STUDENT ENGAGEMENT AND MOTIVATION IN PRIMARY FOREIGN LANGUAGE CLASSES: A MIXED-METHODS LONGITUDINAL STUDY

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STUDENT ENGAGEMENT AND MOTIVATION IN PRIMARY FOREIGN LANGUAGE CLASSES: A MIXED-METHODS LONGITUDINAL STUDY

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Rationale

My interest in motivation as an idea began when I became a teacher. I arrived in Japan in 2003, and taught at numerous levels of education, from pre-school to university to private language school. Based on my experiences, I gleaned the following lessons that I have striven to apply to my own educational practice:

1) Anyone can learn a degree of the fundamentals of anything, no matter their cognitive ability.
2) An understanding of the fundamentals and underlying principles, no matter how tedious, is crucial to later learning.
3) Learning these fundamentals is often best undertaken individually, and driven by recognition of the value of the task.
4) Things we value we will enjoy, and thus the sense of value and sense of enjoyment will often occur together.
5) We will engage with the things we value independently and without coercion.
6) Without social support and belief in our own abilities, we have no reason to expect success, and thus no reason to invest effort.
7) Excessive choice or novelty may seem like inadequate social support.

These naïve, empirically untested, but deeply held beliefs form the background for this study and the research orientations, goals, and outlooks that they form. Having transitioned from working in schools to being a teacher educator, my ultimate goal is to develop principles for instruction based on practices beyond my own experience, rooted in and referential to the conclusions I have drawn from my own experiences in education. Through the course of writing this thesis, I hope to show evidence for these beliefs.
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W. L. Quint Oga-Baldwin
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Glossary of Abbreviations

ALT: Assistant language teacher. A native or near-native foreign language specialist employed in Japanese schools for the purpose of providing language modeling and communication.

HRT: Homeroom teacher. A generalist teacher in charge of a single class of up to 40 students, responsible for teaching all or almost all subject matter. For the purposes of this thesis, the homeroom teacher is always a Japanese national.


NL: New language. Used in place of second language, foreign language, L2, or target language. For an in-depth discussion of this use of terminology, see Hall and Cook, 2012; 2013.

OL: Own language. Used in place of first language, mother tongue, national language, or L1. For an in-depth discussion of this use of terminology, see Hall and Cook, 2012; 2013.

SDT: Self-determination theory. A macro theory of human motivation based on five micro theories involving the development of intrinsic motivation through the alignment of self and environment.

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Chapter 1–Introduction

Motivation is often considered one of the cornerstones of academic achievement. The outcome state of motivation—the state of engaged, active learning—is what teachers most recognize (Lee & Reeve, 2012) and work for in their teaching. It is through consistent, long-term engagement that students learn and achieve positive academic results (Jang, Kim, & Reeve, 2012). Theories of how motivation is formed abound, from cognitive models (Tollefson, 2000) to affect oriented models (Hidi & Renninger, 2006), to complete theories of the person-in-situation (Deci & Ryan, 1985; Bandura, 1986). The most complete theories of motivation specify how the person and context align to produce motivation and subsequent engagement (Sorrentino, 2013). This dissertation focuses on the relationship of the student in the school environment, specifically looking at how classroom dynamics influence student behavior in the foreign language classroom.

1.1 Problem statement

Since 2011, all primary schools in Japan have been teaching foreign language activities to fifth and sixth grade students (MEXT, 2008a). According to Course of Study for Foreign Languages, which outlines this curriculum, one of the primary purposes of foreign language activities (FLA) is motivating students to engage with the foreign language and develop an interest in foreign countries. These goals state that interest in foreign language learning is to be built long-term using familiarity with and communication in the foreign language. Through the use of interest building activities, the goals indicate the theoretical link between behavioral, cognitive, and affective engagement with the foreign language in order to build motivation. From this perspective, a primary goal of FLA is to improve the intrinsic motivation for learning English in order to promote long-term foreign language learning.
through secondary school and beyond.

In concrete terms, the outlined program of instruction is intended to promote student ultimate achievement through early exposure to the foreign language. While Japan is consistently a leader in reading, math, and science on international tests (PISA, 2009; 2012), many measures also find it consistently struggling with foreign language proficiency (e.g., Education First, 2013; ETS, 2014). Studies have also found that connected with a lack of proficiency is a lack of motivation, largely in relation to the academic testing system (Berwick & Ross, 1989). Recognizing that proficiency and motivation are linked (Bandura, 1997), the new curriculum has focused on a “zest for life,” in all subjects, with specific focus on promoting enjoyment of English in elementary schools. By addressing motivational needs, the goal is to improve proficiency and international standings. More recently, a more explicit connection has been drawn towards the role of improved foreign language proficiency for globalized integration (MEXT, 2013).

For students in ESL settings in the US and Canada, it takes 3 to 5 years of constant exposure and intensive tutoring to prepare young learners to competently use English as an educational language (Hakuta, 2011; Hakuta, Butler, & Witt, 2000). While the goal of foreign language education in Japan is not to prepare students to integrate in all-English academic settings, logic holds that the greater the amount of quality comprehensible, meaning-focused spoken input (Nation & Newton, 2008), the greater chance of achieving the desired level of baseline communicative competence (MEXT, 2013). In many models of motivation, competence and motivation are strongly linked (Bandura, 1997; Ryan & Deci, 2002; White, 1959). Knowing that students in Japan who eventually achieve higher language ability are those who begin early and are continuously exposed to the foreign language (Larson-Hall, 2008), teaching foreign language to younger learners may ultimately have the desired effect
of raising proficiency.

However, the process by which elementary teachers may effectively teach is still unclear. Many teachers feel underprepared (Fennelly & Luxton, 2011), and numerous believe that the ideal foreign language teacher is a native speaker of English (Butler, 2007a). From the assumption that the nationality of the teacher in front of the class is of less import than the content of the class, homeroom teachers, specialist English language teachers, and non-Japanese assistant language teachers all need to know how to plan and structure instruction so that students will think about the foreign language in order to build both competence and motivation (Willingham, 2009). Without guidelines for how to engage and motivate students to think about the foreign language, the goal of a more globalized, English capable Japan (MEXT, 2013) is unlikely to ever see fruition.

1.2 Chapter outlines

The overall goal of this thesis is to describe a series of observable teaching practices associated with highly engaged, highly motivated students. By identifying these behaviors through qualitative and quantitative cross-validation, I hope to demonstrate how elementary teachers can engage their students behaviorally, emotionally, and cognitively for the purpose of “priming the pump” of their long-term motivation. By demonstrating concrete, reliable, and actionable practice for application in foreign language classes, teachers and teacher trainers may be better able to create an appropriate program of instruction for students.

Chapter 2 discusses the theoretical and empirical underpinnings of the thesis. Focusing on the psychological aspects motivation and school based foreign language education, this Chapter introduces Deci and Ryan’s (1985; 2002) self-determination theory and discusses it in relation to other theories, both from general learning and language learning
psychology. Theoretical discussions are balanced against their practical application based on empirical findings in school environments.

Chapter 3 introduces the social, political, and motivational climate of school learning in Japan. Beginning with a brief background on education in general and the history of foreign language education in Japan, this discussion includes a critical look at many of the theories promulgated by proponents and opponents of foreign language activities (FLA) in elementary schools. Working then from the guidelines for the Course of Study for Foreign Languages (MEXT, 2008a), I discuss how this curriculum policy document may be applied for the purposes of developing student motivation.

Chapter 4 introduces the research methodologies, epistemologies, and theoretical frameworks to be used in this study. This Chapter provides an outline of the basic philosophies of quantitative and qualitative research, a broad description of the worldview associated with the different schools of each, and several of the common approaches. In order to capture the strong points of each approach to data gathering and interpretation, I propose that a mixed-methods paradigm as the most pragmatically oriented option for research with the greatest chance of a contribution to both theorists and practitioners. Based on the issues outlined in Chapters 2 and 3, I discuss the overarching research questions to be investigated in the empirical Chapters 5 through 9.

Chapter 5 describes the qualitative groundwork used to generate later quantitative theory. Based on observation of successful foreign language classrooms, this Chapter outlines teacher practices that provide students with large amounts of input while also creating a productive learning environment. Focusing on strategies for linguistic and classroom management, this study forms the grounding for a theory of how teachers may support and
actively engage learners.

Chapter 6 describes the qualitative and quantitative steps used to validate a longitudinal model of foreign language motivation development. Integrating a bottom-up approach to the question of how teachers structure lessons with a top-down approach to motivational theory, this Chapter details the 5 studies of the pilot validation investigating the stability of students’ perspective on positive teaching, observed over time and in relation to other external measures of motivation.

Chapter 7 is embedded within the investigations from Chapter 6, using part of the gathered data to investigate differences between student perceptions of Japanese and non-Japanese teachers. Common belief states that native English-speaking teachers are more effective at promoting communication in the foreign language. This study investigates the veracity of this claim.

Chapter 8 investigates the year-long changes that students’ experience over the course of their 35 hours of instruction. Focusing on how fifth-year students’ attitudes change in response to their learning environment, this Chapter builds on the theoretical validation used in Chapters 5 through 7 to construct an empirical model for the motivational process occurring in classrooms. Using both self-report and external observation of students’ in-class behavior, this study seeks to answer the question of how students engage with their learning.

Chapter 9 reports on qualitative observations of student-teacher interactions in differently engaged classes. Looking at both micro- and macro-features of classroom instruction, this study seeks to document the reasons why students might perceive different classes as more motivating and enjoyable. By documenting types of interactions, scaffolding, and teachers’ language choices, I hope to show how teachers can positively influence their
students while avoiding tactics which may disengage students and thus damage motivation.

Based on the five empirical Chapters, Chapter 10 summarizes the findings and offers suggestions for how students may engage teachers in elementary foreign language classes. This Chapter is written with a special emphasis on summarizing the findings for practitioners and providing actionable points for improving learner engagement.

Through this research, the ultimate goal is bridge the gap between teachers and theorists to better drive forward elementary foreign language education in Japan. To paraphrase an oft-quoted statement, practitioners who think more of practice than theory cast about without clear knowledge of where they might arrive. Worse, they may grow to believe that the world of learning only encompasses the safely proven paths they have mapped by trial and error. Through the course of this thesis, I hope to provide an accessible map for teachers to learn and recognize how theory may direct learning and instruction.
Chapter 2–Theory and Practice of Motivation and Foreign Language Learning

Keywords: motivation, schools, elementary language learning, self-determination theory, social cognitive theory, social modeling

At base, a fundamental assumption of all motivational theories is that, to some extent, increasing motivation will lead to improvements in student learning. At the same time, many competing schools of thought exist on the underlying components of motivation, how these components may be accurately measured, and how the different elements may be nurtured. While there is large and broad consensus on this and many other aspects of motivational theory (e.g., no theory emphasizes increasing negative emotion or pain as powerful long-term motivators), differences in terminology and orientation have created numerous ideologies and epistemological worldviews in how motivation functions and may be promoted. It would be beyond the scope of this or any thesis to cover adequately the focuses and nuances in each one, though for a fairly complete review, see the volumes by McInerney and Van Etten (2004) or more recently Christensen, Reschly, and Wylie (2012).

At the same time, within this field of study the many ideologies cross and overlap at numerous points, and may even be operationalized in similar ways (Brophy, 2004). Using this as a starting point, this Chapter will present an overview of numerous theories relevant to learning and language learning as it can be applied in schools. I will discuss the elements of cognitive models of motivation, interest-based models, self-determination theory, and social cognitive theory. Finally, I will present my discussion of my selection of self-determination theory and social cognitive theories as central to my investigations of motivation and learning in elementary schools.
2.1 Motivation in School Learning

An important issue to consider in determining how students are motivated in schools is the notion that while school is an inherently unnatural place (Willingham, 2009), the environment is also one that students may come to regard as normal (Good & Brophy, 2008). Indeed, it is theorized that by participating in normalized learning activity students develop a baseline reference for motivation (Newmann, Wehlage, & Lamborn, 1992). Thus, when considering motivation for language learning in schools, we must think not only about students’ motivation for the domain of language learning, but also recognize that they are individuals acting in the school environment (Brophy, 2004). At the same time, there is some evidence that the domain specificity of motivation may begin as early as the first half of elementary school (Guay et al., 2010; Lepper, Corpus, & Iyengar, 2005). Students develop an affinity for specific subject matter, often in relation to their perceived ability with that subject (Spinath & Steinmayr, 2008). As children mature, their competence beliefs are increasingly influenced by interactions with their teachers (Spinath & Spinath, 2005). Thus, considerations of the dynamics specific to foreign language classes in addition to the more general ideas of motivation may provide greater insight into our understanding of how this domain-specific motivation may develop.

In considering domain-specific foreign language motivation, the teacher’s motivational environment has been similarly indicated to influence student motivation and behavior. Young children report the strongest influence on their interest in the foreign language comes from the teacher (Nikolov, 1999). Other observations of teachers’ specific motivational strategies have shown a positive influence on students’ in-class behavior (Guilloteaux & Dörnyei, 2008; Sugita McEown & Takeuchi, 2012; Sugita & Takeuchi, 2010). Teachers’ choice of content to promote creation of meaning and understanding has
further shown positive effects on observed engagement (Huang, 2011). Likewise, in previous work investigating negative teacher behaviors, inappropriate or overly test-oriented choice of content, as well as unidirectional teaching styles have negatively influenced students’ motivation (Falout, Elwood, & Hood, 2009; Kikuchi, 2009; Sakai & Kikuchi, 2009).

The following sections will introduce several of the current theories and models of motivation, particularly those relevant to school and language learning. By addressing issues of language acquisition in terms of the underlying base motives, I endeavor to show how to assist learners in becoming more self-motivated and self-sustaining.

### 2.1.1 Cognitive Models of Motivation

Cognitive theories generally address motivation from the perspective of beliefs regarding their likelihood of success and failure in academic settings, treating learning and affect as a function of cognition (Meyer & Turner, 2002). Within this framework, individual students are in turn regarded as scientists, making rational assessments of their world based on the trial and error of life experience (Tollefson, 2000). Students may display confidence in their ability to achieve in school (Pintrich & DeGroot, 1990; Bandura, 1997). They may assign values to tasks in preparation to undertake the task while regulating the effort needed to achieve in school (Eccles & Wigfield, 2002); may set explicit goals (Dweck, 1986) or attribute success or failure to specific past outcomes in order to organize behaviors (Weiner, 1986). Beliefs are developed through classroom experiences, formed by experiences of success and failure that then become part of student functioning and identity. Once learners have developed their sense of outcomes, they form beliefs regarding the value of the task and their expectancy of success in light of the costs that a task may have.

The value of a task as a mediator for motivation can be seen in Eccles and Wigfield’s
(2002) expectancy-value theory of motivation. The theory says that the value that individuals attach to activities influences the degree to which they interact with them. This subjective task value (Eccles, 2005; 2009; Eccles & Wigfield, 2002; Wigfield & Eccles, 2000) is what draws people to tasks that may be otherwise uninteresting. In school, many tasks that are assigned to students may be inherently uninteresting, and it is primarily the job of teachers to provide students with reasons to study (Brophy, 2008). By showing students that what they learn will benefit them in both tangible and intangible ways (attainment value), as well as provide them with new ways of interacting with the world (utility value) teachers are then able to demonstrate why learning in the classroom will benefit them.

The “why” of cognitive theories is aided by the idea of goals and their many iterations, and thus may be important in understanding how learners approach tasks (Locke & Latham, 1990). The original conception of goals contrasted the dichotomy of mastery, or working for personal development, and performance, or working toward social comparison and external reward (Brophy, 2004). The dichotomy was then split again to include an approach and avoidance framework, with approach representing a desire to achieve success and avoidance representing the desire to minimize failure (Elliot & McGregor, 2001).

The 2x2 framework was created to include both the mastery-performance and approach-avoidance conventions (Elliot & Murayama, 2008). In this construction, a mastery-approach goal would be towards learning in order to acquire skill, while a mastery-avoidance goal would work towards the same acquisition but tempered by the desire to not make mistakes. Likewise, performance-approach would refer to the idea of trying to outshine peers and display high ability, while performance-avoidance would entail an attempt to prevent appearing less capable than others. While this framework is a useful one in theory, it also shows relatively weak effects on overall learning achievement (Brophy, 2005), and is likely
highly related to existing ability beliefs based on past performance (Grant & Dweck, 2003).

Students’ active interpretations of their previous experiences, most specifically related to their effort and the results, are thought to be formed by their attributions (Weiner, 1986). Much like the approach-avoidance element of the achievement goals framework, this theory posits an internal and external framing, complemented by effort and ability attributions. When students achieve success after working hard at a task, they are likely to attribute their success to their effort, while students who have repeatedly met with failure in spite of effort are likely to attribute that failure to lack of ability. Likewise, students who succeed after expending little effort may think themselves naturally talented, or they may simply believe the task too easy. At the same time, some research has shown that university students are likely to assume others are not expending their full effort for fear of failure, but that they themselves would not do the same thing (Jagacinski & Nicholls, 1990), indicating that personal effort and perceptions of others’ orientations are not always clearly visible to observers.

These cognitive theories of motivation allow us to see the mental models that students may (informally) construct for the purpose of understanding their world and forming plans of behavioral action. At the same time, these theories leave out the emotional side of learning, often treating students as entirely rational but without an emotion-based drive towards a task. In order to address the more emotionally oriented side of motivation, the theory of interest and its development deals with aspects of positive affect which draw people toward tasks.

2.1.2 Interest and School Based Learning

Theorists have discussed the idea of interest as an internal feature driving motivation. In a key review of issues on achievement motivation, Hidi and Harackiewicz (2000) state “All children have interests, motivation to explore, to engage, but not all children have academic
interests and motivation to learn to the best of their abilities in school” (p. 168). Interest is thus what draws students’ curiosity and wonder, and then prompts them toward action. Unlike the cognitive constellations of factors influencing motivation, the theory of interest is promoted as a primarily emotional one, based on the positive affect students have or which is activated towards an object. While it theoretically can be managed cognitively through an active decision to be interested (Ainley et al., 2002), it is primarily an unconscious process (Hidi & Renninger, 2006). Students may recognize that they are interested when asked, but the triggers of student interest appear to be largely latent. Accordingly, students may then have more surface level and deeper interests in activities. In this theory, students’ positive emotions are drawn towards a topic through a process of interest development.

Hidi and Renninger (2006) propose a four-phase model of how an internalized interest develops. In this model, students’ interest is first drawn through the situation, in a state called *triggered situational interest*. If this interest continues through interaction with the environment, perhaps reciprocally with engagement, it becomes *maintained situational interest*. In the first two phases we might say that the student is interested, first by the task or activity and then with greater focus and attention brought about by personal involvement. In the third phase, a relatively enduring sense of affinity for and desire to engage in the task emerges, where the student finds personal value and increasingly deep curiosity about the topic. This phase is called an *emerging individual interest*, and might be seen as the movement towards the student having an interest rather than simply being interested temporarily. Finally, students may have *well-developed individual interests*, where they show a predisposition to return to specific tasks, materials, and subject matter over time. They may show a high degree of knowledge under this categorization, and students may self-regulate in order to better manage their engagement with the task.
The theory of interest offers a transition from the primarily cognitive theories of motivation towards a balanced, emotionally regulated, and unconscious conception of motivation. While large parts of the cognitive theories of motivation may involve emotion and unconscious control, these theories largely deal with more explicit metacognitive issues. In tracing the spontaneous factors which draw interest, we begin to look beyond these explicitly explainable factors through toward the idea of underlying needs. Recognizing that beyond interest and metacognition that there are more fundamental psychological requisites supporting motivation brings us naturally to a discussion of a theory of basic needs and self-determined motivation (Krapp, 2002; 2005).

2.2 The Self-Determination Theory of Human Motivation

Self-determination theory (SDT) offers one of the most complete and empirically sound theories of motivation available (Brophy, 2004; Ryan & Deci, 2002). As will be discussed, it takes into account conceptions of interest, attribution, goal setting, values, and conceptions of task ability into a coherent model of how the self interacts with the environment. Unlike the previously discussed theories, SDT recognizes that not all motivation is cognitive, but carries a significant emotional and subconscious element as well (Deci & Ryan, 1985). While the theory is not universally accepted and does not account for every eventuality (McInerney & Van Etten, 2004), it has mechanisms in place for accounting for many of the shortcomings that appear based on empirical questioning (Reeve, 2012).

According to SDT, internally directed motivation stems from the satisfaction of basic human needs, built and supported through the harmonious interaction of the individual and the environment (Ryan & Deci, 2002). While all motivational theories endorse the idea to some extent that the quantity of motivation matters, SDT posits that it is both the quantity and
quality of motivational content that defines outcomes (Vansteenkiste, Lens, & Deci, 2006). SDT research has shown teachers’ support for students’ autonomy, competence, and relatedness as a robust predictor of motivation, engagement, and achievement (Reeve, 2012).

As with previous models of reinforcements through a combination of individuals internal values and expectations for outcomes (Rotter, 1966; de Charms, 1968; White, 1959), individuals’ interact with the world in order to satisfy their internal motives and influence their surroundings. While all motivational theories endorse the idea to some extent that the quantity of motivation matters, SDT posits that it is both quantity and quality of motivational content that defines outcomes (Vansteenkiste, Lens, & Deci, 2006; Vansteenkiste et al., 2004). Thus in SDT, motivation comes from internal resources of autonomy, competence, and relatedness, and is nurtured through the satisfaction of these self-perceptions.

Self-determination theory has been used in numerous foreign language learning contexts, including Japan (Carreira, 2012; Hiromori, 2003; Nishida, 2013; Noels, Pelletier, Clemént, & Vallerand, 2000; Wu, 2003). Theorists have posited its' applicability for promoting Japanese learners’ motivation to acquire a new language (Noels, 2013). SDT has also been used in other East Asian general educational situations (Jang, Kim, & Reeve, 2012). Working from the assumption that language learning motivation in Japan is directly connected to school and human motivation (Carreira, 2011), addressing the most basic of motivational needs, rather than theorized needs specific to language learning, offers improved perspective on how to engage students with learning materials.

According to SDT, individuals have inner motivational resources which share a reciprocal relationship with the classroom environment; students respond to teachers’ motivating styles by adapting their internal psychological needs, interests, and values, and
teachers respond to students’ motivation and engagement in class by becoming controlling or autonomy-supportive (Reeve, 2012). The overarching theory is broken down into five mini-theories: basic needs theory; organismic integration theory; goal contents theory; cognitive evaluation theory; and causality orientations theory. Each mini-theory accounts for a specific aspect of how motivation works, created through iterations of empirical findings and creation of theory. While the theory is applied to the framework of human motivation, the phrasing and focus of the following explanations will be on the educational applications afforded by these theories; more abstract conceptions about individuals will instead give way to more direct discussions about teachers and students.

2.2.1 Basic Needs Theory

SDT theorizes that three basic needs underlie students’ inner motivational resources: autonomy, relatedness, and competence (Ryan & Deci, 2000). Events in the environment which support individuals’ interests, values, strivings, and needs are theorized to promote motivation originating in the self. In the same way, classroom events which are overly restrictive or out of accord with students’ internal resources may hinder motivation and engagement.

The need for autonomy can be understood beyond the idea of freedom, although this is an element. More than choice, autonomy offers students a sense of agency and volition with regard to their engagement in the classroom (Reeve & Assor, 2011). Autonomy, agency, and an internal locus of control refer to a desire to act within the individual (deCharms, 1968). In many ways, this will to act is nested within sociocultural norms and structures (Gao, 2010; Mercer, 2012). By this token, autonomy is operationalized as the need to act from within and in accordance with the self. It is a personal endorsement of the actions taken by the individual (Deci, 1975). The experience of autonomy in educational settings, beyond
simply providing choice (Katz & Assor, 2006), is nurtured through allowing a sense of personal agency and psychological freedom from coercion, where the individual makes personally meaningful and rational choices within culturally and socially appropriate boundaries (Reeve & Assor, 2011).

The second need, relatedness, represents how connected members of the group feel. As applied to educational settings, relatedness recognizes the needs of human beings as social animals to create and maintain caring interpersonal connections with others in the class (Furrer & E. A. Skinner, 2003). Teachers build the feeling that students are part of a caring group by creating interaction and developing positive in-class relationships. Both student-teacher and peer relationships have been shown to be crucial for building motivation and engagement (Klassen, Perry, & Frenzel, 2012; Cornelius-White, 2007). Without strong social connections between members of the class community, students are unlikely to engage willingly with learning materials (Martin & Dowson, 2009).

Finally, the idea of competence represents students' belief in their ability to successfully perform certain tasks. Competence refers to the belief that individuals can influence the world around them (White, 1959). As students’ skills grow over time through use and exposure, they gradually come to feel that they can be successful, and find the task worthwhile due to both ability and becoming accustomed to the task. Numerous other theories of motivation also recognize the need for competence (Bandura, 1997; Dweck & Leggett, 1988). In the language classroom, we recognize this as students’ ability to understand the environment and produce language to get a desired communicative effect (Lee et al., 2009).

By supporting students’ needs, teachers are able to build a positive learning
environment leading to motivation and engagement (Reeve, 2006). Based on the conception that these three psychological factors are necessary for personal well-being and nurturing self-direction in learning, basic needs theory recognizes that while students may be motivated without satisfying these needs, greater persistence and drive come from situations where autonomy, competence, and relatedness needs are met.

2.2.2 Organismic Integration Theory

Organismic integration theory provides a framework for explaining the intrinsic-extrinsic dialectic of motivation. In addressing the why aspect of student motivation, self-determination theory offers the following reasons as to why students may regulate their behavior. Much of this theory comes from the range of loci of control (deCharms, 1968), ranging from fully external to fully internal. An overview of this dialectic of motivations is illustrated in Figure 2.1.

Figure 2.1. A taxonomy of extrinsic to intrinsic scales of motivation. Adapted from Ryan & Deci, 2000b.

First, amotivation, or the lack of motivation, may develop from numerous sources.
Following the model laid out by Legault, Green-Demers, and Pelletier (2005), this may stem from factors such as a lack of belief in their own ability or a belief that the effort is not worth expending. This may closely parallel the idea of learned helplessness (Seligman, 1975), where people may have experienced persistent failure and thus given up the desire to make any attempt. This state may be remedied to some extent by priming through extrinsic rewards and punishments. More recent research calls into question the idea of amotivation as total lack of desire, but rather may indicate lack of ability or task value motivation, potentially mediating or moderating effect in collaboration with other motivations (Fryer, Ginns, & Walker, 2014), though this is still relatively compatible with SDT.

*Extrinsic regulation* may be best understood as the “carrot and stick” conception of motivation. Students complete tasks in order to get praise, rewards, or avoid negative consequences. Students may develop this as their primary modus operandi through overemphasis by teachers and their parents. Extrinsically regulated behavior is extremely weak, and may go extinct quickly after the rewards disappear (Deci, Koestner, & Ryan, 2001a; Deci, Ryan, & Koestner, 2001b). While rewards and punishments are not ideal as motivators, they may offer one method of reaching amotivated students and creating a “primer” for later engagement and motivation (Brophy, 2004), if used sparingly and judiciously. This type of regulation may be motivated by negative social consequences, such as the threat of being labeled or singled out, though reasons more associated with shame are associated with the next type of regulation.

*Introjected regulation* comes from a sense of “ought-to,” shame or other social pressure associated with a task. Learners may feel pressured to perform based on their parents’ aspirations or expectations set upon them by teachers and peers. This form of regulation is considered to be a form of ego-involvement (Ryan, 1982), where the person is
acting not so much for a desire to achieve or accomplish a task, but rather to maintain their own self-esteem. This might be brought about by a desire not to seem behind or incapable in the eyes of a students’ classmates, or to receive positive regard from the teacher. While not fully externally controlled in the sense that shame and pride are internally derived reactions to a situation, this is nonetheless a highly extrinsic form of motivational regulation in that it is contingent upon students’ perception of ego-threat.

Identified regulation describes how individuals perceive personal value in learning. This may present as a desire to learn for tangible or intangible future gains, such as attaining the skills necessary for a dream job or becoming part of a desired target community. This orientation focuses on the instrumental outcome that learners actively choose, and reflects the most internally regulated of the hypothesized external learning orientations. According to Brophy (2004) and Reeve (2002), it may also be the type of learning most naturally found in schools. At the same time, this does not mean that teachers should stop at these instrumental outcomes; instrumental orientations toward personal development, such as the desire to achieve a specific ability level or be of service to the larger community, have been shown to be more motivationally effective than proximal personal gains (Fryer, Ginns, & Walker, 2014). Starting by focusing on these intangible but meaningful reasons for learning, teachers may then be able to develop more internally regulated desires to learn. Within self-determination theory, values can be understood within the framework of identified regulation, wherein learners have internalized the reasons for engaging in the tasks set by the teachers, but still with some forms of extrinsic control involved. Reeve (2002) describes how identified regulation involves the understanding of the utility of the task. Brophy (2004) further emphasizes identified regulation as the appropriate orientation for teachers to emphasize in schools, as not all school activities are inherently interesting or motivating.
Integrated regulation represents the bridge between the different types of extrinsic regulation and intrinsic motivation. This form of regulation involves the process of turning identified reasons for learning into self-determined reasons for learning. By the process of exposure, regularization, and developing a sense of personal ownership for their reasons for studying, students integrate these learning orientations into their person and sense of self (Weinstein, Przybylski, & Ryan, 2013). This process is often difficult to measure in school and educational settings, being more evident through indirect experimental conditions and laboratory settings (e.g., Lee & Reeve, 2012). This form of regulation is where the activity in question has become part of the learner’s identity and daily behavior, much as how some students may grow to feel comfortable with the regularity of school and agree with the goals of learning in classrooms, but still enjoy the freedom of summer vacation.

The final stage is a developed internal or intrinsic regulation, fueled by self-determined and self-regulated intrinsic motivation. This is often characterized as task motivation “for its own sake,” where the task itself is enjoyable, meaningful, and drives the student to learn. Intrinsic motivation in learning may be characterized by perceptions that the task is stimulating, that accomplishment in and of itself is worthwhile, and that studying and knowing new things is pleasurable (Noels et al., 2000). These intrinsically motivated behaviors are the most likely to persist and demonstrate real outcomes in classroom learning (Reeve, 2002); these behaviors are also rare, fleeting, and temporary (Brophy, 2004). The inherently external nature of schools under compulsory education means that goal framing is often externalized and students’ desire for autonomy may at times be thwarted, though this does not mean that schools cannot be places that enable and develop autonomous motivation (Reeve & Assor, 2011).

Crucial to remember is that each individual regulation is not independent from the
others. Students are capable of holding multiple goals for engaging in learning simultaneously. Students may work diligently in class because it is a rule and they do not want to be scolded, but they may also recognize the value of what they learn, and at the same time enjoy the process. A notable difference in any possible scenario is that their learning may be more strongly motivated by a more autonomous, self-directed motivation, or it may be more heteronomous and guided by others.

**2.2.3 Goal Contents Theory**

Where organismic integration theory defines why people study, goal content theory defines what people work towards, very much in the frame of what motivates learners. This theory comes out of empirical findings that internally regulated goals foster positive well-being, while externally regulated goals lead to negativity (Sheldon, Ryan, Kasser, & Deci, 2004). Standing in contrast to other theories where the quantity of motivation drives learning (e.g., Eccles & Wigfield, 2002), this theory states that it is the internally regulated quality of goals that matter for learners (Vansteenkiste, Lens, & Deci, 2006). In situations where goals are set by a teacher, students are likely to feel a lower sense of satisfaction and achievement than when students achieve goals set by themselves. This has been shown in diverse contexts in both Europe (Vansteenkiste, Timmermans, Lens, Soenens, & Van den Broeck, 2008) and Asia (Fryer, Ginns, & Walker, 2014). Recognizing the internal value of students’ goals and encouraging internally regulated goal setting has a powerful effect on learning outcomes, and can provide direction for the energy behind why individuals engage.

**2.2.4 Cognitive Evaluation Theory**

Cognitive evaluation theory attempts to predict the effect of external events on internal goals, motives, and needs. This theory is used to describe how learners may be motivated. An illustration of the theoretical interaction between the individual and environment can be seen
in Figure 2.2. According to this model, teachers create a motivationally supportive environment through the use of timely feedback, judicious use of rewards, appropriate evaluation, level appropriate challenges, activities which draw student interest, and culturally appropriate expectations and interactions. Students respond to this by either engaging with the activities and material, or “turning off” and choosing to disengage. Teachers also respond to students’ displays of engagement, nurturing and supporting students who are responsive and adopting more controlling and commanding instructional styles (E. A. Skinner & Belmont, 1993). This interaction informs the theory of how teachers’ behaviors, attitudes, and choices may influence students’ learning motivation.

Building on the concepts presented in basic needs theory, goal orientations theory, and organismic integration theory, the diagram in Figure 2.2 shows how experiences may influence the satisfaction of the three needs and damage or increase intrinsic motivation within the SDT framework. Classroom experiences may be interpreted as need-thwarting or
supportive according to the emphasis given by the teacher. Teachers may focus students toward a single desired behavioral outcome using a controlling aspect, or may focus on providing students with the resources to make decisions on their own by focusing on autonomy-support. Accordingly, controlling commands and evaluative assessment may damage students’ feelings of intrinsic motivation (Reeve & Jang, 2006). On the opposite side, teacher behaviors such as positive feedback, focusing on relevance and rationales (Assor, Kaplan, & Roth, 2002), and encouragement (Reeve & Jang, 2006) support students’ feelings of competence and autonomy.

One note should be made here regarding the exact nature of what comprises autonomy-support. As described by Reeve (2012), “autonomy-support is whatever a teacher says and does during instruction to facilitate students’ perceptions of autonomy and experiences of psychological need satisfaction” (p. 167). Integrated with the theory of basic need satisfaction, this definition allows for broad interpretation across cultures while retaining the essential underlying conception. As will be discussed later in a section on autonomy-support and structure, as well as in Chapter 3, how teachers support their learners in socially and culturally acceptable fashion may differ across contexts, but generally reflects the underlying framework for how self-determined motivation may be nurtured (Chirkov, 2009).

2.2.5 Causality Orientations Theory

The final mini-theory of self-determination theory looks at where learners derive their sources of motivation. This surface level individual difference describes whether learners are oriented towards having an internal or external locus of control (deCharms, 1968). Some learners are more comfortable with an external locus of control (Deci & Ryan, 1985), and therefore may prefer to allow decisions to be made for them, rather than making their own
decisions. They may feel that another person is more qualified or capable to handle the decision-making, or they may be socialized to believe that this is more appropriate. By allowing others to make their decisions for them, they are endorsing a more extrinsic mode of operation. These learners may feel more satisfied at times when their motivation is regulated and structured by others, and may, seemingly contradictorily, feel that their sense of autonomy is being thwarted when they are forced to make independent decisions.

Through developmental experiences, others may recognize their capacity for agency and desire to act for themselves. These learners are likely to want more active control over their decisions, and their personalities will be oriented toward satisfying their personal agency. Where a learner with a more controlled causality orientation would accept more external guidance, a more autonomous causal orientation would prompt the learner to want to take on more of the burden of decision making and exercise of control themselves. They will likewise feel frustrated when they are not granted the degree of personal causality that they might otherwise desire.

This final mini-theory is likely the least well researched, but offers numerous explanatory possibilities, including potential reasons for some of the notable intercultural differences in learners and their perceived desire for greater or lesser independence in decision making (Iyengar & Lepper, 1999; Oishi, 2001). By willingly giving over control to another, learners may still be acting in accordance with their own internal desires.

2.2.6 Autonomy-Support and Structure in Education

As outlined in the discussion of cognitive evaluation theory, teachers may motivate their students by supporting students’ basic needs. Within this framework, supporting learners’ needs for autonomy, competence, and relatedness will lead to internally regulated motivation,
characterized by greater willingness to engage, persistence, and positive affect for learning activities (Ryan & Deci, 2002). It is ultimately motivation that develops from the satisfaction of these basic psychological needs which produces these effects, and across cultural settings, teachers’ support for students’ autonomy has previously been shown as a robust predictor of motivation (Ryan & Grolnick, 1986), engagement (E. A. Skinner, Kindermann, & Furrer, 2009), and achievement (Jang, Kim, & Reeve, 2012; Jang, Reeve, Ryan, & Kim, 2009). Autonomy-Supportive classrooms build students’ desire to participate willingly by addressing interests and preferences while also giving understandable reasons for why some inclinations may not be feasible (Reeve & Assor, 2011). Much of this work reflects factors previously documented in the practitioner-oriented literature on how classroom management positively influences on-task behavior and educational success (Brophy & Evertson, 1976; Good & Brophy, 2008).

Using this model, Skinner and her colleagues (E. A. Skinner et al., 2009; E. A. Skinner & Belmont, 1993; E. A. Skinner et al., 2008) have documented how teachers’ practices, interactions, and relations have influenced students. This process, called the self-system model of motivational development (SSMMD), has shown a positive reciprocal relationship between elementary and junior high school students’ perceptions of their learning environment and their teachers’ behaviors. According to these findings, teachers’ behaviors were more autonomy-supportive towards students they perceived to be more engaged, and more controlling towards less engaged students (E. A. Skinner & Belmont, 1993). Likewise, teachers’ autonomy-supportive behaviors during the fall semester were shown to positively predict engagement and negatively predict disaffection during the spring semester, with autonomy, competence, and relatedness need satisfaction demonstrating a similar mediating effect (E. A. Skinner et al., 2008).
The model put forth according to this research, summarized in Figure 2.3, represents an important step towards conceptualizing and representing the motivational processes used in classrooms (Dörnyei, 2000). In this model, the learning environment and teacher influence the student, who interprets the teachers’ behaviors as need supportive or thwarting and engages with the material as a result. From this engagement, students then learn and achieve mastery of the material. As a result of the students’ engagement and learning, teachers reciprocate their own interactions by providing either greater autonomy-support and clarity or, in negative cases, increasing controlling or coercive behaviors. This model is similar to the 3P model (Biggs & Telfer, 1987), where Presage, Process, and Products interact to show change over time.

Figure 2.3. The self-system model of motivational development—SSMMD. From Skinner et al., 2008.

In looking at the practices of autonomy-supportive teachers, Reeve, Jang, and their colleagues (Reeve & Jang, 2006; Reeve, Jang, Carrell, Jeon, & Barch, 2004; Reeve, Jang,
Hardre, & Omura, 2002) have similarly shown the importance of how and what teachers say to satisfy students’ need for autonomy, even during uninteresting tasks (Jang, 2008). Teachers who are able to provide rationales and relevance show students the value of what they learn (Assor, Kaplan, & Roth, 2002), and thus improve the likelihood that they will persist at the task. Likewise, more psychologically controlling behaviors similarly increase students’ negative emotions and lack of engagement (Assor, Kaplan, Kanat-Maymon, & Roth, 2005), as would be similarly predicted by the SSMMD.

Connected to the idea of providing relevance, culturally appropriate levels of choice, and draw interest, structure has been conceptualized as how teachers clearly and authoritatively lead classes toward learning goals. Observing teacher-student classroom interactions in U.S. high schools, Jang and her colleagues (Jang, Reeve, & Deci, 2010) rated teachers’ structure in terms of clarity, guidance, and feedback and considered these factors in terms of students’ collective behavior. The results indicated that autonomy-support and structure were positively correlated, with hierarchical linear modeling demonstrating a linear relationship between autonomy-support and structure and students’ behavioral engagement. Other investigations into autonomy-support and structure in American and European secondary schools have shown a positive relationship with students’ self-regulated learning behaviors (Sierens, Vansteenkiste, Goossens, Soenens, & Dochy, 2010; Vansteenkiste et al., 2012), engagement and belief in school value (Wang & Holcombe, 2010), and development of subject matter related interest (Kunter, Baumert, & Köller, 2007).

In many ways, the above theoretical and empirical conceptions of autonomy-support and structure coincide with the practice oriented ideas of helping students to find value in school subjects through interest and real life application (Brophy, 2008; 2009) and proactive programs for classroom management (Good & Brophy, 2008). Accordingly, it is ultimately
through interweaving positive organizational and affective variables associated with school instruction that teachers promote students’ positive feelings for their school subjects, even when intrinsic task motivation may fail (Brophy, 2004, p. 11). Further, the applied educational-motivational theory of motivation to learn (Brophy, 2004; Stipek, 2002) mirrors much of the discussion on self-directed learning motivation in self-determination theory, especially with regard to descriptions of identified-integrated regulations and the development of value for the task and identity as learners.

Discussions of promoting interest and value for what is taught in schools parallels the ideas of autonomy-support, providing students with an internal locus of control and a sense of personal investment in their learning by convincing them that their schoolwork is constructive and personally worthwhile. Likewise, the goal of education in the context of lifelong learning is the promotion of self-directed and self-sustaining learning (Hattie, 2009), and thus self-determination theory may help to show how to direct learners toward greater educational achievement.

2.2.7 Self-Determined Motivation in Foreign Language Learning

Specific SDT-oriented research in second-language learning has shown similar results to those indicated in general educational studies. Initially, the different motivational regulations indicated by organismic integration theory were found to relate to university learners’ sense of free choice, desire for knowledge, and interest in travel and intercultural friendships (Noels, Pelletier, Clemént, & Vallerand, 2000). A later study (Noels, 2001) found that Gardner and Lamberts’ (1959) integrative versus instrumental orientations for foreign language learning broadly overlaps in terms of items and orientation.

Looking specifically at studies conducted in Japan, a study of Japanese high school
students, students’ competence and relatedness need satisfaction had the strongest effect on more intrinsic forms of motivation, and related negatively to extrinsic regulations (Hiromori, 2003). Using structural equation modeling and survey instruments, strong effects for relatedness and competence were found on intrinsic and introjected regulations. While autonomy and competence were found to correlate highly (> .5), no direct effects from autonomy were found on any of the latent variables. In a later study, Hiromori (2006) found that primarily extrinsically regulated university students could be scaffolded toward more intrinsic motivation through an autonomy-supportive teaching intervention during the course of a semester-long writing course.

Recent research involving Japanese elementary students has shown a positive correlation between autonomy, relatedness, and competence and more intrinsic motivations. Carreira (2012) found that, prior to the implementation of the new foreign language activities curriculum, elementary school students recognized the intrinsic, identified, introjected, and extrinsic regulations from organismic integration theory as three factors, based on exploratory methods. She titled these intrinsic, identified-introjected, and extrinsic, based on the semi-simplex structure of her data. While psychological needs showed the strongest correlation with intrinsic motivation, students in this study were also broadly more extrinsically motivated.

In a later study, Carreira and colleagues (2013) also found that need satisfaction could influence intrinsic motivation. Using path modeling, this study found that teachers’ autonomy-supportive instruction positively influenced need satisfaction, as well as showing a mediated direct effect on intrinsic foreign language motivation. While this research indicated appropriate results, the variables treated were not fully latent, and therefore had lost the majority of the variance and error terms that would normally be associated with the directly
assessed items. As latent factors cannot be directly assessed, the variance and item errors of the indicators were lost due to compression of the items to mean values. These issues call for a reinvestigation of the research using similar instruments but with a fully latent approach in order to more appropriately verify the theory.

Looking at need satisfaction and development of intrinsic motivation, Nishida (Nishida & Yashima, 2010) showed how project-based learning could be used to promote self-regulated foreign language motivation. Using educational drama, students rehearsed and performed a play in English. This study made use of models similar to those used by Carreira and her colleagues (2013), also finding a relationship between the intercorrelated basic needs, intrinsic motives, and students’ willingness to communicate. Nishida’s model maintained the variance of the indicators through latent modeling, and for this reason may provide a slightly more accurate picture.

The above-mentioned studies in Japanese elementary schools must be considered in light of the fact that the data were gathered before the implementation of the new curriculum (MEXT, 2008a) during a period of experimentation with the curriculum. Considering the strength of their models, the findings presented by Nishida, Carreira, and their colleagues are likely still valid, though some of the changes and issues to be discussed in the following Chapter also have likely changed certain elements of how students perceive and process foreign language study in schools, including the normalization of English in the school environment and how and what teachers do to provide a supportive environment under the new course of study.

Research from outside of the Japanese foreign language context has also investigated pre-elementary children studying in private language classes (Wu, 2003). Using an
experimental observational comparison of two groups of learners, the study investigated the features of classes for young learners. The control group received a less interactive and independent sequence of activities, while the experimental group received a more interactive and formative approach to instruction. It should be noted that in both samples, teachers were central in organizing and directing class action due to the age and language ability levels of the students. This study showed that the use of routines, appropriate challenges, feedback, and support from the instructor promoted self-determined motivation for foreign language learning. Most important among these variables, by scaffolding classes with a greater number and variety of standardized activities, teachers were able to provide a predictable learning environment, and therefore create a sense of security that may be necessary to motivate students (Good & Brophy, 2008).

Other SDT-oriented research in China by Butler (2014) looked at how students’ social environments influenced their motivation to learn foreign languages among children. Looking at learners in 4th, 6th, and 8th grades, this study assessed the relationship between parental attitudes, students’ internal beliefs, and outcomes on a standardized proficiency test. Among younger learners, parents’ perceived outlook and orientations toward school and foreign language learning showed greater influence on learning outcomes and motivation, though this was not perceived as negative top-down control. Older learners showed a desire for increased autonomy, and in this situation parents’ values were at times perceived as negatively controlling. One interesting finding showed that among all of the learning groups, intrinsic and extrinsic motivation were positively correlated in this sample, showing some indication that students in Confucian-collectivist samples may perceive some motivation slightly differently from those in western environments.

Looking specifically at the motivational environment created by the teacher, Noels
and colleagues found that the teachers’ autonomy-supportive, informative communication style was positively correlated with more motivated student attitudes, while more controlling teacher behaviors were associated with feelings of helplessness and disconnect between students’ efforts and outcomes (Noels, Clemen\'t, \& Pelletier, 1999). Later studies showed that controlling behaviors similarly thwarted autonomy self-perceptions, while more informative feedback and growth-oriented interactions improved competence perceptions (Noels, 2003).

While these studies show a general trend toward of positive evidence for self-determination theory, they are not free of methodological flaws preventing more complete theoretical validation. One of the primary flaws comes from the fact that, with the notable exception of Wu (2003), the majority involve single sample cross-sectional investigations, and thus are subject to changes both over time and between groups. Without appropriate statistical and methodological steps to account for how these motivations may influence behavior over time, true causality cannot safely be inferred from the studies, even with the use of structural equation models (Kline, 2011). Further, aside from the work by Butler (2014), these studies have often involved primarily intra-psychic phenomena, meaning that they exist solely in the head of the individual. All changes are documented based on self-report, and thus may have questionable validity. Without an external validation of the instruments, be it through observed behavior, teacher grades, or standardized test scores, very little can be said about the actual outcomes of students’ self-reported motivation.

### 2.3 Engagement

As indicated in the previous discussion in this Chapter a great deal of attention has been given to why people learn, but less attention has been given to the what, when, and how they learn. While the underlying causal reason behind students’ behavior is crucial to comprehend, it is just as important to recognize the behavior itself as important. Without reducing
engagement to a set of pure stimulus-response actions carried as in behaviorist theory (e.g., B.F. Skinner, 1945), modern theories of engagement seek to understand the process within the person during the stage where they act.

To distinguish motivation from engagement, many theorists have drawn a line between the underlying psychological process and the degree to which people are involved in an activity:

Motivation is about energy and direction, the reasons for behavior, why we do what we do. Engagement describes energy in action, the connection between person and activity (Russell, Ainley, & Frydenberg, 2005, p. 1).

While motivation may be understood as the invisible, conscious, and subconscious desires that regulate learners’ behavior, engagement may be understood as the measurable signs of cognitive and emotional activation, evidenced students’ active participation and visible enjoyment of the learning process (Reeve, 2012). When teachers talk about their desire to motivate their students, what they are likely discussing is the desire to help students actively engage. According to Ainley (2004), motivation is specific to the individual student, while engagement occurs at the intersection of the student and classroom situation, much as in Lewin’s formulation of behavior as a function of the person’s perception and the environment (Lewin et al., 1944).

Engagement represents a temporary but tangible outcome state where learners are working with the learning material, solving problems, actively memorizing, and processing items and concepts. Engagement in school has received increasing attention over the past decade, primarily since the publication of a major paper by Fredricks, Blumenfeld, and Paris (2004). This work presented engagement as a multifaceted, multidimensional construct involving all aspects of how students’ energy takes form in learning tasks. Based on the seminal theses herein, engagement should be conceptualized and measured in terms of
students’ behavior, affect / emotions, and cognition, all looking at how students invest and commit to the learning task.

*Behavioral engagement* is the most visible to external observation, and describes how students interact in the classroom. Behaviorally engaged students pay attention, listen carefully, and work to complete classroom tasks. This conception of engagement most closely resembles previously used concepts of *motivated behavior* (Nakata, 2006; Guilloteaux & Dörnyei, 2008). In many ways, this aspect of engagement is the one that most concerns teachers, and is positively influenced to the greatest extent by classroom procedures and methods for promoting on-task behavior (Brophy & Evertson, 1976).

*Emotional engagement* also has external manifestations, but may also be internal. An emotionally engaged student enjoys the learning materials, finds pleasure in the tasks, and does not suffer negative affect. This may stem from students’ interest in the task itself, or in features of the material (Ainley & Ainley, 2011). Emotional engagement reflects the image of the “bright-eyed, smiling student,” and may spring from the environment created by the teacher (Stipek, 2002). It is this feature of classes that teachers seek to bring out by making classrooms bright and enjoyable places (Kim & Schallert, 2014).

*Cognitive engagement* refers to how students actively think about the learning material by puzzling out meanings, making connections, solving problems, committing concepts to memory, and answering questions. This process occurs entirely in the students’ own heads, and thus is not visible to outside observation, but may be inferred through completion of tasks and activities. This type of engagement is also broadly contiguous with metacognitive self-regulation (Zimmerman & Cleary, 2006). This aspect of motivation overlaps with behavior in its focus on effort and mental investment, but expands to
encompass both strategies and hard work expended on learning tasks (Fredrick, Blumenfeld, & Paris, 2004).

Finally, a new form of engagement, agentic engagement, refers to how learners make the learning environment their own (Reeve, 2013). Agentically engaged students ask questions and request clarification, as well as actively planning their learning and making contributions to the overall learning environment (e.g., helping others, attempting to smooth the flow of the lesson, etc.). While agentic engagement also shows crossover with behavior (Reeve & Tseng, 2011), it seems to also be considered a distinct process applied by relatively mature learners.

Engagement may take numerous forms in the terminology, but all refer back to the same overlapping set of constructs outlined above (Fredricks, Blumenfeld, & Paris, 2004). Some discussions have used the term effort (Tollefson, 2000) and self-regulated learning (Zimmerman, 1989), while others refer to on-task or motivated behavior (Guilloteaux & Dörnyei, 2008; Huang, 2011; Brophy & Evertson, 1976), while still others talk about enjoyment during the lesson (Dörnyei & Csizér, 1998). Recognizing differences in terminology, the concept has been studied for quite a long time in education, with many interchangeable terms used. Accepting this multitude of terminology, research has found a number of important correlates with student engagement.

Many models of engagement assume a reciprocal relationship between the person, their environment, and their behavior (E. A. Skinner & Belmont, 1993; E. A. Skinner et al., 2008). This theory takes on Lewin’s conception of how a person perceives his or her environment informs their behavior (Lewin et al., 1944), summarized in the formula Behavior = function (Perception, Environment), or B = f (P, E). In schools, students react to
the emotional and cognitive stimuli in their environment, interpreting their perceptions and acting accordingly. They draw on their own values, motivations, and beliefs, which color their perceptions of the environment (Weiner, 1986; Vansteenkiste, Lens & Deci, 2006; Vansteenkiste et al. 2008). They see how their peer group acts and use this as a point of reference for their own action (Tversky & Kahnemann, 1978). They interact with their teachers and choose how to act based on those interactions and their relationship with the teacher (Cornelius-White, 2007). Thus, engagement must ultimately be considered the dynamic endpoint at the intersection of the person and environment, with each factor reciprocally influencing the others.

Some researchers have shown that teacher enthusiasm may help students to better engage and work hard on their learning tasks (Bettencourt et al., 1983). Other research has discussed the importance of clear teacher expectations on students’ in-class behavior (Brophy & Good, 1970; Rubie-Davies, Hattie, & Hamilton, 2006). Work has also shown that greater internalization of individual control will lead to better personal investment and engagement (E. A. Skinner, 1996). Finally, how classroom tasks are formulated and presented influences student performance on those tasks (Marks, 2000). In the end, these studies all deal very much with the same concept: students taking direct action toward an intended learning goal, assisted and guided by the teacher. Thus, use of the terms and ideas brought by engagement stand in a clear continuum of research, and its use moving forward offers a concise but accurate description of one part of the learning process.

Engagement has a number of advantages over motivation as a subject of interest. First, teachers and students alike readily and quickly recognize the concept, and teachers’ subjective evaluation often matches students’ report of their individual engagement (Lee & Reeve, 2012). This is unfortunately not true for motivation, which gives engagement an
advantage when applying psychological theory to education. Likewise, a currently prevailing theory of learning suggests that in order to learn, students must think about and interact with learning material (Willingham, 2009). Engaging with learning material cognitively, behaviorally, and emotionally, students are more likely to learn, and therefore develop a greater sense of achievement, thus contributing to the development of motivation. Finally, as engagement maps the visible outcome of motivation, it sidesteps many of the traditional debates on why and how people become motivated (cf. Vansteenkiste et al., 2008; Tollefson, 2000; Eccles, 2009).

As engagement is externally visible and verifiable, it may be safely considered when integrating it with existing models, assuming validity and strength of the instrument used. Thus, it has also been applied to numerous theories of motivation in a flexible fashion (Ainley & Ainley, 2011; E. A. Skinner, Kindermann, & Furrer, 2009; Wang & Eccles, 2011; etc.). While the current formulation of engagement has not yet been directly applied to language learning theories of motivation, it closely mirrors previous discussions (e.g., Nakata, 2006; Guilloteaux & Dörnyei, 2008). Investigating student engagement as a flexible, dynamic, and nuanced step in the motivational process may demonstrate how internal motives and external influences in the environment lead to action and learning in the classroom.

While the major concepts of SDT and engagement have been studied within the realm of general education, the school-based contextual and psychological factors that influence student engagement have not been investigated with regard to second language studies. Considering the impact and positive benefits of both self-determination and engagement theories in first language settings, expanding further into studies of motivation in second language acquisition should offer both evidence for the universality of the theory as well as
demonstrate concrete benefits for foreign language teachers.

2.4 Language Learning and Motivational Theories

2.4.1 Integrativeness and Instrumentality in Foreign Language Learning

In one of the first psychological studies to hypothesize a dichotomous-dialectic framework for motivation, Gardner and Lambert (1959) described how learners of French in Canada with a stronger orientation toward the French-speaking community and strong linguistic aptitude were more likely to show achievement gains. This framework focused on what was titled **integrative orientation** towards the language community, characterized by the desire to meet and interact with speakers of the language; and **instrumental orientation**, characterized by a desire for the tangible or financial benefits that foreign language learning may bring about (e.g., increased work opportunities). Findings from factor analysis procedures indicated that a stronger integrative orientation, attitudes toward foreign language, motivation, and achievement all loaded together in a relatively coherent pattern. This study should further be noted for its use of factor analysis, a statistical technique that would not be widely used for several decades.

This study gave way to the formation of a theory of social-cultural orientation as motive in foreign language learning (Gardner, 1985). Attitudes toward the foreign language and its social community have been used to explain foreign language achievement among college-age learners, fully mediated through other psychological variables such as competence beliefs, engagement, goals, and self-directed desire to learn the language (Tremblay & Gardner, 1995). At the same time, attitudes toward the new language community have been discussed as only one of a number of individual differences in the psychology of language learning (Dörnyei, 2005).
Integrative and instrumental orientations are likely not dichotomous or mutually exclusive, as many learners may consider themselves as having both (Gardner, 1985). Both integrativeness and instrumentality have been shown to contribute to language learning motivation (C. Baker, 1992; Gardner & Tremblay, 1994; Schmidt & Watanabe, 2001). Instrumental goals and reasons for studying have likewise been indicated to be motivating factors for students in many international contexts (Gardner & Lambert, 1972; Fryer et al., 2014). Considering the general poverty of potential for interaction with the language community in foreign language settings, integrativeness and international mindset may not always be a strongly salient feature (Lamb, 2004). Consideration for the changes in the modern world must also be taken when leveling criticism at the theory; the internet and communication technology has improved dramatically in even the past decade, making foreign cultures and language communities far less distant than they once were (Darling-Hammond, 2010). Additionally, the perspective of English as a lingua franca (ELF; Baker, 2009) presents the idea of English as a language of international communication, independent of a specific national culture, and thus may alter the way learners perceive integrative orientations.

The integrative/instrumental model of reasons for foreign language learning, while not complete, may be seen as broadly similar to self-determination theory’s organismic integration model of differing internal and external regulations. Work within both frameworks has been shown as overlapping and somewhat compatible (Noels, 2001), especially considering the notion that people can have multiple motivations of varying strengths under the self-determination theory paradigm (Ryan & Deci, 2002). What the theory contributes is the need to consider the value learners assign to the foreign language community when investigating the social and psychological variables relevant to language
2.4.2 L2-selves Theory

Coming out of Gardner’s theory of integrativeness toward the new language community, Zoltán Dörnyei’s (2005) theory of the L2 Self System came about as a way to explain motivation in communities with little or no interaction with native speakers. Especially in countries such as those in Asia and Eastern Europe, language learners are unlikely to have contact with the target language community. In light of this, a model of the self as becoming a competent language user was created based on the theories of possible selves (Markus & Nurius, 1986) and self-discrepancy (Higgins, 1987).

Comprised of two major motives, the Ideal Self and the Ought-to Self, L2-selves theory attempts to show how learners motivate themselves through language activities and social comparisons. A standard item used for ideal L2-selves is “I can imagine myself speaking English as if I were a native speaker of English,” while an ought-to L2-self is represented by “Learning English is necessary because people surrounding me expect me to do so.” These are often modeled against the outcome variable of intended effort, describing an intention or desire to act. This variable is characterized by statements such as “I am prepared to expend a lot of effort in learning English” (Papi, 2010). These variables are used as a measure of self-reported attitudes toward foreign language learning.

The L2-selves theory ultimately retraces much of the groundwork laid by self-determination theory, with the concept of the ought-to self roughly parallel to introjected regulation as described in organismic integration theory. The majority of the standard items used bear a heavy similarity to existing motivational theories. Likewise, ideal L2-selves shows strong conceptual overlap with the idea of identified and intrinsic regulations. The
theory also has no clear mechanism for the process of changing learners from a stronger ought-to self to ideal self as it does not theorize a dialectic scale, nor does it sufficiently cover aspects of environmental interaction, integration and internalization of behavioral functioning, or intrinsic/extrinsic functioning.

Finally, the conception of engagement in this model is represented by intended effort, a fundamentally intra-psychic phenomena, that has not, to date, been tested with regard to any externally measured learning outcomes in the published literature. In short, important phenomena necessary for modeling high level psychological functioning, such as value perceptions and environmental considerations, are conspicuously absent from the theory of L2-selves, making it of questionable value for explaining motivation for language learning.

2.4.3 Willingness to Communicate in a New Language

Similar to both motivation and engagement, willingness to communicate represents the step between wherein learners make the active choice to engage in communication (MacIntyre, Clemént, Dörnyei, & Noels, 1998). Much of this work has been tied to conceptualizing a positive opposite of negative emotions such as anxiety surrounding the act of speaking and communication (MacIntyre, Baker, Clemént, & Donovan, 2002). As speaking and output have been shown to be crucial in the acquisition of language (Swain & Lapkin, 2000), facilitating learners’ communication skills and autonomous engagement is indeed an important factor in promoting language learning (MacIntyre, Baker, Clemént, & Donovan, 2003). Further, research in the Japanese context has shown that by increasing contact with foreign cultures, students show decreased anxiety, increased willingness to communicate, and greater communication behaviors (Yashima, 2002; Yashima, Zenuk-Nishide, & Shimizu, 2004). This follows with the theories promulgated by both Gardner (1985) and Nakata (2006), where an international/cross-cultural orientation facilitates language learning.
However, the theory also retraces significant theoretical ground already covered by SDT’s autonomy need satisfaction, as willingness is an essential and inherent part of the concept of an autonomous motivation.

### 2.4.4 Motivation to Learn a Foreign Language

Similar to the framework defined by Brophy (2004), intrinsic foreign language motivation in Japan may likewise be characterized by differing levels and orientations (Nakata, 2006). These differing levels, a surface level state-like motivation and a deeper trait-like level of motivation, may be characterized by differing degrees of autonomous engagement with the foreign language. Noting these different levels and how they were reached among adult learners, with some moving from the surface to deeper levels of intrinsic desire to learn, two features are clear within this framework of intrinsic motivation: 1) The internalization of different intrinsic desires to learn a foreign language come from experiences in which our behavior is mediated through others, as noted by Brophy (2004, p. 259); and 2) These desires indicate a shift in the perceived value of the activity from an external or environmental precursor to an internal one, another idea compatible with the SDT position on integrated regulation (Ryan & Deci, 2002) and the process of integrative functioning (Weinstein et al., 2013).

Motivation to learn and the process of providing students with motivation can be understood within the framework of self-determination theory as moving students away from amotivation and extrinsic regulation towards more autonomous forms of motivation, just as in SDT (Brophy, 2004; Reeve, 2002). According to this framework, students’ identified regulation for school learning can be built by through fresh experiences that appeal to the values, relevance, reasons, and deeper needs of the individual. Above and beyond the idea of autonomy and providing students with the opportunity for initiative, students also need
teachers who will give them good reasons and understanding of the importance of their learning (Brophy, 2008; 2009). Within the motivation to learn framework emphasized by Brophy (2004) and Stipek (2002), teachers need to show students that what they learn is useful and valuable to them as people in order to help students independently and willingly engage with the material.

This then is compatible with the research in self-determination theory, wherein providing reasons and a clear framework for action has motivating effects for students (Assor, Kaplan, & Roth, 2002; Katz & Assor, 2006; Reeve & Halusic, 2009; Reeve & Tseng, 2011; Reeve, Jang, Hardre, & Omura, 2002). These results are often quite broadly framed within the topic of autonomy but perhaps more accurately titled relevance and connected with other theories involving achievement. Indeed, one study conducted by Assor and colleagues (2002) found that for students in elementary school grades, the strongest predictor of positive affect for the subject matter and behavioral and cognitive engagement was the idea of fostering relevance for the subject matter.

As discussed above, SDT offers a broad framework for the interpretation of motivation. The myriad other motivational theories offer a clear foundation for the interpretation of the phenomenon that they were designed to address, from how students perceive foreign cultures to their expectations of task success. Most specifically, language learning motivation theories often work from the basic assumption that language, as a basic tool of cognitive functioning, are fundamentally different from other subjects and other learning, and therefore require their own theories of motivation as well.

This assumption is problematic at a very basic level. While it correctly addresses the notion that languages are used as tools designating group insiders and outsiders (Kachru, 1998), the idea that other subjects do not carry with it the capacity to define group members,
is inherently flawed. Many bodies of knowledge have their own dedicated communities with
gatekeeper practices to exclude non-members (Wenger, 1998). Likewise, members of a
professional community may be fundamentally changed by membership in that group, and
may find it difficult to return to their former social groups. An example would be a child who
grows up on a farm but studies to become a doctor in the city. She may be able to use her
knowledge to benefit her former community, but her work and changes in social environment
may just as easily make her an outsider there as much as her farm background make her an
outsider among the community of wealthy physicians.

Likewise, some evidence exists for the idea of differences in subject matter
proficiency, but the origins of this are similarly murky. There is strong evidence for a
difference between self-concept for mathematics and one’s own language (Marsh, 1986),
though this finding also shows that achievement in mathematics and language are highly
correlated. This aligns with empirical evidence that language ability is significantly related to
mathematics (Aiken, 1978) and the theory that both are regulated by underlying deep mental
processing (Pinker, 1995). It is very rare to find an individual who is skilled at one but
completely lacks any ability in any other—exceedingly few people complete school with the
ability to solve complex equations but no ability to write a paragraph, and students who are
able to converse in a foreign language likely have mastered most essential mathematical
skills. More recent studies show that mathematics, own language, and foreign language
achievement are also highly correlated (all > .6, Xu et al., 2013).

Further, ability in one’s own language relates to ability in a foreign language (Skehan,
1990). More recent research has shown a strong genetic component to both reading and
mathematical ability (Davis et al., 2014), indicating that if own language ability is predictive
of second language acquisition, to some extent mathematical ability is as well. As both first
and second language acquisition may be broadly modeled on a number of basic cognitive abilities broadly related to IQ (Carroll, 1981; Vulchanova et al., 2014; Frost, Siegelman, Narkiss, & Afek, 2013), much of the argument for cognitive differences between foreign language motivation and learning motivation cannot stand. Recognizing then that language as a cognitive process differs little from other subjects, the rational decision must be to use the broadest framework with the greatest explanatory power and ability to integrate new theoretical elements. Considered in addition to the fact that many of the theories retrace extremely similar ground, attempting to formulate a new theoretical foundation for how language motivation works within a specific context appears needless. Further, it lacks a sense of parsimony, and may create excess confusion for practitioners attempting to apply theory.

Finally, language learners in schools are first and foremost students in the classroom environment, and language learners solely by dint of their enrollment in the school system. There is significant evidence for a general sense of self-concept related to academic ability (Marsh et al., 2014). While school-based domain specific motivations exist and develop early (Guay et al., 2010), these motivations are framed within the larger concept of academic motivation and self-concept (Carreira, 2011; Marsh & Martin, 2011). While building positive self-directed learning orientations and an international mindset are important for lifelong motivation and achievement (Fryer, Ginns, & Walker, 2014; Yashima, Zenuk-Nishide, & Shimizu, 2004), these factors must also be recognized along with the more proximal and perhaps more salient features of satisfying or thwarting experiences provided by the classroom experience. Thus, while recognizing that foreign-language domain specific affect, interests, and ability perceptions exist, they must also be considered as somewhat inseparable from the general sense of academic ability that develops as children spend time in schools.
While grand theories have indeed shown strong ability to interpret phenomena, the stronger walls between many of the major theories and their proponents are slowly eroding (cf. Wang & Eccles, 2013). As this paradigm shifts as well, theories of motivation, foreign language, education, and learning will hopefully gradually move towards empirical consensus and integration. Thus, for the time, self-determination theory offers the greatest internal consistency and least necessity for additional moving parts to explain motivation.

2.5 Theories of Learning Relating to Motivation

While self-determination theory provides a clear framework for hypothesis testing, measurement, and outcomes with regard to motivation, as well as a theory for how learners develop and internalize the desire to perform specific behaviors, it lacks a sense of the process for how skill and informational learning occurs. In order to address these highly salient features of school-based learning, aspects of another major psychological theory may offer a clear mechanism for how learning happens within a social environment. Social cognitive theory presents such a perspective.

Social cognitive theory was developed by Albert Bandura in the 1970s and 80s based on decades of empirical research (Bandura, 1986). As a complete theory of learning and development, this theory also includes a motivational construct in the form of agency and self-efficacy, both with robust bodies of research (see Bandura, 1997). At the same time, as mentioned above, sense of agency and internal locus of control is well-defined and operationalized within self-determination theory. SDT further offers a number of specific and well-recognized concepts, such as the intrinsic-extrinsic dialectical framework and comprehensible model of motivational processes in the classroom. Further, as social cognitive theory as a motivational model adopts a wholly quantitative model of goal setting
and goal attainment, it fails to account for the internal versus external quality of goals. As the primary focus in this thesis is on generalized theory of motivational development within the context of school language learning, the prudent decision is thus to focus on the more robust motivational theory and integrate necessary elements.

While recognizing these issues, one of the major features of this social cognitive theory provides a mechanism for how people learn based on modeling and social interaction. One of the primary ways children learn is through the process of observation and imitation (Bandura, 1986). After watching a human model perform tasks in a certain way, people then appear to understand how to perform the same task. Learning happens then through two processes: vicarious and enactive learning.

In *vicarious learning*, learners develop an understanding of task features by watching another’s performance in order to perform the task individually. This learning conception focuses on three main points:

1) Learners may use a human model as an aid to facilitate their own response. Learners may subconsciously imitate others in their environment without knowing why. Called the *Chameleon effect* (Chartrand & Bargh, 1999), this subtle but powerful drive to conform appears rooted in observational learning. Robust findings in social psychology and anthropology show that both children and adults may *overimitate* (imitate beyond the point where it is reasonably necessary) without consciously recognizing the imitation behavior (Lyons, Santos, & Keil, 2006; Lyons, Young, & Keil, 2007; Whiten, McGuigan, Marshall-Pescini, & Hopper, 2009). This effect appears to be related to the status of the model within a particular group (Chudek, Heller, Birch, & Henrich, 2011). In many situations, the model is the most visibly competent individual (Schunk, 2007, p. 94-95).

2) Learners may also use the model as a way of testing inhibitions. When the model acts in a certain way, this may anchor behaviors to a certain point
(Tversky & Kahneman, 1978; 1992) and give the observers a point of reference based on the consequences. The result of teachers’ behaviors is then an important issue, as this will enable or inhibit students’ actions subconsciously.

3) Most important is the idea of observational learning as a way to develop new and efficient ways to accomplish tasks. This theory posits that the newly learned behavior must not be one that the learner would do on their own without observing another person performing the task in a specific way. Robust findings in developmental psychology show that children use observation and imitation to develop new behaviors (Lyons, Damrosch, Lin, Macris, & Keil, 2011). Anthropological studies have indicated that chimpanzees are able to imitate tool use when modeled by another ape, indicating the mechanism for social transmission (Yamamoto, Humle, & Tanaka, 2013).

These precepts of the observable process of learning from teachers’ behaviors thus sets the role of the teacher as not only creating a positive, emotionally supportive learning environment as in SDT, but also in modeling the appropriate cognitive processes and behavioral interactions to increase the likelihood of uptake.

The second part of this formulation of learning comes through enactive learning. While vicarious learning may lead to what has previously been discussed as “latent learning,” where the ability to perform the task exists, but does not present itself (Tolman, 1949), enactive learning creates a greater likelihood that acquisition will occur. By actively using the knowledge and skills modeled, learners gain more fluent access to the behavior (Lee et al., 2009). Recognizing the crossover between the enactive aspects of language learning and the need to achieve competence with rule-based formulations of language through repeated practice (DeKeyser, 1997), modeling to facilitate student action has been shown to influence first language development (Bandura & Harris, 1966).

Following the conception that the teacher is responsible for the affective,
informational, and behavioral aspects of instruction (Good & Brophy, 2008), understanding how the teacher models these three aspects of instruction in foreign language classrooms may illustrate how and why students acquire proficiency. The theory of vicarious and enactive learning offers concrete direction on how teachers may approach language learning tasks beyond simply motivating students to act, and illustrate what teachers can do to facilitate both learning and motivation.

2.6 Modeling Behaviors in the Language Classroom

Looking at teacher behaviors and their influence on students’ engagement, an important but often neglected aspect is the frequency and affect with which teachers model the target language. The idea of learning through imitation is not a new concept, having been included as a part of learning psychology for over 100 years (see Schunk, 2007, pp. 82–88 for a comprehensive review). Based on robust empirical evidence, the social cognitive theory of human learning (Bandura, 1977; 1986) emphasizes the idea that students may learn new behaviors by imitating teachers and peers.

From general learning psychology, this theory posits a triadic interaction between people’s internal states, their behaviors, and their environment. A visual representative of this relationship is presented in Figure 2.4. Learning occurs through observing and imitating the behavior of others, most specifically models with whom the observer can identify. Empirical evidence for this theory has been shown to be robust over time, with numerous studies confirming the power of behavioral modeling to promote learning (Bandura, 1986; Schunk, 2007). One of the major findings here indicates that imitated behavior is at least partially conditioned, meaning that the more often children witness a specific behavior, the more likely they will be to emulate it (Schunk, 2007; Rosenthal & Zimmerman, 1978). Considering the importance of engagement for students’ achievement and skill development (Schunk &
Gunn, 1985; E. A. Skinner, Kinderman, & Furrer, 2009), students’ imitation of their teachers is a matter of interest to teachers wishing to promote student learning.

Figure 2.4. The triadic relationship between person, behavior, and environment.

In first language educational settings, modeling has been shown to promote positive behaviors, such as self-regulation for academic studying (Zimmerman, 1989), sustained silent reading (Methe & Hintze, 2003; Widowson, Dixon, & Moore, 1996), and moral development (Bucher, 1997). In Singapore, teacher modeling has been used to promote extensive reading for second language development (Loh, 2009). However, the social cognitive model for learning through imitation (Bandura, 1986) has not often been applied to the study of foreign language learning processes.

In reconciling SDT as a system for describing motivation and social cognitive theory as a model for the learning process, some care must be taken to notice areas in which the two theories can be used harmoniously. With the overlaps in the importance of agency-autonomy, self-efficacy/competence, and their models of how the self and environment are mediated by individuals’ behavior, the theories show a broad overlap in concepts, differing primarily in
Similar attention must also be paid with regard to the accounting for the cultural elements of Eastern culture and Western psychological theories (Markus & Kitayama, 1991). More attention will be given to the cultural features of motivation specific to Japan in Chapter 3. Recognizing that “[g]enerally speaking, autonomy-support is whatever a teacher says and does during instruction to facilitate students’ perceptions of autonomy and experiences of psychological need satisfaction” (Reeve, 2012, p. 167), self-determination theory may thus incorporate the modeling and imitation learning elements of social cognitive theory and top-down hierarchical cultural practices of Confucian-Collectivist societies to formulate a robust theory of motivation to learn in schools.

This Chapter has outlined the underlying theories of motivation, learning, and language acquisition which support the basic hypotheses for this program of research. Based on the above theoretical positions and empirical findings, I adopt the perspective that the classroom conditions created by the teacher exert a causal effect on students’ needs and engagement. In the next Chapter, I will discuss how these theories apply to and interact with the political and social realities working in Japan at this time.
As briefly discussed in Chapter 1, foreign language activities have become a compulsory part of education in Japanese elementary schools. With their widespread implementation, much attention has been paid to a variety of topics from methodology (Butler, 2007b) to the readiness of teachers to properly implement the new program (Fennelly & Luxton, 2011) to the basic intentions of the Ministry of Education (Hashimoto, 2011) to the practicality and dangers of the program outlined by the Course of Study (Tahira, 2012; Torikai, 2006). Based on these practical, political, and cultural realities, I hope to demonstrate the relevance of motivation, as well as its implications for practice under the current Course of Study. This Chapter will address the issues surrounding these criticisms and concerns, attempting to refute those without merit and allowing those with. I will then address the motivational issues covered by the Course of Study before taking account of the cultural issues surrounding autonomous motivation as a concept in Japan.

3.1 Social and Political Realities

3.1.1 Elementary School as a Motivational Environment

The overall portrait painted of elementary schools is one of humanistic self-development drawing on a powerful sense of community and strong relationships between students and teachers (Lewis, 1995). While teacher-student relationships are often vertical, they are based on a patrician model of holistic, but not arbitrary, control for the benefit of the individual within the larger group (Chen & Farh, 2010). Building on this model, teachers work together
with students to develop a sense of autonomy and integration with the community, engaging with students emotionally through literature and poetry while pushing them cognitively through a project-oriented approach to math and science (Cave, 2007). Learners in Japanese elementary schools are given strong behavioral guidance through regularized programs such as school cleaning and serving lunch to their classmates.

The underlying conception of instruction within schools is overwhelmingly humanistic (Lewis, 1995). Teachers spend large amounts of time and energy making sure that all of the 40 pupils in their classes are involved in the lesson, that all are on good social terms, and that all students recognize that their teachers care. This comes from the basic conception of education as a fundamental right for all students. While realities on the ground are not always so rosy (Kawakami, 1999), the general goals of primary education are towards raising positive and well-adjusted members of a larger society. Thanks to this approach to schools as places of personal learning, students generally reflect on their time in elementary school with positive memories (Cave, 2007).

### 3.1.2 Rationalizations for Elementary School Foreign Language Education in Japan

Since the spring of 2011, all elementary schools in Japan have included English language classes as part of their curriculum. According to the Course of Study guidelines provided by the Ministry of Education, Culture, Sports, Science, and Technology (MEXT), foreign language activities (FLA) classes are conceptualized around promoting interest in and affect for communication through the use of principles from communicative language teaching in order to build a strong motivation for active language learning (MEXT, 2008a).

Researchers and teachers in Japan for years have recognized student motivational issues in English education (Nakata, 2006). Common motivation-related concerns include
assessment and high-stakes testing (Berwick & Ross, 1989; Sakai & Kikuchi, 2009), and issues with the relationship between the national curriculum and tests (Underwood, 2012). The generally top-down nature of the Japanese education system, along with the bottom-up desire for order and predictability among members of the system (Carless, 2006; Hofstede, 1980) combine to form a series of motivational hurdles for many students in secondary education.

The Ministry of Education, in their explanation for the reasons behind the changes in the current CoS, cites an increasing need to nurture a “zest for life” and desire to learn for the purpose of lifelong education (MEXT, 2008d). The preface in each document clearly cites the need to improve learning motivation and establish study habits among young people (MEXT, 2008a, pp. 1–2; 2008b, pp. 1–2). To date, the Course of Study for English in secondary schools has presented a focus on the summative features of foreign language learning (Tahira, 2012). With the recognition that learning motivation has become a problem within Japanese education (MEXT, 2008a; 2008b; 2008c; 2008d), the Course of Study (CoS) is slowly moving from an outline of content goals towards a greater focus on processes, teaching methods, and classroom interactions influencing motivation and learning (Tahira, 2012; MEXT, 2008a; 2008b; 2008c; 2009).

Traditionally, the role of the CoS has been to determine the general direction and content of foreign language classes in Japan (Tahira, 2012). Since the 1960s, the Ministry of Education has focused on discrete testable grammar points, leading to the use of the grammar-and-translation method as the main method for language transmission (Nishino & Watanabe, 2008). Elements of this continue in the current CoS for secondary education (MEXT, 2008b; 2009), though with emphasis on the use of English as an instructional language. However, a difference can be seen with the introduction of the elementary CoS for
foreign language activities (FLA; MEXT, 2008a), specifically with the focus on the affective rather than linguistic and cognitive elements in language learning. These changes have been instituted as part of a greater effort to improve students’ desire to learn and be lifelong learners (MEXT, 2008d). By creating a strong foundation of motivation based on positive psychological principles early in students’ language learning experience, the goal of the new Course of Study is to provide students with the motivation to continue learning English in secondary school and beyond.

3.1.3 A Brief History of Foreign Language Education in Japan

Beginning in the late 1940s, the mission of language teaching in Japan was seen to a large extent as fostering sufficient English abilities to gain knowledge from the west (Tahira, 2012). For much of the history of English education in Japan, this has meant learning grammar and vocabulary in order to pass high-stakes examinations (Nishino & Watanabe, 2008), for the ultimate aim of translating documents into Japanese. For the latter half of the 20th century, the audiolingual and grammar-translation “methods” dominated foreign language teaching, with communicative ideologies introduced in the last decade.

Special attention has been given to moving away from what is perceived to be the negative use of the “yakudoku”/grammar-translation approach in secondary education (Gorsuch, 1998). Since 2000, special high school programs focusing on English have been created to improve students’ communication and to “cultivate Japanese with English abilities” (MEXT, 2003). In spite of this trend, many teachers have been quite slow to adopt methods and goals of the new curriculum (Sakui, 2004; Taguchi, 2005). Likewise, no noticeable country-wide English language ability increases have appeared as a result of these policies since the beginning of these policy changes (ETS, 2001; 2014), indicating that educational policy changes are not sufficient to prompt large scale change.
In the modern era, awareness of an increasingly globalized, increasingly flat and frictionless world has been growing, and the sphere of education is no exception (Darling-Hammond, 2010). The Ministry of Education has implemented policies for the purpose of increasing international competitiveness and assuring that Japan remains a global economic and social leader (MEXT, 2013). While a great deal of this policy has been dedicated to the idea of a “21st century skills” movement in education, such as the application of information communication technology (ICT) to the classroom and a “skills-oriented curriculum,” much of this may simply be harmful educational buzzwords which distract from real education (Christodolou, 2012; Willingham, 2009). At the same time, use of English as a lingua franca correlates with greater economic trade and success in non-English-speaking countries (Egger & Lassmann, 2012). As such, there is a strong push towards concrete gains in students’ foreign language abilities.

While the current political direction indicates a move towards increasing foreign language education and the institution of elementary English as a subject matter (MEXT, 2014), discussions beyond recognizing and documenting these trends are outside of the scope of this Chapter, indeed this dissertation. Instead, in this Chapter I focus on the broad trends and commentary to date regarding the implementation of foreign language classes in elementary schools. I will then discuss how current policies for implementing foreign language activities in elementary schools may be oriented towards promoting autonomous motivation within the framework of self-determination theory.

3.1.4 Positive Cross-National Evidence for Elementary School Foreign Language Education

Cross-national evidence shows broad general support for early language learning (Enever, 2011), and has shown no plausible threat to the acquisition of students’ own language
(Johnstone, 2009), contrary to the opinions of some educational pundits (Otsu, 2004; Otsu & Torikai, 2002). While early language education should not be taken as a necessary or sufficient qualification for language achievement (TESOL, 2009), earlier starts for students have shown moderate positive results on grammatical and phonological acquisition, primarily due to the added time of exposure afforded by an earlier start (Larson-Hall, 2008).

Common features of work environments among a transnational, transcontinental sample of teachers found that a strong majority of elementary level teachers across the world were of upper-intermediate English proficiency or above, prepared their own classes, assigned homework, and gave tests (Garton, Copland, & Burns, 2011). These features are more common to the teaching of English as a subject matter. At the same time, many education systems are designed to promote positive affect for the foreign language as a primary goal (Enever, 2011). Through the idea of promoting English as a Lingua Franca (ELF), programs in many countries use English as the gateway towards interacting in a globalized world (Lamb, 2004; W. Baker, 2009). Some countries have found that positive motivation for learning English as a foreign language in schools relates to motivation for learning further languages (Heinzmann, 2013).

Taking evidence from other close neighbors in East Asia with similar social and political systems, Korea and Taiwan have also developed programs for foreign language education in elementary schools (Carless, 2006; Butler, 2004). In these countries, students generally start between first and third grade of elementary school. Knowledge and proficiency are tested as with other subjects, and teachers are expected to hold licenses for teaching English (Butler, 2004). A further comparison point is that of Finland, due to the similarity of its humanistic focus in elementary school and in spite of the surface-level cultural differences.
In Korea, the language is taught as a formal academic subject, organized around strong central governmental control. Since 1997, students have been learning English starting in third grade of elementary school. Native speakers have been employed in the English Program in Korea (EPIK) in elementary as well as secondary schools (Kwon, 2000). At the same time, there is a strong push towards homeroom teachers and specialist Korean English teachers leading classroom instruction. Forty-minute classes are conducted once weekly for middle elementary grades, and twice weekly for upper elementary (Korean Ministry of Education, 1997). These classes are primarily oral communication, with a minimal amount of reading and writing to support and supplement listening and speaking activities. There is strong focus on the use of English as an instructional medium in these classes (Kwon, 2000; Butler, 2004).

The Taiwanese policies are much the same as the Korean. Schools start English from third grade, though classes are held twice weekly for all levels. This program was instituted across the island of Taiwan from 2003 (Butler, 2004). While there is some leeway with textbooks, materials, and use of English, there are also social and political currents that emphasize a high degree of NL use (Su, 2006). The curriculum is designed to give a balance of reading, writing, listening, and speaking. Recent policies have also emphasized increasing the number of non-Taiwanese teachers in elementary schools (Luo, 2007), though this has not always been a positive experience for schools or foreign teachers (Chen & Cheng, 2010). In this setting, the use of content-based instructional methods has shown positive effects on student motivation (Huang, 2011).

The final comparison country, Finland, seemingly comes from a different background due to its proximity to Europe and an overwhelmingly Caucasian population. However, Finland provides a model for how and what can be done with elementary school foreign
language studies. With a national language coming from a very different language family from English, the differences to English in both culture and language are not small (Ito, 2006). Travelers are more likely to find clear English signs and directions in Japan and Korea than in Finland, though untranslated English language media is also popular (Ito, 2013). The Finnish people are often described for many reasons as “shy” and “reserved” (Ripley, 2013; Sahlberg, 2011), adjectives commonly applied to the Japanese as well (Hwang, 2012). As in Korea and Taiwan, formal language study in Finland begins in the third year of elementary, focusing on four-skills acquisition. There is a set national curriculum and text that teach English as an academic subject (Ito, 2006).

Testing culture is also broadly similar among the three Asian countries (Carless, 2006). Though Finland differs largely in its approach to testing at elementary and lower secondary schools (Sahlberg, 2011), there is broad similarity with regard to university admissions (Ito et al., 2007). While international comparisons of tests are not always fair or accurate (Glass, 2012), the broad general similarities in terms of language distance, cultural outlook, and relationship with the English-speaking world make some comparisons possible. Both South Korea and Taiwan lead Japan with regard to TOEFL scores (ETS, 2014) and percentage of university students choosing to study abroad (Cabinet Global Human Resources Council, 2011; UNESCO, 2013), indicating a potential indirect influence on students’ autonomous decision to fully engage with the foreign language.

Korea has also demonstrated strong performance in own language reading on the PISA examinations (OECD, 2010; 2013), further indicating that early introduction of a foreign language has no negative result on ultimate OL achievement. Korea further shows very little difference in proficiency when looking at the general populace who study English across the country (Education First, 2013). This lack of difference in the population at large,
combined with the larger differences in overall TOEFL scores (ETS, 2014) and percentage of students studying abroad (Cabinet Global Human Resources Council, 2011) may indicate a greater social and societal value for English in Korea compared with Japan, showing potential integrative and instrumental orientation differences (Gardner, 1985).

Finally, Finland demonstrates high scores on all of the available metrics, while at the same time valuing equity, local autonomy, and humanistic development (Sahlberg, 2011). These are values common to Japanese elementary education as well (Cave, 2007). Foreign language education in Finland does not appear to have undermined these values (Ito, 2013). Based on the current available evidence, foreign language education in elementary schools in various contexts has shown no detriment to student learning. Assuming these early foreign language programs are doing little harm and have the potential to do good (Enever & Lopriore, 2014), their examples may indeed be healthy ones for Japan to follow.

3.1.5 The Course of Study for Elementary Foreign Languages: Criticism and Controversy

Based on some of the evidence presented in the previous section, there is a need to address some of the current issues and criticisms of the current Course of Study. While there seems to be significant evidence that elementary education at worst has no pernicious effects, the current directions of the elementary CoS are not uncontroversial. Critics and proponents have noted numerous philosophical and practical issues. While not all of the criticisms can be addressed, this section aims to clearly investigate and evaluate the validity of several of the raised claims.

First, some language theorists posit that a clear foundation in one’s own language is necessary before embarking on a new language (Otsu, 2004; Torikai, 2006). They argue that teaching English to children too early will lead to negative self-concept with regard to both
their own language and the new language. While there is significant evidence that OL ability is a predictor of success in an NL (Sparks, Patton, Ganschow, & Humbach, 2009; Dixon et al., 2012), the argument presented above is somewhat specious. Research shows that working memory is an important individual difference factor in both OL and NL acquisition (Vulchanova, Foyn, Nilsen, & Sigmundsson, 2014), and pattern recognition, as part of fluid intelligence, appears fundamental to OL ability (Floyd, Shands, Rafael, Bergeron, & McGrew, 2009; McGrew, 2009). These same working memory and pattern recognition skills have been shown to predict reading acquisition in an orthographically dissimilar language (Frost et al., 2013). As language acquisition is unlikely to predict fluid intelligence, we must recognize that the predictive relationship between OL ability and NL achievement may well be indicated by a deeper underlying individual difference variable more akin to fluid intelligence (Shipstead, Redick, & Engle, 2012).

Work on bilingualism reveals that children who learn in a bilingual environment are at no general cognitive disadvantage to their monolingual peers (Bialystok, 2001). Evidence from bilingual schools within Japan indicates that students also do not work under an academic disadvantage in bilingual programs (Bostwick, 1998), meaning the introduction of a foreign language for short periods is unlikely to harm students OL self-concept. Thus, the need for improved OL education to improve NL acquisition stands primarily on armchair theorizing, and the weight of the indirect empirical evidence leans in the opposite direction.

One focus within the CoS is a “communication-at-all-costs” conceptualization in interacting with non-Japanese speakers, stressing strategic competence (Canale & Swain, 1980) through non-linguistic and sometimes non-verbal means. This appears to be a strategy for “othering” students rather than teaching them to communicate capably (Hashimoto, 2011). This scattershot approach to communication may simply reflect the strategies that
students will naturally take towards negotiating their own needs in real situations, such as pointing to a menu or gesturing for someone to turn left or right. In other words, these are strategies that anyone who finds him or herself incapable of communicating verbally will adopt naturally when the situation arises, and reinforcing the benefits of non-verbal communication may create a picture that acquiring proficiency in the language itself is unnecessary. From this perspective, the actual linguistic benefits of the Course of Study may remain small.

The fact that the focus of the CoS is on communication skills and strategic competence, as opposed vocabulary, grammatical structures, and other basic elements necessary to develop deeper communication skills is indeed questionable (Otsu, 2005). Strong evidence suggests that without a basic grasp of individual factual components, higher-level thinking is difficult to achieve (Cooper & Sweller, 1987; Willingham, 2009). Indeed, providing too little guidance in the hope of developing students’ individual problem-solving and communication skills may be counterproductive (Kirschner, Sweller, & Clark, 2006). Without a clear grounding in the fundamentals of what is possible and expected, learners in foreign language activities run the risk of acquiring very little measurable or observable language proficiency.

A critical point to consider is the training of foreign language teachers for elementary schools. Many have written about the lack of preparation and weak sense of readiness among current elementary pedagogues (e.g., Fennelly & Luxton, 2011; Torikai, 2006; etc.). This remains a serious issue, necessitating remedy through teacher training (Enever, 2014). However, the criticism that staffing school districts is essentially impossible (Torikai, 2006) is hyperbolic and misleading. While Japanese higher education in general continues to struggle under a lack of quality control (Newby, Weko, Breneman, Johanneson, & Maassen, 2009), not all situations are hopeless, and many teacher training programs are working to
produce capable elementary school foreign language teachers (e.g., Nakao, 2011). Further, in-service training has indeed shown great promise for improving pedagogical skills (Howe, 2006; 2008; Nakata, 2010).

Other criticisms have indicated that the Course of Study stands on a somewhat xenophobic attention to cultural differences and specific tactics for successfully managing the uncertainty of interaction with non-Japanese (Hashimoto, 2011). The issues surrounding native-speaker foreign teachers will be discussed in greater detail in the following section, but within the Course of Study one issue which must be addressed is the concept of “utilization” versus “employment.” Within the document, there are few calls for proper treatment or employment of foreign teachers, but rather on the “use” of native speakers and other English-speaking peoples. The goal in this conception appears to be building a stronger concept of national identity by demonstrating the differences and “otherness” of speakers of other languages (Hashimoto, 2011), an attitude that would be theorized to diminish an integrative orientation or internally regulated intention to interact with speakers of the language (Gardner, 1985; Noels et al., 2000).

One significant issue here is the move away from the primary conception of English-speakers as coming from WEIRD (Western/white educated industrialized rich democratic) backgrounds (Henrich, Heine, & Norenzayan, 2009). The ministry-approved textbooks do include some examples of non-western cultures (MEXT, 2008e; 2008f), though not in the same depth or detail as western culture and habits. While the inclusion of multiple English-speaking cultures appears to represent a move towards English as a Lingua Franca (ELF; W. Baker, 2009), that shift is as of yet incomplete in its conception due to the specific emphasis on native speakers as opposed to other learners, especially learners from other Asian countries or even an emphasis on student use of English with one another specifically for
language acquisition purposes.

The point could be made that if the goal is to promote positive affect, using English will actually have a negative effect if it is perceived as too “other.” Teachers in other contexts have found a significant “othering” of English in general and non-WEIRD native speaker models in particular, especially at lower levels (Chen & Cheng, 2010). Specifically related to the need for non-Japanese, often conceived as non-Asian, cultural representatives as facilitators of English as a tool for communication (Hashimoto, 2011), a significant focus within the Japanese education system remains on WEIRD native speaker models, despite their questionable value (Cook, 1999). In the following section, I will address some of the specific issues surrounding employing non-Japanese teachers in schools.

3.1.6 Employment of Native English-Speakers in Japanese Schools

Much of the new CoS is predicated on the idea of improving foreign language communication with non-Japanese (MEXT, 2008a, p. 14). With the new curriculum, elementary homeroom teachers (HRTs) without specific training in foreign language teaching or strong foreign-language ability may be responsible for teaching English (Butler, 2007b). While a range of texts, theories, and formats for lesson content exist (e.g., Naoyama, 2011; Oshiro & Naoyama, 2010), these ideas are often generated by administrators without extensive classroom experience. Many HRTs further question their ability to follow curricular guidelines to teach English and improve students’ enjoyment and motivation (Fennelly & Luxton, 2011).

In order to support HRTs and provide their students with a means for natural English communication, native English-speaking teachers (NESTs) are employed almost universally throughout Japan. More familiarly referred to as assistant language teachers (ALTs), these teachers are specifically mentioned at several points in the most recent Course of Study
guidelines for elementary schools (MEXT, 2008a). In many schools, specialist Japanese Teachers of English (JTEs) may teach when ALTs are unavailable, as well as provide intermediary support between HRTs, ALTs, and students. These three types of teachers often collaborate in different configurations depending on the policies of the school.

Many countries throughout Asia have similar policies for the employment of native English-speakers in foreign language classrooms to provide additional linguistic and cultural support for students (Carless, 2006). As noted previously, programs such as JET (Japan), EPIK (Korea), PNET (Hong Kong), and local programs in Taiwan, China, and other Asian nations hire NESTs with the expectation that they provide a tangible benefit to schools and learners, though programs of this sort are not without controversy both in terms of policy and local working relationships (Chen & Cheng, 2010; Luo, 2007; Mahoney, 2004). Within Japan, there remains a strong belief that NESTs are the most desirable and appropriate candidates to teach and model English in elementary schools (Butler, 2007a), in spite of questions regarding the validity of native speakers as linguistic models (Cook, 1999). Studies in Korea have indicated that while students may prefer native speaker teachers for pronunciation, they perceive relatively little difference with regard to other teaching-related matters (Butler, 2007c). Further, knowledge of in-class influences on motivation, learning, and achievement remains based more on anecdote than empirical research.

Inherent in the employment of native speaker assistant language teachers (ALTs) in many contexts is the concept that a native- or near-native speaker is an effective model for foreign language learning, an idea reflected in the studies of teachers’ and students’ attitudes toward native speakers as models (Butler, 2007a; Butler, 2007c). Hypothesizing from the synthesis of social cognitive theory and foreign language classroom practice, it follows that
frequency of language production and affect during output would promote students’ language engagement and ultimate motivation.

Other authors (Mahoney, 2004) have also speculated on the motivational effects of Japanese teachers of English, saying “…motivation can certainly be offered by JTEs as well, whether by enticing students into English situational environments through activities, *modeling English conversations with the [ALT] in front of class, or by speaking with their students directly*” (Mahoney, 2004, p. 240, italics added), inferring that by modeling the tasks, teachers can make it more meaningful and thereby motivating (Nakata, 2009). While Sakai and Kikuchi (2009) did not demonstrate strong direct influence of teachers’ competence, they did not discuss the influence of teachers’ modeling, which may be considered as independent from competence in the proposed model, as a potential influence on students’ motivational state. By regularizing the amount of English used in their daily environment, teachers can help to support students’ autonomous motivation for learning English.

The concept of modeling and learning through imitation does not appear directly in theoretical second-language learning literature on the ideal use of students’ own language (OL) and new language (NL)¹ in class, though it is also an often unattended point at the heart of the controversy. While exclusive target language use has never been shown to improve second language acquisition (Macaro, 2005), it is also theorized that using maximal amounts of the target language is necessary for students to acquire the language (Swain & Lapkin, 2000; Turnbull, 2001; Turnbull & Arnett, 2002). An underlying assumption in the proposition of maximizing teacher L2 use in the class appears to be the concept of the teacher as model,

¹ While other works have previously used the first language (L1) / second language (L2) terminology, in keeping with the ideas set by Hall and Cook (2012; 2013) this paper will use the own language (OL) / new language (NL) terminology.
just as proposed by social cognitive theory (Bandura, 1986).

3.1.7 Teacher and Student Language Use in Class

One of the major ongoing debates in the literature on language teaching is the amount and function of the new language (NL) versus the own language (OL) in class (Hall & Cook, 2013). Research has recognized the value of using students own language through code-switching and other OL scaffolding practices (Hall & Cook, 2012), as well as the idea that in some situations, exclusive NL use has not shown improved acquisition over mixed OL/NL use (Macaro, 2005). At the same time, many have also argued that maximal use of the new language is desirable in order to provide a range of communication experiences, especially in EFL contexts (Turnbull, 2001). As an alternative, an optimal system of OL use may offer teachers greater flexibility to address classroom needs (McMillan & Rivers, 2011). The crucial element to the optimal balance of OL and NL use is that teachers do not feel guilty regarding the use of students OL for pedagogical purposes as they might in a maximal situation (Macaro, 2009). At the same time, the optimal position is not necessarily to use the OL a majority of class time, but to use it as a support of smooth and efficient engagement with the NL. To better define the needs of optimal classrooms, recent literature has called for further classroom-based investigations of the use of the students’ OL in order to teach the NL (Hall & Cook, 2012).

3.1.8 Balancing Own Language and New Language Use

One often cited reason for the use of the OL in the classroom is for better clarity and speed of communication (Hall & Cook, 2013). Many teachers feel that in order to provide clear instruction and effectively manage the classroom, the use of the OL may be crucial to effective practice (McMillan & Rivers, 2011). Looking at teachers’ use of the NL in class and their functions, one study by Inbar-Lourie (2010) indicated that teachers offer different
rationales for the differing levels of OL use in the classroom. The programs for elementary-age young language learners (EYLLs) described here were designed around promoting affect rather than teaching specific linguistic points. For this reason, several teachers in this study found it easier and more desirable to use students’ OL a majority of the time to provide a positive learning environment. Further, many teachers felt that the use of the OL is most appropriate for lower level students in order to better support their understanding of the NL and prevent a breakdown in the structure of the classroom environment.

At the same time, there is a perception among teachers in foreign language environments that optimized, though not exclusive, NL use is also desirable, including among those who believe that students’ OL is a useful tool (Turnbull, 2001; Inbar-Lourie, 2010; McMillan and Rivers, 2011). These beliefs may relate to the idea that regularized use of the NL in the form of classroom routines has shown positive influence on EYLLs’ competence beliefs, which may in turn influence positive affect and motivation (Wu, 2003). Regular classroom routines and proactive behavioral programs have also been shown to be effective in creating positive and successful learning environments (see Good & Brophy, 2008, pp. 77–90). Finally, teachers’ NL use can be improved through teacher training (Nakata, 2010).

Previous studies to date in the Japanese school environment have mostly investigated perspectives on ALTs’ roles and relationships within schools. Several studies indicated the idea of the native English-speaker as a role-model for English language as it is used, while the non-native teachers are expected to explain the language and manage classroom practice, perhaps often in Japanese (Mahoney, 2004; Miyazato, 2009). Likewise, studies have found that ALTs may benefit schools not directly in terms of student learning, but indirectly through professional development for teachers (Crooks, 2001; Meerman, 2003; Carless, 2006). Gorsuch (2002) found that high school teachers in schools without ALTs were more likely to
report using predominantly non-communicative methods to teach English, indicating a potential positive influence. While pragmatic guides for team teaching at the secondary level exist (e.g., Leonard, 1994), these represent relatively naïve theory, primarily based on the opinion and experience of practitioners rather than empirical evidence for best practices.

Looking at classroom practice, Aline and Hosoda (2006) directly observed the roles played by homeroom teachers in ALT-led elementary classes, finding that many HRTs were likely to act as translators or classroom managers rather than lead or actively participate. While some HRTs engaged in the class as co-learners, practicing with the students, or co-teachers with the ALT, others in this situation used ALTs as substitutes. These HRTs may not be actively involved during much of English class (Aline & Hosoda, 2006; Carley, 2012), echoing again the idea of the ALT, rather than the JTE or HRT, as the primary role model for language (Mahoney, 2004) and indicating the underlying attitudes of some Japanese teachers when ALTs are present. The danger in these attitudes, as described previously, is the potential for the “othering” effect that teachers’ may unintentionally model for students.

One potential reason for the prevalence of employment of NESTs in this fashion appears to be HRTs self-perceived level of English competence (Butler, 2004; 2007). While recognizing Japanese HRTs lack of belief in their linguistic abilities, an important variable not considered in many of the above studies is the actual language learning achievement students demonstrate in relation to frequency of contact with school ALTs. One major exception to this is a large-scale study by Butler and Takeuchi (2008) which found that a higher frequency of ALTs’ presence at elementary schools exerted a negative, though weak, statistically significant effect (Standardized beta = -.09, p < .01) on students’ language learning and proficiency measured by speaking tests. Still, one may consider that the size of the relationship here is more a suggestion than a real effect, and thus further investigation is
necessary before claims can be made. Without clear documentation of the in-class environment and elementary students’ behavior in regard to their native and non-native teachers, it is difficult to draw conclusions regarding actual influences of NESTs or possible influences on learning. In order to clearly understand the impact of ALTs, JTEs, and HRTs as models for students’ learning behavior, an empirical investigation of in-class behaviors and influences is necessary.

3.2 Addressing Motivation in the Course of Study

Having looked at the criticisms and realities of the Course of Study, we also must consider the potential benefits. Taken from a motivational perspective, the CoS offers principles for building positive affect for language learning, principles notably lacking in previous courses of study (Tahira, 2012). At the same time, the focus on affect has not been clearly and uniformly understood among elementary teachers, policy makers, or teacher trainers (Fennelly & Luxton, 2011; Mayeda, 2010). In order to promote positive motivation towards the foreign language, a strong theoretical perspective on the realities and principles of language learning motivation may offer teachers and researchers insights into how to address foreign language learning in elementary schools.

The previous Chapter introduced the many different theories of motivation, how they may interact, and how they may be applied to foreign language learning. The purpose of this section is to describe how the elementary CoS can be supplemented by Deci and Ryan’s (2000) self-determination theory of motivation (SDT) in order to satisfy students’ needs and build the desired foundation of positive affect for learning. While other theories of motivation are largely cognitive (Tollefson, 2000), SDT is a humanistic theory of motivation which includes both cognitive and affective elements toward eudaimonic well-being, just as the
Japanese elementary education system both imparts knowledge and teaches to the whole person (Lewis, 1995; Cave, 2007). I hope to demonstrate the strength of connection by introducing passages from the elementary Course of Study supporting the humanistic motivational perspective, then discuss reasons for the appropriateness of SDT for supplementing and interpreting the CoS.

One of the major differences between the elementary and secondary courses of study is the recognition of the importance of affect. A common commentary on the secondary approach to education in Japanese schools is that it happens “from the shoulders up.” While affective and emotional terms are very rarely mentioned in the body text of the secondary school documents (MEXT, 2008b; 2009), significant portions of the 29 page elementary CoS guidelines (MEXT, 2008a, pp. 1–4, 10–12, 16–19, 21, 23, 25, 29) use terms referring to motivation, positivity, fun, interest, and enjoyment in connection with experiential learning, demonstrating the importance of affect in the current Course of Study. Table 3.1 summarizes the breakdown and frequency of the different passages referring directly to motivation. Throughout the document, and underlying all of the motivational elements, a strong emphasis is also given to experiential learning (taiken teki gakushu). Passages and quotes refer to this concept in 57 passages on 24 of the 29 pages (MEXT, 2008a). While passages explicitly related to motivation are few by comparison, the sense in which this term is used implies personal agency and active student participation in communicative interaction. Indeed, the very title of the study area, Foreign Language Activities, strongly suggests personal engagement and motivated behavior in the learning process.
Table 3.1. Passages from the Elementary Course of Study (MEXT, 2008) displaying the centrality of motivation

<table>
<thead>
<tr>
<th>Motivational concept</th>
<th>Number of passages</th>
<th>Pages</th>
<th>Illustrative phrases</th>
</tr>
</thead>
<tbody>
<tr>
<td>Motivation, desire (Iyoku)</td>
<td>4</td>
<td>1-2, 19</td>
<td>“The improvement of learning motivation and establishment of study habits . . . is indicated through the revisions to the Course of Study.” (p. 2)</td>
</tr>
<tr>
<td>Fun, enjoyment (Tanoshisa)</td>
<td>10</td>
<td>10–12, 19, 23, 29</td>
<td>“Instruction should be given . . . in order to help pupils . . . experience the joy of communication in the foreign language.” (pp. 10–11)</td>
</tr>
<tr>
<td>Interest (Kyoumi/kanshin)</td>
<td>7</td>
<td>9, 16–18, 21, 23</td>
<td>“. . . in order to promote pupils’ self-driven desire to communicate, using materials and activities related to student interest is important . . .” (p. 17)</td>
</tr>
<tr>
<td>Positive (sekkyokuteki attitudes, behaviors)</td>
<td>26</td>
<td>4, 7–12, 14, 17, 19–21</td>
<td>“Emphasizing the nurturing of positive attitudes toward communication through the use of the foreign language . . .” (p. 7)</td>
</tr>
</tbody>
</table>

The CoS indicates that a feeling of necessity helps students recognize why they should engage with the material, creating an internal feeling of motivation toward the subject. One facet of this can be found in the idea of the relationship with the junior high school curriculum (MEXT, 2008a, p. 7). Specific elements of the elementary curriculum, such as the alphabet, are intended to support students as they graduate from primary to secondary school (MEXT, 2008a, p. 22). From experience both in teaching and researching in elementary and junior high schools, students with more experience in elementary school are often more motivated towards learning the foreign language based on that foundation. The employment of native speaker ALTs and guest teachers is also meant to provide a sense of necessity, where non-Japanese individuals may be used in order to provide additional opportunities for communication above those created by the homeroom teacher (MEXT, 2008a, p. 14). As mentioned above, all of these elements appear designed to promote active, experiential learning. Creating opportunities for natural use through a rich foreign language environment is theorized to improve students’ feelings of the necessity for English, and thereby increase desire to learn it.

The document also recognizes the need to involve students’ individual hopes and desires in classes, referencing the need for teachers to find what students hope to accomplish.
in life in a passage stating, “in addressing student dreams for the future, in order to appropriately elicit student-centered self-expression, teachers must necessarily first look into what students’ dreams are” (MEXT, 2008a, p. 23). By knowing their students as individuals, homeroom teachers are in a better position to help students to express their desires. Beyond the simple concept of foreign language proficiency for its own sake, teachers must provide opportunities for students to connect the concept of language learning with the larger life goals students are forming in fifth and sixth grades.

The emphasis on pair and group activities may also help develop positive relationships between peers. Quoting from page 11, “In order to build rich interpersonal relationships, the acquisition of linguistic communication abilities is necessary” (MEXT, 2008a). Further discussion of interpersonal relatedness can be seen in a discussion of the sixth-year curriculum on page 28, which reads “maintaining important relationships with friends and classmates, students should experience communication activities regarding daily life and school life, including experiences which promote international understanding” (MEXT, 2008a). These activities are carried out through between-student interaction, with the intention of “raising students’ understanding of others, as well as their self-respect, by confirming the positive aspects of their classmates and selves through interactions with their peers” (MEXT, 2008a, pp. 28–29). By practicing communicative interactions with each other, students build meaningful relationships and develop interpersonal skills.

Within the document, the role of proficiency in the foreign language is replaced by the idea of “familiarization” (nareshitashimi, MEXT, 2008a, p. 10). While “familiarization” as a way of learning a language seems unclear, this describes the first step towards real proficiency for many successful language learners. Repeated exposure and practice creates a feeling of being “accustomed” to the language; providing extensive exposure can promote
feelings of having experienced and used the language. The impetus for this comes from recognition within the document of the need to address students’ reported lack of self-confidence (MEXT, 2008a, pp. 1–2).

Finally, the focus on providing students with positive experiences is balanced with clear warnings regarding activities that are perceived to damage students’ internal motivational resources. In three specific passages from the document (MEXT, 2008a):

- “. . . teaching with an overemphasis on pattern practice . . . does not align with the goals of foreign language activities” (p. 9);
- “. . . making students mechanically memorize words, phrases, and sentences. . . may cause students to lose their sense of self-expression” (p. 16);
- “. . . teachers should be careful not to take away students’ desire for self-expression and interest in communication. . .” (p. 18).

The first warning hinges on overemphasizing rote memorization without active use, while the other passages recognize the danger of controlling methods as damaging to motivation. Language involving the idea of making students do something (-saseru) is often followed by a warning that this does not fit with the current goals of elementary FLA. Focusing on the ways which the desire to learn can be both built and thwarted further shows the importance of motivation and affect with regard to elementary education.

3.2.1 Motivational Theory for Foreign Language Activities

Many of the above passages have prompted questions and uncertainties among teachers expected to enact the Course of Study (Fennelly & Luxton, 2011; Mayeda, 2010; Tahira, 2012). Considering the importance placed on the Course of Study by both administrators and teachers, a framework for clear application is necessary. While motivational perspectives exist specifically for language learning (e.g., Dörnyei, 2005), consideration of the school
context must be added to any discussion of foreign language education in Japan (MEXT, 2008a, pp. 1–2).

One clear focal point of the document is the promotion of affect / enjoyment in order to support learning, a perspective supported by the empirical literature (Cornelius-White, 2007). This perspective coincides with that of self-determination theory (SDT; Ryan & Deci, 2000), which posits that human beings engage in tasks which are enjoyable and allow personal agency. Based on the recommendations and policies set about in the above Course of Study—specifically the central ideas of enjoyment and self-expression—this motivational perspective may offer teachers a theoretical and practical method for interpreting the CoS to address students’ needs and improve long-term motivation.

3.2.2 Theoretical Commonalities and Commentary on Current Practice

One of the primary insights from self-determination theory is the idea of supporting students’ autonomy and sense of agency. In the elementary context, this means helping students to understand the goals and intentions of an activity, avoiding rigid commands, and allowing students to express opinions and preferences. Many teachers already support students’ autonomy by demonstrating the lesson point at the start of class. The statement of goals (jugyou no me-ate) practiced by many teachers is an autonomy-supportive practice by providing students with a reason for the selected classroom activities. This practice is unfortunately not a universal one, especially among schools without a strong connection between regular staff and native English-speaking teachers, who may be unaware of the routine. Instituting this commonly used practice from non-foreign language class periods in lessons run by both native and non-native teachers may better support students’ autonomous engagement in class.
Real autonomy-support also recognizes students’ desires for what they want to learn. The summarized English version of the CoS states, “teachers should focus on the foreign language sounds and use letters of the alphabet and words as supplementary tools for oral communication” (MEXT, 2008c, p. 3). Studies have also found that many junior high school students expressed interest in learning more about reading and writing in elementary school (Benesse Educational Research Development Center, 2011). Considering the recognition of the importance of students’ long term goals and how they may relate to learning a foreign language (MEXT, 2008a, p. 23) as well as supporting their learning in junior high school (MEXT, 2008a, p. 22), some element of reading and writing instruction may be appropriate for supporting student autonomy. Based on observation, students in elementary schools are interested in English language writing, and often ask teachers about readings and meanings of words found on t-shirts and pencil cases, illustrating a desire for meaningful interaction with the English in their environment. Considering how the alphabet is already a part of the recommended curriculum, some introduction of receptive letter sounds and reading may support student autonomy and motivation.

At the same time as we promote the idea of autonomy, cautions against thwarting autonomy should not be interpreted as recommending excessive permissiveness. Literature on self-determination theory has endorsed the concept of structure in classrooms in order to provide students with the support and direction they need for good learning (Jang, Reeve, & Deci, 2010). Structure provides students with direction, goals, pacing, and expectations for behavior and learning without authoritarian strictness. This allows students the concept of “freedom within limits” (Rogers, 1969), and can help promote achievement (Mouratidis, Vansteenkiste, Michou, & Lens, 2013). In this context, autonomy can be seen as how teachers and students negotiate the necessary social structures and constraints of the school.
environment to express their individual agency (Nakata, 2011; Brophy, 2004).

My own previous research has also indicated the importance of classroom procedures in promoting positive student engagement (Oga-Baldwin, 2012). In one class, the teacher would stop class when students failed to adequately prepare for class on time or became overly boisterous. At the same time, her strictness did not prevent students from relating to her class positively. In another class, the teacher would take the first fifteen to twenty minutes to ask students “How are you?” and wait for a response, all the while ignoring the other students’ private conversations or misbehavior. This class had a great deal of later difficulty completing basic tasks due to students’ unwillingness to engage with the material, accompanied by stress on the part of the teacher. Thus, autonomy-support in the classroom should not be equated with the idea of lack of teacher authority, but rather how teachers organize, plan, and direct learning activities within classroom structures and strictures so as to draw students’ interest and attention without referring to controlling methods.

As discussed in Chapter 2, structured autonomy-support (Jang, Reeve, & Deci, 2010) emphasizes how teachers can allow student agency in classroom decisions bounded by limitations. This may be related to how games are played, such as allowing students themselves to decide the penalty for grabbing a card too quickly in a karuta (card slapping) game (e.g., sit out one turn, return one card, etc.). In some classes, students may build their ideal school lunch, but must show that it contains a balance of nutrients. In other classes, autonomy-supportive teachers may structure choices by allowing students to decide on an ideal class schedule based on the realities of school (e.g., “We need to have five math and five Japanese classes, and we can’t have P.E. every day because other classes need the gym”). Teachers may promote agreement by explaining the reason for certain rules (“This game won’t be fun if you show your card to your partner,”) or demonstrate rules by acting out the
part of a student who does not follow the rules and is then penalized gently but appropriately. If activity choices remain perfectly free, they stay in the realm of fantasy and have little bearing on students’ deeper satisfactions (Brophy, 2008).

Promoting student competence must also not be overlooked. If students are to develop true familiarization with English, a large degree of repetition and practice are necessary, and students must hear teachers producing a large amount of language. While overemphasis on pattern practice, drills, and memorization may not be desirable, the use of repetition in the form of songs has been shown to help with language acquisition and memory (Schön et al., 2008; Ludke et al., 2014), demonstrating the importance of music in elementary language classes for competence building. Teachers who wish to familiarize students with the L2 should also model the behaviors they wish students to emulate. Imitation has been shown to be instinctual (Lyons, Damrosch, Lin, Macris, & Keil, 2011), a finding supported in other educational research (Schunk & Gunn, 1985). For teachers, this means using and modeling the target language as much as possible in order to help students recognize the value of the language (Brophy, 2008).

At the same time, teachers must also be careful not to use coercive methods to engage students, “making” or “forcing” them to participate. The Course of Study recognizes this perspective in the caution to avoid controlling activities such as overuse of pattern practice (MEXT, 2008a, pp. 9, 16, 18). While competence-building activities such as pattern practice are indispensible, they are only meaningful in support of communication. As such, practice activities promoting competence are desirable in so far as they also promote interest, desire to engage, and interpersonal relationships, and should be recognized as motivationally undesirable should they control students toward simple rote knowledge or negative affect towards the language. To this end, performance or task-like activities after sufficient practice
may offer the greatest opportunities for learner agency (Mercer, 2012), and thus avoid feelings of coercion. Past studies have achieved this end through theatrical performances (Nishida, 2010), where students repeatedly practice specific lines and interactions to support competence before performing the final product before an audience. A class play further provides students with a rationale for extensive language use, further supporting autonomy.

Other classes have achieved autonomy and competence support through emphasizing game-like activities focused on the use of the target language which may help students to develop both competence and positive affect. Common game-like learning activities such as card-slapping/karuta, quizzes, guessing games, and puzzles presented in the L2 which require recall of language in order to proceed are likely to promote feelings of student competence (Karpicke & Blunt, 2011). Some teachers may finish class activities five minutes before the bell and allow students to file out of the room early, under the condition that they are able to answer questions related to the day’s lesson point. Especially with young learners, routine activities of this sort in support of competence promote self-determined motivation (Wu, 2003). At the same time, it should be noted that games as games do not lead to the development of proficiency and familiarization with the language (Brophy, 2004, p. 199). In the words of one student I observed, “We always do games, but English games aren’t games.” This statement echoes the idea presented by Lepper and Cordova (1992) where the effort to enjoy the activity and the effort to learn should ideally match and move in the same direction. Thus, students may not always enjoy game-like activities presented in FLA classes, and a balance is needed in order to appropriately support students’ autonomous motivation for learning foreign languages.

A sense of relatedness with the target language community is also needed to build
student motivation. To this end, the employment of native speaker teachers and intercultural exchanges may offer a positive influence. While native speaking English teachers may or may not offer positive benefits for schools in terms of language achievement (Butler & Takeuchi, 2008). At the same time, international experiences which provide students with chances to interact individually with students from other countries may provide additional motivating experiences (Yashima, Zenuk-Nishide, & Shimizu, 2004). This perspective echoes the call for intercultural exchanges on pages 28–29 of the CoS. In classes where students meet and exchange with international guests, students show autonomous engagement and willingness to communicate. While visits of this sort may be rare, occurring at most once per year at most schools, they offer greater individual interaction time between students and English-speakers than is usually available in classes with a single native speaking English teacher, increasing opportunities for individual and self-directed experiential learning.

Finally, in keeping with the focus in the CoS on active experiential learning, looking beyond internal motivations toward engagement, where students act on internal drives and external influences (Reeve, 2012), may offer more concrete perspectives on how motivation works in the classroom (Lee & Reeve, 2012). Recent literature from the SDT perspective has also emphasized the importance of engagement resulting from teachers’ classroom practices (e.g., Jang et al., 2010; 2012). Looking at how students behave in class, enjoy materials and activities, and process the foreign language will allow both teachers and researchers to better understand how students grow through the process of learning a foreign language with a strong affective foundation.
3.3 Applying Autonomy-Supportive Teaching in the Japanese Environment

While Japanese elementary schools have been indicated to be highly supportive of students’ basic needs (Lewis, 1995), SDT’s claims of universality has been criticized; most specifically the ability of autonomy to account for motivation in collectivist and socially interdependent societies has been questioned (Markus & Kitayama, 1991). According to the cultural relativist (CR) paradigm, claims regarding autonomy and choice originating in Western independent societies may not be culturally applicable to Eastern collectivist societies (Iyengar & Lepper, 1999). These arguments question whether autonomy, choice, and self-endorsement (and thereby the benefits outlined by self-determination theory) are appropriate in Eastern contexts. According to CR arguments, motivational constructs from Western psychology may present differently in Eastern contexts (Markus & Kitayama, 1991).

Following this logic, however, the basic tenet of a theory may also still be sound while the implementation and surface phenomena differ. Perceptions of subjective self-referential experiences may diverge across cultures (Roth, Assor, Kanat-Maymon, & Kaplan, 2006). While choice may be an element of autonomy, it does not comprise the entirety of the construct (Katz & Assor, 2006). Many of the critical analyses of autonomy and self-determination have failed to address whether individuals personally endorse outside direction, or if action was coerced. Further, as SDT has been validated in western settings, so too empirical research in this paradigm has shown autonomy-support as culturally valid in school contexts in Korea (Jang, Reeve, Ryan, & Kim, 2009), Japan (Yamauchi & Tanaka, 1998), and Taiwan (Hardre, Chen, Huang, Chiang, Jen, & Warden, 2006), and thus elements of self-determination appear to be connected with well-being and motivation across differing cultures and standards.
3.3.1 Autonomy-Support in Cross-Cultural contexts

Research involving Asian students has indicated that free choice may not always be desirable for motivating students, but rather that respect for authority may be more culturally acceptable (Iyengar & Lepper, 1999). Hofstede (1984) has indicated that many East Asian societies maintain a high acceptance of power and authority from above. Cultures such as those in Japan, China, Korea, and Taiwan have shown a greater orientation towards control from parents (Tseng, 2004; Wang, Pomerantz, & Chen, 2007), indicating early socialization of this tendency. At the same time, this categorization does not necessarily represent the complexities of why individuals in these societies may accept top-down control. The phenomenon may stem from cultural norms of positive reciprocal relationships between social levels.

Following this logic, however, the basic tenet of a theory may also still be sound while the implementation and surface phenomena associated with it differ. How individuals internalize and perceive subjective self-referential experiences may diverge across cultures (Roth, Assor, Kanat-Maymon, & Kaplan, 2006). While choice may be an element of autonomy and self-determined motivation, it does not comprise the entirety of the construct (Katz & Assor, 2006). In many of the critical analyses of autonomy and self-determination, critics have failed to address whether individuals endorse the directed action personally, or if the agreement with the authority was coerced. Further, considering that the type of autonomy provided in school contexts world-wide share many features, including unequal power relationships between students and teachers and the need to maintain social order and specific roles (Brophy, 2004). Within this context, constraints on choice are to be expected, regardless of culture.

Recent discussions of autonomy have focused less on the conception of choice and
more on the concept of agency and endorsement of one’s actions (e.g., Jang, Reeve, Ryan, & Kim, 2009). Autonomy in this sense indicates an internal locus of control (deCharms, 1969) where the person perceives himself or herself as involved in the decision to act, and that the action is proper or reasonable. On the other side, heteronomy would indicate an external locus of control, where an individual is forced to act in a fashion against their will, or in a fashion perceived as culturally or socially unacceptable. Current arguments from the cultural relativist side have claimed that heteronomous motivation may be more socially desirable and recognizable in East Asian collectivist societies (Markus & Kitayama, 1991; Iyengar & DeVoe, 2003), while self-determination theory seeks to explain motivation in terms of the alignment of the person and environment for maximum efficacy (Reeve, 2012).

Seen in the light of personal agreement and endorsement of one’s actions, the perspectives of the cultural relativists and self-determination theorists are not necessarily mutually incompatible, as the concept of autonomy must be understood in terms of the interpersonal and cultural phenomenon specific to a particular society (Chirkov, Ryan, Kim, & Kaplan, 2003; Roth, Assor, Kanat-Maymon, & Kaplan, 2006). Empirical research within the SDT paradigm has shown autonomy-support as culturally valid in school contexts in Korea (Jang, Reeve, Ryan, & Kim, 2009), Japan (Yamauchi & Tanaka, 1998), and Taiwan (Hardre et al., 2006), thus elements of self-determination appear to be connected with well-being and motivation across differing cultures and standards.

3.3.2 Collectivist Social Environments

Social norms within Asian collectivist contexts are often oriented toward hierarchy, and individuals within these societies may find acting upon requests from superiors more agreeable than requests from friends (Hwang, 2012). Studies have indicated that decisions made in agreement with a need-supportive authority may promote well-being (Chen,
Vansteenkiste, Beyers, Soenens, & Van Petegem, 2013). This phenomenon may stem from cultural norms of positive reciprocal relationships between social levels. Collectivist cultures such as Japan, China, Korea, and Taiwan have shown a greater orientation towards control from parents (Tseng, 2004). However, while this may represent the general trend within these societies, certain qualitative differences moderate how individuals experience top-down control.

Confucian ethics describe the concept of benevolent (as opposed to tyrannical or oppressive) authority, and maintaining order and balance requires authority figures to act with a view to the benefit of those lower in the social hierarchy (Chen & Farh, 2010). Within this paradigm, those above who are just, act in the interests of their subordinates, and attempt to harmonize are superior to those who coerce, are heavy-handed, or arbitrary. Teachers, parents, and leaders have an obligation to be authoritative, reasonable, and exert power in the interests of the subordinate; that is to say, authority must not simply be authoritarian and controlling.

While this is certainly not always the case in reality, this perspective may help to better understand the culturally socialized experience of autonomy in Confucian-related societies. Just as indicated in self-determination theory, East Asian cultural norms also indicate that the quality of interaction between teachers as authorities and students as subordinates must agree with the latter’s personal orientations (Littlewood, 1999; Chen, Vansteenkiste, Beyers, Soenens, & Van Petegem, 2013), even when the catalyst for action comes primarily from above. Asian learners also may feel more comfortable maintaining harmony with authority (Hau & Ho, 2010).

As with other East Asian countries, Japan also follows codes of Confucian ethics in
hierarchical social relations to a greater or lesser extent (Hwang, 2012, pp. 207–213). Psychological interdependence between social levels is a well-documented phenomenon in Japanese culture (Doi, 1994; Tseng, 2004). In accordance with the idea of benevolent authority, nurturing relationships between teachers and students are also central to the classroom environment, especially in primary settings (Lewis, 1995).

As discussed earlier in this Chapter, the majority of elementary schools in Japan focus on fulfilling expected group and social roles (Cave, 2007), including vertical relationships. However, this acceptance of hierarchical inequality extends only so far as instructions and directions are not perceived as objectionable. Indeed, Japanese students have generally been known to react strongly, even violently, to authorities perceived to exert non-legitimate power, even as early as elementary school (Kawakami, 1999). Thus, while respect for authority may be considered a virtue in Japanese society, the exercise of authority and control is couched in its ability to maintain order and smooth social relations.

As a result, the most successful elementary schools in Japan have been posited to be so not because of control from above, but due to the use of authority in support of students’ basic needs, met by building proactive discipline through classroom routines and rituals (Lewis, 1995). Schools create daily rituals, such as cleaning, with a view to supporting students’ sense of independent accomplishment, and teachers promote specific behavioral scripts to foster positive horizontal and vertical social relationships (Cave, 2007). These behavioral routines are often organized and directed by teachers as central authorities, though with a clear element of building student autonomy, in that teachers avoid micromanagement. While orientations may change toward more authoritarian control in secondary school (Nakata, 2009), elementary teachers work towards exercising authority to satisfy basic psychological needs (Lewis, 1995).
Connected to the role of authority to oversee ritual and routine in Japan is the tendency to avoid and regulate uncertainty (Hofstede, 1984; Sorrentino & Roney, 2000). According to the original research by Hofstede, individuals vary on a scale of their desire for predictability or acceptance of ambiguous situations. Research has extended this theory to show that different cultures perceive different levels of threat in ambiguity, and therefore may be characterized as certainty- or uncertainty-oriented (Sorrentino & Roney, 2000). The socialization process in Eastern countries is often organized around regularity and parental direction (Tseng, 2004; Wang, Pomerantz, & Chen, 2007), which may influence the development of this tendency. Accordingly, Japanese learners have been indicated to thrive in less ambiguous, more certain environments compared with Canadians (Szeto, Sorrentino, Yasunaga, Kouhara, & Lin, 2011). In this research, increasing situational uncertainty through choice and independence from the group or central authority led to disengagement among Japanese university students.

Connecting these ideas, research applying self-determination theory to classrooms in North America and Europe has also found a positive benefit for organization, clear explanation, and feedback from the teacher (Jang, Reeve, & Deci, 2010; Sierens, Vansteenkiste, Goossens, Soenens, & Dochy, 2010; etc.). Within this framework, these concepts have been grouped together to find a latent variable titled structure. Providing students with both autonomy-support and structure has shown positive benefits for both affect and achievement. More recently, studies have found that even students in western contexts benefit from an environment with structure and appropriate, though not excessive, autonomy-support (Furtak & Kunter, 2012). For these purposes, structure may be seen as the form of the lesson, autonomy-support the quality.

In order to better define the cross-cultural validity of self-determined motivation from
a situated cultural perspective, research is needed to investigate the subjective experience of autonomy-support. In western settings, support for student autonomy has been operationalized in terms of providing choice, allowing and accepting students to voice ideas and opinions (including negative affect), appealing to interests, and providing rationales for activities (Reeve, 2012). However, following the cultural relativist perspective, structure may offer a salient point for comparison. Following from the above discussions of cultural norms, structure and autonomy-support in Japanese school settings may exhibit as clear, caring, and unambiguous authoritativeness, oriented towards the benefit of the student. Working from this definition, a culturally appropriate definition of autonomy-supportive teaching may be derived and tested for application.

This Chapter has introduced the political, social, and cultural realities in Japan. Recognizing the key features of the Japanese education system will allow for the creation of effective hypotheses regarding how the learning environment and learners interact in Japanese schools. Many larger issues stemming from the Course of Study both facilitate and hamper motivation to learn a foreign language, and demonstrate how self-determined motivation may grow in the humanistic environment of Japanese elementary schools. Final consideration for the surface-level differences in how learners in collectivist cultures may perceive the experience of autonomy-support may be used to illustrate how the underlying structure of self-determination theory’s cognitive evaluation microtheory within Japanese society. With these features of Japanese society established, I will introduce the methods of assessing the motivational features of foreign language education.
Chapter 4–Methodologies

Keywords: Mixed methods studies, pragmatic worldview, structural equation modeling, qualitative observation, research frameworks

Where the previous two Chapters have outlined the theoretical, social, and political issues surrounding elementary foreign language schools, this Chapter focuses on the practical aspects of research and investigating how learning happens in elementary schools. This necessitates a discussion of theories of knowledge (epistemologies), how evidence is gathered, measured, and analyzed, and how theory influences the interpretations found during the course of the research.

A commonly used metaphor for research methods is that of basic tools, such as levers, wedges, and inclined planes. For many purposes, a simple tool such as an inclined plane may suffice. For other situations, the same inclined plane may be superior if supplemented by a pulley system. Likewise, for some research questions, a single method may suffice. However, in order to answer questions of a multifaceted nature, an appropriate combination of tools may allow for greater comprehension of a specific phenomenon, experience, or trend. Based on the previous Chapters, I argue that how to build motivation in a school environment is a complex question requiring multiple data points and perspectives in order to answer effectively. The complex and dynamic nature of motivation in the school setting warrants multiple perspectives and methods of interpreting data, and thus a mixed-methods research design may be the most appropriate choice for researching this topic.

Mixed-methods research paradigms offer opportunities for more complete explanatory and predictive models (Creswell, 2008). Commonly, purely quantitative models are criticized as overly reductive or insufficient in describing complete experience. Likewise, purely qualitative data may be untestable, or may be overly specific to a certain context, thus
lacking in generalizability. However different they may seem, these methods are compatible and offer researchers the opportunity to understand clearly a phenomenon (Johnson & Onwuegbuzie, 2004). In this Chapter, I explain the choices of research methods and their worldview to clarify why I have chosen a mixed-methods paradigm for approaching motivation and the classroom environment in elementary school foreign language activities before outline the general pattern of Chapters 5 through 9, explicating how the seemingly different studies fit together to form a cohesive whole.

To offer a note on terminology within this Chapter and throughout this thesis, I will discuss three basic elements of any series of research. The first is what Creswell (2009) describes as the ‘epistemology’ and ‘worldview’ (used interchangeably here in this discussion) as a philosophical series of beliefs which inform and create the foundation for the line of inquiry. All researchers carry a set of underlying beliefs and biases that they use to interpret data. This theory of knowing colors every piece of the research design, from the generation of hypotheses and research questions to the design of experiments or program of inquiry. While this is implicit in many studies, it is nonetheless important to declare this position in order to clarify how and for what purpose the research is conducted.

At the same time, ‘paradigm’ and ‘methodology’ will be used to refer specifically to an approach to data acquisition and interpretation. This methodology may be qualitative, quantitative, or both. The decisions researchers make on how to gather and treat information inherently changes how it may be understood, both by the researcher and readers. This is commonly the focus of research discussions and may be used as a broad way of classifying research. The methodology is generated based on how the researcher chooses to approach knowledge, and how they choose to gather the information in relation to good hypotheses.
Finally, ‘theory’ and ‘theoretical background’ are used to describe a lens on the data, brought by a previous framework of empirical findings and their interpretation. As all modern research stands on conclusions derived from a combination of previous observations and empirical findings, theory allows researchers to develop ideas based on solid grounding. While theory does not have to be the grand theories outlined in Chapter 2, good research requires the use of a basic set of background knowledge about the field of inquiry. Strong theories allow for the testing of well-grounded hypotheses about the data.

Thus, all research occurs at the intersection of these three viewpoints. Theory allows for the generation of hypotheses. Method controls how the data is gathered. Both are informed by an underlying worldview which grants affordances to—as well as placing constraints on—the method of interpretation. These three simultaneously influence every aspect of the data acquisition and interpretation. Figure 4.1 renders these in a three-dimensional space, with data seen and triangulated by the researcher. By clarifying this framework, the researcher may clarify existing biases, data gathering and interpretation methods, and intended outcomes.
4.1 Quantitative Research Paradigms

Quantitative research is often seen as the dominant research paradigm in most sciences, including the social sciences. The basic philosophical underpinning of this type of research is most often described as positivist or post-positivist epistemology (Creswell, 2008). Positivism and post-positivism follow the belief that the world can be empirically measured using reliable and valid measures. By developing different statistical measurements for data, researchers are able to predict accurately the world using mathematical models to represent the relationships and differences between phenomena. In order to test the veracity of these models, a test against an equally plausible model is needed, thus making the hypothesized model falsifiable (Popper, 1959). The basic *modus operandi* for studies in these paradigms is to find generalities that may be applied across contexts, and thus reveal or indicate previously unknown concepts. To summarize this approach in a single statement: *all reality, perceived and otherwise, represents an underlying material base both observable and measurable with the right tools.*

Applied to the social sciences, this means gathering numerical data from human subjects using either observation or survey instruments. Some approaches to human data allow for highly objective measurement, such as galvanic skin response, pulse rate, response time, chemical content of sweat, or more recently, eye-movement tracking. At the same time, these methods are often invasive and/or require the appropriate laboratory conditions. In gathering data *in situ*, less intensive methods are often required to understand emotional, psychological, and social phenomena, and thus survey research methods are often employed.

Within the quantitative paradigm, creating accurate survey items that may be easily applied to specific contexts is often a matter of import. The quality and validity of items is
often a matter of question, with differences in item wording often questioned. These items must be based on either clear empirical or theoretical validity, and the creation of new and novel survey instruments requires extensive validation.

One crucial goal for much of this research is the demonstration of causality. A great deal of research is able to show the mathematical correlation between two concepts, but inferential causality is often much more difficult to demonstrate. It should be noted here that no individual statistical test is sufficient to indicate causality, but that this is defined most appropriately through the implementation of the research design (Kline, 2009; Shadish, Cook, & Campbell, 2002). In order to demonstrate causality, the following conditions (Kline, 2009) must be met:

1) The cause and the outcome must be observable together;
2) The outcome must naturally occur after the hypothesized cause; and
3) All other plausible explanatory variables have been controlled for or measured.

Failing any of the above conditions, a model cannot truly be causal, but rather correlational; the two measured phenomena are held to co-exist and perhaps develop similarly, but one may not truly cause the other, or even contain a reciprocally causal relationship (e.g., feelings of competence predict motivated behavior, which improves competence, which increases motivation, ad infinitum). To control for and isolate these causes appropriately, careful longitudinal controls and models are necessary.

Indeed, with any social science phenomenon, a single cause is quite unlikely; it is likely a combination of factors, not all of which are readily measured. Even in experimental studies, it is not through the measurement of an outcome that causality is shown, but rather through the qualitative measures taken to control for and isolate the cause from all other possible or plausible causes, and thus causal inference requires a healthy degree of qualitative
scaffolding (Shadish & Cook, 1999).

4.1.1 Structural Equation Modeling

Following the principles for quantitative modeling, one statistical method with the possibility of showing inferential causality is structural equation modeling (SEM). Structural equations may be considered an extension of the regression test and the general linear model. The aim of a simple single regression test is to demonstrate the mathematical relationship between two variables. At different points and with different samples, error may occur to influence a relationship in different ways. One assumption of the law of large numbers is the notion that all relationships contain an underlying value which may describe them mathematically, and given a large enough sample, this relationship may be accurately revealed in order to display the general trend of the data. Similarly, in controlling for multiple predictors, multiple regression shows the influence of multiple predictors on a single outcome, while the more complicated multivariate regression looks at multiple outcomes working from single or multiple predictors.

Following this logic, SEM constructs multiple models to measure a potentially infinite number of relationships simultaneously, which allows for a more complete and honest picture of quantitative data. This allows for a comprehensive approach to the investigation of theoretical variables. With SEM models, researchers may investigate the underlying structure of a construct by using the covariance matrix of a set of observed variables to infer that these observations form a latent construct. A latent construct (or latent variable) represents a multifaceted concept, such as the ideas of autonomy, competence, relatedness, motivation, or classroom engagement discussed in Chapters 2 and 3.

Other statistical methods, such as analysis of variance (ANOVA), regression, t-tests,
and even cluster analysis and path analysis, are only able to investigate observed variables or
data parceled through some transformation, such as reducing a series of observations to their
mean value. Using the mean value necessarily reduces outlying data and may mask
measurement issues and non-normal data. Rather than relying on such data reduction,
researchers may use structural equation models to draw an accurate picture of the data by
measuring the natural variance of the originally gathered data as it exists. By demonstrating
the validity of these models while accounting for the natural error involved in a set of latent
variables, researchers may have a more complete understanding of the strength and direction
of the relationships between variables.

At the same time, a SEM model cannot be confirmed as causal or valid through
mathematical inference alone. Care must be taken when considering the certitude of a model
due to the fact that any model may inadvertently exclude variables or factors. These factors
may then in turn change the nature of the relationships. While a SEM model may confirm
that the gathered data is consistent with the hypothesized relationships, this fact alone does
not guarantee that the model is true without external confirmation or a priori knowledge of
the basic pattern of relationships (Kline, 2011). This type of knowledge is rare in the social
sciences, and thus relationships of this type will not be hypothesized or investigated here.

One key issue in resolving a SEM model is the type of extraction to use. The
extraction represents the basic equation used for partialing and calculating the variance based
on the constraints and parameters set by the researcher. From this foundation, all of the
related values for the observed variables may be calculated. Many types of extractions exist,
but perhaps the most frequently used for continuous data are the multiple different iterations
of maximum likelihood algorithms. Maximum likelihood (ML) estimates attempt to create
the most statistically probable generalizations of normal continuous data drawn from the
population, calculated from the covariance matrix (Kline, 2011, p. 154–155). These measures are only valid using data which sufficiently approximates a normal distribution, and thus may not accurately estimate data which does not meet this requirement.

An alternative to maximum likelihood estimators are the family of least squares, some of which do not require the same assumptions of normality. Least squares estimators, like ML estimators, are both scale invariant, meaning that their distributional features do not change when all elements in the equation are multiplied by a common factor; and scale free, meaning that the any linear transformation can be reversed algebraically to replicate the original matrix. Weighted least squares are described as robust, meaning that they are able to estimate data accurately under a variety of circumstances, including ordered-categorical variables, strongly skewed or leptokurtic data, or small sample sizes. These methods may be particularly useful with Likert-type scales using 5 points or less (Kline, 2011, p. 178–179).

Further, there is some evidence that Likert-type data should generally not be treated as continuous as each number represents agreement under a specific category rather than a scale with continuous and equal distances between ratings (Carifio & Perla, 2007). As Likert-type scales often use wording such as “somewhat agree,” “agree,” and “strongly agree,” the subjective difference between these levels of agreement may not actually represent a recognizably continuous difference (e.g., one person’s response to “somewhat agree” may represent roughly anything above 51% agreement, while another person may perceive it as 70%). At the same time, maximum likelihood estimators are based on a logit transformation of the data as part of the calculation, and thus with a wide enough scale of variance (i.e., 5 points or over; Chang, 1994) or sufficiently normal distribution, maximum likelihood may be acceptable, especially with the use of robust estimators. In either case, when employing surveys with Likert-type items, the use of weighted least squares or other robust estimators
appears to represent the most valid option in order to account for numerous analysis issues which may occur as a result of the shape of the data.

The options offered by structural equation modeling are numerous, and both the philosophy and approach to this statistical repertoire grant the researcher numerous advantages over other traditional univariate and multivariate statistical techniques. Specifically with regard to the analysis of survey data and multiple observations of student performance, structural equation models provide the clearest picture of the measured data, and allow researchers to select the model that best fits the data.

Quantitative methodology is ultimately flawed in its inability to easily convey its findings to readers without extensive training; as can be seen in the descriptions above of SEM procedures, much of its nuances are lost without a level of comfort with the abstract mathematical terminology. While the rigor involved in quantifying real world phenomena ultimately makes it difficult to question, its results may not be readily understood or accepted, especially in the social sciences (Molden & Dweck, 2006). Especially when using abstract concepts, the target audience’s perspective may differ on specialized jargon, such as the concept of autonomy, and thus may be unable to make an actionable response to specific research findings (Johnson & Onwuegbuzie, 2004). Most problematically, teachers and administrators may not take the time to look at what and how the data shows, but rather rely on summaries of the research or even simply journal article titles. They may thus draw conclusions regarding practice based on an existing worldview, picking and choosing with a strong confirmation bias while never attempting to parse the technical nature of the work itself. While quantitative research allows for the best empirical evidence to be gathered and analyzed, the lack of human quality may make it hard for practitioners to use, and in education represents a gap between research and praxis on classroom learning.
4.2 Qualitative Research Paradigms

Qualitative research offers the opportunity to describe specific events and observable phenomena richly. The underlying epistemology of qualitative methods may be summarized as *phenomena are too complex, rich, and variable in how they are experienced to be summarized in numbers, and human beings best understand them subjectively*. Purist qualitative methodologies and interpretations claim that the data provided by qualitative research is incompatible and may even counter that found in quantitative research (Guba, 1990). In this view, the individual case and the narrative associated with it take precedence, for while they may not have top-down generalizability, they offer a connection to the human experience of the story. Through reading qualitative inquiry, readers connect their own subjective experiences with the rich descriptions of others’ experiences. Within this paradigm, it is not generalizing the phenomena to contexts, but rather describing the procedures, emotions, and experiences as clearly as possible in order to allow the audience to understand personal aspects of data such as the narrative (Clandinin & Connelly, 2000) or the subjective personal experience (Moustakas, 1994). The above examples express only several of the myriad methods and epistemologies of qualitative research (Starks & Trinidad, 2007; Creswell, 2008).

Where quantitative paradigms are most often associated with the post-positivist epistemology, pure qualitative research may take on numerous epistemologies (Creswell, 2008; Richards, 2005). These worldviews may in equal turns guide and be guided by the research goals and analysis. Given that qualitative research embraces the subjective, this affords a greater number of worldviews for defining both the methods of interpretation and intended outcomes. Common epistemologies in qualitative research include constructivism, where researchers co-construct meaning through the interaction between the researcher and
the research subjects; and advocacy-participatory, where researchers set about to set about a political agenda to explicate or right a situation through direct involvement of the research subjects (Creswell, 2008). Any single approach is often opposed to other epistemologies, and so may be difficult to combine (e.g., a constructivist researcher may not be able to draw out oppressed individuals to vocalize their stories in an advocate-participatory fashion while simultaneously trying to understand the underlying perspective and helping the individual to co-construct the narrative for interpretation). The role of the worldview in qualitative research is thus to provide the interpretive lens for interacting with the data. Within many qualitative paradigm, there is a tendency towards relativism to the extent that some researchers claim that certainty regarding knowledge is philosophically impossible.

From these extremes of relativistic thinking, qualitative research runs the risk of presenting flawed results. Even working with the belief that, all observable reality is subjective due to the researcher’s pre-existing biases and beliefs, this thinking quickly becomes a self-defeating tautology and thus other measures must be used to verify qualitatively observed phenomena. Thus in discussing qualitatively procedures, biases are best laid open to the reader, both to clarify the author’s position in relation to the research participants (Nakata, 2014), and to help the author more honestly recognize and understand his or her role in the interpretation of the data (Creswell, 2008, p. 192). To confirm the authenticity of observations, further procedures for data confirmation are necessary.

In checking the veracity of the data, a series of checks must be instituted to increase the accuracy of the data. These methods include peer debrief by checking individual coded categories with individuals outside the data gathering team; the employment of an external auditor who can verify the entire project, much as a devil’s advocate was charged to find the flaws in an argument for sainthood; and presenting of discrepant information which shows a
counter-case to the primary one being presented. Using these methods, qualitative research may achieve plausibility and trustworthiness (Richards, 2005), as well as some degree of falsifiability, a crucial element in adding it to the repertoire of scientific inquiry (Popper, 1959) and thus moving qualitative observation away from a completely relativistic series of interpretations.

At the same time, all qualitative research is inherently limited in its generalizability beyond the studied context. Without good reason to believe the ideas discussed are universal, practitioners must maintain healthy skepticism of qualitative insights. While easy to comprehend, these findings run the risk of being rejected outright by practitioners (i.e., those who would say “my situation is not like that”). While presenting the uniqueness of a certain case or situation, researchers must also be careful not to highlight the distinctions too strongly. For action-oriented strategies for classroom instruction, qualitative studies may offer ideas and models to practitioners, but may not be applicable outside of the situation described without some form of objective support for generalizing the findings.

4.3 Mixed-Method Paradigms

4.3.1 Mixed-Methods Research Worldview

While purely quantitative research often subscribes to the positivist/post-positivist epistemology and qualitative research may follow a plurality of worldviews, mixed-methods research is best served by a pragmatic approach to the data. Pragmatism works from the belief that the effects are of primary import, rather than the causes often investigated in a post-positivist worldview. To summarize the worldview, *both qualitative and quantitative models are important for understanding data, but only insofar as they are able to consistently and predictably produce a desired practical outcome.*
While other epistemologies may indeed allow for both qualitative and quantitative data gathering and interpretation, mixed-methods are often focused on application as opposed to a more purely research oriented framework. In taking on mixed-methods research, the researcher is often hoping to work in a flexible fashion and interpret results as they arise as need be. For this end, a **pragmatic** worldview is often useful.

Pragmatism is fundamentally concerned with the idea of what works, and secondarily how and why it works. In looking at how phenomena exist and interact in the real world, mixed-methods are inherently concerned with practicality. Through gathering both quantitative data for empirical verification and qualitative data for subjective interpretation, the goal of this framework is to provide both understanding and actionable points, and thus fulfill the needs of practitioners.

In educational research, this worldview places emphasis on the outcomes while documenting both measurable and subjective qualities influencing learning and instruction. It is the approach to both theory and practice advocated by Dewey (1948), as well as underlying much of the work by Brophy (2004; 2005). This approach matches well with the methods used by mixed-methods researchers as it provides a flexible way to approach data.

### 4.3.2 Mixed Methods Practices

While previous generations of researchers have stated that qualitative and quantitative methodologies are inherently incompatible (e.g., Guba, 1990), current theorists have countered that the two methodologies offer more similarities than differences (e.g., Johnson & Onwuegbuzie, 2004). Less polar views on the qualitative side argue that qualitative inquiry can offer ways to clarify and enrich quantitative data (Hesse-Biber, 2010a; 2010b), and thus has a place in presenting the human experience associated with empirical findings. Indeed, as
noted previously, quantitative research requires good theory and qualitative controls even in the experimental hard sciences (Shadish, Cook, & Campbell, 2002).

Within social sciences such as education, both quantitative and qualitative methodologies are inherently interested in providing well-grounded hypotheses and their answers regarding individuals and groups, especially with regard to school context, learning, and development (Onwuegbuzie & Leech, 2005). Qualitative observation forms the foundation and basis for theory, which then can be used as a way to generate further hypotheses to generalize on the data (Creswell, 2008). As discussed, quantitative decision processes are further inherently qualitative, from the generation of theoretical observation to methods for isolating observations to setting of objective cutoff points for alpha scores and fit indices.

In mixed-methods procedures, four main factors influence the overall shape of the research: weighting of qualitative and quantitative focus; timing of data gathering; mixing of data interpretation; and the role of theory. In designing a research project, these 4 factors must be clarified in order to ensure effective analysis. Researchers must first define the primary objective as either qualitative or quantitative, followed by procedures for data gathering. Figure 4.2 displays the possible design tracks for a research project. The research question defines the role of a specific methodology in the project, either primarily qualitative or quantitative, or equal weight on the two. In the notation of the project design (Creswell, 2008; Johnson & Onwuegbuzie, 2004), this is often shown using all capitals for the dominant methodology (“QUAL,” “QUANT”) or all lower for the less dominant paradigm (“qual,” “quant”).
Next, the timing of the data gathering must be resolved. Projects within a mixed-method design may be sequential, concurrent, or embedded. In sequential studies, one type of data is gathered followed by another type, and are usually shown using an “→” to denote the order of events. In concurrent studies, two different types of data are collected simultaneously, potentially from differing sources, and are generally shown using “+” to denote simultaneity. Embedded designs gather both types of data simultaneously from the same source, usually denoted by stacking the two on top of one another. Sequential designs allow for follow-up to deepen knowledge, while concurrent methods allow researchers to nest different types of questions within a larger collection of data (Creswell, 2008). Figure 4.3 illustrates how both the dominant paradigm and sequence of data gathering may be documented.

The final consideration for research is the role of theory. While many qualitative paradigms traditionally do not work with theory, many have recently come to accept the role of pre-existing theory for generating hypotheses and interpreting events (Creswell, 2008). On
the opposite side, good quantitative research in the social sciences often requires theory for creating instruments and generating hypotheses in line with previous research (Kline, 2009). While the generation of new theory and creation of new instruments based on observation may not require a background, the same approach may be taken with the application of a theory to a new context. For this purpose, researchers must clarify the theoretical position taken, be it strongly theoretically oriented or oriented towards generating a theory, in order to establish their research orientation for the reader.

<table>
<thead>
<tr>
<th>Sequential research designs</th>
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<tbody>
<tr>
<td>QUAL \rightarrow quant (Primarily qualitative with quantitative followup)</td>
</tr>
<tr>
<td>QUANT \rightarrow qual (primarily quantitative study with qualitative followup)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Concurrent research designs</th>
</tr>
</thead>
<tbody>
<tr>
<td>QUAL + QUANT (equal focus with data gathered simultaneously)</td>
</tr>
<tr>
<td>qual + QUANT (primarily quantitative study with simultaneous qualitative data)</td>
</tr>
<tr>
<td>QUAL quant (primarily qualitative study with embedded quantitative data)</td>
</tr>
<tr>
<td>qual QUANT (primarily quantitative study with embedded qualitative data)</td>
</tr>
</tbody>
</table>

**Figure 4.3. Research method design documentation. From Creswell, 2008.**

### 4.3.3 Theory in Mixed-Methods Research

As discussed in the previous section, theory may potentially have numerous applications in mixed-methods research. In order to apply these theories to both the qualitative and quantitative data, a *transformative mixed-methods* approach to the interpretation and application of data is necessary. An underlying theory guides what research questions to ask, how observations are to be taken, and how to approach the interpretation. In declaring a theoretical perspective, the researcher is clarifying any pre-existing biases that may be held by virtue of utilizing this research method.
In some instances, social science theory may be a particular advocacy worldview or ideology, such as feminism or internationalization, but this is not always necessary. As many psychological and educational theories carry with them corollaries and sub-theories, these may also allow researchers to deepen their understanding of the world and document phenomena using a specific lens. In most cases, the theoretical framework provides some access to the methods, and the theory is a stronger guide to analysis than the methods themselves (Creswell, 2008, p. 212).

For the purposes of applying theory to practice, mixed methods research offers the greatest chance of capturing both a valid empirical framework while documenting classroom events of clear relevance to elementary foreign language teachers. By approaching data from both qualitative and quantitative perspectives, mixed-methods allow researchers to adopt a flexible approach, borrowing the concept of “best of all, worst of none” (Page, 2012).

4.4 Current Research Goals

The overall goal of this thesis is to outline and describe a series of observable teaching practices with an inferred causal link with positive student engagement. By identifying these behaviors through qualitative and quantitative cross-validation, ultimately testing their effect longitudinally, I hope to demonstrate how elementary teachers can engage their students behaviorally, emotionally, and cognitively for the purpose of “priming the pump” of their long-term motivation. Recognizing motivation as both a situational and personal construct (Brophy, 2004), understanding how teachers support student engagement within the school setting is crucial to understanding motivation and educational achievement. In order to achieve the above goal, this thesis will investigate the following overarching questions and
subquestions:

1) **How do teachers structure classes to engage students in foreign language learning?**
   a. What indicators contribute to highly successful foreign language teachers’ classes?
   b. How do students perceive differences in classes led by native and non-native teachers?

2) **How does structure influence students’ motivational needs and in-class engagement?**
   a. Does a direct predictive effect exist between autonomy-supportive classroom structure and classroom engagement?
   b. How does structure influence motivational and psychological needs?
   c. What are the motivational outcomes of structured classroom environments?
   d. Are self-reported engagement and motivation recognizable to teachers and other outside observers?
   e. What differences in speaking output do students report in classes taught by native and non-native teachers?
   f. What effects do perceptions of each type of teachers' spoken output have on students' reported speaking output?

3) **What are the features of high and low structure and engagement classes?**
   a. Are students’ ratings of supportive structure recognizable to outside observers?
   b. What features of activities, teacher attitudes, lesson organization, behavioral management, and physical classroom settings differ in high and low engagement classes?
   c. What additional unmeasured or unmeasurable specific instructional features may be salient to learning in foreign language classes?

These questions and subquestions form the goals to be investigated within this program, with subquestions intended to facilitate a clearer answer of the program of inquiry. Each of the proceeding Chapters will address at least one of the subquestions. In order to appropriately answer these questions, this study will rely upon a mixture of both quantitative and qualitative methodologies. These methods are oriented towards opening the black box of what happens in school and classroom interactions in order to understand how students are
engaged in the learning process.

Research Question 1 comes from the fact that this study is in some ways exploratory. While significant research has been conducted on structured teaching in first language and general education settings (Jang, Reeve, & Deci, 2010), cultural and contextual issues (described in Chapter 3) may make a direct translation difficult. This basic qualitative analysis is used to generate and bridge the theoretical and practical gaps. By generating a theory of how classrooms may be appropriately structured in a cross-cultural context, some conclusions may be drawn towards universally relevant practices. Further, by understanding differences in students’ perceptions of native and non-native teachers, some understanding may be reached as to how these differences should be modeled for large-scale quantitative investigation.

Research Question 2 and its subquestions concern how students’ perceptions of their environment influence their behavior. This line of investigation works from three main ideas presented in Chapter 2: Lewin’s concept of behavior as a function of the environment and the individual’s perception (Lewin et al., 1944); Bandura’s (1986) corollary triadic model of the person in environment; and Skinner’s reciprocal self-system model of motivational development (Skinner et al., 2008), where engagement comes through basic psychological need satisfaction (Ryan & Deci, 2002), as well as influencing how teachers interact with students. Drawing on these three sources, these research questions are intended to show how classrooms may help students to thrive or diminish their motivation to learn. Following from the previous research question, the final questions also address the effects native speaker English teachers may have on Japanese students’ engagement.

Research Question 3 looks to extend the work done by Jang and Reeve (2006) on
what teachers do and say to motivate students. These questions are designed to complement the investigations under RQ2, looking for key instances, practices, and ways of interacting that may be particularly instructive on how teachers may help to engage and motivate students. This line of inquiry works from the idea of deepening understanding of good classroom practice based on a solid empirical foundation.

4.4.1 Current Approach

In order to provide the best possible model of foreign language motivation in elementary schools, I will use a mixed-methods approach to data gathering and analysis. In following with the argumentation and outline of research provided by Johnson and Onwuegbuzie (2004) and Creswell (2009), this research project aims to provide a richly detailed understanding of how to teachers may create a motivating environment in elementary schools, firmly founded on a base of valid theory, high-quality empirical observations and data collection.

Looking at the three frameworks of interpretation, this project represents the intersection of pragmatism, mixed-methods, and self-determination theory. The model for these three interpretive frameworks is illustrated in Figure 4.4. Pragmatism represents the need to answer questions for use in real educational settings. Mixed-methods allow this project to test and verify data from multiple modalities, thus giving the greatest likelihood of providing teachers with successful instructional strategies. Finally, as discussed in Chapters 2 and 3, self-determination theory represents a cross-culturally robust theory for the interpretation of motivation, and thus will be used as the basic theoretical framework for this study. Through the combination of these frameworks, this research offers a historically situated and diverse perspective on the application of motivation to learn in Japanese elementary schools.
At base, this project should be understood as a qualitative project; working with both student reports and observational data, I hope to show the observable qualities and practices teachers use to positively influence student motivation. Following this, a qualitative research goal may then be supplemented by quantitative data gathering and analysis, as well as qualitative analysis. Accordingly, this study follows the designs in paths 3 and 4 in Figure 4.3, with the data analyzed both quantitatively and qualitatively to show the complete picture classroom realities.

Using this pragmatic approach to hypothesis generation, data gathering, and analysis, I hope to demonstrate both the generalizability of existing motivational theory to Japanese elementary school foreign language learning, as well address as the localized contexts and conditions which arise in Japanese elementary schools. Through understanding both
students’ self-assessed internal world through surveys, as well as triangulating their environments through video data analysis, this thesis will show how teachers may motivate young learners through foreign language educational activities.

4.5 Current Research Procedures

4.5.1 Research Outline and Design Overview

The five main research Chapters of this thesis are laid out in Table 4.2. Chapters 5 through 7 detail the qualitative and quantitative groundwork leading to the main study documented in Chapters 8 and 9. Chapter 5 details the observational protocols for understanding structure in foreign language teaching contexts. Though positive teaching practices for motivating students have been posited based on theoretical perspectives (e.g., Dörnyei, 2005), specific practices of highly engaging elementary teachers deserve special attention in order to derive effective methods for helping students to engage in class. While the idea of what might constitute autonomy-support and structure in foreign language has been researched (Noels, 2003), features of this may differ across cultural contexts (Iyengar & Lepper, 1999). Using multiple contexts to gain the most generalizable factors, this Chapter investigates foreign language teaching practices in the United States and Japan. The findings in this Chapter are used to develop the basis and background for the study in Chapter 6. Chapter 6 details the procedures used to explore and validate the practices documented in Chapter 5. This Chapter focuses on Japanese elementary students generating items regarding good classroom teaching based on self-determination theory. Chapter 7 details an individual comparison of the features of structure generated in Chapter 6. Using a quasi-experimental design embedded within Chapter 6, this Chapter shows comparisons between native and non-native teachers with regard to how students perceive their teaching styles.
Table 4.2. Research outline for the 5 research Chapters of this thesis.

<table>
<thead>
<tr>
<th>Design</th>
<th>Participants</th>
<th>Time</th>
<th>Research Goal</th>
<th>Methods</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ch. 5</td>
<td>QUAL: Observational</td>
<td>Elementary students and teachers in Japan and the United States</td>
<td>Fall 2010 (USA); Spring 2011 (Japan)</td>
<td>Observe and record potential elements of structure for foreign language classes to understand preliminary features of high-engagement classes in multinational context</td>
</tr>
<tr>
<td>Ch. 6</td>
<td>qual → QUANT: Discussions followed by 4 longitudinal quantitative validation studies</td>
<td>Japanese 4th-6th grade students (Discussions); 5th grade students (surveys)</td>
<td>Summer 2012 – Winter 2013</td>
<td>Create and validate an instrument for measuring students’ understanding of foreign language classroom structure-support</td>
</tr>
<tr>
<td>Ch. 7</td>
<td>QUANT: Cross-sectional Survey Research; Quasi-experimental</td>
<td>Japanese 5th grade students</td>
<td>Summer 2012</td>
<td>Measure and record students’ reactions to classes led by native, non-native, and non-specialist teachers’ classroom structure, with a view to identifying significant differences between teachers</td>
</tr>
<tr>
<td>Ch. 8</td>
<td>QUANT: Longitudinal surveys at 3 data points; external ratings by observers; assessment by teachers</td>
<td>Japanese 5th grade students and their teachers</td>
<td>Spring 2013</td>
<td>Use the research instruments to find further patterns of structure-support which strongly influence both self-reported and observed classroom engagement, then test their influence on long-term motivation</td>
</tr>
<tr>
<td>Ch. 9</td>
<td>qual → QUAL: Observe and document features of high-structure</td>
<td>Japanese 5th grade students and their teachers</td>
<td>Spring 2013- Winter 2014</td>
<td>Use the research instruments to find further common features of supportive-structure which influence both self-reported and observable classroom engagement</td>
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In the first Chapter of the main study, Chapter 8 details the longitudinal quantitative procedures used to show changes in motivation and engagement across the school year. Based on the individual classrooms in Chapter 8, Chapter 9 looks at the observable practices used by highly engaging teachers. Thus the overall body of this research will trace the pattern outlined in Figure 4.5.

![Sequential research design](image)

Figure 4.5. Research design and Chapter outlines.

This design uses a partially symmetrical design, with layers of quantitative research sandwiched between qualitative classroom observations. Using flexible amounts of theory
and observation to document classroom events before the ultimate presentation of common principles for instruction, I hope to offer a practice-oriented guide for teachers to take to the classroom. By standing on thoroughly documented phenomena in Chapters 5 through 7, the final research design will offer the best available interpretation of the motivational effects of the classroom environment over the course of a school year. The overall model for data triangulation and embedding to be used in Chapters 8 and 9 is detailed in Figure 4.6.

This project will include a series of surveys to measure students’ internal perceptions of their motivational state at the beginning and end of their foreign language studies, as well as the environment in their foreign language classes. Classroom surveys will be triangulated through external quantitative observations. External observers will then describe the qualitative elements of teachers’ scaffolding and instruction. As outcome variables, teachers will provide their assessments of students’ performance in class. One of the major goals of this work is to have no data point reliant on only one point of observation, but rather to cross-validate all data independently. By exploring the classroom environment from multiple perspectives, I hope to provide a sense of both quantitative validity and qualitative trustworthiness to the data.
4.5.2 Participants and Setting

The subjects for this study will come from seven suburban schools in southwestern Japan. This city serves roughly 100,000 people. The city spans a wide area, encompassing farmland, fishing villages, and suburban business areas. While there is a substantial elderly population in the town, it is also located within commuting distance from two major urban centers, and so is a popular location for young families. Much of housing property is tenant-owned, and there are a significant number of locally owned and run businesses.

The schools ranged in size from roughly 100 students in grades one through six to close to 1000. The schools themselves are very similar to those described by Peter Cave (2007), indicating similarity to many suburban Japanese elementary schools. For the most part, facilities have been built or renovated within the past two decades, though many of the
renovations were to maintain existing school buildings constructed in the 1950s and 60s. As the focus of this thesis is on the interpersonal rather than physical school environment, unless absolutely necessary classrooms and facilities will not be discussed in this study.

The largest participating school had 5 classes of 30+ students per grade, while the smallest had only 1 class of roughly 25 participating students. Public schools in the area are of good reputation. Unlike in Tokyo and other major metropolitan areas, students in elementary school are not pushed to compete for limited spaces in elite schools (Carreira, 2012). As in most of Japan, the vast majority (99+%) of the students go on to upper secondary education in an average year, and a large number continue on to tertiary education as well (Statistics Japan, 2014).

Cooperation for this research was provided by the principals and teachers at each school, with the support of the local board of education. All studies were granted approval by the Fukuoka University of Education Ethics Review Board. Local boards of education provided permission for the research, coordinating with school principals and teachers. All participating teachers and principals were informed of the scope and aims of the study before agreeing to sign permission forms. Principals, acting in loco parentis, gave permission to gather student data.

For the majority of the study, fifth-year classes were chosen as fifth grade is the first year targeted for foreign language study in Japanese elementary schools (MEXT, 2008a). The fifth year of elementary school is further ideal due to the fact that students have little previous in-school foreign language experience, and therefore have fewer expectancies regarding the classroom environment based on previous classroom learning (Bandura, 1986, pp. 230–231). Based on the fact that upper elementary learners are quite likely to begin to lose their
motivation over time beginning in this period (Kim & Seo, 2012) an investigation of this period is appropriate for understanding both the how and why of this trend.

4.6 Data Gathering Instruments

4.6.1 Student Self-Report Surveys: Classroom Environments

As noted above, social sciences research often makes use of surveys to investigate the quantitative relationships between variables and individuals. This research will also make use of surveys in order to best assess students’ ideas and emotions in relation to foreign language education. Through the use of structural equation modeling I hope to show the nature of the underlying relationships by preserving the variance inherent to the answer patterns in the surveys, while also taking care to recognize unmeasured features which occur outside of the gathered data.

These studies made use of several measures of students’ experience in elementary foreign language classes. One survey was created with the intention of detailing the culturally situated experience of supportive structure in foreign language classes. The background and creation of these survey items are detailed in Chapters 5 and 6, and are investigated for significant differences between teacher contexts in Chapter 7.

Also considered with these items are students’ basic need satisfaction and engagement. Following the SSMMD (Skinner et al., 2008), classroom interaction will either facilitate or hinder students’ engagement by a process of meeting or thwarting students’ needs. In order to effectively model this process, previously validated sets of items will be adopted, translated, and modified to facilitate understanding. The surveys to be used are the Activity-Feeling States (AFS) scales (Reeve & Sickenius, 1994) to measure autonomy, relatedness, and competence need satisfaction, and three scales measuring emotional,
behavioral, and cognitive engagement (Skinner et al., 2008; Wolters, 2004). Confirmatory procedures validating these survey items are detailed in Chapter 6. The Japanese survey items are presented in Appendices 2 through 6.

**4.6.2 Student Self-Report Surveys: Internal Regulations of Motivation.**

In order to understand and control for students’ internal motivational orientations, as well as to measure the motivational outcomes of the current course of study, pre-post surveys of students’ regulatory orientations will be given. These surveys will be based on the original work outlined by Ryan and Connell (1989) and translated by Tanaka (Yamauchi & Tanaka, 1998) and Carreira (2012). Confirmatory procedures used to demonstrate internal validity and theoretical integration are outlined in Chapter 6, and the data is applied in Chapter 8.

**4.6.3 Teacher Surveys**

Teachers’ assessment of in-class behaviors may offer further understanding of how students engage with classroom materials. Using a four-item instrument created to measure students’ in-class engagement and motivation in line with ideas in both previous research (e.g., Lee & Reeve, 2012) and the Japanese Course of Study for Elementary Schools (MEXT, 2008a). The four items in this survey measured teachers assessment of students’ interest, willingness to learn, in-class behavior, and communication ability with regard to foreign languages. As assessment is not considered part of foreign language learning, this instrument is designed to stand in as an external measure of students’ foreign language achievement. This survey is presented in Appendix 7, and will be discussed in greater detail in Chapter 8.

**4.6.4 Observer Ratings**

External observation was used as a check on students’ self-reported engagement. As behavioral engagement is theoretically visible (Fredricks, Blumenfeld, & Paris, 2004), and
other aspects of engagement may be likewise recognizable to outside observation, rating scales were created to assess students’ collective engagement at each minute of the class. These observation instruments are presented in Appendix 8, and with in-depth discussion in Chapter 8.

4.6.5 Qualitative Observation Procedures

Recognizing the strengths and limitations of the quantitative procedures listed above for creating objective measurement, this study made use of qualitative procedures to promote trustworthiness and verifiability in data analysis. This study used multiple data points to triangulate students’ perceptions of motivating classroom practice. In order to consistently label classroom events, codes were created from a pre-existing series of categories based on existing the existing classroom practice literature, as outlined in Chapter 2. As discussed, using a theoretical background recognized beyond the foreign language motivation literature offered opportunities to connect with the existing body of knowledge from first language and general education studies, and thus gives access to a greater variety of valid strategies and codes for interpretation. While much of the documentation of these observation and analysis practices will be discussed in depth in Chapters 5 and 9, this Chapter will offer a brief outline.

In order to generate new theory, fresh observations unclouded by existing bias are necessary. It is in this mindset that Grounded Theory operates (Corbin & Strauss, 2008). Based originally on the notion that researchers should approach their data as blank slates with minimal pre-conceived notions, this theory is designed to create new theoretical perspectives on observable events, statements, and interactions. At the same time, practical limitations prevent a researcher from ever being fully empty of preconceived notions regarding the target of their data.
Chapter 5 was conducted from a relatively fresh perspective, using my own observations and notes to look at how teachers structure their classrooms to engage students in foreign language learning. At this early phase in the research, I was still developing an understanding of the field, and so had only my own personal classroom experiences to work from. My own bias in this matter tends to favor classes where students are active, organized, and on-task. Recognizing this, I chose classes who fit this profile as the main target of analysis.

Recognizing the danger that my own theories and observations taken from Chapter 5 could potentially influence my analysis, I chose to work through intermediary observers in Chapter 9. These observers were less likely to rely on the heuristic lens of theory to explain phenomena they observe. These observers were closer to the expected *tabula rasa* recommended by grounded theory. Through interacting with them and their perceptions of how teachers influence students’ behavior in the classroom, while at the same time interpreting their independently noted phenomena through my understanding, I aimed to integrate their observations with the theoretical background to this work.

This Chapter has clarified the philosophical, theoretical, and methodological issues to be used in the following Chapters. As each stage of the study uses a slightly different approach, exact procedures, goals, and hypotheses will be clarified at the individual stage where they are most pertinent. Each Chapter will outline the research goals of the individual study in regard to the framework of the larger study. While each phase of the overall study differs from the others, all are working towards a single project goal of describing actionable classroom management, activities, and scaffolding choices based on empirically sound results for the purpose of improving practice in elementary foreign language classrooms in Japan.
Chapter 5—Defining Structure: Optimizing New Language Use by Employing Young Learners’ Own Language

*Keywords: Structure, classroom practice, observation, qualitative, multi-national*

Based on the issues outlined in the previous three Chapters, one key issue in promoting positive motivation for foreign language learning is the problem of engaging learners in class activities. While research has documented motivational strategies that teachers may use in class (Dörnyei & Csizér, 1998; Sugita & Takeuchi, 2010), these strategies may differ from engaging, autonomy-supportive teaching principles. In order to better engage learners with both the classroom environment and language, a catalog of actionable interaction features based on current practices by veteran teachers may provide an example for teachers searching for ways to better draw students into class activities. To define these practices, this study began with the assumption that with regard to foreign language classes, greater exposure is necessary to facilitate more complete and efficient learning (Turnbull, 2001).

As discussed in Chapter 3, the use and appropriate amount of students’ own language (OL) in foreign language classes remains a subject of debate, even with the employment of native English-speaking teachers. While exclusive new language (NL) use may not necessarily always benefit all learners, especially young language learners (YLLs), overuse of the students’ OL may not provide the same range of communicative experiences as greater NL exposure. At the same time, based on much of the controversy in elementary foreign language use and the fear of damage to YLLs’ own language development (Otsu, 2005; Torikai, 2006), teachers may feel pressured to use large amounts of the OL as opposed to the NL to prevent confusion and potential damage to students’ OL development (Inbar-Lourie,
As discussed in Chapters 2 and 3, damage to learners’ own language development is unlikely, and previous studies have shown no significant positive or negative relationship between a new language and own language self-concept (Xu et al., 2013).

Thus, while *exclusive* new language use may not be necessary or desirable, well-organized and carefully planned use of both languages may lead to positive outcomes (Macaro, 2009). Following this argument, from a self-determination standpoint, structured and autonomy-supportive teaching has been shown to have a positive effect on learning. By organizing instruction in a positive and carefully managed fashion, teachers may be able to improve engagement and achievement (Jang, Reeve, & Deci, 2010). Recognizing that the course of study (MEXT, 2008a) intends to improve positive affect for the foreign language through foreign language activities, a certain amount of competence-focused practice must then be necessary to meet students’ basic needs (see Chapters 2 and 3). In order to bridge the current gap between the linguistic, educational, and psychological fields that seem to exist in discussion of Japanese elementary foreign language activities, this Chapter reports on a preliminary study investigating how teachers of elementary-age YLLs use the students’ OL in a systematic fashion to create an optimally rich NL environment.

**5.1 Research Question**

In order to provide principles for managing teacher OL use in optimal NL classes for EYLLs, and in response to calls for additional classroom-based research on the use of the OL in foreign language teaching (Hall & Cook, 2013), this study seeks to answer the following questions from Chapter 4:

1) **How do teachers structure classes to engage students in foreign language learning?**

   a. What indicators contribute to highly successful foreign language teachers’ classes?
While every teacher has an individual subjective conception of what a successful class entails, this study seeks to define successful foreign language classes in the following terms:

1) Minimal behavioral problems, such as off-task activities, private conversations, and failure to comply with teacher instructions.

2) Maximal positive behavioral and emotional engagement, evidenced through positive student commentary, completion of activities, and use of the NL without coercion or reminders.

3) Lack of student confusion with regard to activities, expectations, and codes of conduct.

4) Minimal but judicious and systematic use of the students’ OL.

The above criteria reflect many teachers’ classroom ideals (Good & Brophy, 2008). The fourth condition reflects principles from Macaro’s (2009) and Turnbull’s (2001) discussions of effective classes. The term ‘systematic’ is used here to indicate regularized practices applied in a predetermined, organized fashion. In defining success in this fashion, our hope is to provide readers with a common frame of reference for the judicious use of students’ OL in facilitating NL-rich classes, and thus help to provide steps for reaching that goal.

5.2 The Study

5.2.1 Participants

This study investigated successful elementary teachers' use of the students’ OL to support use of the NL in the contexts of English as a foreign language in Japan and Japanese as a foreign language (JFL) in North America.

The Japanese EFL/North American JFL environments were chosen as they offered contrasting cultural contexts for the study; in looking for practices of use to EFL teachers, finding commonalities across different cultures and contexts may offer more universal suggestions. Schools also had similar foreign language program goals, focusing on promoting communication and positive affect through the use of the NL, rather than specific linguistic
achievement measured through tests or other assessments (Enever, 2014). The schools here did not include linguistic benchmarks that students must pass, but rather focused on communicating and enjoying using the language.

Twelve elementary schools (four in the USA, eight in Japan) were initially investigated in the fall of 2010 and spring of 2011. Of the twelve schools, six teachers at four of the schools (two North American, two Japanese) were found to meet the four criteria (above) for successful classes. Classes with student behavioral problems, low visible student engagement, or a large amount of OL use were excluded from the study. Classes were confirmed as suitable or unsuitable by peer debrief; two trusted colleagues were asked to watch videos of the classes and verified the appropriateness of the class selection according to the above criteria. In order to respect each teacher’s anonymity, minimal identifying information will be presented. Teacher profiles are listed in Table 5.1.

The North American schools selected were two public elementary ‘magnet’ schools in the eastern United States. Magnet schools are publicly funded primary and lower secondary institutions with direct oversight from boards of education, created to provide equal opportunity education to students of diverse backgrounds from different public school zones within a district. Students come from a variety of ethnic, socio-economic, and linguistic backgrounds, many with diverse learning needs. Students are drawn by a lottery from areas around the school districts. The three US-based teachers each had over ten years’ experience teaching Japanese in elementary schools. Teachers A and B were Japanese native speakers while Teacher C was American with training in Japan.

The settings in Japan were two local public elementary schools in suburban western Japan. School assignment was based on residence. Students were all Japanese native
speakers. Teacher D was an English native speaker from an inner circle country of the English world (i.e., Australia, the USA, etc.; Kachru, 1998), while Teacher E was a native-like speaker of English as a Second Language from the expanding circle (i.e., Hong Kong, Singapore, etc.). Out of respect for these teachers’ anonymity, exact nationalities will not be provided. Teacher D consistently taught with students’ homeroom teachers (generalist classroom teachers who teach the majority of subjects: mathematics, science, language arts, etc.). Teacher F was an English-speaking Japanese teacher who team-taught with Teacher E. Teachers D and E had between one and three years’ EFL teaching experience, while Teacher F had more than ten years’ experience. Both Teachers D and E worked under a contract requiring them to avoid using the students’ OL, which resembled the ‘English only’ policies described by McMillan and Rivers (2011).

Classes in all of these schools were part of programs to provide foundations for learning a foreign language. Classes did not include proficiency and achievement testing, and placed emphasis on receptive learning, comfort, familiarization, and positive affect. Class time with the foreign language was between 45 and 75 minutes per week. Schools in the USA teach foreign languages to students from kindergarten through fifth grade, with students aged from 5 to 11 years old. In Japanese schools, foreign languages are taught to fifth and sixth grade students, aged 10 to 12 years old. Class sizes ranged from 20 to 30 children in the US, while Japanese classes ranged from 25 to 40 pupils.

5.2.2 Methods

Observations were conducted over several consecutive days. Each elementary class cohort was observed at least once, and several were observed twice. Data were collected via field notes describing student and teacher behaviors and interactions. Each class was audio recorded, and where parental permission was granted, videos were taken. Key passages were
coded using grounded theory axial codes (Corbin & Strauss, 2008), then selected and transcribed. Codes were based on previous findings and theoretical considerations (Good & Brophy, 2008; Macaro, 2009), in line with provisions for theoretical comparison and integration (Corbin & Strauss, 2008, 75–8). Following measures outlined by Corbin and Strauss (2008) and Creswell (2009), data codes were checked with peer debrief to verify the trustworthiness of the codes.

5.3 Results

Table 5.1 displays each teacher’s profile, grade taught, ways in which the students’ OL was used to support an optimal NL (i.e., Japanese in the USA; English in Japan) classroom, and the amount of teacher talk time using the NL.

Table 5.1. Teachers’ profiles and OL use.

<table>
<thead>
<tr>
<th>Participant and school</th>
<th>Gender</th>
<th>New language</th>
<th>Own language status</th>
<th>Student grades and ages</th>
<th>Use of OL to support NL optimization</th>
<th>Total time speaking students’ OL across all observed classes (mm:ss)</th>
<th>% of total teacher talk in NL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Teacher A School 1</td>
<td>Female</td>
<td>Japanese as a foreign language</td>
<td>Native Japanese speaker</td>
<td>Grades: K–5 Ages: 5–11</td>
<td>Signalling; NL routines; use of the NL sound system for OL words; tight transitions</td>
<td>15:17 across 16 x 25:00 classes</td>
<td>91.7%</td>
</tr>
<tr>
<td>Teacher B School 2</td>
<td>Female</td>
<td>Japanese as a foreign language</td>
<td>Native Japanese speaker</td>
<td>Grades: K–2 Ages: 5–8</td>
<td>NL routines; use of the NL sound system for OL words; tight transitions</td>
<td>0 minutes across 8 x 25:00 classes</td>
<td>100%</td>
</tr>
<tr>
<td>Teacher C School 2</td>
<td>Female</td>
<td>Japanese as a foreign language</td>
<td>Native English-speaker</td>
<td>Grades: 3–5 Ages: 8–11</td>
<td>Signalling; NL routines; use of the NL sound system for OL words; tight transitions</td>
<td>8:44 across 10 x 25:00 classes</td>
<td>95.4%</td>
</tr>
<tr>
<td>Teacher D School 3</td>
<td>Male</td>
<td>English as a foreign language</td>
<td>Native English-speaker</td>
<td>Grades: 5–6 Ages: 10–12</td>
<td>NL routines; signalling; tight transitions</td>
<td>0 minutes across 4 x 40:00 classes</td>
<td>100%</td>
</tr>
<tr>
<td>Teacher E Teacher F School 4</td>
<td>E: male F: female</td>
<td>English as a foreign language</td>
<td>E: English as a second language speaker F: Native Japanese speaker</td>
<td>Grades: 5–6 Ages: 10–12</td>
<td>NL routines; signalling; use of the NL sound system for OL words; tight transitions</td>
<td>Teacher E: 0 minutes and Teacher F: 7:38 across 6 observed x 40:00 classes</td>
<td>Teacher E: 100% Teacher F: 86%</td>
</tr>
</tbody>
</table>
In all cases, teachers used the NL in over 80 per cent of their utterances, and most used it over 90 per cent of class time. The systems by which teachers used the students’ OL were coded as ‘signalling’, ‘use of the NL sound system for single-word OL utterances’, ‘repeated routine use of the NL’, and ‘tight transitions’.

5.3.1 Signalling

One of the key features used by each teacher was a clear system of signalling procedures for when use of the students’ OL was appropriate, though these systems and methods varied by country. As I define it, ‘signalling’ may be understood as a systematic method to indicate the timing and circumstances when class participants may use their OL.

Teachers of Japanese in the United States used a system of posting a laminated Japanese flag or sign with the word for ‘Japanese’ on the blackboard to signal when Japanese was to be used. This sign could then be reversed to show an American flag or the word ‘English’ as a reminder for both teacher and students. In principle, the teachers in North America used the students’ OL solely as a means of explaining complex activities and assignments. As can be seen in Extract 5.1 below, students were at times more apt to hold to the routine than the teacher (see Appendix 1 for transcription conventions).

Extract 5.1: School 2, Teacher C

Teacher C:  
\textit{Jaa, minnasen, kyou sore de owarimasu}  
(Well, everyone, that’s all for today).

Now, there’s something ...

Student:  
::pointing to the flag::  
Sensei, sensei, Nihongo!  
(Teacher, teacher, Japanese!)

Teacher C:  
\textit{Ah! Wasuremashita!}  
(Oh! I forgot!)

::turns sign around to show English::  
Now, as some of you may have heard . . .
The above incident demonstrates not only the signal for maintaining the regular use of the NL, but also the importance of that signal for the students. Even when teachers forget the signal routine, students try to follow it and maintain the use of the NL, demonstrating how this classroom culture has influenced students to use the NL while expecting reciprocal behavior from the teacher. The students’ use of the NL above what might be necessary to convey a message (here, shifting the teacher’s attention to the flag) also shows how accustomed the students have become to both the routine and the language.

Contrasting with the visual signalling used in the North American schools, EFL classes in Japan primarily used signals to prompt student use of their OL in order to explain, clarify, or confirm the meaning of the teacher’s English. All three teachers provided students with demonstrations and English instructions, and then asked students to explain in Japanese, with native Japanese-speaking teachers confirming appropriate understanding. An example of this from Teacher D’s class (Extract 5.2) illustrates how teachers explain in the NL but confirm understanding using the OL:

**Extract 5.2: School 3, Teacher D**

Teacher D: Now, look at me. We’re going to use our erasers. What’s an eraser? [Male student A], what’s an eraser?

Male student A: *Keshi gomu* (Eraser in OL)

Teacher D: Yes! We’re going to put our eraser in the middle.

::picks up and places eraser::

Right here. OK? So the keyword is pizza, OK? When I say, ‘I like pizza’ you grab your eraser. If you are fast, you are the winner. OK?

Students: OK.

Teacher D: OK. Uh, [Male student B] please explain.

Male student B: ::Points to self:: *Ore?* (Me?)

Teacher D: Yes.

Male student B: ::hesitates:: *Nanka, erabareta tabemono wo ittara, keshigomu wo toru.*
(Um, if you say the food you chose, we grab our eraser.)

Teacher D: OK! [Homeroom teacher name], what do you think, is that OK?

Homeroom teacher: Yes, OK.

This passage demonstrates the dual function of a system for OL use for confirming students’ understanding while also creating opportunities for homeroom teachers to be involved in class, a key feature for promoting students’ NL use (See Chapter 6). In many cases, the homeroom teacher was instrumental in facilitating the systematic signal for OL use and providing feedback, as the non-Japanese teachers were expressly forbidden from using students’ OL. From this example of classroom interaction, we see the students demonstrating comprehension through the use of the OL, aided by their homeroom teacher, while primarily receiving the instruction in the NL.

5.3.2 Use of the New Language Sound System with Single-Word Own Language Utterances

Several teachers used OL in a fashion that disguised its use. As seen in previous studies, teachers would insert single OL words within otherwise NL sentences (Macaro, 2009), but these teachers maintained the use of the NL sound system with the OL words. In Japanese language classes in the USA, teachers would pronounce English words with a strong kana pronunciation (rule = ru-ru, blackboard = burakku bo-do, etc.) in sentences otherwise surrounded by Japanese. In the EFL classes in Japan, teachers would similarly use Japanese words in English sentences without reverting to kana pronunciation. This was most prominent with NL words that had not been previously taught, but were not related to the lesson goals, as with OL use documented by Macaro (2009).

In one example (Extract 5.3), Teacher B demonstrated this during her opening routine, using NL to successfully manage a group of 5- and 6-year-old kindergarten students as they
entered the classroom:

*Extract 5.3: School 2, Teacher B*


(Spots, please. Spots, spots. [Male student name], to your spot. Thank you, [Male student name]. Yes, there. Yes, yes. OK? Then, everyone quietly stand up please.)

While this teacher was using non-standard Japanese expressions (supotto), she did not break the feeling of using the foreign language, pronouncing this English word in the NL (i.e., Japanese) sound system.

Teachers E and F in Japan made similar use of the NL (i.e., English) sound system in their classes when asking students to use specific materials for an activity (see Extract 5.4). When referring to a pen case, they used the OL translation *fudebako*.

*Extract 5.4: School 4, Teachers E and F*

Teacher E: *Everyone, we don’t need fudebako today. Please put your fudebako under your chairs.*

Teacher F: *Fudebako wa iranai.*

(We don’t need our pen cases).

Under your chair, please.

::students put pen cases under their chairs::

Teacher E: *Yes, no writing today.*

In the above example, the word fudebako is not a commonly recognized English expression, but is used to facilitate quick understanding of the classroom instructions. Teachers E and F used the Japanese expression because it was not part of the lesson target, at the same time transforming the word from the Japanese pronunciation where each syllable is equally stressed to a more English-like pronunciation. The first syllable [fu] was more strongly stressed and the second syllable [de] pronounced with a schwa. While this represents OL use,
it also represents a method by which teachers can simultaneously make use of features of the NL.

### 5.3.3 Repeated Routine Use of the NL

Having established that some OL use facilitated NL use in the classroom, teachers also needed to ensure that NL predominated and that students did not see some OL use as allowing for much OL use. To create a sense of familiarity, each of the observed classes used a long warm-up routine, followed by a series of short games and activities using regular repetition of the NL for this specific lesson. The warm-up routines were often physical, musical, or both, with elements that changed slightly throughout the year in order to maintain student interest. These routines allowed teachers to repeat language and build feelings of competence (Wu 2003), and thus were able to use increasing amounts of the NL.

While exact timing of the classes differed, at minimum roughly a quarter of the class time (10 minutes in a 45-minute class in Japan) to as much as half of the class (10 to 15 minutes in a 25-minute class in the USA) was dedicated to these routines, often followed by familiar activities. Both North American schools would start class with physical and musical routines, followed by the repetition of the basic classroom rules (‘Listen well; no touching other people; raise your hand to speak; speak in Japanese’), recited by both teachers and students in Japanese. This recitation included gestures to illustrate the meaning and remind students of the protocols. The schools in Japan used similar warm-up routines with NL songs, games, and standardized questions. Following this pattern, students in both the Japanese and North American classes recognized the teachers’ behavioral expectations for the class.

Routines were universally focused around prompting production, either through choral repetition, singing, chanting, or responding to prompts with pre-set chunked phrases
(‘I’m hungry’/‘It’s Thursday’/‘It’s 11:25’/‘I like dogs’, etc.). During these routines, students regularly produced language loudly and with little hesitation. As a large part of each class was dedicated to these routines, students were regularly producing language for a significant portion of their class time. Following the criteria for successful classes outlined above, students showed strong behavioral engagement, including language production.

In speaking with students in the Japanese EFL classes, they expressed the idea that the repeated activities helped them to feel a sense of certainty. In the words of one student, “I was worried at first that I would not understand a non-Japanese teacher, but we do the same thing every time so I feel relaxed. It’s easy to understand.” (School 4, Female Year 5 student, Author’s translation). This feeling of ease appears to be related to the teachers’ use of routine and repetition, and we can therefore consider this the successful management of affect surrounding the introduction and use of the NL.

5.3.4 ‘Tight Transitions’

One of the main features of all these teachers’ classes that differed from other classes with high OL use was the pacing of the activities. Just as the teachers made strong use of routines, these routines were often conducted one after another, starting with the warm-up routines and moving into lesson content. In order to keep the energy of the class moving, teachers would quickly switch from one activity to the next, often using simple songs to transition the activities. In previous investigations of classroom practice (Lemov 2010), the principle of organizing classes around fast-paced changes in activities using well-practiced routines has been labeled ‘tight transitions’.

In tight transitions classes, the pacing of the class is designed to prevent students from getting off-task or otherwise distracted. Whether the changes involved whole-class–teacher
interaction or individual pair work, students benefitted from this pacing by the fact that they had little time to use their OL for non-class related purposes. In all of the observed classes, teachers prepared activities to flow one into the next. Cards were prepared for quick presentation, projector slides and digital white board activities were readied before class, and several of the teachers posted the class activity flow on the board.

Maintaining a constant high level of activity, English native-speaker Teacher E worked with his Japanese counterpart to move activities forward and to prevent peaks and valleys in student engagement. The flow of activities was set so that this teacher would hand off the activities to his Japanese counterpart, who would ask questions in English, demonstrate the activity, or do pattern practice while Teacher E prepared the next activity on the computer. While Teacher E presented the NL, led physical games, and interacted with students, Teacher F would post magnetic cards on the blackboard or count and organize game cards. By carefully organizing and coordinating activity timing, these teachers kept students experiencing the NL for the vast majority of the class time.

In the North American schools, all three teachers made extensive use of digital white boards to organize class transitions. Classes contained large amounts of NL media, videos, and slides designed to draw student interest and facilitate progress. The teachers could teach primarily using the NL with support from digital media, without requiring students to wait while the teacher wrote on the board or prepared video or audio. Just as with the teachers in Japan who performed the preparation manually, these digitally oriented teachers used classroom resources to increase on-task behavior while using an optimal amount of the NL through timing and pacing activities.
5.4 Conclusions

Teachers in this study were able to create a positive classroom culture where students experience a large quantity of the NL through an environment in which the student’s OL was used judiciously. While some of the classes investigated here included Japanese as a foreign language classes, the principles of successful language classes offer concrete suggestions for English EYLL classes.

Students were clearly directed towards tasks through classroom management routines and pacing, and teachers used the students’ OL systematically and appropriately. As the program goal in these schools was to promote positive affect for the foreign language (English and Japanese respectively), the paper focuses on the facilitation of NL use, rather than attempting to measure language acquisition and student output in the NL. Due to the nature of the research question and data collection, students’ individual output during free production activities was unavailable for analysis, and thus was not included. Future research into optimal NL classrooms will need to address the direct influence of teachers’ language use on students’ foreign language output.

This report shares practices found in classes teaching English and Japanese as a foreign language, observed across countries with clear contextual and cultural differences. For teachers capable of using the students’ OL systematically and appropriately to facilitate NL interaction in their classes, the above discussion may provide ideas for how to manage classes to allow optimal use of the NL. While the internal effects of teacher structure remain unclear from these observations, the following Chapters will address how teachers’ classroom practices allow students to engage with foreign language material at a high level while meeting internal psychological needs.
Chapter 6–Pilot Instrument Validations: Structure also Supports Autonomy

Keywords: Autonomy-Support, structure, SDT micro-theories, validation, longitudinal

Based on the qualitatively observed structure-oriented features of high-engagement classes described in Chapter 5, this study investigated the universality of these features to test their influence and effectiveness in Japanese foreign language classes. While classroom structure has a robust history in the literature of general education (Good & Brophy, 2008), its effect on motivation has not been well measured in foreign language learning. Likewise, one of the major questions in the self-determination theory framework is whether autonomy is truly a valid cross-cultural construct (Iyengar & DeVoe, 2003). Specific questions on the applicability of autonomous motivation to the Japanese context have been raised (e.g., Heine et al., 2001). Within cognitive evaluation theory, autonomy-support is a flexible concept that allows for a variety of indicators to facilitate individual motivation and engagement (Reeve, 2012; p. 167), though how this may practically manifest is still a matter of debate (Furtak & Kunter, 2012). Thus, moving beyond the previous qualitative observations, a series of quantitative investigations of elementary foreign language classes were conducted for the purpose of investigating how structured and autonomy-supportive teaching influence engagement and motivation. Through a series of five interconnected studies, this Chapter tested the relationship between teachers’ instructional style, students’ needs and engagement, and students’ final motivational outcomes.

6.1 Research Questions and Overview of Studies

To align with the needs of Japanese teachers and learners and provide insight into learners’ perceptions of autonomy, this program of research aimed to create a theoretically and
culturally sensitive instrument for measuring autonomy-supportive teaching. The pilot phase of this research sought to answer the following research questions from Chapter 4:

1) **How do teachers structure classes to engage students in foreign language learning?**
   
a. What indicators contribute to highly successful foreign language teachers’ classes?

2) **How does structure influence students’ motivational needs and in-class engagement?**
   
a. Does a direct predictive relationship effect exist between autonomy-supportive classroom structure and classroom engagement?

b. How does structure influence motivational and psychological needs?

c. What are the motivational outcomes of structured classroom environments?

Using existing self-determination theory instruments, these studies measured students’ classroom engagement and autonomy, relatedness, and competence need satisfaction as dependent variables in relation to positive teaching behaviors. In keeping with the concept of high certainty orientation for Japanese students, foreign language classes were selected as they offer a high uncertainty situation that may require management by a teacher or authority (Littlewood, 1999). Study 1 used student and teacher focus groups to qualitatively validate item translations and create new items for use in elementary foreign language classes. Study 2 measured the new autonomy-support scale in regard to students’ classroom behavioral engagement, while Study 3 measured autonomy-support in relation to need satisfaction. Previous studies of autonomy-support, need satisfaction, and quality of engagement in a structural equation model have only looked at the effect of self-perceptions on engagement (Jang, Kim, & Reeve, 2012; Skinner, Furrer, Marchand, & Kindermann, 2008; Reeve & Tseng, 2011), without looking at how teacher support and structure might have direct effects on student engagement mediated by internal psychological self-perceptions. Previous research has found some evidence for direct effects on motivation from teacher behaviors
(Pelletier, Fortier, Vallarand, & Brière, 2001), indicating a potential for direct effects on student engagement. Study 4 confirmed the basic 4-factor model of regulations hypothesized by organismic integration theory (Ryan & Deci, 2002; Noels et al., 2000). Previous research has found difficulty confirming this model in Japanese elementary schools (Carreira, 2012; Ando, Fuse, & Kodaira, 2008), and thus a re-investigation in a different context with re-worded items may validate the model. Study 5 took all of the previously investigated variables and combined them into a single model investigating the influence of supportive teaching on student engagement and final motivation.

6.2 Study 1

6.2.1 Study 1 Methods

This study aimed to answer research question 1.a: *What indicators contribute to highly successful foreign language teachers’ classes?* Employing a bottom-up design, 4th-, 5th-, and 6th-grade students and teachers were first gathered in 12 two-to-three person 30-minute focus groups both in and out of school in April 2012. A total of 12 teachers (9 female, 3 male) and 27 students (17 female, 11 male) participated. Researchers explained the psychological concepts of structure, autonomy-support, and behavioral engagement before giving participants cards with translations of items from previous research done in the SDT framework (Black & Deci, 2000; Jang, Reeve, & Deci, 2010) and asked about the appropriateness of the translations with regard to students’ experiences in foreign language classes. Structure was explained as the way that teachers help students to understand the material and participate in class, and autonomy-support as the way teachers support students’ positive emotions, feelings of value toward the subject matter, and personal desire to learn. Students and teachers were given examples of times in class when teachers might provide either of the constructs in question. Students were then asked to discuss specifically related
incidents from their experience.

Groups discussed the wordings and reached consensus regarding the best expression of the concepts, and wrote the wordings on cards. Participants were asked to place the re-worded cards in two separate categories representing autonomy-support and structure, and place those they did not feel were appropriate or comprehensible in a discard pile. Wordings and factors were pre-determined to be appropriate when more than half of the groups agreed and consistently categorized the items.

Following their foreign language class in early May 2012, 479 fifth-grade students (221 female, 244 male, 14 no response) then took the survey to test the instrument. The sample was randomly split in two for exploratory and confirmatory factor analysis. Exploratory factor analysis (EFA) using maximum likelihood estimation and promax rotation as well as confirmatory factor analyses (CFA) were conducted in Stata 12 (StataCorp, 2011). Twelve individuals had cases of missing data, indicating roughly 2.5% of the total sample, and 1% of the total volume of data. Missing cases were handled using full information maximum likelihood (FIML; Muthén & Muthén, 2013).

6.2.2 Study 1 Results

Teachers and students overwhelmingly indicated that some aspects from previous instruments were either unclear or did not match instructional practices in Japanese elementary schools. Several student groups noted that while they had heard the term “feedback” before, it was unclear; even after clarification students did not feel it matched classroom realities. Numerous items from existing autonomy-support instruments, such as, “My instructor listens to how I would like to do things,” or “My instructor encouraged me to ask questions,” were also found difficult to understand or inappropriate to the elementary context. Likewise,
students found that aspects of autonomy-support such as providing choice, accepting students’ negative affect, and encouraging questioning did not describe their experiences.

Based on the results of the focus groups, an 8-item measure was constructed for investigation (5 structure: length of explanation, clarity, pacing, peer engagement, English use; 3 autonomy-support: emotional support, teacher affect, clear lesson purpose). English wordings for the items proposed by the focus groups may be found in Table 6.1. A 4-point Likert-type scale was chosen in keeping with previous work on upper elementary students (e.g., Skinner, Furrer, Marchand, & Kindermann, 2008).

Table 6.1. English wordings for the proposed Japanese items.

<table>
<thead>
<tr>
<th>Final items–Structure:</th>
</tr>
</thead>
<tbody>
<tr>
<td>My teacher’s explanations were very long</td>
</tr>
<tr>
<td>My teacher gave clear explanations</td>
</tr>
<tr>
<td>The pace of the class was appropriate</td>
</tr>
<tr>
<td>My teacher spoke a great deal of English</td>
</tr>
<tr>
<td>My classmates were involved in class</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Final items–Autonomy-Support</th>
</tr>
</thead>
<tbody>
<tr>
<td>My teacher gave a lesson with a clear goal</td>
</tr>
<tr>
<td>My teacher appeared to enjoy speaking English</td>
</tr>
<tr>
<td>My teacher appealed to my interests</td>
</tr>
</tbody>
</table>

As part of the exploratory factor analysis (EFA), a two-factor solution for autonomy-support and structure produced a Heywood case. Retesting the model indicated that autonomy-support and structure loaded on a single factor. Parallel analysis (O’Connor, 2000) confirmed a single factor solution. The original two-factor model was tested with confirmatory factor analysis (CFA) showing acceptable fit, RMSEA = .029, CFI = .996, TLI = .989, AIC = 4800.169. Internal reliability for the individual scales was poor, α = .58 for both scales. Correlation between the two factors exceeded .95, indicating excessive similarity of construct (Tabachnick & Fidell, 2007). Superior fit was found in the one-factor solution, RMSEA = .023, CFI = .997, TLI = .993, AIC = 4798.769. Cronbach’s alpha for the single
factor solution was acceptable, $\alpha = .72$. Three items, length of explanation, classmates’ involvement, and clear lesson goals indicated comparatively poor fit, and were indicated by students and teachers as unclear in follow-up interviews. These were subsequently removed. Table 6.2 displays the zero-order correlations for the items. Results suggest a single factor solution as the most parsimonious.

Table 6.2. Zero order correlations for the generated items.

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Length of explanation</td>
<td>-</td>
<td>.19</td>
<td>.30</td>
<td>.11*</td>
<td>.16</td>
<td>.10*</td>
<td>.16</td>
</tr>
<tr>
<td>2</td>
<td>Clarity of explanation</td>
<td>-</td>
<td>.31</td>
<td>.27</td>
<td>.45</td>
<td>.27</td>
<td>.29</td>
<td>.34</td>
</tr>
<tr>
<td>3</td>
<td>Pacing</td>
<td>-</td>
<td>.20</td>
<td>.33</td>
<td>.11</td>
<td>.29</td>
<td>.21</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>Classmates engagement</td>
<td>-</td>
<td>.32</td>
<td>.17</td>
<td>.17</td>
<td>.17</td>
<td></td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>Emotional support</td>
<td>-</td>
<td>.25</td>
<td>.42</td>
<td>.38</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>Clear lesson goals</td>
<td>-</td>
<td>.29</td>
<td>.20</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Teachers’ affect when speaking English</td>
<td>-</td>
<td>.31</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8</td>
<td>Teachers’ amount of English output</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*p < .05, all other p < .001

6.2.3 Study 1 Discussion

In answer to research question 1.a., exploratory and confirmatory factor analyses indicated evidence for a single factor comprising the autonomy-support and structure items created by student and teacher focus groups. These items included clarity of explanation, class pacing, emotional support, and the teacher’s affect during the lesson and amount of spoken English. While previous studies have shown autonomy-support and structure as separate though highly correlated (Sierens et al., 2009), the student and teacher generated items loaded on a single factor. In line with previous research SDT research linking structure and autonomy-support (Jang, Reeve, & Deci, 2010), Japanese elementary students may perceive both the form and quality of their lessons as linked. To confirm this hypothesis, Studies 2 and 3 were conducted to investigate the relationship of the new latent variable and other elements of self-determined motivation. In order to avoid ambiguity in naming the new latent variable, the measure will henceforth be called ‘supportive-structure.’
6.3 Study 2

The findings in Study 1 indicated that autonomy-support is a comprehensible concept to students and teacher in collectivist Japan, but that its execution may differ slightly from previously explored contexts. In order to test the external validity of this measure of autonomy-support, Study 2 investigated the relationship between autonomy-supportive teaching and student engagement, following research questions 1.a., What indicators contribute to highly successful foreign language teachers’ classes? and 2.a. Does a direct predictive relationship effect exist between autonomy-supportive classroom structure and classroom engagement? Numerous previous studies have shown a link between autonomy-support, structure, and students’ in-class engagement (Reeve, Jang, Carrell, Jeon, & Barch, 2004; Skinner & Belmont, 1993; Skinner, Kindermann, & Furrer, 2009). Further, engagement has been shown to be reliably measurable by both self-report and external measurement (Lee & Reeve, 2012), making it ideal for the testing outcomes of student motivation.

6.3.1 Study 2 Methods

Using the single-factor instrument refined from study 1, this model tested the longitudinal influence of supportive-structure on students’ behavioral engagement. Behavioral engagement instruments came from those used by Skinner and colleagues (Skinner et al., 2008), showing acceptable reliability, α=.73. Consistent with study 1, 4-point Likert scales were used.

In May and July of 2012, 344 fifth-grade students (150 female, 194 male) in western Japan completed surveys on two occasions. Surveys were tested with confirmatory factor analyses, followed by auto-lagged and cross-lagged longitudinal structural equation modeling (SEM). Keeping with previous engagement models (Skinner et al., 2008), a reciprocal
relationship between student engagement at time 1 and teacher practices at time 2 was hypothesized.

Data was analyzed using MPlus (Muthén & Muthén, 2012). To account for potential non-normality issues created by 4-point Likert scales, data was treated as ordered categorical (Carifio & Perla, 2007) and analyzed with robust weighted least squares (WLSMV). No error correlation procedures were used. Following standard procedure for SEM (Kline, 2011; Hu & Bentler, 1999), model fit was determined to be acceptable if RMSEA < .08, CFI > .9, TLI > .9, or highly acceptable if RMSEA < .06, CFI > .95, TLI > .95.

### 6.3.2 Study 2 Results

Supportive-structure strongly influenced students’ in-class engagement. Figure 6.1 shows the relationships between the variables longitudinally, while Table 6.3 shows the correlation matrix and descriptive statistics. At both times, supportive-structure strongly predicted engagement, $\beta > .8$. Autolagged coefficients were similarly high, $\beta > .6$. The hypothesized reciprocal relationship between engagement in May and supportive-structure in July was not found. The strong correlation of the predictors in the model and the individual zero-order correlations, combined with the negative relationship between ratings of supportive-structure in May and engagement in July, indicate suppression effects. As in other studies of upper elementary children, the data all showed a negative skew (Spinath & Steinmayr, 2008), potentially explaining the high correlations among the latent variables. The fit for both the CFA and longitudinal models was highly acceptable (Kline, 2011), RMSEA=.025, CFI=.989, TLI=.987.
6.3.3 Study 2 Discussion

Confirming the results from study 1, this answered research question 1.a., *What indicators contribute to highly successful foreign language teachers’ classes?* with confirmation that unambiguous and interesting instruction as highly engaging. Looking at question 2.a. *Does a direct predictive relationship effect exist between autonomy-supportive classroom structure and classroom engagement?*, teachers’ supportive-structure in this context strongly influenced students’ in-class behavioral engagement. The instruments demonstrated stable longitudinal reliability, and students showed consistency in answering the items. While this study indicates that students perceive clear, well-paced instruction to be engaging, it does not
answer the question of whether it is perceived to satisfy autonomy, relatedness, and competence needs. In order to answer the question of whether the supportive-structure influences Japanese students’ basic needs, Study 3 was conducted.

### 6.4 Study 3

#### 6.4.1 Study 3 Methods

In order to answer research question 2.b., *How does structure influence motivational and psychological needs?*, study 3 tested the new instrument together with autonomy, relatedness, and competence (ARC) need satisfaction in October and December of the same school year. Following feedback from teachers after study 2, one new item (“My teacher directed me as to what to do in class”) was added to the scale. Figure 6.2 shows the hypothesized model. To measure need satisfaction in foreign language classes, a translation of the Activity Feelings Scale (AFS; Reeve & Sickenius, 1994) was used. Students responded to the anchor “In today’s foreign language class . . .” reporting on autonomy (“I did what I wanted to do,” “I chose what I did,” “I was able to do what interests me,” “I felt forced (negative)”), competence (“I felt confident in my English ability,” “I felt my English was improving,” “I felt capable of using English”), and relatedness (“I felt good working with my friends,” “I felt like I grew closer to my classmates,” “I felt I was working with others as a team”). These scales have demonstrated theoretical and empirical validity in other studies involving Asian learners (e.g., Jang et al., 2009). In keeping with basic needs theory, the three basic psychological needs were treated as separate and specific to the particular situation. Satisfaction of a need in October was not hypothesized to influence satisfaction of another need in December. As need satisfaction is only salient to the individual, it should logically not influence teachers’ supportive-structure at the second point in time.
At both times, 312 fifth-grade students (142 female, 170 male) in western Japan completed surveys. Surveys were again distributed directly following classes. As in study 2, data was analyzed in MPlus with the same criteria for fit cutoffs. Again, no error correlation procedures were used. Following the findings of left-side skew in study 2, data was again treated as ordered categorical and analyzed using robust weighted least squares.

### 6.4.2 Study 3 Results

In the second semester, the finalized items were used to measure students’ perceived ARC need satisfaction. Figure 6.3 shows the relationships between hypothesized latent variables, while Table 6.4 shows the correlation matrix and descriptive statistics. Both confirmatory and longitudinal auto-lagged models showed acceptable fit. Supportive-structure influenced ARC need satisfaction at both points. Teachers’ behaviors showed the strongest relationship with autonomy need satisfaction; indeed, the relationship between the two latent variables shows strong signs of multicollinearity. Longitudinally, competence at time one had the strongest influence on competence at time two, while relatedness and autonomy demonstrated a
weaker, though still significant, influence over time.

Figure 6.3. Study 3 relationships and model fit. All correlations significant at p < .001

Table 6.4. Correlation matrix and descriptive statistics for study 3. All correlations significant at p < .001

<table>
<thead>
<tr>
<th></th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
</tr>
</thead>
<tbody>
<tr>
<td>1) Supportive-structure Time 1</td>
<td>-</td>
<td>.91</td>
<td>.76</td>
<td>.81</td>
<td>.53</td>
<td>.68</td>
<td>.61</td>
</tr>
<tr>
<td>2) Autonomy Need Satisfaction Time 1</td>
<td>-</td>
<td>.69</td>
<td>.73</td>
<td>.48</td>
<td>.67</td>
<td>.55</td>
<td>.61</td>
</tr>
<tr>
<td>3) Relatedness Need Satisfaction Time 1</td>
<td>-</td>
<td>.61</td>
<td>.40</td>
<td>.52</td>
<td>.57</td>
<td>.51</td>
<td></td>
</tr>
<tr>
<td>4) Competence Need Satisfaction Time 1</td>
<td>-</td>
<td>.43</td>
<td>.55</td>
<td>.49</td>
<td>.71</td>
<td></td>
<td></td>
</tr>
<tr>
<td>5) Supportive-structure Time 2</td>
<td>-</td>
<td>.96</td>
<td>.89</td>
<td>.74</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6) Autonomy Need Satisfaction Time 2</td>
<td>-</td>
<td>.89</td>
<td>.78</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7) Relatedness Need Satisfaction Time 2</td>
<td>-</td>
<td>.71</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8) Competence Need Satisfaction Time 2</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

| Mean | 3.33 | 2.44 | 3.1 | 2.8 | 3.39 | 2.58 | 3.28 | 2.87 |
| SD   | .80  | 1.10 | .89 | .89 | .75  | 1.13 | .81  | .89  |
| Cronbach’s α | .74  | .58  | .79 | .77 | .70  | .63  | .78  | .76  |

6.4.3 Study 3 Discussion

The longitudinal model tested in study three demonstrated the influence of supportive-structure on students’ basic needs. Thus, the answer to research question 2.b., How does structure influence motivational and psychological needs? in this program of research is that supportive-structure strongly predicted need satisfaction, consistent with previous findings in similar settings (e.g., Jang et al., 2009; etc.). The strongest relationship was found on
students’ perceptions of autonomy; for all practical purposes in this context, teacher support appears to be perceived as nearly identical to autonomy need satisfaction, further indicating how autonomy-supportive teaching functions differently in Eastern contexts. Within Japanese culture, internally endorsed action relates to the idea of the teacher as a benevolent and interdependent authority who manages uncertainty (Chen & Farh, 2010; Doi, 1994; Szeto et al., 2011). This echoes results found in China, where young people felt satisfaction when their own interests aligned with their parents’ wishes (Chen et al., 2013). The reasons for this strong interdependent self-determination may lie in how life is conducted in elementary schools, with teachers working to create an environment where all children can be active and positively engage with learning material (Cave, 2007).

The extremely high correlation between supportive-structure and autonomy deserves explanation. First, the same negative skew found in Study 2 was present in Study 3 which may conflate correlations. While this raises issues of discriminant validity between supportive-structure and autonomy, the items contained clear differentiation of subject and focus (“my teacher” for the predictor latent variable, “I” for the outcome variable). The relationship between the two further shows how conceptually linked the two are; while competence and relatedness showed high but not extreme correlations with supportive-structure, autonomy satisfaction at both times was arguably indistinguishable.

Perceptions of supportive and structured teaching did not strongly vary over time, and were able to predict scores from one point to another. Students who believed themselves competent were more likely to hold this belief longitudinally, aligning with findings on the stability of ability beliefs (Bandura, 1997). At the same time, perceptions of autonomy and relatedness did not have predictive effects over time. This may stem from day-to-day changes in opportunities for personal engagement and students’ interpersonal relationships. These
results point to the valid functioning of the instruments in line with the theory that social interdependence and personal endorsement for action are highly linked in Japanese society.

Looking at the specifics of how Japanese students and teachers define and understand autonomy-support may help to explain the cultural differences. Table 6.5 displays the final items used, their factor loadings at each point, and Cronbach’s alpha statistics. The item loadings were consistent across time, and showed acceptable reliability from each sample. Several of the items clearly relate to previous conceptions of autonomy-supportive teaching (“My teacher appealed to my interests,” “My teacher appeared to enjoy speaking English,”) while others more clearly resemble structure (“My teacher gave clear explanations,” “The pace of the class was good,”) while further others seem more aligned with a controlling orientation (“My teacher directed me as to what to do”). These items, developed through bottom-up discussion of autonomy, structure, and their elements, indicate a key difference in how Japanese children may perceive autonomy-supportive teaching in the potentially highly uncertain situation of foreign language classes. In order to fully investigate the full validity of the model, a full model integrating supportive-structure, basic needs, engagement, and different reasons for learning a foreign language is necessary.

Table 6.5. Final items and their factor loadings in each study.

<table>
<thead>
<tr>
<th>Final items</th>
<th>EFA</th>
<th>CFA</th>
<th>Study 2 Time 1</th>
<th>Study 2 Time 2</th>
<th>Study 3 Time 1</th>
<th>Study 3 Time 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>My teacher gave clear explanations</td>
<td>.60</td>
<td>.72</td>
<td>.77</td>
<td>.73</td>
<td>.81</td>
<td>.75</td>
</tr>
<tr>
<td>The pace of the class was appropriate</td>
<td>.47</td>
<td>.55</td>
<td>.66</td>
<td>.55</td>
<td>.62</td>
<td>.63</td>
</tr>
<tr>
<td>My teacher appealed to my interests</td>
<td>.73</td>
<td>.72</td>
<td>.84</td>
<td>.83</td>
<td>.48</td>
<td>.62</td>
</tr>
<tr>
<td>My teacher appeared to enjoy speaking English</td>
<td>.55</td>
<td>.66</td>
<td>.73</td>
<td>.66</td>
<td>.74</td>
<td>.72</td>
</tr>
<tr>
<td>My teacher spoke a great deal of English</td>
<td>.41</td>
<td>.47</td>
<td>.48</td>
<td>.51</td>
<td>.45</td>
<td>.42</td>
</tr>
<tr>
<td>My teacher directed me as to what to do</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>.62</td>
<td>.63</td>
<td></td>
</tr>
<tr>
<td>Cronbach’s α</td>
<td>.72</td>
<td>.72</td>
<td>.73</td>
<td>.73</td>
<td>.74</td>
<td>.70</td>
</tr>
</tbody>
</table>
6.5 Study 4

6.5.1 Study 4 Methods

Where Studies 1 through 3 looked at the assumptions of basic needs theory and cognitive evaluation theory, Study 4 investigated students’ regulatory orientations, as outlined by organismic integration theory, described in Chapter 2. In order to appropriately evaluate research question 2.c. *What are the motivational outcomes of structured classroom environments?*, it was necessary to validate the survey to be used to measure students’ motivation. Modified and updated translations of the Self-Regulation Questionnaire–Academic (SRQ-A; Ryan & Connell, 1989; Yamauchi & Tanaka, 1998; Noels et al., 2000; Carreira, 2012) were created using small group discussions similar to those described in study 1. Four-hundred and seventy fifth-grade students completed surveys regarding their intrinsic, identified, introjected, and extrinsic reasons for studying English at the end of the 2012-2013 school year. Seven individuals had unanswered items in their surveys, but were included in the analyses. Integrated motivation was not used as other previous researchers have indicated measurement problems using only survey methods (Reeve, 2002).

Based on the robust nature of previous findings regarding these regulatory patterns in previous literature (Noels et al., 2000; Carreira, 2012), scales were investigated using confirmatory factor analysis using robust maximum likelihood estimation (MLR) in MPlus (Muthén & Muthén, 2012). While the previous studies used a 4-point Likert scale, this study used a 5-point scale, with 1 representing “not at all” and 5 representing “very true.” The instrument and translations used are presented in Appendix 4. Three items each were used to measure the four regulatory orientations. The analysis hypothesized a 4-factor model demonstrating quasi-simplex structure, with extrinsic, introjected, identified, and intrinsic regulations clearly separate. Each factor is likewise hypothesized to correlate strongest with
the adjacent factor in the model from Figure 2.1, but demonstrate decreasing correlations with distance and finally a negative relationship between intrinsic and extrinsic regulations. In comparing alternate model fit, the same standard fit indices are used (RMSEA < .08, CFI > .9, TLI > .9).

6.5.2 Study 4 Results

Confirmatory factor analysis indicated a highly acceptable model fit for the hypothesized variables, RMSEA = .035 (CI = .019, .050), CFI = .985, TLI = .980, AIC = 14936.634. The 4-factor model showed the hypothesized quasi-simplex structure, displayed in Table 6.6, and Cronbach’s alpha scores were all acceptable ( > .75). Factor correlations, presented in the same Table, likewise reflected the hypothesis of a strong relationship between the adjacent factors on the organismic integration continuum, decreasing with distance and negative at the extremes. Correlations for the intrinsic and identified factors approach multicollinearity, $r > .8$ (Tabachnick & Fidell, 2007).

To investigate whether these factors are validly different, an alternative 3-factor model was tested, constraining intrinsic and identified regulations together while maintaining the introjected and extrinsic factors as separate. The results showed a decrease in fit indices $\Delta$RMSEA = .018, $\Delta$CFI = -.02, $\Delta$TLI = -.025, as well as an increase in Akaike’s Information Criterion, AIC = 14980.957. An individual t-test on the variables further revealed a statistically significant difference between the mean values for intrinsic and identified regulations, $t(463) = 10.89$, p < .00. This is confirmed by the fact that none of the confidence intervals for any of the factors overlap, as is presented in Table 6.6. These factors combine to indicate the 4-factor model as preferable over the 3-factor.
Table 6.6. Factor loadings for measured items.

<table>
<thead>
<tr>
<th>Anchor: I work at learning English in class because:</th>
<th>Intrinsic</th>
<th>Identified</th>
<th>Introjected</th>
<th>Extrinsic</th>
</tr>
</thead>
<tbody>
<tr>
<td>Learning English is fun (Intrinsic 1)</td>
<td>.77</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I am interested in English (Intrinsic 2)</td>
<td>.81</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Learning English is worthwhile (Intrinsic 3)</td>
<td>.78</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>It will help me in other areas of my life (Identified 1)</td>
<td>.77</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I want to be able to use English in the future (Identified 2)</td>
<td>.90</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>It will help me grow as a person (Identified 3)</td>
<td>.87</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I want my teacher to like me (Introjected 1)</td>
<td>.81</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I want other people to praise me (Introjected 2)</td>
<td>.86</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I want my friends to think I am good at English (Introjected 3)</td>
<td>.80</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>If I do not my teacher will get angry (Extrinsic 1)</td>
<td>.81</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Participating in class is one of the rules (Extrinsic 2)</td>
<td>.67</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I have no other choice (Extrinsic 3)</td>
<td>.84</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

1. Intrinsic - .89 .26 -.59
2. Identified - .18 -.53
3. Introjected - .41
4. Extrinsic -

Mean & 95% CI
3.62 (3.54, 3.71)
3.99 (3.90, 4.08)
1.87 (1.79, 1.95)
2.18 (2.09, 2.26)

SD
.97
1.00
.88
.96

Cronbach’s α
.80
.84
.80
.75

All correlations significant at p < .001

6.5.3 Study 4 Discussion

Confirmatory factor analysis indicated the internal validity of students’ reported regulatory orientations. The highly acceptable fit indices further confirm the robustness of this model. While factor correlations between intrinsic and identified regulations were quite high, the fit indices decreased by running the model constraining intrinsic and identified regulations as a single factor, unlike in Study 2 where the reduction in factors showed a slight increase from combining the factors. A t-test and inspection of the confidence interval further confirms the hypothesis that the four hypothesized factors are recognizably different.

One notable finding is that students’ strongest motivational orientation was identified regulation, the desire for personal improvement and growth, rather than intrinsic regulation. This shows that, within the school environment, Japanese students recognize the four basic types of motivational regulation as distinct and comprehensible. Contrary to previous
findings in Japan (Carreira, 2012; Ando, Fuse, & Kodaira, 2008; Hiromori, 2003), introjected regulation cleanly formed a separate factor with an acceptable internal reliability, though this was clearly the weakest motivating factor with a mean score less than 2. These results indicate the importance of item wordings for effectively conveying theoretical meaning to participants in survey research.

These findings show further problems with the concept of L2-selves theory as explanatory independent of self-determination theory, as they may be safely subsumed within the SDT framework. The items used for ought-to and ideal L2-selves (Papi, 2010; Taguchi, Magid, & Papi, 2009) overlap with the items tested here for introjected and identified regulations, respectively. While this study does not represent a complete empirical investigation of the two competing theories, for all practical purposes, L2-Selves appear to be explainable by organismic integration theory. These findings allow for the final test integrating it with basic needs theory and cognitive evaluation theory in the Japanese elementary foreign language classroom.

6.6 Study 5

6.6.1 Study 5 Methods

Study 5 finally tested the supportive-structure instrument with all of the previously tested variables (ARC need satisfaction, engagement) included to answer research question 2.c. What are the motivational outcomes of structured classroom environments? Using a cross-sectional (as opposed to the original longitudinal) version of the SSMMD (Skinner et al., 2009) outlined in Chapter 2, a mediated model was constructed with ARC needs and engagement regressing on supportive structure, while engagement also regressed on ARC needs. Figure 6.4 shows the hypothesized model. This model treated the two main outcome
variables as second-order factors. As in study 2, this model hypothesized a direct relationship between supportive structure and engagement, mediated by a relationship with students’ basic needs. Based on the high correlations between the latent variables for autonomy, competence, and relatedness, the three were treated as indicators of a second-order latent variable. As a final step to test the relationship between classroom environments, basic needs theory, and organismic integration theory, motivational regulations were treated as outcome variables, regressing on engagement. The theory behind this was students’ active and passive behaviors in class influence their motivations, which can then be measured through the selected survey items.

Figure 6.4. Hypothesized structural model of motivational development.

Four hundred twenty-three fifth-grade students (201 female, 222 male) in western Japan completed engagement surveys following foreign language classes in early February 2013. Motivation surveys were then completed at the end of the school year in March. In reaction to the high correlations between the variables using 4-point Likert-type scales in Studies 2 and 3, a 5-point scale was used with the hope of creating additional room for
variance and alleviating the apparent ceiling effects. As in the previous studies, data was analyzed using MPlus using the same standard fit cutoffs, and Likert data was again treated as ordered categorical and analyzed using robust weighted least squares.

6.6.2 Study 5 Results

Supportive structure was found to correlate strongly with SDT needs, with a weaker though still meaningful direct relationship with classroom engagement. Need satisfaction likewise influenced engagement. In-class engagement equally strongly influenced intrinsic regulation, with weaker effects on identified and introjected regulation, and negatively predicted extrinsic regulation. Gender had significant effects on intrinsic, introjected, and extrinsic regulations, though effects were relatively weak in comparison with other factors.

As in the previous studies, the relationships between variables were quite strong, likely inflated by the same negative skew to the data as seen in the previous models. Model fit was highly acceptable, $\chi^2 (503) = 935.448, p < .000, \text{RMSEA} = .045 (\text{CI} = .041, .05), \text{CFI} = .97, \text{TLI} = .96$. The full model is displayed in Figure 6.5, with the zero-order correlations for latent variables displayed in Table 6.7. As in the previous studies, multicollinearity was an issue, with many students answering 4 and 5 for numerous items. As with other studies of elementary students (Spinath & Steinmayr, 2008), students were likely to give more positive answers. This positive bias and resulting high correlations created a situation where one of the standardized coefficients (2nd order engagement) was calculated above 1.0, a situation that can occur with distinct but highly correlated predictors (Deegan, 1978; Jöreskog, 1999). At the same time, the results mirror previous work in self-determination theory that does not display the same degree of multicollinearity among predictors (Carreira, Ozaki, & Maeda, 2013; Jang, Kim, & Reeve, 2012).
Figure 6.5. Full process model of classroom engagement and motivation. *p < .05, **p < .01, ***p < .001

Table 6.7. Zero-order correlations for the latent variables with descriptive statistics and internal reliabilities.

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<td>Supportive structure</td>
<td>-</td>
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<td>.81</td>
<td>.86</td>
<td>.89</td>
<td>.67</td>
<td>.53</td>
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<td>-.37</td>
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<td>Competence</td>
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<td>.49</td>
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<td>-.35</td>
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<td>4)</td>
<td>Autonomy</td>
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<td>.25</td>
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<td>5)</td>
<td>Behavioral engagement</td>
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<td>-.40</td>
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<td>6)</td>
<td>Emotional engagement</td>
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<td>.56</td>
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<td>11)</td>
<td>2nd order need satisfaction</td>
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<th>3.54</th>
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<td>.97</td>
<td>.96</td>
<td>1.02</td>
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<td>.78</td>
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</table>

All correlations significant at p < .001

While an alternative model for the data may be constructed with existing intrinsic and extrinsic variables influencing engagement, this model is implausible due to the 5-week interval between the classroom engagement surveys and the motivation surveys. Likewise, while an alternative model showing direct effects from need satisfaction to motivational
outcomes was also tested, the model failed to achieve convergence. Based on these reasons the model presented in Figure 6.5 is believed to represent the most parsimonious fit and interpretation for the hypothesized data.

6.6.3 Study 5 Discussion

As in the previous studies, Study 5 demonstrated that the perceptions of the classroom environment strongly influence students’ engagement. Engagement in turn influences students’ positive feelings of motivation. These results confirm previous work on structure and autonomy-support as crucial to motivating students, and show a pattern of correlation with the motivational regulation factors consistent organismic integration theory. The correlation between engagement and the different motivational orientations decreased in strength as the motivation became less autonomous, negatively predicting heteronomous reasons for language study. These results indicate that teachers’ day-to-day practices promote student attention and enjoyment, which in turn has lasting effects on students’ desire to learn the new language. Regularly providing students with a clear, learning-oriented environment leads to the normalization of in-class engagement, which students then perceive as an intrinsic desire to learn the language. Drawing from previous SDT research, this finding shows further evidence for the validity of self-determination in the Japanese context.

Gender showed weak but measurable influences only on students’ motivation. As other studies have shown (Fryer et al., 2014; Meece, Glienke, & Burg, 2006), male students operate at a motivational disadvantage, showing a stronger relationship with introjected and extrinsic regulations and a negative relationship with intrinsic regulation. Considering the strong and enduring effects of intrinsic motivation on educational outcomes (Reeve, 2012), boys’ general trend towards external motivators is worrisome. However, as gender did not strongly influence in-class need satisfaction or engagement, this influence may indeed be
minimal at the elementary level. More pertinent appears to be how engaged students were in learning activities, directly as a function of teachers’ appropriate educational style.

The flaw within this model comes from the fact that existing motivation over time has not been measured. Without a clear understanding of how students’ existing motivational orientations influence their learning behaviors in class, no concrete conclusion regarding the influence of classroom practice on motivation may be drawn. The research model explored in Chapter 8 aims to answer this question.

6.7 General Discussion

Following from the aims of the study, the findings here indicate how autonomy-support may function differently in the Japanese classroom setting. Answering the overriding research question, the results show that Japanese elementary students experience autonomy-support in foreign language classes as a combination of clarity, direction, and emotional support. In foreign language classes in western settings, autonomy-support is traditionally defined as providing more opportunities for individual decision-making, showing greater support for intrinsic motivation and basic needs (Noels, Clemént, & Pelletier, 1999). However, the socialization process in Japan and focus on the larger whole may blur the line between the individual decision maker and the perceived direction of the social setting, creating a situation where individual engagement and personal endorsement of action is keyed to group atmosphere and the benevolent intentions of a trustworthy authority.

While Study 1 initially agreed with the CR criticisms of SDT (e.g., Iyengar & Lepper, 1999), the results of the Studies 2 and 3 agree with the conception of personal alignment and endorsement of one’s actions even in interdependent collectivist cultures (Chen et al. 2013; Katz & Assor, 2006). Further evidence can be seen through how supportive-structure strongly
influenced both engagement and autonomy satisfaction, which relate to self-directed motivation ((Lee & Reeve, 2012). This provides a further argument for how autonomy may present in different fashions in different cultures (Roth et al., 2006; Katz & Assor, 2006). Based on the results of the studies, the scales measuring supportive-structure may be considered a form of autonomy-support applicable to the Japanese context.

Study 4 found strong support for the organismic integration theory of self-determination theory, indicating that the hypothesized factors can indeed be recognized as different by elementary students. Study 5 completed the work of the first four studies, showing the cross-sectional influence of the classroom environment on student engagement, and the outcome of engagement on motivational orientations. Gender was also investigated in this model, and showed a weak but statistically significant influence on motivation outcomes.

6.8 Conclusions

The above studies demonstrate the value and relevance of self-determination theory to Japanese classrooms, and may help to explain cultural relativist discussions questioning the value of choice and autonomous motivation in East Asian contexts. Though the instrument created here did not fully capture the whole range of teacher behaviors, having left out controlling behaviors in accordance with participating teachers’ wishes for a minimal number of items, the items generated by students and teachers based on previous instruments strongly influenced elements central to SDT, with an especially strong correlation with autonomy.

While previous studies have found structure and autonomy-support to be different constructs in general education settings with secondary students (e.g., Sierens et al., 2009), this study indicates that, in foreign language classes, Japanese elementary students find clarity and direction to be engaging and need satisfying. Further, while the terminology of
autonomy-support may be subject to debate (e.g., Furtak & Kunter, 2012; Iyengar & Lepper, 1999), the underlying practices of providing an interesting and intelligible classroom environment influenced students’ perception of autonomous participation and engagement to the extent that they appear inseparable.

These results align with previous findings indicating that Japanese students prefer more certain learning environments (Szeto et al., 2011), one aspect of which may be clearly structured instruction. In appealing to Japanese students’ certainty orientations, teachers may also support their autonomy by addressing them in culturally and socially expected fashion (Katz & Assor, 2006); in other words, autonomy-support hinges on treating people the way they want to be treated. The results should be interpreted carefully, as classes surveyed were limited to foreign language classes. At the same time, this would indicate that self-determination theory is not only relevant to first language studies, despite criticisms to the contrary (Dérynei, 2005; Heinzmann, 2013). While the overall patterns resemble those found in other settings (Chen et al., 2013; Jang et al., 2009; Szeto et al., 2011), more careful investigation beyond this cultural setting is necessary to make definitive conclusions regarding Japanese students’ motivational orientations.

The results of this Chapter may help to resolve some of the ongoing paradoxes where East Asian learners show an orientation towards following authority (Iyengar & Lepper, 1999), while at the same time demonstrate the same deeper desire for self-determination as westerners (Jang et al., 2009; Chen et al., 2013). While indicator level differences were found, the underlying theory of teacher support for psychological needs and engagement was validated as motivationally appropriate for Japanese elementary students. Results imply that in more collectivist societies, feelings of self-determination are linked with the environment,
and Japanese students’ perception of autonomy satisfaction may thus be satisfied by clear, intelligible, authoritative, and interesting instruction. At the same time, the results are entirely intra-psychic, representing student self-reports without any external validation. Triangulation of both the motivational climate and students’ behavior will allow for a more complete understanding of self-reported data. Further, while study 5 showed a positive relationship between in-class engagement and students’ motivational regulations mirroring the general pattern of organismic integration theory, without accounting for prior motivation and external results the model remains incomplete. While Chapter 5 solely used observation, the studies described in this Chapter rely on self-report data. The Chapter 8 describes the main research replicating the pilot surveys in a year-long longitudinal model with accompanying video observations, resolving the above issues through the use of external quantitative ratings from teachers and outside raters, and observers.
Chapter 7–Native vs. Non-Native Teachers: Who is the Real Model for Japanese Elementary School Pupils?

Keywords: FLES, NEST/NNEST, social cognitive theory, behavioral modeling

Having validated the research instrument to be used in Chapter 8, the study described in this Chapter focused on the differences students reported in regards to Japanese homeroom teachers (HRTs), specialist English teachers (JTEs), and non-Japanese Assistant Language Teachers (ALTs). Having created a workable model for how motivation develops through interaction in the previous Chapter, further investigation of the different influences of the teachers was necessary. Working from social cognitive theory (Bandura, 1977) outlined in Chapter 2, this study investigated the influences of native English-speaking teachers (NESTs) on students’ in-class communication behavior.

NESTs are employed throughout Asian countries for the purpose of modeling the foreign language and providing support to non-native English-speaking teachers (NNESTs). As discussed in Chapter 3, the employment of both teacher types is controversial, and much of the rhetoric surrounding the issue is highly politicized, often based on opinion and philosophical standpoint rather than empirical evidence. At the same time, the exact influence of NESTs on students’ learning behaviors has not been fully documented, and some studies have indicated a negative effect on overall learning (Butler & Takeuchi, 2008). Why this may be is as of yet a matter of speculation, though one potential reason may be the tendency for Japanese elementary teachers to emphasize native speakers as the ideal model for language (Butler, 2007a). Further, under this mentality some teachers may give foreign teachers complete control over activity and content decisions (Carley, 2011).
Recognizing that both types of teachers are models of language use, this Chapter addresses meaningful quantitative differences in student perspectives on native and non-native teachers. In promoting a desire to integrate with foreign cultures (Gardner, 1959; 1985), teachers’ modeling of both language and interaction style may be hypothesized to promote stronger value for interaction with non-Japanese (Bandura, 1977; 1986) as promoted by the course of study (MEXT, 2008a). With knowledge of how teachers’ classroom structure may differ between HRTs, JTEs, and ALTs, I aim to more accurately model the process of motivational changes coming about through teachers’ classroom practice.

7.1 Research Questions

This study is an embedded iteration of the research carried out in Chapter 6. As such, it worked under the larger research theme of the project. Continuing from Chapter 6, and in light of the dearth of studies on differences between language modeling in native and non-native English-speaking teachers’ classes, the current research addresses the following overarching question outlined in Chapter 4:

1) **How do teachers create structure for engagement in foreign language classes?**

   b. How do students perceive differences in classes led by native and non-native teachers?

2) **How does structure influence students’ motivational needs and in-class engagement?**

   e. What differences in speaking output do students report in classes taught by native and non-native teachers?

   f. What effects do perceptions of each type of teachers’ spoken output have on students’ reported speaking output?

To better grasp the nature of how foreign language classes are structured in Japan, it was necessary to investigate and compare Japanese and non-Japanese teachers. As discussed in Chapter 3, studies on the influence and differences in classes operated by foreign and
Japanese teachers is by and large unknown. Without a clear knowledge of the overall
differences in how structure in different teachers’ classes is perceived by students, the results
found in Chapter 6 may be generalized to both native and non-native teachers’ classes.

7.2 Methods
In order to compare the differences in effects of ALTs, JTEs, and HRTs on students’
classroom learning, this study employed a quasi-experimental design, with the different
conditions based on which teacher (ALT, JTE, or HRT) led the class.

7.2.1 Participants & Setting
The teachers and schools in this study were from a group of 4 public elementary schools in
suburban western Japan. These 4 schools were selected out of the 7 total participating schools
due to similarity in size, academic reputation, and socioeconomic area. The participants were
2 JTEs, 4 ALTs, 12 HRTs, and 355 fifth-year elementary students distributed across 12
classes. Two schools employed a full-time specialist teacher of English, while the other two
did not have such a position, allowing us to group the two schools accordingly using a
between-subjects condition. Each class was observed twice, once with and once without the
ALT present, creating a within-subjects condition. The students sampled were a sub-sample
of the group surveyed in Chapter 6, study 2.

7.2.2 Instrumentation
As the previous Chapter addressed the process of survey creation, I have elected not to
unnecessarily repeat the considerations taken there. A more complete discussion of the
classroom environment survey instruments was presented in Chapter 6. Aligning
methodologically and theoretically with previous studies in upper elementary years on
language learning and engagement (e.g., Carreira, 2011; Skinner, Kindermann, & Furrer,
2009), we chose 4-point scales. Four-point scales have at times shown higher reliability than
6-point (Chang, 1994), and may guard against students’ tendency to avoid choosing extreme answers by selecting the centermost choice (Reid, 1990). Further, while 4-point scales may lead to a certain amount of skew, some negative skew may be expected in studies of elementary students (Spinath & Steinmayr, 2008). In the end, reliable and interpretable data wins the practical argument; so long as skew, kurtosis, or other potentially damaging effects do not excessively hinder clear explanation of the pattern in the data, and the data is not a single observation of the phenomenon to be addressed, parsimonious and conservative conclusions may be safely drawn.

The researchers or their assistants visited classes in the last week of June and first week of July, 2012. As classes all followed the same textbook, visits were scheduled as close together as possible in order to sample students while they covered the same basic lesson content. Each class was studying a unit on ordering fast food in a restaurant, with the final goal of students performing a simple role-play. In the ALT-led classes, ALTs spoke no Japanese due to the strict working regulations given by the dispatch company which hired them for the city, previously noted in Chapter 5. Observed classes primarily used oral communication drills and activities, regardless of the teacher leading the class. The researchers observed classes before implementing the surveys in the last five minutes of the class period, with teachers giving prompts to students to rate each item.

Students completed surveys immediately following foreign language activities classes to get the most accurate ratings and self-assessments (Butler & Lee, 2010). In handing out the surveys, students were reassured that their information would remain confidential, and their teachers, native and non-native, would not be informed of their answers. This guarantee was further written on the survey sheets. In completing the surveys, students first entered identifying categorical information (class, gender, student number, etc.). No student names
were used on the surveys. In answering the survey questions, students were instructed that if they believed their teacher spoke 80% or more of the time in English, they should mark a 4 on their answer sheet, while 80% of the time in Japanese would correspond to a 1. Students were then told to rate their teachers’ affect when speaking English, with a 4 indicating that their teacher seemed to like English, and a 1 meaning they believed their teacher was shy, hesitant, or disliked speaking English. The same instruction as with item 1 was given for students’ own output. In handing out and collecting surveys, researchers and their assistants emphasized that completion was optional, but also that these surveys would also help current and future elementary school teachers. Of the 355 students who took both surveys, 336 acceptably completed them on both occasions. Following collection, researchers and their assistants asked students who accurately completed surveys about individual items, finding that students believed answers reflected the classroom environment and that they were able to correctly elaborate on the item meanings.

7.2.3 Analyses
To answer research question one, a repeated-measures multivariate analysis of variance (MANOVA) was conducted using Pillai’s trace due to its robustness against potential problems involving multivariate normality (Tabachnick & Fiddell, 2007, p. 269). An individual within-subjects repeated-measures factorial ANOVA post-tests was run to show differences in each condition. Research question two was again investigated using within-subjects repeated-measures factorial ANOVA to test differences between subjects on different class conditions. Research question three was investigated with simultaneous multiple regression, running students’ individual self-reported output against the two teacher variables. Data was analyzed using Stata version 12 (StataCorp, 2011).
7.3 Results

7.3.1 Research Question 1) b. How do students perceive differences in classes led by native and non-native teachers?

Before running the MANOVA test, I looked at the descriptive statistics and confidence intervals (presented in Table 7.1), and correlation matrix of the items to look for predictable patterns of differences. The pattern of intercorrelations for each item displayed moderate to weak correlation, showing no items too highly interrelated for the MANOVA test.

Table 7.1 displays the descriptive statistics of each condition investigated. As can be seen in Table 6.2 from the previous Chapter, Pearson’s correlation was less than .5 for each variable, indicating that the variables are not too highly inter-correlated to conduct the MANOVA test. While Doornik-Hansen tests of multivariate normality (Hansen & Doornik, 2008) showed a violation of basic normality assumptions, $\chi^2 (4) = 836.573$, $p < .000$, the use of Pillai’s trace has been indicated as robust against issues resulting from normality problems (Tabachnick & Fidell, 2007). The overlap in the confidence intervals for these variables indicated a strong degree of similarity in response patterns.

A subsequent 2 x 2 repeated-measures factorial MANOVA run on the 2 variables investigated the 4 conditions in the study. The between-subjects conditions were whether or not the school employed a JTE, while the within-subjects condition represented the times that the ALTs were present or not. The results of the multivariate analysis failed to find a significant difference between the schools groups, Pillai’s trace = .02, $F(8, 327) = .84$, $p = .57$, but did find within-subject changes in reaction to the ALT’s presence, Pillai’s trace = .1746, $F(8, 327) = 8.64$, $p < .00$. No interaction effects were found on repeated-measures with JTE as a factor.
At the univariate level, within-subjects repeated-measures factorial ANOVA tests found significant differences in effects on the condition of the frequency of teachers’ output for both ALTs, $F(1, 671) = 59.63$, $p < .00$, partial $\eta^2 = .15$, and JTEs, $F(1, 671) = 9.72$, $p < .01$, partial $\eta^2 = .03$, but no significant interaction effects between the two. The $R^2$ was calculated at .58, indicating that this model accounts for roughly 58% of the variance. Further

Table 7.1. Descriptive statistics for each separate condition.

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<tr>
<th>No JTE Leads</th>
<th>No JTE HRT support</th>
<th>JTE Leads</th>
<th>JTE Support HRT support</th>
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<td>ALT Absent</td>
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<td>ALT Absent</td>
<td>ALT Present</td>
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<tr>
<td>(n=199)</td>
<td>(n=199)</td>
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<td>(n=137)</td>
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<td>Mean = 2.88 / SD = .78</td>
<td>Mean = 2.74 / SD = .77</td>
<td>Mean = 2.88 / SD = .81</td>
<td>Mean = 2.78 / SD = .72</td>
</tr>
<tr>
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<td>Skew = -.52</td>
<td>Skew = -.46</td>
</tr>
<tr>
<td>Kurtosis = 2.91</td>
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<td>Kurtosis = 2.95</td>
<td>Kurtosis = 3.23</td>
</tr>
<tr>
<td>95% CI = 2.77 / 2.99</td>
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<td>95% CI = 2.75 / 3.02</td>
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<td>95% CI = 3.17 / 3.46</td>
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<tr>
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<td><strong>Spoken English output by Students</strong></td>
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<td>95% CI = 2.74 / 3.02</td>
<td>95% CI = 2.80 / 3.04</td>
<td>95% CI = 2.63 / 2.96</td>
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</tbody>
</table>
ANOVA revealed between-subjects differences on teachers’ affect, $F(1, 671) = 4.65$, $p = .03$, partial $\eta^2 = .02$, as well as within-subjects differences between when ALTs were present and not, $F(1, 671) = 4.17$, $p = .04$, partial $\eta^2 = .01$. This model was shown to account for nearly 60% of the variance, $R^2 = .59$. No significant differences were shown between students’ output for any of the conditions. The confidence interval for these conditions is also available in Table 1, indicating not only lack of statistical difference, but also strong overlap between groups.

7.3.2 Research Question 2) e. What differences in speaking output do students report in classes taught by native and non-native teachers?

A within-subjects ANOVA test found no significant differences in student self-reported output between classes taught by HRTs, ALTs, JTEs, or any combination of the above. Results show no meaningful difference between individuals at schools with and without JTEs, $F(1, 334) = .03$, $p = .87$. Likewise classes taught by ALTs showed a similar lack of statistical significance, $F(1, 334) = .21$, $p = .65$. Classes taught by ALTs and JTEs neared a significant effect, $F(1, 334) = 3.40$, $p = .07$, but based on the sample size, a non-significant result does not warrant further inspection. The mean, standard deviation, and confidence interval values displayed in Table 2 confirms the lack of difference in all conditions. While all results here were non-significant, similar to the above results, the model accounted for roughly 60% of the variance, $R^2 = .60$.

7.3.3 Research Question 2) f. What effects do perceptions of each type of teachers’ spoken output have on students’ reported speaking output?

A simultaneous multiple regression was used to test the relationship between the classroom environment and students’ spoken output. Results were run individually on the 4 grouping conditions. The resulting standardized beta coefficients for each group and variable can be
seen in Table 7.2. The findings consistently display a pattern of influence from teachers’ classroom environment and output frequency across the three contexts where the homeroom teacher is most involved in the lesson execution. The model $R^2$ in each indicates that these variables explain between 7 and 16 percent of the variance associated with students’ spoken engagement.

The most consistent predictor of student output was the frequency of the teachers’ output, though it did not demonstrate a significant effect in classes led by all three teachers. Likewise, clarity of lesson goal showed a significant relationship in schools without a JTE, but not in schools employing JTEs. None of the other hypothesized factors showed any influence on self-reported output, statistical or otherwise. In classes taught by HRTs alone, affect when speaking English significantly predicted output, though not in any other condition. Classes taught by all three teachers showed the weakest influence on students’ spoken output. The similarity of the beta values suggests similar effects across contexts.

<table>
<thead>
<tr>
<th>Variable</th>
<th>HRT alone ($n = 199$)</th>
<th>HRT/ALT ($n = 199$)</th>
<th>HRT/JTE ($n = 137$)</th>
<th>HRT/JTE/ALT ($n = 137$)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Explanation length</td>
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<td>.06</td>
<td>-.10</td>
<td>-.11</td>
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<tr>
<td>Explanation clarity</td>
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<td>.03</td>
<td>-.11</td>
<td>.13</td>
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<tr>
<td>Pace of activities</td>
<td>.01</td>
<td>.07</td>
<td>.04</td>
<td>.15</td>
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<td>.06</td>
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<td>.02</td>
<td>.03</td>
<td>.10</td>
<td>.09</td>
</tr>
<tr>
<td>Clear lesson goal</td>
<td><strong>.20</strong></td>
<td>*<strong>.26</strong></td>
<td>.13</td>
<td>.15</td>
</tr>
<tr>
<td>Teacher affect when speaking English</td>
<td>.19*</td>
<td>.023</td>
<td>.06</td>
<td>.01</td>
</tr>
<tr>
<td>Frequency of English output by teacher</td>
<td><strong>.22</strong></td>
<td><strong>.21</strong></td>
<td><strong>.23</strong></td>
<td>.06</td>
</tr>
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<td>$R^2$</td>
<td>.192</td>
<td>.179</td>
<td>.127</td>
<td>.162</td>
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<tr>
<td>Adjusted $R^2$</td>
<td>.158</td>
<td>.145</td>
<td>.072</td>
<td>.111</td>
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</tbody>
</table>

*p < .05, **p < .01, ***p < .001
7.4 Discussion

7.4.1 RQ 1) b. How do students perceive differences in classes led by native and non-native teachers?

The significant differences found in English production between ALT and non-ALT led classes may be based on the fact that, as a district policy, ALTs are required to use as much English as possible and asked not to use Japanese in class. HRTs may feel they lack the language skills to speak predominantly in English (Butler, 2004; 2007), and JTEs may use Japanese for numerous different class purposes (Hosoda, 2000; Miyazato, 2009). As discussed in Chapter 5, teachers with a strong command of English may be able to positively influence student behavior through clear use of routines and scaffolding. At the same time, students appear to recognize the differences in quantity of English output between classes taught by a homeroom teacher alone and those taught primarily by a JTE.

From the descriptive statistics, students recognize the increase in frequency of teachers’ English output when the NESTs are present and not. While not at the same schools, JTEs were also perceived to produce more spoken English than HRTs. This finding is to be expected, as less confident HRTs (Butler, 2004; 2007) would be expected to produce the least amount of English, while the combination of trained specialist JTEs and NESTs would show the largest amount of English spoken. The effect size of the differences between the variables leaves room for further exploration of this topic, especially with regard to meaningful levels of difference on 4-point scales.

The lack of difference with regard to perceptions of teachers’ affect for the language is relatively surprising. Less trained teachers might be expected to show more negative affect, such as hesitation or nervousness, in speaking English, though students did not appear to perceive strong differences here, indicating that the NNESTs in these classes demonstrated
positive affect when speaking English. Especially noticeable is the positive rating given to HRTs who led the classes—nearly equal with classes taught by JTEs and ALTs. Students’ perception of their HRTs’ positive attitude in English classes may represent a strategy by HRTs to compensate for weaker English skills in order to draw students into the lesson. Classes led by ALTs were slightly, though not significantly, more positively rated in each different school. Likewise, while significant differences were found between schools with and without JTEs, the effects sizes may indicate individual differences between the teachers and classes, considering the fact that schools with JTEs were rated slightly lower than schools without.

The lack of differences found across conditions on student output indicates that while the base school conditions may vary, students in independent conditions report a similar amount of output. One inference we can make from this result is to say that students are given equal opportunities for output in classes run by both ALTs and Japanese teachers, and hence the exceedingly small differences in in-class spoken output. Thus, there may be a fair amount of crossover between the classes for Japanese and non-Japanese teachers, possibly due to the professional development provided by NESTs in the classroom (Crooks, 2001). Appropriate to the current course of study (MEXT, 2008a), homeroom teachers are providing more communicative methods of instruction, similar to those used by NESTs. Finding that elementary teachers are using more communicative methods goes against the previous research from high schools and junior high schools where Japanese teachers reported considerably less use of communicative activities (Gorsuch, 2002), and calls into question HRTs’ perceptions of themselves as “not ready” to teach English in all contexts (Fennelly & Luxton, 2011).
7.4.2 RQ 2) e. What differences in speaking output do students report in classes taught by native and non-native teachers?

As in Research Question 1) b., no significant difference between the dependent variables was seen on students’ linguistic output. While lack of difference does not show equivalence, the overlap in confidence intervals strongly indicates no meaningful difference in the amount of English students produce in class. The lack of strong differences between conditions further illustrates that students perceive only weak changes in terms of the amount of speaking time provided by ALTs, JTEs, and HRTs. While these findings are far from conclusive, they do provide an argument for the similarity of communicative teaching style, the linguistic and behavioral modeling for which may come from the ALT (Meerman, 2003; Gorsuch, 2002; Mahoney, 2004).

7.4.3 RQ2.f. What effects do perceptions of each type of teachers’ spoken output have on students' reported speaking output?

From the results of the multiple regression in Research Question 2) f., the finding that the combination of JTE and ALT has little predictive effect on students’ output may indicate that the ALTs’ classroom influence is relatively small. Additionally, we see that classes requiring greater involvement from HRTs tend to predict students’ spoken interaction, indicating how HRTs may influence students’ active engagement in classes. Classes with greater homeroom teacher involvement further showed that the salience of lesson goals had a more significant effect on student behavior. This may be due to the explicit statement of lesson goals in these classes, bringing a greater sense of familiar routine and structure, while classes where JTEs and ALTs are the primary coordinators may not always retain this routine. As discussed in Chapters 5 and 6, routines are not only important to setting behavioral guidelines, but also allow for a greater connection between teacher guidance and student behavior.
Under conditions where HRTs may be less involved in class (i.e., the ALTs and JTEs are leading) as indicated by Aline and Hosoda (2006), teachers’ spoken output did not predict student output in any significant manner, while within the same schools, in class conditions where HRTs were likely to be involved, to a greater or lesser extent teachers’ spoken output predicted student output. The above finding indicates that students are most likely to imitate the proximal model (i.e., the teacher they most often see) in line with social cognitive theory (Bandura, 1977; 1986). The result further implies reasons why the frequency of ALT presence displayed a negative relationship in Butler and Takeuchi’s (2008) research: students may be unconsciously following the model provided by the HRT rather than the ALT.

7.5 Conclusions and Limitations

The findings show Japanese homeroom teachers as stronger behavioral models, while suggesting that NESTs may remain linguistic models. This result may provide a partial explanation of the previous finding regarding the negative influence of ALTs on language achievement (Butler & Takeuchi, 2008): the more often NESTs lead the class, the less often HRTs are involved, thus potentially negatively influencing students’ output and engagement with the speaking tasks. Results may also relate to the idea of creating a meaningful motivational environment (Nakata, 2009), through a role model of a similar background (the HRT) working hard in the second language. While it is beyond the scope of this current exploratory study, confirmation of these results will require further longitudinal research through the elementary years and beyond into secondary education.

The overall findings indicate the value of the Japanese homeroom teacher as a model for student behavior, contrary to previously documented beliefs among Japanese teachers indicating the primary language model should be the ALT (e.g., Mahoney, 2004; Butler, 2007a). The higher influence of HRTs’ English output when compared to JTEs, who are not
part of students’ regular classroom experience, and ALTs, who may be viewed as outsiders, shows the importance of HRTs’ basic English abilities and willingness to communicate. We may conclude that students perceive differences in the amount of output that teachers produce in class, and that this in turn can help predict the amount of output that students produce. Accordingly, the optimal role for the Japanese homeroom teacher may be one similar to the profile of the teacher as active co-teacher or co-learner, as demonstrated by Aline and Hosoda (2006).

Consideration should be made for the fact that teachers’ English level was not measured, though basic interactions with the HRT participants showed that they were not comfortable or fluent English speakers, as previously indicated by Butler (2004; 2007). While it is beyond the scope of this study to demonstrate empirically, ALTs and JTEs may be useful to less proficient HRTs by providing accurate models for foreign language use (Mahoney, 2004), or helping HRTs to better scaffold communicative activities and provide clear ideas for lessons (Crooks, 2001). In this way, ALTs and JTEs may continue to serve a professional development role for homeroom teachers. In the current study, ALTs and JTEs provided a base format for engaging students in foreign language activities, which may have helped HRTs to use positive interactional strategies and activities in language classes when teaching alone, thus explaining the relatively small differences in students’ perceptions. Indeed, we may speculate that the interactions with the NESTs may have given some hope to teachers who may feel underprepared (Fennelly & Luxton, 2011). The crucial point is that the value of native and non-native specialist teachers is predicated on the active participation and professional and linguistic development of the HRT; further than translating instructions, the homeroom teacher should also be actively and positively using English for real communication and interaction with students.
The results offer a very specific positive suggestion for Japanese teachers, especially homeroom teachers, showing one way which Japanese teachers can positively influence students’ foreign language behavior: *in order to promote student output, homeroom teachers need strategies for frequent production and demonstrating positive affect in language classes.* This finding supports social cognitive theory (Bandura, 1977; 1986), where students are more likely to imitate a similar model such as their HRT than a socially distant one, as the ALTs and JTEs may be (Crooks, 2001; Gudykunst & Kim, 1984; Mahoney, 2004; Miyazato, 2009), which further confirms the idea of the classroom teacher as an important behavioral role-model for Japanese children (MEXT, 2008).

Care should be taken in interpreting these results, as no conclusions can readily be drawn with regard to the desirability of specialists and ALTs. Results merely show that the strongest influence on students’ communication behaviors was brought about through greater homeroom teacher involvement. The generally high mean score in students’ perceptions of the variables studied here indicate that this sample of students receiving English instruction (MEXT, 2008) are capably served by all three teacher types with regard to promoting student output.

This embedded study demonstrated the influence of teachers’ structure and behavioral modeling on students’ linguistic engagement in classes taught by native and non-native speaker teachers. While differences and effects were not large, they demonstrate one way in which Japanese teachers may have a positive impact on their students. The lack of differences of student perceptions is also notable, as it indicates that elementary students perceive their teachers, whether Japanese or foreign, as teachers first and foremost. While a lack of statistical difference and even an overlapping confidence interval do not guarantee sameness
at the qualitative level, it does indicate that these differences may not be as meaningful as appearances imply. While the involvement of the homeroom teacher does indicate a small though statistically significant influence on students’ willingness to use English, as noted in the previous Chapter, these effects are likely superseded by appropriate teacher interactions and scaffolding independent of the nationality of the teacher. The weak differences in how native and non-native teachers are perceived in class, the weakness of the direct effects of the individual indicators, and the similarities in coefficients in studies 2 and 3 in Chapter 6 indicate that sampling from classes with Japanese and non-Japanese teachers is unlikely to show large differences in effects and relationships. This gives further credence to the notion that elementary pupils are first students in school and secondarily language learners, and thus a more generalized and universal model of learning motivation is an appropriate choice for application in Japanese elementary foreign language classes.
Chapter 8–How Teachers Influence their Students’ Engagement and Motivation: Longitudinal Quantitative Findings with External Triangulation

Keywords: Longitudinal model, SDT micro-theories, integration, 3P model

This Chapter aimed to replicate the pilot conducted in Chapter 6. Following a cohort of fifth-year students through a single school year, this research investigated the relationship of the teachers’ classroom environment in relation to self-determination theory’s basic needs, cognitive evaluation, and organismic integration micro-theories, as identified in Chapter 2. This study sought to provide a model for classroom motivational development by investigating the longitudinal relationship between existing motivations, classroom environment, and student engagement in foreign language classes.

8.1 Research Questions and Overview

This study sought to test the findings of the pilot studies outlined in Chapter 6, as well as create a justifiable basis for qualitative inquiry into classroom practice, discussed in Chapter 9. To create a clear understanding of how students’ existing motivations and perceptions of the classroom environment influence in-class behavior and long-term motivation, this Chapter investigated the following research questions from Chapter 4:

2) How does structure influence students’ motivational needs and in-class engagement?

   a. Does a direct predictive effect exist between autonomy-supportive classroom structure and classroom engagement?

   b. How does structure influence motivational and psychological needs?

   c. What are the motivational outcomes of structured classroom environments?
d. Are self-reported engagement and motivation recognizable to teachers and other outside observers?

The main research question and four subquestions of this Chapter come out of the intersection of the literature on motivation, school-based learning, and foreign language acquisition. While the direct links between the person and the environment are clearly modeled within social cognitive theory (Bandura, 1985), they are not as clearly modeled for school-based motivation (Skinner et al., 2008). Likewise, supportive structure and psychological needs have not been modeled longitudinally in Japanese foreign language learning. Finally, in order to externally validate the model, independent external measurements are needed to verify the self-report instruments.

In order to answer the above questions, this study gathered data at three time points throughout the school year. This research borrowed from the presage, process, product (3P) model of learning (Biggs & Telfer, 1987) to investigate the longitudinal development of students’ motivation to learn English in reaction to their early learning experiences. The 3P model recognizes certain variables as presage variables, meaning they exist prior to the measurement points and exert influence on how students learn throughout the entirety of the study. These may be elements such as student age, socio-economic status, gender, prior achievement, or existing motives. Process variables are those that directly influence the outcomes, but are predicted and/or potentially moderated by the presage variables. These variables may be the classroom processes, such as teacher interactions, student approaches to learning, or students’ in-class effort. Finally, product variables are those treated as outcomes in the model, hypothetically influenced by both the presage and the process. These may be teacher assessments, tests, attendance rates, or new levels of motivation.

Based on the 3P model, motivation was treated as both a presage and product variable, partially mediated by the classroom process. Based on the fact that many of the
“hard” presage factors (e.g., ethnicity) are irrelevant given the homogeneity of this specific population (refer Chapter 4 for a discussion of the schools and participants). As students had never studied English as part of the national curriculum before this study and had never been previously assessed, prior achievement in a foreign language was unavailable. Gender was used as a predictor of all of the variables. Prior motivational orientations (extrinsic, introjected, identified, intrinsic regulations) toward learning English were used as predictors of all variables in this model. Students’ motivations were hypothesized to predict students’ perceptions of supportive structure, as existing motivations may influence whether students perceive the learning environment as autonomy-supportive or controlling (Chirkov & Ryan, 2001). Considering the emphasis on promoting motivation within the Course of Study for foreign language (MEXT, 2008a; see also Chapter 3), using final motivation as an outcome fits the goals of the Ministry of Education, while in-class engagement may more generally suit the needs of teachers. As many primary teachers feel it is their duty to make sure that all students are on task and learning (Cave, 2007), measures of engagement appear to be both appropriate and salient to teachers. The process and product variables are taken from Skinner and colleagues’ (2008) self-system model of motivational development (SSMMD; Skinner et al., 2008), described in Chapter 2 and piloted in Chapter 6. Replicating the model in Chapter 6, study 5, supportive structure was hypothesized to predict engagement, partially mediated by need satisfaction.

The integration of the 3P model is used as an expedient for clarifying the timing of when the data was taken in this longitudinal study. The basic framework for the study is distinct from Biggs’ Student Learning Theory (Biggs & Telfer, 1987); much of this theory was developed for higher education, and thus may not apply to this context. At the same time, the temporal framework afforded by the 3P model clearly separates when variables were
measured, and how they may be hypothesized to relate for causal inference (Shadish, Cook, & Campbell, 2002).

As Skinner and colleagues’ (2008) self-system model of motivational development considers the students’ internal motivation as part of the model within the individual, extant motivations are expected to influence how students perceive the environment as well as predict outcomes. Recognizing the potential for a reciprocal relationship between engagement and motivation, students’ engagement might be expected to predict the product motivational orientations, as well as teachers’ external assessment of each student. Similarly, presage motivations may also predict future motivations.

8.2 Methods

8.2.1 Participants

The current sample came from the same school district in western Japan described in Chapter 4 and investigated in Chapters 6 and 7. Four-hundred and thirty-four fifth-year students (female $n = 220$) in 16 classes from seven schools completed surveys at three times during the 2013 school year: once in April, once in October, and finally in March, 2014. The sixteen homeroom teachers attached to each class were also given student assessment surveys at the end of the year.

8.2.2 Instruments and Analyses

The survey instruments used in this Chapter came from the validations completed in Chapter 6. All of the scales used a minimum of 3 indicators for each hypothesized factor (Kline, 2011, p. 359).

Students regulations were measured with the same modified SRQ-A (Ryan & Connell, 1989) used in Chapter 6 and presented in appendix 4. Students’ classroom experiences were measured using the supportive structure survey described in Chapter 6,
along side the AFS (Reeve & Sickenius, 1994) and engagement surveys (Skinner et al., 2008; Wolters, 2004). The final surveys used are presented in Appendix 6. The scales showed acceptable internal validity and reliability in the investigations in Chapter 6, and similar scales have previously been used successfully across multiple Confucian cultural contexts (Jang et al., 2009; Jang, Kim, & Reeve, 2012; Reeve & Tseng, 2011). Based on the high factor correlations in Chapter 6, engagement and needs were treated as single first order factors to prevent potential multicollinearity problems.

Homeroom teachers also completed assessments of individual students’ in-class interest, behavior, motivation, and English ability, based on the goals described by the Ministry of Education (MEXT, 2008a). Maintaining consistency with other measures, a 5-point scale was used, ranging from 1 (“50% or less for this student”) to 5 (“90% or greater for this student”). This grading survey is presented in Appendix 7.

In order to test the external validity of students’ in-class engagement self-reports, videos were taken of students’ class performance and behavior. Using a 5-point rating system, two trained raters documented full class engagement on a scale ranging from “all students off-topic, bored, or mindless” (1) to “all students working, interested, or thinking” (5). Raters were instructed to watch the whole class and rate activities for each minute of the class, leading to a potential total of 40 observations per class. Raters were selected from a group of fourth-year university teacher trainees who had completed their teaching practicum and were preparing to enter the teaching practice in Spring of 2014. The observations were conducted in the winter of 2013-2014. Rater training was minimal to allow for naïve assessment as might be made by non-scholarly observers, such as parents, teachers, and administrators. The observation rating form used is presented in Appendix 8.

Data was analyzed using MPlus 7 (Muthén & Muthén, 2012) using the weighted least
squares mean and variance corrected (WLS-MV) estimator for all structural equation models. As Likert data may be considered to be ordered categorizations rather than truly continuous (Carifio & Perla, 2007), weighted least squares extraction was used due to the ability to model non-normal ordered categorical data (Muthén & Muthén, 2012) and handle non-normal and heteroskedastic data. All non-latent variable models were calculated in Stata 13 (StataCorp, 2013).

While the instruments used had been previously validated in similar contexts and longitudinal models (Carreira, 2012; Carreira, Ozaki, & Maeda, 2013; Reeve & Tseng, 2012; Jang, Kim, & Reeve, 2012; see also Chapter 6), in order to ensure internal validity, models were tested in two steps. First, a mass confirmatory factor analysis for all variables was conducted, allowing the latent constructs to freely covary. As in previous Chapters, item error terms were not allowed to correlate. Following the test of the internal validity of the constructs, simultaneous regression of the presage, product, and process variables was conducted. As in Chapter 6, fit cutoffs were set at RMSEA < .08, CFI > .9, TLI > .9 for an acceptable model, with RMSEA < .06, CFI > .95, TLI > .95 deemed to demonstrate good fit (Kline, 2011). Based on the sample size, the \( \chi^2 \)-statistic is reported, but not used for determining acceptable fit, as this statistic is likely to show statistical significance with large sample sizes (Kenny, 2004).

### 8.2.3 Hypotheses

Working from 7 hypotheses based on previous theory, empirical findings, and the work presented in the preceding Chapters, this research sought to answer the questions presented at the start of this Chapter. The full model of hypothesized relationships is presented in Figure 8.1, with each of the individual model hypotheses presented in isolation in Figures 8.2 through 8.6 for easier interpretation. The full model is a fully forward model, where all of the
variables measured at time 1 (Spring 2013) are hypothesized to influence all of the variables measured in Fall 2013 and Winter 2014. This model is intended to answer the research questions “Does a direct predictive effect exist between autonomy-supportive classroom structure and classroom engagement?”, “How does structure influence motivational and psychological needs?” and “What are the motivational outcomes of structured classroom environments?”

![Figure 8.1. Fully forward hypothesized longitudinal model for relationships between students’ motivational regulation, classroom processes, and teacher outcomes. In this and all following SEM diagrams, red lines indicate a negative relationship.](image)

First, students’ autonomous motivation at the start of the school year would influence perceptions of teacher behaviors, need satisfaction, and in-class engagement, while more heteronomous motivation would show a negative relationship (Hypothesis 1). This hypothesis is based on findings showing autonomous motivation correlating with need satisfaction (Carreira, 2012). Recognizing that existing motives may color how teachers’ supportive structure is perceived (Chirkov & Ryan, 2001) and students’ previous predilections may have a direct effect on their actions (Fredricks, Blumenfeld, & Paris,
2004), I chose to model a structural relationship between presage motivation and the in-class motivational process. Figure 8.2 presents this hypothesis abstracted from the model in Figure 8.1.

Figure 8.2. Visualization of Hypothesis 1.

Hypothesis 2 proposed that, simultaneous with the relationship in Hypothesis 1, the classroom process model from Chapter 6, study 5 would be replicated in a new sample. Working from the same modified SSMMD (Skinner et al., 2008), this study used the same partially mediated model. In this hypothesized model supportive structure directly influenced both needs and engagement, while needs mediated the relationship with engagement. Based on Hypothesis 1, the influence of existing motivations on engagement and need satisfaction is partially mediated by teachers’ supportive structure. Figure 8.3 shows the hypothetical relationship.
Classroom environment and students’ in-class psychological need satisfaction would have no direct effect on product motivations, but would influence them indirectly through engagement (Hypothesis 3). Engagement was expected to show a positive relationship with end of year motivation, thus demonstrating a reciprocal relationship based on Hypothesis 1. Previous studies of self-determined motivation in East Asian contexts have shown engagement to positively influence year-end intrinsic motivation (Jang et al., 2009). Positive engagement is expected to show a negative relationship with year-end external regulation. Graphical representation of this hypothesis may be found in Figure 8.4.
Each motivational orientation was expected to show a positive relationship with itself over time, but heteronomous and autonomous orientations would show a negative relationship (Hypothesis 4). To test this hypothesis I used a fully cross-lagged and auto-lagged structural model. Just as in Chapter 6, study 4, the quasi-simplex relationship between each of the individual factors (Ryan & Connell, 1989) was expected to demonstrate a similar longitudinal relationship. Based on organismic integration theory, the regulations were expected to correlate at both times. Figure 8.5 presents the expected relationships.
Recognizing that motivation may have a direct effect on students’ observed behavior and how teachers perceive students’ behavior (Skinner et al., 2008). I hypothesize that students’ motivation and engagement would both directly influence teachers’ evaluation, though engagement would show a stronger influence than students’ internal motivations (Hypothesis 5). Based on the fact that teachers often comprehend of how students say they engage with class, but show poor knowledge of students’ motivation (Lee & Reeve, 2012), teachers’ assessment of students’ in-class performance was expected to more strongly reflect students’ engagement but less so their motivation. As in other parts of the model, I hypothesize that more controlled regulations will show a negative relationship with teacher assessment. This hypothesis is visualized in Figure 8.6, and partially attends to the research question “Are self-reported engagement and motivation recognizable to teachers and other outside observers?”
As stated previously, each of the individual hypotheses is run simultaneously with all others to form the complex reciprocal model of longitudinal motivation presented in Figure 8.1. In the results, each of the hypotheses will be handled in reference to the larger model.

Looking at models outside of the latent variable models, to address the research question “What are the motivational outcomes of structured classroom environments?” mean-level changes in motivational regulations over time were investigated. Using repeated-measures MANOVA and within-subjects ANOVA, I tested for differences both between classes and within individuals over time. Based on previous work on Japanese elementary students (Carreira, 2011) as well as western secondary academic contexts (Otis, Grouzet, & Pelletier, 2005), a decrease in autonomous regulation and an increase in controlled regulation over time was predicted (Hypothesis 6).

To fully attend to the question “Are self-reported engagement and motivation recognizable to teachers and other outside observers?”, external ratings of students’
classroom performance were used to triangulate and validate students’ perceptions of their own behavior. Hypothesis 7 states that external raters’ observations of students’ engagement would positively correlate with the self-reported data, with a baseline for an acceptably strong correlation set at .3, based on previous studies comparing self- and other-reports (e.g., Butler & Lee, 2006; Lorenz et al., 2012; Nave et al., 2008). Correlates above .3 have been indicated to be useful for understanding behavior (Funder et al., 2012).

8.3 Results

Missing data from individual nonanswered questions accounted for less than 3% of the sample, indicating that data were within acceptable limits for mean and variance control procedures (Graham, 2009; Schafer & Graham, 2002). Prior to testing the model, a mass confirmatory factor analysis on the full data set was conducted to test the potential validity of the structural model. The hypothesized 12-factor model showed highly acceptable fit, RMSEA = .03 (90% CI .029 ~ .035), CFI = .98, TLI = .97. Internal reliabilities for all factors was found to be acceptable, minimum Cronbach’s α = .71. The factor loadings for each indicator are listed in Table 8.1, while Table 8.2 shows the latent variable correlations, descriptive statistics, and internal reliabilities. Based on these results, the complete structural model hypothesized in Figure 8.1 was tested.

Results of the complete model demonstrated highly acceptable fit, $\chi^2 = 1699.969, p < .001$, RMSEA = .032 (CI = .029 ~ .035), CFI = .98, TLI = .97. While several factors indicated potential multicollinearity issues ($r > .9$), the strength of the model fit and high factor loadings (weakest measurement coefficient .51) indicate a sufficiently robust model. Structural regression coefficients are presented in Figure 8.7. Support was found for nearly all of the hypotheses, though with numerous non-significant relationships.
Table 8.1. Factor loading coefficients for each indicator of the 12 hypothesized factors.

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Figure 8.7. Final model results. Latent error covariances and non-significant paths are not displayed.

Intrinsic regulation showed a significant relationship with autonomy, relatedness, and competence needs ($\beta = .31, p < .05$), while identified regulation significantly predicted students’ perceptions of supportive structure ($\beta = .29, p < .05$). No other significant relationship from Hypothesis 1 was noted, indicating no direct influence of existing motivation on engagement.
The process model from Hypothesis 2 replicated the findings from Chapter 6, with the notable difference that controlling for presage intrinsic regulation appears to have weakened the correlation between ARC needs satisfaction and engagement. The relationship between supportive structure and need satisfaction was strong ($\beta = .78$), similar to Chapter 6. While this study and the previous showed similarly strong zero-order correlations for the process stage, the results of study 5 in Chapter 6 showed a structural path coefficient of .8 from ARC needs to engagement, while this model presents a beta of .45. Further, by controlling for presage motivation, the influence of supportive structure appears to increase, from a previous value of $\beta = .24$ to .55 in this model. Positive teaching structure again strongly influenced students’ psychological need satisfaction, $\beta = .78$, $p > .001$, thus supporting Hypothesis 2.

Looking at the influence of the process phase on product regulations, positive emotional, cognitive, and behavioral engagement positively influenced intrinsic ($\beta = .22$, $p < .001$) and identified ($\beta = .17$, $p < .01$) regulation, while negatively influencing external regulation ($\beta = -.16$, $p < .01$). The relationship between engagement and introjected regulation calculated from this sample was not significant. These results partially support Hypothesis 3.

The auto-lagged relationships from Hypothesis 4 were found to be significant in this model. The strongest auto-lagged relationships were found between presage and product intrinsic, $\beta = .56$, $p < .001$, and presage and product introjected regulations, $\beta = .62$, $p < .001$, while identified and external regulation showed a slightly weaker relationship when regressed on themselves, $\beta = .41$, $p < .01$, and $\beta = .33$, $p < .001$, respectively. Only one cross-lagged relationship was found, with product introjected regulation regressing on presage identified regulation, $\beta = -.4$, $p < .01$. 

Of the variables measured, only engagement significantly correlated with teachers’ final assessment of students’ in-class performance. While the zero-order correlations between teacher assessment and other factors were quite similar, when controlling for all other factors, only engagement showed a weak though significant relationship, $\beta = .14$, $p < .05$, showing support for Hypothesis 5.

Testing subjects’ changes in motive over time, a repeated-measures MANOVA test showed significant differences between presage and product regulations, Pillai’s trace = .0267, $F(4, 403) = 2.76$, $p = .0274$. Investigating the individual changes, a within-subjects ANOVA was used to investigate the changes over time, between individual class groupings, and with these factors together. While all class groups showed some degree of differences, only two tests demonstrated a significant difference over time. Intrinsic regulation showed significant differences between classes, $F(15, 867) = 3.01$, $p < .001$, partial $\eta^2 = .21$, as well as within subjects over time $F(1, 867) = 7.54$, $p = .006$, partial $\eta^2 = .02$. Extrinsic regulation also showed significant differences in different classes, $F(15, 867) = 3.4$, $p < .000$, partial $\eta^2 = .19$, as well as over time in different classes $F(15, 867) = 2.02$, $p = .01$, partial $\eta^2 = .07$. Between class differences were significant as well for identified, $F(15, 867) = 2.23$, $p = .005$, partial $\eta^2 = .16$, and introjected, $F(15, 867) = 1.84$, $p = .03$, partial $\eta^2 = .12$, regulations. Variance explained by each model was generally high, $R^2 > .7$, for all four models. Consistent with Chapter 6, study 5, students perceived stronger identified reasons for learning English than intrinsic, though both more autonomous reasons for learning were significantly stronger than heteronomous. Hypothesis 6 was not supported; autonomous motives increased slightly while controlled motives showed little change in many classes, though some classes did show a slight increase. The pre and post scores are displayed in the bar graph in Figure 8.8. Of specific interest, the among the strongest reasons of those measured for wanting to learn
English were the identified ones, comprised of the recognition of the intrinsic rewards and desire to be able to use the language. This finding was consistent across classes and schools.

Looking at the data from external assessment of engagement, raters’ independent agreement for their ratings of students’ engagement was calculated using Pearson’s correlation coefficient. The correlation showed good agreement between the two raters on the 5-point scale, \( r = .92, p < .001 \). Based on this acceptable agreement, raters’ external scores were averaged and correlated with each class’ average self-reported engagement score. Use of mean scores was deemed acceptable based on the relatively high internal reliability of the factor, as well as the high factor loadings (minimum factor coefficient = .63). Rater scores and self-report scores showed a high correlation, \( r = .56, p < .05 \), greater than the set baseline of \( r > .3 \). Rater scores were both consistently lower than student self-ratings. Descriptive
statistics for each class’ self-reported and externally assessed engagement scores are presented in Table 8.3. These results provide moderate support for Hypothesis 7.

<table>
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<tr>
<th>Class</th>
<th>Rater 1 Mean (95% CI)</th>
<th>SD</th>
<th>Rater 2 Mean (95% CI)</th>
<th>SD</th>
<th>Self-reported Mean (95% CI)</th>
<th>SD</th>
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<td>4.2 (3.91, 4.49)</td>
<td>.92</td>
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<td>.72</td>
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<td>.57</td>
<td>2.95 (2.84, 3.06)</td>
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<td>.58</td>
<td>3.63 (3.45, 3.81)</td>
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<td>3.97 (3.43, 4.44)</td>
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8.4 Discussion

The results of this Chapter offer answers to the research questions. Hints at the answers to these questions were provided by the pilot work done in Chapter 6, but without sufficient controls on pre-existing motives, a clear understanding of how the classroom process influences motivation over time could not be reached. Overall, model replicability appears strong, as two independent samples in this and Chapter 6 responded to the instruments in highly similar fashion.
8.4.1 RQ 2) a. Does a direct predictive relationship effect exist between autonomy-
supportive classroom structure and classroom engagement?

Looking at the results of Hypotheses 1 and 2, when controlling for presage motivation, students that teachers’ supportive structure has a direct effect on engagement. Further, structured teaching had a slightly stronger effect on engagement than basic need satisfaction. While the previous model in Chapter 6 showed stronger influence from needs to engagement, this model did not include existing motivation, thus excluding a potential confound. By thus including previous motivations, the model in this Chapter more effectively demonstrates how the classroom environment influences students’ behavior, cognition, and emotions to a greater extent than self-reported motivation.

Recognizing that students’ existing motivations may influence their perceptions of the teaching environment and needs satisfaction, we see features of the self-system model of motivational development (Skinner et al., 2008) repeated, most specifically in the strength of the influence from the environment on students’ needs. At the same time, we see a partially rather than fully moderated relationship between the environment and students’ behavior. We may recognize this as lending support to the notion that the environment is processed by the individual, influenced by their existing internal perceptions and influencing their feelings of need satisfaction. Individuals may also react to specific features of the environment, directly influencing their actions.

This result indicates support for the triadic interaction model of social cognitive theory (Bandura, 1986), integrated with the SSMMD (Skinner et al., 2008) and basic needs theory of self-determination theory. The teaching environment simultaneously influences students’ needs for feeling autonomous, related, and competent, while simultaneously influencing their active behavior, cognition, and emotions. In all likelihood, students’ engagement has a
reciprocal relationship with teachers’ instructional style, even within a single classroom period. While the fully reciprocal triadic relationship cannot be demonstrated sufficiently with this model, this model hints at the potential for its applicability based on the self-system model of motivational development (Skinner et al., 2008). Based on the previously demonstrated longitudinal reciprocal relationship and the direct relationship between student engagement and teachers’ instruction, this aspect of Bandura’s (1986) model may indeed be accurate, though further research is needed to verify this.

**8.4.2 RQ 2) b. How does structure influence motivational and psychological needs?**

As with Research Question 2.a, we see the strength of the environmental influence on motivation. Hypotheses 1 and 2 confirm that structure, as opposed to existing motivation, helps to promote positive engagement in class. Controlling for presage motivation allows for a comparison between students’ pre-existing psychological orientations and their perceptions of the classroom environment. As in the previous research question, we see again that presage motivation has a moderate effect on need satisfaction ($\beta = .31$), while the classroom situation has a very strong effect ($\beta = .78$). Likewise, the form and quality of the instruction has a slightly stronger effect on engagement than satisfaction of internal needs.

The repeated importance of structure and the environment, rather than internally held beliefs, indicates the role of the classroom environment on promoting student motivation. Indeed, the relationship between students’ identified motivations and perceptions of supportive structure further alludes to the motivation to learn (Brophy, 2004) paradigm, where value for the subject matter may influence students to feel more satisfied with their instruction, and thus to engage with the material. While both forms of autonomous regulation influenced the predictors and mediator variables, neither these nor any other presage motivation factors showed any influence on process engagement.
Though Chapter 6 showed positive correlations between engagement and motivational outcomes, though the results in this Chapter showed noticeably weaker effects when controlling for prior motivation. Based on this new finding from the fully forward model, while motivation may be influenced by classroom processes, these influences may be weaker than that of prior motivation. A previous study indicated a direct relationship between supportive teaching and outcome motivation (Carreira, Ozaki, & Maeda, 2013), though the model in that study failed to include engagement as a variable in the mean-level path analyses. Updating this research to control for prior influences, both presage motivation and process engagement thus cannot be overlooked when discussing motivation as an outcome variable.

8.4.3 RQ 2) c. What are the motivational outcomes of structured classroom environments?

As in Chapter 6, classroom structure has a fully mediated effect on students’ motivational outcomes, passing through engagement. This result demonstrates the relationship of cognitive evaluation, basic needs, and organismic integration theories: each shows a reciprocal relationship, though the influences of cognitive evaluation of the environment and perceptions of need satisfaction are fully mediated by students’ own engagement choices when influencing the development of internal beliefs and reasons for learning. Thus a crucial step in the process of supporting students’ long-term motivation is providing an engaging and need-satisfying learning environment.

Results also show that students’ motivational patterns within a single school year do not drastically change. In support of Hypothesis 4, learners’ motivation showed strong autocorrelations over time, but the hypothesized negative relationship between autonomous and heteronomous motivations were not found. The results indicate that those students who
are autonomously motivated remain so over time, while those who are more dependent on
others for their motivations are less likely to change. While learners reporting this latter
pattern are somewhat few in number judging by the much higher sense of autonomous
motivation when compared with more external orientations. While motivation, especially
intrinsic motivation, may indeed be unstable (Brophy, 2004), these students answered the
questionnaire items in relatively similar ways nearly a year apart. Presage and product
motivations appear likely to be more strongly correlated than might otherwise be expected
(Otis, Grouzet, & Pelletier, 2005). Indeed, the lack of overall change with regard to English
motivation over the course of a school year requires additional investigation.

Another interesting finding is the fact that the strongest reasons students gave for
wanting to learn English were those related to personal benefit and growth. Students
recognize the value of being able to use English, and hope to gain a measure of proficiency
through their studies. This aligns with Brophy’s (2004) idea of valuing the learning material
and building a sense that what is taught in schools is personally relevant to each student. By
this token, many of these classes are already motivated to learn English even starting in fifth
grade. Some classes saw a slight increase in this desire, though it was not statistically
significant across the whole sample. Despite the theoretical and empirical need for an
identified sense that the learning material is personally important, the elementary Course of
Study for Foreign Languages (MEXT, 2008a) makes no mention of developing a sense of
value for learning English (or any other foreign language). Whether this is an omission based
on the notion that such motivations already exist or an oversight based on the disconnect
between policymakers and actual students remains unclear.

These students differed to those in previous studies of school-based motivation (Otis,
Grouzet, & Pelletier, 2005; Carreira, 2011) in one crucial way: the general trend of learners’
overall intrinsic motivation did not decrease over time, but on the contrary showed small but significant increases. Only a small number of classes showed increases in controlled motivation, and a number actually demonstrated decreases. From this, we may infer that some aspect of the instruction provided learners with a stronger internal locus of control and positive affect for language learning. Potential reasons for these decreases will be investigated in the following Chapter.

This difference may simply be a sampling artifact, as the sample only covered a single school year and did not investigate the potentially large changes across years. Just as possibly, these findings may represent the results of a program of need-satisfying instruction in a low-pressure, low-stakes environment (Ryan & Niemiec, 2009). As is emphasized throughout the course of study (MEXT, 2008a), classrooms are expected to be places for building positive interest in the subject matter without the threat of assessment. At the same time, each cohort received differing stimuli from the environment, and thus may have developed along differing trajectories accordingly. Classes which showed an increase in autonomous motivation may be hypothesized to have received greater structure in support of their basic needs, and thus may perceive the language class as more supportive. How this exactly may be observed is a matter to be addressed in the following Chapter, but it allows for the generation of a concrete basis for comparison between classes when looking for patterns of effective teaching.

8.4.4 RQ 2) d. Are self-reported engagement and motivation recognizable to teachers and other outside observers?

As predicted, teachers’ perceptions of students’ self-reported motivation was relatively weak, but teachers were able to assess students’ ability, interest, and behavior based on classroom performance. In alignment with the work by Lee and Reeve (2012), engagement is a salient
and recognizable factor at the nexus between motivation and action, and teachers may use it as a reference point for inferring students’ the strength of students underlying motives. Based on this finding, we might infer that teachers’ discussions of motivation are often truly discussions of in-class engagement.

Likewise, external raters showed acceptable ability to grasp students’ personal perceptions of their engagement. Notably, the comparative strength of the correlation \((r = .56)\) indicates that the external raters showed greater understanding of students’ self-reported engagement than is reflected in teachers’ assessment (zero-order \(r = .27\), model \(\beta = .14\)). There are numerous explanations for this result: first, the homeroom teachers who completed this survey were not English teachers, and thus may have completed each students’ assessment with less precision than a specialist might. The external raters had training in foreign language classes, and thus might have a more nuanced understanding of how preadolescents may engage in foreign language classes. Second, homeroom teachers are not always present for these classes, and thus may not have a perfectly accurate portrait of students’ foreign language performance. While the majority of the groups’ teachers were present, at certain times some teachers were not present in the class, and thus were forced to make their observations based solely on inference. Teachers also make their assessments over time, and thus their judgment based on an entire year of classes is likely to reflect a greater degree of the ups and downs that students experience, rather than a single, specific, and somewhat isolated classroom experience. Were teachers assigned to assess students solely on their in-class engagement, the results might be more comparable.

At the same time, the external ratings provide insight into how learners’ engagement is perceived by outsiders, and may thus help to demonstrate the validity of the instruments. Correlations with the whole class average were moderately high, \(r > .5\), well above the stated
cutoff of $r > .3$. These results are similar to previous studies of students on- and off-task behavior (Butler & Lee, 2006), and higher than in many studies comparing self- and other-reports (e.g., Nave et al., 2008). Given the high variation that may occur in one class, as well as the fact that a class average was comprised of as many as 37 independent ratings, this correlation is indeed strong, indicating that the engagement instruments function as effective measures of students’ active participation and investment in classroom learning. In general, students were predictably more likely to declare themselves as engaged, as shown by their generally higher self-reported versus observed scores, though this is likely to be expected.

### 8.5 Conclusions

These findings indicate the importance of a structured and engaging learning environment on how learners perceive value in their learning and the development of motivation. Supportive structure directly influences both the person and their behavior, and thus may offer a way of promoting active learning. Existing autonomous motivation plays a significant role in how students perceive instruction, but does not have a direct effect on engagement. This would indicate that more than existing motivation, the form and quality of the lesson has a direct impact on whether students are engaged in the learning process.

While existing motivation most strongly predicted itself within the model, it also showed a reciprocal (though indirect) relationship with engagement when passing through students’ perceptions of the learning environment. The current model indicates that motivation promotes engagement, which likewise supports the development of greater motivation. Regular contact with foreign language material may make it feel less strange, and thus habitual engagement may help to promote the feeling that the task itself is valuable to students.
In the results presented, students’ motivation did not significantly influence teachers’ assessment of students’ performances in class. Engagement had a significant influence on teachers’ perceptions of student interest, ability, and final motivation. It was further clearly visible to outside observers as well. Self-reported motivation, on the other hand, appears to function largely within individual students, exerting mixed and somewhat unclear effects on the classroom environment.

Thus on a theoretical level, organismic integration theory may be most effectively to control for individuals’ prior motivations in support of the classroom engagement and learning process. Indeed, measuring only motivation and internal self-perceptions offers only one side of the story, just as failing to account for pre-existing motivation may provide an incomplete picture of the relationships between variables, as was presented in the pilot in Chapter 6, study 5. In measuring motivation as part of a larger classroom dynamic (Skinner et al., 2008), both motivation and engagement must be considered separate but related, and thus patterns of student regulation alone may not provide a clear or complete picture.

The finding that identified regulation positively influences students perceptions of the teaching environment, indicating that teachers may help to engage their students indirectly by helping them to understand the personal benefits of learning a foreign language. This echoes similar results in both general education (Assor, Kaplan, & Roth, 2002) and language learning contexts (Fryer et al., 2014). While the effect sizes here are relatively small, this model would indicate that by providing individuals with culturally appropriate, need-satisfying learning experiences, teachers can help promote the overall motivational climate of the class, and thus perhaps increase autonomous desire to learn and decrease more extrinsic motives. Care must be taken in interpreting this finding, however, as the results display variable-centered but not person-centered statistics, thus showing how person, environment,
and behavior may interact, but do not clearly demonstrate how individuals change over time. Future studies on this topic will need to make use of person-centered analyses in order to show students’ increase or decrease in motivation, as well as investigating other potential covariates of those changes.

This Chapter has discussed the macro-level features of need-supportive classrooms, though these results also lack context. While the results here indicate how students’ perceptions of instruction may influence motivation, the micro-level classroom and teacher differences remain unclear. Based on the empirical foundation presented above, the following Chapter will explore features of classes that aid and thwart the development of motivation. Moving beyond what teachers do and say to support motivation (Reeve & Jang, 2006), further research will investigate teachers’ instructional decisions, including type, length, and presentation of activities with an eye to how they influence students’ need satisfaction and desire to engage in learning tasks.
Chapter 9–How Do Teachers Promote Positive Engagement? Observable Classroom Practices based on Student Ratings

Keywords: Qualitative observation, classroom practice, teacher support and behavior

Concurrent with the quantitative analyses in Chapter 8, specific teacher behaviors were explored qualitatively through classroom descriptions. The data gathered and analyzed in the previous Chapter investigates how students perceive their classroom environment, how students’ engagement influences on their own motivation, as well as on their teachers’ assessments. However, the features of different classes remain unclear. In looking at classes rated comparatively higher for supportive structure or increased autonomous motivation, the question remains as to why these outcomes occurred. By looking at videos of each class, this Chapter hopes to illustrate the class and teacher level influences that affect student motivation.

9.1 Research Questions and Overview

Based on the findings from Chapter 8, as well as the observed results in Chapter 5, this Chapter will seek to answer the following research questions from Chapter 4. As in the previous Chapters, the broader research question refers back to the larger goals of the project, while the research sub-goals define the individual points to be explored within the Chapter.

3) What are the features of high and low structure and engagement classes?

a. Are students’ ratings of supportive structure recognizable to outside observers?

b. What features of activities, teacher attitudes, lesson organization, behavioral management, and physical classroom settings differ in high and low engagement classes?

c. What additional unmeasured or unmeasurable specific instructional features may be salient to learning in foreign language classes?
As outlined in Chapter 4, the focus of this study will be primarily qualitative, supported on the previous Chapter’s quantitative groundwork and the pilot observations conducted in Chapter 5. While this research is qualitative, it is also situated in a practice-oriented self-determination theory framework. In order to situate the study within the larger field of educational research, I have selected elements of the Classroom Assessment Scoring System (CLASS) framework (Pianta & Hamre, 2009) as a basis for qualitative coding according to three broad categories: emotional supports, classroom organization, and instructional supports. While the original CLASS instrument was designed for making quantitative ratings (e.g., Pianta et al., 2014), the categories presented may be used just as easily for coding observable practices. This use of an existing framework may allow for easier organization and comprehension of the documented practices. These broad categories were developed based on principles of self-determination theory, the practice-oriented work by Good and Brophy (2008; Brophy, 2004), and numerous other theoretical and empirical works (Stipek, 2002; Emmer & Stough, 2001; etc.).

Previous mixed-methods research on classroom engagement in foreign language classrooms has made use of the Motivation Orientation of Language Teaching (MOLT) for coding generalized patterns in foreign language classes (Guilloteaux & Dörnyei, 2008). While recognizing these motivational strategies as important, this observational research will look at the smaller micro-trends in how activities are structured and carried out to promote motivation rather than broader strategies for motivating students. As the MOLT is, in essence, a quantitative observational instrument, based on the notion that the frequency of a certain number of broad practices may demonstrate good practice, it does not match the bottom-up observational orientation of descriptive qualitative research. Indeed, for a certain theoretical practice to engage students, the practice may need only occur once in a class, and thus would
not necessarily be accurately represented by a frequency measure. At the same time, this research re-examines many of the so-called ‘Ten commandments for motivating language learners’ (Dörnyei & Csizér, 1998), presented in Table 9.1.

| 1) | Set a personal example with your behavior. |
| 2) | Create a pleasant and supportive atmosphere in the classroom. |
| 3) | Present the tasks properly. |
| 4) | Develop a good relationship with the learners. |
| 5) | Increase the learners’ linguistic self-confidence. |
| 6) | Make the language classes interesting. |
| 7) | Promote learner autonomy. |
| 8) | Personalize the learning process. |
| 9) | Increase the learners’ goal-orientedness. |
| 10 | Familiarize learners with the target language culture. |

While likely examples of good practice, these broad strategic choices such as “promoting integrative values” and “scaffolding” may not offer teachers clear direction as to how and what to do in class without training in the specific jargon. The MOLT, coming out of Dörnyei and Csizér’s (1998) ‘ten commandments’ also appears to contain duplicate items. Two items from the MOLT, “establishing relevance” and “stating communicative purpose/utility of the activity,” are arguably the same, and may both be considered in the category of instructional supports. The MOLT further lacks clear descriptors of classroom management elements such as lesson pacing and physical classroom organization. Furthermore, while the MOLT scheme has borrowed from solid theory (e.g., Good & Brophy, 2008), it lacks categories to explain negative teacher behaviors which may equally strongly affect students’ engagement. Finally, it was not developed for the team-teaching environment, and thus certain elements relevant to good teaching in the Japanese school setting may be missing.

Thus, rather than documenting frequency of theoretically motivating behaviors or ticking boxes regarding previously theorized practices, as might be done in the original MOLT or CLASS observation schemes, this research seeks to triangulate students’ self-
reported motivated behavior, then describe the features which appear to influence observed engagement according to a broad descriptive framework. Approaching the issue of motivation from a bottom-up, need-satisfaction perspective, documenting specific features of teachers’ activity choices and scaffolding beyond explicit motivational strategies may help practitioners improve classroom-based interest and engagement. These practices may be broadly coded similar to the MOLT and CLASS observation schemes, but the practices themselves will be described qualitatively in order to better detail their implementation rather than the frequency in which they occurred.

While the current research may ascribe codes brought in from outside existing theory, extant codes will be used for the purpose of parsimonious interpretation; phenomena that have already been documented do not need to be re-documented using fresh terminology for the sake of novelty. The use of existing theory in these observations should be considered a lateral connection to extant knowledge rather than a top-down interpretation along a broad theoretical framework. As discussed in Chapter 4, theory forms a lens for interpretation, but at the same time it should not form a blinder. In interpreting the data, I hope to connect new findings with existing empirical and theoretical understandings.

9.2 Methods

To demonstrate the validity of students’ ratings of their classroom environment and answer the question “Are students’ ratings of supportive structure recognizable to outside observers?”, the same external raters/observers employed in Chapter 8 were asked to independently describe and rank classes for perceived support. Class videos were observed, analyzed, and described to catalogue autonomy-supporting or thwarting behaviors (Reeve & Jang, 2006). Qualitative and quantitative analyses were conducted double-blind in order to
prevent unintentional bias; I was not present during the rating, and the observers did not have access to the quantitative data until after the completion of the observations.

Unlike the ratings in Chapter 8, raters did not assess supportive structure over time, as theory indicated that instructional quality would not change to any measurable degree. This creates a problem where numerous classes might have similar ratings, thus leading to a lack of correlation between student and observer rankings. In order to avoid this problem, raters were asked to rank classes from highest to lowest perceived instructional support from the teacher. This was explained minimally in terms of what raters believed constituted good instruction. Students’ ratings were then averaged by class and classes were arranged from lowest to highest and compared with the other rater’s rankings. Students’ average ratings and rankings were calculated after the observations were completed in order to prevent accidental bias or influence from the survey data.

As mentioned previously, during this first round of rating and observation, the external raters were allowed to make relatively naïve assessments in order to best simulate the type of observations made by untrained teachers, parents, and supervisors, and so were not given instruments such as the CLASS instrument in order to prevent them from searching for these class features on their first observation. As many of the items in the CLASS roughly correspond with indicators from the supportive structure instrument validated in Chapter 6, I elected not to take any steps which might unintentionally bias raters’ independent agreement.

As discussed in Chapter 4, this investigation is embedded within the work completed in Chapter 8. As such, the same schools, classes, and teachers participated. School 1 conducted classes in students’ main classroom, while all other schools made use of a room designated for English classes. All schools employed an ALT who was primarily responsible
for executing class plans, planned in conjunction with the HRTs and JTEs. Schools 3, 4, and 7 employed a JTE, while 1, 2, 5, and 6 did not have a trained specialist on staff. School 2 was the first in the town to adopt English activities, beginning in 2006, while others began later in 2008. Several of the other schools often followed teaching plans or materials created by School 2, adapting and updating them to match the Course of Study after 2011.

Observers were education undergraduates who had completed third-year teaching practicum, passed the teachers’ employment examination, and were preparing to begin work as primary educators in April, 2014. Observers first watched all the relevant videos and ranked them from highest to lowest in terms of their perceptions of how classes were structured. Raters were not informed of the items used in the surveys or the research aims, but told to rank the classes from what they perceived to be the most organized and effective instruction. Inter-Rater agreement, as well as agreement with the rating instruments’ rankings, was assessed using Cohen’s Kappa statistic and Spearmans’ rank order correlation, calculated in Stata 13.

In order to answer the research questions “What features of activities, teacher attitudes, lesson organization, behavioral management, and physical classroom settings differ in high and low engagement classes?” and “What additional unmeasured or unmeasurable specific instructional features may be salient to learning in foreign language classes?”, raters re-watched and discussed videos, interpreting teacher behaviors by describing autonomy-supporting and thwarting behaviors, and reached mutual agreement on practices that were believed to influence students’ behavioral and emotional engagement. After individually ranking the videos and comparing them with the survey data, raters received training regarding the principles of self-determination theory, classroom practice (Good & Brophy, 2008), language education (Guilloteaux & Dörnyei, 2008), and the CLASS
observation framework (Pianta & Hamre, 2009). It should be noted that the research assistants had observed each class at least three times during this process, and so had become familiar with these classes.

Coding of the classroom elements was organized around the schemes set about in the CLASS framework (Pianta & Hamre, 2009), with coding attached to specific behaviors indicated as emotional, organizational, and instructional supports which appeared to increase students’ engagement. During the observation process, each rater had veto power with regard to individual observed factors; either observer who disagreed with the validity of a specific phenomena discussed could have it removed as a theorized factor. Observers’ conclusions were then examined in the context of the differences in quantitative ratings. Potential connections between the instruments and behaviors were extracted, logged, and recorded.

As the principle investigator, I moderated all discussions, but was not directly involved in the coding scheme beyond arbitration. My role as moderator rather than a primary analyst stemmed from the fact that I had planned and gathered all the data. I had developed personal relationships with many of the teachers and students, and felt that this might interfere with my judgment. In order to avoid potential contamination of the data, I chose to allow the raters to stay on as observers. Based on the fact that these two undergraduates had developed a good understanding of these classes through observation, I allowed them to lead the coding and documentation while I managed the data, connected codes, and assisted with the interpretation.

Thus establishing grounds for selection, rankings where both students and observers agreed best were used as the basis for selecting classes to investigate further in order to demonstrate practices that teachers may use to more effectively engage in using a foreign language and thereby motivate students to learn English. In the previous
chapter, quantitative differences in classes’ motivation were analyzed by both multivariate and univariate analyses of variance (MANOVA / ANOVA) in order to investigate changes in motivation over time. This model, however, also showed that different classes’ motivational orientations differed and also changed over the course of the school year. Classes with the largest changes in motivation over time were also considered as targets for observation in order to see what classroom practices may have influenced the development or reduction of autonomous motivation.

9.3 Results

Both raters’ combined agreement with the actual data (ranked from highest to lowest average student ratings for structure) was calculated using Cohen’s kappa, .4667, p < .000. While this is considered only moderate agreement (Landis, 1977), each of the 16 categorical ranks may be considered a separate category. As Cohen’s kappa is further sometimes considered an overly conservative test (Strijbos, Martens, Prins, & Jochems, 2006), further tests were also used to balance this result. Recognizing this, Spearman’s rank order correlation was also calculated, showing a high degree of agreement between raters, $r_{RATERS} = .98$, $p < .001$, and similar agreement between the individual raters and the actual data, $r_{RATER1-ACTUAL} = .74$, $p = .001$; $r_{RATER2-ACTUAL} = .73$, $p = .001$. Table 9.2 displays the raters’ rankings of classroom structure compared to the actual results. Inspection of the data confirms that there is significant agreement, though there are also differences in perception regarding how classes are perceived.

The observers then closely watched, documented, and described each class, and then discussed their findings to better explain how classes enabled or thwarted the development of motivation. The features of the highest and lowest structured classes are presented in the following section according to the categorization of emotional, instructional, and
organizational features, in line with the CLASS observation framework. On top of this, indicators were added to this framework for linguistic features. Each categorization is broken down into supportive and thwarting behaviors, in line with SDT’s cognitive evaluation theory (see Chapter 2), and based on the behaviors found in top and bottom rated classes.

<table>
<thead>
<tr>
<th>School</th>
<th>Class</th>
<th>Mean Score</th>
<th>Actual Rank</th>
<th>Rater 1 Rank</th>
<th>Rater 2 Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>A</td>
<td>4.04</td>
<td>9</td>
<td>9</td>
<td>9</td>
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<tr>
<td></td>
<td>B</td>
<td>3.73</td>
<td>14</td>
<td>15</td>
<td>15</td>
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<tr>
<td></td>
<td>C</td>
<td>3.68</td>
<td>15</td>
<td>14</td>
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<tr>
<td></td>
<td>D</td>
<td>3.65</td>
<td>16</td>
<td>16</td>
<td>16</td>
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<tr>
<td></td>
<td>E</td>
<td>4.44</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>2</td>
<td>F</td>
<td>4.04</td>
<td>10</td>
<td>2</td>
<td>3</td>
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<tr>
<td></td>
<td>G</td>
<td>4.1</td>
<td>8</td>
<td>3</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td>H</td>
<td>3.81</td>
<td>13</td>
<td>13</td>
<td>11</td>
</tr>
<tr>
<td>3</td>
<td>I</td>
<td>3.94</td>
<td>11</td>
<td>11</td>
<td>12</td>
</tr>
<tr>
<td></td>
<td>J</td>
<td>3.81</td>
<td>12</td>
<td>12</td>
<td>13</td>
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<tr>
<td>4</td>
<td>K</td>
<td>4.42</td>
<td>2</td>
<td>10</td>
<td>10</td>
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<tr>
<td></td>
<td>L</td>
<td>4.31</td>
<td>3</td>
<td>8</td>
<td>8</td>
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<tr>
<td>5</td>
<td>M</td>
<td>4.24</td>
<td>5</td>
<td>5</td>
<td>4</td>
</tr>
<tr>
<td>6</td>
<td>N</td>
<td>4.29</td>
<td>4</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>7</td>
<td>O</td>
<td>4.23</td>
<td>6</td>
<td>6</td>
<td>6</td>
</tr>
<tr>
<td></td>
<td>P</td>
<td>4.11</td>
<td>7</td>
<td>7</td>
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</tr>
</tbody>
</table>

The results of this research were not focused on describing a series of classroom activities which promote engagement and motivation. As any teacher knows, any single activity may be perceived as fun and engaging to one class and boring and tried to another. Instead of specific games and tasks, I will focus on the underlying approaches to the variety of activities teachers may use. Similar to motivational strategies (Sugita McEown & Takeuchi, 2012), these instructional practices may allow teachers to develop specific ideas for how to organize their classroom instruction; the difference between these practices and motivational strategies is that the former are not solely for motivational purposes. Engaging students in foreign language classwork is not solely a matter of motivational and emotional
features, but also instruction, organization, and language factors. The lack or opposite of each of the features may also be considered a hindrance to effectively engaging students.

In presenting the findings, I have opted to give an overview of the concepts and their descriptors, with examples of the practices observed in the following section. As several of the extracts were found to contain more than one key point, I deemed it most efficient to show each interaction while pointing out the specific features that the scene portrays rather than find a single event for each supportive and thwarting feature. Indeed, some scenes contain both a supportive and thwarting behavior. This further indicates how engaging classroom practices are not summative as might be checked off in an index of strategies, but rather qualitative requiring description and careful consideration in order to make inferences about their combined effects.

9.3.1 Emotional Supports

9.3.1.1 Predictable Interactive Routines
As discussed in Chapter 5, in many of the top classes activities followed a predictable routine. Students had repeated these types of activities many times, and they had in many cases become second nature. Students knew exactly how to respond, and could call upon their existing linguistic resources to appropriately complete activities. The classification of these routines as ‘emotional’ stems from the student’s statement in Chapter 5 where she claimed she felt secure in classes where teachers did similar routines each time.

However, a crucial element not previously documented is that the most successful routines were not simply rote production. Indeed, many classes had a series of predictable routines. However, the highest rated classes used real, rather than automatic, interaction and responses to teacher led prompts. In Class E, physical response activities (“Point to the
window, point to the door, touch your shoulders”) were executed in a fashion that required students to pay attention, either by adding new words or purposefully mismatching teacher gestures and instructions. By forcing students to carefully listen to the English used, this teacher made the contents of this routine interesting and challenging, but not difficult or strenuous.

Routine warm-up questions in several classes were more likely to require students to think and communicate rather than reproduce a set phrase. In class K, the teacher would ask questions such as “What time did you go to bed last night?” and “What is for lunch today?” replacing more staid questions such as “What time is it now?” and “How are you?” or “Who is hungry?” While the difference is subtle, it is quite noticeable. Rather than the standard choral responses, students had to think about their answers. In many ways, the details of this difference may be thought of as instructional and linguistic as well as emotional, indicating how interrelated features of successful classes may be; by using routines to present and produce student responses, teachers were supporting students emotionally while providing new linguistic input.

Routines were similarly featured in classes considered low in supportive structure, though these routines lacked the interactive aspects. These generally choral repetition routines involved little input from students, and were sometimes even forcibly passive in their implementation; students were often told to sit still and watch or listen during these routines. In class B, the ALT who led the class would use a two-stage vocabulary presentation where students first listened and watched the teacher present the vocabulary cards, followed by listen and repeat. Students in these classes notably diminished their engagement and increased their off-task behaviors, such as fidgeting or looking out the windows. Though clearly a routine intended to support students’ recognition, the extra step of watching silently
appeared to diminish students’ activity. Conversely, this same ALT in class A did not use this two-stage presentation, and was rated noticeably higher by both the students and the external raters. While this single factor is likely not the sole causal influence on students’ engagement and positive perceptions of the classroom, it helps to illustrate how routines are not in and of themselves positive, but rather meaningful routines are likely to build both a sense of competence as well as draw student interest.

9.3.1.2 Homeroom Teacher Involvement

In most of the top quartile classes, homeroom teachers played a large role in students’ and observers perceptions of structured teaching. As indicated in Chapter 7, greater opportunities for interaction with the homeroom teacher in English, as well as greater leadership from homeroom teachers, is associated with increased student engagement. These observations confirm this previous finding, as the top rated classes were also classes where HRTs stood at the front of class and shared teaching responsibility with ALTs had a different atmosphere to those where the teacher stood at the back. As would be hypothesized based on social cognitive theory (Bandura, 1986) and the theory of overimitation (Lyons, Young, & Keil, 2007), students’ recognize and react to teachers’ engagement in class. This feature is notable in classes A, E, K, L, and M, where the homeroom teacher was constantly in the room and involved in the classroom. This feature is notable in its consistency, as none of the classes rated at the top by both external observers and students had passive homeroom teachers. Class A is especially noteworthy, as the same ALT leading this class in was rated significantly lower in classes B and C. The most notable difference in these classes was the degree of involvement on the part of the homeroom teacher.

The opposite side of this represents an emotional hindrance. The lowest rated classes were those where the homeroom teacher was not even in the room or did not play any part in
the foreign language learning process. As described in Chapter 5 and indicated in Chapter 7, this behavior was a clear feature of classes in this later sample as well. In agreement with the social cognitive vicarious learning/imitation theories (see Chapter 2), HRTs who avoid foreign language classes or “other” the foreign language serve as models for this behavior for their students, who may unconsciously internalize this way of acting. Japanese teachers in these classes often occupied the role of translator or interpreter (see also Aline & Hosoda, 2006). This may lead to lower in-class engagement, associated with lower product motivation. This pattern is noticeably evident in Classes B, C, D, H, I, and J.

9.3.1.3 Correct Individual Address

Indirectly connected to homeroom teachers’ involvement in class is the ability of the teacher to correctly address students by name within activities. This is facilitated by the involvement of the homeroom teacher, but may also be aided by the use of name tags. At all of the participating schools, ALTs taught every language class in the school, though some were only at each school for one to two days each week. As such, in these classes, name tags were often a necessity. In Classes E, F, and G, rated highest by the outside observers, the ALT was able to address each individual student through the strategic use of these name tags, as well as the aid of the homeroom teacher in ensuring that these name tags were visible. By consistently addressing individual students by name, for the purpose of both teacher-student interaction as well as behavioral reminders (e.g., “Sakura, Taro, please stop talking,” etc.), I surmise that students felt more connected with their teachers. Through the theory of Confucian hierarchical social dynamics (outlined in Chapters 2 and 3 and investigated in Chapter 6), this personal connection would give greater legitimacy to the teacher’s authority.

The opposite side of correctly addressing students by name not only included problems where students were not called by name, but also where students’ names were
mispronounced by ALTs. In many classes, students wore name tags written in the Romaji, or the “Roman characters” writing system. This system is problematic for many native English speakers, as the syllable つ/ツ, pronounced [tsu] is often written “tu,” which would be pronounced [tu], and し/シ, pronounced [ei] (nearly identical to [i]) is written “si,” normally pronounced [si] or [si:]. Other issues with the Westernization of Japanese characters are also common. Following this, a name might be written “Yositugu,” properly [joɕi tsɯgu] might become [jo si tu gu] (note the trend where unrounded vowels are also rounded). These mispronunciations disappeared in classes where name tags were written using the more accurate Westernized spelling “Yoshitsugu.”

Errors of pronunciation had the unfortunate effect of causing breakdowns in communication. While the difference between classes with correct address is subtle, it was noticeable in the emotional atmosphere of each class. In the classes where name tags were written in the above mentioned Romaji and name mispronunciations common, students showed less interest in interacting with their foreign teachers. While these were classes rated relatively positively by students, such as classes O and P, they were not necessarily in the top quartile on either measure. This would indicate that while other aspects of the class may have been positive, the lack of a real relationship with the foreign teacher may have a negative effect on students’ perceptions of the classroom environment (Furrer & Skinner, 2003).

9.3.1.4 Warm/strict – Permissive – Condescending – Angry

In the emotional support category, discussions among the observers revealed that strict but calm teachers were thought to be the best, somewhat permissive but friendly teachers were in the middle, largely condescending teachers who talked down to students were at the lower end, and teachers with an angry or domineering style were seen in the most negative light. As
students had no access to lessons by other teachers, this feature was based solely on the observations of the research assistants, who had seen all of the classes several times. Lesson styles could be classified in one of these four categories, which matched the quartiles created by the observers rankings. No single event truly illustrates the atmosphere in any single class, as it is largely a function of the mood of the teacher and students, though we may catch glimpses of it in the teachers’ method of interaction.

Warm/strict teachers (Lemov, 2010) were very well organized and had every moment of the class prepared, but were friendly and approachable to the students. They did not let students get off task for long, and had a clear idea of how to manage behavior and misbehavior. Classes E, F, G, M, and N were largely run in this style. While these teachers were very personable, they also allowed very little room for off-task behavior or low-engaged students.

The next group of classes were those that allowed a significant degree of off-task behavior, but were largely pleasant and positive. These classes, including O, P, K, and L, gave students a great deal of freedom to interact with one another, though much of this interaction was often not in the target language or organized around the classroom activities. At the same time, teachers were not bothered by this, and did not waste time chiding students for talking about other things during free practice activities. One point to note is that while off-task behavior occurred in these classes, classes were less chaotic than in some previous studies (Oga-Baldwin, 2012), or even than in classes where teachers displayed a negative affect.

The third group involved a series of classes where teachers were able to manage behavior, but much of the interaction was one-way only. Much in the same fashion as the rote routines, teachers in these classes did not appear interested in students’ ideas and provided
little interaction with individual students beyond pre-set conversations. Classes A, H, I, and J showed this pattern. While being generally well organized in much the same fashion as other strict teachers, they lacked the warmth that the first group of teachers shared exhibited students.

The observers both noted that the lowest classes had a “negative atmosphere” at times and teachers “seemed upset.” Research in other spheres has similarly indicated that negativity from authorities may have an adverse effect on well-being (Wang & Kenny, 2014). In these classes, rather than being strict and trying to get students on task, teachers seemed disappointed or upset by misbehavior. Classes B, C, and D were most notable in this, partially because the teachers here did not show this attitude in other classes. This may potentially indicate numerous factors still invisible to the observers and myself. While the underlying cause remains unknown beyond speculation, one potential reason comes from the previously found reciprocal relationship between students’ prior engagement and teachers’ approach to instruction (Skinner & Belmont, 1993; Skinner et al., 2008). If the teachers in these classes believed students to be disinterested or likely to go off task, they might begin to adopt a more controlling interaction style (Reeve, 2009).

Of all of the emotional features of lessons, this atmosphere appears to be one of the most salient to both students and observers, but also the most difficult to describe or quantify. In looking at the classroom environment the teacher creates, this emotional feature is likely to be a strong one, but also overlaps with many of the other instructional, organizational, and linguistic features.


9.3.2 Instructional Support

9.3.2.1 Signals for Meaning

Along with language signals for own language support as described in Chapter 5, the top classes included methods for signaling the meaning of instructions. By accompanying classroom instructions with gestures and demonstrations, teachers in these classes gave students support for comprehending the English used in class. The use of context, gestures, and other visual aids appear to buttress students’ understanding and allow them to spend more time in the new language.

Likewise, in some classes signals were either weak, irregular, or absent. These classes showed a greater need for Japanese usage on the part of the HRT or JTE. While this allowed greater involvement on the part of the Japanese teachers, it is questionable from a modeling standpoint, as it may indicate a weaker commitment on the part of the Japanese teacher. All of the lessons observed were team-taught lessons, and thus the English was largely produced by the ALT. When ALTs or JTEs failed to use demonstration and signals to help scaffold meaning, students were often confused and hesitant, and lessons were not able to proceed at the faster pace indicated in to be helpful in Chapter 5. This was most notable in Classes H, I, and J, where the teachers’ explanations often lacked visual support, or the visual support was not consistent.

9.3.2.2 Gaming Toward a Goal vs. Game upon Game

Games were an important part of these lessons. By framing activities as game or game-like, teachers were often able to satisfy students’ needs and draw interest. However, the key to these activities appears to be the idea that the games and activities lead to an end result, not that they are simply games for their own sake. In many of the classes, students were given the goal of the lesson, and each game was chosen to carefully teach a new point, moving from
more to less teacher support. Classes E, F, and G especially followed this pattern, starting with a listen and repeat pattern solely for new words, but gradually pushing students to respond entirely on their own, all through the use of different games. In these classes, review was never done in the form of passive listen and repeat, but was actively drawn out through active use.

Much has been discussed regarding the importance of involving and engaging students through an enjoyable classroom atmosphere. While this was certainly a feature of some classes, not every highly supportive, high engagement class included a so-called “joy factor” (Lemov, 2010) as part of the class. Indeed, a number of the classes rated toward the bottom for structure (notably classes C, D, and H) were classes with numerous games and activities. Many commentators on English activities (e.g., Naoyama, 2011) continuously stress the idea of fun as necessary and sufficient for foreign language activities. The Course of Study itself points out that students should experience the “joy of communication” (MEXT, 2008a). Most of the resources for foreign language classes discuss games as a primary method for delivery. The key feature here is that the games were not themselves used to drive engagement, but rather that the teacher could draw it out through his or her scaffolding, providing ample support for students’ sense of competence, relatedness, and autonomy. This could in many ways be seen as the combination of activities which are enjoyable with those which are meaningful, challenging, or personally valuable (Brophy, 2004; Nakata, 2006).

Conversely, in other classes games simply appeared to be piled on one another, either without a clear goal in mind or with the idea that simply doing a game would actively engage students in learning. While the majority of teachers did make a clear effort to instruct using games, not all the games were clearly designed to educate. Some games even appeared
redundant, as they simply repeated the same type of activity. In one series of classes, students played the keyword game, where students race against a partner to grab their eraser in response to the teacher’s call, followed by karuta, where students grab selected cards called out by the teacher. Other classes used similar activities of a single modality, often redundant or teacher-centered response activities. This pattern was seen in classes ranked in the lower half by both observers and students, specifically A, B, C, D, H, I, and J. The teachers appear to have interpreted these activities as games with the intent that they would be enjoyable, though this seems not to have been the case in all scenarios.

Further, if the games themselves appeared to be solely for the purpose of enjoyment, students seemed likely to make an active choice about their degree of engagement. When there was an activity they enjoyed, they were wholeheartedly involved. Then, when the task is not immediately perceived as “fun,” some students completely reversed their behavior and disengaged. Recognizing that not every class activity is necessarily fun (Brophy, 2004), overemphasis on this aspect may ultimately take away from the goal of learning. As discussed by Lepper and Cordova (1992), the energy needed to enjoy the game and to learn from it should match as much as possible.

The fact that games were a primary factor in classes rated at the top and bottom for structure and engagement indicates that games or game-like activities may be necessary but not sufficient for promoting engagement in elementary foreign language classes. Previous Chapters showed that emotional, cognitive, and behavioral engagement were all closely linked, and thus games that do not engage students in all three aspects are not likely to build positive long-term motivation, a result we also see from Chapter 8. Classes E, K, M, N, and P all moved from more externally regulated motivation to a more internal sense. These classes featured games that were both meaningful and enjoyable. A similar perception of
games without direction and support through other means is unlikely to improve motivation. Classes C, H, and J showed decreases in intrinsic and increases in extrinsic regulations, and were likewise more prone to games that did not always build to a meaningful communicative purpose.

9.3.2.3 Balance of Activities

As noted above, multiple modalities for scaffolding language were helpful in promoting student understanding. In order to provide these modalities, the most successful teachers also provided a balance of different types of activities. Learners who received the language through a listen and repeat, a chant, a song, a dance, and a game were much more successful, as well as showing a greater sense of enjoyment in the lesson. Students may have benefitted in the classes where teachers mixed and matched ways of presenting new vocabulary and expressions through the use of both interactive physical games (Tomlinson & Masuhara, 2009) and songs (Schön et al., 2008).

Using only listen and repeat activities to present the new language phrases and vocabulary before playing games seemed to leave some students uncertain or unable to perform the key tasks. As with the gaming toward a goal feature, this balance of activities allowed students to enjoyably use the language in multiple fashions. Likewise, game upon game classes often used the same repetition of modalities This consisted of often passive recognition only, and did not require students to use the material on their own to a sufficient degree. By presenting activities in multiple ways, teachers were more likely to allow students to experience them in their preferred modality, be that physical movement, visual processing, auditory stimulation, or other. While the modalities do not change the basic information that needs to be learned or reduce any cognitive burdens on the processing of the information (Willingham, 2009), they do provide added exposure without rote and monotonous repetition.
or passive reception.

The *balance of activities* feature of classes had a secondary organizational effect, in that it pushed teachers to shorten activities, use more tight transitions, individual chances, and address students individually. Recognizing that students were likely to engage with the language more deeply both by repeating it and encountering it in multiple fashions, teachers in these classes were able to more appropriately scaffold language learning, as well as maintain students’ energy levels. By regularly changing from a chant to a game to a song to a physical activity, students were exposed to the new language in multiple ways. As a further benefit, students were also less likely to tire of any single type of activity due to the variation and modulation provided by these changes.

### 9.3.3 Organizational Support

Organizational support features cover how the lesson proceeds and how teachers organize interactions with students on a long-term basis. As with the emotional support features, many of these supporting and thwarting behaviors do not lend themselves well to specific examples. The two main features, *tight transitions* and *keep it short*, relate back to the pacing of the class, and are thus relatively difficult to show in a single classroom incident. At the same time, they are clearly important to the discussion of how teachers support students’ engagement.

#### 9.3.3.1 Tight Transitions vs. Long Wait Times / Unnecessary Stops

In the sampled classes, those with the most positive ratings had very little waiting or technical problems. As discussed in Chapter 5, the idea of *tight transitions*, where classes move forward at a brisk and purposeful pace, was reflected in both the survey instruments created (“The pace of the class was appropriate”) as well as observer discussions of
classroom elements. Teachers in classes E, F, and G especially kept their classes moving with a series of activities that maintained energy and interest in the material. As noted in Chapter 5, teachers working as a team effectively maintained the pace of classes, a practice facilitated by the involvement of the HRT.

On the opposite side, the classes at the low end all included some sort of waiting period, be it for a computer to load, cards to be readied, or the teacher to organize papers. Even a few seconds time where students had nothing to do and were waiting for instruction or prompts had the effect of drawing students off task. Additionally, teachers might transition very slowly from one task to another, and thus diminish the energy built up in one task when moving to the next by simply taking too long or talking too much in the transition.

The worst form of this disruption in pace appeared to be when teachers fully stopped an activity midway for some behavioral correction. These issues of behavior ranged from students acting out off task, to teachers being dissatisfied with students’ energy and enthusiasm for a task. Classes in this instance came to a grinding halt. As discussed previously, more controlling or negatively framed classes were likely to lead to poor ratings by students as well as outside observers.

9.3.3.2 Keep it Short vs. Overextension

Related to tight transitions, many teachers were able to keep students on task using very short activities. By using activities that took less than 5 minutes to complete, teachers were able to maintain interest in the activity. Classes E, F, and G especially followed this pattern, which was related to the use of tight transitions. Students were given opportunities complete free interaction tasks, but were not given excess time in which to complete these activities. Not all activities were carried out until their final completion, quickly moving from one to the next,
while at the same time moving at a pace where students could readily follow and comprehend.

On the contrary, activities which were focused entirely on completion showed a tendency toward a decrease in activity and energy. Even enjoyable activities are likely to become boring or tiresome if carried on for too long. Similar to the idea of game upon game, the game-like features of activities lose their value and effectiveness when the fun is lost, and the effect appears to persist. Both observers noted that after overextended activities, students appeared to have diminished engagement, a trend noted in their quantitative ratings as well. Especially in Classes B, D, H, I and J, the raters noted a drop in activity and an increase in off-task behaviors not only during but also after activities which went on for too long. Interestingly, classes taught by the same teachers did not all feature this same overextension. Classes A and C were taught by the same ALT as B and D, but did not have the same overextended activities, and were perceived as slightly more structured.

9.3.4 Linguistic Supports

9.3.4.1 Appropriate Own Language Support vs. English “Paint Job”

Also noted from Chapter 5, own language support clearly offers students a mechanism for confirmation, clarification, and confidence. In many ways, judicious OL support provides students with competence support. The crucial element is that the use of the OL is both minimal, signaled (as in Chapter 5), and used in a controlled fashion. As teachers’ approaches enabling this feature have been described and explored elsewhere in this thesis, they will not be drawn out further than to note that the top classes used these strategies to maintain an atmosphere where English is used as a tool to share meaning and impart understanding.

In many classes, the English presented was not a structural feature of the class.
Students were not generally required to comprehend it. In the bottom quartile of classes, there was a distinct sense that the English used in class was not for communicative purposes, but rather something added to the surface to make the class appear like an English lesson. In some classes, the primary language used in class may have even been English, but many of the games and activities required little comprehension or use of English beyond repetition. In others, the class may have had English instruction, but translation was given directly following the English explanation of activities. Activities themselves were meant to be conducted in English, but much of the scaffolding and preparation was not handled using English. These classes had the benefit of clear instruction, but lost opportunities to scaffold students’ understanding of the language using the previously mentioned multiple modalities.

9.3.4.2 Repetition, Demonstration, and Simplification

The classes rated highest by both students and observers included a high degree of repetition, demonstration, and simplification in order to support students’ comprehension. Much in the framework of “comprehensible input” and scaffolding students to comprehend spoken language, the most effective teachers did not rely on words alone to communicate (Nation & Newton, 2009). Similar to points discussed in the balance of activities, signals for meaning, and own language support features, these teachers used multiple modalities and forms of expression to help scaffold students’ understanding of the new language. By using only simple language and avoiding

Conversely, in classes in the bottom quartile English was not often repeated as a part of interaction or modeling. Teachers would often make statements without repeating, restating, or demonstrating them to help students comprehend. Much as in the English “paint job” feature described above, teachers would often refer students to homeroom teachers’ translations without repeating or attempting to clarify instructions or explanations.
In many classes where English was not presented in a comprehensible fashion, the effect appeared as a loss of confidence. Students felt less capable without a high degree of repetition and simplification, evidenced by a lower overall sense of need satisfaction in classes H, I, and J. This is likely due to the fact that multiple repetitions allow students individually to grasp the meaning of a phrase, rather than undermining their confidence by quickly translating the new language. This finding supports cognitive evaluation theory (see Chapter 2), where thwarting students’ sense of competence and ability to achieve reduces their sense of need satisfaction and thus motivation.

**9.3.5 Exemplary Incidents**

In order to illustrate the key points above, I have selected 4 class extracts showing how many of the ideas work in concert to create a positive classroom effect. From the first classroom extract, teachers work as a team to scaffold students’ first exposure to language, confirm understanding in Japanese without using Japanese, and allow students to build comprehension through repetition and demonstration.

*Extract 9.1, Class E:*

ALT: Let's put it into Japanese. So what’s “food” in Japanese?
HRT: [Student 1 name].
Student 1: *Donna furuutsu ga suki desu ka?* (What fruit do you like?)
Student 2: *Chigau.* (Wrong.)
ALT: Food. ::points to numerous food pictures::
HRT: In Japanese, food.
Student 1: Food?
ALT: Yes.
Student 1: *Tabemono. Donna tabemono ga suki desu ka?* (Food. What food do you like?)

HRT: [Student 3 name], Stand up.

ALT: OK. Fruit in Japanese.

HRT: Fruit.

Student 3: Kudamono ne. (Fruit, right?)

This excerpt shows both the JTE and the HRT teaching together, scaffolding English through the support of Japanese. Both teachers are actively involved, the ALT models the language, and the HRT does not use Japanese, but helps provide extra English input. The input from the teacher is minimal; the ALT states and repeats the question, followed by the HRT who repeats the key word. Teachers also directly address the students, and help them to achieve the correct answer through this repetition. When the student makes a mistake, the teachers also do not correct the mistake or tell the answer, but wait until the student is able to comprehend, while providing support with gestures and other non-verbal signals. Finally, the students’ comprehension is checked through the use of their own language, but this translation is not overemphasized.

In Class K, we see the ALT demonstrate each action and tie his instruction to a physical representation of the language, the teachers coordinating as a team, and judicious use of students’ own language to facilitate the activity.

Extract 9.2, Class K:

ALT: OK so, take your “Hi Friends [textbook]” and pencil case to the back.

::Demonstrates taking books and pencils to back of the room. Students imitate. JTE writes numbers 1-5 on board::

ALT: O.K. So, next, we’re going to play alphabet game.

HRT: Alphabet game.

ALT: O.K? So, we are going to form one, two, three, four, five groups.

::Counts off 5 on fingers, gestures with 5 spread fingers to students::
Five groups.

::Turns to JTE::

Explain the game in Japanese, right?

JTE: You explain first?

ALT: All right. OK so, where is group 1? Group 1?

::Counts students. JTE and HRT help students make groups::

One, two, three, four. Make a circle. Sit down.

::Gestures in a circle::

Group 2.

Make a circle and sit down. Group 3, 4 and 5. And sit down, please.

This card goes from A to Z.

::Holds up cards, pauses to show to students::

First, shuffle.

::Shuffles cards::

Shuffle, shuffle.

::Puts down cards and spreads them::

Then arrange them on the floor. Then I want to count. Arrange from A to Z. A to Z, in the group. A, B, C, D… OK? A to Z.

::Taps alphabet cards on the board. HRT holds up cards::

The first group to finish, stand up. OK? I will check time.

::Shows stopwatch::

HRT: Minna san wakatta? (Did everyone understand?)

Students: Wakatta. OK. (We understand. OK.)

ALT: Three, two, one, start.

::ALT starts stopwatch. Students arrange cards. ALT, JTE, and HRT walk around. After a minute, one group stands up::

Student group: Finish!

JTE: What group is this?

Students: Four.

JTE. OK. Thank you, sit down.

ALT: ::Taps stopwatch:: 58 seconds!

HRT: Fifty-eight!

::Writes “58” next to Group 4 on the blackboard::

This section especially displays the teamwork that the teachers use, illustrating how the
HRT’s involvement in class may help to move activities along. Though the HRT does not speak much further than to repeat what the ALT said, his active presence is a model for the students. While the JTE has the opportunity to translate, she does not before the English explanation, and then does not translate once it was clear that students had sufficiently understood the English explanation. The JTE and HRT are also instrumental in organizing the groups, preparing the blackboard, and watching for when students had finished the timed activities. By dispersing the roles, maximizing the teacher resources and helping students to complete the tasks as smoothly and efficiently as possible, these teachers engage students on emotional, cognitive, and behavioral levels, as evidenced by students’ high self-report on the engagement scales (see Table 8.3).

The next extract shows the necessity of appropriately addressing students to prevent confusion. As discussed above, non-Japanese teachers need to be able to read students’ name tags appropriately in order to address students as individuals.

**Extract 9.3, Class P:**

<table>
<thead>
<tr>
<th>ALT:</th>
<th>Only English, but you can ask [JTE] what's the English words. ::to JTE:: If you don't know you can ask me, eh?</th>
</tr>
</thead>
<tbody>
<tr>
<td>JTE:</td>
<td><em>Kihon wa eigo de kotaemashou. Doushitemo wakaran no wa watashi ni kiite.</em> (Basically, answer in English. If you don’t know, please ask me).</td>
</tr>
<tr>
<td>ALT:</td>
<td>Ready? Team 1, your turn. Ready, go! ::Holds up picture:: Ten, nine, eight, seven, six, five, four, three, two, one. ::Reads Student 1’s name tag reading “Tatuma”: Tatuma [tæ tu: ma]? you want to choose?</td>
</tr>
<tr>
<td>Student 1:</td>
<td>::Confused, points to self with questioning look at JTE::</td>
</tr>
<tr>
<td>JTE:</td>
<td>::Nods::</td>
</tr>
<tr>
<td>Student 1:</td>
<td><em>Kotae wo itte?</em> (I say the answer?)</td>
</tr>
<tr>
<td>JTE:</td>
<td>::Nods:: It’s a…</td>
</tr>
<tr>
<td>Student 1:</td>
<td>Carpet?</td>
</tr>
</tbody>
</table>

2 These names have been altered to protect minors’ privacy. To illustrate the mispronunciation, an alternate similar name with the same key character has been substituted.
This episode illustrates how failure to address students by their correct given names may lead to hesitation. The more comprehensible spelling of these names would have been “Tatsuma” and “Izumi.” While these students attempt to answer the ALT’s question, the need for the JTE to confirm who is supposed to answer is a clear failure of communication which appears to stem from the problems with the way names are expressed on students’ name tags. In spite of the fact that this class was perceived as engaged and well-structured according to students and observers, this hesitancy indicates points where the class could be improved through a combination of a more accurate use of western characters on the name tags and improved training for non-Japanese teachers.

Finally, Extract 9.4 illustrates the importance of pacing, as well as how lack of comprehensible rephrasing, a controlling attitude, and the two Japanese teachers’ roles primarily as translators rather than co-teachers may have a negative influence on students’ perceptions of the class.

Extract 9.4, Class H

ALT: OK, repeat. “What food do you like?”

Students: “What food do you like?”

::Most students answer audibly, but relatively quietly::

ALT: ::Stopping activity:: Maybe you are sitting down, your voice is not very big, OK? If you stand up you can produce a little louder voice. Please stand up.

HRT: Mou chotto ookina koe wo dasan to iken ne. Tatte ne. (You need to be a bit louder. Stand up.)

::All students stand::
ALT: Can you see here? Can you see this? Can you see? Can you see?

HRT: *Mina miemasu ka ne.* (You can all see, right?)

ALT: Ready, OK, question is: “What food do you like?”

Students: ::Audibly:: What food do you like?

ALT: ::Stopping again:: OK, please speak loudly. Now, OK. Because later, we will divide you into two groups, and one group will ask questions, “What food do you like?” “I like pizza.” “What fruit do you like?” “I like apples.” Question, answer, and then after that teams, question answer. So please, now, when you are practicing together, all together, please speak loudly. OK? Big voice. OK?

Students: OK…

HRT: *Ato de renshuu suru kara ne. Ookina koe yo. Koe.* (We’ll practice this later. Loud voices. Voices.)

JTE: *Ima no setsumei wakaranai hito te wo agerou. Setsumei suru kara. Wakaranai hito te wo agerou.* (Anyone who didn’t understand this explanation raise your hand. I’ll explain again. Raise your hand.)

::Walks around to students with hands up::

ALT: OK? All right. Now repeat, I say both parts, question and answer, repeat, OK?

The task at hand is not particularly difficult, nor does it require the amount of explanation given. This teacher is continuously stopping the class to prompt students to give more effort, attempting to engage them behaviorally without engaging them cognitively or emotionally. Further, by stopping the class for this long explanation, the pace of activities slowed. What could have been a simple presentation that drew students into the next series of games instead focuses on pressuring students into producing loud repetition of the target phrases. According to previous SDT research, the teacher’s attempt to explain the relevance for the activity may indeed be good practice during an uninteresting activity (Jang, 2008), but the lack of comprehensibility of the English and scolding tone seems to have the opposite effect. Confucian hierarchical relations (see Chapter 2) would also indicate that the control here was perceived as not necessarily for the benefit of the student. Combined with the teachers’
subtitling the lecture in Japanese, students have little opportunity to develop a sense of competence in their abilities, feelings of autonomous desire to engage, or a positive relationship with the teacher.

Finally, while not a specific incident, one specific practice did appear to have a positive effect. As mentioned previously, much more salient than “fun” was the idea of a positive and caring relationship between the individual students and the ALT. In classes E, F, G, K, N, and M, the ALT and JTE would greet students individually by name at the door as they entered the classroom while playing a standard opening song.

9.4 Discussion
Based on the inter-rater agreement demonstrated by the moderate agreement but high correlation of the rankings, research question 3) a. *Are students’ ratings of supportive structure recognizable to outside observers?* may be answered positively. While the ranking data was somewhat inaccurate, the high correlations showed external raters agreed with students in their assessment of how teachers’ support students through their instruction. These raters may agree to such a high degree due to their proximity to education in daily life. Students experience instruction on a daily basis and are keenly aware of how instruction may meet or thwart their needs. Likewise, the raters, as teacher trainees, may have a clear picture of their ideals for how to structure and support students. They have the further advantage of having seen all 16 classes; thus in many ways the outside raters’ perspectives may be better representations of the most structured classes. Using their discussions, the above noted qualitative factors were found.

It must be noted here that student engagement and supportive structure, while highly correlated in previous Chapters, are also distinctly recognizable to both raters and students.
Classes rated as most engaged were not the same as those rated to have the highest degree of structure. While in the previous Chapter I inferred a causal relationship between structure and engagement, it must be taken that this causal relationship is likely moderated by numerous other features, many of which are described in this Chapter.

Looking at the other research questions to be addressed in this Chapter, 3) b. *What features of activities, teacher attitudes, lesson organization, behavioral management, and physical classroom settings differ in high and low engagement classes?* and c. *What additional unmeasured or unmeasurable specific instructional features may be salient to learning in foreign language classes?* we see an overlapping series of practices that teachers use to create a positive environment. Effective teachers in this environment interact with their students warmly. They work as a team to facilitate a vigorous pace through sharing of responsibilities. They use English as a structurally integral part of the lesson, and use multiple strategies to make that English easily understood. They give students multiple individual opportunities to practice, and address them correctly as individuals. Finally, they are consistent in their use of these practices, and appear to prepare their classes accordingly.

As in Chapter 6, this research worked from the principle certain universal practices and features undergo some surface level changes for effective localization. As such, I have used the much broader categories of emotional, organizational, instructional, and linguistic supports to organize the results. At the same time, many of the features described here might be considered refinements and explications of Dörnyei and Csizér’s (1998) ‘ten commandments of motivating language learners.’ Some practices, such as the details effectively coordinating and scaffolding activities, appear to fall under appropriate class management, and likely need to be added to the list. However, some practices, addressing students in correct individual manner, or the active involvement and coordination of all
teachers present in the classroom appear somewhat specific to the peculiarities of the Japanese elementary school environment.

From the results, we see several classes consistently mentioned as examples of good practice. Classes such as E, F, G, K, N, and M used the above practices to organize, energize, and instruct their classes. We may take these classes as exemplary for that they contained an ecological balance of factors that allowed them to be instructionally effective. Likewise, the features of classes B, C, D, H, I, and J represent classes with inappropriate structure for building motivation.

In recognizing these classes as models of high and low structure, we may answer the overarching research question of this thesis: “What are the features of high and low structure and engagement classes?” High structure classes had interactive routines and involved homeroom teachers and ALTs who were both warm and strict. Teachers in these classes used a balance of activities, organized games around a final goal, and provided clear signals for the meaning of the English used in class. They used short activities with no waiting time. Finally, they provided comprehensible instruction through simplified English and repetition, using English in as integral part of the class.

Low structure classes consistently used more mechanical and rote instruction, had controlling or angry teachers, and homeroom teachers were sometimes not even in the same room. Their activities involved little sense of clear progress; they were often collections of games centered around the teacher. A single activity might take up a large portion of class, and students might have to wait considerable time during class. Finally, their English was often beyond the range of students’ comprehension without considerable translation, and offered few opportunities for students to independently comprehend the language on their
own through scaffolded signals.

9.5 Conclusions

This Chapter ultimately aimed to expand the research by Reeve and Jang (2006) looking at what teachers do and say to support a sense of autonomy during learning activities. By looking beyond the interactive-dialogic functions towards a greater sense of how activities are scaffolded and meaning is imparted to students, I hope to demonstrate just what made the more positively rated classes different from those at the bottom. More than being upbeat and encouraging, more than using games, more than organization, it appears that a basic sense of meaningfulness in all of the classroom activities is a powerful force in promoting engagement and learning in these classes. The results are broadly contiguous with Dörnyei and Csizér’s (1998) commandments for language learning, providing greater detail for application in team-teaching settings.

Recognizing that motivating instructional practice does not exist in a vacuum outside of the subject matter, these practices show how the ecology of the classroom as tended by the teacher can influence students’ engagement and motivation. As in previous accounts (Dörnyei, 2000; Skinner et al., 2008), the classroom environment and its logical outcomes cannot be ignored; indeed, we must recognize classrooms as situated with not only the subject domains but also the practices of the teachers in order to recognize what constitutes good practice. From the above findings, I hope to show how the classroom environment may have positive effect on students’ engagement and ultimate motivation through effective scaffolding, proper pacing, strong student-teacher relations, and comprehensible communicative use of the foreign language.

At the same time, several caveats must be made about the findings in this Chapter.
One of the base assumptions of this research is that these classes are largely representative of the general language class atmosphere. While classes may indeed differ widely from day to day, week to week, instructors ways of interacting with students and organizing activities seemed to vary little. Based on other observations of these classes, most teachers were fairly consistent in their approaches to instruction. All the same, care must be taken in judging these classes to be perfectly representative, as they may represent relative high or low points for individual students or teachers, and thus may not be static over time. Based on their qualitative nature, the findings may not generalize beyond the situation at hand, though the links with the quantitative data offer some indication of their reliability.

Further, none of the practices here should be taken as categorically positive or singularly sufficient for helping to engage students on their own. In thinking of the classroom environment, it may help to think of it as both organic and mechanical; some of these micro-level interactional and instructional features should be considered as part of a natural ecosystem which overlap with a number of other features, others are more clearly like mechanical parts which may be swapped in and out as needed. As such, these features should be thought of less as strategies and more as features of successful instruction, much in the same way as the “constellation” of factors often discussed by Gardner (1985). Ultimately, it is through good judgment and careful integration that they may be best used to engage students in learning activities. For teachers looking to emulate these practices, careful consideration should be made of how each feature functions as dependent or independent.

This Chapter has documented the practices of high and low structure teachers. Much like the literature on high and low teacher expectations (Rubie-Davies, Hattie, & Hamilton, 2006), results indicate a clear difference between how students perceive teaching for high
engagement. Both students and external observers in these classes recognized the differences in how teachers structures their classes, and the overall trend towards emotionally, organizationally, instructionally, and linguistically supportive classes was clear. Building on the results of the initial qualitative and quantitative investigations, these classes indicate organizational procedures that teachers may use to organize their classes to improve engagement and promote foreign language learning. In the final Chapter, I will summarize the overall picture created by these results, and offer strategies and principles for organizing foreign language classes in Japanese elementary schools.
Chapter 10–Conclusions

The overall goal of this thesis has been to develop a theory of how foreign language teaching may be employed effectively in Japanese elementary schools to build long-term positive affect. While lay theories and practitioner theories abound (e.g., Naoyama, 2011; Oshiro & Naoyama, 2008), these have as of yet not been tested in an empirical fashion. In writing this thesis, I have aimed to give better grounding beyond observation and conjecture to provide an improved set of principles and practices for teachers to use.

Much of this thesis has come at the intersection of theory and practice. By taking from existing educational (e.g., Good & Brophy, 2008), psychological (e.g., Deci & Ryan, 1985), cultural (Chen & Farh, 2011), and second language acquisition (e.g., Macaro, 2005; Noels, 2013) theories, I have tried to synthesize these perspectives to provide a solid foundation for future practice in Japanese foreign language education in elementary schools. At the same time, I have tried to answer theoretical questions, such as the reciprocal influence of existing motivation and the environment on students’ long-term motivation. Through this investigation, I have aimed to provide both teachers and researchers with clear

In this concluding Chapter, I hope to summarize the findings and present them as a coherent narrative, starting with the original observational studies, through the quantitative measurement studies, and finally to find the practices involved in highly engaging classrooms.

10.1 A Summary of the Findings and Implications in each Chapter

In order to summarize the results and effectively demonstrate how the goals of the project were met through the course of this body of research, I will address the findings back to each
of the three overarching research questions identified in Chapter 4.

**10.1.1 Research Question 1: How do teachers structure classes to engage students in foreign language learning?**

Taking the findings from Chapters 5 and 6 we see that well structured foreign language classes are clear, briskly but appropriately paced, and draw students’ interest. Based on the observations in Chapter 5, these classes do not need teachers to revert to students’ own language in order to appropriately manage communication in the new language. By effectively managing and structuring the classroom tasks, teachers may instruct without using students’ own language.

Following the principles found in these classes, I asked students in focus groups to discuss what made their foreign language classes engaging. In these discussions, presented in Chapter 6, study 1, students further confirmed that the pace, clarity, amount of English used, and degree of interest teachers bring to classes are all key factors in scaffolding instruction and building a positive learning environment. While studies in other settings have shown these features as part of autonomy-support and structure, students in Japanese elementary schools found that structure and autonomy-support are so interrelated as to be indistinguishable from one another. Thus, we understand that how students perceive classes, both in terms of the form and quality of the lesson, may facilitate the development of motivation. For teachers, this means that not only the degree of interest and emotional satisfaction, but also the degree of organization and effective management, are crucial parts of engaging and motivating students.

**10.1.2 Research Question 2: How does structure influence students’ motivational needs and in-class engagement?**

As defined by students, supportive structure was found to positively affect engagement, need
satisfaction, and motivation. Chapters 6, 7, and 8 all indicated how students’ perceptions influence feelings of autonomy, relatedness, and supportiveness need satisfaction.

The series of pilot studies presented in Chapter 6 showed how strongly related supportive-structure and basic needs appear to be. By supporting students’ needs through good instruction, teachers were able to create a high sense of engagement and classroom involvement. Further, these features then interact to positively influence students’ motivation at the end of the year.

Chapter 7 further showed the importance of the homeroom teacher in developing a positive pattern of engagement. Comparing a series of classes from one sample in Chapter 6, this Chapter showed that the differences in influence between classes run by homeroom teachers, Japanese specialists English teachers, and non-Japanese assistant language teachers. Stepping out of the main body of the studies from Chapter 6, while maintaining a grounding in the previous work, this study showed some of the basic differences, as well as lack of strong differences, between native and non-native teachers. Overall, teachers were perceived in a very similar fashion, indicating that students did not see noticeable differences in many aspects of instruction from their Japanese and non-Japanese teachers. However, students did notice how much English was used by teachers in class, and appear to consistently adjust their own English use to match that of their homeroom teacher. Thus, the degree of involvement of the HRT must also be considered important for promoting positive long-term motivation.

We thus also see a relatively weak effect of the “foreign-ness” of non-Japanese teachers in the classroom, and may derive from this an idea that while ALTs may be important in numerous ways for the planning and execution of effective classes with a native-
speaking linguistic model, they do not seem to have the oft-supposed effect of prompting students to use the foreign language or to feel its necessity.

While the results demonstrated in Chapter 6 came from sufficiently large samples, the overlap in samples leaves the findings open to questioning. In order to remedy this, as well as test the results in a situated, longitudinal format, the year-long survey of student motivation from Chapter 8 was conducted. Students’ existing motivation at the beginning of the year had the strongest predictive effect on their motivation at the end of the year. Within the model, engagement appears to be the hinge that assists students in developing positive motivation. Further, while teachers appear to recognize engagement to some extent, they do not seem to read students’ self-reported motivation from their actions. We may thus conclude that for teaching in traditional classroom settings, more important than motivating students is engaging their behavior, emotions, and thoughts through effective classroom procedures and activity choices.

**10.1.3 Research Question 3: What are the features of high and low structure and engagement classes?**

From the conclusions of Chapter 8, the question remained as to what teachers do and say to engage their students in positive ways. From the investigations in Chapter 9, we gain a greater understanding of how learners and observers perceive foreign language activities. Teachers need protocols for positive interaction with their students to foster a sense that students are known to them, and recognized as individuals. Teachers need to make classes predictable and comforting through the use of routines, but these routines should not be simple rote activities carried out in automatic fashion. The routines need a significant degree of interaction and should require a degree of thought. Homeroom teachers need to be involved in the classes, not just as translators, guides, and behavioral managers, but as active
presenters and participants, helping students to see their Japanese teachers using English.

In their instruction, teachers need to help students comprehend their use of English by simplifying the language, reducing the number of words, increasing the repetition of key phrases, and signaling the meaning of their spoken output. Activities need to build in a rational fashion, moving away from rote parroting and repetition and toward active use. Games especially must appear to be for a specific learning purpose, should be kept short, and should be packed relatively close together in the flow of activities. The activities should also allow for multiple modalities of experience, from physical to musical to aural, in order to build repetition of the language without relying on monotonous and rote copying of the teacher. Finally, the use of English must be built into how the class proceeds and how students experience the activities, and translation should be kept to a minimum, even at this early level of language learning.

10.2 Final Conclusions, Commentary, and Caveats

The ultimate conclusion of this thesis is to say that, in order to build motivation over time, teachers need to create an active learning environment that is satisfying emotionally and cognitively demanding. Helping students to enjoy thought-provoking tasks and making enjoyable tasks point in the direction of a specific learning outcome are necessary steps in making public education a force for effective learning. As seen in both Chapters 6 and 8, students’ instrumental goal of achieving personal competence was the strongest motivator for studying English. At the same time, based on classroom observations, students who ostensibly want to learn the language did not always choose to positively engage in learning tasks. Thus the burden falls to teachers to help connect the overall goal of eventually gaining mastery over the subject by actively working both in and out of class to achieve these ends.
By bringing changes in behavior, emotion, and cognition to students through highly engaging learning activities in a well-managed and caring environment, teachers may ultimately bring about learning. The previous Chapters hopefully show what this entails and how it may be done.

While no findings regarding “more engaging” target language or specific foreign language games are available (i.e., whether *karuta* or a bingo game is more preferable), we ultimately should take away the idea that no individual game is better than another. So long as they meet students’ underlying needs and help them to actively use the language, all activities are equally useful. The language taught and games used in foreign language classes in elementary school appear to be less important, with a greater need for warm, clear, and efficient instruction in order to create a successful classroom environment.

Many of the findings here are not new; indeed, most reflect ideas known and advocated by practitioners for years (cf. Good & Brophy, 2008; Lemov, 2010; Nuthall, 2002; etc.). At the same time, these findings hopefully offer a nuanced understanding of the realities of how foreign languages are currently being taught in Japanese elementary schools, and bridge gaps between the ideas of foreign language and general education. With a better understanding of how these features interact, the currently underprepared (Fennelly & Luxton, 2011) non-specialist elementary teachers in search of clear and actionable principles for engaging students in foreign language learning activities may find ways to use these classroom supports in their teaching. As English moves toward becoming a required subject with testing and evaluation (MEXT, 2014), pre-service and in-service training will need concrete ideas for how to best support their students.

As is always the case with a series of grounded qualitative, results require further
empirical evidence. While the findings here represent theoretical and practical advice gleaned from careful observations, gathered through a variety of methods, and interpreted through the lens of strong theory, the ideas presented in these Chapters always require additional verification. Re-testing the practices described in Chapter 9 is necessary to refine the ideas and distinguish those that work due to unobserved factors from those that are truly universally effective. Recognizing that this is a potentially never-ending cycle of data gathering, interpretation, and refinement, much in the framework provided by Grounded Theory (Corbin & Strauss, 2008), an artificial endpoint must be drawn. I have chosen to draw the line at the identification of practices I have derived from observing the participating classes, and hope to discuss the implications of these practices for use in elementary foreign language instruction.

Further, while the findings strongly align with self-determination theory (Ryan & Deci, 2002) and previous findings in educational settings (Jang, Kim, & Reeve, 2012; Reeve & Jang, 2006), the findings are very much specific to foreign language education in Japan. At the same time, results may be considered as grounds for further investigation into the validity of self-determination theory in the many other academic domains attended to by the Japanese school system, and thus indicate the overall validity of the theory.

To conclude, in order to understand the process of motivation, we must look at all of its components both in macro and micro. Looking at how the activities and approaches teachers use in foreign influences students’ motivation over the long term, we now have some grounds for making decisions regarding what and how to teach English for the purposes explicitly stated by the Ministry of Education (2008a). In the end, we must recognize that foreign language activities, even ones based on games and interest, are not likely to be sufficient to promote long-term motivation. By meeting learners internal needs and helping
them to actively use the language in ways they find beneficial, we as teachers and teacher trainers may see gains over time.
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They’d do it but I wouldn’t. *Journal of Educational Psychology*, 82, 15–21.


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REFERENCES


REFERENCES

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gaikokugo katsudo hen–Q & A to jyugyou kaizen no pointo tenkai rei. [Explanation and development of the elementary school course of study foreign language activities edition. Question and Answer; class improvement points and development examples]. Tokyo: Kyoiku Shuppan.


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REFERENCES


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StataCorp. (2013). *Stata statistical software: Release 13*. College Station, TX: StataCorp LP.


Germany: Mouton de Gruyter.
Yamamoto, S., Humle, T., & Tanaka, M. (2013). Basis for cumulative cultural evolution in


Appendices

Appendix 1: Transcription conventions used in Chapters 5 and 9

*Italicized text*  Japanese utterance

(Parenthesis)  English translation

:: ::  Actions
Appendix 2: Classroom survey instrument used in Chapter 6, Study 1 and 2

福岡教育大学/◯◯市教育委員会/◯◯小学校 英語活動アンケート
このアンケートは任意ですが、今後の英語学習をよくするためにお願い致します。
○でかこまなく、ぬりつぶしてください。すべての項目に回答してください。
例： ○ → ●

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<tr>
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<td>1組</td>
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以下のようして答えてください。
例：犬より猫が好き －＞ ④にマル
犬が好き ① ② ③ ● ねこ好き
例：どちらかというと犬より猫のほうが好き －＞ ③にマル
犬が好き ① ② ● ④ ねこ好き
例：どちらかというと猫より犬の方が好き －＞ ②にマル
犬が好き ① ● ③ ④ ねこ好き
例：猫より犬が好き －＞ ①にマル
犬が好き ● ② ③ ④ ねこ好き

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<tr>
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<td>活動が次々と進んでいた</td>
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Appendix 3: Classroom survey instrument used in Chapter 6, Study 3

福岡教育大学/◯◯市教育委員会/◯◯小学校 英語活動アンケート

このアンケートは任意ですが、今後の英語学習をよくするためにお願い致します。
〇でかきままず、ぬりつぶしてください。すべての項目に回答してください。
例：〇 → ●

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<tr>
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</tr>
<tr>
<td>男</td>
<td>2組</td>
<td>2</td>
</tr>
<tr>
<td>①</td>
<td>3組</td>
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<tr>
<td>②</td>
<td>4組</td>
<td>4</td>
</tr>
<tr>
<td>③</td>
<td>5組</td>
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自分にとって、英語活動の時間について答えて下さい。
担当の先生、ALT、英語の先生は、このアンケートを見ませんので、安心して自由に答えてください。

今日の外国語活動で、________

<table>
<thead>
<tr>
<th>今日の外国語活動</th>
<th>まったくあてはまらない○</th>
<th>ほとんどあてはまらない○</th>
<th>どちらともいえない○</th>
<th>ある程度あてはまる○</th>
<th>とてもあてはまる○</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 他は英語にたいする自信が持てた</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>2 私は気持ちよく仲だしいと取り組めた</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>3 自己の興味に関連したことがある</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
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<tr>
<td>4 先生の説明が分かりやすかった</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
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<tr>
<td>5 私は友達と一緒に頑張っている感じがした</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
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<tr>
<td>6 先生は何をすればよいか示してくれた</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
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<tr>
<td>7 私は英語が伸びていると感じた</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
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<tr>
<td>8 活動のベースが良かった</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
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<tr>
<td>9 私は英語ができて感じた</td>
<td>1 2 3 4 5</td>
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<td>10 先生は英語を多く話した</td>
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<td>12 私は友達と同じような学んだ</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>13 先生は英語を話すのを楽しんでいた</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>14 ゲームや活動の中で、選択しが与えられた</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>15 先生の声かけで楽しく活動出来た</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
<td>1 2 3 4 5</td>
</tr>
</tbody>
</table>
Appendix 4: Motivation survey instrument used in Chapter 6, Studies 4 and 5, and Chapter 8

福岡教育大学/◯◯市教育委員会/◯◯小学校 英語活動アンケート

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○でかかまなく、ぬりつぶしてください。すべての項目に回答してください。
例：○ → ●

<table>
<thead>
<tr>
<th>性別</th>
<th>出席番号</th>
<th>学級</th>
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<tr>
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<tr>
<td>男</td>
<td>●</td>
<td>②</td>
</tr>
</tbody>
</table>

自分にとって、英語活動の時間について答えて下さい。
担任の先生、ALT、英語の先生は、このアンケートを見ませんので、安心して自由に答えてください。

<table>
<thead>
<tr>
<th>なぜ英語を学ぼうとするのですか？</th>
<th>まったく あてはまるな い ○</th>
<th>ほとんど あてはまらな い ○</th>
<th>どちらとも いえない ●</th>
<th>あるていど あてはまる ○</th>
<th>とても あてはまる ○</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 英語を学ぶことは楽しいから</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>2 先生に気に入られたいから</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>3 しないと先生に怒られるから</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>4 英語についてきょうみがあるから</td>
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<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>5 他の人にほめられると考えかかる</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>6 他の生活場面にやくだから</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>7 参加することは決まりことだから</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>8 やりがいがあるから</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>9 しょうらい、英語が使えるようになりた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>10 自分の成長にとってやくだから</td>
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<td>②</td>
<td>③</td>
<td>①</td>
<td>③</td>
</tr>
<tr>
<td>11 やるしかたがないから</td>
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<td>②</td>
<td>③</td>
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<td>③</td>
</tr>
<tr>
<td>12 友達に英語が良くできると思われたいから</td>
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<td>③</td>
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</table>
Appendix 5: Classroom survey instrument used in Chapter 6, Study 5

福岡教育大学/◯◯市教育委員会/◯◯小学校 英語活動アンケート
このアンケートは任意ですが、今後の英語学習をよくするためにお願い致します。
○でかくまなく、ぬりつぶしてください。すべての項目に回答してください。

例:
○ → ●

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<tr>
<th>性別</th>
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<th>学級</th>
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<tr>
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</tr>
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</table>

自己にとって、英語活動の時間について答えて下さい。
担任の先生、ALT、英語の先生は、このアンケートを見ませんので、安心して自由に答えてください。

<table>
<thead>
<tr>
<th>今日の外国語活動で、_________</th>
<th>まったくあてはまらない○</th>
<th>ほとんどあてはまらない○</th>
<th>どちらともいえないー</th>
<th>ある程度あてはまる〇</th>
<th>あてはまる〇</th>
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<tbody>
<tr>
<td>1 私は英語にたいする自信が持てた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>2 私は気持ちよく友だちと取り組めた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>3 私は英語をたくさん話した</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>4 先生の説明は分かりやすかった</td>
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<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>5 私はワキワキした</td>
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<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>6 私は活動に進んで参加できた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>7 私は英語力が伸びていると感じた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>8 活動のページが良かった</td>
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<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>9 自分の興味に関連したことがあった</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>10 先生は何をすればよいか示してくれた</td>
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<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>11 私は楽しめた</td>
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<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>12 先生はきちんと教っていた</td>
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<td>③</td>
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<td>⑤</td>
</tr>
<tr>
<td>13 私は友達と一緒に頑張っている感じがした</td>
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<td>②</td>
<td>③</td>
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<td>⑤</td>
</tr>
<tr>
<td>14 先生の声かけで楽しく活動出来た</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>15 私は興味を持てた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>16 私は日本語をたくさん話した</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>17 私はしたいことができた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>18 先生は英語を多く話した</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>19 私は活動に最後まで取り組んだ</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>20 ゲームや活動の中、選択しが与えられた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>21 私は英語ができると感じた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>22 私は先生の話しや活動に集中していた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>23 先生は英語を話すのを楽しんでいた</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>24 私は友達と仲よくなった</td>
<td>①</td>
<td>②</td>
<td>③</td>
<td>④</td>
<td>⑤</td>
</tr>
<tr>
<td>25 私は新しいことを学べてうれしかった</td>
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</table>
Appendix 6: Classroom survey instrument used in Chapter 8

福岡教育大学/◯◯市教育委員会/◯◯小学校 英語活動アンケート

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例：

<table>
<thead>
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<td>3組</td>
<td>4組</td>
<td>5組</td>
</tr>
<tr>
<td>女</td>
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</tr>
<tr>
<td>男</td>
<td></td>
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</tbody>
</table>

例：

自分にとって、英語活動の時間について答えて下さい。

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<table>
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<th>まったくあてはまらない</th>
<th>ほとんどあてはまらない</th>
<th>どちらともいえない</th>
<th>あるていどあてはまる</th>
<th>とてもあてはまる</th>
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<tr>
<td>1 英語にたいする自信が持って</td>
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<tr>
<td>2 気持ちよく友だちと取り組めた</td>
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<td>5</td>
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<tr>
<td>3 やりたいことを自分で選べた</td>
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</tr>
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<td>6 活動に参加できた</td>
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<td>5</td>
</tr>
<tr>
<td>7 英語力がのびていると感じた</td>
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<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>8 活動のすすむはやさが良かった</td>
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<td>4</td>
<td>5</td>
</tr>
<tr>
<td>9 やりたかったことができなかった</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
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<td>10 先生は何をすればいいかしめてくれた</td>
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<td>11 楽しみた</td>
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<td>13 友だちと一緒にがんばった</td>
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<td>14 英語を学ぼうという気持ちが強かった</td>
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<td>16 相手の言いたいことをわかりそうとした</td>
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<td>5</td>
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<tr>
<td>17 英語が話せる気がした</td>
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<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>18 先生は日本語より英語を多く話した</td>
<td>1</td>
<td>2</td>
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<td>4</td>
<td>5</td>
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<tr>
<td>19 私は活動に最後まで取り組んだ</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
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<tr>
<td>20 私は自分のために学んだ</td>
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<td>21 自分の言いたいことが英語で伝わるようにがんばった</td>
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<td>22 私は先生の話や活動に集中できた</td>
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<td>23 先生は楽しそうに英語を話していた</td>
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<td>5</td>
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Appendix 7: Teacher assessment survey used in Chapter 8

福岡教育大学/宗像市教育委員会/◯◯小学校 英語活動アンケート
先生の判断で、児童の外国語活動の時間での関心、意欲、態度の評価をお願いします

教諭名

<table>
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<tr>
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### Appendix 8: Rating instrument used by raters in Chapter 8

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