 2008; Martin & McLellan, 2008; Ponitz, McClelland, Matthews, & Morrison, 2009; Post, Boyer & Brett, 2006; Shanker, 2009).

CHAPTER II

Review of the Literature

Play has a long and valued history in Kindergarten however, the debate continues about play-based learning's place in present day Kindergarten classrooms (Ailwood, 2003; Fleer, 2010). Elkind (2007) argues that "children's play, their inborn disposition for curiosity, imagination and fantasy is being silenced in the high-tech, commercialized world we have created" (p. 1). Why does this well documented method as children's natural way to learn continue to be challenged? According to Elkind (2007) this trend is evident even outside the context of the Kindergarten classroom. He attempts to reassure anxious parents that nurturing their child's natural inclination to imagine, create and explore the world through play will lead to their children being happier and healthier.

What are the implications when we add the context of school into the discussions about play? When play is present, it varies in purpose from classroom to classroom (Nicolopoulou et al., 2010; Sherwood & Reifel, 2010). Some teachers use play as a classroom management technique or as a reward for the completion of work. A decreasing number of educators use play as a means to support children's learning across developmental domains (Elias & Berk, 2002; Whitebread et al., 2009). Sherwood and Reifel (2010), suggest that even if teachers believe play to be important they struggle with how to implement play in their classrooms. When play and learning have separate or distinct purposes in a teacher's mind, it is important to examine the possible implications for practice (Elias & Berk, 2002; Nicolopoulou et al., 2010; Sherwood & Reifel, 2010, Whitebread et al., 2009). Learning through play is not alone in being misunderstood or in need of rethinking in Kindergarten classrooms (Elias & Berk, 2002; Samuelsson & Carlsson, 2008). Whitebread et al., (2009) assert "research related to

developmental psychology has moved away from traditional conceptions of learning” [...] and “established the overwhelming significance for children as learners, of their cognitive and emotional self-regulation” (p. 41).

Contexts and experiences that foster self-regulated learning are inherent in play when it is established in its optimal state in Kindergarten classrooms. Yet there are still several classroom scenarios for example, where Kindergarten teachers put children into predetermined groups to rotate through play-centres with the sole purpose of making sure they have a turn at all the planned activities. Teacher’s regulate children’s choices and determine their peer groups in this routine. Are children provided opportunities to develop self-regulation if the adult is making all the choices for children? Vygotsky (1976) suggests all of the social constructs of learning, such as social competence and socially constructed knowledge can thrive in play-based learning environments. In these environments children are provided choices about where and who they play with (Elias & Berk, 2002; Saracho & Spodek, 2006).

Other aspects of children’s learning are also fostered when the stage is set for different play types such as construction (e.g., block play, sculpture), object-play and pretense (e.g., role-play, creating and acting out stories) (Elias & Berk, 2002; Perry & VandeKampe, 2000; Samuelsson & Carlson, 2008; Whitebread et al., 2009). The responsibility for creating this play-based learning environment where children’s self-regulation thrives lies for the most part with the teacher and is inextricably linked to their beliefs (Nicolopoulou et al., 2010; Rimm-Kaufmann et al., 2009; Sherwood & Reifel, 2010; Wilcox-Herzog, 2002).

Much has been written about teachers’ beliefs and practices. The significance of this research increases when it is linked to child outcomes. Teacher beliefs are influenced by several factors, which include training, length of time teaching and background experiences (File &

Gullo 2002; Rimm-Kaufman et al., 2009; Wishard, Howes, & Ritchie, 2003; Wilcox-Herzog, 2002). Recently, Kindergarten teachers report societal and government expectations to improve achievement and push academic pressures down on young children has challenged their beliefs and resulted in changes in their classroom practice (Ray & Smith, 2010; Ranz-Smith, 2007; Rimm-Kaufman et al., 2009; Shanker, 2009; Sherwood & Reifel, 2010). One example of an academic pressure Kindergarten teachers are faced with is meeting the reading level standards and targets that are set within individual school boards and can vary from school to school. Teachers' perception of external pressures to improve achievement, along with their belief that more than half of the children arrive unable to self-regulate is of great concern and will be further investigated as part of this study (Campos, Frankel, & Camras, 2004; Cole, Martin, & Dennis, 2004; Graziano, Reavi, Keane & Calkins, 2007)

The literature review in the next section focuses on children's learning through play, how self-regulation is developed through play and how teachers' beliefs intersect with children's learning through play and development of self-regulation. The objective is to understand what the research reveals when play and self-regulation are examined in the context of a school environment and to determine the interrelatedness of play, self-regulation and teachers' beliefs.

Play and the School Environment

Researchers and play advocates lament that over the last decade there has been a prolific movement away from active, child-centred and imaginative play in Kindergarten classrooms. Play is a highly politicized concept and often the word alone can elicit polarizing viewpoints particularly in the context of school (Elias & Berk, 2002; McCain, Mustard, & Shanker, 2007; Pascal et al., 2010; Whitebread et al., 2009). Sherwood and Reifel (2010) propose a further

complication in that “play is a commonly used term but not a term that connotes a commonly accepted meaning” (p.323).

There is an abundance of research about the merits of play. Play has been of great interest to scholars such as Vygotsky (1976) who was among the first to research the link between play and cognition. He viewed play as crucial not only for cognitive development but social and emotional development as well. This social constructivist view serves as a theoretical underpinning to this study. According to Elias and Berk (2002) Vygotsky “proposed that children engage in sociodramatic play because they wish to imitate adults and to perform activities that the child is too young to attempt in real life” (p. 217). Through this imitation children are “organizing stimuli” and creating patterns that help children problem solve and make sense of social norms (Elias & Berk, 2002, p.217).

Despite the evidence of the learning inherent in play and the contributions it makes to children’s overall well-being, critics and sceptics voices seem to dominate the discourse. Recent pressures for governmental accountability have resulted in a stronger emphasis on academic achievement within the education sector. In Ontario, this movement has lead to the introduction of large scale achievement tests (Education Quality and Accountability Office - EQAO) at the grade three and six levels of elementary school (McCain, Mustard & Shanker 2007).

Teacher’s uncertainty about the role of play and this pushing down of academics can be attributed to changing the landscape in Kindergarten classrooms (Parker & Neuharth-Pritchett, 2006; Sherwood & Reifel, 2010). According to Ranz-Smith (2010), there is a false confidence that in a teacher-directed, didactic environment more learning will happen. Nicolopoulou et al., (2010) emphasize “the result is an excessively one-sided enthusiasm for narrowly

didactic/academic approaches to education, paralleled by a damaging erosion of more child-centered, constructivist, and above all, play-oriented approach” (p.42).

Play, Self-regulation and the Social-Cultural Context

When children enter the door of a Kindergarten classroom they bring with them their personal narratives and social realities (Hedges, Cullen, & Jordon 2011; Paley, 1990; Souto-Manning & Mitchell, 2009). With the globalization of economies, social media, and other technologies there is a growing recognition of diversity. What if a family believed that playing should be reserved for after school? What impact do child-rearing practices have on children’s self-regulation? Each of these questions could be studies on their own but are important to consider in this study.

Hedges et al., (2011) propose that by honouring children’s stories the play is richer and has the potential to be reflective of broader points of view. Gonzales, Moll & Amanti (2005) refer to this as incorporating children and families’ “funds of knowledge” meaning that children come with “bodies of knowledge, including information, skills, strategies, which underlie household functioning, development and well-being” (p. 189). Not only is the play more reflective of all the children but it also strengthens children’s motivation, effort, memory and attention all of which are critical skills for self-regulation.

How are teachers including the perspectives and stories of the children in their classrooms? What tools and strategies are teachers using to gather this information about the children and families? Conversations with families, observations of the children, listening to their interactions with each other are all strategies that educators can use to bring the children’s and families’ stories into the classroom (Hedges et al., 2011).

If there is not an understanding how much learning happens in play there are many implications for children and the Kindergarten classroom. What happens when teachers believe they are in charge of the learning and children are in charge of the play? It could be argued that play is then situated in a binary relationship with learning. This results in a fragmented day where children spend the majority of the time in the program doing paper and pencil tasks, for example, rotating through prescribed literacy tasks such as making predetermined words out of magnetic letters, and then drifting off to learning centres while the teacher remains behind helping children who struggled to complete the required tasks (Miller and Almon, 2009). This paints a rather negative picture of what is intended to be a vibrant learning environment where children's creativity and imagination are nurtured (Siraj-Blatchford, Sylva, Muttock, Gilden, & Bell, 2002).

According to Samuelsson and Carlsson (2008) play and learning are often viewed as separate in both time and space in many early years environments including Kindergartens. However, from the children's perspective play and learning are not separate. Samuelsson and Carlsson (2008) propose a "sustainable pedagogy for the future, which does not separate play from learning but draws upon the similarities in character in order to promote creativity in future generations" (p.624).

Why is this separation between play and learning pervasive in Kindergartens?

Nicolopoulou et al., 2010 claim "the potential value of play for promoting children's learning and development is often under appreciated and poorly understood" (p. 42). They are joined by others in this view (Elias & Berk, 2002; Nicolopoulou et al., 2010; Sandberg & Heden, 2011; Ranz-Smith, 2007; Ray & Smith, 2010). Even if there is consensus that some learning happens in play, when play is not fully understood a myriad of interpretations are possible. For example,

if play is understood to mean children use hands on materials and develop skills such as fine motor development one pervasive classroom interpretation results in children assembling pre-made standardized crafts. Play-based learning is much more complex, more differentiated and owned or shared by the child. Instead of everyone producing the same product, children's imaginations are stimulated through more creative experiences and explorations of visual art materials such as clay, found and natural materials.

Whitebread et al. (2009) believe that even where there is a commitment to the value of play teachers often find it difficult "to realize the educational potential of play in their practice" (p.40). Like Whitebread et al., Hearn, (2010) also recognizes that even when teachers believe that play should be part of a Kindergarten classroom much of what is understood about how children benefit from play "sits in isolation" from how "concepts or content knowledge are formed (p. 2). She asks the reader "in what kind of play-based program does concept formation take place for children?" (p.2).

September 2010 was the genesis of Full-Day Early Learning Kindergarten in Ontario. One of the program's core principles is: "Play is a means to early learning that capitalizes on children's natural curiosity and exuberance" (Ontario Ministry of Education, 2010- 2011, p. 13). It will be critical to capitalize on the political will and address the challenge posed by Nicolopoulou et al., (2009) to elucidate the need to "reconceptualize play" in Kindergarten classrooms (p.43). They first describe ways that the value of play "can be weakened" under two prevailing circumstances with the first being a "romanticized, partial or misleading view of play" where teachers see their role as little more than "allowing the time, providing the materials and setting up the space" (p.43). Second, they describe what is an antithetical view of play that is

dominated or controlled by the teacher and “lacks spontaneity” (p. 43) such as a standardized holiday craft where every child ends up with a similar product.

To follow Nicolopoulou et al.,’s (2010) findings Kindergarten teachers are in the role of a facilitator. As facilitators, teachers observe children’s play and engage in a variety of ways based on their observations along with knowledge they have acquired about play-based learning. Cheng and Stimpson (2004) used the framework “reflection for action, reflection in action and reflection on action” in their study that focused on how teacher beliefs about play translated in practice (p. 341). They found that teachers had a dichotomized view of play. They concluded that the teachers who were able to step out of the “teachers manuals and commercial programs” were most able to achieve a learning environment where children were learning self-regulation and engaged in complex play (p. 350).

Samuelsson and Carlsson (2008) proposed that in order for children to be a “playing learning child” teachers listen to and are sensitive to the child’s perspective, going beyond that found in prescribed teachers’ guides (p. 631). The notion of letting go of or sharing control and power with the child is not the latest trend in education but a well-documented condition for optimal learning and development (Cheng & Stimpson. 2004; Perry, VandeKamp, Mercer, & Nordby, 2002; Raver, 2004; Samuelsson & Carlsson, 2008; Whitehead et al., 2010). In addition to play being a means to learning self-regulation is also a “cornerstone of development and a central building block of early learning” (Pascal et al., 2010, p.20).

Self-Regulation and the School Environment

Self-regulation involves attention skills, working memory and cognitive flexibility. These are all skills and processes that underpin virtually every facet of the school environment such as problem solving, social relationships, learning to communicate, read and create (Blair &

Diamond, 2008; Kochanska, Coy, & Murray 2001; Post, Boyer & Brett, 2006; Shanker, 2009). Teachers sometimes describe self-regulation as a child who can sit still, listen and follow directions (Post et al., 2006; Rimm-Kaufman et al., 2009; Shanker, 2009). This is a narrow perspective and very few children match this description. Children who are distracted and then return to attention are self-regulating and should not be considered behaviour problems (Perry, VandeKamp, Mercer, & Nordby 2002; Ponitz et al., 2009; Post, Boyer & Brett, 2006)

Behavioural regulation connects to cognitively based operations that fall under the broad construct of self-regulation. Self-regulation includes the skills of impulse inhibition, attention control and working memory. Together and separately these three executive functions are predictors of achievement and social competence (Blair & Diamond, 2008; Kochanska et al., 2001; Post et al., 2006; Rimm-Kaufman et al., 2009). One could argue the ultimate ‘testing ground’ for children’s ability to self-regulate (cognition, emotions and behaviour) is in a group setting like a Kindergarten classroom and perhaps it is unrealistic to expect children to be able to self-regulate upon school entry.

As children develop, they begin to figure out that their emotions can be in response to another, for example, being angry when someone knocks over their block structure. Even as children move to more internalized regulation they require the support of a knowledgeable adult (Boyer, 2010; Elias & Berk, 2002; Miech, Essex, & Goldsmith, 2001; Ontario Ministry of Education, 2010- 2011). When teachers have an understanding of how self-regulation develops they are better able to be mentors and facilitators. On the contrary, when they lack this understanding they do not have the strategies to support this crucial area of children’s development and tend to ‘manage’ children’s behavior and emotions (Blair & Diamond, 2008; Kochanska et al., 2001; Post et al., 2006; Rimm-Kaufman et al., 2009).

Beginning teachers often request professional learning with a focus on behaviour management. Teachers express some dissonance between their training in behaviour management and ways they can support children's development of self-regulation (Boyer, 2009). There are commercial products available and bought for use in Kindergarten classrooms that are intended to help educators teach children about managing their behaviour. One example is packaged programs that rely on a character or puppet to convey a *lesson* for children to learn. Self-regulation is a complex construct that can't be simplified and reduced to behaviour management techniques found in packaged programs (Blair & Diamond, 2008; Boyer, 2009; Shanker, 2010). One way of advancing both the play and self-regulation discourses forward is by reconceptualizing or reexamining play.

Interconnectedness of Play and Self-regulation in the Area of Cognition.

The relationships between play and cognition have been well established in the literature (Elias & Berk, 2002; McCain, Mustard, & Shanker, 2007; Miller & Almon, 2009; Pascal et al., 2010; Samuelsson & Carlsson, 2008; Whitebread et al., 2009). According to Whitebread et al., (2009), much of the recent work centred on children's play has been influenced by the theories asserted by Vygotsky (1976). Firstly, Vygotsky (1976) connects sociodramatic play to children's developing self-regulation. During sociodramatic play children develop their own *zone of proximal development*. In other words, children are engaged in learning that is at the 'edge' of their capacities. They are in control of their own learning in experiences they can accomplish with or without guidance (Elias & Berk, 2002; Whitebread et al., 2009). Children may be noticing for the first time that they can influence how to dramatize a character from a story they have heard, how their shadow moves when they move or how it feels to move a paint brush over a canvas. Researchers and play advocates alike express a growing concern that the complex

learning that children are engaged in during the aforementioned examples of sociodramatic play are not recognized as valuable (Miller & Almon, 2009; Samuelsson & Carlsson, 2008; Whitebread, et al., 2009; Whitebread, Anderson, Coltman, Pasternek et al., 2010).

Secondly, the power of language and communication as a “self-regulatory tool is a fundamental assumption of Vygotsky’s sociocultural theory” (Elias & Berk, 2002, p. 218). Vygotsky describes children’s private speech or self-talk as the prime mode for shifting from being externally regulated (e.g., by a parent or teacher) to the self. Play is the ideal context for children to begin assimilating adult demands, prompts, descriptions, explanations and strategies into their own self-talk. By integrating this language, they are developing complex cognitive processes such as “attention, memory, planning and self-direction and to re-direct and regulate their own behavior” (Elias & Berk, 2002, p. 218). Sociodramatic play is a form of communication that necessitates the participants to communicate with each other, using language gestures and symbolic gestures to describe and innovate on familiar experiences, imagine and create new narratives. Pretense supports children’s self-regulation, which subsequently optimizes their potential to learn from engaging with people and resources in their environment (Pascal et al., 2010; Perls, Merget-Kullmann, Wende, Schmitz, & Buchbinder, 2009).

Thirdly, Vygotsky (1976) argues that sociodramatic play makes a critical contribution to children’s development of symbolic representation. He describes how this symbolism evolves over time for children. For example, toddlers will engage with a ‘real’ object such as a toy phone to have a ‘pretend’ conversation and as they develop more cognitive flexibility they could use a block or a physical gesture to dramatize a phone conversation (Blair & Razza, 2007; Elias & Berk, 2002; Glassman, 2010).

Sociodramatic play contributes to literacy acquisition. Pretend play requires children to determine tasks and goals, to carry them out, and provides opportunities for narrative recall and use of complex language. Children in complex pretend play conditions use more advanced language and have higher levels of narrative structure than they do in other situations. Children become storytellers, composing new stories and creating new versions of familiar stories. The ability to use narrative and more advanced oral language are linked to later reading comprehension and fluency (Blair & Razza, 2007; Martin & McLellan, 2008; Nicolopoulou et al., 2010; Pascal et al., 2010; Perls et al., 2009).

Saracho and Spodek (2006) suggest that when literacy materials are embedded within the play setting, children increase their use of literacy materials and engagement in literacy acts. By using and creating environmental print such as an ‘open sign’ at an imaginary store in the block centre, children apply their understanding of what reading is and how print works. Pretend play helps children develop schemas and scripts as organized mental structures that are applied to understanding print (Blair & Razza, 2007; Nicolopoulou et al., 2010; Samuelsson & Carlsson, 2008; Whitebread et al., 2010). Play-based learning environments provide children opportunities to develop competencies within but also beyond the cognitive domain.

Interconnectedness of Play and Self-regulation in the Area of Social and Emotional Development.

Martin and McLellan (2008) argue that, “educational systems have a social, institutional mandate to prepare students as persons and citizens capable of functional levels of both self-sufficiency and civic participation” (p.440). This requires policy makers within governments and school boards to view self-regulation from the broadest perspective. Vygotsky (1976) and more current scholars would argue that this broad scope includes the social and emotional

development inherent in sociodramatic play (Elias & Berk, 2002; Samuelsson & Carlsson, 2008; Whitebread, et al., 2009).

Sociodramatic or pretend play deeply involves children as they try out a variety of roles and scenarios which facilitate joint planning, perspective-taking and mental representation. Pretend play expands children's growing theory of mind – that is, their understanding that others have beliefs, desires and intentions that are different from their own (Elias & Berk, 2001; Whitebread et al., 2009). Sociodramatic play is about negotiation and getting along with others, often overcoming different perspectives and backgrounds. The focus shifts the expectation that children will comply with rules that are imposed and enforced by adults to children developing internal structures and mechanisms that transcend the need for constant adult intervention and direction (Elias & Berk, 2002; Perry et al., 2002; Pascal et al., 2010; Shanker, 2009; Whitehead et al., 2010).

Entering the novel environment of the Kindergarten classroom can elicit several emotions for children, such as excitement, fear, and anxiety. Their ability to regulate these emotions contributes to the relationship with the teacher. In turn, the teacher's reaction to children's emotions as well as their ability to regulate their own emotions affects children's adaptation to Kindergarten (Boyer, 2010; Blair & Razza, 2007; Garner & Spears, 2000; Meich, Essex, & Goldsmith, 2001). According to Pontiz et al., (2009) the teacher-child relationship can be negatively impacted when the teacher believes a child repeatedly expresses an emotion perceived as negative. If a child expresses an emotion that is considered positive or inhibits his/her negative emotions the relationship is positively influenced. This reality brings a bias to the relationship and one could argue a 'behaviourist view' of self-regulation. In other words, it may result in children being given external rewards such as a sticker for compliant behaviour.

Pontiz et al., (2009) discuss how teachers can sometimes interchange the words self-regulation and behaviour and believe they hold the same meaning. It could be argued that it is unrealistic to expect children to be able to self-regulate at the Kindergarten threshold. Garner's and Spear's (2000), study suggests that "low and middle-income children are more alike than different when it comes to the reasons they become angry and their response to their own anger" (p.259). Researchers agree emotion-regulation and socioeconomic factors need further examination (Perry et al., 2002; Perry & VandeKamp, 2000; Raver, 2004; Whitehead et al., 2010).

Teachers should not be solely held accountable for these misconceptions. Scholars argue that the variation in beliefs, understandings and practices are the result of a very complex set of interrelated factors that include, government agendas and mandates, cultures, views and beliefs held by individual educators, administrators and families (Perry et al., 2002; Perry & VandeKamp, 2000; Pascal et al., 2010; Raver, 2004; Whitehead et al., 2010). Self-regulation is linked to school success or failure (Ponitz et al., 2009; Rimm-Kaufman et al., 2009; Shanker, 2009). An optimal condition for Kindergarten children's self-regulation to develop is play-based learning (Perry, VandeKamp, Mercer, Nordby, 2002; Samuelsson & Carlsson, 2008; Whitebread et al., 2010).

The perspectives and views required to advance both the play and self-regulation discourse may feel like swimming against the current. The literature reinforces the need to continually examine the research to find some common ground on how to translate what is known about the complex role of the teacher in play-based learning and supporting Kindergarten children's development of self-regulation into practice.

In view of the research on teacher beliefs it is clear that they play a significant part in what is actually practiced with respect to play and the development of self regulation. This is a complex issue worthy of constant investigation because the implications may be consequential for children's experiences in Kindergarten. If Kindergarten programs are not all based on educational research, then what is driving them? Is a teacher's pedagogical text stuck in a cycle of doing things because that's the way they have always been done (Van Manen, 1991).

Hedges (2010) advocates how imperative it is that educational research is relevant and has "applied validity" (p.299). One way of bringing externally conducted research into classroom practice and ensuring professional learning translates into practice is through studies conducted using action research directly in the classroom (Hedges, 2010, Keyes, 2000) Therefore, this study will build on the participants prior knowledge and engage teachers in the research process with the ultimate goal of shifting a self-determined aspect of their pedagogy with respect to play and the development of self regulation.

Research Questions

The questions guiding this qualitative research study are:

1. What do teachers believe about the connections between play-based learning and children's self-regulation?
2. How did their understanding of these connections affect their thinking about practice?
3. In keeping with action research design this question was collaboratively determined during the first focus group: What is observed when children co-construct play-based learning?

CHAPTER III

Methodology

Overview

A qualitative approach was applied to address the research questions as the data collected was used to understand behaviours, experiences, interactions and social contexts (Creswell, 2009; Hendricks, 2006; Stringer, 2004). The primary intent of using a qualitative approach was to gather firsthand knowledge and perspectives of the teacher participants. Qualitative research tends to gather data in the context where the participants experience the issue being investigated (Creswell, 2009), and thus is a good match for this study which took place directly in a school.

According to Keyes (2000), teachers describe a disconnect between educational research and their classroom practice using words such as “meaningless, irrelevant, and artificial” (p. 4). In contrast, the central question examined in this study includes teacher’s beliefs about play and self-regulation identified by both teachers and researchers as meaningful, relevant and authentic educational issues that require continuous and critical examination (Elias & Berk, 2002; Nicolopoulou et al., 2010; Whitebread et al., 2010). One of the purposes for engaging in research in education is to provide practitioners methods that have direct applications to their classroom practice.

So how can the reported divide between educational research and the application into classroom practice be addressed? Teacher participatory action research has been shown to be an effective method for professional learning and for making connections between research and practice and is therefore the strategy employed in this study (Gravett, 2004; Hedges, 2010;

Henson, 2001). Teacher participatory action research also provides practitioners with methods that have direct applications to their classroom practice.

Research Design

Theoretical framework.

One of the principle working paradigms for this study is based on social constructivism. Social constructivists believe, “individuals seek to understand the world in which they live and work” (Creswell, 2009, p.8). Knowledge is rooted within the processes through which it is created. Studies undertaken from a social constructivist worldview reject the notion that there is an objective singular truth. They seek to ascertain commonalities in viewpoints and perspectives. Meaning is created directly by the participant’s set of experiences (Creswell, 2009; Glassman, 2010; Stringer, 2004). According to Creswell (2009) “the goal of the research is to rely as much as possible on the participants’ views of the situation being studied” (p. 8).

Social constructivist researchers recognize that participants’ views are shaped by their culture and history. Researchers are aware “their own backgrounds shape their interpretations and they position themselves in the research to acknowledge how their interpretation flows from their personal, cultural and historical experiences” (Creswell, 2009, p. 8). Studies with a social constructivist stance aim to include participant’s background, knowledge and history in the perspectives and interpretations of the research (Creswell, 2009; Glassman, 2010; Stringer, 2004). In keeping with these social constructivist principles, this study was designed as a collaborative examination with teachers situated directly in their school. By drawing out common perspectives, attention was given to the teachers’ role in play-based learning and in the development of Kindergarten children’s self-regulation. This focus is important as Glassman’s (2010) social constructivist perspective argues that the role of the adult is to

act as a social interlocutor who is also a representative of society. These adults mentor children in specific, culturally appropriate activity. The role of the educational process is to prepare children for more complex activity in the larger social community. (p. 4)

Social constructivists believe the child is highly capable and competent. Hedges et al., (2010) widen this lens and propose that children play a role in their own learning. They agree that children learn through observing others but this must not be mistaken as passive or incidental. Consistent with a sociocultural and constructivist point of view, Hedges et al., (2010) situate children's learning in the "funds of knowledge" framework (Gonzalez et al., p. 189). Children enter the kindergarten classroom with their own narratives, histories and rich backgrounds. A desire to explore these notions critically with teachers is an important motive for this study.

Another lens applied to this study is critical thinking or critically reflective practice which is inherent in the action research cycle. MacNaughton and Hughes (2011) claim that reflecting on practice acts as a "prelude to changing or improving it" (p. 100). According to MacNaughton and Hughes (2011), when the focus of a study is in the context of professional learning critical reflection looks to interpretivism and assumes that teachers bring prior knowledge and experience to the study. This schema is integrated with what MacNaughton and Hughes (2011) refer to as "sound thinking" which includes "thinking logically, becoming aware of other ways of thinking, being fair and using sound evidence" (p. 101). This premise aligns with the direction of many school boards in the province. Teachers are expected as a standard of practice to adopt evidence-based strategies in their classroom practice.

Critical reflection promotes intellectual engagement about practice. Action research allows teachers to examine current practice through a critical reflective lens. This process lends itself to teachers thinking about alternative and perhaps more effective practices. According to

Stringer (2004), social constructivist and interpretivist perspectives have proliferated educational research, pedagogies and practice.

Research Approach

The fundamental intent of qualitative research is to offer opportunities to gain a deeper understanding of human beings in the specific context in which the questions being studied naturally occur (Creswell, 2009; Hendricks, 2006; Stringer, 2004). A hallmark of qualitative research is descriptive data that is “intended to provide rich, detailed information rather than reducing the data to summaries in numerical charts” (Mertler & Charles, 2009, p.193). By employing this approach, more detailed and nuanced data can be collected to provide information regarding the “complex, interactive systems” pertaining to teachers’ beliefs towards play-based learning and its impact on Kindergarten children’s self-regulation (Hendricks, 2006, p.3).

Research Strategy

According to Zuber-Skerritt and Fletcher (2007) “increasing numbers of higher degree students, especially part-time candidates wanting to combine work and study by researching their professional practice, are using action research” (p. 413). As a former program coordinator of an Early Years Department in a large urban school board and in my current role in a Ministry of Education and one who is also studying part time, action research was an ideal strategy to conduct my research. In contrast to experimental methods sometimes used in educational contexts, researchers who employ action research are not concerned with making knowledge claims that can be generalized nor do they typically look for cause-effect relationships; alternatively, importance is placed on exploration and description (Hendricks, 2006;

MacNaughton & Hughes, 2009; Stringer, 2004). Unique to action research and employed in this study is the engagement of the practitioners (teachers) in the exploration and description.

Clarke and Hollingsworth (2002) advocate that a model that most aligns to professional growth and change in practice must include teacher inquiry or action research. They argue that teacher professional growth is closely related to knowledge acquisition which translates more often into actual classroom practice if teachers are part of the research process. Action research challenges the status quo. It shifts professional learning away from teachers being passive consumers of educational knowledge solely produced by others and places them in the position of developing more relevant and applicable knowledge (Galini & Efthymia, 2010; Hedges, 2010; Keyes, 2000). Gravett (2004) contends that when teachers participate in action research it “increases the probability of enduring transformation in teaching” (p.260). Through action research, teachers can begin to join the dots between research, professional learning and practice. It is for these reasons that action research is the ideal methodology for this study.

MacNaughton and Hughes (2011) describe action research as a “cyclical process of think-do-think” (p. 1). Teaching is considered a research based profession filled with reflective practice (Hedges, 2010). In this study, the participating teachers were invited to explore what they were presently thinking and doing about play-based learning and self-regulation. They collaborated on an action and a question to create a change aligned with the overall research question. The teacher researchers in collaboration with the primary researcher decided to examine “What is observed (about play and self-regulation) when children co-construct their learning?” The determined action to be taken was to co-construct learning with children for example, inviting children to plan and build together materials at a learning centre. Based on the

action research cycle they came back together to think about and discuss the observed effects with the intent of deepening understanding and transforming practice.

Participation and Protection of Human Participants

The action research strategy employed in this study is specifically designed to engage humans in the research process. In fact, they are considered co-investigators with the prime investigator (Hendricks, 2006). In order to minimize risk and assure the protection of participants in both the design and proposed conducting of the study, research plans were submitted and approved by the Ryerson Ethics Board (REB). In keeping with the guidelines for conducting external research within a school board, the REB approved plans along with the board required forms were submitted and approved by the research committee in a Toronto area school board. In addition, the recruited participants were required to sign an informed consent (*see Appendix A for the Consent Agreement*) that contained details about the study and described how the participants' rights and privacy will be protected. The risks and time requirements were assessed and weighed against the benefits of participation. The consent form outlined the proposed benefits of participating in the study such as: the opportunity to inform the broader teaching profession on the findings of the study, an opportunity to reflect on practice and to collaborate with other Kindergarten teachers. Confidentiality was maintained throughout the study. Pseudonyms were allocated and appear on all written transcripts, during data collection and in all recorded documents.

Recruitment and Sampling

Rather than choosing the participants randomly or systematically, action research uses the technique of purposeful sampling (Hendricks, 2006; Stringer, 2004). In line with action research, participants were selected using the method of "concept sampling so the participants

had particular knowledge related to the issue being studied” (Stringer, 2004. P.50). With this premise in mind I relied on my professional networks within this school board. To recruit participants and contacted the principal of a school where a few teachers had expressed an interest in exploring their classroom practice. For this qualitative study a small sample size was deemed acceptable as there is no requirement to have a large enough sample to conduct statistical analysis.

Following the principles of action research design, this study took place in the natural setting of the classroom and school. According to Hendricks (2006) “the context is not controlled but it is studied so that the ways that context influences outcomes can be understood” (p. 3). Four Kindergarten teachers were recruited as potential participants from this one school. Recruiting the teacher researchers from one school provided the opportunity for them to be mutually supportive of one another.

A requirement for external research in this school board is contact with the school principal. This step in the process serves as a method to acquire support and permission to approach the teachers (*see Appendix B for Principal Support Letter*). Initial communication with interested participants was an information letter (*see Appendix C for the Information Letter*). To ensure voluntary participation, a clear indication that teachers were not required to be part of the study was included on the letter. If a potential participant agreed to partake in the study a follow up email was exchanged.

Participant Demographics

Four Kindergarten teachers currently teaching in half day Kindergarten programs were chosen for this study in view of their firsthand experiences, educational backgrounds, prior knowledge about play-based learning and self-regulation along with a willingness to reflect on

their practice. The participants all teach at the same urban school with a diverse student population. By choosing participants from the same staff, opportunity for mutual support and collaboration was provided. They have pre-established norms for planning and assessing together along with supporting each other through their professional learning. As a team, they work effectively together to help engage students in play-based inquiry programs.

Participant One: Steve Daniels (pseudonym) is a first generation Canadian of South Asian descent. He has been teaching Kindergarten for sixteen years. He was a Kindergarten teacher in a previous research project at a Kindergarten site that explored the complete integration of child care and Kindergarten. The children attended the program all day in one space and Steve was the Kindergarten teacher, partnering and collaborating with the child care staff. He engages regularly in professional learning such as leading a primary collaborative professional learning project focused on aligning the transition between Kindergarten and Grade 1 by intentionally embedding literacy and numeracy in sand, water and blocks. In addition he has been part of school-based study group on early numeracy.

Steve is a reflective practitioner and a natural leader on his school team and the larger Primary Collaborative team. He enjoys opportunities like this study as it gives him the chance to further challenge his constructivist beliefs and ensure that his spoken beliefs are truly what he practices. Steve has a keen interest in helping educate parents about play based inquiry learning and encourages the rest of the teachers in the school to do the same by reaching out to each parent individually.

Participant Two: Jessica Smith (pseudonym) is originally from Northern Ontario and has been teaching eleven years. Jessica is Caucasian and first generation Canadian. She began

her career teaching in Eastern Ontario where she supply taught for one year and taught grade 1/2 for the other year. She then moved to her current school where she taught grade three for a year and then moved to Kindergarten. She engages regularly in school-based professional learning, is part of the same Primary Collaborative as Steve and was a part of a study group on early numeracy.

Jessica also holds the school's primary "Position of Responsibility" (POR). She is responsible for planning and facilitating primary division meetings where school initiatives are discussed as well as children with special needs. Jessica is also a reflective practitioner but has a quieter style of leadership than Steve. Jessica and Steve do the bulk of their planning together, while at the same time supporting the other two teachers on the Kindergarten team. Jessica followed a Kindergarten teacher who was a 30 year institution in the school. That previous teacher had a much more traditional Kindergarten teaching style. Jessica has had to do a significant amount of work educating parents and the Kindergarten educational assistant about her play-based, inquiry learning program.

Participant Three: Abbey Martin (pseudonym) is first generation Canadian whose parents were born in Greece. She started her career teaching in a Montessori program. She began teaching in the public school system thirteen years ago (three years off for a parental leave). She taught Grade 1 for seven years prior to her parental leave and has taught Kindergarten for three years. Abbey engages in school-based professional learning and brings the perspective of having a daughter who is in Kindergarten at a neighbouring school.

Abby's participation in the school and grade team professional learning initiatives has become more active over the past three years as her confidence grows with play-based inquiry

learning. Abbey has had many positive learning “discoveries” in her classroom this year that she has shared with the other three colleagues on her team. While Abbey is confident to try new things with her students and follow the students’ lead in the classroom, she is sometimes reluctant to share these experiences with her colleagues. This is gradually changing. Abbey has shared some significant professional learning moments with the entire school staff this year.

Participant Four: Sasha Davis (pseudonym) was born in Canada and her parents were born and raised in Italy. She has her Early Childhood Education diploma as well as her Ontario Teaching Certificate. In recent years she worked in a non-profit child care centre, taught ECE courses at a local community college and was a Special Needs Assistant in her current school board, prior to returning to the faculty of education to get her teaching degree. Sasha is new to teaching Kindergarten and has just completed her first year.

Jessica has been Sasha’s mentor in the New Teacher’s Induction program. Sasha has grappled with the more traditional theme-based style of teaching Kindergarten (taught as the appropriate lesson format in her faculty of education program last year) and an authentic inquiry based program based on children’s interests and needs. Sasha has relied on the support of Jessica and her other two colleagues.

Data Collection

Two major sources of data in action research are garnered from interviews and focus groups with participants. A central principle in action research and in qualitative interviews is the acknowledgment of multiple realities and perspectives that are seen as intrinsically subjective. Interviews and focus groups enable participants to describe their viewpoints and interpret the research question on their own terms thus lending their “voice” to the inquiry process

(Hendricks, 2006; Stringer, 2004; Zuber-Skerritt & Fletcher, 2007). Data collection was framed by a model Creswell (2009) describes as "Experiencing - through observation and field notes, Enquiring-researchers asking questions and Examining - using and making records" (p. 564). The tools included transcripts from a group interview and two focus groups. The participants recorded their classroom observations and discussed them during the interviews and focus groups.

Unstructured Interview

Inherent in the cyclical process of action research is the emergent nature of the study (Hendricks, 2006; MacNaughton & Hughes, 2011). The teacher researchers (participants) proposed being interviewed together rather than having separate interviews as originally planned. They expressed a preference to hear each other's perspectives. These teachers have previously established working norms of collaborating, planning and learning together and were accustomed to discussing their practice publicly. Participants were reminded that at any point (this was especially significant given the decision to conduct the interviews as a group) if they experienced any discomfort or decided to end the interview they could remove themselves at anytime without prejudice. The group interview was approximately ninety minutes in duration and a private location was secured by the school principal.

Each participant was asked the same set of questions within the group context. The purpose for using this technique was so the data generated for each question could be readily compared and analyzed. The interview began with questions seeking the participants' perspectives on play-based learning, self-regulation, and continued with what role they believed they hold in both of these constructs (*See Appendix D for sample Interview Questions*). The practice of using open-ended information collected during the group interview allowed the

participants to reflect on and extend their own thinking regarding their beliefs towards play-based learning and Kindergarten children's self-regulation.

Additional data was obtained through prompting questions that emerged in the course of the interview. These questions were asked judiciously as to not lead the participants. According to Stringer (2004) "prompt questions are not designed to elicit particular types of information the interviewer might see as desirable, but merely to enable the interviewee to think more closely about events or perspectives described" (p.70).

Action research requires the participants to determine an action they choose to focus on and believe will cause a change in their practice. As the interview drew to a close the teacher researchers made a decision about what that specific practice would be in relation to the overarching research question. Collaboratively, the lead researcher and the teacher researchers decided to focus on "What is observed when children co-construct their learning?" Considering the "think-do-think" cycle described by MacNaughton and Hughes (2011) the next data collection methods were two subsequent focus groups.

Focus Groups

MacNaughton and Hughes (2011) describe focus groups as an opportunity to discover views on an issue or topic. Stringer (2004) argues data gathering in action research becomes more meaningful when the participants are able to explore their experiences interactively. The teacher researchers in consultation with the lead researcher decided their change in practice would involve an investigation of co-constructing learning with children (e.g., what happens to children's play and self-regulation when they are invited to determine what materials will be added to a learning centre, what they would like to create at a dramatic play-centre, and how to be inclusive of all children in the co-construction process).

Using a focus group served a critical purpose for the teacher researchers and for the overall design of the study. It gave them the chance to connect and check their experiences with each other, to probe deeper and critically reflect on the process thus far. Questions were posed that asked the participants to reflect on the observations they made about themselves and the children in relation to the practice being examined. At this focus group any necessary adjustments to their action were established.

The final phase in the action research cycle was a second focus group. Participants were asked similar questions to focus group one along with those that emerged during the conversation (*see Appendices E, F, and G for sample focus group questions*). However, this focus group differed slightly to embody another action research principle. Action research also involves the study of the change in practice (Stringer, 2004). Consequently, participants were asked to reflect on and describe their perspectives on being a teacher researcher.

Each focus group was approximately ninety minutes in duration. They were held at mutually agreed upon times approximately three weeks apart in a private location. Data collected at each focus group was recorded using an audio-recording device and later transcribed verbatim in order to ensure accuracy in the data. In addition the data from the first focus group was shared at the onset of the second focus group. Participants were invited to review the transcribed data and request any changes to ensure greater trustworthiness in the data collected after each focus group.

Data Analysis

MacNaughton and Hughes (2011) suggest that data analysis begins with a well thought-out method for recording and organizing data gathered during the study. In that spirit, a two-

column researcher's note page was instituted. The left column reflected the transcripts verbatim. The right column held descriptive notes including non-verbal communication (Creswell, 2009).

MacNaughton and Hughes (2011) describe several methods for coding data appropriate and relevant to action research. For this study, coding the data ran parallel to transcription of the data. This facilitated the sharing of the data immediately with the participants and allowed the researchers to collaboratively identify early emerging themes, reoccurrences, and questions. MacNaughton and Hughes (2011) refer to this as "sifting the data" and employing an "economical coding strategy" that is key to action research (p. 175). Exercising this coding strategy early in the study allowed the teacher researchers to participate in determining any adjustments to their change in practice or where to go next.

Hendricks (2006) "explains that the interpretation of qualitative forms of data involves analyzing social action and human activity as if it were text" (p. 134). When reading the data one tries to make meaning, make connections, and inferences of any emerging trends. The purpose of action research is not to "identify facts, or what is actually happening, but to distill or crystallize that data in ways that enable the researcher to interpret and make sense out of the collected materials" (Stringer, 2004 p.112). Creswell, (2009) describes coding as the process that allows researchers to organize the data into chunks and segments of text to assist in bringing meaning to information.

As data was placed in segments, it was further analyzed by continuously and inductively searching for repetitive themes within the different data sets such as frequency, magnitude, contradictions, and associations. Once the emerging themes were identified the data was reviewed again to look for exceptions. In doing this repeatedly the themes were continuously refined. As the data was analysed it became clear that the teachers established beliefs about their

practices and the connections between play-based learning and self-regulation. The beliefs evolved over the course of the action research process. Thus, the findings were organized into three broad sections to match with the phases of action research. Inherent in action research is the opportunity for the participants to review the data not just early in the process but at each of the focus groups. This process strengthens the data analysis method and further elucidates connections made at all levels of the analysis.

Authenticity and Trustworthiness

Stringer (2004) asserts that “qualitative methods are essentially subjective in nature and local in scope, procedures for assessing the validity of the research are quite different from those used for experimental study” (p. 56). In the case of qualitative action research there are identified methods for establishing trustworthiness. One is triangulation which was established through multiple sources of data which included documented classroom observations from the teacher researchers, a group interview and two focus groups. These multiple and rich sources of data built “adequate and appropriate accounts and understandings for the base of working towards a resolution of the research problems” (Stringer, 2004, p. 58). Exploring teachers’ beliefs and about play-based learning and self-regulation is a complex issue. The more opportunity built into the study’s design for the teacher participants to reflect on their thinking individually and with others the more likely they will benefit from participating in the study.

Action research requires that participants have multiple opportunities to review the data. This increases trustworthiness and reduces bias. For example, the Kindergarten teachers were provided the opportunity to examine the data to ensure the transcripts accurately represented their perspectives. It was made clear to the participants that they could eliminate or revise their

responses. In addition participants were offered the opportunity to see the analysis and final report as part of an expansive member check process (Stinger, 2004).

This research strategy includes ethical considerations to protect the privacy and confidentiality of the participants. Any use of video was part of their previous and regular method of reflecting on practice. No actual videos were shared during the research. The participants referred and reflected on their practice of using video to record their practice. Transcripts stored on my personal computer were password protected. Hardcopies of the transcripts and audiotapes were kept in a locked filing cabinet and will be destroyed one year after the final report.

Voice of the Researcher

Nicolopoulou et al., (2010) stress “it is essential to re-evaluate play-based educational practices and to understand how they can be used most effectively in young children’s education” (p. 42). They go on to explain “to gain better insight into how play can be used to create powerful contexts for learning and development, it is necessary to obtain a more complete and profound understanding of play itself” (p.43). These words resonate deeply and are in part the motivation for my work within and beyond this study.

My current job has afforded me opportunities to be in Kindergarten classrooms across the province. In addition, as a past coordinator of an early years department in a large urban school board I spent a great deal of time facilitating professional learning for Kindergarten teachers in and out of their classrooms. These experiences have provided me with a variety of perspectives on teacher’s beliefs and practices towards the ideal Kindergarten learning environment.

I have a strong bias that play-based learning is essential in an optimal early learning environment in Kindergarten and beyond. I have witnessed a wide range of interpretations of play-based learning. In addition, I have noticed many Kindergarten teachers managing or regulating children rather than supporting their self-regulation. As a person who facilitates professional learning, I believe it is incumbent on me to research and learn alongside and with teachers in order to move their practice forward in the areas of play-based learning and self regulation.

Creswell, (2009) uses the phrase “backyard research” which involves the researcher conducting the study in their own organization, which is the case for this investigation (p.177). I have worked directly with the Kindergarten teacher participants prior to conducting this study. As a result I had to be cognizant of “experimenter expectancy.” Experimenter expectancy happens when researchers who are highly committed to their work inadvertently convey desired outcomes to subjects (Neuman, 2006). Through extensive reading and my experiences I have come to believe that finding ways to connect educational research and classroom practice is critical. Teachers and researchers need to continually acquire knowledge about play-based learning; the role of play in children’s self-regulation and the critical role teachers have in both of these essential aspects of a Kindergarten program.

CHAPTER IV

Findings

MacNaughton and Hughes (2011) propose that left in isolation individuals tend to reinforce their current thinking rather than create new thinking. To begin the cycle of action research the participants in this study reflected together on their current beliefs about the connections between play-based learning and self-regulation. They determined an action to create a change in their practice. After trying the action out they came back together again and examined what they believed were the effects of that action on their thinking about practice. The teachers' beliefs evolved over the course of the action research which required organizing their thinking about the connections between play-based learning and self-regulation under the following three overarching sections: *Beginning the Action Research Journey: Uncovering Beliefs about Play Based Learning*; *Continuing the Action Research Journey: Determining an Action to Change Practice*; and *Completing the Action Research Journey: Reflecting on the Effects of the Action on Practice*. As suggested by Stringer (2007) the findings in this action research are dominated by the voice of the participants.

Beginning the Action Research Journey: Uncovering Beliefs and Practices about Play-Based Learning

In the first phase of the action research cycle the participants were asked, "What are your observations and beliefs about play based learning?" Initially the discussion included a range of responses from identifying the stages of play (e.g., parallel, co-operative) to a description of the learning environment (e.g., blocks, water tables). In Ontario, the Kindergarten Program document holds play-based learning as one of its core principles and sets out learning expectations for the children (Ontario Ministry of Education, 2006). Therefore, it was important

to examine how and what learning happens in play. The participants all agreed play is the most natural way for children to learn. They began to reflect on their role and the multiple possibilities for learning through play. Through the course of the discussion four significant findings emerged in relation to the teachers' beliefs about the connections between play-based learning and self-regulation:

Belief #1: Breaking free from didactic models.

This finding refers to the need for educators to let go of scripted, teacher-dominated programs in order for play to be valued and able to reach its full potential for children's learning. The participants all expressed how much they had changed their practice from the onset of their career. Steve, an experienced Kindergarten teacher believes that he is a "staunch advocate for play-based learning but still has so much to learn." That sentiment was echoed by Jessica, Abbey and Sasha. However, they all felt like their current beliefs and practices were very different from the pervasive models amongst many of their colleagues. They all share a belief that children learn through play. Each of them recounted how they resisted adopting didactic practices.

Jessica has been teaching for eleven years and was the first of the four participants to be on staff at the school. Her previous experience is teaching Grade One and Two. She started teaching Grade Three in the school and then moved to Kindergarten at the same time that Steve joined the staff.

Jessica: I think of us that first year of Kindergarten. It was really the hardest part because we were taking over for people who had been teaching in the same class in the same way for a very long time. When Steve and I took over the parents [wondered] where is the turkey? Every Thanksgiving we have to make a turkey and every Christmas we were expected to make a Christmas tree. Steve and I spent so much time talking that first year.¹

¹ All quotes represent the exact words of the participants except where cleaned for readability

Jessica and Steve talked about how they both believed that children were competent and capable. Steve stated, “adopting a practice where the teacher is in charge and tells the child all the answers didn’t fit with my beliefs.”

Steve - At first we were dabbling with different things. We never did [teacher-directed themes] so it was already one thing out of the way. Each step we did made it easier for the next thing leaving aside practices that didn’t work and lent themselves to rote learning for example, the calendar routine. Each thing [didactic practice] we let go of was more inspiring especially since we had the conversations between Jessica and I and then Abbey joined.

Abbey began her career as a Montessori teacher. The models during her apprenticeship in a public school board were in direct opposition to the programs Steve and Jessica were establishing. Prior to teaching Kindergarten she taught Grade One for seven years. It was an expectation lead and supported by the school principal that they would collaborate and develop play-based programs. Key to this process, as the teachers noted as well, was the principal who had extensive expertise in early years and supported play-based programs.

Abbey - How it worked in a Montessori classroom is the teacher really acted as a facilitator. It was all very differentiated but it wasn’t very social. I found it very isolating for the children. Going into the public system and doing my apprenticeship, I saw the teacher call the children to one centre and then the kids all making the same art. It felt really strange going from one extreme to the other. I thought that was the way they do it in public school. The shift happened when I came here.

Sasha just completed her first year of teaching after extensive experience as an early childhood educator in a non-profit child care setting as well as a course instructor at a local community college. She spent one year as a Special Needs Assistant and then completed her Ontario Teaching Certificate. According to the group having her early childhood education diploma was considered an asset and a good fit for the Kindergarten programs at the school. Sasha articulated what it had been like for her making the transition into teaching in a public school.

Sasha - I am still grappling with what I did with my ECE with play-based learning. In a day care we had themes with the strict rigid rules, you know so many at this centre. It is all about the dynamics of who you are working with. The work [this year] is to break all those formalities so in essence play can happen.

This finding is congruent with the literature that protests the disappearance of play-based learning due to the increasing and widespread use of more didactic programs (Nicolopoulou et al., 2010; Miller & Almon, 2009). The teachers in this study had to break free from practices that had a long history in the school, had been part of their own children's kindergarten experience, and modeled in nearby schools. It is by moving away from teacher-scripted programs that children become more visible in the program (Nicolopoulou et al., 2010; Miller & Almon, 2009). The teachers no longer predetermine every aspect of the program. Children are invited to contribute ideas to the physical learning environment as well as share their opinions, express ideas and perspectives.

Belief #2: In play children are empowered and engaged, then learning is revealed.

This finding makes reference to the teachers' beliefs about play. Early in the discussion there was a tendency to talk about what the children were doing or what material they were playing with rather than what they were learning. When probing further Sasha stated children are "empowered when they are playing." The others concurred with that observation and added how much more engaged the children are when they are not required to complete rote learning tasks like standardized art and completing generic worksheets.

It was evident that the teachers believed that when children are engaged they are more available to learn. Jessica felt that it was a "challenge to think of a specific example because there is so much learning happening." Sasha and Abbey shifted the direction of the conversation and talked about the socialization that happens in a play-based program. Sasha felt, "there are so

many more opportunities for children to interact and learn from each other” and the group identified the possibilities for leadership skills.

Abbey added how much more learning, such as oral language and vocabulary development, she observed when children were playing. The others agreed and added their observations of inquiry skills and how more children were engaged in authentic writing. Abbey stressed that even though she did “not use a single worksheet” even some of her youngest children knew their letters and sounds and were actually using them in their play at the blocks and dramatic play centres. She recounted a previous experience during her apprenticeship.

Abbey: Every fifteen minutes the children had to rotate activities. Your whole day was regulating and managing the children. The learning wasn’t rich. The [children] were not revealing what they liked or what their interests were. You didn’t have a chance to talk with them and get to know them as people. They came into a certain environment and they were told what to do and then they go home. It was the teacher driving the curriculum.

The group reacted to Abbey’s statement with complete agreement and added their belief that if the teacher dominates the children they are not benefiting from learning in play. Jessica recalled an example where the routine of limiting the amount of children at a centre (e.g., only four people can play at the blocks) had been opened up to negotiation with the children. Jessica explained, “now if the children come to me claiming there are too many children at a centre I say to them how could we solve that and now we decide together whether the number works.” Steve stated, “if they are not engaged how much learning are they going to do anyway?” If they are engaged much more learning is revealed.

Belief #3: Engagement leads to self-regulation.

The teachers reflected on how many of their colleagues were concerned with children’s behavior and yet they continued to establish routines that kept the teacher in control and the children’s choices very limited. For the teachers in this study, the practice of offering children

choice linked back to their belief that children are competent and capable. Shanker (2010) supports this notion that when children are provided choice in their learning environment they are more likely to be calm and alert and therefore able to self-regulate. The teachers in this study believed and reported this to be true in their classroom practice.

Why did they deduce they were different from some of their colleagues? They believed that teachers are less likely to offer children the opportunity to make choices if they don't trust children to make what they consider good choices. The teacher's speculated that in some cases the practice of limiting or controlling children's choices was a way to gradually teach independence. The participants began to offer children more choice and recounted this experience. They described their understanding of the links between choice, engagement and self-regulation.

Steve: For me choice is huge.

Abbey: I agree. Kids are not being deliberately rotated through centres that they do not want to spend time at so if they want to go play at the blocks they can go play at the blocks or if they want to listen to a story at the listening centre or go to the classroom library they can go there. So their interests drives their learning.

Jessica: The children are empowered by making choices.

The participants expressed that by directing their own learning, children self-regulate. Overall, they observed that when children have choice, the children are not being forced to come over and write but they are initiating writing all over the classroom. Another question these teachers hear from other colleagues all the time is, what if a child only wants to play at one centre repeatedly? This group did not dwell on this question. Instead they talked about making the experience rich within that centre rather than removing the child from a play preference. As a result of moving away from teacher-dominated practices and considering the child's perspective the teachers were committed to the belief that if children are given choice they are more engaged in their learning.

Belief #4: Moving from managing behaviour to supporting self-regulation.

This finding relates to the importance of a paradigm shift. Through exploring how their beliefs about play-based learning connected to children's self regulation, these educators arrived at the following conclusion: when the children were engaged in their play, the teachers were no longer in the role of managing the children's behaviour. This resulted in the teachers being much more available to listen, observe and interact with the children about their ideas, questions or even just to sit back and observe silently. By eliminating the role of manager, they were much more able to document observations. Thus, they felt more equipped with a deeper understanding of the children and more confident in a negotiated learning environment.

If children are regulated by the teacher then they are less likely to develop self-regulation competencies. The children over rely on the external regulator; in this case the teacher (Blair & Diamond, 2008; Buyse, Verschueren, Doumen, Van Damme, & Macs, 2008; Shanker, 2009). Sasha expressed "children know how to handle themselves." She believes that if children are "unable to regulate their emotions any other learning will be difficult because they are not engaged." She described a scenario where a child was upset about not being able to play a game because he had to leave the library. He was crying so Sasha decided to make the game available in the classroom. She was wondering if he was "crying to get his way" and giving him the game to play was effective because he would be unable to learn otherwise. This is the dilemma that teachers can regularly face. Sasha was unsure if she was supporting this child's self-regulation or as she put it "giving into him and letting him have his own way" so Jessica offered her experience.

Jessica - I came from grade three into Kindergarten. It was a brand new world and I had no idea about the young learner, no idea what a program should look like so I kind of stepped into this ready-made program. That first year was like if I practiced the theme-based stuff I was getting more behaviour problems by forcing every kid to sit down and

make a heart [for a Valentine's day theme unit] when they don't want to. I said why am I creating these problems for myself and the children. I didn't really know so that first year was about learning about the kids and learning about what they know.

Self-regulation involves memory skills, attention and flexibility in thinking skills (Blair & Diamond, 2008; Martin & McLellan, 2008; Shanker, 2009). The teachers talked about how play provides an opportunity for these skills to thrive. They believe many teachers still think of self-regulation as *compliance*. The group all agreed that they constantly have to check themselves to ensure they are not managing the children, or expecting compliance.

Steve: I just came back from a School Support Team Meeting and the child was just diagnosed with Attention Deficit Disorder and I am realizing that what I am doing is not working. The proximity, the verbal reminders, the touch on the shoulder, none of it is working. These are all behavior management techniques and they are not effective. I was thinking this is more about self-regulation. This is what we have been talking about. I need to think about how to support this in play-based learning.

These findings were based on reflections the teacher's made about their past and current practices. They illustrate how the teachers reported their beliefs shaped the play-based learning environment. During the next phase of the action research, the teachers began to think more deeply about how their beliefs were evident in their actual classroom practice.

Continuing the Action Research Journey: Choosing a Practice to Change

At this stage in the research the participants collaborated to determine an action they wanted to take in their practice. They talked about how much they appreciated having daily informal opportunities to reflect with each other. The occasions provided to collectively reflect on their practice were less frequent but even more beneficial. Through collaborative conversations it was decided that they would put a more focused lens on the question "What is observed when children co-construct their learning?" They would each provide opportunities for children to co-construct their learning, observe and document their observations. Through the

course of the discussion three significant findings emerged regarding the teachers' beliefs about the connections between play-based learning and self-regulation and what the teachers observed when children co-constructed play-based learning:

Belief #1: Making room for children's voices and stories.

The teachers explored what happens when they go beyond giving children the choice of where they want to play. This finding signifies that it was important to the teachers that they included the children's voices in the play and ensuring that their belief was translating into practice. Through critical reflection they realized that while they believed it was important that children contribute to the play contexts, for example determining what stage to set in the dramatic play centre, they needed to stop doing so much of the thinking for the children. Abbey reflected on a change she made and the response from the children.

Abbey: The children determined that the dramatic play centre should be a doctor's office as one of the children had just been to the doctor. We made a list of things that might be at the doctor's office. Instead of going and bringing everything in I had a group of [the children] go around the classroom and pick of few things that they could use in the doctor's office. They have been going there, writing names and the receptionist sits at the front role playing.

Sasha echoed Abbey's story and said the children in her class also voted to have a doctor's office. She relayed that not everyone wanted the doctor's office. Some of the children thought it should be an animal hospital. In the end they negotiated to have a place where both people and animals go. The group attributed some of the willingness of the children to share their ideas to their genuine desire to understand what the children are thinking about, their personal stories and their individual voices. They discussed how more frequently children engage in literacy behaviours during play when their perspectives are included. The group pointed out the irony that the very literacy outcomes that teachers feel pressured to achieve happen quite naturally in play-based learning. Saracho and Spodek (2006) point out that when

teachers' observations lead them to this conclusion, it is a significant shift. They begin to see learning as less separate from play and start to see all the possibilities of how learning happens in play (Sherwood & Reifel, 2010; Trawick-Smith & Dziurgot, 2010). This finding from the literature also emerged in the beliefs of the group of teachers in this study. It is another example of how these teachers' beliefs about play-based learning were becoming more evident in their practice as a result of their action research.

Abbey: You also see the different personalities of children coming together like in my morning and afternoon classes what a difference I see. For example, my afternoon kids love to write. They will pick up a name card and they will go to the writing table and they will use the little white boards and just write. They write their names. They were doing that for two months. Then they started thinking about words.

Steve, Jessica and Sasha added it is about capturing what is important to each child.

Jessica noted, "children are not engaged when every child has to sit down and write in the journal at the same time and write the same thing." Collectively, the group noticed that children were now confidently stating "I can write that down" because they saw the purpose for writing.

Steve added to the discussion when he mentioned that he was "really trying not to focus just on the children that always put their hands up or are always contributing." The teachers observed a cumulative effect. The more they allowed children to express themselves the more they developed their voices and contributed ideas. As a result, the group concluded that when the children contribute to the design of their play contexts more learning happens. There is more of an investment and they express this in their negotiations too.

Belief #2: Stepping back and letting go.

This finding "stepping back and letting go" refers to the teachers reflections and realization about how critical it is for teachers to let go of the "need to control" all the learning. This is a complex notion and the participants believe it really comes down to trusting and

believing children are capable and competent. Even if that is a strong conviction of a teacher it can be challenging given internal and external pressures such as getting children prepared for Grade 1, the perceived ease of the structure in a didactic program, and reading benchmarks established by the school board.

Jessica--It is also really scary at first to let go and step back. I think that is one of the hardest parts then when you do sort of step back you see how the children are engaged. Then you start to feel this is OK when you see how much authentic learning is going on then it gives you the drive to do a little bit more.

The others echoed this sentiment and suggested that many of their colleagues find comfort and safety in having a *box or a label* for their practices. They all expressed that once they let go of a rigid timetable and preconceived timeframe for learning (e.g., a monthly theme on Halloween that starts and ends in October) and included children's voices they became much more flexible. Both Sasha and Steve commented that they could shut something down that isn't working immediately and inquiries can last for weeks provided there is still interest. Jessica said, "I feel much more at ease and I think the children feel that too." They were united on what ultimately led to this practice. It was taking a leap of faith and trying it out. When they saw the benefits for the children they were each convinced that this was a practice they wanted to continue.

The participants identified another barrier to stepping back and letting go in order for learning to happen in play and for children to self-regulate. Through prompting they reflected a natural instinct or desire to fix things or fix children. The teachers agreed that many teachers believe fixing things is inherent to their role. They discovered that it is not always a conscious decision or in the foreground of their minds but when fixing things is a factor, it can lead to over regulating the children. Sasha questioned the suggestion that it can be problematic. She believed that she was very "attuned to children's body language and facial expressions and it was

important to respond to the children's needs." Jessica recalled an example where she had a challenge letting go.

Jessica: One of the children wanted to use materials from the water table in the sand. With this particular child I was thinking she is going to do something and I am not going to be happy. Then I said to myself, "stop it we have been thinking about this." So I let her take them all and I put some popsicle sticks and twigs in the sand and she created a whole habitat. I took out my video camera and recorded the whole thing. If I didn't stop myself she most likely would have acted out. She had so much knowledge but I wouldn't have known if I didn't let her explore.

Steve added, "I was thinking about the same situation." When you stop yourself then these incredible conversations take place."

By exploring the research question together, these actions resulted in some rethinking about what the teachers formerly thought about co-constructing learning with children. Their curiosity about children and learning seems to drive conversations so that practice is never static. MacNaughton and Hughes (2011) describe action researchers as using sound thinking from what is already known and engaging in critical thinking to create new learning.

Belief #3: Rethinking what it means to co-construct learning.

The last finding in this phase of the research is the story of the how the teachers changed their thinking about what it means to co-construct learning. The group wondered if one believes play-based learning means that children and teachers co-construct learning, then what does that look like and sound like in practice? This notion was unsettled in the participants' minds and was an underlying reason for the action they took.

The group ascertained that one of the barriers to co-construction is the belief that children won't know what to do at a play centre if there is not a specific task for them to complete. They opposed and clarified that this view assumes that the children can only learn from the teacher and diminishes how much they can learn from and with each other. They described how learning unfolds in play when the teacher observes and follows the children's

thinking. Abbey recalled an example from a water table where the play was co-constructed over a period of a few days.

Abbey: Giving them a voice and respecting them you know because I wouldn't want to learn something that I wasn't interested in learning. Why would you want to do that to your student? For example, I know that this week the kids were really interested in the bubbles. I put soap in the water. I put some questions up. "What do you notice about the bubbles?" Kids were making predictions. They noticed that when they moved them faster more bubbles were made. One little boy noticed that when he held the mixer under the water the bubbles were under the water and when he held it close to the surface the bubbles came above the water.

The teacher doesn't dominate the learning but s/he certainly does not disappear from the equation. The teachers stressed that they believed if they were in a hands-off stance and children dominated the play then learning seemed to "stall" and the teachers would be missing important observations. They thought extensively about their role. Steve, Sasha and Jessica conveyed how they were rethinking co-construction.

Steve: We have been thinking about inquiry when it is teacher lead or when it is truly emerging from the children and the difference between the two. At least the first one is better than traditional style. The emergent comes from the kids. The kids ask something. Their question leads to an inquiry and you explore that question in play, in discussions, and outdoors. That is way more powerful than the teacher question. So we are exploring that whole concept about what are the children coming up with and we are always amazed.

Jessica: I agree with Steve. I have found that I still have to be careful that I don't say I am interested in the children's ideas and somehow convey that what is valued is the idea I have in my head. That way children begin to understand that you really want to know what they are thinking.

Sasha: I see what you mean. I sometimes bring things in that I am interested in but I am careful. For example, a little girl went to Florida and brought in a shell so I brought in my shell from Florida. We investigated where the shell came from, what it was called, what lived in the shell amongst other things. We do have to be careful that it is not just what the teacher is interested in and I know now the interest has subsided so we have moved on.

The participants agreed that when play is present in a Kindergarten classroom there can be several interpretations. For example, if the underlying belief is that play is the child's

exclusive domain and the teacher does little more than provide the materials and time then play is most likely random and not the sophisticated, rich play described in the participant's examples. Increasingly more pervasive is the model where the teacher creates tasks for children to complete and as long as the tasks are hands on and using concrete materials it is considered play (Nicolopoulou et al., 2010; Miller & Almon, 2009; Sherwood & Reifel, 2010). On the other hand, teachers tend to see co-construction as the teacher and the child contributing equally. It is not a simple mathematical formula but a much more organic and negotiated process that varies for diverse children and in different contexts. We discussed the importance of letting go of the assumption that co-construction is fifty-fifty. Steve articulates how his thinking about co-constructing learning is evolving

Steve: I have been thinking. I am starting to shift from the word co-construct. I would rather be less than fifty percent and have the kids be more than fifty percent. My job is just to present the material, introduce them to something and ask them questions. If they don't have the materials there explore that and put the materials out there. Facilitate and think about some of their questions and facilitate some of the peer teaching that comes across. So for me that is not fifty percent. It has shifted even more for me recently.

The participants constantly reflected and articulated their thought processes on the effects of the action they took for both the children and the teachers. What was observed when they co-constructed learning with children? Key to children constructing their learning in play-based environments is a consistent, trusting, responsive relationship with the teacher who believes children are capable and competent. The teachers saw evidence of the very learning they were charged with providing in abundance when they let go of control and shared the learning with the children. This finding is substantiated in the literature and is a key component of sustaining and maximizing learning in play (Cheng & Stimpson, 2004; Nicolopoulou et al., 2010; Samuelsson & Carlsson, 2008).

Completing the Action Research Journey: Reflecting on the Effects of the Action on Practice

The participants met one last time to reflect on the effects of the action of co-constructing play-based learning with the children. This section incorporates the findings from the last phase of the action research cycle. Through the course of the final discussion four significant findings emerged regarding the teachers' beliefs about the connections between play-based learning and self-regulation and what the teachers observed when children co-constructed play-based learning:

Belief #1: Learning to listen differently.

All the participants communicated that by exploring their beliefs about play-based learning they had come to understand the importance of listening. They expressed that most teachers would say they believe it is important to listen to children but it is more about how you listen. They challenged themselves to listen differently. Sasha believed that she is a facilitator and that allows her to “really listen to what children are saying without any preconceptions.” Steve commented that he believed that he was a good listener and it was only when he mentored a pre-service teacher and observed the way he interacted with the children that he realized: “I catch myself listening for specific things. As a result, I miss hearing so much.” They each talked about being more deliberate about transcribing interactions during play so they could reflect on and learn from what the children were saying.

Steve believes listening differently “allows us to elucidate the children’s thinking” and strengthens the teacher’s understanding of the child, resulting in opportunities to co-construct the play. The group emphasized that even when they are attempting to be attuned to children and

listening they must be cognizant of the amount of *teacher talk* in the classroom. They collectively worked at this as part of the research and Jessica communicated her experience.

Jessica: I know a big goal for me this year was to be conscious about how much I am talking and how much the kids are talking. We talked [in the focus group] about when you ask a question make sure you have enough wait time. I have been very conscious of stepping back and just listening and asking the right questions and giving them enough time to explore. The discussion is coming from them rather than from me.

One strategy the group identified as key to learning to listen differently was documenting interactions during play. This documentation enabled them to go back at a later time and analyze what the children had said, what they had said, how they had said it, who was talking and who was using non verbal communication. This process like the others in the findings demonstrates how play is negotiated between the adult and the child. The more the adult models listening the more likely the children will feel heard and think about listening to each other (Hedges, 2010).

Belief #2: Shifting minds and sharing power.

The teachers had similar beliefs about play. They consistently discussed their desire to reflect on and improve their practice. This finding reflects their regular reference to wanting to negotiate both the physical environment and play-based learning with the children.

Sasha: The next step that I have taken is realizing how much the kids learn from each other you know not that I didn't know that before it is just now I step back more and more. I give the space to the children to come up with their answers or understandings and realizations. Whatever shape or form it takes I know they get so much learning from each other.

Abbey, Steve and Jessica all concurred that they were really cognizant about providing opportunities for children to learn from each other. Abbey noted that Steve has been talking about "letting the children figure it out and stop giving them all the answers." That lead the group back to the discussion about the need they feel to socially engineer the children. They all concurred with Jessica that it is "hard not to think about making sure they all have a turn, get a

chance to play with everyone and everything and ensure they all feel good about themselves.” However, they did conclude that when they gave the children the space and provided support the children could usually handle themselves much more than they would have anticipated or expected. This connects to the next finding which refers to the constant challenge of finding congruence between beliefs and practices.

Belief #3: Finding congruence between beliefs and practices.

The teachers found that collaboratively reflecting on practice was a very effective way to check themselves. Thinking about their beliefs about play created greater probability that their play-based pedagogy was actualized in practice even when their practices are vulnerable to external factors such as pressures to get children ready for Grade 1, achieving reading level standards set by the school board and parental expectations to receive generic worksheets and arts and crafts. By examining their beliefs about play and the connection to the learning environment they were each able to recount examples of moments in time or contexts when they felt they were able to create play-based co-constructed learning.

Sasha: The developmental piece really stands out for me. Understanding where they are at is paramount to where we can get to the next level. For example, I have got some children who are not developmentally ready to write words so they will orally or pictorially tell their stories for our school author’s night. That may help to empower them. Being cognizant of that is really helpful because had I not known I might have bulldozed right over them and made sure that everyone had the same book even though that doesn’t fit with what I believe.

One of the important aspects of this finding was the teachers’ consideration of the parents’ perspectives. Their comments reflected the view that it was essential to help the parents understand the value of play. With some prompting, there was recognition of the need to consider that families will bring varying points of view about play that reflect their cultural values (Hedges, 2010).

Sasha: It is my role is to educate the parents on that developmental level if they are thinking that kindergarten is a certain way and they are not aware of the developmental piece they are going to think that their child is not meeting the standard. My role is that everyone is an individual and they have a place in their learning. Everything is tied into that and harnessing that I think this is a strength I bring.

Abbey: I had a change in my beliefs about play and self-regulation when I started working with this staff. I now believe student-centred play focuses on the needs of the students, rather than those of others involved in the educational process, such as teachers or administrators. It is therefore the best type of environment for students to learn in as it taps into the student's needs, abilities, interests and learning styles. The teacher acts as the facilitator of this environment.

Abbey also reflected over the course of the research that she is “still trying to figure out the balance of ideas between her and the children.” Jessica agreed that she struggles with that balance as well. She summarized how she makes the connection between her beliefs and practices.

Jessica: You see that the children want to go to centres. I am constantly wondering what is driving them to go to that centre? You are constantly checking yourself in this new role of not trying to regulate everybody and thinking about what they need for their learning to happen. Instead of the traditional method where everybody is doing the same thing now you are freed up to observe their learning and be a facilitator.

Steve: Yes Jessica, it makes it so much easier to be in that mindset when you are surrounded with other people with the same pedagogy it helps to keep your focus on a day to day basis. This is how I want to approach kids period, not just in the role of the teacher but as a facilitator. I find myself doing this with neighbourhood kids and my own kid. It is part of who I am now. I don't know how to say it but it has become a part of me now.

The participants expressed how they now felt more congruent with their beliefs than when they first began teaching. Steve specifically commented, “I would say I am living my belief now as opposed to being stuck in the way I was taught in school, by my parents, by my grandparents, by other kids, and by society. I have shaken loose of those fetters as much as I can I still recognize a few here and there but for the most part I have shaken all of that loose.”

Belief #4: Taking action and changing learning.

The group discussed the abundance of research that addresses the frequency of incongruence between educational research, teachers' beliefs and the resulting practices. Yet this group concluded that by being in the role of researchers they were able to find more congruence between their beliefs and practices (Hedges, 2010; Henson, 2001; Keyes, 2000). This concluding finding from the last phase of the action research refers to how the learning changed for both the children and the teachers. They placed a focused lens on play-based learning and observed, documented and reflected on what is revealed when children and teachers co-construct learning.

Steve - Two months ago the discussions were totally different not just the content but the depth. I think a lot has to do with whether you believe this is the way for children to learn. If there is a lack of belief in the children's ability to learn or the perspective is very hierarchical, I think that is the main barrier. The curriculum pressure is not a barrier to play-based learning because it is in the document but it is an understanding of how kids learn.

Jessica, Abbey, and Sasha were in accordance with Steve and added it all comes back to trusting children will learn. Sasha stated: "if you don't have the belief that play-based learning is for the betterment of their learning then why would you do it?"

Throughout the cycle of the research each of the participants consistently described how more learning was revealed when the children were engaged in designing their learning. This resulted in more self-regulation and less managing of children's behavior. They identified the power of being collaborative researchers as key to maximizing the full value of play-based learning.

Abbey: It reinforces our experiences we can say, "oh yours went that way" or "yours didn't go that well," "why" or "how" "was it the morning class" or "different in the afternoon class." We have a conversation and then we can give up more control to the kids because we are feeling more comfortable now.

Jessica: I think it is such a different phase from where we first started. Talking a lot with the principal and amongst our team made the difference. In the classroom I don't think it

was one specific thing working with different kids and learning how young kids learn and what they need rather than forcing it on them.

Sasha was hopeful and communicated that “everybody needs to change. Their attitudes seem so narrow and linear. At the end of Kindergarten it is not as if miracles happen and all of a sudden children should be sitting at desks.” They all identified the disconnect between play-based learning in Kindergarten and Grade One and agreed with Steve when he voiced, “thankfully it is not the case at our school but in most other places I don’t see any play-based learning in Grade One.”

Steve: What I have discovered about my own thinking as a researcher and by watching videos of myself is it is really about the relationships and discussions we have together and with the children. It lines up with the praxis because it makes you concentrate and focus more. That enables to you to deepen that track of thought or allows you to let it go if it wasn’t working.

Steve stated when children realize “they are the drivers of their own educational engine the power that comes from that is tremendous.” It was evident throughout the research that this was the case for both the teachers and the children. At various points in their teaching career they each left behind didactic, teacher-dominated models. Creating spaces for children to not only co-construct the physical environment but also the actual learning alleviates the worry of external challenges as so much more learning is revealed. Play-based learning is maximized and children self-regulate.

Chapter V

Discussion and Recommendations

Different Paths to Similar Places: Maximizing the Full Value of Play

Play has a long and controversial history in early childhood filled with emotions ranging from nostalgia and advocacy to skepticism and confusion (Ranz-Smith, 2007). The literature and the findings from this study reveal the critical need for an ongoing and continuous debate on how to maximize the full value of play especially when the word *school* is included in the discourse (Sandberg & Heden, 2011; Sherwood & Reifel, 2010; Trawick-Smith & Dziurgot, 2010). The definitions of play are as diverse and wide-ranging as the practice and interpretation of play from classroom to classroom (Cheng & Stempson, 2004). Teachers' beliefs and practices are influenced by internal factors including their background experiences and number of years teaching coupled with external factors such as the increased level of accountability (Parker & Neuharth-Pritchett, 2006; Wilcox-Herzog, 2002).

The teachers in this study came from various backgrounds and experiences in teaching Kindergarten. However, the findings and discussions about the question they explored and the action they took revealed common ground when it came to their beliefs and practices about play-based learning. Collectively they share a belief that play is the ideal way for children to learn. By exploring their beliefs and how they are evident in their practice the teachers believed that they strengthened their understanding that maximizing learning in children's play is a "highly complex and intellectual process" (Trawick-Smith & Dziurgot, 2010, p.126) that requires methodical observation, interpretation and negotiation of children's play preferences and the development of a dynamic repertoire of classroom strategies. Divergence and misconceptions

about play-based learning are often rooted in the role of the adult in children's play (Cheng & Stempson, 2004).

The findings and the literature demonstrate that in order for learning in play to reach maximum potential, teachers must have an extensive knowledge of play. This knowledge should encompass how both children and concepts develop, how to differentiate learning and how to engage families. The participants were convinced that it is crucial that once this knowledge is acquired teachers must be willing to collaboratively and continuously reflect on practice. The teachers all saw themselves as researchers in their own classroom. This stance increases the probability that practice is dynamic, transformational and never static (Gravett, 2004; Hedges, 2010; Keyes, 2000). They attributed the confidence and readiness to take on the complexity of classroom research to the mutual support they provide each other through an established norm of collaboration in the school.

Their collective belief that children are highly capable and competent is an underlying factor that drives their practices related to play-based learning. Through the course of the study the teachers made important connections that holding this belief also enabled them to support children to self-regulate. One could assume that all teachers believe this to be true. However, the participants expressed doubt and recounted experiences they had with colleagues who felt just as strongly that they had to *tell* or *directly instruct* children especially in the case of children from impoverished backgrounds (Hedges, 2011; Miller & Almon, 2007).

However, the teachers in this study were able to carve out a professional pathway that provided children with multiple possibilities to learn through play. It was not without challenges. They stayed the course even knowing it was in direct opposition to the pervasive model practiced

by most of their colleagues. This widespread model is often found in packaged and scripted teacher-directed programs and often families preferred mode for their children's learning.

Breaking with Tradition

The complexity of the interactions in play-based learning between the children and the materials, the children with each other and the children with the teacher is not something that can be scripted or packaged (Hedges et al., 2011; Hedges, 2010; Ryan & Grieshaber, 2005). When two of the teachers in this study first joined the staff at the school they were stepping into a program that was considered an institution in the community. For over twenty years the previous program was very didactic and teacher-dominated including monthly themes centered around Eurocentric, Christian-based holidays, even though the demographics of the community were rapidly changing.

The participants knew that didactic, culturally and linguistically inappropriate practices did not fit with their pedagogy and yet early in their teaching experience they were unable to articulate exactly what or how learning happened in play. While they were trying to figure out their role in children's play the landscape in Kindergarten was simultaneously shifting. There was an increasing "sense of urgency" to introduce more rigor and academics into Kindergarten programs (Ranz-Smith, 2007, p.272).

If teachers are unable to articulate the learning that happens in play then play-based learning is vulnerable to misinterpretation and many teachers report defaulting to didactic methods (Ranz-Smith, 2007; Nicolopoulou et al., 2010; Sherwood & Reifel, 2010). This often results in play and learning being separate in the minds of the teachers, the children and their families (Samuelsson & Carlsson, 2008). Play is something that is reserved for after school The findings revealed and confirmed by the literature, that "teaching academic content and using

child-centred, play-based learning practices are not mutually exclusive” (Sherwood & Reifel, 2010, p. 323). The participants remarked that the *Ontario Kindergarten Program* that guides their program holds play-based learning as a central principle (Ontario Ministry of Education, 2006). By examining their role in play, stepping back and letting go of the need to be the linchpin of all the learning they were able to observe and document an abundance of learning.

Over the course of the study these Kindergarten teachers expressed how they were attuned and *listening differently*. Rather than always listening for a predetermined skill they used strategies such as putting a critical lens on the amount of teacher talk, waiting more for children to respond or even speak first and thinking more deeply about the children who are communicating non-verbally. The teachers believed they left space for children to reveal their learning in unexpected places and as a result the children constantly amazed them with their extensive knowledge, sophisticated thinking and willingness to contribute their ideas. The children were applying their knowledge in many play contexts and demonstrating more higher-level thinking than when the children were required to complete didactic activities. Another outcome of this practice was the finding that the children were much more engaged and calm resulting in more self regulation.

Sharing Power, Sharing Learning

The teachers determined they wanted to examine what is observed when children co-construct their learning. The findings in this study are congruent with a social-constructivist perspective. According to Vygotsky (2004) “the right kind of education involves awakening in the child what already exists within him, helping him to develop it, and directing this development in a particular direction” (p.51). This point of view resonated deeply with the participants. Rather than pulling learning out of the child they stated that they trusted that if they

provided rich learning environments and really listened to the children's perspectives that learning would happen.

Public and political accountability can create tension for teachers. Concerns are raised that this point of view leaves too much learning up to chance (Ranz-Smith, 2007; Miller & Almon, 2007; Nicolopoulou et al., 2010; Sherwood & Reifel, 2010). The findings of this study did not find that to be the case. The teachers believed learning was thoughtfully and skillfully negotiated. The teacher does not disappear from the equation. The teachers believed they were more present but in a listening stance rather than buried deep in a series of funneling questions drilling to find an answer. They were in a state of wonder, listening, engaging and learning alongside the child, co-constructing play-based contexts and opportunities for children to reveal learning in all domains.

The teachers expressed that not only did the children's learning change when the teacher and the children negotiated the learning environment the children's learning raised questions and created new thinking in the teachers' minds. This is ultimately the objective of any professional based action research. Even though the teachers had previously co-constructed with the children for example, what could be at a learning centre they noticed that they were still doing too much thinking for the children. They were just beginning this process of rethinking what it means to co-construct. The teachers reported that initially not all the children were comfortable offering their ideas but as time passed there was a greater sense of ease with sharing more of the power in the classroom.

Moving Away from Social Engineering Children to Supporting Self-Regulation

The teachers in the study became highly cognizant of when they were moving into practices of managing children's behaviour. They were very clear in their minds that self-

regulation does not mean compliance (Boyer, 2009; Shanker, 2010). It is critical for teachers to move beyond a narrow definition of self-regulation so they don't fall prey to a prescribed commercial program. Some of these programs utilize an external regulator such as a puppet or sticker for praise or a reward every time a child 'regulates' or models 'good self-regulating behaviour.' This is a behaviourist and reductionist view of the child as a passive recipient of knowledge. For many children requiring compliance undermines their own abilities to self-regulate (McCain et al., 2007; Pascal, 2010; Shanker, 2009).

Another finding began to emerge towards the end of the action research cycle. The teachers reported that one of the hardest pieces to let go of was the practice of socially engineering children. The teachers were not necessarily conscious of how social engineering weaves in and out of their daily practice. What happens if teachers step back and do not feel responsible to make sure everyone has a turn at every centre or ensuring they all play with each other?

Does this ever result in practices that benefit one child or group of children while unintentionally marginalizing another (MacNaughton & Hughes, 2011)? Initially two of the participants felt that fixing children's problems or fixing children was a big part of their role and expressed discomfort with the question while the other two were intrigued. It was important to clarify that it was not about making sure children are safe and secure. The teachers began to wonder and check themselves. Instead of structuring classroom routines' using the pervasive method of rotating children through centres, ensuring children have a turn, or limiting numbers at centers they adopted a practice of bringing the children in on the negotiation. Collectively they acknowledged that this notion is challenging even for people who are comfortable with a negotiated classroom. They did report in most circumstances children could and did problem

solve with limited support from the teachers. In some cases, the children could do this same problem solving independently.

This emerging finding is congruent with the scholarly literature. If teachers spend less time managing and regulating, children develop self-regulation competencies. Respectively they communicated that this remains a challenge and planned to continue to explore the notion of letting go of orchestrating the children's social world and approaching it from a research lens. They were interested in investigating what draws children to certain people and contexts. It is broadly acknowledged in action research literature that as one investigation draws to a close another one begins (Gravett, 2004; Hedges, 2010; Henson, 2001; Keyes, 2000).

It will be crucial as Ontario enters into Full-Day Early Learning that there is time for professional learning, dialogue and investment in resources and research. If educators engage in action research, they will become more critically reflective in planning optimal Kindergarten learning environments. As well, their perspectives can bring together classroom and external research. Ongoing dialogue and further research will serve to challenge the status quo and continually address the concerns raised by several scholars and early year's advocates concerning the disappearance of play so that it remains a valued and understood part of Kindergarten programs.

Limitations

A strength of action research is the inclusion of the teacher voice. If teachers engage in the research with an external researcher then according to Hedges (2010) the "lines begin to blur between educational research, professional learning and classroom practice" (p.300). She argues this is especially true when there is a trust built between the external researcher and the teachers. That is the case in this study as the primary investigator facilitated and engaged in professional

learning with the participants as part of a previous role. However, this could also be considered a limitation. The teachers may have overlooked details about their beliefs as they may have assumed that the primary investigator already understood their views based on previous professional conversations.

Another documented strength of action research is the emergent nature of the design. The participants decided to respond to the interview questions together rather than the original plan to speak individually before the first focus group. Due to their ease with speaking publicly about their practice it seemed to work effectively. This also could be considered a limitation. Even though the participants were respectful of each other's views perhaps they would have been able to speak more freely by themselves. This would have to be reconsidered for a less cohesive group of participants.

Lastly, some of the limitations associated with qualitative research were part of this research as well. Although the action research cycle was completed it was over a short and intense period of time resulting in possible limitations in the data collection. Ideally the participants should have had more time to try out the practice they focused on changing. One of the tools described as critical and effective in facilitating their reflection on data was capturing classroom interactions on video. Due to ethical complications in videotaping children for the purposes of external research this was not viable and considered a limitation. However, the participants were able to reflect on the videotape and bring that forward in focus group discussions.

Directions for Further Research

A recommendation for further research would be an examining how videotaping interactions during play further elucidates an understanding of how learning happens in play.

Videotaping acts as a way of leaving traces of the learning to return to later for analysis. Ideally the research design would be action research and ethically it would require the participants consent to publicly share their video as well as parental permission.

A minor reoccurrence in the data collected for this study was a reference to children's interests. Hedges et al., (2011) assert that, "children's interests may have simply become an under-theorised catch phrase" (p. 187). Their research was conducted in New Zealand. However in classroom visits across Ontario and in some of the focus group data children's interests are often determined simply by what they choose to play with. Hedges et al., (2011) suggest that we need to develop a more analytical and inclusive framework. This is an important direction for further research.

Lastly the participants determined and recommended an investigation about how to let go of trying to fix or solve all of children's social problems particularly where the child's rhythm or energy varies greatly from the rest of the group. It will be important to examine these complex issues under varying circumstances and conditions. It will be essential during the phase in of Full Day Early Kindergarten that these recommended studies take place in Full Day Early Learning Programs.

Recommendations

The teachers articulated a set of conditions they believe are critical to maximizing children's learning in play and supporting children's self-regulation. They are listed below and drawn from this study to provide recommendations for the broader profession to consider.

1) When teachers see themselves as researchers:

- beliefs are more likely aligned with current educational research
- beliefs are more likely congruent with practice

- practice is based on sound pedagogy but open to creating new learning.

2) When teachers truly believe that children are competent and capable they:

- let go of control and begin to stop over-regulating the children
- take risks and provide more choices to the children (e.g., materials at centres, focus for learning, and play preferences)
- support children's self-regulation
- are more confident in the learning they observe in play.

3) When teachers see play and learning as inseparable they:

- begin to let go of some didactic practices
- begin to understand and observe learning they never thought children were capable of accomplishing
- feel more equipped to articulate how learning happens in play.

4) When teachers engage in collaborative learning with their colleagues and the children:

- their anxiety about accountability begins to dissipate and is replaced with a strengthened ability to discuss what and how learning happens
- their views are strengthened through critical reflection
- they can remind each other that critical reflection is not self-criticism rather an opportunity to improve practice and learning.

Appendix A- Ryerson University
Consent Agreement for Teacher Participation

Date:

Dear Teacher,

The purpose of this letter is to invite you to participate in a research study to take place in your school and classroom. Before you give your consent, it is important that you read the following information and ask as many questions as necessary to be sure you understand what you will be asked to do.

Title of Study:

Examining Kindergarten Teachers' Beliefs About the Relationship Between Play-based Learning and Children's Self-Regulation

Lead Investigator:

Dianne Riehl- M.A. Candidate, Early Childhood Studies, Ryerson University,
Dianne.Riehl@ryerson.ca

Purpose of the Study:

This action research study has been designed to investigate Kindergarten teachers' beliefs and attitudes towards play-based learning and the impact on their practice to foster Kindergarten children's development of self-regulation. In this study the lead investigator and the participants become co-investigators. Together they determine the practice to examine and change in relation to the participant's beliefs and attitudes towards play-based learning and how that impacts the way they foster Kindergarten children's self-regulation. Participants will explore the teaching and learning process from a practitioner's perspective and reflect on observations made during the course of this study.

Four participants will be recruited from one school in the Toronto District School Board. Each participant will be a Kindergarten teacher.

Description of the Study:

This study examines Kindergarten teachers' beliefs and attitudes about play-based learning and the impact on their practices to foster children's self-regulation.

This qualitative research study will use action research. It is designed to bring about a change in practice and to study that process. To that end the lead investigator will interview individuals and then meet with three focus groups that include all four participants over the course of the research to:

- discuss their current beliefs and practices towards play-based learning and self-regulation, the origins of those beliefs, and what practice they determine to be the focus for study
- determine the action in the classroom which is based on the practice they want to change through action research. This action will emerge from the group.

Location: 4 Kindergarten classrooms in a school in the Toronto District School Board.

Time: Exact times and dates to be determined with you. The research will take place from late April until the early June. If you give your permission to be part of this project, your time commitment will involve the following:

- 1) Individual interview approximately 20 minutes (release time provided)
- 2) Focus group #1 to determine and plan practice to examine and change. Includes all four participants in late April 45-60 minutes (release time provided)
- 3) Focus group #2 to reflect on practice. Includes all four participants in May 45-60 minutes (no release time provided). Guiding questions will be provided by the lead investigator.
- 4) Focus group #3 to further reflect on practice and the action research process. Includes all four participants in early June 45-60 minutes (no release time provided). Guiding questions will be provided by the lead investigator.

Data Collection

If you give your permission to be part of this study, you will be asked to collect and submit data of your observations, reflections and questions throughout the study. During the focus groups you will be asked to share the data you have collected in your classroom using two of the three methods listed below. No costs will be incurred by the participants. Audio recorders, journals, and printing of photographs will be provided by the lead investigator.

Participant Data Collection Methods- Please choose and check at least two of the following boxes:

- ☐ Photographs – of classroom environment – If children are included in the photographs they must not be identifiable. For example, only take photos of their hands.
- ☐ Audiotape discussions during the research
- ☐ Reflective journal for observations, reflections and questions (this could be an audio recorded journal if you prefer)

Data will also be collected and transcribed (at a later date) by the lead investigator during each interview and focus group. The data will be owned by the lead investigator. Journals and photographs may be returned to the participants at the end of the study by checking the box below.

- ☐ Please return journals and photographs at the end of the study.

Risks or Discomforts:

During an interview or focus groups you will be asked reflect on, question and determine a practice to change. There may be some concern that the Lead Investigator is on secondment to the Ministry of Education. Even though this study examines your classroom practice the Lead Investigator is a participant and not in an evaluative position.

Benefits of the Study:

This research situates teachers as central to providing understanding of the teaching and learning process by engaging them as co-investigators. The study focuses on and explores two central aspects in the Kindergarten Program - Play and Self-Regulation and how teacher's attitudes, beliefs and practices impact learning. It is the lead investigator's intention that you as teacher will benefit from observing and reflecting on the teaching and learning process from the study.

The findings from the study will be communicated to the participants and developed into presentations for conferences, professional learning sessions and possible publication. Inherent in the action research approach is the direct involvement of the participants. Including the teacher voice will lend credibility to the findings shared in presentations. If you give your permission to participate in this study you will have an opportunity to:

- engage in action research with other Kindergarten teachers in the supportive environment of your own classroom and school
- inform the broader teaching profession based on meanings and perspectives from the findings of the study.
- reflect on your practice.
- voluntarily contribute to the planning and facilitating of any future workshops

Confidentiality:

An audio recording device will be used to tape your interview and focus groups for transcription at a later date. Data will be coded for analysis purposes. All data collected will be kept in locked offices and password protected computers at Ryerson University available exclusively to the lead investigator. Audio tapes and interview transcripts may be shared with the project supervisor. Otherwise, they will be destroyed one year after the final report is submitted.

Please note that excerpts from interviews may be used in the final research report to substantiate any claims made by the lead investigator. You are welcome to review the transcripts and any excerpts for accuracy before the report is submitted for review. At no time will your actual name be used during the taping of the interview or in the final report. No one will be named in publication or presentation of the findings of the study. Please check the box below if you wish to be contacted during the review of the transcripts.

- ☐ I wish to be contacted during the review of the transcripts

Incentives to Participate:

You will receive a token of appreciation in the form of a \$25.00 Chapter's Gift Certificate. You will receive this whether or not you remain in the study.

Voluntary Nature of Participation:

Participation in this study is voluntary. Your choice of whether or not to participate will not influence your future relations with Ryerson University or the Toronto District School Board. If you decide to participate, you are free to withdraw your consent and stop your participation at any time without penalty or loss of benefits to which you are allowed. At any point in the study, you may refuse to answer any particular question or stop participation altogether.

Questions about the Study:

If you have any questions about the research now, please ask. If you have questions about the research at a later time, you may contact Dianne Riehl (lead investigator) by phone at 416 565 9136 or by email at Dianne.Riehl@ryerson.ca

If you have any questions regarding your rights as a human subject and participant in this study, you may contact the Ryerson Ethics Review Board for information:

Ryerson Ethics Board
c/o Office of the Vice President, Research and Innovation
Ryerson University
350 Victoria Street- Toronto, ON
M5B 2K3
416-979-5042

Teacher Participant Agreement:

Your signature below indicates that you have read the information in this agreement and have had a chance to ask any questions you have about the study. Your signature also indicates that you agree to be in the study and have been told that you can change your mind and withdraw your consent to participate at any time. You have been given a copy of this agreement.

You have been told that by signing this agreement that you are not giving up any of your legal rights.

Name of participant (please print)

Signature of participant

Date

Signature of investigator

Date

I agree to collect data using at least two of the three methods below by checking the boxes:

- ☐ Photographs – of classroom environment – when children are photographed they must not be identifiable in the photographs only take photos of their hands
- ☐ Audiotape discussions during the research
- ☐ Reflective journal for observations, reflections and questions (this could be an audio recorded journal if you prefer)

Appendix B- Principal Letter of Support

Principal Name
School Name
School Address
School Phone Number

March 8, 2011

Dear Principal,

I am writing to follow up on our telephone conversation seeking your support for conducting an Action Research Study in _____ as part of my graduate studies to complete my Masters of Early Childhood Studies at Ryerson University.

The topic of my research is *Examining Kindergarten Teachers' Beliefs about the Relationship Between Play-based Learning and Children's Self-Regulation*. This qualitative research study will use action research with four Kindergarten teachers. It is designed to bring about a change in practice and to study that process. To that end the lead investigator will interview individuals and then meet with three focus groups that include all four participants over the course of the research. The research will take place from late April until the early June. If four of the Kindergarten teachers on your staff agree to participate the time commitment is listed below. Thank you so much for agreeing to release the teacher's who consent to participate for individual interviews and the first focus group.

Individual interview approximately 20 minutes (release time provided)

Focus group #1 to determine and plan practice to examine and change. Includes all four participants in late April 45-60 minutes (release time provided)

Focus group #2 to reflect on practice. Includes all four participants in May 45-60 minutes (no release time provided). Guiding questions will be provided by the lead investigator.

Focus group #3 to further reflect on practice and the action research process. Includes all four participants in early June 45-60 minutes (no release time provided). Guiding questions will be provided by the lead investigator.

It is my intention that the teachers will benefit from observing and reflecting on the teaching and learning process in this study. This research situates teachers as central to providing understanding of the teaching and learning process by engaging them as co-investigators. The study focuses on and explores two central aspects in the Kindergarten Program - Play and Self-Regulation and the connections teachers believe there are between play and self-regulation.

Confidentiality of all participants will be upheld. Upon approval from Ryerson Ethics Board to conduct research with human subjects I will then provide a recruitment flyer to the teachers. More detailed information about the study is included on the attached Teacher Consent Form for

your information only. If four of the Kindergarten teachers are interested in participating I will follow up with the consent forms for their signature.

Thank you so much for your time and consideration of my request to conduct research with Kindergarten teachers in your school. Please feel free to contact me with any questions or clarifications. My contact information is as follows: Dianne.Riehl@ryerson.ca or 416 565-9136. Your electronic signature below will confirm your support of the study.

Sincerely,

Dianne Riehl

I agree to support the proposed research described in the letter above.

March 9, 2011 _____

Date

Signature of Principal

Action Research Opportunity

Examining Kindergarten Teachers' Beliefs about the Relationship Between Play-based Learning and Children's Self-Regulation

Purpose of the Study:

This action research study has been designed to co-investigate with Kindergarten teachers their beliefs about the relationship between play-based learning and children's self-regulation.

Description of the Study:

This study examines Kindergarten teachers' beliefs about the relationship between play-based learning and children's self-regulation. The research will take place in one school with four Kindergarten Teachers.

This qualitative research study will use action research. It is designed to bring about a change in practice and to study that process. The study involves four meetings in total. The first meeting will include a series of open-ended interview questions. The next step is to determine the action in the classroom which is based on the practice they want to change through action research. This action will emerge from the group. Through each phase of the action research a data collection tool will be used for the participants and the researcher to document their findings.

Benefits of the Study:

- ☐ An opportunity to engage in action research with other Kindergarten teachers
- ☐ An opportunity to inform the broader teaching profession based on meanings and perspectives from the findings of the study.
- ☐ An opportunity to reflect on your practice.
- ☐ An opportunity to contribute to the planning and facilitating of workshops

Contact Information: Dianne Riehl (principal investigator)
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Appendix D- Data Collection Tool - Interview Question Guide

What is your understanding of play-based learning?

What is your understanding of self-regulation?

What do believe is the teacher's role in play-based learning?

What do you believe is the teacher's role in children's self-regulation?

Can you describe some examples from your experience of children's self-regulation?

What opportunities have you had for professional learning related to play-based learning?

What opportunities have you had for professional learning related to self-regulation?

Appendix E - Focus Group 1 Questions

Data Collection Tool

Interview Question Guide:

What action related to play-based learning would you like to take to examine your practice?

Why do you think this action is important to examine?

What are your experiences with action research?

Note other questions emerged and were asked based on the data collected in the interviews. Also the participants, as co-investigators formulated questions as well.

Appendix F- Focus Group 2 Questions

Data Collection Tool

Interview Question Guide:

What observations did you make about the practice you were examining?

Did you observe any changes to the physical learning environment?

What did you observe about the children's learning?

What did you observe about your own learning?

What observations did you make about the process of changing the practice?

What impact did you observe on the teaching and learning process?

Do you think any further changes are necessary? If so why? Or why not?

Note other questions will emerged and were asked based on the data collected in the focus group. Also the participants, as co-investigators asked questions as well.

Appendix G- Focus Group 3 Questions

Data Collection Tool

Interview Question Guide:

What further observations did you make about the practice you were examining?

Did you observe any new changes to the physical learning environment?

At this point in the action research cycle what did you observe about the children's learning?

At this point in the action research cycle what did you observe about your own learning?

What observations did you make about the process of changing the practice?

What impact did you observe on the teaching and learning process?

Do you see yourself as a researcher?

What are your observation and reflections on the action research process – collaboratively planning a practice to examine, taking action and changing the practice and then reflecting on that action?

Do you think any further changes are necessary? If so why? Or why not?

Note other questions will emerged and were asked based on the data collected in the focus group. Also the participants, as co-investigators asked questions as well.

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