Language Attrition of Japanese Returnee Students

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Introduction

While development of the second language skills is easy to imagine, it is difficult to imagine a situation that instruction in the second language has no influence. The term fossilization, first discussed by Selinker (1972) means to become permanently established in the interlanguage of a second language learner in a form that is deviant from the target-language norm and it continues to appear in performance regardless of further exposure to the target language. Thus, the term fossilization relates to second language attrition in that no matter how hard the second language learner tries to develop the second language, no improvement will be made. Further language ability might deteriorate without use, which would especially be true for those who have lived in an L2 environment for a while and returned to their L1 environment.

The question posed for this paper is regarding Japanese returnee students, since according to Hansen, the documentation on Japanese returnees’ loss of ESL is still fragmentary (Hansen & Kurashige, 1999). This paper analyzes six primary articles that examine current attrition research of Japanese returnees in order to formulate pedagogical implications. The first two primary articles, which are more recent, state important findings in second language attrition; after returning to the L1 environment, L2 language skills continue to develop through a combination of classroom instruction and opportunities to use the L2 outside of the classroom. Three articles that follow indicate that attrition takes place at a slower pace for those who have studied the second language and acquired a threshold level. Finally, the sixth article, which examines a case of two siblings with differing ages, specifically questions if age is actually a significant variable in terms of L2 attrition. This study shows that the L2 learning environment could be a significant factor which influences attrition. The examination of all studies
demonstrate the importance of continuing second language education for returnees and provide ideas as to what returnees, parents and teachers can do for the returnees to retain and even develop their English as a second language.

Discussion of L2 Attrition Research of Japanese Returnees

Study I: Taura and Taura (2000)

First, Taura and Taura (2000) examined the linguistic attributes of L2 attrition of Japanese returnee children from English speaking countries. The purpose of this cross-sectional study was to help develop practical measures for returnee children to maintain their L2. In order to understand the overall language proficiency such as oral storytelling, writing, reading, listening comprehension and English/Japanese vocabulary, four experiments were conducted.

Six specific psycholinguistic aspects were investigated. This encompasses linguistic features including the number of words used, T-units, MLU (mean length of utterances in words), TTR (type token ratio), the duration of intra-sentential pauses, and features of writing samples taken by TOWL (Test of Written Language). The language data obtained from the experiments and the subjects’ language background data were analyzed and discussed to answer three research questions. First, does attrition take place even when returnee children take 4-5 one-hour lessons a week? Second, does attaining high proficiency before attrition sets in lead to slower and less attrition? Finally, does the longer period of time after leaving an English speaking country lead to more observation of attrition?

The researchers claim that the returnees’ English on return to Japan does not seem to suffer from attrition to the extent that previous studies show or the returnees themselves claim. The subjects, consisting of 6 experimental groups of Japanese returnee students with the mean age of 14.9 years old, were tested were including on a twofold basis. First, they must have had experiences of education in English speaking countries for more than three years at elementary or middle school level and second, they must have come straight to high school.

As for the explanation of the first component that the participants must have been educated in English-speaking countries for more than 3 years, Taura justified this with previous research (Harley et al, 1990; Minoura, 1991; Nakajima, 1998; Ono, 1994).
Research has shown that at least three years is necessary before Japanese students academically attain their grade norm skills in English after they move to North America, forming the basis of how this research is set up. Second, the subjects had to have come directly to the high school in Osaka where the research took place upon returning to Japan.

According to the first experiment, which used the Test of Written Language by Hammill and Larsen, the conventional component aspect which consists of punctuation, capitalization, and spelling, showed that greater the elapsed time since returning to Japan meant more attrition. However, for the context language aspect which is comprised of syntactic, morphological, and semantic elements, ones that have been back in Japan for the longest time frame scored better than the group that had been back the shortest time. Taura and Taura have noted that at least the context language aspect does not suffer from attrition, but further longitudinal and qualitative studies are clearly needed.

Moreover, experiment 2, where oral speaking skills were tested, showed that returnees’ speaking fluency in English seemed to become more sophisticated as they stayed longer in the L1 speaking communities with continuing English education, which contradicts previous findings. This is an understandable phenomenon that comes with cognitive development as a result of maturation, as when students are in high school, they are expected to express themselves in more sophisticated ways and learn ways to express themselves with more complexity through studying their native language, which is Japanese. Since students become more sophisticated in the use of Japanese, when studying English using Japanese, they are also likely to become sophisticated in their use of English. In addition to this, the question that inevitably arises is the following: why should this occur where L2 is minimally supported? For this experiment, the students that receive a one-hour English lesson per day are in a unique educational environment, where they share the same school site with Osaka International School which provides ample opportunities for the returnees to use English outside their classrooms if they choose. Having this unique opportunity might be the reason for this phenomenon. The researchers have noted that more subjects need to be studied in order to make conclusive comments, since only 10 returnees were tested. Additionally, an argument could be made that the time of interaction with native speakers outside of the classroom should be recorded as part of the experiment because the amount of interaction outside of the
classroom might have had significant influences in terms of maintenance of the students’ L2.

In experiment three, receptive skills that consist of reading and listening comprehension and productive writing skills were examined using the English Communicative Test. For all six groups, made up of 80 returnee subjects and divided by how long they have been back in Japan, no attrition of receptive and productive skills over time was indicated.

Finally, for experiment four, the English Vocabulary Test developed and scored by the Japan National Centre for University English Examinations, whose primary purpose is to test English vocabulary acquisition levels of Japanese returnee students as well as Japanese students currently living in English-speaking countries in comparison with English native speakers at the same grade level, was used. The subjects were 78 returnee students divided according to the amount of time elapsed since they left English speaking countries. It showed that there was gradual improvement of vocabulary as they stayed longer in Japan and studied at this school in Osaka where they are provided an hour long English lesson each day.

Study II: Taura (2001)
Another study was conducted by Hideyuki Taura (2001), where L2 attrition and retention of 26 Japanese returnee high school students were examined. The subjects were selected in the same way as his previous study. The research focused on two questions: whether attrition takes place even when the returnee children stay in touch with English in five one-hour long lessons a week and whether a longer period of time after leaving an English speaking country leads to more attrition.

The main finding of this research was that oral story telling skills improve the most in the fourth year back. Therefore, the subjects who have acquired the threshold level of English do not seem to suffer from attrition for at least several years after returning to Japan. This has been confirmed in Bahrick’s (1984) research as well. He concludes: “[T]he total amount of content to be forgotten during the five years following training is relatively constant for individuals at different levels of training, but this amount becomes progressively smaller proportion of total knowledge with higher levels of training” (116).
In the fifth year back, there seems to be no decline in vocabulary abundance and complexity rate from the previous year, but the fluency rate and the total number of words significantly dropped. In the sixth year, there seemed to be no change observed in TTR but the complexity rate dropped. As for the future scope of the experiment, Taura believes that the number of subjects, which was only 26, should be increased.

The two studies indicate that while 5 one hour English lessons a week may not be enough to combat attrition given the difference in exposure from an L2 environment, taking lessons at this frequency seems to be helpful. The two studies make it obvious that some use in English is better than nothing. In order to prevent attrition of English, one needs to obviously use it. The more frequent the use, the more likelihood there is of avoiding attrition and even improving language skills. This supports Neisser’s (1984) postulation: “some response strengths reach a critical threshold during learning: beyond that threshold they become immune to interference of decay” (33). It is interesting to note that for mature second language speakers, there seems to be an initial period when little attrition is observed despite language disuse. The improvement of English in Japanese high school returnees may have been due to the residual learning factor.

In another cross-sectional study of L2 loss in English which examined Japanese returnee children which contrasts mature second language speakers, Yoshida & Arai (1990) have concluded that for tasks that included repeating increasingly complex sentences, researchers found that the younger groups made significantly more errors than the older groups. However, this might simply be due to age, which means that younger learners have limited cognitive capacity, prohibiting younger learners from repeating complex sentences accurately.

Retention and improvement of English abilities might come from biological maturity and cognitive abilities as well as conceptual understandings that develop through maturation. Various age groups with various circumstances need different programs based on their levels of English and cognitive abilities for retention of English. Four more different case studies that examine younger age groups will be discussed hereafter.

Study III: Yoshitomi (1999)

Another study by Yoshitomi (1999) examined speech data of four female Japanese
returnee children under age twelve to avoid the inclusion of an additional variable that is introduced by the start of formal English education in Japanese junior high schools. The purpose was to first, verify whether some of the main findings in the field can be supported by the data obtained in the case study on Japanese returnees; and second, it was to discuss the pedagogical implications the results may have on improving language maintenance programs in Japan.

All subjects came from middle to upper-middle class families. The parents and children were aware that they would return to Japan after a stay of two to five years in America. Thus, they went to local American schools on weekdays and attended supplementary Japanese schools on Saturdays. After returning to Japan, they started to go to English maintenance schools on Saturdays. The subjects stayed in the US from three to four years. According to Nomoto (1973; cited in Minoura, 1981), English becomes the dominant language for most children after two to four years of stay. The children’s incubation periods were anywhere between zero and more than 12 months.

Five tasks were adopted: free interaction, story description, planned speech, listening comprehension, and interview and questionnaire. Free conversation between the subject and a native-English-speaker came from partially planned topics that were believed to be relevant to the child, and the child was free to expand or to move to other topics of her interest. In story description, each subject was asked to describe stories by looking at picture books. The child looked through the whole book once, then went back to the first page of the book and described the story from the beginning at her own pace. For planned speech, the subject was asked to think about a topic discussed during free interaction and expand on that topic and plan a short speech about it.

A controlled listening comprehension test was given, using Comprehensive Language Evaluation (CYCLE) developed by Curtiss & Yamada to measure children’s formal linguistic knowledge. The children’s task was to select a picture out of a set that corresponds to the sentence they hear. Finally, interviews were conducted between the researcher and the child, and then between the researcher and the parents in order to obtain information on socioeconomic, educational, sociopsychological, and personality factors of children and parents as second-party observers. Each session was 150-180 minutes long and was videotaped.

There were three main findings in the study. First, the returnees exhibited little
language attrition over the data collection sessions. Although high retention in phonological skills was predicted, the retention observed in the returnees’ ability to use other language sub-skills in production, including verb morphology, articles, and lexicon was better than expected.

Second, indications of language attrition were more evident in the regression of the returnees’ ability to combine the language sub skills. They made more errors in their use of complex structures and produced less error-free clauses over the sessions. More subtle indications of loss include a decrease in fluency and change in their use of communication strategies.

Lastly, attrition seemed to have taken place while the returnees had little or no opportunities to interact with a native speaker on an individual basis. Yoshitomi (1999) asserts that intuitively appealing ideas such as the regression hypothesis, which states that language components might be lost in the reverse order which they were acquired, should be reinterpreted, since regression takes place from weakening and eventually disappearing neuronal connections of overlapping linguistic knowledge. This hypothesis that questions the regression hypothesis, called inverse relation hypothesis states that what is retained the most through use and reinforcement is what is learned the best (Hamideh & Hamideh, 2006). Pedagogically, opportunities to interact with native speakers should lead to combating attrition because children will have to use English in order to communicate, whereas there is no need to communicate in English with speakers of Japanese.

Study IV: Tomiyama (1999)
Tomiyama (1999) has done a longitudinal study of natural second language attrition within an individual in the first language environment. The subject was a Japanese boy coming from an upper-middle-class family. His parents were well educated and proficient in English. He left Japan at the age of one years old when he was transferred to California, and returned home at eight. Only Japanese was spoken at home, but according to the mother, English became his dominant language by the final year abroad. He entered a local public school in Tokyo upon his return to Japan as a second grader. There were approximately a total of less than 16.5 hours of data-collecting
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sessions and 24 hours of English instruction over the period of a year and a half.

Six questions were highlighted for the study. First, are phonology, lexicon, morphology, and syntax differentially affected in attrition? Second, are productive skills more susceptible to attrition than receptive skills? Third, what is the speed of attrition? Fourth, how is fluency affected? Fifth, how does the subject compensate for the skills he is losing? Finally, can individual differences be observed?

Different linguistic skills including phonology, lexicon, morphology, and syntax were not affected in the same way by the attrition process. Attrition first manifested as lexical retrieval difficulty. There were some indications of attrition in morphology and syntax, but phonology and receptive lexicon remained robust during the course of observation. Additionally, although the subjects’ productive skill in the lexicon was first to be affected in the process as evidenced by the lexical retrieval difficulty, the receptive skills was virtually unaffected throughout the observation. This is in accordance with studies of Weltens et al. (1989), Bahrick (1984), and Cohen (1989). At 19 months, the subject of this research was still speaking spontaneously and willingly with morphology being relatively unaffected despite lexical retrieval difficulty and decreased fluency.

It is possible that he was at a stage of initial plateau, during which skills are relatively unaffected. However, this terminology has been associated with adult L2 learners’ attrition, and whether it is linked to attrition in children requires further investigation. It is also possible that the high level of acquisition made morphological elements stick. Another point to note is regarding the subjects’ code switching. He might have no longer felt natural expressing emotions in L2; however, this may not be an indication that he has lost his L2.

The author asserted that classroom-oriented research, namely, application of L2 attrition findings to language maintenance programs needed to be launched. Then in 2000, research was launched by Taura, but there still needs to be more documented cases for clear conclusive statements to be made. Further, it is necessary to clearly distinguish between nonacquisition and attrition.

Study V: Kurashige (1996)

According to Kurashige (1996), in 1992, over 96 percent of Japanese children on a
prolonged stay in North America attended local schools as opposed to Japanese schools administered abroad by the Japanese Ministry of Education. This means that children who have lived abroad had considerable amount of exposure and training in English. Therefore, English as a Second Language scholars like Kyoko Yashiro and others have worked together to introduce foreign language study at the upper elementary school level, but the Ministry of Education has resisted expansion of the curriculum in Japan because it runs counter to the current objective of eliminating Saturday classes to give a full two-day weekend.

However, in 1993, a few target elementary schools throughout Japan were selected to begin teaching foreign languages, including English, in the fifth and sixth grades. It might be wise for parents of returnee children to have their children enter elementary schools where there is English instruction. Given the number of returnees from English speaking countries, and the increasing dominance of English as a global market language, there is a recent change in policy. MEXT has finalized a policy to introduce English education starting at elementary schools in 2011 (Butler, 2007). This was because 92 percent of the parents support English activity in elementary school, according to the MEXT survey conducted in 2004 (cited in Torikai, 2006).

In Kurashige’s research, two questions were asked comparing three subject groups. The research questions were the following. First, what common changes and shifts over time occur in returnees’ use of verb forms in ESL narrations? Can any patterns of change over time be identified? Second, do the personal characteristics of returnees’ age, length of time abroad, length of time back, and proficiency level at study onset relate to their retention/attrition in using verbs? If so, what factors relate favorably to L2 retention? The three subject groups were 18 returnees, 10 Japanese children and 14 native English speakers. The three groups were compared in lexical and morphosyntactic assessments and then the study assessed the returnees individually two or three times during approximately 12-19 months.

The narrations were analyzed quantitatively and qualitatively. The measurements included type-token counts and ratios to determine vocabulary diversity and target-like usage assessments of accuracy in morphology. The qualitative analysis focused on comparisons between subjects’ initial and final descriptions of the same story pictures. The average age of children was nine years old and they had lived abroad for
an average of 2.4 years. The native English speakers had lived in the United States continuously and attended school there.

The study of 18 returnees found common changes and shifts in the use of English verb in storytelling. On the theoretical side, the study findings support the inverse hypothesis that the higher the subject’s proficiency, the lower the degree of attrition. It also substantiated the notion that attaining a critical threshold of competency militates against language loss. It further found that more than age or length of time abroad, proficiency in speaking was the best predictor for retaining accuracy in speaking. Kurashige argues that high-level students should maximize contextualized speaking practice, and this discourse should have time pressure. On the other hand, less proficient speakers need more explicit instruction including grammatical explanations.

Study VI: Tomiyama (2008)
Tomiyama (2008) in her recent study studied two siblings to find out whether any difference exists in the degree of second language attrition in terms of grammatical complexity, grammatical accuracy, lexical complexity, and lexical productivity based on their storytelling data collected over a period of 31 months. The siblings (one male, one female) have similar L2 profiles with respect to attained proficiency, including literacy, but differ in age. The ages of returning home were seven, an age reported to be more vulnerable to attrition, and ten, an age reported to be more resistant.

Their parents, both Japanese nationals, had college education and their mother, being a returnee from English-speaking countries herself, is particularly proficient in English. The older sibling, Eugene, was five years and eight months old and the younger sibling, Lily, two years and eight months old, when they moved to the United States due to their father's transfer to an office in Hartford, Connecticut. During their four years and four months of residence in Connecticut, they went through a local pre-school, kindergarten, and elementary school where the two were the only Japanese students. Thus they acquired English as their L2 in a natural setting. Eugene and Lily were both very active in extracurricular activities such as participating in sports, scouting, and summer camps, which shows that they were well immersed in American culture and L2 environment, receiving abundant L2 input from their daily lives throughout the year.

They were immediately placed in a local public school in Tokyo, Eugene in the
fourth grade, Lily in the first. Naturally, English input was drastically reduced in their surroundings. Other than occasional viewing of English videos and reading English books, the only opportunity for them to be exposed to English was an English maintenance program the school offered for returnees for one hour a week when the school was in session. However, their attendance was sporadic, and Eugene quit attending completely nine months after his return.

Their parents’ attitude and intention towards the children's bilingualism was that they hoped to establish their Japanese identity and solidify Japanese language while they were residing in Japan, since there was a possibility of moving to an English-speaking country once again. This concern for Japanese identity versus bilingualism stemmed from the mother's personal experience as a returnee. Therefore, while she thought L2 maintenance should not be neglected, she considered it very important for the children to lead a ‘normal life’ as Japanese children, and that L2 maintenance should not be exercised at the expense of risking this opportunity. Initially, she was not even sure if she should enroll the children in the maintenance program.

The major finding from this study is that the siblings showed similar attrition patterns suggesting that an attained high proficiency level including the acquisition of literacy skills is an important factor in the maintenance of L2. One exception was grammatical accuracy, but the difference surfaced only after the second year, indicating that the period of disuse was differentially affected according to their ages. The younger sibling's data also suggest that maturational factors may play a role in successfully handling grammatical complexity and accuracy simultaneously.

Conclusion: Pedagogical Implications Based on the Six Studies
In terms of the pedagogical implications, the purpose of looking at second language attrition research for many teachers is to understand the process of second language attrition and to help prevent students from losing the language. According to an aggregate of second language attrition research, unfortunately, the reality is that language skills deteriorate without use. It would be ideal to see that once one has learned a language, one can always save those skills in perfect condition, just like pushing a save button when writing a research paper. Unfortunately, our memory capacity is limited.

Looking specifically at the first five specific primary research articles, there are
several findings that might be helpful for teachers to keep in mind. First, it is important to note that English education of one hour a day for five weeks is helpful to combat attrition. Returnees should take full advantage of educational opportunities at school. It may be possible for teachers to get some young students to intrinsically be motivated to study English by stating research findings such as Taura and Taura’s that English education for one hour a day for five weeks is actually helpful in combating attrition and even developing English language ability. More returnee students may start paying attention in school if teachers make them aware of second language attrition findings.

In addition, if possible, an environment where there are opportunities to use English outside of school should be provided for students’ L2 development. Second, research done by Yoshitomi, Tomiyama, and Kurashige indicate problems with fluency, including lexical retrieval difficulties of returnees, which suggest the need for continual use and or training, if English is to be maintained or developed. For building fluency, it is important to interact with English speakers (Taura 2001).

There seems to be a stress on interacting with native speakers, who are viewed as ones who have mastered their language, and serve as perfect models, whereas interacting with those who are non-native in the non-native language is not wise, for it is impossible, to master a second language according to the critical period hypothesis and the concept of being unable to acquire the universal grammar system if one is not native. The problem with native speakers as perfect models is that native speakers often speak ungrammatically. Even through interaction with non-native speakers, there are exposures and exchanges of unfamiliar vocabulary, which helps retain vocabulary. Finally, the practice of speaking in English itself even to non-native speakers would help maintain fluency in L2, since the more advanced L2 speaker could correct the less advanced in their native language.

Another claim made by those in support of interaction with native speakers is that it is more natural to interact with native speakers in their language. The controversial question is should people who are non-natives not teach high level students? A possible answer to this is that high level students would not need any explanations in L1 so non-native teachers are not necessary. In terms of the likeliness of the teachers’ language to be standard English, perhaps, if a particular class is taught only in English, it might be wise for people hiring to hire native teachers to ensure that
teachers use standard English. However, as previously mentioned, native speakers produce English in non-standard ways all the time. Thus, if non-native teachers are native-like, I do not see problems in schools hiring them as teachers. One of the merits of hiring non-native teachers could be adding the depth of understanding the L2 through comparing the use of L1 and L2.

Unfortunately, the present norm in Japan seems to be that native-like speakers can teach high level students, but natives are preferred by many. It would be interesting to see comparative second language attrition research done based on high level students receiving instruction from non-native speakers versus students receiving instruction from native speakers, which may relieve tension on the ego battle of language teachers, and shed light on the reality of what teachers with certain backgrounds should teach students for them to keep improving.

The sixth article looks into the question of the significance of environment versus age. The two siblings, essentially being in the same environment followed a similar pattern of attrition. Let us take a hypothetical linear conclusion such as: it can be inferred from the study that since the two are siblings in a similar environment and they followed a similar attrition pattern, environment is a crucial factor. One cannot draw this conclusion since there are multiple factors in addition to environment such as age, personality, and attitudes towards language.

As can be seen from the studies, it becomes an arduous task to make distinctive conclusions about L2 attrition. This is clearly because language acquisition and attrition is composed of multiple factors as mentioned above. Trends and tendencies can be observed from looking at specific studies, but cases of attrition vary with the individuals. This is because all human beings experience different things where there is exposure and use of language. Not everything can be recorded and examined.

Looking at second language attrition data, however, several factors that tend to reduce L2 attrition are clear. First, classroom instruction is meaningful, even for the returnees. Thus, appropriate content should be taught for different levels. Second, opportunities to use the second language should be provided outside of the classroom, which will encourage maintenance and development. Finally, learners should be motivated and continue studying the L2 in order to retain the language once gained because maintenance or improvement cannot be sought without continual practice.
I am a returnee myself, who was educated in the United States from fourth grade to the time I graduated university. It has only been about three years since I have been back to Japan. Three months after I returned to Japan, I started working at an English conversation school, where I teach in English one hundred percent of the time and have a chance to speak to native speakers of English. In addition to that, six months after my return to Japan, I enrolled in an English-language graduate level education program where all courses are taught in English. Thus, even after returning to Japan, I have had ample opportunities for input and output in my L2. Even though any self-evaluation may be tainted with bias, I believe that I do not suffer from lexical retrieval difficulty as proposed in Tomiyama’s research (1999). This could be explained by my having reached a threshold level in my L2 as Bahrick (1984) illustrates and have also been in touch with the language more than five hours a week as suggested by Taura and Taura (2000). I hope to combat attrition through continual exposure and use of my second language. Based on personal experience, I believe that returnees share the desire to maintain or even improve their second language after returning to their home country. Thus, it would benefit them in being provided with such opportunities as it ensures continual L2 development.


