

DOCUMENT RESUME

ED 397 632

FL 023 705

AUTHOR Donato, Richard; And Others
 TITLE Monitoring and Assessing a Japanese FLES Program: Ambiance and Achievement.
 PUB DATE [96]
 NOTE 45p.
 PUB TYPE Reports - Descriptive (141)

EDRS PRICE MF01/PC02 Plus Postage.
 DESCRIPTORS *Educational Environment; Elementary Education; *FLES; *Japanese; *Language Attitudes; Language Proficiency; *Language Role; Language Usage; Longitudinal Studies; Oral Language; *Organizational Climate; Program Evaluation; Speech Skills; Vocabulary Development

ABSTRACT

The third year of an ongoing research project to document and evaluate an innovative Japanese language program in grades K-5 (n=195) is reported. Two strands of research are examined. The first deals with school and community ambiance, and attempts to capture in a systematic way the attitudes and perceptions of parents, teachers, and students in different age groups. The second strand investigates the language achievement of the children, focusing on oral proficiency, vocabulary development, and social uses of language. Results indicate that over a 3-year period, all children, regardless of age, can make considerable progress in foreign language proficiency and develop positive attitudes toward language learning. Additionally, the study showed that innovative language programs can move beyond their often marginalized status to become institutionalized within the school curriculum. (MSE)

 * Reproductions supplied by EDRS are the best that can be made *
 * from the original document. *

**Monitoring and Assessing a Japanese FLES Program:
Ambiance and Achievement**

Richard Donato
University of Pittsburgh
donato@vsm.cis.pitt.edu

G. Richard Tucker
Carnegie Mellon University
grtucker+@andrew.cmu.edu

Janis L. Antonek
University of Pittsburgh
jlast8+@pit.edu

PERMISSION TO REPRODUCE AND
DISSEMINATE THIS MATERIAL
HAS BEEN GRANTED BY

*G. Richard
Tucker*

TO THE EDUCATIONAL RESOURCES
INFORMATION CENTER (ERIC)

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION
CENTER (ERIC)

This document has been reproduced as
received from the person or organization
originating it

Minor changes have been made to
improve reproduction quality.

Points of view or opinions stated in this
document do not necessarily represent
official OERI position or policy

BEST COPY AVAILABLE

FL023705

Monitoring and Assessing a Japanese FLES Program: Ambiance and Achievement

Abstract

This article reports on the third year of an on-going research project to document and evaluate an innovative Japanese FLES program in grades K-5 (n=195). Two strands of research will be reported here. The first deals with school and community ambiance and is an attempt to capture in a systematic way the attitudes and perceptions of various constituents related with this curricular innovation. The second strand of research will investigate the language achievement of children in grades K-5 from the perspective of their oral proficiency, vocabulary development, and their social uses of language. Results of this study indicate that, over a three year period, all children, regardless of age, can make considerable progress in foreign language proficiency and develop positive attitudes toward language learning. Additionally, the study shows that innovative language programs in the elementary school can move beyond its often marginalized status to a regularized feature of the total school curriculum.

Introduction¹

The present decade has been favorable for foreign language programs in the elementary schools (FLES). From a policy perspective, several initiatives have been drafted that strengthen the position of foreign language education in the K-12 curriculum. On the national level, foreign language competency, as early as fourth grade, is included in the *Goals 2000: Educate America Act*. Moreover, voluntary National Foreign Language Standards have been drafted to provide

teachers and administrators with desired foreign language content standards for grades 4, 8, and 12. In 1990, The American Council on the Teaching of Foreign Languages (ACTFL) included elementary school foreign language instruction as a professional priority to explore and, in conjunction with the National Foreign Language Center, began investigating the implications of an early start and an extended language learning sequence (Met, 1993).

Although strides have been made toward raising the national consciousness about the importance of early language learning (Curtain and Pesola, 1994; Lipton, 1990; Muller, 1989; Postero, 1993; Shumaker, 1992), what is critically needed is a solid research base that documents in a systematic way: 1) the situational factors and conditions in which FLES programs operate, 2) the attitudes and perceptions of individuals involved directly and indirectly in the program, including elementary school teachers, administrators, and parents, and 3) the linguistic development of children in FLES programs.² It is the purpose of this article to contribute to FLES research and to provide a model of program documentation and evaluation that can be exported to other burgeoning FLES programs. We hope, therefore, that the monitoring and evaluation study on which we report in this article will inform and influence policy and practice and contribute ultimately to the growth and credibility of programs designed for the early language learner.

FLES Research

Historically, FLES research has proven difficult to conduct in the United States. Two factors have blocked this enterprise: 1) the inherent difficulty in measuring attitudes and attitude change in young

respondents, and 2) the limited availability of reliable and valid instruments for assessing low-level language performance in young children. In the present study, we focus on these two obstacles, namely assessing the attitudes of children and other constituencies regarding a Japanese FLES program and measuring growth in language development. Concerning this last factor, a subgoal of our study is to address the question of start-time for instruction, that is, beginning foreign language instruction in the early (K-2) or late (3-5) primary grades.

The following monitoring and evaluation study consists of a complex array of converging data points that tells a story about the ambiance and achievements of a kindergarten through fifth grade Japanese FLES program during its third year of operation. Data reported include a recently introduced statistical measure called *growth curve analysis* (Francis et al., 1991; Francis et al., 1994) that permits identification of significant growth across time and changes in level of performance of students as individuals and as members of a group in general. Additionally, surveys of students' attitudes concerning learning and using a foreign language and discovering a new culture address the affective variables from the learner's perspective that influence foreign language learning. Finally, the voices of the wider educational community (e.g., parents, other teachers, the JFL teacher) are analyzed and reported to determine the perceptions and stances of a relatively new FLES program within the total school curricular offerings. In the sections to follow, we present our model of program documentation refined over a three-year period, overview the FLES program in question, report on the results of our

most recent research, and conclude with a discussion of specific program achievements and general reflections on the direction and future of FLES programs and research. Although our research may not generalize across all FLES contexts, we invite readers to reflect on our findings, relate them to their own experience, or apply them to their own work in promoting early language learning in American schools.

Approach to Program Documentation

As in the first two years of the program, we have continued to describe various facets of the *ambiance* within which the Japanese FLES program was implemented as well as the *achievement* by the children in developing their Japanese language skills . After reviewing the measures that we had used during year two (see Tucker, Donato & Antonek, in press), we made several modifications to the instruments and to the procedures for data analysis described briefly below.

Documenting Ambiance: Attitudes about the JFL Program

Learner Questionnaires. All pupils completed an age-appropriate "Language and Culture Questionnaire" in which they were asked to provide information about topics such as their attitudes toward school in general and the study of Japanese in particular, their perceptions of their parents' encouragement to study Japanese, and the importance of studying Japanese. The questionnaires for the K--2 pupils contained 10 questions with a series of four-point picture rating scales for responding. The questionnaires for the grade 3--5 pupils contained the same 10 questions (and seven others of a similar nature) with a four-point verbal scale for responding. The grade 5 pupils also completed an additional section with 10 questions asking about their experiences in Japanese class, their completion of interactive

homework assignments, and their attitudes about interacting with peoples from other cultures. All pupils completed the questionnaires during class time near the end of the school year.

Parent Questionnaires. Parents were asked to complete a 35-item questionnaire designed to collect basic information about topics such as previous language study, their encouragement of their child's study, their awareness of their child's progress, their support for the program through their completion of interactive homework assignments, and their satisfaction with the program in particular and their attitudes toward FLES in general. Questionnaires were sent home to parents to be completed at their leisure near the end of the school year.

Other Teachers. A 28-item questionnaire was developed for the other primary teachers in the school to collect information about their own language study, their contact with the pupils and the program, their feelings about the program and about its regularization in the elementary curriculum, their pupils' reactions to the program, ways in which they integrated material from the program into their own content classes, their opinions about foreign languages in the elementary school, and their own policies and practices for homework. The questionnaire was distributed to the teachers to be completed at their leisure near the end of the school year.

The Japanese Teacher. A protocol was developed for the Japanese teacher to complete. She was asked to reflect on her experiences during the third year of the program (her first year) with respect to her teaching, her students, the parents, her relationship

with other teachers in the school, and her goals, plans, and desires for the coming year.

Documenting Achievement: Students' Language Development

Japanese Vocabulary. All pupils completed a 25-item Japanese-language adaptation of the *Peabody Picture Vocabulary Test* (Dunn, 1959) which we refer to as the Japanese Picture Vocabulary Test (JPVT)³. This test was administered on three occasions (October 1994, January 1995 and May 1995) and comprised one measure analyzed in a growth curve analysis (GCA) Pupils received a booklet consisting of cover sheet, practice trial, and 25 test items. For the practice trial and the 25 test items, four pictures appeared on each sheet. The test administrator, after presenting the directions to the children in English, identified the number of the item and then twice read aloud the "target" item. The children indicated their choice, from among the four alternatives, by placing a mark somewhere over the named picture. The score reported is the number correct out of 25.

Oral Interviews. We have previously described the oral interviews (see Donato, Antonek & Tucker, 1994) as Prochievement Interviews (Pro-I) because tasks were linked to the curriculum and proficiency-oriented (Sukle, 1992). Each of the target students was interviewed by a native speaker of Japanese following a standard pre-tested protocol in which a variety of tasks were used to elicit samples of Japanese from the student. The format of the Pro-I included 1) warm-up (e.g., general greetings, name, etc.), 2) focused and open-ended questions about a picture of a familiar household scene, 3) a set of grammaticality judgments in which the child had to choose which

of two alternatives sounded "better," several forced-choice questions, 4) a set of elicited repetition items presented in Japanese [apple, red apple, red apple on the table, red apple on the brown table, the red apple is on the brown table in the living room], and 5) a wrap-up session in which the child was asked to name as many of the objects from the picture as possible and to count from one to ten. Interview sessions were video-recorded and lasted from 12 to 15 minutes. Another native-speaker of Japanese observer assessed the child's performance using a "Student Observation Form" (SOF), adapted from the Student Oral Language Observation Matrix (San Jose, California, n.d.). The SOF allowed for rating children's oral ability along a five-point scale on a set of five dimensions of language use-- Comprehension, Fluency, Vocabulary, Pronunciation, and Grammar. At the conclusion of the Pro-I, the observer, guided by the ACTFL oral proficiency rating scale, also assigned a "global" rating (e.g., novice-low, intermediate-mid, etc.) to each of the children. Each of these ratings (the individual dimensions of the SOF and the global Pro-I contributed to the GCA discussed below.

From the 195 participating students, 42 pupils were selected from the eight classrooms to participate in the individual oral interviews which were administered in October 1994, January 1995, and again in May 1995. Twenty-eight of these pupils were ones who had also been tested in May 1994. The other fourteen children were randomly selected from the kindergarten and first grade classes. The data from these selected twenty-eight children, who were representative of the Falk population based on similar performances in

reading and language arts on the California Achievement Test, were used for documenting and charting language development over time.

Teacher's Assessment of Language Development. In addition, the Japanese teacher was asked to rate the language ability of all one hundred and ninety-five children individually using the same five dimensions from the SOF.

Social Use of Language. Elementary teachers and parents were also asked in their questionnaires whether they had observed the children using Japanese outside of the classroom or during interactive homework. The questions asked respondents to identify where, with whom, and for what purposes the children spontaneously used Japanese.

Discourse Analysis of Prochievement Interviews. The audio tapes of the production data from oral interviews conducted in October 1994, January 1995, and May 1995 from six students (three rated as novice-high, and three as intermediate-low during the final May 1995 testing) were identified, transcribed, and analyzed (see Watari, 1995). The purpose was to gather detailed information about the students' particle usage, syntactic development, and vocabulary development over the course of an academic year.

Design of Year III Program

Curriculum⁴

Based on research conducted during years 1 and 2 of the program (Donato, Antonek, Tucker, 1994; Tucker, Donato, Antonek, in press), changes and refinements to the curriculum were made. Although scheduling remained the same, fifteen-minutes of compulsory daily instruction in Japanese for children in grades K-5,

the third year curriculum included several important innovations compared to the first and second year plan of study. Following the same proficiency-oriented framework developed during the first two years of the program, year 3 consisted of 29 units of study structured around content areas (e.g., clothing, the city, the sea, transportation, etc.), a language function (e.g., describing one's family, identifying rooms of the house, expressing likes and dislikes), target structures (e.g., relative time, the verb 'to be', negation, etc.), and content enrichment and cultural information. Kanji were also periodically introduced:

An important refinement to the curriculum was the introduction of storytelling activities that provided students with comprehensible input in extended discourse and opportunities to use the language of the story in story retellings and extension activities (Redmond, 1994). The stories related to the content of the lesson, were accompanied by objects and visuals, and were authentic or written by the teacher. Authentic songs also played a more important role and were closely linked to the lessons. Tapes of the songs were made for use in the home and parents responded enthusiastically to these materials. In short, the third year curriculum was built more on 'cultural whole texts' rather than on discrete thematic vocabulary learning and related communicative activities.

Creating linkages between parents and school also played a greater role in the Japanese program than before. Two important sources for connecting parents to the language learning of their children were established. First, systematic attention was given to refining the home-based learning experiences of the children.

Interactive homework responded directly to the parents desires, as expressed on questionnaires at the end of year 2, for shorter, well focused assignments with strong cultural content (Antonek, Tucker, and Donato, 1995). Second, information on the Japanese program was disseminated monthly in the parent newsletter presenting such items as Japanese holidays, the interactive homework project, the writing system, and the goals and purposes of the curriculum.

New Teacher

The third year was also marked by the hiring of Ms. Yoko Morimoto to replace the original teacher. Ms. Morimoto brought an extensive and diverse teaching background to her new position. In Japan, she had taught English to 4-7 year old children for two years and to junior and senior high school students for 9 years. Also while living in Japan, she worked as an instructor of Japanese to American teachers of English as a second language. Before moving to the United States, Ms. Morimoto worked with the children of Japanese families living in England to maintain oral and literacy skills in their first language.

Results of Study

Ambiance

Parents' Attitudes

Parents of sixty-nine children equally distributed across grade level completed attitude surveys (younger n=37; older n=32).⁵ The background information indicated that 93% of the respondents had never studied Japanese. A profile of the parents indicated that 40% reported having family members who had traveled to Japan, 12% spoke languages other than English, fewer than half had studied a

foreign language in elementary school, and 94% spoke only English to their children at home. This profile shows that these parents do not speak languages other than English on a regular basis and are not particularly connected to issues of early foreign language learning. The respondents represent, therefore, a fairly typical American family relative to foreign language study, its use, and promotion inside and outside the home.

When asked about their satisfaction with the JFL program, 99% of the responding parents expressed a strong desire to see Japanese continue, 73% were happy with the choice of language, and only 2% were not happy with early language learning programs for their children. A quarter of the respondents expressed some concern about the limited instructional time (15 minutes a day). When asked to compare their attitudes about year 3 with those for year 2, 57% of the parents reported feeling more positively toward the program and some stated this change of opinion was due in large part to the talent of the new teacher. Concerning the goals for their children in a foreign language class, enjoyment and cultural knowledge ranked as their first two choices whereas fluency in the target language was not reported to be a priority outcome.

We were also interested in knowing where parents situated foreign language study in relation to other school subjects. To our surprise, we found that these parents perceived foreign language to be on the same level with core academic subjects such as math, language arts, and science. Twenty-four percent of the parents placed foreign language in a category all its own and only 10% viewed foreign languages as "electives," our initial hypothesis. This observation bodes

well for the future of elementary foreign language programs especially regarding the importance of parental support for programs (Padilla & Sung, 1995; Halsted, 1988; Rosenbusch, 1987) and the influence of negative attitudes about language study that are transmitted to children in the home (Feenstra, 1987; Gardner, 1985). Their serious attitude about language learning was revealed in the finding that 90% of the parents commented that they had discussed Japanese with their children at home and that the tone of their conversations with their children was consistently positive. These positive findings were also corroborated by the behavioral commitment of 83% percent of the parents who completed at least half of the interactive homework assignments with their children.⁶ Among the parents responding to the survey item concerning interactive homework, 91% found them enjoyable and 94% wanted to see them continue.

The parents provide, therefore, two perspectives concerning foreign language in the elementary school. At a local programmatic level, these parents are satisfied with their children's language learning experience, support the program at home, and express confidence in the teacher.⁷ At a global level, the attitudes displayed on the questionnaire remind us that parents may have a set of ordered goals for language learning for their children that may not reflect all of the proficiency outcomes of a program. For example, no parents reported that they hoped their children became fluent in Japanese nor did they rank fluency as a program priority. Rather, their priority is for their children to enjoy learning a foreign language and gain cultural knowledge. When asked to rank foreign languages in relation to other offerings in the total school curriculum, parents did not

marginalize foreign language study or place it in a category different from core academic subjects. This finding is, indeed, encouraging for the future of FLES programs nationwide.

Classroom Teacher Attitudes

Teacher Profile. Completed questionnaires were returned by all 8 teachers, one of whom was a newcomer to Falk School this year. The respondents, on average, had been teaching for 16 years. They tended to have responsibility for all primary subjects. All had studied a foreign language, and found it to be, for the most part, enjoyable and rewarding although such study was quite minimal for seven of the eight teachers. None had previously studied Japanese.

About Year III Program. Teachers were asked if their attitude about the FLES program had changed this year as compared to last year's program. Four teachers out of 8 responded that it had changed in a positive way and cited specific reasons for modifying their opinion of the program. Growth in student interest and participation in class and highly motivating and interesting lessons by the JFL teacher were the reasons given for the positive change of attitude. Interestingly, one teacher noted that observing positive student reactions had affected her perspective on the JFL classes this year and resulted in her seeing the program as "more beneficial."

Comparisons across years. The profile of results from the teacher questionnaires was quite similar to that reported last year (see Tucker, Donato & Antonek, in press) in which a majority of the teachers (eight of the nine) indicated that their students had not experienced any difficulties in other academic subjects attributable to their study of Japanese.⁸ Likewise, a majority (seven of the eight)

stated that their students seemed to "like the Japanese classes." Although we had noted last year that there seemed to have been more of an attempt by some teachers to integrate material from Japan and from the Japanese classes into their "regular" classes during the second year than there had been in the first, we really did not find any compelling evidence for a systematic increase in integrative teaching in the third year. One teacher reported, however, that she would ask students for Japanese vocabulary for classroom objects and would say "please" and "thank you" to them in Japanese during the day.

Attitudes about FLES. All of the teachers reported that they were happy that their children have the opportunity to learn a foreign language in the elementary school. When asked why they felt that foreign languages are not routinely taught in elementary schools, their responses fell into 3 categories: 1) lack of curricular mandate, 2) lack of time in an otherwise crowded schedule, and 3) linguistic insularity of a nation protected by two large oceans. All reported that they supported the decision to regularize the JFL program within the primary program. At the same time, slightly mixed reactions with respect to the selection of Japanese as the language of instruction were expressed with two of the eight teachers questioning whether Japanese was a wise choice. With respect to whether the JFL program should be extended into the middle school, all responded positively although five of the eight believe that JFL should be offered as an elective.

Perceptions about Children's Progress. Most teachers responded that their students were generally positive about the study of JFL, that they accepted it as "one of the regular areas of the

curriculum," and that, although "most seem positive....[t]hey don't always look forward to it, but always enjoy doing it." Seven of the eight reported that they have heard children using Japanese outside of the JFL class (e.g., in the halls, at play, reading words displayed in the homeroom, see *social use of language*), and all reported that the study of Japanese caused no difficulties for their students when it came to learning other subject matter. A number of the teachers commented on the children's obvious enthusiasm for the JFL class, and on the highly motivating JFL activities in which they engage.

Involvement in JFL Class. In response to the questions which probed their participation and involvement with the Japanese program, only one teacher reported never staying in the classroom during the Japanese class while one reported always remaining; and six commented that they sometimes remained. Five of the eight stated that they sometimes participated in the JFL classes citing their attempts to learn songs or help in making origami with the children. These responses by the primary teachers should be compared with the end-of-year reflection of the Japanese teacher who reported that only 2 teachers consistently participated in class, learned some Japanese, and assisted in classroom management issues. Six of the eight reported that they had introduced the study of Japanese topics or culture into their own classes--although the positive anecdotes that were presented seemed, for the most part, to refer to the introduction of a highly successful social studies unit from year 2, rather than from year 3. Moreover, 69% of children in grades 3-5 reported that Japanese was never discussed during other academic classes and only 2% of the children indicated they discussed Japanese

with their other teachers every day. In addition, four of the eight teachers responded that they interacted relatively rarely with the Japanese teacher outside of class.⁹ In general, the picture to emerge is a supportive staff who, although initially skeptical and not fully participating in the program during classtime or integrating Japanese themes into other lessons, values early language learning and understands it as part of the curriculum.

Student Attitudes

We were particularly interested in understanding student attitudes from two perspectives - the students' overall impressions in the *aggregate* (K-5) about the program and their view of themselves as learners within it, and *cohort* differences that existed between the younger and older learners. Our interest in the latter was part of the larger question guiding our research - when should children begin the study of a foreign language in elementary school?

K-5 Attitudes. Of the one hundred and ninety-five K-5 students who completed the Language and Culture Questionnaire, 85% of them agreed that they enjoyed learning Japanese and 73% reported wanting to continue their study of Japanese the following year. When queried about their feelings toward class, only 14% of the children reported some anxiety in speaking Japanese. Conversely, many claimed enjoyment in participating orally in the class (70%) and thought that "learning Japanese was fun" (82%). Half of the children informed us that their parents supported their learning of the new language by encouraging them at home and 72% commented that their parents actively helped them outside of class. A chi-square analysis revealed no significant relationship between attitudes and gender, although

female students rated their liking of school in general higher than the boys. In the aggregate it appears, therefore, that a majority of all program participants in grades K-5 had a positive language learning experience in the third year, perceived home support for their learning, and expressed a desire to continue learning Japanese the following year.

Younger vs. Older Cohort. A slightly different picture emerges, however, when the attitude data are disaggregated by cohort. A chi-square analysis reveals a significant relationship ($p < .01$) for questionnaire items relating language learning attitudes to perceptions and age. In all cases, membership in the younger cohort was associated with more positive orientation toward the JFL program. No significant relationship was found, however, for overall liking of school. This finding does not suggest that the older cohort disliked learning a new language since 49% of the older children were found to be consistently positive about learning Japanese, whereas only 18% systematically reported negative reactions. What this finding does indicate, however, is that age, rather than gender, is related to attitudinal responses.

We also investigated whether age was related to completion of the interactive homework assignments, one indicator of engagement with learning and, by extension, evidence of a positive disposition toward the learning of Japanese. To this end, we monitored and analyzed the return rate of these assignments by age cohort. A significant difference was found between younger and older learners in the amount of homework completed during the third year of the program with the younger learners ($n=99$, $x= 5.10$, $SD 2.53$) returning

over twice as many assignments as the older children ($n=98$, $x= 2.90$, $SD 2.42$) ($t=6.19$, $df 195$, $p<.001$). Why younger learners complete more outside-of-class assignments than older learners is not entirely clear, but the positive attitudes toward learning in the younger cohort may explain their greater participation in out-of-class school work. Therefore, one advantage the young learner may bring to language learning is a willingness to engage more fully in voluntary, ungraded, learning activities than their older counterparts. Another possible reason may be that parents are more attentive to out-of-class school activities of younger elementary children. Yet another explanation may be that the classroom teachers of the younger cohort, by remaining in the classroom and participating actively in the JFL lessons as compared to the general lack of such activity in the teachers of the older cohort, encourage children to take foreign language study more seriously. Indeed, we found that the classes who had the highest rate of student participation in the interactive homework assignments were those of two teachers from the younger cohort ($x = 5.50$ and 5.38). For these reasons, younger children seem to have the enthusiasm, positive attitudes, and parental (Padilla and Sung, 1995); Rosenbusch, 1987) and teacher support for learning a new language within a FLES model.

As the profession discusses the inclusion of foreign language courses in the core elementary school curriculum and the appropriate starting point for children, it must be kept in mind that these data indicate that younger is indeed better when viewed from the perspective of overall receptivity and positive affective reactions to language learning. Additionally, 73% of the older children in our study

indicated that they liked school in general. Thus their less positive attitudes about learning Japanese cannot be ascribed to a general decline in interest in schooling. In addition to the cognitive advantages of young learners documented in the research on maturational constraints (Long, 1990; Slavoff and Johnson, 1995), the success of the early language learner may also be attributed to social and affective factors, including their positive predisposition, enthusiasm, and active engagement in the task of learning.

Teacher Reflection

Teaching. The end-of-year reflection protocol asked the Japanese teacher to discuss her thoughts about her teaching, her students, other teachers, and to set goals for the next year. An analysis of her comments revealed that the teacher engaged in a cycle of reflective practice (Richards and Lockhardt, 1994) characterized by assessing students achievement and their instructional preferences at the beginning of the year and initiating a series of revisions to teaching practice throughout the year. Based on her observations at the beginning of the year, the teacher noted that the children spoke at word-level, disliked interactive homework, expressed some anxiety in class, and did not relate well to commercially-prepared material. Revisions to instruction included 1) introducing storytelling as a means of increasing comprehension, production, and vocabulary expansion, 2) changing the format of the interactive homework assignments by including more cultural information and making them easier to complete, 3) judiciously using English to introduce the lesson and to lower anxiety for the children who viewed Japanese as a "fearful, irritating, and confusing subject"¹⁰, and 4) creating teacher-

made original visuals, songs, and stories. After several weeks of assessment, the teacher discovered that a fifteen-minute class could easily consist of 4 to 5 short activities that she designed to be "full of impact with songs and visuals."

Students. To better understand her students and consistent with her reflective approach to her own instruction, the teacher conducted a small action-based research project on the attitudes of her students to the activities of Japanese class. Through a series of questionnaires the teacher discovered that 93% of the students (n=135 students) reported that the storytelling activities made class more enjoyable and that 83% believed the stories helped them improve and learn Japanese. Curiously she also discovered that 80% of the students preferred longer stories to shorter ones and that stories about animals captured their interest the most. Student reactions to the use of songs prompted the teacher to attend more to the comprehensibility of the songs she taught rather than to the activity of singing itself. Her research also uncovered that 71% of the children reported using Japanese outside of class. Consistent with her summary of how she approached teaching her lessons, the situated nature of her study provides evidence of this teacher's ability to assess classroom learners and make instructional adjustments based on their reactions and preferences.

Other Teachers As an itinerant teacher assigned to conduct classes in the rooms of several elementary school teachers, the classroom teacher was also reported to contribute to classroom climate, student achievement, and the seriousness to which learners approached their learning. The end-of-year teacher reflection

underscored these assumptions. One particular class discussed by the JFL teacher illustrates the interdependence and importance of the classroom teacher to the success of the FLES program. The teacher describes the evolution of one class from being "the toughest to deal with" to "one of the most attentive classes in the school." She attributes this change in classroom climate to the homeroom teacher who "stayed in the class during Japanese lessons, learned a little Japanese, and sat next to the noisiest child." The result was that these children now began to view their Japanese class as part of their primary teacher's classes rather than an "add-on," or, as one parent aptly described it, "a commercial break" interrupting regular class periods.

Goals and Modifications. The major theme emerging from her reflections on the future was *time*. Increasing the cultural content of the curriculum, allowing children to interact with native speaker guests to their class, and using authentic materials require a commitment of time-on-task that cannot be satisfied in a fifteen-minute period per day class. To overcome some of the obstacles created by short class periods, the teacher discovered the value of cooperating across subject matter by developing integrated thematic units and setting a goal for the coming year to explore collaboration with the elementary faculty. In this way, the teacher expands the time available for Japanese instruction and improves her program through interdisciplinary instruction and the rich interconnections across disciplines it provides.

Achievement

Comparison of Year III to Year I and II

Over the three year life span of the JFL pilot program, a random sample of children stratified for grade level and gender participated in Pro-I testing.¹¹ Comparisons of performance on the Pro-I from year 1 to year 3 of the program indicated that children, while clearly novice and, in some cases, low-intermediate speakers, made steady gains in their ability to express themselves verbally on certain production tasks. Table 1 shows the number of children in each proficiency level of the Pro-I across 3 years of the program.

[Place Table 1 here]

As Table 1 indicates, the children appear to be improving at a steady rate on the Pro-I. In year 1 we find that 90% of the children scored in the novice-low to novice-mid category whereas by year 3 only 70% of the children performed at this level. By looking more closely at the lower ranges of novice performance, we find that in year 1, 58% of the children were clearly novice-low speakers, i.e., they possessed no functional ability in the language. By year 3 however we see that the number of novice-low speakers has dropped to only 15% of the sample. At the upper end of the proficiency scale we see a similar increase in the number of children able to perform verbally in creative and spontaneous ways. Year 1 shows that no child could create with language, the major characteristic of an intermediate speaker. Year 3 shows, however, 7% of the children in the sample were well into intermediate ranges of performance. This finding is all the more impressive given that these children were learning Japanese 5 days a week for only 15 minutes a day.

In the following section we describe more specifically how children grew in their Japanese proficiency through the use of a Growth Curve Analysis. This measure, as we will show, captures in more detail linguistic growth, and provides a clearer picture of individual development and how the componential aspects of linguistic performance vary across learners and contribute to global ratings derived from Pro-I data.

Growth Curve Analysis¹²

A Growth Curve Analysis (GCA) was conducted using a sample of 28 children for whom we had data across 4 testing events (May, 1994, September, 1994, January 1995, and May 1995). A GCA is a recently introduced statistical measure differing from the traditional models of trend analysis in its attempt to capture growth and change for each individual separately and for groups of individuals collectively (Francis et al., 1991, p. 616). A major difference between GCA and trend analysis is that the latter allows growth parameters to vary, but *only* across groups of subjects; within-group, individual variability in growth parameters is considered error. In contrast, GCA posits a different unit of quantifiable analysis, the individual, and formulates a model of change focusing the study of development on interindividual differences in intraindividual change. Further, as Francis, et al. (1991, pp. 609-610) point out, a compelling alternative to traditional formulation of change is to consider it as reflecting a continuous process that underlies performance. That is, in developmental contexts, quantitative change is more naturally represented as ongoing and continuous growth within individuals. Thus, *individuals* within research samples can display unique underlying growth trajectories

and, therefore, this type of analysis can elucidate the *process* of change within a sample, not simply the amount of change taking place at arbitrary points in time during the unfolding of this process.

Findings. We conducted a GCA across 4 separate testing events (May, 1994, September, 1994, January, 1995, and May, 1995) in which the 28 students from our sample participated in a Pro-I (including being observed and rated during the Pro-I on the SOF by a native-speaker of Japanese) and a Japanese Picture Vocabulary Test (JPVT) . The Pro-I yielded 6 distinct measures of competence in Japanese (total Pro-I score, vocabulary, grammatical control, pronunciation, comprehension, and fluency); the JPVT added an additional vocabulary measure to the profile of each student in the sample. The CGA permitted us to view, therefore, significant growth, stability, or backsliding across these 7 measures. Additionally, since the GCA captured development in discrete components of JFL ability for each individual, a better understanding of the nature of change in linguistic growth from year 2 to year 3 on the Pro-I could be achieved. The following results of the GCA represent, therefore, an account of how these individual children grew in a JFL program, their areas of achievement, and the dimensions of growth that in the past may have remained hidden in aggregate scores or global proficiency ratings.

The GCA revealed that seventeen children out of twenty-eight made *significant* growth across the 4 testing events in one or more of the 7 dependent measures. Table 2 shows the growth profile of the seventeen children displaying significant slopes and indicates in which area of language performance growth was revealed.

[Place Table 2 here]

What is revealing about the pattern of growth is that seventeen out of the sample of twenty-eight children made significant growth in some area of JFL competence but that the pattern of growth was not uniform across children. That is, children displayed varied profiles of growth in different domains of language use and knowledge. This finding is important to understanding foreign language development in the classroom setting because it indicates the inherent variability of development among students during the acquisition process. In addition, this variability characterizes the nature of individual differences in the foreign language classroom and the necessity of acknowledging the idiosyncratic nature of growth in classroom language learning across several components of target language knowledge and skill. That is, for the children in our sample, growth in one area of language ability did not necessarily predict a concomitant growth in another. It should also be pointed out that pronunciation, so frequently associated with advantages of the young language learner, showed no significant growth across 12 months. Of course, this may be due to the children's previous strong performance in pronunciation and, therefore, reflect a regression to the mean.

Additional insights. The GCA also provides a window into program effectiveness and our monitoring and evaluation efforts. When locating growth density we find that 6 of the children grew significantly in fluency and 8 of the children showed marked progress in vocabulary development. This finding confirms that the program was meeting its expressed goals of increased target language production and vocabulary knowledge. Moreover, when taken together, we find that only 10% of all slopes were negative for twenty-

eight children across 7 measures of target language proficiency. More specifically, this finding indicates that 90% of the children in the sample either revealed significant growth on one or more of 7 measures of L2 proficiency, grew at a rate that did not reach statistical significance, or maintained their language ability over time. Students' progress in various and distinct aspects of foreign language competence is indicative of the integrative nature of the JFL program. Although no child made significant gains across all 7 measures, each one of the 7 areas tested was found to develop in some children in the sample. This finding is noteworthy given the goals and curricular emphasis of the program in the third year.

We also found that the growth curves for the two measures of vocabulary development (JPVT and the vocabulary dimension on the SOF) were not similar. That is, only two children of the eighteen "growers" showed significant growth on both the JPVT and the vocabulary rating on the SOF. This lack of uniform growth, ostensibly on two measures of the same language dimension, indicates that word naming on the Pro-I and word recognition on the JPVT capture two independent abilities in JFL vocabulary learning, namely, production and reception. Thus, the GCA allows us to see more clearly how growth occurs across and within features of language use and prevents unwarranted or erroneous claims based on a single proficiency measure during a single testing event.

Vocabulary Development

The JPVT was administered three times during the year to 195 students and consisted of 25 vocabulary items read to the students by the teacher who directed them to indicate the correct corresponding

picture by marking it in their answer book. To this end, the JPVT can be seen as a measure of students' receptive ability and not necessarily their ability to produce vocabulary spontaneously during target language interactions. The data were analyzed using a three-way analysis of variance (time of testing October, February, and May) by age (older--grades 3--5, and younger--grades k--2) by gender (male and female) with repeated measures on the first factor.

The overall analyses revealed a significant main effects for time of testing ($F=179.61$; 2,370 df; $p<.01$), age ($F=4.07$; 1,185 df; $p<.05$) and gender ($F=4.58$; 1,185 df; $p<.05$). Of the possible interactions, only the two-way interaction involving grade and time of testing was significant ($F=4.28$; 2,370 df; $p<.01$). What the data reveal essentially is that the girls ($X= 16.25$) on average perform better than the boys ($X= 15.59$); the older youngsters (i.e., those in grades 3--5) perform better ($X= 16.25$) than the younger ($X= 15.55$); and the students demonstrate progress during the year from the October testing ($X= 13.29$) to February ($X= 17.12$) to May ($X= 17.34$). These data are reflected in Table 3 which presents the mean scores on the three JPVT tests for the students by gender and by age. For the most part, the differences within groups are small and probably not educationally significant. However, there is a pattern of fairly sharp growth from the beginning to the middle of the year which may reflect a resurgence of progress in Japanese following the beginning of classes again after the long summer recess.

The significant two-way interaction of age by time of testing is particularly interesting. An examination of the means reveals that the pattern of receptive vocabulary growth for the young students (grades

K--2) is steeper than that for the older youngsters. The young students who perform less well ($x = 12.71$) than the older students ($X = 13.85$) actually outperform them on the end-of-year test administration (young $X = 17.41$; older $X = 17.28$). Thus, we can conclude that the younger students are not at all disadvantaged because of their age when compared with older learners on measures of receptive vocabulary. By time three, we see an equalization of performance and clear indications that younger learners are performing on par--if not slightly better than-- their older counterparts. This lack of disadvantage for younger learners is reinforced when one considers total number of years in the program. A comparison of grade two children who have been in the program for three years ($X = 16.36$) indicates that they perform similarly to fifth graders who have also been in the program for three years ($X = 16.77$).

Thus, in addition to more positive attitudes toward language learning, another advantage of an early start, as we have argued elsewhere (Donato, Tucker & Antonek, 1994) is that younger learners perform as well as, if not occasionally better than, older children in elementary school.

[Place Table 3 here]

Social Use of Language

Parents and teachers were asked on the questionnaire whether they had observed the children using Japanese outside of Japanese class or the interactive homework setting. Of the 8 teachers responding to the survey question, 7 teachers indicated that they had observed children using Japanese with each other on the playground, in the cafeteria, and in the hallways. The uses to which these children

put their new language included greeting each other, using Japanese numbers in math class, singing together, and playing "paper, rock, scissors" in Japanese on the playground to decide who would go first during a game.

The parents' responses were equally revealing concerning the children's productive, social use of language. Two questions on the Parent's Questionnaire sought to elicit information about the children's use of Japanese outside the school context. The first question dealt with parents' observations of language use opportunities (e.g., Japanese restaurants, interactions with Japanese friends) and their children's reaction to them. Twenty-four parents responded to this question and three categories of foreign language use were frequently cited - talking to friends and family members, singing, and talking to the staff in Japanese restaurants. Six parents reported hearing their children use the target language in restaurants. One parent reported that just being in a Japanese restaurant prompted her daughter to begin speaking her new language "though the server admitted she had never studied Japanese!" Nineteen parents observed interactions in Japanese with friends and family members, often those who have some connection to Japan or who speak some Japanese. One parent noted that "my son floored the chairperson of my department at a social gathering by speaking basic Japanese to him." Another parent proudly reported that her child "instructed her aunt on Japanese words and greetings before she took a business trip to Japan." Finally one parent observed her child speaking Japanese to her cousin who lived in Japan for 4 years and who had recently returned to the United States.

The second question asked parents to report if they had ever observed their children using Japanese with siblings. Seventeen parents (43%) responded that they had overheard their child teaching vocabulary, phrases, or songs to younger siblings who were not studying Japanese. In two cases, where two children in the same family were both studying Japanese, parents noted that their children would "compare notes from time to time." Concerning the social use of language, it appears that some children are developing both rudimentary *communicative competence* in Japanese and *communicative confidence* to interact spontaneously with others outside of class using the Japanese they are acquiring.

Discourse Analysis of Prochievement Interviews.

The elicited repetition and spontaneous production portions of the Pro-I data were examined to provide a composite picture of the developmental paths that six selected students followed with respect to vocabulary building, particle use, and syntactic development (Watari, 1995).

With regard to vocabulary development, changes in number and in category of words (colors, body parts, people, other nouns, adjectives, and verbs) produced by children during the word naming task of the Pro-I were counted and compared. The analyses clearly revealed the general tendency for students first to acquire nouns that refer to persons and then general nouns while subsequently adding other categories such as adjectives (particularly colors) and verbs to their repertoires.

With regard to particle acquisition, the students followed a path quite similar to that for Japanese children (Clancy, 1985). They first

produced multi-word utterances omitting particles, and then gradually increased their repertoire and use of particles and their use of them. In terms of developmental order, the particles *wa*, *ga*, *o* seemed to be first acquired while the particle *de* which fulfills two separate functions was acquired later in the sequence. Interestingly, although students often dropped particles, there was no misuse of particles when they did produce them.

With regard to syntactic development, the analyses indicated that student utterances became longer and more complex over time. The students began (October, 1994) by producing one word utterances, then produced one word with a particle, and gradually increased the length--up to four- and five-word sentences with correct particle usage and increased complexity of their utterances (May 1995). Students seemed to be hypothesizing that a single noun followed by particle could stand alone as a possible utterance in Japanese, although it is actually rarely heard by native speaking children of Japanese. In addition, the data indicated that all children acquired yes-no questions before they acquired wh questions (in particular 'who' or 'what' questions with a copula).

Discussion and Conclusions

The data presented in this study contribute in several ways to understanding the third-year of JFL program in particular and the context of FLES in general. However, for the findings of this study to be of value, they must be placed within the broader context of the three-year life span of this project. For this reason, our conclusions and summary statements will be framed in two ways. Our first focus will be on the FLES program itself, its present condition, and its

development over the three-year period of the pilot project (ambiance). Second, what do the findings of this study tell us about the nature of a young child's language development in a FLES program. The next discussion will focus, therefore, on the child as the unit of analysis in the context of a traditional, proficiency-based FLES program (achievement). Taken together, these two perspectives will, at the same time, shed light on how FLES programs take root as a newcomer in the elementary curriculum and how children perform as recipients of these curricular innovations. Based on our study, we will conclude with a statement about future directions of FLES research.

Ambiance

Data gathered and analyzed during the third-year of the JFL program clearly indicate that all stakeholders are satisfied with FLES instruction, feel the children are making reasonable gains, and would like to see Japanese class continue. Some concerns raised revolve around choice of language, amount of instructional time, the future of the program in the middle school, the equality of the program in relation to other subjects, and the importance of an early positive language learning experience for young children. Teachers in the school did not report that the study of Japanese produces any deleterious effect on the children's knowledge acquisition in other subject areas. Integration across subject areas did not take place to the extent that it was hoped but was seen by the Japanese teacher as a viable alternative to limited instructional time. However, some teachers were observed to participate in the JFL class, learned along with their students, or asked students to recall Japanese vocabulary during the course of the day.

The children also reported satisfaction with the program with older children displaying slightly less interest in JFL study. Younger children appeared more enthusiastic and positive about the program than their older counterparts. Based on her end-of-year reflection, the teacher reported that all children seemed to enjoy working in acquisition-rich environments comprised of story-telling, interactive, and cultural activities. Moreover, we have evidence that children's language use was not restricted to the classroom. Teachers and parents both reported witnessing children using Japanese outside of class and an eagerness to demonstrate their newfound linguistic competence. All of these attitudes and perceptions indicate that the JFL program has been successfully integrated into the school and the ambiance surrounding the program is positive, accepting, and credible.

Achievement

The data on linguistic achievement of these children also reveal a steady growth in their ability to express themselves verbally, acquire vocabulary, and expand their control of specific syntactic features of Japanese. Over the three years of the program, we see the children in our sample moving upwards along the proficiency continuum from primarily comprehension skills to formulaic speech to creative output. Additionally, this growth in oral language proficiency was accompanied by significant growth in several dimensions of language use as indicated by the GCA. Although no child presented exactly the same profile of linguistic growth, a majority of the children in the sample displayed statistically significant improvement in one or more dimensions of linguistic ability. Closer analysis of the Pro-I data also

showed that children moved from word to phrase to sentence level production, controlled yes-no questions before wh questions, and hypothesized about and use particles during speaking tasks. The data on younger vs. older students also indicate that older outperformed younger on some tasks but that younger was no less able to acquire language and vocabulary at comparable rates and with similar patterns of growth. This finding casts some doubt on the claim that older students (grades 3-5) are categorically equipped to learn foreign languages in the classroom better than younger students (grades K-2).

As stated in the introduction, we have hoped to depict the situational factors a school faces when initiating a FLES program, document the attitudes and perceptions of individuals involved, and chart the linguistic growth of children. In addition to its specific findings, this study also presents a model for documenting and evaluating program ambiance and achievement. In our particular case, positive attitudes and a steady growth in linguistic proficiency over the three-year pilot JFL program have resulted in a school board decision to regularize the Japanese class in the elementary grades in 1995. We argue, therefore, that in spite of an educational system that historically has not included foreign language classes, FLES programs can be established as a regular part of the school curriculum, can become salient in the minds of various constituencies who influence its outcome, and can make important and long overdue contributions to the cultural and linguistic development of elementary school children.

References

Antonek, J. L., Tucker, G. R., & Donato, R. (1995). Interactive homework: Creating Connections between home and school. Mosaic, 2 (3), 1-10.

Clancy, P. (1985). The acquisition of Japanese. In D. I. Slobin (ed.) The crosslinguistic study of language acquisition. Hillsdale, NJ: Erlbaum, 373-524.

Curtain, H. & Pesola, C. A. (1994). Languages and children: Making the match. White Plains, NY: Longman.

Donato, R., Antonek, J. L. & Tucker, G. R. (1994). A multiple perspectives analysis of a Japanese FLES program. Foreign Language Annals, 27 (3), 365-378.

Dunn, L. M. (1959). Peabody Picture Vocabulary Test. Nashville, TN: American Guidance Services

Feenstra, H. J. (1969). Parent and teacher attitudes: Their role is second-language acquisition. The Canadian Modern Language Review, 26, 5-13.

Francis, D. J., Fletcher, J. M., Stuebing, K. K., Davidson, K. C., & Thompson, N. M. (1991). Analysis of change: Modeling individual growth. Journal of Counseling and Clinical Psychology, 59, 27-37.

Francis, D. J., Shaywitz, S. E., Steubing, K. K., Shaywitz, B. A., & Fletcher, J. (1994). Measurement of change: Assessing behavior over time and within a developmental context. In G. Reid Lyon (Ed.). Frames of Reference for the Assessment of Learning Disabilities. Baltimore: Paul H. Brookes Publishing, 29-58.

Gardner, R. C. (1985). Social psychology and second language learning: The role of attitudes and motivation. London: Edward Arnold.

Halsted, H. (July, 1988). Foreign language instruction in elementary schools. The Wingspread Journal.

Herron, C. A. & Hanley, J. (1992). Using video to introduce children to a foreign culture. Foreign Language Annals, 25 (5), 419-26.

Lipton, G. (1990). A look back . . . a look ahead. Hispania, 73, 255-8.

Lipton, G. (1992). Practical handbook to elementary foreign language programs: Including FLES, FLEX, and immersion programs. Lincolnwood, IL: National Textbook Company.

Long, M. H. (1990). Maturational constraints on language development. Studies in Second Language Acquisition, 12 (3), 251-285.

Met, M. (1993). Second language learning in magnet school contexts. Annual Review of Applied Linguistics, 13, 71-85.

Muller, K. E., Ed. (1989). Languages in elementary school. New York: The American Forum.

Padilla, A. M. & Sung H. (1995). The role of student motivation, parental attitudes and involvement in the learning of Asian languages in the elementary and secondary schools. unpublished research report, Stanford University.

Postero, J. P. (1993). The politics of change: Implementation of FLEX in the public schools of Gilbert, Arizona. Hispania, 76, 621-626.

Redmond, M. L. (1994). The whole language approach in the FLES classroom: Adapting strategies to teach reading and writing. Foreign Language Annals, 27 (3), 428-44.

Richards, J. C. & Lockhart, C. (1994). Reflective teaching in second language classrooms. New York: Cambridge University Press.

Rosenbusch, M. (1987). Foreign language learning and children: The parental role. (ERIC Document Reproduction Service, no. ED 289 366).

San Jose, CA Unified School District, n.d. The Student Oral Language Observation Matrix.

Shumaker, N. W. (1992). FLES in rural Georgia. Hispania, 75, 417- 420.

Slavoff, G. R. & Johnson, J. S. (1995). The effects of age on the rate of learning a second language. Studies in Second Language Acquisition, 17 (1), 1-16.

Suckle, R. J. (1992). Is there a place for ACTFL proficiency testing in NASILP programs? The National Association of Self-Instructional Language Programs Journal, 1-8.

Tucker, G. R., Donato, R. & Antonek, J. L. (in press). Documenting a Japanese FLES program: Towards Goals 2000. Foreign Language Annals.

Watari, S. (1995). Developmental sequences in the acquisition of Japanese for American children. Unpublished research report. University of Pittsburgh

Table 1

Pro-I Ratings Across 3 Years of the Pilot JFL Program

Rating	1993	1994	1995
IL		1	2
IL/NH			1
NH	2	3	2
NMH	2	2	8
NM	6	11	12
NML	4	12	11
NL	16	7	4
NLL	2		2
	n=32	n=36	n=42

N and I indicate Novice and Intermediate level proficiency; L, M, and H indicate Low, Mid, and High.

Table 2

Significant Slopes for 7 Measures on the GCA

Student	Measures						
	JPVT	C	F	V	P	G	Pro-I
S1			X	X			X
S2	X						
S3							X
S4		X	X				
S5	X		X				
S6	X			X			
S7						X	
S8	X				-X		-X
S9				X			
S10		X				X	
S11	X		X				
S12			X				
S13			X				
S14	X						
S15	X						
S16	X			X			
S17				X			

X = positive significant slopes

-X = negative significant slopes

Table 3

Mean Scores on 3 JPTV Tests for Younger and Older Boys and Girls

	test 1	test 2	test 3	
boys	younger	12.57	16.20	17.04
	older	13.62	17.35	16.71
mean for boys		13.13	16.80	16.86
girls	younger	12.84	16.94	17.74
	older	14.19	18.02	17.95
mean for girls		13.48	17.44	17.84
total means		13.29	17.12	17.34

n=195

Notes

¹This research has been supported by a grant from the United States Department of Education to G.R. Tucker and R. Donato.

²The documentation we are proposing concerns all models of elementary foreign language programs (e.g., FLEX, FLES, FLES immersion, see Lipton, 1992). Our study, however, will look carefully at only one model of instruction - a "classic" FLES program in grades K-5 in the laboratory school of the University of Pittsburgh.

³The vocabulary items tested were: bus, bed, parachute, cow, knee, airplane, square, hippo, pencil, mother, bicycle, blue, shoulder, winter, vegetable, eyebrow, transportation, island, animal, many children, Bart is going, Bart is eating, elder brother, Wednesday, and lamb.

⁴ It is not the intention of this article to provide a comprehensive overview of the curriculum. For more information on the JFL curriculum, see Donato, Tucker, & Antonek, 1994.

⁵In the descriptions to follow we use the term *younger* to refer to children in kindergarten through grade 2 and *older* to refer to children in grades 3-5.

⁶ The majority of these parents represent children in the younger cohort (see section on student attitudes).

⁷Similar parental attitudes have been identified by Padilla and Sung (1995) in their study of attitudinal differences of parents of elementary and secondary learners of Chinese, Japanese, and Korean. Similar to our findings, they discovered that elementary school

parents had more positive attitudes toward foreign language learning and were more involved in the child's language study than parents of high school students.

⁸We point to this anecdotal observation because, elementary school teachers who are unaware of how foreign language are learned sometimes state that the learning of a foreign language at a young age can interfere with first language development and, in particular, English literacy skills.

⁹ It is important to point out that the issue of teacher involvement during Japanese instruction had never been formally discussed with the elementary staff and any participation by the faculty was voluntary. In attempting to document ambiance, we consciously took a "non-interventionist " approach to allow the effects of the program on the total elementary school staff to unfold naturally as they would in some school settings.

¹⁰ The teacher noted that one young learner cried every day for 10 days until the teacher began to use a little in English in class. Clearly the use of English for the child allowed her to be more attentive to the input than would have otherwise been the case if the teacher insisted upon exclusive target language use. However, it should also be noted that only 14% of all children reported anxiety in Japanese class on the Language and Culture questionnaire.

¹¹In 1993, a random sample of 2 boys and 2 girls from each of the 8 classes (n=32) was selected for the Pro-I. In 1994, we maintained the original thirty-two children for testing, added incoming children in the kindergarten class, and oversampled in the younger cohort,

resulting in a sample of thirty-six children. In 1995, we added to the original twenty-eight children in the sample and to the new entrants from year 2, first-year incoming students bringing the total number of the sample to forty-two. Across all three years, the original twenty-eight children remained constant and a healthy number of newcomers to the program were added.

¹²The purpose of this analysis is to depict broadly the types of significant change experienced by children in the sub-sample. The analysis is not intended to be an exhaustive data display of this statistical procedure. We have attempted, therefore, to distill from our analysis the most relevant information in order to capture linguistic growth in the sub-sample. For a detailed account of Growth Curve Analysis, see Francis et al., (1991) and Francis et al., (1994).