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Teachers' Perceptions of Reflective Practices Within an International Baccalaureate Primary Years Programme

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College of Education

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Gail Hardwick

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2019

Abstract

Teachers' Perceptions of Reflective Practices Within an International Baccalaureate
Primary Years Programme

by

Gail Carter Hardwick

Ed.S, Georgia State University, 2002

BS, Hampton University, 1995

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

Walden University

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Abstract

The International Baccalaureate (IB) standards recognize reflection as an integral part of the framework and the fabric of the Primary Years Programme school, as it is embedded in the foundational standards and practices of the inquiry-based IB teaching model.

However, teachers in an IB Primary Years Programme school located in the southeast United States struggled with being reflective practitioners. Guided by John Dewey's reflective thought, the purpose of this bounded qualitative exploratory case study was to examine teacher perceptions of reflection practices in an IB Primary Years Programme school. Research questions were drafted to ask about teachers' perceptions of their reflective practices, how teachers' perceived reflective practices aligned with IB's teaching model, and beliefs about the school-based support and resources teachers needed to implement reflective practices. The selection criteria included teachers with at least 2 years of teaching experience who had been to at least 1 outside IB training. Ten teachers, chosen through purposeful sampling, completed a 2-week reflective journal and participated in a semistructured interview. Based on the open-coding and inductive analysis patterns emerged, leading to themes; including *lesson reflections*, *planning*, *time*, and *training*. Based on the findings, a project, a white paper, includes recommendations to address the teachers' perceptions of reflective practices that will be presented to the school as well as the district. This improved instructional change may provide positive social change in the culture of reflection for teachers and help them and to better differentiate instruction for students.

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Dedication

I dedicate my project study to my loving parents, husband and children. Their constant encouragement and support was felt throughout this entire process and I am eternally grateful! I hope you are proud of my work.

Table of Contents

List of Tables	iv
Section 1: The Problem.....	1
The Local Problem.....	3
Rationale	4
Definition of Terms.....	7
Significance of the Study	7
Research Questions.....	9
Review of Literature	9
Conceptual Framework.....	10
Examples of Reflective Practice	18
Teacher Beliefs	23
Support for Developing Reflection Skills.....	24
Implications.....	25
Summary	27
Section 2: The Methodology.....	28
Qualitative Research Design.....	28
Participants.....	30
Criteria for Selecting Participants.....	30
Criteria for International Baccalaureate Training	31
Gaining Access to Participants	33
Measures Taken to Protect Participants.....	35
Data Collection	36

Reflective Journals.....	37
Semistructured Interviews	38
Role of the Researcher	40
Data Analysis	41
Discrepant Cases.....	44
Validity and Quality of Findings	44
Internal Validity	45
External Validity.....	46
Data Analysis Results	46
Themes.....	48
Discussion of the Findings.....	55
Conclusion	59
Summary	60
Section 3: The Project.....	61
Introduction.....	61
Rationale	61
Review of the Literature	63
Teachers’ Beliefs and Perspectives.....	63
Professional Development for Reflective Practices.....	67
Framework and Structures for Reflection.....	69
White Paper Effectiveness	73
Project Description.....	74
Implementation	75

Roles and Responsibilities of Teachers, Facilitators, and Administrators.....	77
Project Evaluation Plan.....	77
Project Implications	79
Social Change	79
Section 4: Reflections and Conclusions.....	80
Introduction.....	80
Project Strengths and Limitations.....	80
Strengths	80
Limitations	81
Recommendations for Alternative Approaches	81
Scholarship, Project Development and Evaluation, and Leadership and Change	83
Reflection on Importance of the Work	85
Implications, Applications, and Directions for Future Research.....	86
Conclusion	87
References.....	89
Appendix A: White Paper.....	105
Appendix B: Open-Ended Questionnaire	120
Appendix C: Interview Protocol.....	121
Appendix D: Sample Reflective Journal.....	123
Appendix E: Original Codes/Phrases.....	125
Appendix F: Theme Development Table.....	126

List of Tables

Table 1. Teacher Demographics	34
Table 2. Theme Overview	49
Table 3. Theme Development.....	129

Section 1: The Problem

International Baccalaureate (IB) offers programs with an international educational focus and structure for Grades K-12. Programs include Primary Years Programme for grades K-5, the Middle Years Programme for Grades 6-10, and the Diploma Programme for Grades 11-12. Each program transitions from one transdisciplinary approach to the next by building connections within the three programs. It is designed to develop the whole child while focusing on common approaches to teaching and learning and increase the international mindedness of students (IB, 2018). Included in the curriculum standards for IB are collaboration and reflection. Collaboration and reflection support student learning and planning and address other aspects of IB specifically designed to enhance the IB learner profile and the continuum of an international education.

An IB education is a challenging, constructivist-based curriculum with high standards promoting internationally minded students who think globally and critically in order to contribute to the world (IB, 2013). The IB Programme was created with standards grounded in the IB's philosophy, organization, and curriculum (IB, 2013). According the promotional materials, the IB supports and encourages students to be critically engaged in their learning and forward thinkers. Students are encouraged to be open to different ideas by collaborating with peers and committing to engaging in a global community (IB, 2013).

The influence of John Dewey, Jean Piaget, and Jerome Bruner had a major influence on the philosophy and foundational aspects of the IB's framework and beliefs (IB, 2015). As early as 1968 with the Diploma Programme, the insights and vision of

these philosophers helped to establish the philosophy behind the programmatic framework centered on a constructivist approach. In the past 20 years, three additional programs were added: The Middle Years Programme in 1994, the Primary Years Programme in 1997, and the Career-Related Programme in 2012. While each program addresses separate age groups, they all work collectively to develop internationally minded students, meeting the programmatic goals of IB. Teachers in IB are expected to use the strategies grounded in the philosophies of Dewey, Piaget, and Bruner to help students develop critical thinking, solve problems, and embody the learner profile. The IB learner profile depicts the attributes that are highly regarded by IB World Schools. IB learners strive to be inquirers, knowledgeable, thinkers, communicators, principled, open-minded, caring, risk-takers, balanced, and reflective (IB, 2104).

To assist teachers in guiding students in the critical IB instructional and critical thinking practices, IB provides organizational standards that include professional development for teachers. This training aspect of the program ensures that teachers receive IB-recognized professional development. In addition, IB's global research department clarifies their commitment to continuous professional development so their educators become "critical reflective practitioners" (Bergeron & Dean, 2013, p.5). The need for IB educators to reflect on instructional practices is echoed throughout the continuum of the program structures (IB, 2008). IB materials further emphasize that teachers must model the metacognitive processes included in reflective practice during instruction for students to emulate. This practice helps students see how reflective awareness and clear thinking can be beneficial. Students also benefit from teachers who

teach and reflect in this way. Teachers who model reflective practices are demonstrating for their students the need to consider their own thinking and learning process.

The Local Problem

Teachers at XYZ Elementary (a pseudonym) are required to use critical (instructional) reflection based on the reflective practitioner standards set by IB included within the curriculum program standards. While teachers are expected to meet this requirement, the problem is that XYZ Elementary does not have a structure in place that encourages and supports teacher reflection, and because of this, they struggle to meet the reflective practitioner standards. XYZ Elementary, a Primary Years Programme school serving 4th and 5th graders in the southeast, gained IB World status in 2006. Expectations for teachers are followed according to the guidelines and program. At XYZ Elementary, teachers collaboratively plan Units of Inquiry every 6 weeks as they discuss the Primary Years Programme planner in detail. Teachers are also encouraged by the administration to demonstrate inquiry lessons for the upcoming units as well as collaborate on common assessments. In addition, teachers collaborate to develop lessons for the upcoming academic expectations and assessments through collaborative planning time. While teachers are collaborating every 6 weeks as a team on upcoming units, teachers still struggle to incorporate reflective practices in their teaching and demonstrate their use of critical reflection required by IB. Teachers complain about this struggle in collaborative planning meetings and express the desire to have more assistance implementing critical reflection (C.B., personal communication, February 10, 2016).

Along with the requirement of IB for teachers to be reflective practitioners, the learner profile for students at XYZ Elementary also includes reflection (IB, 2013). This means that the intention for students is to be reflective in their learning as they learn the IB curriculum and become internationally minded. This happens if teachers are given a platform and opportunity for critical reflection. Morris (2016) explains that when teachers teach critical reflection to students and use critical reflection in their teaching, it helps students make better decisions and be more thoughtful in their learning. Because of critical reflection, students can begin to understand what they do not know and bridge the gap to a better understanding of what they are learning or the concepts they need to know in any learning situation. The teachers at XYZ Elementary do not have a platform for purposeful reflection to grow professionally and to model reflection for students in this way.

Rationale

In the local setting, supporting teachers' mastery of the IB standards is a priority as mentioned in the school's School Improvement Plan. For example the second goal of The XYZ Elementary School Improvement Plan expresses the intent to provide targeted professional development for all teachers. As indicated by the initiatives to accomplish this goal, XYZ Elementary plans to incorporate collaborative planning for all teaching teams. While this is a professional opportunity for teachers, which assists them in discussing curriculum plans and common assessments, the struggle reported by the teachers and administration indicates this is not currently serving to increase the use of reflective practices. IB program standards combine collaborative planning and reflective

practices under the same curriculum heading as they are meant to complement each other within the IB framework. However, current teachers at XYZ Elementary report struggling to implement the reflective practice component of IB program standards (L.D., personal communication, January 8, 2016). According to the principal, teachers at XYZ do not practice instructional reflection; they just keep planning forward and keep teaching (principal, personal communication, January 7, 2016). M.W. (personal communication, January 8, 2016) commented on how only once during a planning session were teachers asked to comment on their lessons digitally (through electronic discussion), but teachers were not asked to talk about it as a group and further reflect critically, as a group, over their instructional decisions. This demonstrates the difficulties teachers at XYZ Elementary have in implementing reflective practices in their planning in order to model such practices with students. As part of the IB philosophy, teachers are to use reflective practices throughout their planning and teaching, which effects student learning (IB, 2014a). Critical reflection is not demonstrated through commenting on digital lessons plans. Critical reflection begins with questioning previous assumptions and digging deeper into student learning outcomes (Liu, 2015). Teachers at XYZ Elementary are not given the platform to critically reflect on lessons or ideas that support IB philosophy and curriculum, which, in IB, should then lead to improved student outcomes through teachers' demonstrations of reflection for students. It is important to discern how teachers understand the importance of reflection in the IB model. Because IB schools are reevaluated at least once every 5 years to maintain their IB status, it is important that this problem is examined. This evaluation includes their attention to the program standards

set by IB (2010). When IB reevaluates XYZ Elementary, administrators want to make sure the school is attending to all aspects of IB's Programme Standards and Practices (IB, 2014a).

Brookfield (1995) asserted that a culture of reflection is essential. Brookfield explained that without the support for critical reflection, teachers who want to question, reconsider, and analyze instructional practices may otherwise not engage in reflective practices. Brookfield (1995) continued by explaining that when teachers are critically engaged in an exchange of ideas or alternate views, teachers have opportunities to take their own advice, suspend judgment, and consider other approaches to their teaching. This scrutiny demonstrates how critical reflection is beneficial to teachers and can even be a catalyst for developing new insights into their instructional practices.

In addition, the students at XYZ Elementary benefit from reflective teachers and the process involved with instructional reflection. As reflection is one of the learner profile attributes in the Primary Years Programme, observing the results of teacher reflection on instructional decisions provides a model for students to learn how to reflect on their learning, actions, and outcomes. Through modeling reflection, teachers demonstrate how a better outcome or decision can come from changing your actions based on what has occurred (Lupiniski, Jenkins, Beard, & Jones, 2012). IB teachers should guide students through reflective instructional practices that emphasize expectations and can be adjusted for certain assignments. The purpose of this study was to examine teachers' perceptions of and experiences with reflective practice within the IB framework in order to improve their instructional practices.

Definition of Terms

Critical Reflection: The act of thinking deeply in an attempt to question prior assumptions and make sense out of ideas and experiences (Brookfield, 1995; Theobald, Gardner, & Long 2017).

Inquiry-based teaching: An approach where students' curiosity and questioning drives the learning (IB, 2015).

Learner profile: An IB term that describes the behaviors that are consistent with an IB learner (IB, 2013).

Primary Years Programme: An IB school consisting of grades K-5 (IB, 2013).

Reflective practice: The act of thinking or reflecting about something. Teachers use reflective practices when they think about instructional decisions made and teaching processes (Lupiniski et al., 2012; Schon, 1983; Valli, 1997). Reflective practitioners engage students in reflective thinking strategies to raise student achievement (Education Research Center, Texas A&M University, 2016).

School improvement plan: A multiyear plan schools develop to improve in areas deemed important based specific criteria.

Significance of the Study

Through this qualitative case study, data was collected and analyzed to gauge teachers' perceptions of and experiences with using reflective practices to improve their instruction within the IB framework. Because of the pledge that IB makes to develop reflective practitioners, this study is important as it gives an authentic voice to teachers about their use of reflective practices at this IB school and examines how teachers

understand the importance of instructional reflection in the IB model. By examining teachers' perceptions of and experiences with instructional reflection in an IB Primary Years Programme at a school in the southeast I determined what resources they were using that were currently provided by the IB school, and what other structures or supports were needed in order to help teachers meet the IB standard for being a reflective practitioner. As indicated by IB, the commitment to professional learning, including reflective practice, is an integral component to the philosophy and curriculum (Bergeron & Dean, 2013). Findings of this study may aid teachers in cultivating a deeper understanding of their own reflective practices as a form of professional growth (Lupinski et al., 2012). Bergeron and Dean (2013) confirmed how important it is for teachers to take advantage of professional growth opportunities with their colleagues, including collaboration, debriefing, and other forms of support. They explained how continued professional growth raises teachers' level of teaching excellence (Bergeron & Dean, 2013). Included in Bergeron and Dean's work is how a teachers' perception of educational research can change their fundamental understanding of ideas and practices through reflection. Students may also benefit because reflection by the teacher during instruction encourages students to reflect and examine their own ideas. This transference of reflective practices is a conduit for change in students' capacity to take ownership of their learning. School administrators charged with the stewardship for the school's adherence to IB philosophies may also benefit from the findings as they determine how teachers currently perceive and experience instructional reflection in the IB model. The findings of the project study may assist school leadership in planning meaningful

professional development or other supportive structures to encourage teachers' growth in reflective practice.

Research Questions

Teachers at XYZ Elementary are required to use reflective practices as part of the practitioner standards yet they were struggling to meet this expectation. As part of the IB model, critical reflection is essential, and the teachers in the local setting struggled to fully implement this element as a regular part of the instructional planning and teaching cycle. This study examined teachers' perceptions of and experiences with meeting the IB practitioner standards and what they needed to improve their instructional practices.

The research questions were:

RQ3: What are Primary Years Programme IB educators' perceptions of their reflective practices using the IB practitioner standards?

RQ2: What are IB teachers' experiences with reflective practices using the IB's inquiry-based teaching model?

RQ3: What structures, supports, or resources do teachers require to implement reflective practices in instruction and model reflective practices for students?

Review of Literature

Development of this literature review included an electronic search in Walden University's library, a database search in Taylor and Francis online, EBSCOhost, and ProQuest, and research books. The search phrases used to conduct the study included *reflective practice, reflective practitioner, reflective thinking, reflective teachers' role, definition of reflection, types of reflection, reflective inquiry, critical reflection, examples*

of classroom reflection, and becoming a reflective teacher. Other search phrases included *constructivism, professional development and reflection, teacher education programs and reflective practices, perception supervisors have on teacher education programs, teachers' perceptions of reflective practice, International Baccalaureate and reflection.*

While in-service teachers are the focus of this study, exhaustive searches indicated that much of the literature available for review actually centered on preservice teachers. To explore more fully what is known about teaching professionals and reflection, I also reviewed some of the studies involving preservice teachers. This review represents the available literature as determined by literature searches conducted in collaboration with the Walden librarian and the committee chair, both of whom assisted in determining the scope of the literature that was available for review. Theorists were critical to the focus of this review. The theorists searched were Brookfield, Dewey, and Schön. The conceptual framework is presented and followed by the review of current literature. The current literature themes include types of reflection, the reflective practitioner, and examples of reflective practice.

Conceptual Framework

The conceptual framework for this study is John Dewey's (1933) theory of critical reflection. Dewey was the philosophic pioneer on the study of reflective practice. Dewey explored the ethos of thinking and how individuals form their thoughts. In *How We Think*, Dewey (1933) defined reflection as the "active, persistent, and careful consideration of any belief or supposed form of knowledge in the light of the grounds that support it and the further conclusions to which it tends" (p. 6). This conceptual

understanding of critical reflection provides teachers with opportunities to more effectively use instructional reflection within an IB framework as well as heighten their insight into their own reflective practices. Dewey saw reflective thinking and research as one and the same. Rolfe (2014) furthered Dewey's explanation of reflective practice by explaining that research is defined in terms of the process rather than the outcome. As Dewey is seen as the pioneer of defining instructional reflection, the epistemology of reflective practice is seen through the work of several other theorists and has changed over time (Clarà, 2015). For example, the Vygotsky Principle emphasizes individual learning in public and private settings through four phases of interaction (Finlayson, 2015). The phases represent various ways we learn through interactions with others in different settings, public and private, and how we take in knowledge. White (2010), on the other hand, suggested a different view. White (2010) said that learning occurs through a social framework. These two additional perspectives offer a different view as to how to evaluate what reflective practice represents. Dewey's broader theory of reflection aligns with the IB framework that the use of reflective practices is an expectation of teachers and students.

While views appear to differ, there are commonalities with these theories and the notion that critical reflection is essential to an inquiry model of teaching through the IB framework. For example, appropriation, one of Vygotsky's phases, is depicted in Dewey's theory of inquiry as well (Finlayson, 2015). In addition, Schön's theory on learning and instructional reflection lends itself to Vygotsky's "transformation" paradigm, which suggests learning changes and adapts to meet the needs of individuals

(Benade, 2015; Finlayson, 2015). Each theorist's ideas about instructional reflection and how and where learning takes place demonstrates how each definition shares similar characteristics and ideas. Different aspects of instructional reflection as researched by the theorists connect all these ideas. The relevant key concepts from Dewey's (1933) work centers on how people form their thoughts, how these thoughts are used, and what effect thought has on the process of action. Teaching is one such action, and as such, Dewey's theory frames the investigation into how teachers use their own reflections about their instructional practices to shape their teaching and how they model this for students in the IB setting.

Instructional reflection in teaching involves teachers reflecting on their actions, observations, and outcomes to inform judgment and their actions in context (Del Carlo, Hinkhouse, Isbell, 2010; Lupinski et al., 2012; Valli, 1997). Teachers who reflect on classroom lessons previously taught examine difficulties with behavior, engage students, improve classroom management, and promote student independence. Instructional reflection can lead teachers to a deeper understanding of their instructional actions and the outcomes they are producing and can increase the possibility of students learning to reflect on their own learning, actions, and performance. Dewey suggested that reflection is necessary for people to take intelligent action (Valli, 1997). Dewey also suggested that teachers who are not reflective in nature are considered merely skilled technicians and are not able to make good decisions or alter their actions based on their experiences (Valli, 1997). Reflective teaching is a result of teachers practicing critical reflection. Critically reflective teachers make decisions about their teaching based on self-reflection

as well as by processing feedback from others as they recognize their prior assumptions and embrace challenges to improve their teaching (Mackay & Tymon, 2013).

This study examined the perspectives and perceptions of teachers at XYZ Elementary, an IB school. While Dewey's theory (1933) addresses the specifications and foundations of being a reflective practitioner, which guide the theory of reflection, I reviewed further literature about different types of reflection and the role of the reflective practitioner. In addition, this study addressed how reflective practices impact the IB inquiry-based teaching model.

Types of Instructional Reflection. Three types of instructional reflection, technical rationality, reflection-on-action and reflection-in-action, and critical reflection, compose the conceptual framework.

Technical rationality. Schön's (1983) work defined the term "technical rationality" as a way to describe the relationship between theory and practice. Schön said that teachers' jobs are very complicated and filled with uncertainty, so therefore teachers cannot merely use what they learn in college (theory), but they must also reflect on their experiences and take new instructional actions in future practice. In addition, Rolfe (2014) explained that Schön referred to technical rationality as a model used in situations where the same solution can be expected every time and are straightforward and uncomplicated. Technical rationality reduces the effectiveness of the teacher because it removes the idea that teacher decisions can be situational or be the result of reflective thinking (Hébert, 2015; Thompson & Pascal, 2012). The technical rationality concept can be described as a situation in which teachers are faced with the same situation and come

to the same conclusions every time with regard to theory and practice. This is because the technical approach advocates learning from actual teaching and is product driven (Meierdirk, 2016). Meierdirk (2016) explained that teachers are focused on the products such as how well the lesson went or if the lesson met the desired objectives.

Reflection-on-action and reflection-in-action. After some time, Schön (1983) coined the terms *reflection-on-action* and *reflection-in-action* to refer to different times that teachers use reflection to inform their teaching, offering a different perspective than technical rationality. Reflection-on-action refers to teachers reflecting at the conclusion of their day, including the lessons taught, student engagement, and other aspects of their day, once the day is complete (Meierdirk, 2016; Uhrich, 2009). This is important for all teachers to learn to do as they plan their lessons and think about students' progress. In contrast, reflection-in-action refers to teachers reflecting during teaching (Rolfe, 2014). Schön (1983) described reflection-in-action as happening during the lesson when the teacher feels it is appropriate to the lesson. The appropriate time could be seconds, minutes, hours, or even days depending on the length of the lesson or engagement in the activity. Benade (2015) added an additional dimension to Schön's (1983) reflection explanation by stating reflective activity has a 'temporal character' and that reflective activity should include an ethical dimension whereby the outcome of reflection must include a changed practice. Comparatively, Rolfe (2014) goes further and insists that first instances of reflection-in-action should be after reflection-on-action, where teachers are able to take an extensive look at their decisions with a supervisor as a means of professional development.

Critical reflection. Just as Schön's (1983) explanation added depth to the understanding of instructional reflection, political philosopher, Brookfield (Brookfield, 2015), described the practice of critical reflection as the most advanced form of instructional reflection (Valli, 1997). Brookfield suggested that critical reflection increases a person's understanding to enable change (Brookfield, 2005; Theobald et al. 2017). Teachers who practice critical reflection become adept at examining and questioning various situations and outcomes beyond what is defined as a reflective teacher. A critically reflective teacher does not solely rely on their assumptions of what they think should be happening in a class, or with a student, but a critically reflective teacher questions what each situation might look like and does not simply draw the obvious conclusion or idea (Benade, 2015; Brookfield, 1995; Shandomo, 2010). Critical reflection also means teachers may abandon what may be the easiest solution and dig deeper by inquiring into their teaching and their students' learning and questioning their assumptions further (Benade, 2015; Brookfield, 2015; Cornish & Jenkins, 2012; Hope-Southcott, 2013). Brookfield (1995) suggested that if individuals uncover their assumptions, which include situations they take for granted or what might seem the obvious next step in our teaching, they can then begin to look more critically into the practice of reflecting on instructional experiences and next steps for teaching effectively. Instructional reflection becomes critical when teachers drop their assumptions and work against what they tend to believe and when they can question and understand the powers that govern the educational processes (Benade, 2015; Brookfield, 1995).

Role of instructional reflection for practitioners. Jorgensen (2015) outlined John Dewey's explanation of reflective thinking whereby individuals avoid making conclusions about a thought or idea until they have inquired into and investigated various thought processes and solutions. Dewey used this way to explain the process of making decisions based on reflecting on experiences and felt that reflective thinking was a fundamental part of education (Farrell, 2013, Jorgensen, 2015).

Reflective practitioners spend time with other teachers discussing concerns and ideas (Daniels, 2002; Valli, 1997). This is helpful because teachers can use others' ideas to build on their own while investigating solutions. Teachers who engage in reflective practices self-reflect as well as discuss how to improve student learning with other teachers (Daniels, 2002; Farrell & Ives, 2015). Reflective practitioners also understand that it is important to not only reflect on their lesson ideas and delivery of instruction, but to also reflect on the learners themselves. This makes it clearer for teachers to identify and target individual learners' needs and how they process information. During the process of instructional reflection, teachers can analyze and use data from an audio or visual recording of a lesson (Jaeger, 2013). Jaeger (2013) went further to explain transparent teaching where teachers discuss their intradecisions with students as they occur. This type of reflection models reflective thinking by teachers, which is an integral component of IB.

According to Shoffner (2008) many teachers choose not to utilize informal reflective practice. Informal reflective practice is very personal and individualized to the reflective practitioner. With this, teachers can give their instructional reflection a personal

structure that meets their needs and their level of comfort with reflective practices (Finlayson, 2015; Shoffner, 2008). Informal reflection involves self-questioning, gaining awareness, and analyzing issues, whereas formal reflection requires research and theory as the framework for reflective work (Finlayson, 2015). Farrell (2013) continued by explaining that unstructured or informal reflection is a way for teachers to benefit from applying a reflective practice in their work. Instructional reflection, when implemented appropriately, is used for teachers' growth and development in their teaching (Daniels, 2002; Farrell, 2013).

Teaching experiences are different for every instructor based on their life situation, and as such, teachers reflect on their instructional experiences in various ways. In comparison to Shoffner (2008), Hostetler (2016) explained that all teachers do not reflect on their instructional experiences the way that novice teachers may need to or be encouraged to do. Novice teachers may be at a loss during situations that arise in the classroom and reflection may be necessary. He explained that expert teachers often use their intuition and experience to make decisions informally.

In addition, another manifestation of reflective practice is the holistic approach to reflecting on instructional experiences. The holistic reflection perspective encourages teachers to ask questions while realizing that many teachers find this difficult when they are entrenched in a standardized test culture (Klein, 2008; Meierdirk, 2016). Klein (2008) suggested that teachers should be encouraged to ask questions as well as visualize change. The focus on using teacher intuition and visualizing change is included in the holistic approach to instructional reflection and teaching. Meierdirk (2016) clarified that

holistic interpretation of reflective practice encourages critical reflection as the teacher is more focused on the purpose of the lesson. The holistic aspect of critical reflection lies in the teachers' experiences, intellectual beliefs, and the social context (Meierdirk, 2016).

Examples of Reflective Practice

Reflective journals. Reflective data and observation can be recorded through several sources that are helpful to reflective practitioners. One such way is through reflective journaling. Shandomo (2010) suggested that journaling can be formal or informal in nature and typically includes information about how children are learning in different settings as well as teachers' thinking throughout the day. This type of journaling aids teachers in recording their thoughts about their instructional experiences (Farrell, 2013). Reflective journals are also often used in teacher education classes as a way for teacher candidates to uncover their thinking, ask questions, provide opinions, and discuss observations (Gadsby & Cronin, 2011, Shandomo, 2010, Lupinski et al., 2012). Lupinski, et. al (2012) continued by confirming that reflective journals are beneficial in teacher preparation programs and are necessary in the development of an adept reflective practitioner. Teachers can gain important insights into teaching by reading and reflecting on their thought processes (Farrell, 2013; Zulfikar & Mujiburrahman, 2017). Reflective journals can also be helpful in any classroom as teachers write observations and questions concerning lessons and student performance. Teachers who use reflective journals are more conscious of their teaching and are more aware of their reasoning and decision making in the classroom (Zulfikar & Mujiburrahman, 2017).

Reflective journals can be very beneficial for teachers during and after the instruction and planning processes; however, Dymont and O'Connell (2014) suggested that there are times teachers are ill prepared, not trained or given little structure to follow, such as reflective prompts or details about entry length. Gadsby and Cronin (2012) confirmed this by stating that without the capability to reflect, teachers' professional growth is decreased. In this case structure and guidelines would help teachers know where to begin writing. Structures such as knowing ahead of time to write about classroom practices, beliefs, and/ or assumptions are places to start (Cronin, 2012; Zulfikar & Mujiburrahman, 2017). Research such as the study by Chien (2003) suggested that teachers may find it difficult to give time to a reflective journaling if they have several different classes of students throughout a school day. If you do not write down your reflections immediately, it may be difficult to remember at a later time. However, Chien (2017) discussed the benefits of journaling and how it helps to clarify teaching. An additional benefit to reflective journaling is that it helps teacher foster metacognition. Farrell (2013) discussed the benefits of teachers using reflection to slow down their thinking so that they can more consciously explore their thoughts in an organized way. This thinking about thinking is the purpose of reflection and this critical look has benefits for teachers and students (Gadsby, et.al, 2011, O'Connell & Dymont, 2014). This is beneficial for teachers and students because reflection involves serious thought and consideration for future teaching resulting in better lessons for students.

However, Dymont and O'Connell (2014) suggested that gender differences, ethical considerations, and the basis of a teacher's reflections could negatively reflect the

benefits of reflective journaling. If teachers do not like to write themselves, this can influence their details or interest in writing in a journal (Dyment & O'Connell, 2014). Women are more likely to favor journaling and may spend more time reflecting on what they have written than their male counterparts (Dyment & O'Connell, 2014). For all students to benefit from a teacher's reflective journaling, the teacher would need to value journaling and its benefits. A productive reflection includes questions, assumptions, and different ways of looking at situations (Lupinski, et. al, 2012).

Reflective journaling can be simple or complex, depending on the teachers and the different level of reflection the teachers chooses. According to Gadsby, et. al. (2011) different thought processes demonstrated through reflective journaling also may signal various levels of reflective development. Gadsby, et. al. (2011) explained that such levels include descriptive reflection where teachers are concerned with recalling information. This involves a teacher describing an example of how they responded to a student in class. The next level refers to practical reflection where the shift becomes the pedagogical approaches and strategies teachers may want to guide their focus. This level exemplifies teachers noting that their approach to a lesson or their thought process might need to be shifted based on best practices in a specific classroom situation. And the third level is commonly known as critical reflection (Brookfield, 1995). Reflective journaling is not only helpful to beginning teachers; it is also useful for seasoned teachers. Productive reflective journaling is an example of critical reflection. This is true for teachers of all stages of their teaching career begin to ask meaning-based questions. Meaning-based questioning requires teachers to search for meaning about their teaching practices through

reflective journaling (Chapman, 2015). Discovering answers through reflective journaling is a type of inquiry and it allows teachers to wonder and ask questions about best practices that can lead to more meaningful solutions in their teaching.

The role of technology. Technology is another way for teachers to be reflective practitioners and may provide tools that aid teachers in reflecting over their classroom practices. Oakley, Pegrum, and Johnston (2014) suggested that the integration of digital technology is very effective as a tool for reflecting about instructional experiences. Mass communication and digital technology has become an increasingly prevalent today and using e-portfolios creates opportunities for teachers to communicate and collaborate effectively (Carl & Strydom, 2017). Teachers are encouraged to use blogs, portfolios and e-portfolios, and/or video recordings as tools for reflection.

Venable (2014) explained blogs as an electronic platform usually involving the Internet that includes hyperlinks provided by the writer. Blogs are an effective way to practice and build on reflective practices in teacher education classes (Chapman, 2015). By using blogs, student teachers can comment on posts from others in the class electronically. Teachers can also use blogs as a way to collaborate with one another and have the ability to comment and help provide further insight into a teaching session or lesson.

Electronic portfolios, or e-portfolios, present another way for teachers to present their reflective thinking. E-portfolios help teachers to compile resources that include digital images in an organized way. Carl and Strydom (2017) suggested artifacts such as photos, interviews, and reflective writing as well as keeping data on academic

expectations are useful for instructional reflection. With e-portfolios, teachers can make connections between prior understanding and any new understandings of their teaching practices (Oakley, Pegrum & Johnston, 2014). Reflecting about instructional experiences using e-portfolios presents teachers' learning by showing their professional development and growth when they use their new understandings to affect their planning and teaching. Video recording also serves as a reflective practices tool for teachers. Teachers can view lessons as often as desired and relive the teaching moment (Durand, Hopf, & Nunnenmacher, 2015; McCullagh, 2012). Self-reflection, through video-recording, plays a part in the development of the professional as a whole (Kayapinar, 2016). Video recording gives teachers the opportunity to observe themselves in the classroom, stop the video and analyze and reflect on their performance, thinking aloud in the process (Baecher, et. al., 2014). Technological advances make it possible for teachers to engage through video as it provides a high and deep level of engagement (Baecher, McCormack, & Shiao-Chuan, 2014; McCullagh, 2012). While utilizing the video, teachers are able to reflect alone or in a group setting with others teachers to review and analyze teaching decisions and student engagement (Pellegrino & Gerber, 2012). Video reflection is also an example of Schon's theory of reflection-on-action as this analysis provides teachers the opportunities to view themselves and reflect on teaching episodes. These small videos recorded moments give teachers the opportunity to discover the difference between what is happening in the classroom and what teachers perceive is happening (McCullagh, 2012). Technology also offers challenges when used as a reflective tool. For example, Durand, et. al (2015) cautioned that without guidance or training on this mode, video

reflection can lead to teachers becoming too fixated on themselves and not reap the benefits that this resource can provide. Co-viewing can aid teachers in considering the observers' judgment. Co-viewing typically yields specific comments and remains very focused.

Types of reflective practices are used across the curriculum and in all levels of schooling (Galea, 2012; Venable, 2014). Some content subjects support the use of personal written reflection through journals, whereas, E-portfolios, video reflections and blogs encourage teachers to co-view their reflections on instructional practices to gain a different perspective other than their own. The use of the reflective practices described above helps pre-service and in-service teachers grow and develop into effective practitioners. (McCullah, 2012).

Teacher Beliefs

Teachers believe that reflecting on their instruction is a critical element in the foundation of being a better teacher (Williams & Grudnoff, 2011). Novice teachers may not gain as much from instructional reflection as more experienced teachers because they lack the experiences that an experienced teacher has (Farrell, 2015; Hostetler, 2016; Williams & Grudnoff, 2011). William and Grudnoff (2011) conducted a study of teacher beliefs about instructional reflection with novice teachers and experienced teachers. Teachers were not convinced of the benefits of instructional reflection at the beginning of the experience; however, they discovered the usefulness of reflecting on their practices and how it can be used to develop their teaching skills. In summary both novice teachers and experienced teachers recognized the benefits. Just as Farrell and Mom (2015)

discovered in their study of teachers reflecting on their questioning of students during lessons that helped students think more critically and provide more evidence in their responses. Teachers reflected on their beliefs about the taxonomy of questions they asked students and how their questioning informed their instructional practice in lessons. This type of critical reflection by teachers improved their instruction and learning for students.

Support for Developing Reflection Skills

Professional development in schools serves as a way to expand teachers' knowledge on best practices in education (Meierdirk, 2016). The study of how to be a reflective practitioner is no different. Stover, Kissel, Haag, and Shoniker (2011) explained the role that literacy coaches play in professional development. Because literacy coaches typically are on staff at school, this embedded professional development to support reflective skills can be differentiated for teachers based on their needs. Hourani (2013) introduced the idea of a 'thinking coach' in the schools, which can be beneficial in the effort to improve reflective skills for teachers. The interaction between the teacher and coach serves as professional development to provide information about the reflective approaches the teacher may find useful for increasing their instructional effectiveness. This professional development occurs in dialogue between the coach and a teacher; whereupon, they discuss and co-analyze any teaching concerns regarding lesson delivery or student learning. The thinking coach can facilitate critical questioning or share tools and strategies to encourage critical reflection (Hourani, 2013). Furthermore, Stover, et al., (2011) explained the role that teacher reflection has in professional development of this type is an important key to change and professional growth for teachers (Clarke,

2014, Meierdirk, 2016). Thinking coach professional development is typically ongoing for teachers throughout their teaching career and an element of reflection over time is necessary to grow from professionally (Clarke, 2014; Kaypainer, 2016; Meierdirk, 2016; Ryder, 2012; Shandomo, 2010).

Reflective teachers benefit students as well. A reflective teacher is a teacher that is able to look at themselves through several critical lenses. Reflective teachers use what they learn about themselves to improve their instruction, which can lead to an improvement in student performance (Barnett & O'Mahoney, 2007). Professional development where reflective practice is a major focus can assist teachers in understanding the importance of instructional reflection as well as the different types of reflective practices. Using reflective practices requires teachers to drop all assumptions about themselves and their students. However, Galea (2012) suggested that it is possible that reflection is more of a routine that teachers are expected to follow rather than understanding the benefits of critical reflection. Despite implementation of measures for processes using reflective practice, routine and redundancy often neutralize their effectiveness (Galea, 2012). Instructional reflection must be more than just a prescribed action in order to be effective. In summary using reflection structures and resources such as literacy coaches provides different options for teachers to consider.

Implications

Through this qualitative case study, data will be collected and analyzed to gauge teachers' perceptions of and experiences with instructional reflection to improve their instruction within the IB framework. The literature review shows that using reflective

practices is an important tool for professional and personal development as a teacher. The conceptual framework recognizes that critical reflection is an aspect of instructional reflection where teachers set aside their assumptions and question their actions and outcomes (Brookfield, 1995; Valli, 1997).

Teachers' perception of reflective practices at XYZ Elementary may show a need for the school to provide more structure for teachers to become more fluent in using different reflective practices and approaches, as suggested in the literature (Benade, 2015; Hickerson, 2011; Liu, 2015). This study might fill the gap between what research says should happen when teachers critically reflect and what reflection currently occurs at the school. Teachers at XYZ Elementary may be unaware of the many different types of reflective practices that can help to inform their judgment with instructional decisions and further their own understanding in how to best address the needs of their students. Based on anticipated findings, professional development may be needed, or a position paper advocating for different kinds of planning and collaboration times may be needed. Professional learning should be included in an ongoing conversation with teachers, students, and parents demonstrating the value in reflection for all stakeholders. This study may show stakeholders where the gaps in professional learning are, and how to ameliorate those concerns. Showing teachers how to increase their use of reflective practices and remind them of the benefits of such a shift in practice provides a framework for social change at XYZ Elementary.

Summary

This qualitative study will focus on teachers' perceptions of reflective practices in an IB Primary Years' School. Being a reflective practitioner is established as part of the framework for the teachers at an I.B Primary years' school. Theorist John Dewey (1933) has influenced the conceptual understanding of reflective thought/ awareness and how it transfers into the classroom. Brookfield (1995) also established how critical reflection is vital for teachers to develop a comprehensive understanding of their role and how it affects students. The teachers at XYZ Elementary continue to report they have struggled to effectively implement reflective practice. Because reflective practice is identified as a major component of an IB school, it is vital that teachers have a platform to engage in reflective practice.

This section presented the problem faced by XYZ Elementary teachers and presented the literature and framework supporting the investigations. Instructional reflection was explored as the conceptual framework beginning with Dewey's explanation of *How We Think* (Dewey, 1933) and Brookfield's definition of critical thinking (Brookfield, 1995). Critical reflection was examined and explored as teachers analyze their instructional practices using different tools to reflect alone or in collaboration with other teachers.

The next section of the project study outlines the method of study utilized to collect the data needed in responding to the study problem outlined in this section.

Section 2: The Methodology

The nature of the questions that guided this study indicated a qualitative approach to answering those questions. The study was a qualitative, exploratory case study using a single case design. This case study served as a platform to explore a specific phenomenon, IB teachers' experiences with reflective practices in the classroom and perceptions of their reflective practices. Several sources of data were used including interviews and open-ended questionnaires with individual IB teachers as well as a sample of IB teachers' reflective journals. This section includes a discussion of the qualitative research design and participants, data collection, and data analysis strategies.

Qualitative Research Design

Understanding the IB teachers' perspectives on and experiences with reflective practice and its influence on the IB constitutes the phenomenon in this study. This exploratory case study provides a deeper understanding of the IB teachers' perceptions of their own reflective practices, what experiences they have with the inquiry-based model, and any support teachers report should be in place to successfully implement reflective practice in an IB school. As the purpose of the study involved exploring teachers' perceptions and experiences with reflection, a qualitative approach was optimal for this project study. Yin (2003) asserted that case study is the most appropriate when attempting to answer "how" and "why" questions. Merriam (2009) confirmed that with case studies, the researcher's goal is to "uncover the interaction of significant factors of the phenomenon" (p. 43). This project study was focused on exploring a single case, XYZ Elementary. In addition to being an exploratory case study, this project study was

intended to shed light on the particular issue of teachers' reflective practices in a primary years IB school.

Case study was the appropriate research design for this study because of the in-depth analysis of reflective practices. This design is exploratory in nature and not only contributed to a general understanding of reflective practices, but also to understanding the perspectives of IB teachers at XYZ Elementary School. Case studies also allow researchers to consider the subjects within the contexts of their environment, whereas in an experiment the subjects are often isolated from their environment (Yin, 2003). This was beneficial in this case because the teachers were offering their perspectives based on their situations in their classrooms and within reflective practices required by IB. Case studies also offer the additional benefit of exploring behavioral conditions within context. In this case, I explored the perceptions and experiences of the teachers through interviews and their reflective journals.

I considered other qualitative approaches, but they were not as appropriate for the nature of this project study. Phenomenology and ethnography are useful methods of inquiry, but they require much longer periods of time immersed in a research site and are either too narrow (phenomenology) or too broad (ethnography) to best investigate teachers' experiences with reflective practices within the IB (Reeves, Kuper & Hodges, 2008). More specifically, phenomenology attempts to study focuses on individual's experiences and how that relates to reality (Groenewald, 2004). Likewise, ethnography relates to studying a group of people (Reeves et al., 2008). The problem in this study was not related to culture or understanding a culture of people.

Quantitative research involves analyzing numerical data (Lodico, Spaulding, & Voegtle, 2010) and would not have been appropriate because no numerical data was collected. Quantitative research tests a hypothesis by statistical means. Any approach seeking to quantify relationships or test hypotheses was not appropriate for this study, as this study explored the lived experiences and perceptions of teachers at one elementary school.

The qualitative research method was more advantageous than a quantitative or a mix of these methods for this study because this study explored the perceptions of teachers' experiences with reflective practices in an IB school and did not test relationships with any variables. The qualitative approach is inductive (Yin, 2003) and provides the opportunity to gather data from the participants and develop an in-depth understanding of their perspectives of reflective practices in this IB primary years school.

Participants

Criteria for Selecting Participants

To explore teachers' perceptions of reflective practices within an IB Primary Years Programme school, I used purposeful sampling. Lodico et al. (2010) explained purposeful sampling as one of the most used types of sampling in qualitative studies. This type of sampling was used because the participants in this study shared similar attributes (Lodico et al., 2010). In addition, purposeful sampling is a way to gain a deep, rich understanding of a phenomenon, in this case because the sample of participants had lived and experienced teaching in an IB school and were familiar with the IB platform. These selection criteria ensured that teachers had the professional academic background and IB

experiences needed to have authentic and varying perspectives. Lodico et al. (2010) explained that a realistic population includes individuals who are more ideal for sampling in specific research. In this case, a smaller sample from the entire faculty and staff at XYZ Elementary would be ideal. XYZ Elementary is an IB school that only consists of 4th and 5th grades. Therefore, the participants were all teachers at XYZ Elementary teaching 4th or 5th grade. For teachers to qualify to participate in the study, they needed to have at least 2 years of teaching experience and at minimum one training session provided by IB away from the local school.

Of the 38 homeroom teachers at XYZ Elementary, only 10 teachers verbally expressed an interest, according to informal conversations, in being more reflective. After gaining access to participants by using the guidelines set forth by Walden University, the final study consisted of 10 participants. By using a sample of 10 participants in this study, I gained a deep understanding and thick description of the perspectives and experiences of teachers at the school. Sample size varies in qualitative studies, and it is reasonable to have a small sample size in a study (Creswell, 2012). Having a small sample size provides the researcher an opportunity for a more in-depth and descriptive look into the study phenomenon (Creswell, 2102).

Criteria for International Baccalaureate Training

One of the criteria for participants was to have completed at least one outside training provided by the IB. The local school provides teachers with IB training through the IB coordinator at XYZ Elementary and in addition sends teachers to IB conferences around the country throughout the school year and during the summer months. Within IB,

there are different categories of training that are systematically more in-depth in their progression of courses (IB, 2016b). IB training is delivered in three categories. Category 1 training teaches the IB philosophy and implementation, Category 2 training focuses on program delivery, and Category 3 delivers instruction on enhancing educational portfolios (IB, 2016a). This is helpful because participants having experiences with teaching and formal IB training translated into diverse perspectives to use in the population sample. Teachers were purposefully selected with an effort to include teachers with varying levels of IB training as well as differing years of teaching experience. For teachers to qualify to participate in the study, they needed to have at least 2 years of teaching experience and a minimum one training session provided by IB away from the local school.

Table 1

Teacher Demographics

Participant	Years Teaching	Years Teaching in IB	IB Training	Grade
Participant 1	13 years	5 years	Level 2	4
Participant 2	13 years *	3 years	Level 1	4
Participant 3	6 years	3 years	Level 1	4
Participant 4	10 years	7 years	Level 1	5
Participant 5	6 years	2 years	Level 1	5
Participant 6	25 years	11 years	Level 2	5
Participant 7	16 years	4 years	Level 1	5
Participant 8	4 years	0 years	Level 2	5
Participant 9	12 years	5 years	Level 2	5
Participant 10	10 years	5 years	Level 1	4

Note. The years teaching that include a * indicates that the participant worked as a paraprofessional until becoming a certified teacher and working at XYZ Elementary. At the time of the study this participant was a certified teacher.

Gaining Access to Participants

The school system has a process to follow when conducting research at any school or using any personnel within the district. I began the process by presenting my proposed research to the research and analytics director through an online portal. The district approved my research and the Institutional Review Board (IRB) at Walden

University approved it as well. The Walden University IRB approval number for my study is 03-05-18-0350569. Upon receiving the necessary approvals, I then e-mailed the building principal at XYZ Elementary and arranged an in-person meeting to discuss the specific components of the case study. During this meeting, I explained the study and the criteria for selecting participants. The building principal provided me the names of the teachers who met the selection criteria.

Initially, the criteria for participation in the study was for teachers with at least 2 years of experiences to also have attended at least two outside trainings. However, because the number of participants at XYZ Elementary who met those two criteria was smaller than the anticipated sample size, I contacted the IRB and requested a change in procedure. The IRB approved a change in the teachers only needing to have one outside training by the IB instead of two trainings. Lodico et al. (2010) explained that this type of change is anticipated in qualitative research. This small change opened the participant pool who met the criteria from 5 to 16 potential participants.

I invited teachers meeting the criteria by e-mail to participate in the study and attend an initial meeting. Of the 16 potential participants, 12 teachers attended the meeting. During the initial meeting, I introduced myself and discussed their voluntary participation in this study, as well as the fact that they were at liberty to withdraw from this project study at any time. In addition, I explained the purpose of this project study and the data collection procedures that would be involved.

I gave participants detailed information about the study in the initial meeting. This included the purpose of the study, the methods of data collection, and how these data

would be used. Upon conclusion of the meeting, teachers were given a hard copy as well as e-mailed additional copy of the teacher invite and consent form. I explained that the informed consent could be signed and given to me in person or e-mailed after the initial meeting up until the beginning of the study. Of the 12 people who were present at the initial meeting, 10 participants returned the consent form agreeing to be a part of the study.

Measures Taken to Protect Participants

I ensured participants' confidentiality by not using any personal identifying information in the case study. To ensure participants' rights were protected, participants received and signed a letter of informed consent outlining the study procedures and their rights. This informed consent indicated that participants were volunteering in this study with the knowledge of its purpose, data collection procedures, confidentiality understanding, and that they had the right to withdraw from the study without negative consequences at any time. All forms have been stored in a locked box outside the district and school environment. During data collection, participants did not use any identifying information on their reflective journals; instead they had study codes assigned to them to protect their identity (Lodico et al., 2010). Study codes were used for the transcriptions of the interviews and in the findings. This ensured the protection of confidentiality for the participants. Participants were informed that if they felt reluctant to speak at the school site, an alternate location would be agreed upon for the interview. Participant identifying information were stored off site and will not be used on any materials to avoid a breach in confidentiality. Electronic materials and transcripts were stored in a password-protected

computer, which is not stored at the research site. After 5 years, all data will be destroyed per Walden University policy.

Data Collection

To answer the research questions, data were collected in the form of teachers' reflective journals and one-on-one interviews. Data were collected sequentially beginning with teachers completing a two-week reflective journal, with an entry after each teaching session. At the end of the two-week journaling period, individual interviews were scheduled. Because teachers are not required to keep a reflective journal at XYZ Elementary, I explained reflective journals in detail and provided a sample during our initial meeting discussing the study (Appendix D). Teachers understood that the reflective journals are the place to record their reflections about their instructional experiences to help guide future actions. Reflections could include but are not limited to their attitudes, beliefs, perspectives, and experiences to examine the instructional actions they took, their observations and the outcomes they produced. Additionally, after the journals were complete, one-on-one interviews were conducted with each teacher. Journals and interviews provided a specific and detailed picture of teachers' experiences with reflective practices using the IB practitioner standards and their perspectives on the resources needed to model reflective practices for students.

During data collection, identifying information such as the school district, site, administrators, teachers, and participants was not used on the reflective journals or transcripts of interviews. Instead, study codes were placed on any documents with identifying information to insure the confidentiality of the teachers.

Reflective Journals

To begin the data collection sequence, I asked participants to record their thoughts and reflections about their teaching using the IB's inquiry-based teaching model.

Reflective logs or journals are useful to collect information that is not easily observable and can collect participants' thoughts about relationships within a phenomenon (Symon, 2004). Participants' two-week reflective journals will be used as data collection for this study. I provided teachers with a blank single-subject notebook to use as their reflective journal. This was provided as one option for teachers to record their reflections. Teachers began their daily reflective journals, either electronic or hand-written (teacher choice) at the beginning of the study. Teachers were asked to complete a minimum of one journal entry after each teaching day/session with students. The reflective journals were unstructured and were intended for teachers to reflect on how their teaching practices were influenced by IB's inquiry-based teaching model. Teachers' reflections could also include observations, questions, and thoughts they may have that were influenced by the inquiry-based model. Because every lesson that teachers teach in a day at XYZ Elementary is not inquiry-based, teachers used their reflective journals after any inquiry-based lessons being taught. In some cases, teachers reflected on an inquiry lesson in social studies and science on one day, but English Language Arts on another day. However, teachers' notes on reflective practices were the focus of the reflective journals, not the subject being taught. Dymont and O'Connell (2014) asserted that reflective journals allow the writers to analyze their thoughts and decisions. Because of this, teachers' analysis of their thoughts and decisions are useful in determining how they

experience reflective practice. Reflective journals are a personal way for participants to reflect on their own teaching practices as well (Dyment & O'Connell, 2014; Farrell, 2103). Reflective journals were submitted at the end of the two-week period either electronically (via email or storage device) or the handwritten journal, using their participant code, in a folder provided upon request. Any identifying information about the school, teachers, or participants was removed from the journals and participant codes were placed on each journal to ensure confidentiality.

Semistructured Interviews

After the two-week reflective journals were submitted, the 10 participating teachers completed a one-on-one semi-structured interview that followed the interview protocol (Appendix C). The interviews probed their experiences with reflection and perceptions of reflection within the IB framework. Interview questions were researcher prepared in advance and were influenced by data provided in the reflective journals and constructs from the conceptual framework. For example, based on teachers' reflections in the reflective journals, interview questions were added or expanded to gain further clarification on any reflective practices used or reflective thoughts teachers put in their journals or alluded to in the interview. Through interviews, I explored the supports and resources teachers believe are needed to better implement the reflective practitioner standards at XYZ Elementary. Interviews were appropriate to explore the perspectives of a small number of participants on a particular idea, program or an individual's practices such as reflection (Boyce & Neal, 2006). Merriam (2009) confirmed that semi-structured interviews lie somewhere between structured and open-ended interviews in that the

questions are flexibly worded based on how the participant responds to the questions that have been prepared in advance. The responses from reflective journal entries provided specific areas that required further teacher-specific probing during the interviews. The interviews provided a way for teachers to explain how and if reflection influenced their inquiry-based teaching practices in this IB school. All interviews were recorded and transcribed by me with the written consent of the participants. All participants were notified before the interview as well as through the informed consent that the interviews were going to be recorded and transcribed for their review.

All teacher interviews were conducted over the two weeks following the date that the reflective journals were submitted. Each teacher was asked to request a date and time they were available within the given dates and provide the option to choose an alternate location other than the conference center. Before each interview began, I debriefed the participants by explaining to them their rights and providing an opportunity for the participants to ask questions and choose to end the interview if desired. This debrief provided participants additional assurance about confidentiality and anonymity throughout the interview process (Gill, Stewart, Treasure, Chadwick, 2008). Participants did not ask any clarifying questions about the interview process and understood the protocol before the interviews began. Each teacher participant was interviewed one time and a second interview was not requested for any of the participants. Interviews lasted approximately 15-30 minutes and teachers were aware that they could refuse to answer questions and/or ask for clarification if needed. During the interview, I asked probing and follow-up questions as needed. Follow-up questions were asked if a topic needed further

explanation or exploring. Interviews took place in the conference room at XYZ Elementary, a location free of distractions.

Role of the Researcher

While I work at XYZ Elementary, I do not have a supervisory role over any participants in the study. Our working relationship consists of working at the XYZ Elementary as coworkers. I have worked at XYZ Elementary for 5 years as a 5th grade classroom teacher and an Early Intervention teacher. My professional role at XYZ Elementary should not influence or affect data collections in any way. In addition, we do not teach the same students at any time throughout the school year. During the interview process I avoided any personal views and did not give my opinion or comment on any questions or answers. I ensured neutrality throughout the data collection in exploring teachers' experiences with using reflective practices within the IB model, there are biases that I must acknowledge and overcome as the researcher:

1. As a teacher I consider reflective practices a way to improve teaching and learning for students. I do however understand that there may be teachers who do not feel that reflection is valuable.
2. As a teacher researcher working in this same school, I have my own opinions about the IB framework establishing a platform for instructional reflection among the teachers.

As an educational researcher, I acknowledge my biases and beliefs concerning reflective practices at this school. To further validate my findings, I asked a content reviewer, an IB educator within the XYZ school district, who also teaches using the IB

framework, to sign a confidentiality agreement and examine the conclusions from the data analysis process. These conclusions did not contain any identifiers that might be linked to the participants. The content reviewer, an IB teacher from a school other than XYZ Elementary within the same district, was familiar with the practitioner standards for reflection within the IB model. The content reviewer examined the data and did not see any biases or inconsistencies revealed in the process or data collected.

Data Analysis

At the end of the data collection sequence, all transcribed audio recordings of the interviews and reflective journals were organized by concepts discussed, and notes were recorded in a notebook. The notebook was used to organize data sources by date, concept discussed, and participant and helped to facilitate searching through the various data sources and information. I used an inductive analysis process to analyze the data collected. Since no preconceived categories or hypotheses guided the analysis of the data, an inductive approach was appropriate (Merriam, 2009). Merriam suggested that this process encourages the researcher to use the data to identify themes and patterns related to the research questions and not begin the analysis with *a priori* codes.

I selected the participants from the 10 teachers who signed the consent form and agreed to the study. During the initial meeting, where teachers matching the participant criteria were invited by email, it was explained that participants could complete the reflective journal either electronically or using the single-subject notebook that was provided to them. Three participants used the notebook and hand wrote their reflections and seven participants opted to complete the journal electronically. All reflective journals

were submitted after 10 teaching days and included reflections from each day. Each participant was assigned a number 1-10 to protect his or her privacy. All names were removed from their reflective journals and interview transcripts and replaced with their assigned number.

Next, I transcribed all the audio recordings of interviews through I-Tunes and sent transcriptions to the participants for their review. Returning the transcripts to the participants, also called transcript checking, confirmed the accuracy of the interview transcripts (Mero-Jaffe, 2011). All participants agreed with content of the transcripts and no changes were needed.

Once all participants agreed on the content of their interview transcripts, I began the coding process. First, I read all the interview transcripts and reflective journals to familiarize myself with the data. On the first review, I did not write any notes, or create any codes, I simply familiarized myself with the data. Next, I read each transcript and journal again. During this second reading of the data, I began to record my initial impressions and writing marginal notes. The notes were a combination of the exact words from the participants, my words, as well as concepts indicated in the data (Merriam, 2019). The notations indicated my reflections on what was relevant to the study. Merriam (2009) suggested that this type of notation is referred to as open coding where the researcher is open to anything possible during the beginning stages of data analysis.

On the third reading of the data, I began moving from margin note and impressions, to the creation of actual codes. This is where I began to think about the open codes from the marginal notes and reflect on their meaning, and whether further codes

were needed to capture participants' experiences (Merriam, 2009). Originally, I developed 9 codes. A list of the initial codes is listed in Appendix E. I made notes above the text of the interviews and reflective journals and in the margins, combining ideas that represented specific concept that were similar among participants. (Merriam, 2009).

Upon completion of this step with both the reflective journals and the interview transcripts, I used an online tool, a Wordle document, to help look at the frequency of concepts in both sets of data. The Wordle document is tool where you record the number of times a word or concept shows up in your data and it evaluates the frequency of each concept as shown in the data (Percy, 2016). I typed each concept each time it was present in both the transcripts and journals into the Wordle document. The Wordle document presented the results in a visual word cloud showing the most frequent concepts as larger words than the concepts that showed us less frequently in the data that appeared as smaller words. This document was a way to see which words appeared most often. The process of using Wordle helped confirm my assessment of the codes I developed and helped me decide that I had adequately captured the needed codes to capture participant experiences.

Next, I used the concepts with the highest frequency of use as indicated by the Wordle document and assigned each a color code. I used color coding when reading the interviews and journals for a fourth time and underlined (using the same color from the codes) the words and concepts with the colored pencils that matched their color codes. I began axial coding, the process of combining the open codes, and relating them to each other. The original codes combined or collapsed into the final codes are listed in Table 2.

From the identified concepts, themes emerged. Themes are formed based on similar ideas or concepts in qualitative data analysis that combine to form major ideas (Creswell, 2012). Through the axial process, I was able to combine similar concepts needed for reflective practice and collapse them into 4 main themes (see Table 3). As an example, to develop the theme of Lesson Reflection, I included the concepts of lesson successes, lesson frustrations, and plans for future lessons. The lesson reflection theme collapsed concepts that shared similarities. Wick (2010) explained that presenting a small number of themes in qualitative research lends itself to a detailed description as opposed to a general one. I was able to combine similar categories and collapse them into 4 main themes (see Table 3). The four themes include lesson reflections, planning, time, and training.

Discrepant Cases

The data analysis process also yielded discrepant cases of data. Merriam (2009) suggested that if data do not fit the established hypothesis, it is referred to as discrepant cases. Discrepant cases involve instances where the data collected differs or varies from the patterns and themes identified. In my analysis, teachers' frustrations with student behavior emerged several times in the reflection journals.

Validity and Quality of Findings

Merriam (2009) explained the importance of having confidence in the research and data gleaned from the study. In other words, the data that are collected, the way they are collected, and the analysis process should be trustworthy, credible, and transparent.

Internal Validity

Internal validity involves making sure the research findings encompass the essence of the findings (Creswell, 2012). Merriam (2009) asserted that data do not have a voice; the researcher must interpret the findings. Internal validity involves measures that help in this process.

After transcription of the interviews, participants received an electronic copy of the interview. In this way, participants had the opportunity to check the data for accuracy and report any misconceptions or corrections they wish to include in the transcript. All transcriptions were checked as a way for the participants to review and cross check the taped interview with the transcription and check for validity and accuracy (Creswell, 2012; Merriam, 2009). The process of transcript review solicits feedback from the participants thus an integral part of assessing the validity of the transcriptions.

Another method of internal validity is the use of triangulation. Triangulation involves using multiple sources of data to compare and cross check information (Creswell, 2012; Merriam, 2009). Participants' responses to the interview questions, along with the reflections they provide in the journal served to approach the research questions in two different ways. The data were triangulated through the two data sources collected from teachers. The reflective journals augmented and contributed to the interview questions. Then, after all data are transcribed and coded, the codes and themes emerging from the interviews were used to revisit the journals, and examine them for confirmatory information, and identify any areas of inconsistency which may have arisen between the two data sources.

External Validity

Merriam (2009) explained that external validity refers to the ability to transfer the research data and analysis to other settings. I included a thick description of the process used throughout the study that provided sufficient information for readers to determine how and to what degree the research findings may be useful in other settings (Schwandt, Lincoln & Guba, 2007). While case studies are not generalizable, as such, by providing details about the case, the findings may be applied to other similar situations, or provide a framework for investigating this problem in other school settings (Schwandt, Lincoln & Guba, 2007)

Data Analysis Results

Qualitative data analysis is an inductive process meaning that the process involves creating meaning out of small pieces of data and identifying patterns, categories, and themes (Lodico et al. (2010). Through this study I investigated teachers' perceptions of and experiences with reflective practices within an IB Primary Years Programme school. Teachers completed reflective journals and participated in one-on-one interviews. I used these data collection sources to analyze teacher perceptions and experiences. The research questions guiding the study asked about IB teachers' perceptions of and experiences with reflective practices using the IB's inquiry-based teaching model and what structures, supports, or resources did teachers need to implement reflective practices. The findings from the interviews were compared to that of the teachers' reflective journals. Themes emerged that were common to both the interviews and the reflective journals. The themes included lesson reflections, planning, time, and training.

Table 2

Theme Overview

Code word/ phrase	Number of occurrences in journals	Number of occurrences in interviews	Example
Time	4	17	Participant 8 mentioned the lack of time in UOI planning for reflection.
Unit of Inquiry	26	17	Participant 1 mentioned that the Unit of Inquiry planning is valuable to the next term, but not as a reflection on the current term.
Planning	3	20	Participant 10 mentioned how collaborative planning with her teaching team was helpful.
Big Difference	0	10	Participant 5 mentioned that there is big difference with having 2 IB coordinators this year.
Student learning	86	22	Participant 1 mentioned that her reflections are based on student learning.
Training	2	12	Participant 2 mentioned the lack of training for how to demonstrate reflective practices.
Priority	0	10	Participant 9 mentioned that having time should be a priority in order to become a reflective practitioner.
Lesson Reflection	96	3	Participant 8 mentioned that she reflects on student data to make informed decisions for future lessons.
Behavior	34	0	Participant 5 mentioned her frustrations with student behavior.

Themes

Theme 1: Lesson reflections. All 10 (100%) of the participants mentioned lesson reflections or used words phrases that fit this theme in their reflective journal, and one participant also mentioned this in the interview. In total participants mentioned lesson reflections 99 times. The reflections described lesson successes, frustrations, or reflections on future lessons. Throughout the reflective journals, teachers explained how the planning of the lesson and execution of the lessons did not align and were not carried out as planned. A few teachers taught a lesson one day and decided to reteach it the next day because they did not believe the students understood the lesson after formatively assessing them. They reported the next day's lesson met the lesson's objective after reteaching. Teachers then reflected on how the planning of the 2nd day's lesson was effective for the students. The initial lesson frustration turned into a successful lesson the 2nd day.

Lesson success. One teacher described how well her co-teacher and she demonstrated lesson reflection throughout the day and her expectations for her students to demonstrate the same attribute. The learner profile attributes were evidenced in reflective journals based on the IB framework. Teachers expressed their satisfaction with how students made connections with the learner profile attributes through their social studies content. One teacher mentioned how her students demonstrated learner profile traits such as open mindedness, thinker, and knowledgeable throughout the lesson on the American Revolution through their participation in class discussion and activities. Participant 7 mentioned her success with a lesson.

Something that I did last week to keep myself and my students engaged as we count down to spring break was to bring my love of the March Madness tournament and basketball to my students. Anyway, I showed the basketball clips and ignited a passion for following the tournament. I think this is significant because we were able to find a clear mathematical and science connection to the tournament as well as briefly discussing how the establishment of some of our mid-western schools came soon after and not during the time of westward expansion period that we are studying.

Lesson frustration. For some teachers, the insights included in their reflective journals reminded them of what they felt they needed to refine in their teaching. For instance, one teacher reported in her interview that the reflections in the journal caused them to think carefully about future inquiry lessons. These teachers reported lesson frustrations focused mainly on how student behavior affected the lessons as well as how planning and preparation were a factor in how well the lesson was executed. Teachers discovered that they might not have been meeting the needs of every student when they reflect on their students' responses and work samples. Participant 8 said,

The groups who took their time, added extra information, and attempted to present neat and quality information had much more knowledge about the Cuban Missile Crises. I struggle to find a way to ensure all students receive the information needed and give freedom with choice and construction of their own knowledge.

Noninquiry reflections. While the focus of the study was how teachers reflect over their inquiry lessons, not all the lesson reflections were based solely on inquiry-based lessons. Journal reflections that were inquiry-based contained the connections to the unit of inquiry (UOI) and teachers' reflections of their lessons, student learning, and next steps. The UOI is a 6-week in depth exploration of the central idea. The lines of inquiry and teachers' questions based on the central idea for that 6-week term guide the UOI. During the data collection time, several of the classes scheduled field trips. Some teachers chose to include reflections on the connections between the field trips and how well their students connected that with the learning in their classroom. Teachers explained how this also served as a reminder of how students were able to transfer classroom learning to the real world. While not related specifically to an inquiry-based lesson, the reflections were pertinent to the UOI.

Theme 2: Planning. One hundred percent (N=10), of participants described planning in their journals and interviews. Participants used words or phrases that fit this theme 174 times. This theme includes two subthemes: UOI planning and planning based on student learning. Planning refers to informal planning with colleagues or the scheduled collaborative planning with the IB coordinators. The UOI planning occurs every 6 weeks at the end of each term. The IB coordinators conduct this planning session for the next term UOI with each grade level. During the planning activity, teachers planned lessons and included what sources they used. Teachers felt using the common planner supported their lesson planning. This common planner is contained in their Google drive, located on a shared computer document for all staff.

Student learning. One of the collapsed initial codes was the mention of student responses and observations based on planning. Teachers expressed how students were engaged in the lessons and activities as well as how adjustments were made based on their reflections and how they made a difference in student learning. The reflective journals served as a way for teachers to write down their thoughts for lessons taught and future lessons. What is the subtheme? How does it relate to planning? Is this paragraph about UOI planning or planning based on student learning?

UOI planning. Because UOI planning is part of the fabric of an IB school, teachers reflected during UOI planning as mentioned in their interviews and journals. During the data collection phase of this study several teachers were participating in the once term (every six weeks) UOI planning. This planning time, usually a whole school day is spent with IB coordinators and other teachers from their grade level discussing the next term's UOI. Planning time is spent reviewing the next term's standards, ideas on how to connect the standards to each UOI as well as developing inquiry lessons for each standard. Teachers mentioned this UOI planning time in their interviews and journals as informative and reflected on how this planning time helps when developing inquiry lessons. One teacher mentioned how she liked the UOI connection that XYZ Elementary has with the K-2 schools Elaborate based on the data and provide excerpts from the journal/interview. She also mentioned in her interview that she liked the predisposed nature of reflection in her fourth graders because Expedientary learning teaches similar attributes as IB. Participant 1 gave an example of how each year her new set of fourth

graders were introduced to the learner profile traits through their experience with Expedientary learning in their K-3 school.

Informal planning. Most teachers mentioned informal planning in both interviews and journals. Teachers reflected on the support they felt with other teachers in their planning team. The planning they mentioned may have been scheduled during their weekly common planning time or just conversations as they walked through the halls or in the morning while standing in front of their classroom door waiting for students to arrive. These “in the moment” conversations were mentioned several times in the interviews as being very effective.

Reflections on future lessons. In the course of the interviews Participant 3 explained how reflection is a continuous process.

We reflect on the planner every 6 weeks. That’s a good place to start. I know that going into next year we are going to have to change that up a lot so that’s going to take some thinking back and thinking about what’s worked and what hasn’t.

Participant 7 went further into how reflection on instructional planning changes every year in her classroom based on her students.

I think quite a bit. I know last year I had a different group of children. So implementing a lot of IB thinking was more challenging because they were not able to have those higher-level inquiry skills. So, I had to really think about how I was connecting. Was it the students that were having a problem last year or was it the way I was connecting the information. And know with the group I have this

year, it's a lot different. It's a much easier connection to what we are doing as far as IB goes.

Participant 5 thinks about individual students when reflecting on future lessons when she states, "I usually think about the students individual needs when I consider like when I'm being reflective. That way my lessons can meet everyone so I feel like that's what I reflect on for the next lesson."

Theme 3: Lack of time. Eight out of ten participants mentioned time in their journals or interviews. Participants used words or phrases that fit this theme 21 times. Three out of the eight participants mentioned time in both the journal and interview and 5 participants mentioned time only in the interview Teachers mentioned how the demands of teaching in an IB school affected their ability to have time for the process of reflecting on their instructional practices. Some described finding time to reflect as a struggle and one of the main challenges for them. Several teachers expressed that the reflective journals were useful as a tool to reflect or project on their teaching but thought that they did not have enough time to do so in depth. As an example, one teacher mentioned in her interview that she had to rely on her memory a lot because she does not have enough time to write anything down.

Participants journaled that using reflective practices is important, and the benefits are evident when time allows for reflection. Participant 6 discussed how he was going to make a conscious effort to find at least 15 minutes each day to sit down and write down a reflection. He asserted that if he puts it on his schedule, he is more likely to reflect. A specific example of this theme was provided by Participant 9 who said, "I would say

time. I would like if that was a dedicated part of the week or biweekly meeting where you say these are the lessons I did.” Participant 5 concurred, “I feel like our curriculum doesn’t provide the time.”

Theme 4: Training. Eight out of 10 participants mentioned the theme training. Participants used words and phrases that fit this theme 14 times in both interviews and journals. The amount of IB training they have received within the school from the IB coordinators and by IB training outside of school compared to what is expected of them in the classroom were shared in the interviews. Several teachers reflected on the amount of time the IB coordinators trained teachers during their common planning times, the collaborative planning, as very helpful. Teachers benefited from having the IB coordinators’ assistance throughout the school year rather than the first half of the school year. Because the IB coordinators were present during their collaborative planning sessions, teachers reflected more, effectively, and indepth.

Aside from the common planning times, teachers mentioned a lack of consistency of IB training during the school year compared to outside training by the IB organization. One teacher mentioned that he felt as though he was overlooked for outside trainings because the school may be offering those trainings to newer teachers. Nine out of 10 teachers stated that they have not had any formal training on how the IB expects teachers to critically reflect or the importance of how reflection in an expectation of an IB school.

Participant 6 mentioned outside training IB training in his interview:

I think my training was pretty much all spread out so I think that I didn't learn it as quickly as I wanted to. And I think that, I kind of just learned it on my own basically. Even though I went to those workshops, it didn't make sense to me.

Participant 10 explained in her interview about training in being critically reflective. "I don't necessarily know that we have a lot of training in how to be critically reflective."

Discussion of the Findings

The research question guiding this study was, what are teachers' perceptions of reflective practices in an IB Primary Years Programme school? Teachers recorded their perceptions in handwritten or electronic journals. This provided teachers with a place to record their perceptions based on each teaching day within the 10-day data collection period. Teachers also participated in and shared information through a face-to-face interview. The 3 research questions that teacher's provided answers for were as follows:

1. What are the Primary Years Programme IB educators' perceptions of their reflective practices using the IB practitioner standards?
2. What are the IB teachers' experiences with reflective practices using the IB's inquiry-based teaching model?
3. What structures, supports, or resources do teachers need to implement reflective practices in instruction and model reflective practices for students?

The four themes I uncovered were lesson reflections, time, training, and planning. These themes were discovered after reading the data several times and recording categories and concepts with open and axial coding strategies.

The analysis gives a picture of teachers' perceptions related to reflective practices that support research question 1, including the amount of training each teacher received within the local school and outside training provided by the IB. Eight out of 10 teachers reported that they had not received training on critical reflection, however they do reflect informally in different ways throughout the school day with their colleagues before, during, and after lessons. Participant 6 discussed how this IB training has been spread out sporadically over his tenure at XYZ Elementary. He says that training has been inconsistent for him and that is unfortunate because the IB framework is overwhelming for teachers. He believes that he has learned about critical reflection on his own, but he mentioned that he remembers going to some outside workshops in the past, but it never made sense to him. In comparison, participant 1 shared that she uses her memory a lot and does not write down her reflections. She attempts to remember what her class did the day before and then she plans her lessons for the next day based on the type of questions the students ask. However, participant 3 discussed how reflection at XYZ was similar to reflection at other schools and it is essentially thinking about choices and suggests that all teachers reflect. Research question one was, What are the Primary Years Programme IB educators' perspectives of their reflective practices using the IB practitioner standards? Teacher believed that there has been a lack of consistency with outside IB training on reflective practices and most of the teachers reflect informally with each other or on their own.

In addition, teachers explained their perceptions of reflective practices and how they are interwoven throughout the IB framework and the inquiry-based teaching model

as referenced in research question 2. All 10 participants mentioned reflecting in the UOI meetings, however this reflection was a look back on the ending term and their reflection ideas were not revisited for future terms. They asserted that this was ineffective and did not transfer into their inquiry- focused teaching. While a focus of the UOI meetings was to also develop inquiry-based lessons for the current term of discussion, teachers reported they did not make any connections with reflection as intended by the IB framework. However, all 10 participants did mention their reflection process after teaching inquiry lessons as it relates to student engagement. Research question two was, What are the IB teachers' experiences with reflective practices using the IB's inquiry-based teaching model? The findings above indicate that teachers believe that reflective practices are not effectively examined for the ending term during the UOI meetings. They indicated that inquiry-based teaching model expectations focus on projecting to the next inquiry lesson as opposed to exploring reflective practices on past lessons.

Teachers' also described resources and different supports they need to implement reflective practices for students as mentioned in research question 3. Nine out of 10 teachers wanted dedicated time for purposeful critical reflection. Participant 4 mentioned the difficulty in remembering all that happened at the end of the day. She suggested that weekly collaboratively meetings might be a good time for everyone to reflect instead of each day. This dedicated time could inspire teachers to purposely reflect. She thinks that if teachers know ahead of time what is expected during the collaborative planning meetings, planning would be more authentic and reflecting on instructional experiences would not just happen independently. Teachers indicated they would like specific training

on critical reflection as intended by the IB. In fact, participant 5 stated that she believes that everyone interprets critical reflection in different ways, so she believes that providing a separate professional development would be helpful for her. All participants would like the training to continue throughout their tenure at XYZ Elementary and realize that it can come in different forms. For example, participant 1 mentioned that she would like to read literature on reflection as a resource and support and participant 6 would like the IB coordinators to consider modeling reflective practice either during collaborative planning or during each term's UOI meetings. Participant 3 added that in order for teachers to be more reflective that she would like additional resources that encourage students to be critical thinkers and reflectors. She feels that this is an area that XYZ Elementary is lacking and asserts that both students and teachers should be reflecting. Research question 3 was, What structures, supports, or resources do teachers need to implement reflective practices in instruction and model reflective practices for students? Teachers would like specific training on critical reflection and they would like the IB coordinators to use the already scheduled collaborative planning to facilitate this.

The findings indicated the several different perceptions of reflective practices at XYZ Elementary. And while everyone's opinions and experiences have been different, 80% of the teachers reported they have not received any training in critical reflection as the framework for an IB Primary Years Programme school suggests. According to Šaric & Šteh, (2017) it is unrealistic to think that teachers will reflect on their own without being adequately trained. They believe that this may in part be due to how teachers interpret the definition of reflection in general (Šaric & Šteh, 2017). Most participants felt

that they needed training and suggested the training take place during their dedicated UOI training or collaborative planning with the IB coordinators.

Conclusion

Teachers at XYZ Elementary have varying perspectives on instructional reflection. While there has not been a standard set of training practices for teachers at XYZ Elementary or during their tenure, teachers are interested in being trained on how to be critically reflective. In addition, teachers have indicated already dedicated planning times as options for adding this to times such as collaborative or UOI planning that are both facilitated by the IB coordinators. The findings are also aligned with the conceptual framework of reflective practices and Dewey's (1993) theory of critical reflection that emphasizes the process of using reflective practices. Dewey's conceptual framework supports the findings in this study. Teachers desired training to understand how to critically reflect within the IB model on their lessons and planning.

In section 3, I will explain the project, which is a white paper that includes recommendations for professional development for developing a platform for critical reflection at XYZ Elementary. A White Paper is a document that details the nature of issues and describes strategies to companies and provides recommendations (Willerton, 2014). Lumby and Muijs (2014) explained the White Paper as a relevant form of media that presents recommendations and conveys information to various audiences. This is a logical project for this study because with a White Paper the district office and the administration at XYZ Elementary will see how the recommendations are aligned with the IB Primary Years Programme framework of promoting reflective practices among the

teachers. In addition, I will recommend providing resources such as blogs that will assist with reflection including helping teachers find the time to reflect on instructional experiences more purposefully during the school day. Further recommendations include incorporating training through reflection guidance and instruction during already planned planning times such as collaborative planning, grade-level meetings, and UOI meetings by IB coordinators. In section 3, I will provide more details about the project.

Summary

The purpose of this qualitative case study is to examine IB teachers' perspectives of reflective practices within XYZ Elementary. This section presented the qualitative approach that will be applied to the answering of the research questions. The procedures for capturing participants' experiences with and perceptions of reflection within the inquiry model required by IB are presented, along with a description of how data will be analyzed. This study yields information exploring the perspectives of IB teachers at XYZ Elementary, and will support the development of a project, based on the findings of the study.

Section 3: The Project

Introduction

The project that I chose for this study was a white paper report (Appendix A). This section provides the rationale for this project and a project description. In addition, I provide a project evaluation plan and project implications. The goal of this project was to evaluate the effectiveness of the recommendations in the white paper.

Rationale

According to Gordon and Graham (2003), a white paper is a report that is essentially written to explain an issue where the writer is advocating a certain viewpoint, in this case that of the teachers at XYZ Elementary, and providing recommendations to address concerns, in this case, those of the teachers. Researchers have advocated for the white paper being a source to promote change by providing recommendations for change (Gorgon & Graham, 2013; Lumby & Muijs, 2014). The use of a white paper will be helpful in providing recommendations to the administration and IB coordinators to affect change for reflection and a platform for teachers to become reflective practitioners. The recommendations are based on the findings from the reflective journals and interviews conducted with the participants. For this reason, I have chosen to do a white paper report.

My analysis revealed the perceptions of teachers on reflective practices at XYZ Elementary. As an IB Primary Years Programme school, XYZ Elementary has committed to developing reflective practitioners through their IB framework and curriculum. Data analysis revealed that the teachers do not feel there is a platform for purposeful critical reflection. Eighty percent of the teachers reported they had not

received any formal training or support on how to be a reflective practitioner. However, 100% of teachers stated that they reflect on their instructional experiences informally as a natural part of teaching. They stated that they use times during informal conversations in the hallway or in their classrooms as times where they discuss and reflect on their classroom and teaching with other teachers. This is referred to as informal planning in the findings. Each teacher stated they needed more time to purposefully reflect. Time was mentioned 19 times throughout the interviews and was a theme in the data analysis because of the heavy emphasis placed on the lack of time to reflect. In addition, teachers mentioned resources they felt would help them become more informed about how to become a reflective practitioner. Suggestions included having literature available to read such as articles or studies on the benefits of critical reflection. Teachers also suggested using the established planning times such as collaborative, grade-level, and UOI planning to facilitate critical reflection training by the IB coordinators.

The white paper report (Appendix A) was chosen because I can use this to explain the position of the teachers and make recommendations based on their perceptions. The white paper report is research based, and provides a document for the administrators, teachers, and the county to read that addresses the commitment made as an IB Primary Years Programme school. The white paper contains two recommendations. The primary recommendation is for XYZ Elementary teachers to begin an embedded professional development aspect of their collaborative planning. The second recommendation involves providing structures and supports to assist teachers in practicing being reflective

practitioners. These recommendations will be presented to the stakeholders and will help provide the change needed to address the teachers' concerns.

Review of the Literature

I completed this review of literature to develop and support the recommendations, provided in the form of a white paper, for XYZ Elementary and the school district. Based on the data, the recommendations from this study include a need for professional development in reflective practices as well as development of a platform for purposeful reflection at XYZ Elementary. This literature review is focused on three areas: a look into teacher beliefs and perspectives about professional development, a modeling-based professional development for reflective practices, and the need for having a platform for reflection throughout the school year.

I conducted the research for this literature review using EBSCO Host, gathering articles from Academic Search Complete, ERIC, and Primary Search as well as Taylor and Francis through the Walden Library. The search terms I used were: *purposeful reflection, reflection resources, reflective guidance, reflective teaching, inquiry-based reflection, effective professional development, professional learning goals, teacher desires, teacher beliefs, teacher needs, teacher career stages, white paper* and *effective teaching*. The following information is based on the results from this search.

Teachers' Beliefs and Perspectives

Teachers in varying stages of their career are interested in learning more about what directly impacts them professionally based on their experiences and longevity in the teaching profession. Teachers' stages of career development can also influence their

attitudes and beliefs about teaching (Bressman, Winter, & Efron, 2018). Teacher career stages are also linked to how well teachers reflect on their instructional practices and their understanding of being a reflective practitioner (McFadden, Ellis, Anwar, & Roehrig, (2014). Their professional learning goals, attitudes, and beliefs may also fluctuate during their careers based on their experience and career stages. Teachers' attitudes about professional development may be linked to their desire to progress in a lateral or vertical fashion (Avidov-Ungar, 2016). Avidov-Ungar's study (2016) identified the unique perspective and attitudes of teachers' desire to receive professional development by emphasizing how teachers' motivation differs at various points in their career.

According to a study by Kirkpatrick and Johnson (2014), a teacher's career stage and experience can have a correlation to work engagement. Work engagement is explained as the feeling teachers have about their work and the choices they make in the work place. Schools that lift and promote teachers' engagement will increase their productivity (Kirkpatrick & Johnson, 2017). Because work engagement is directly related to teachers' attitudes, Louws, Meirink, Veen & Driel (2017) agreed that a teacher's career stage and attitude can determine their professional goals and that teachers' professional goals may shift based on the challenges they face in the classroom and as a profession as they advance through their career (Louws, et al. 2017; Kramer 2018).

Louws et al. (2017) continued by explaining that beginning teachers will face challenges that may shape their professional needs and their professional practices in a different way than teachers with more experience. Because of this, different stages of teacher career development lend themselves to various teacher beliefs and attitudes. For

example, Louws et al. (2017) further explained specific phases of teacher development that correspond to teacher beliefs and attitudes.

Louws et al. (2017) termed the beginning stage the induction phase, or novice phase, in which teachers are developing basic teacher skills. In addition, beginning teachers realize the importance of professional development but are selective in only wanting professional help with what suits their individual needs (Masuda, Ebersole, & Barrett, 2012). You and Conley (2015) described this phase as one of survival for novice teachers. Similarly, Avidov-Ungar's (2016) study discussed how novice teachers typically have lateral professional goals. These teachers' beliefs are grounded in their individual needs and are satisfied by looking deeper and exploring their teaching field (Avidov-Ungar, 2016).

Next is the phase where teachers become stabilized with the teaching profession and teachers focus on the pedagogy mastery. This phase is also a period in which teachers begin to feel accomplishment in their career and seek out professional learning opportunities (Louwes et al., 2017). It is also described as the mid-career phase for teachers where they feel secure in their instructional practices and have great concern for continuing their teaching tasks and meeting students' needs (You & Conley, 2015). Midcareer teachers have already developed approaches to engagement (Kirkpatrick & Johnson, 2014). Kirkpatrick and Johnson (2014) go further to explain that teachers' approaches to engagement at this stage are pulled from their individual experiences over the years.

In addition, teachers can go through a frustration or crises phase following their midcareer phase where there can be a rising lack of engagement (Kirkpatrick & Johnson, 2014; Louws et al., 2017; Johnson et al., 2014). This takes place when teachers are not able to accomplish what they have set out to do with students or affect change in the way they believe they should (Louws et al., 2017). This discontent and lack of engagement is also characterized by a lack of support from the leadership in the school (Bressman et al., 2018; Kirkpatrick & Johnson, 2014; Louws et al., 2017).

The final phase is considered the veteran teacher. This teacher is full of confidence, and the school or others do not influence their engagement at this stage in their career (Kirkpatrick & Johnson, 2014). Veteran teachers direct their attention and efforts toward their students and/or leadership. Avidov-Ungar (2016) mentioned teachers in this career stage typically have a vertical pattern of professional development aspirations. This vertical pattern is characterized by teachers who want to develop more professionally and at times become increasingly interested in managerial or leadership roles (Avidov-Ungar, 2016). However, Bressmer et al. (2018) explained that teachers could not be expected to progress through these career stages at the same rate or even in a linear fashion. As a result, teachers' experiences contribute to what influences them or intrigues their level of engagement, attitudes, and/or beliefs. This implies that while continuous professional development is needed, it may be that school principals and professional development facilitators need to provide more of a personalized approach to support teachers' learning needs (Stevenson, Hedberg, O'Sullivan & Howe, 2016).

Professional Development for Reflective Practices

Teacher self-efficacy, the belief or confidence in the teacher's own teaching capacity, has a direct connection to learning and effective professional development (Glackin, 2018; McKeown, Abrams, Slattum & Kirk, 2016; Naizer, Sinclair, Szabo, 2017). Naizer et al. (2017) explained that professional development is most effective when teachers learn by doing. This method allows teachers to gain the necessary experiences to fully understand any teaching approach (Naizer et al., 2017). Biccard (2018) added that modeling desired behavior in a professional development environment can be transforming for teachers. Zangori, Friedrichsen, Wulff and Womack (2017) asserted that modeling reflection provides a necessary visible example for teachers that supports their learning. This vision becomes an effective reflective tool (Vaughn, Parsons, Keyes, Puzio, & Allen, 2017). When teachers practice reflection, they are taking an introspective look within themselves, and this shows that reflection is the catalyst for change (Biccard, 2018; Mphahlele & Rampa, 2015; Russell, 2018).

Professional development that focuses on how to reflect on instructional experiences is the beginning of developing reflective practitioners (Lund, 2016). Tianen, Korkeamaki, R. and Dreher's (2018) study suggested that preservice teachers learned how to reflect best by first being observed and then receiving help to gain insight on their reflective process. Jones and Jones (2013) suggested that teachers need guidance on how to be reflective and their learning should be scaffolded. Mphahlele and Rampa (2015) discussed reflective practice professional development as a time for teachers to experience self-awareness and create opportunities for themselves to develop and grow

professionally. Being reflective is a continuous learning process and affords them the opportunity to attend to what is happening and not what the administration or current pedagogy expects of them (Ganly, 2017).

Professional development focused on how to be a reflective practitioner affords teachers the ability to look closely at themselves through a different lens (Ganly, 2017). The lens can be viewed as very personal and specific, but also one that lends itself to encouraging changes in actions and thoughts that directly affect student learning and professional growth. It is during times of reflection where teachers make this self-discovery because they are able to take a pause.

Finefter-Rosenbluh (2016) goes further to confirm the importance of engaging in reflective practices through professional development for teachers by expressing that reflective practices should not be seen as an ending, but something that leads to a transformation of their experiences. And while it is beneficial to reflect as an individual, reflecting as a community is also valuable. Reflecting as a community of teachers in a professional development scenario helps other teachers face assumptions they may not have known they had that can lead to improved teaching practices and becoming more aware of how to overcome teaching dilemmas (Finefter-Rosenbluh, 2016). Reflecting in this way should be a pleasant experience and be a protected space for teachers (Finefter-Rosenbluh, 2016). If teachers feel unsure about how to reflect, then reflecting as a community can become a harmful and unpleasant experience (Hall, 2018). Finefter-Rosenbluh (2016) explained that this might occur if teachers feel threatened by sharing their reflections and experiences with others. Professional development facilitators should

take steps to ensure that ethical complexities are stable and that their efforts to develop reflective practitioners are established in part by their awareness of the how the outcome can be positive for all teachers.

Framework and Structures for Reflection

Many educators have investigated how schools should facilitate and monitor reflection during the school year (Murphy & Ermeling, 2016). Embedded professional development within the school setting becomes relevant to teachers and supports the efforts of developing reflective practitioners (Spencer, Harrop, Thomas, & Cain, 2018). Embedded professional development is important for beginning stage teachers to move toward developing into a reflective practitioner because they need skilled reflective practitioners to model and provide them the space to practice reflecting (McFadden et al. 2014). McFadden et al. (2014) discussed the stages of reflection in beginning teachers as one where they are moving beyond being descriptive and beginning to evaluate and interpret their reflections. Farrell (2014) explained descriptive reflection where teachers collect data on classroom actions describing what has happened. The beginning teachers are also able to consider what would come next based on their descriptive reflections. Developed reflective practitioners are described as being more evaluative and interpretive in their instruction reflection and they consider a plan of action based on their past actions and beliefs (McFadden et al., 2014). Farrell (2014) refers to this ability to continuously review your own practices as wholeheartedness. He also explained that developed teachers tend to compare their teaching practices with other teachers as conceptual reflection. This idea of different career stage teachers reflecting based on

experience teaching demonstrates that not all teachers should be expected to reflect in the same way and lends itself to a differentiated approach for facilitators. Farrell (2014) suggested that a teacher's reflective disposition be considered when examining and modeling reflective practices. One's career stage can determine their awareness and how they might be most comfortable reflecting and should guide their starting point through this process.

Ganly (2017) presented a framework for reflective practice that provides a step-by-step approach to reflection. This (PARA) framework consists of four steps that highlight an active process requiring openness, thinking and doing (Ganly, 2107). PARA stands for pausing, attending, revising, and adopting/adapting (Ganly, 2017). Ganly (2017) began by describing the first step, pausing as a time where teachers stop and think before deciding on anything. This time is meant to encourage awareness and gain perspective (Ganly, 2017). Next, Ganly distinguished the second step, attending as one where teachers must ask themselves questions about what is and is not working. While asking questions, teachers must continuously consider professional practices as it relates to what has gained their attention (Meijer, Geijssel, Kuijpers, Boei & Vrieling, 2016). Schoemaker and Krupp (2015) clarified that strategic leaders are experts at asking questions and their questions are based on how much or how little one knows about the subject. The third step, revision, is where teachers reflect on the answers to those questions they asked themselves in the previous step (Ganly, 2017). And finally step four combines adapting and adopting (Ganly, 2017). This is where teachers consider the answers to their questions and begin to gain new perspectives. During this step teachers

may also begin to collaborate with others as they consider new ways and others' ideas (Ganly, 2017). This process brings about the authenticity in teaching and demonstrates the awareness of how self-reflecting can affect change (Ramezanzadeh, Zareian, Adel, & Ramezanzadeh, (2017). Leroux and Théorêt (2014) suggested that this idea of problem solving through reflection enhances teachers' efficacy. Therefore, when teachers focus on solutions rather than problems they are developing an awareness of reflection (Leroux & Théorêt, 2014; Malatji & Wadesango, 2014).

In addition, blogs are structures that schools can use to support instructional reflection (Hall, 2018). Blogging by teachers supports reflection and professional learning (Ciampa & Gallagher, 2015). Hall (2018) mentioned that this online format is typically thought of as an internal dialogue where someone writes their thoughts without expecting feedback. However, there is much more to blogging. Blogging is a virtual space where teachers can write their perspectives and sustain conversations that facilitate reflection (Hall, 2018). Teachers must be taught to use blogging as more than a space to give accounts and describe their day, but a place to promote reflective interactions (Hall, 2018). Because blogging can be thought of as somewhat personal, schools can have blogging teams or communities of teachers that use this format to share and discuss their reflections (Hall, 2018). Hall (2018) specified that for teachers to use blogs for reflection, they must be taught how to participate and interact in a way to promote a practice of reflecting on instructional experiences. With professional learning, teachers can also receive feedback from their blogs that can begin a dialogue between teachers that supports reflective conversations and thoughts. In addition, Ciampa and Gallagher (2015)

asserted that in order for teachers to comfortable blogging they also have to be competent with technology. Some teachers might enjoy blogging rather than a different multi-step process that may be involved with other forms of reflection. Ciampa and Gallagher (2015) discussed the simple steps with blogging where a teacher needs time to plan, act, gather and share their thoughts. This may not be as time consuming as other reflection structures. This embedded reflective structure within a school adds to a platform that promotes reflection among teachers.

While blogging is an online format for reflection, Farrell and Jacobs (2016) discussed teacher reflection groups as another way to promote reflective practices. By using teacher reflection groups of up to eight teachers, teachers can reflect within one school or across a span of schools (Farrell & Jacobs, 2016). This would be a group of teachers that meet in an agreed upon location for an interactive discussion. Farrell and Jacobs (2016) mentioned that this process is most effective if the teachers value this approach and are comfortable sharing their thoughts and ideas. For the benefit of the teachers, groups can be heterogeneous where members of the group teach different grade levels and have different specialties. Reflection groups should be inclusive in nature and a place where teachers can share their thoughts and be committed to having an external dialogue. Farrell and Jacobs (2016) also suggested teachers use this time to write in a journal and be willing to observe other teachers in their reflection group teaching to use in their reflection discussions. A benefit of this interactive process is that this type of reflection easily transfers to students if students are shown how to effectively communicate in a thoughtful way.

These reflective practice frameworks and structures exemplify how reflective practices can be implemented and practiced within the school context. Reflection can be done internally and externally with one teacher or a community of teachers (Hall, 2018). Professional learning experiences can be practiced internally when teachers reflect alone but can also be beneficial when done externally with a community of teachers. External reflection happens collaboratively such as with blogging or in reflection groups with other colleagues. According to Murphy and Ermeling's (2016) study of feedback on reflection, collaborative groups of teaching teams were enthusiastic and highly reflective. In addition, their study showed that the collaboration of teachers reflective resulted in pedagogical reflection. This is where teachers want to better understand the theories behind the instructional decisions they make for their students (Murphy & Ermeling, 2016). With all of these examples, teachers need to be instructed on how to reflect and be invested in the process.

White Paper Effectiveness

The white paper genre is presented in a document that advocates for change (Willerton, 2012). This genre aids in finding solutions to problems by providing recommendations to follow to address the problem. The white paper is used to promote a dialogue or discussion among stakeholders in the field of education, technology and business (Lumby & Muijs, 2014). The white paper (Appendix A) includes two recommendations to build a platform for reflection at XYZ Elementary.

Project Description

This project was created to address the problem based on teacher perceptions of reflective practice at XYZ Elementary an IB Primary Years Programme school. This project consists of a white paper to present to the principal of XYZ Elementary.

The white paper begins with an introduction of XYZ Elementary as an IB school. I explain the program standards and expectations of an IB school including the role that reflection and collaboration in the development of teachers. The local problem at XYZ Elementary is explained as not having the platform for teachers to become critically reflective in this setting.

Data analysis results were also included in the white paper to explain the four main themes that were discussed based on the one-on-one interviews and two-week reflection journals the teachers completed in the study. The themes included lesson reflections, time, planning, and training. Based on this, there were two research-based recommendations with examples of how to build the platform for teachers to begin using reflective practices. The first recommendation included a framework for instructional reflection providing embedded professional learning on teaching teachers how to reflect. The white paper will provide the recommendation for professional learning to become a part of the UOI natural setting for the school. In the paper, I recommended that reflective practices be modeled for teachers using the framework while being aware that reflection may look different at different career stages. The second recommendation included offering different structures to support reflective practices such as the use of reflection blogs with colleagues and reflection groups among teachers at XYZ Elementary as well

as the other IB schools in the district. Because this is a small district, the other IB schools include one middle school and one high school. These recommendations were made based on the perceptions of reflective practices at XYZ Elementary.

Implementation

Based on the recommendations to build a platform for reflective practices, there are resources and barriers that need to be considered for a successful implementation. The professional learning aspect where reflective practices will be modeled and practiced will take place during the already established UOI planning time every 6 weeks. However, the other aspects of the recommendations such as reflection groups and reflection through virtual blogs need consideration and planning.

Resources. For the teachers to be able to follow the two recommendations, they will need access to other IB teachers in the district. The one middle school and high school are both IB schools as well and they also follow the standards and procedures set forth by IB. Therefore, they are also required to be reflective practitioners. For XYZ Elementary teachers to begin collaborative reflection groups, they will need access to the other IB teachers in the district. Teachers will need an agreed upon location to meet after school.

In addition, for teachers to participate in reflective blogging, there needs to be a web-based platform that offers the opportunity for blogs that allow for reflections and responses. This blogging experiencing will be an open form where teachers can post and respond freely within a website format. It is recommended that the blogging format be

developed and added to the teachers' Google Drive by the media specialist at XYZ Elementary. The instructional coaches will monitor the blogging platform.

Barriers. Time to implement the project is a barrier that is present. Reflection groups will be scheduled during the school-system wide professional learning days, however there will be other times throughout the year that the collaborative reflection groups will meet outside of the teacher's contracted hours if the XYZ Elementary teachers decide to partner with teachers from the middle and high school. But, if the reflection groups are made up of teachers only from XYZ Elementary, the reflection groups can meet during the already scheduled UOI planning meeting. If teachers do decide to meet with teachers from the middle or high school, space becomes a barrier. There must be a space for the teachers to meet that is not being used for other meetings and is at a time that is agreeable by everyone. The elementary, middle, and high school all dismiss at different times in the afternoon. So, the aspect of time and space is a barrier.

The blogging platform is also a potential barrier. While the media specialist will develop and put the live blogging site on the shared teacher Google drive, there will likely be troubleshooting and other technical difficulties and concerns that need to be addressed. There will need to be a person such as the instructional technologist for XYZ Elementary who needs to be available when needed for the blogging experience to be successful. Teachers may also need to receive professional development on how to use the blog site is needed.

Teachers also must buy-in to these different ways of reflecting. This may also be a barrier of teachers are not open to reflecting with others and having their colleagues

respond to their reflections. This may be uncomfortable, and teachers may only want to engage in their reflective practices individually.

Barriers are also possible in convincing the school administration and district office to accept the recommendations from the white paper.

Roles and Responsibilities of Teachers, Facilitators, and Administrators

Facilitators. The facilitators will be the two IB coordinators at XYZ Elementary. Their role will include modeling reflective practices for the teachers at the UOI meeting or other professional learning opportunities that the principal has planned. These meetings will be led by IB coordinators to help the teachers become reflective practitioners. The facilitators can use one of the such as blogs described in the project study. The IB coordinators will also be responsible for monitoring the reflective blogging by teachers. Their role as IB coordinators will be important as they can also respond to teachers' reflections and provide feedback if needed.

Teachers. The teachers' role is to become active listeners and be engaged when they are learning how to become reflective practitioners. The teachers must also be willing to gather in reflection groups and/or blog their reflections on the website.

Project Evaluation Plan

To evaluate the effectiveness of the recommendations in the white paper, teachers' perceptions of reflective practices and their increase use of reflective practices need to be evident. Teachers will answer an anonymous open-ended questionnaire (Appendix F) that is aligned with the goals of this project that will evaluate their perceptions and the new platform that will be established at XYZ Elementary. Using a

questionnaire after each term establishes the effectiveness of the platform established for the teachers. The questionnaire was developed as a way to help indicate if the goals of the platform were met (Root, n.d.). According to Root (n.d.), goals-based evaluation established goals and provides resources based on priorities of the expected outcome. The IB coordinators will develop and send teachers the electronic open-ended questionnaire through Google Forms during the last few minutes of each UOI meeting every six weeks. This will ensure there is a continuous record of teachers' perceptions throughout the school year. The open-ended questionnaire will ask questions about the platform that has been established as well as what reflective activities they have participated in.

I will begin to work with the IB coordinators to continue maintain the reflection platform that will be established. I will also continue to provide ideas and resources for varied reflection opportunities for teachers to participate individually as well as collaboratively with other teachers within XYZ Elementary and other IB schools in the district. The data, data analysis, and the questionnaire, which discusses the effectiveness of the reflection platform, will be shared with the administration. The goal-based evaluation plan benefits all stakeholders including the teachers, students, administration, and the district office by providing a platform for reflective practices.

Project Implications

Social Change

This professional learning addresses improving reflective practices in teachers. As teachers become more proficient reflective practitioners, they will become more aware of their teaching and better differentiate instruction for their students. This can also make a positive impact on subgroups and begin to close the achievement gap. Teachers who use reflective practices can take a critical look at the decisions they make and how that affects student achievement in the way they plan and deliver instruction to the students.

Teachers are also able to collaborate through the reflective activities that are mentioned. Teachers will be able to draw support from one another and positive build working relationships each other. When teachers collaborate with each other in this way it contributes to school improvement efforts because of the positive nature of the teachers' interactions. This process of using the IB coordinators to help facilitate the recommendations also helps teachers become more insightful about the direct of planning student instruction. Students are also able to benefit from the reflective practices of their teachers that help students' reflections to develop.

This change addressed the problem of their being a lack of a platform for reflection and helps the district develop a system of developing reflective practitioners for teachers to become more aware of their reflections. The platform provides purposeful time and space for critical reflection while being able to meet the expectations of the IB model.

Section 4: Reflections and Conclusions

Introduction

Through the study, I examined teachers' perceptions of reflective practices in an IB Primary Years Programme school. This qualitative case study focused on one elementary school that is bound by the program standards and practices of the IB. The IB's core pedagogical values include the support of teachers being reflective practitioners (Ryan, Heineke & Steindam, 2014). The problem was that this elementary school has not provided a platform for teachers to become reflective practitioners as indicated by IB. This section includes the project strengths and limitations and recommendations for alternative approaches. There is also a discussion on scholarship, project development, and reflections on implications for future research.

Project Strengths and Limitations

Strengths

The recommended platform for instructional reflection in the project is collaborative and ongoing throughout the school year. The strength of the white paper is that it allows a researcher to reach a wider audience and use both the findings and the current literature to advocate for change across the school and potentially the district. More specifically, the strengths include several different ways that teachers can reflect individually as well as with colleagues in the same building or with other teachers across the district. Reflective practices can be implemented in the UOI meeting that is already established, as the meetings would be extended to include a platform for reflection among teachers. This collaborative approach encourages teacher support and adjusts the

professional culture in schools (Spillane & Shirrell, 2018). In addition, the professional learning suggested provides specific recommendations about how to deliver and model reflective practice instruction to teachers. Also included are recommendations on how to differentiate the level of support for teachers based on their career stage.

The white paper includes recommendations to encourage reflective practices that will benefit the school as well as the district. The white paper is a document the school system can use to provide a detailed outline of the study, data analysis, and the recommendations.

Limitations

This study includes several strengths, but there are also limitations. The limitations of the white paper genre include if school leadership does not implement the recommendations and no change occurs. In addition, the small sample size of 10 teachers does not capture the perception of all the teachers at the local school. This limitation gives a narrow view of the school's teachers' perceptions. In addition, during the two weeks where the teachers wrote in their reflective journal, there were a couple of days where teachers were on a field trip or testing. This could have affected the amount of reflection from each teacher. The white paper recommendations are based on the findings from the study. With a small sample size, some needed recommendations may have been missed.

Recommendations for Alternative Approaches

I chose to complete a white paper to provide recommendations to XYZ Elementary as well as the school district. However, there are alternate approaches that I

could have used. For example, I could have introduced professional development.

Because one of the themes in my data analysis was lack of time, I did not feel this would be the best option. The professional development would have been completed over three days during preplanning. This approach would take time away from teachers preparing their classrooms for the start of the year and other administrative meetings that are required at the start of the year. Because of the concern for time, I decided to have professional learning on reflection included in the UOI meetings presented throughout the school year by the IB coordinators that already take place every 6 weeks. This will be more effective for the teachers because they can continually address reflective practices rather than only during a professional development class at the beginning of the year.

Developing a professional development series would add to the concern of lack of time because it would take away from the time that is already set aside for collaborative planning and UOI meetings already occurring throughout the school year. And with the structures that I have recommended, teachers are able to practice reflective practices and get timely feedback and collaborate with other teachers in a way that is easiest for them.

Another approach that I could have considered is to have IB coordinators or administrators observe classroom teachers to observe their reflective teaching. I did not choose this approach because a classroom observation would not demonstrate an authentic product of reflective thinking. This is because at times, teacher reflection happens during teaching, and this would be difficult to observe.

Scholarship, Project Development and Evaluation, and Leadership and Change

This project helped me grow as a scholar because it helped me to understand the importance of self-reflection for teachers in helping students grow academically. I now have a firmer appreciation of teacher collaboration and the impact it has on the teachers' development. This project also has helped me to better understand that reflective practices look different for every teacher and can depend on how long they have been teaching as well as the approach teachers prefer when using reflective practices. As a researcher, I learned that the answers are not so simple. I also did not understand the white paper genre when I began this research. I know now that using a white paper is a way to share concerns and provide recommendations to advocate for educational change.

Designing this project gave me pause because I wanted to design something that would allow me to advocate for change and be effective for teachers based on their perspectives. Because I knew that if I designed a professional development session teachers may resent their time taken up during the very coveted period of preplanning, I chose to have the professional learning occur during the school year when teachers could practice the framework being delivered to them. I felt that the timing of the professional learning that I have recommended is very authentic in respecting the preferred timing and the expectations of teachers. Before designing this project, I always thought that the best way to help teachers learn something was to have a speaker talk and present ideas. I now know that just as students need the activities to be interactive and authentic, so do teachers.

As a researcher, I gleaned more insight into how teachers reflect and the role reflection plays in how they prepare for their students. Throughout the data collection process, I became more aware that teachers are reflective just by the nature of teaching. Teachers are constantly thinking about how best to reach their students. It became evident that teachers not only need to collaborate, they enjoy collaborating with other teachers on their lesson ideas and thoughts on the successes and mishaps during the teaching process. Because of this, I wanted to make sure that the project had a collaborative aspect to it. My recommendation for teachers to collaborate through blogging or face-to-face reflection groups was a result of knowing the importance of collaboration. The interviews and the reflective journals confirmed my thoughts that teachers already reflect in some ways and that they wanted more of a connection to other teachers using reflective practices.

This study also confirmed my love for researching. During my course work, I did not know what I wanted to do for my project. I enjoyed researching on assignments and collaborating with my peers on projects. I always wanted to continue where the assignments left off, I always wanted to learn more. I chose my project based on what I was passionate about and that made this experience more meaningful and fun. I gathered articles for this project and I gathered articles for pleasure reading on the topic. I learned that I enjoyed this process.

As a practitioner, I will continue to see reflection as a way to grow professionally. I will assist the IB coordinators in their delivery of the reflection framework and continue to be an advocate for the various ways we can reflect. I will participate in the blogs and

reflection groups as an example of my dedication and insight into how reflection improves our teaching decisions. As a practitioner I learned that is important to be purposeful in reflections and that there are many factors that can affect reflections. I learned that having the support of administrators and IB coordinators can increase the types of reflections available. I realize now that teachers must make time to reflect to make change happen and that reflecting alone as well as with a group can be effective.

I began this doctoral process because I wanted to go further in my career and I promised myself that I would find my passion and go after it. However, this has become more than simply what I want for myself; my passion revolves around how to help teachers improve students' learning. I now know that I can help bring about this change. Through my research and recommendations, I have built a platform that the school can continually build upon. I also now know that I can be a part of the leadership in the continual efforts to meet IB's expectations and standards.

Reflection on Importance of the Work

As educators move through their professional lives, they are always comparing one year of teaching to the others. This study helped me clarify the importance of reflective practices and the role reflection plays in almost every part of teachers' lives. I have always taught my students to think before they speak or act. This same principle applies to teaching and is very valuable.

Reflective practices are an important part of teaching. Reflection not only benefits teachers but the results of reflecting on instruction benefit the students as well. Using reflective practices can develop changes and awareness of the types of support that

students need and can change the way teachers deliver instruction to meet the needs of all students.

Implications, Applications, and Directions for Future Research

The project has implications for social change because both teachers and the IB see using reflective practices as beneficial. For individual teachers, using reflective practices will improve how they deliver instruction to students. As the recommendations suggest, teachers will have various ways to reflect and have opportunities to collaborate with other teachers. Teachers will continuously practice reflecting in the UOI meetings. Teachers grow professionally through this experience by adding to their understanding of the benefits of purposeful reflection, and this will influence the students they teach having because lessons planned based on their reflections from the previous day provide a reflective model for their students to follow. By using reflective practices, teachers begin to ask deliberate questions, answer them, and then implement the changes or adjustments needed. The strategies help teachers become more effective in their planning, instruction, and their use of students' data. Teachers critically reflecting on student data will improve instruction because the decisions for future lessons will be borne from the data.

As a school, having a platform for instructional reflection is very important for the teachers. This provides teachers the opportunity to choose how reflection works best for them. Once the IB coordinators teach them the framework for reflecting, they can decide whether they want to reflect alone in a way that works for them or collaboratively through the platform of blogging or reflection groups. This addresses the notion that

teachers do not have time to reflect. This platform provides various options for teachers to choose from to best meet their time constraints. Because collaboration and reflective practices are two of the program standards for IB, the school will meet the expectations of both. The IB coordinators will have the opportunity to teach teachers how to use reflective practices and be a part of the collaborative part of reflection with teachers across the school. This addresses the problem of teachers not having access to training or their lack of understanding of how to critically reflect. This contribution helps teachers and administrators better understand how to address the need to develop reflective practitioners at an IB school, which has not been evident in the literature.

Future researchers may want to expand the study to using a large survey to include all the teachers in the school or district in order to understand their perceptions of reflective practice. Researchers could distribute this large survey to gather teacher perceptions. Another recommendation is to study the effects of student achievement before using reflective practices and after using reflective practices. This type of study would show the effect of teachers' use of reflective practices.

Conclusion

Teachers reflect on their instructional experiences and decisions throughout the day and these reflections help teachers to solve problems and provide guidance on what lessons to teach next. The purpose for this project was to explain teachers' perceptions and experiences with reflective practices in a school where they follow the IB practices and procedures. I also wanted to know what structures, supports, or resources teachers required to implement reflective practices and model reflective practices for students. I

confirmed that teachers see a need for instructional reflection and do reflect informally; however, they did not know how to use reflective practices in a way that the IB had intended. As a school, the IB coordinators will now develop a platform for teachers to better utilize reflective practices and the district will have a blueprint for other IB schools in the district to follow.

Reflective practices benefit teachers and students alike. Teachers need time and space to reflect in ways that make sense to them and will help them to be more effective educators.

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Appendix A: White Paper

Teachers' Perceptions of Reflective Practices Within an International Baccalaureate
Primary Years Program

Table of Contents

Introduction.....	108
Local Problem.....	110
Summary of Project Study.....	111
Methodology.....	111
Data Analysis/Results.....	112
Recommendations.....	114
Establishing a Framework.....	114
Primary Recommendations.....	114
Secondary Recommendations.....	116
Conclusion.....	118
References.....	119

Teachers' Perceptions of Reflective Practices within an International
Baccalaureate Primary Years Programme

Introduction

International Baccalaureate offers programs with an international educational focus and structure for grades K-12. Programs include Primary Years Program (PYP) for grades K-5, the Middle Years Program (MYP) for grades 6-10, and the Diploma Program for grade 11-12. Each program transitions from one transdisciplinary approach to the next by building connections within the three programs. It is designed to develop the whole child while focusing on common elements to increase the international mindedness of students. Included in the curriculum standards for IB are collaboration and reflection. Collaboration and reflective practice support student learning, planning, and addresses other aspects of IB specifically designed to enhance the IB learner profile and the continuum of an international education.

The influence of John Dewey, Jean Piaget, and Jerome Bruner had a major impact on the philosophy and foundational aspects of the IB's framework and beliefs (IB, 2015). Students are expected to use strategies and approaches grounded in their philosophies. To assist teachers in guiding students in the critical IB instructional and critical thinking practices, IB's Organizational standard includes professional development for teachers. This training aspect of the program ensures that teachers receive IB-recognized professional development. The Global Research department of the IB organization's study points out their commitment to continuous professional development so their educators become "critical reflective practitioners" (Bergeron & Dean, 2013, p.5). The

need for IB educators to be reflective practitioners is echoed throughout the continuum of the programme structures (International Baccalaureate, 2008).

XYZ Elementary, an IB school, is governed by the policies and procedures set forth by the IB. One aspect of the framework for IB is that teachers are expected to be reflective practitioners. Through interviews and a two-week reflective journal, teachers expressed their perceptions of reflective practices at XYZ Elementary. Through the data I found that teachers do reflect informally, but do not believe they have been properly trained or given the time to reflect as indicated by the IB. The White Paper will be used to explain the concern of the teachers and provide recommendations to the school district and XYZ Elementary administration to develop a platform for reflective practices at the school. These recommendations are critical to IB success because teachers will have opportunities to learn how to reflect and become reflective practitioners as set forth by the IB. The embedded professional learning framework was chosen because the teachers are already required to have Unit of Inquiry meetings every 6 weeks and this framework would provide reflective practice training throughout the year. This framework will be evaluated by using an open-ended questionnaire that will evaluate the teachers' perceptions. A possible solution is to have a 3-day professional development session at the beginning of the school year to address reflective practice training. This solution was rejected because this was not a very effective way to address the lack of time teachers experience. Using the already scheduled Unit of Inquiry meeting times is an effective way to continue professional learning throughout the year.

Local Problem

Teachers at XYZ Elementary (a pseudonym) are required to use critical reflection based on the reflective practitioner standards set by IB included within the curriculum program standards. While teachers are expected to meet this requirement, the problem is that XYZ Elementary does not have a platform for teacher reflection and because of this they struggle to meet the reflective practitioner standards. XYZ Elementary, a Primary Years Program (PYP) school serving 4th and 5th graders in the southeast, gained IB World status in 2006. Expectations for the program are followed by the program standards. Teachers collaboratively plan Units of Inquiry (UOI) as a grade level facilitated by the IB coordinators and discuss the upcoming units as outlined by the Plan of Inquiry (POI). In these collaborative planning sessions teachers look ahead and plan inquiry lessons and review the standards to ensure that teachers are using the same language and have the same understandings when teaching the lessons. Here they discuss teacher wonderings and make collaborative decisions as it relates to how to address the standards. There is also an opportunity for teachers to write reflective sentences about the previous terms Lines of Inquiry and inquiry lessons on the POI. However, teachers struggle to incorporate instructional reflection into their teaching and demonstrate critical reflection as expected by the IB.

Summary of Project Study

Methodology

My study examined the teachers' perceptions of reflective practices using IB standards. In addition, my study explored IB teachers' experiences with reflective

practices using the inquiry-based teaching model and examined the structures, resources, and supports teachers need to implement and model reflective practices for students.

The conceptual framework for this study is John Dewey's (1933) theory of critical reflection. Dewey is the philosophic pioneer on the study of reflective practice. Dewey explored the ethos of thinking and how individuals form their thoughts. In *How We Think*, Dewey (1933) defined reflective thought as the "active, persistent, and careful consideration of any belief or supposed form of knowledge in the light of the grounds that support it and the further conclusions to which it tends" (p. 6). This conceptual understanding of critical reflection provides teachers with opportunities to more effectively use instructional reflection within an IB framework as well as heighten their insight into their own reflective practices.

The research design I used was a qualitative case study. Case study is the appropriate research design for this study because of the in-depth analysis of reflective practices. In order to study the teachers at XYZ Elementary IB Primary Program School, purposeful sampling was used. The small sample size of 10 teachers was beneficial in providing a rich description of the teachers' perceptions and thoughts about their experiences. The participants for this study consisted of six fifth grade teachers and four fourth grade teachers. The criteria for participation in the study was that the teachers needed to have taught for at least two years and must have been to at least one outside IB training. This was to ensure that all the participants understood the IB principles and standards and were comfortable with their individual teaching practices and the inquiry-based teaching approach. Each participant who met the criteria was invited by email to an

initial meeting where they learned about the study as well as the processes and procedures that were to be used in the study. The participants were given a consent form to complete if they were interested in being a part of the study.

Data collection consisted of a two-week reflection journals followed by a semi-structured one-on-one interview. The reflective journals were unstructured and were intended for teachers to reflect on how their teaching practices have been influenced by IB's inquiry-based teaching model. Teacher's instructional reflections include observations, questions, and thoughts they may have that have been influenced by the inquiry-based model. The semi-structured one-on-one interviews probed their experiences with instructional reflection and perceptions of reflective practices within the IB framework. All interviews were transcribed, recorded and submitted to the participants for approval.

Data Analysis Results

Based on the reflective journals and the one-on-one interviews, there were four main themes that represented the perceptions of reflective practices at XYZ Elementary. The findings from the interview data were compared to that of the reflective journals to uncover the four main themes.

Theme 1: Lesson reflections. All ten of the participants mentioned lesson reflections in their reflective journal, and one participant also mentioned this in the interview. The instructional reflections described lesson successes, frustrations, or reflections on future lessons. Throughout the reflective journals, teachers explained how

the planning of the lesson and execution of the lessons differed or were carried out as planned.

Theme 2: Planning. All ten participants described planning in their journals and interviews. This theme includes minor categories that were collapsed into one main theme. Planning is explained by any form of planning including informal planning with colleagues or the scheduled collaborative planning with the IB coordinators. Minor categories include Unit of Inquiry (UOI) planning and planning based on student learning.

Theme 3: Time. Eight out of ten participants mentioned time in their journals or interviews.. Time was mentioned as a factor that influenced reflection. Teachers mentioned how the demands of teaching in an IB school affected their ability to have time to reflect. Some described finding time to reflect as a struggle and one of the main challenges for them.

Theme 4: Training. Eight out of ten participants mentioned the theme training. Participants mentioned training concerning the frequency of IB training they have received within the school from the IB coordinators and by IB outside of school compared to what is expected of them in the classroom.

Recommendations

Establishing a Reflection Framework

The analysis of the data showed that teachers did not feel there were able to be reflective practitioners as required by IB due to lack of training and time. The school lacks the platform for teachers to be reflective practitioners outside of the informal

reflections that are spoken to fellow teachers in the hallway or the instructional reflective sentences that are written during each term's Unit of Inquiry planning. Therefore, it is recommended that XYZ Elementary establish a reflection framework and platform for reflection for teachers to utilize for critical reflection.

Primary Recommendation

- 1) It is recommended that XYZ Elementary begin an embedded professional development aspect of their collaborative time during the Unit of Inquiry time taking place each for 1 day every 6 weeks of the school year. This embedded professional development platform within the school setting becomes relevant to teachers and supports the efforts of developing reflective practitioners (Spencer, Harrop, Thomas, & Cain, 2018). Each professional development session should begin with the IB coordinators modeling aspects where teachers are shown what critical reflection looks like for different levels of experienced teachers. This idea of different career stage teachers reflecting based on experience teaching demonstrates that not all teachers should be expected to reflect in the same way and lends itself to a differentiated approach for facilitators. Farrell (2014) suggested that a teacher's reflective disposition be considered when examining and modeling reflective practices. One's career stage can determine their awareness and how they might be most comfortable reflecting and should guide their starting point through this process.
- 2) XYZ Elementary should consider using an established framework to begin the discussion and modeling of how to be critically reflection. When the IB

coordinators are facilitating the discussion, there should be a distinction as to how a beginning teacher might reflect as opposed to a developed teacher. Ganly (2017) presented a framework for reflective practice that provides a step-by-step approach to instructional reflection. This PARA framework consists of four steps that highlight an active process requiring openness, thinking and doing (Ganly, 2107). PARA stands for pausing, attending, revising, and adopting/adapting (Ganly, 2017). Ganly (2017) began by describing the first step, pausing as a time where teachers stop and think before deciding on anything. This time can be before, during or after a lesson. This time is meant to encourage awareness and gain perspective on whatever they are reflecting on, for example student performance or previous lessons (Ganly, 2017). Next, Ganly distinguished the second step, attending as one where teachers must ask themselves questions about what is and is not working in the classroom. While asking questions, teachers must continuously consider professional practices as they begin to reflect (Meijer, Geijssel, Kuijpers, Boei & Vrieling, 2016). Schoemaker and Krupp (2015) clarified that strategic teachers are experts at asking questions and their questions are based on how much or how little one knows about the subject. The third step, revision, is where teachers reflect on the answers to those questions they asked themselves in the previous step (Ganly, 2017). And finally step four combines adapting and adopting their thoughts to their situation (Ganly, 2017). This is where teachers consider the answers to their questions and begin to gain new perspectives on what they have been reflecting. Teachers may not come away

with clear answers. However, during this step teachers may also begin to collaborate with others as they consider new ways and others' ideas (Ganly, 2017). This process brings about the authenticity in teaching and demonstrates the awareness of how self-reflecting can affect change (Ramezanzadeh, Zareian, Adel, & Ramezanzadeh, (2017).

Secondary Recommendation

The second recommendation is that XYZ Elementary needs to provide structures or different supports for teachers to practice being reflective practitioners throughout the school year. Through the IB coordinators facilitative efforts, it is recommended that structures should include options for teachers such as face-to-face reflection as well as virtual reflection. The objective of having a face-to-face reflective component is to provide teachers with an opportunity to have an immediate response or conversation about their reflection if they chose this format. A written reflection is always an option; however, these recommendations provide more diverse options.

- 1) Farrell and Jacobs (2016) discussed teacher reflection groups to promote reflection. By using teacher reflection groups of up to eight teachers, teachers can reflect within one school or across a span of schools (Farrell & Jacobs, G., 2016). This would be a group of teachers that meet in an agreed upon location for an interactive discussion. Farrell and Jacobs (2016) mentioned that this process is most effective if the teachers value this approach and are comfortable sharing their thoughts and ideas. For the benefit of the teachers, groups can be heterogeneous where members of the group teach different grade levels and have

different specialties. Reflection groups should be inclusive in nature, be a place where teachers can share their thoughts, and be committed to having an external dialogue with others outside the reflection group. This is a time for teachers to practice what they have been taught in the embedded professional development that is being offered as part of the collaborative Unit of Inquiry meetings.

- 2) Another option is to have teachers practice reflection virtually through blogs. The objective of blogging option is to provide teachers with an electronic and interactive aspect to reflections. Because blogging can be thought of as somewhat personal, XYZ Elementary can have blogging teams that use this format to share and discuss their reflections (Hall, 2018). Hall (2018) specified that for teachers to use blogs for reflection, they must be taught how to participate and interact in a way to promote reflection. With professional learning from the IB coordinators during collaborative planning time, teachers can also receive feedback from their blogs that can begin a dialogue between teachers that supports reflective conversations and thoughts.

Conclusion

This white paper explains the reflection standards set in place by the IB. The standards are required to be followed by all IB World Schools. The IB has various professional learning classes that are taught outside of their local school throughout the world to assist the teachers and schools with different aspects of the IB curriculum. The teachers at XYZ Elementary have received training in various areas of the IB curriculum,

however they do not feel as though they have the platform to be reflective practitioners as described by IB.

This report summarizes the qualitative case study including the data analysis that uncovered 4 main themes that outlined the teacher's perceptions of reflective practices. The themes were determined by the reflective journals and one-on-one interviews from each of the ten participants. From the themes, there were two main recommendations that were presented. The first recommendation is based on providing a framework for modeling professional development in the established collaborative planning time that happens every six weeks. It is recommended that the IB coordinators provide a differentiated approach when discussing the expectations of critical reflection for the teachers. The second recommendation is to provide different structures for teachers to practice reflection in various ways such as reflection groups with other teachers in the school or blogging as a means to practice reflection. Both ways encourage teachers to practice instructional reflection and receive thoughtful feedback from colleagues.

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Appendix B: Open-Ended Questionnaire

1. What reflective practices have you engaged in this term?
2. What were your biggest challenges with reflection this term?
3. What were your biggest successes with reflection this term?
4. What resources have been most helpful or you suggest in helping with reflection?

Appendix C: Interview Protocol

Introduction

- Researcher introduction
- The purpose of the study is to identify the perspectives of reflective practices of teacher in an IB Primary Years Program school.

Ground Rules

- Estimated length of time for interviews 45-60 minutes
- Interviews will be conducted in a quiet place, agreed upon by participant and researcher; either in the school, or off campus if requested
- Interviews will be consistent, however probing questions may vary based on responses
- Pseudonyms will be used with all interviews. There will not be any identifying information included in the reporting.
- Interviewees will be sent transcripts of interviews to check for accuracy.

Interview Questions

Preliminary Interview Protocol – to be augmented from Reflective Journals

Demographics

- How long have you been teaching in an IB school?
 - How long did you teach outside an IB school?
 - What levels of IB training have you completed thus far?
- 1) How do you use reflection in planning your instruction?
 - 2) How do you use reflection after instruction?

- 3) How often does your reflection on the lesson shift the way you plan for the next lesson?
- 4) What support or training have you received in your use of critical reflection in the IB model?
- 5) What struggles or challenges have you had using critical reflection before, during and after instruction?
- 6) What support have you been provided to increase your use of critical reflection?
- 7) What resources or support would you like to have to increase your understanding or use of critical reflection?
- 8) What would you describe as your priority for improving the training available to assist teachers in using critical reflection?
- 9) Is there anything else you'd like to tell me about the IB model, teaching in the inquiry model, or using critical reflection in this instructional model?

Thank You

- Thank the interviewee and explain the next steps

Appendix D: Sample Reflective Journal

Reflective Journals

Directions:

- Reflective journals are unstructured and intended for you to reflect on how your teaching practices are influenced by IB's inquiry-based teaching model. Reflections can include observations, questions, and thoughts you have that are influenced by the inquiry-based model.
- After each teaching session or the end of each teaching day, write a reflection about your lessons. This can include, but is not limited to, how you prepared for the lesson, reflections during the lesson, as well as after the lesson. Include reflections on how IB's inquiry-based teaching model influences in your teaching.

Sample Daily Reflection Journal-

- Social Studies
- Line of Inquiry- Causes of Movement

My reflection:

- Today's lesson was well executed, but I noticed that students didn't have the background knowledge to properly understand why people would move for seasonal reasons or for opportunity. There wasn't a point of reference in their knowledge base. With all that is going on in the world, most students were able to

draw examples from people being forced to move because they wanted to talk more about the Syrian Refugees and the recent hurricane in Puerto Rico.

On the way to lunch, I talked to another teacher who said that her students had the same problems, we wanted to talk more about how to adjust our lesson for tomorrow so the students understand why people moved based on the season, like Black Cowboys or why they moved based on opportunity.

- I need more time to reflect on lessons that we have taught in the past to help with future lessons. In our last Unit of Inquiry meeting with the grade level we discussed the upcoming Term's UOI and the provocation that we will use. The provocation encouraged students to think about the different reasons people migrated to different areas during the Turn of the Century.

Appendix E: Original Codes/Phrases

1. Time
2. Unit of Inquiry
3. Planning
4. Big Differences
5. Student Learning
6. Training
7. Priority
8. Lesson Reflection
9. Behavior

Appendix F: Theme Development Table

Theme Development

Themes	Concepts within Themes
Lesson Reflection	Lesson successes, frustrations, and reflection on future lessons
Planning	UOI planning, common planning time, collaborative planning, and planning based on students
Time	Lack of time, use of time
Training	UOI training, training as a priority
