

Kanji Learning Mnemonic Strategies among Japanese for International Business (JIB) Students: A Questionnaire-Based Study

Kulaporn Numkiatsakul
*Japanese for International Business,
Faculty of Global Communication
Thai-Nichi Institute of Technology
Bangkok, Thailand
kulaporn@tni.ac.th*

Suwatana Daengsubha
*Japanese for International Business,
Faculty of Global Communication
Thai-Nichi Institute of Technology
Bangkok, Thailand
suwatana@tni.ac.th*

Abstract—This questionnaire-based study investigated the mnemonic strategies used by Japanese for International Business (JIB) students in learning kanji and examined how different strategy types relate to learners' self-perceived effectiveness in kanji retention. The study had three objectives: to identify the mnemonic strategies students use when learning kanji, to examine the relationship between strategy types and students' perceived effectiveness in improving kanji retention, and to determine which mnemonic strategy students perceive as the most effective. Data were collected from 107 JIB students at Thai-Nichi Institute of Technology, Thailand, using a structured questionnaire. The survey measured both the frequency of strategy use and students' perceived effectiveness of those strategies on a Likert scale. The strategy categories included imagery-based mnemonics, story and association methods, radical- and component-based analysis, keyword-based techniques, rote repetition, and digital study practices such as flashcard applications and spaced repetition. The data were analyzed using descriptive statistical methods to identify patterns of strategy use and examine associations between strategy types and perceived effectiveness. The results showed that students generally used multiple strategies rather than relying on a single approach, and perceived effectiveness varied across strategy types. Overall, writing kanji alongside its reading as a mnemonic aid was rated as the most effective strategy for improving kanji retention, while guessing meaning from contextual clues was among the most frequently used. These findings highlight the importance of explicit strategy instruction in kanji learning and suggest that integrating mnemonic training into students' study routines, including digital learning practices, may strengthen their strategic repertoire and support kanji retention in JIB contexts.

Keywords—*kanji learning; mnemonic strategies; perceived effectiveness; digital study habits; JIB students*

I. INTRODUCTION

The learning of kanji is widely recognized as a major challenge for learners of Japanese as a Foreign Language (JFL), particularly for those from non-kanji backgrounds such as Thai learners. Unlike learners from Sinosphere backgrounds, Thai learners do not have prior experience with logographic writing systems, which increases the cognitive

demands of learning kanji, including mastering complex forms, multiple readings, and meaning associations [1].

In the Thai context, Japanese language education is offered across various institutions, but learning conditions differ depending on program intensity. At the Thai-Nichi Institute of Technology (TNI), Japanese language study is a core requirement across all faculties. Among these, students in the Japanese for International Business (JIB) program represent a particularly intensive group, as they undertake the highest number of Japanese language credits and are required to acquire a large number of kanji within a limited timeframe. This intensive learning environment makes strategy use especially important for supporting kanji acquisition and retention.

To cope with these demands, learners employ a range of kanji learning strategies, including mnemonic techniques, association methods, and structural analysis of radicals and components. Previous research has shown that learners' perceptions of strategy effectiveness are related to their strategy use [2], [4], and that Thai learners tend to rely on a limited set of familiar strategies [5]. However, existing studies have largely examined either the types of strategies used or learners' perceptions of effectiveness separately.

The relationship between the strategies learners actually use and their perceived effectiveness remains underexplored in several important respects. First, there is limited research focusing specifically on Thai learners in intensive Japanese language programs such as JIB. Second, few studies have directly compared the frequency of strategy use with learners' perceived effectiveness within the same analytical framework. As a result, it remains unclear whether learners' actual study practices align with the strategies they believe to be most effective. Addressing this gap is important for developing instructional approaches that better reflect learners' real learning behavior, particularly in intensive and digitally supported learning environments.

II. RESEARCH OBJECTIVES

The purposes of this study were to explore the specific kanji mnemonic strategies utilized by Japanese for

International Business (JIB) students at the Thai-Nichi Institute of Technology and to examine the relationship between these strategy types and the students' self-perceived effectiveness in enhancing kanji retention. Furthermore, the research aimed to identify which mnemonic strategy was perceived by JIB students as the most effective for their Kanji acquisition.

III. LITERATURE REVIEW

Research on kanji acquisition in Japanese as a Foreign Language (JFL) has consistently identified learners' backgrounds, strategy use, and affective factors as key determinants of learning outcomes. In particular, learners from non-kanji backgrounds tend to experience greater difficulty than those from kanji-using backgrounds due to the lack of prior orthographic knowledge [1]. This gap requires learners to process multiple dimensions of kanji simultaneously, including visual form, meaning, and phonetic readings, which increases cognitive demands, as reading is a complex, multifaceted process involving multiple subskills and linguistic knowledge components [6], [7].

A substantial body of research has examined the role of learning strategies in kanji acquisition. Among these, mnemonic strategies have received considerable attention for their role in supporting memorization. Rose [3] found that L2 learners employ mnemonic techniques, such as imagery and association, although their usage varies considerably depending on individual preferences and learning contexts. Similarly, Huan [4] reported that learners' perceived effectiveness differs across kanji learning strategies and is positively associated with the frequency of strategy use. The study also indicated that learners at higher proficiency levels tend to perceive certain strategies as more helpful than those at lower levels.

In addition to mnemonic strategies, research has highlighted the importance of structural approaches, such as radical awareness and orthographic analysis. Studies have shown that understanding the internal structure of kanji, including radicals and components, can facilitate meaning inference and support learning [8], [7]. Extending this line of research, Watabe [9] developed a comprehensive scale of kanji vocabulary learning strategies for learners from non-kanji backgrounds, demonstrating that learners employ a wide range of strategies, including structural analysis and contextual inference. However, learners from alphabetic backgrounds may still face challenges in effectively applying these strategies due to their limited familiarity with character-based writing systems.

Affective factors, including learners' attitudes and beliefs, have also been shown to influence kanji learning outcomes. Mori and Shimizu [2] found that learners with positive attitudes toward kanji tend to engage more actively in learning and employ a wider range of strategies, whereas those with negative perceptions may be more likely to avoid engagement. These findings are consistent with broader research in second language acquisition [10].

Focusing specifically on Thai learners, Kobayashi [5] found that although learners employ a variety of strategies in learning kanji vocabulary, they tend to rely on a limited set of familiar techniques, which may not always correspond to their perceived effectiveness.

Despite these insights, there remains a lack of research examining the relationship between the strategies learners actually employ and their perceived effectiveness, particularly in intensive learning environments. Given the demanding nature of programs such as the Japanese for International Business (JIB) program at Thai-Nichi Institute of Technology, it is important to investigate how learners navigate these challenges and whether their strategy use aligns with their perceptions of effectiveness. Addressing this gap will contribute to a more nuanced understanding of kanji learning and support the development of pedagogical approaches that better reflect learners' actual practices.

IV. RESEARCH METHODOLOGY

A. Participants

The participants were 107 JIB students at Thai-Nichi Institute of Technology (TNI). All participants were Thai native speakers and non-kanji background learners of Japanese, with proficiency around JLPT N5–N4. Convenience sampling was used, participation was voluntary, and the study followed the institution's ethical guidelines.

B. Research Instrument

The research instrument was a structured questionnaire adapted from Kobayashi's kanji vocabulary learning strategy scale for Thai JFL learners [5]. Kobayashi's original instrument comprised 42 items across seven strategy categories. For the purposes of the present study, the items were reviewed and reorganized to better fit the TNI JIB context. As a result, 22 items were retained and regrouped into five strategy categories: (1) Rote Repetition and Review, (2) Imagery and Meaning Inference, (3) Association and Component Analysis, (4) Digital Media Learning, and (5) Seeking Cooperation and Assistance. This five-group framework consolidates Kobayashi's original seven categories into a more concise structure that is appropriate for the scope of the present study.

TABLE I. QUESTIONNAIRE ITEMS AND STRATEGY GROUPS

No.	Question Item	Strategy Group
1	Reviewing kanji vocabulary lists repeatedly	G1
2	Repeating/reciting readings silently	G1
3	Practicing writing kanji in large quantities	G1
4	Reviewing recently learned kanji; rewriting when forgotten	G1
5	Tracing strokes in the air while visualizing stroke order	G1
6	Guessing meaning from constituent kanji component meanings	G2
7	Guessing meaning from contextual clues	G2
8	Guessing meaning from kanji radicals	G2
9	Visualizing kanji as a mental photograph	G2
10	Memorizing on-yomi and kun-yomi readings	G2
11	Discovering patterns/rules in kanji independently	G3
12	Writing kanji alongside its reading as a mnemonic aid	G3
13	Learning kanji grouped by semantic category	G3
14	Breaking kanji into components and memorizing by parts	G3

No.	Question Item	Strategy Group
15	Imagining kanji characters while listening to songs	G3
16	Alternating between kanji reading and Thai translation aloud	G3
17	Using kanji learning applications	G4
18	Setting smartphone language interface to Japanese	G4
19	Using flashcards for repeated review in their free time	G4
20	Asking Japanese friends about kanji vocabulary	G5
21	Asking teachers about kanji vocabulary	G5
22	Practicing kanji collaboratively with peers	G5

Note. Items 17 examples: Imiwa, Kanji study, Quizlet. Item 19 includes both digital flashcard applications (e.g., Quizlet) and paper-based flashcards.

All 22 items were measured using two separate five-point Likert scales: frequency of use (1 = Never used, 5 = Always used) and perceived effectiveness for kanji retention (1 = Not effective at all, 5 = Very effective). This design allowed comparison between strategy use and perceived effectiveness, including the gap between the two. A five-point scale was adopted instead of the original four-point scale to allow for a neutral response.

C. Statistics Used and Data Analysis

To analyze the collected data, descriptive statistics were employed to examine the frequency of strategy use and perceived effectiveness of kanji learning strategies. The statistical measures used in this study were mean (M) and standard deviation (SD), and all analyses were conducted using JAMOVI.

D. Data Collection

The online questionnaire was administered using Google Forms and distributed through Google Classroom. Data was collected in early March 2026 over approximately one week.

V. RESULTS

A. Instrument Reliability

Internal consistency was assessed using Cronbach's α across three scales. The frequency-of-use scale yielded $\alpha = 0.836$ ($M = 3.13$, $SD = 0.58$), the perceived-effectiveness scale $\alpha = 0.890$ ($M = 3.62$, $SD = 0.59$), and the combined overall scale $\alpha = 0.914$ ($M = 3.37$, $SD = 0.53$). All values exceeded the conventional threshold of $\alpha \geq 0.70$, confirming sufficient internal consistency to support the subsequent analyses.

B. Item-Level Analysis

1) Frequency of Strategy Use:

The three most frequently used strategies were Item 7 ($M = 4.16$), Item 6 ($M = 3.85$), and Item 8 ($M = 3.77$), all from Group 2 (Imagery and Meaning Inference), indicating a strong preference for inference-based approaches. Conversely, the least used strategies were Item 20 ($M = 2.08$), Item 21 – asking teachers ($M = 2.36$), and Item 10 – memorizing on-yomi and kun-yomi readings ($M = 2.50$).

2) Perceived Effectiveness:

Overall, the students considered most strategies to be moderately to highly effective. Item 12, writing kanji together with its reading as a mnemonic aid, received the highest

effectiveness rating ($M = 4.12$, $SD = 0.90$). As part of Group 3 (Association and Component Analysis), this strategy appeared to be the most effective in the students' view. Item 4 ($M = 3.99$, $SD = 1.00$) and Item 21 ($M = 3.94$, $SD = 1.09$) were the next highest-rated strategies. By comparison, Item 10, memorizing on-yomi and kun-yomi readings, received the lowest rating ($M = 2.99$, $SD = 1.31$).

3) Frequency–Effectiveness Discrepancy:

The largest item-level gap was observed for Item 21 (asking teachers, gap = +1.58), followed by Item 20 (asking Japanese friends, +1.27) and Item 19 (spaced repetition flashcards, +1.09). These results indicate that certain high-value strategies remain systematically underutilized despite learners' positive evaluation of their effectiveness. Figure 2 visualizes the discrepancy scores for all 22 items, sorted from largest to smallest gap.

TABLE II. DESCRIPTIVE STATISTICS FOR MNEMONIC STRATEGY
FREQUENCY OF USE AND PERCEIVED EFFECTIVENESS (N = 107)

No.	Strategy	Grp	Freq M	Freq SD	Eff M	Eff SD
1	Reviewing kanji vocabulary lists repeatedly	G1	3.36	1.06	3.67	0.92
2	Repeating/reciting readings silently	G1	3.45	1.09	3.64	1.01
3	Practicing writing kanji in large quantities	G1	3.39	1.20	3.82	1.09
4	Reviewing recently learned kanji; rewriting when forgotten	G1	3.08	1.17	3.99	1.00
5	Tracing strokes in the air while visualizing stroke order	G1	3.36	1.36	3.51	1.16
6	Guessing meaning from constituent kanji component meanings	G2	3.85	1.16	3.71	1.01
7	Guessing meaning from contextual clues	G2	4.16	0.91	3.94	0.94
8	Guessing meaning from kanji radicals	G2	3.77	1.09	3.61	0.98
9	Visualizing kanji as a mental photograph	G2	3.26	1.16	3.31	1.09
10	Memorizing on-yomi and kun-yomi	G2	2.50	1.34	2.99	1.31
11	Discovering patterns/rules in kanji independently	G3	2.95	1.34	3.46	1.14
12	Writing kanji alongside its reading as a mnemonic aid	G3	3.68	1.12	4.12	0.90
13	Learning kanji grouped by semantic category	G3	3.21	1.10	3.69	0.99
14	Breaking kanji into components and memorizing by parts	G3	2.80	1.16	3.36	1.00
15	Imagining kanji characters while listening to songs	G3	2.67	1.43	3.09	1.26
16	Alternating between kanji reading and Thai translation aloud	G3	3.16	1.26	3.60	1.06
17	Using kanji learning applications	G4	3.07	1.32	3.66	1.11
18	Setting smartphone language interface to Japanese	G4	2.88	1.41	3.44	1.16

No.	Strategy	Grp	Freq M	Freq SD	Eff M	Eff SD
19	Using flashcards for repeated review in their free time	G4	2.71	1.34	3.80	1.06
20	Asking Japanese friends about kanji vocabulary	G5	2.08	1.33	3.35	1.22
21	Asking teachers about kanji vocabulary	G5	2.36	1.10	3.94	1.09
22	Practicing kanji collaboratively with peers	G5	3.08	1.21	3.83	1.09

Note. Freq M = Mean frequency of use; Eff M = Mean perceived effectiveness. Likert scale 1–5. G1–G5 denote the five strategy groups listed in Table I.

C. Group-Level Analysis

Group 2 (Imagery and Meaning Inference) recorded the highest mean frequency ($M = 3.51$), followed by Group 1 (Rote Repetition and Review, $M = 3.33$) and Group 3 (Association and Component Analysis, $M = 3.08$). Group 5 (Seeking Cooperation and Assistance) had the lowest mean frequency ($M = 2.51$), and Group 4 (Digital Media Learning) also reported relatively low frequency ($M = 2.89$). In terms of perceived effectiveness, Group 1 received the highest group-level mean ($M = 3.73$), followed by Group 5 ($M = 3.71$) and Group 4 ($M = 3.63$). These rankings contrast markedly with those based on frequency, indicating that the strategy categories most often employed are not necessarily those perceived as most beneficial.

The most pronounced frequency–effectiveness gap was found in Group 5 (+1.20), where social and teacher-assisted strategies are highly valued yet rarely incorporated into regular study. Group 4 also showed a notable gap (+0.75), indicating that digital tools such as flashcard applications are perceived as effective but remain underused. In contrast, Group 2 showed virtually no discrepancy (gap = 0.00), reflecting close alignment between habitual use and perceived value for inference-based approaches.

TABLE III. GROUP-LEVEL MEAN FREQUENCY, PERCEIVED EFFECTIVENESS, AND GAP ($N = 107$)

Strategy Group	Freq M	Eff M	Gap
Group 1: Rote Repetition and Review	3.33	3.73	+0.40
Group 2: Imagery and Meaning Inference	3.51	3.51	0.00
Group 3: Association and Component Analysis	3.08	3.55	+0.47
Group 4: Digital Media Learning	2.89	3.63	+0.75
Group 5: Seeking Cooperation and Assistance	2.51	3.71	+1.20

Note. Gap = Eff M – Freq M. Likert scale 1–5.

As shown in Fig. 1, Groups 4 and 5 exhibit the widest gaps between the frequency (blue) and effectiveness (red) bars. Group 5 has the lowest frequency bar overall ($M = 2.51$) yet achieves nearly the same effectiveness rating as Group 1 ($M = 3.71$), confirming the pronounced underutilization of social and cooperative strategies. Group 2's two bars are of equal height (gap = 0.00), confirming that inference-based strategies already operate at an equilibrium between habitual use and perceived value for this cohort.

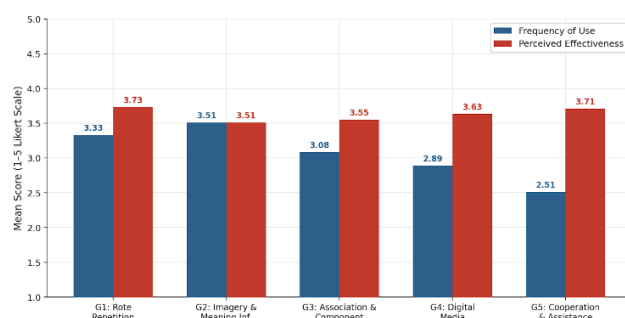


Fig. 1. Group-Level Mean Frequency and Perceived Effectiveness for Each Mnemonic Strategy Category ($N = 107$). Blue bars = frequency of use; red bars = perceived effectiveness. Likert scale 1–5.

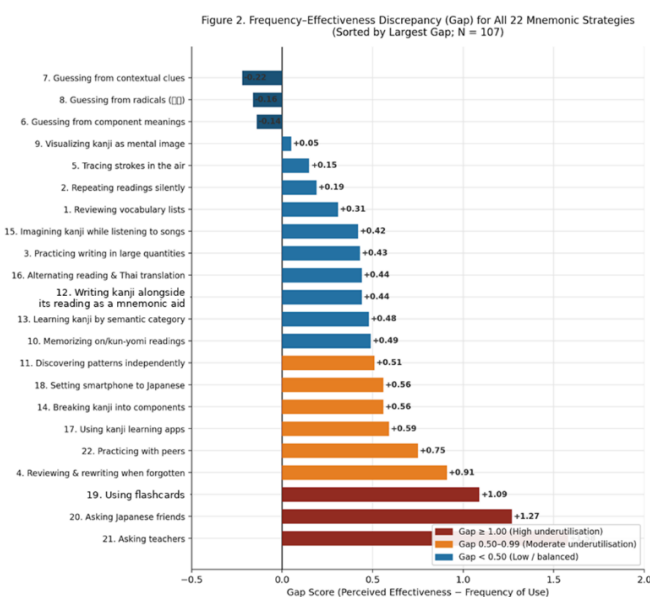


Fig. 2. Frequency–Effectiveness Gap for All 22 Mnemonic Strategies, Sorted by Largest Gap ($N = 107$). Gap = Eff M – Freq M. Dark red ≥ 1.00 (high underutilization); orange 0.50–0.99; blue < 0.50 .

Fig. 2 identifies Items 21, 20, and 19 as the three most underutilized strategies (dark red, gap ≥ 1.00). These strategies involve external assistance and technology-supported practice — precisely the categories that learners rate most highly for effectiveness yet engage with least frequently. Items 6–8 (inference strategies) appear at the bottom of the chart with near-zero gaps, confirming that inference-based approaches are the most balanced in terms of use-versus-value alignment. Items 21, 20, and 19 thus represent the highest-priority targets for explicit mnemonic strategy instruction in this JIB learning context.

VI. DISCUSSION AND FURTHER RESEARCH

A. Comparison with Previous Studies

The findings of this study indicate that JIB students frequently used meaning-based strategies, particularly guessing meaning from context and analyzing kanji components and radicals. This result is partly consistent with Huan [4], who reported that a context-based strategy was the most frequently used among Vietnamese JFL learners,

although the overall pattern of frequent strategy use included multiple strategy types. However, it differs from Kobayashi [5], who reported that Thai learners tended to rely more on affective and repetition-related strategies, with silent repetition being used more often than hand-writing repetition, rather than primarily on meaning-based inference strategies, and from Gamage [1], who reported repeated writing as the most frequently used strategy among beginner learners. These differences suggest that kanji learning strategy use may vary depending on learner background, learning environment, and instructional context. In the JIB program, students may be encouraged to interpret kanji through context and meaning rather than depend mainly on repetitive writing.

B. Interpretation of Key Findings

An important finding is that the strategy perceived as most effective was writing kanji alongside its reading as a mnemonic aid, although it was not the most frequently used strategy. This differs from Mori and Shimizu [2], who reported that Japanese L2 students in their study perceived rote memorization as the most effective category of kanji learning strategy. The result suggests that strategies students use most often are not always the ones they consider most helpful. In addition, asking teachers, asking Japanese friends, and using flashcards for repeated review in their free time showed the largest gaps between frequency and perceived effectiveness.

At the group level, Group 2 (Imagery and Meaning Inference) recorded the highest frequency of use but received the lowest perceived effectiveness score among the five strategy groups, although its mean score still indicated a moderate level of perceived usefulness. This pattern may be explained by the nature of inference-based strategies. Strategies such as guessing meaning from contextual clues, kanji components, or radicals are easy to apply during reading tasks and classroom activities because they do not require additional preparation, external resources, or consultation with others. Therefore, students may use these strategies frequently as immediate problem-solving tools when they encounter unfamiliar kanji.

However, frequent use does not necessarily mean that students regard these strategies as highly effective for long-term retention. Inference-based strategies may help students understand the meaning of kanji in a particular context, but they may not always support accurate recall of readings, written forms, or long-term memorization. This may explain why Group 2 was used most frequently but was rated lower in perceived effectiveness compared with rote repetition, digital media learning, and cooperation-based strategies. In other words, students may rely on inference-based strategies because they are practical and accessible, while still recognizing that other strategies may be more useful for retaining kanji over time.

In addition, asking teachers, asking Japanese friends, and using flashcards for repeated review in their free time showed the largest gaps between frequency and perceived effectiveness. This indicates that students recognized the value of these strategies but did not use them regularly. This pattern is consistent with Huan [4], who found that, for most of the surveyed kanji learning strategies, learners' perceived effectiveness ratings were higher than their reported frequency of use.

C. Pedagogical Implications

These findings have several implications for teaching. First, teachers should not assume that the most frequently used strategies are always the most effective for long-term kanji retention. In the case of Group 2, inference-based strategies should still be encouraged, but they should be combined with activities that reinforce accurate readings, meanings, and written forms. For example, after students guess the meaning of a kanji word from context or radicals, teachers can ask them to confirm the reading, write the kanji with its reading, and use the word in a short sentence. This may help students move from immediate comprehension to more stable retention.

Second, the underuse of Group 5 strategies should be interpreted in relation to the Thai learning context. Although asking teachers and Japanese friends were perceived as effective, students may hesitate to seek help directly. Previous studies on Thai learners' classroom communication suggest that sociocultural factors, such as reluctance to impose on others, respect for hierarchy, face-saving, and concern about troubling teachers or peers, can influence students' willingness to speak or ask questions in class [11], [12]. Therefore, the low frequency of help-seeking does not necessarily mean that students do not value these strategies. Rather, it may partly reflect classroom behavior shaped by Thai cultural expectations. Teachers can respond to this by normalizing help-seeking as part of learning, providing regular question time, using anonymous question forms, arranging small-group consultation, or assigning peer-supported kanji review tasks. These practices may reduce students' hesitation and make cooperative strategies easier to use.

Third, digital media learning should be made more concrete in classroom practice. Teachers can introduce specific types of tools, such as kanji learning applications, online kanji dictionaries with stroke-order functions, quiz-based apps, and flashcard tools. For flashcard use, students can create cards that show the kanji form on one side and the reading, Thai meaning, example word, or example sentence on the other side. Teachers may also guide students to use digital tools for regular kanji review, rather than using them only before tests. Previous research on flashcard learning and computer-assisted vocabulary learning suggests that flashcard systems and spaced review can support efficient vocabulary learning and retention [13], [14]. Although these studies were not conducted specifically with kanji learners, their findings provide a useful rationale for incorporating flashcard-based spaced review into kanji instruction in the JIB context.

D. Limitations and Further Research

This study has some limitations. The participants were limited to 107 JIB students from one institution, so the findings may not fully represent all Thai learners of Japanese. Moreover, the participants were limited to learners at the JLPT N5-N4 levels, so the findings may not apply to more advanced learners, the study used self-reported questionnaire data, which reflect students' perceptions rather than their actual learning behavior. The analysis also relied mainly on descriptive statistics and therefore could not explain causal relationships.

Future research should include learners from different institutions, proficiency levels, and academic program to

allow broader comparison. Qualitative methods such as interviews or learning journals may also help explain why students underuse strategies they consider effective. In addition, future studies could combine questionnaire data with achievement data or experimental instruction to examine whether explicit strategy training improves kanji retention over time.

VII. CONCLUSION

This study examined the kanji mnemonic strategies used by Japanese for International Business (JIB) students and explored the relationship between strategy use and learners' perceived effectiveness for kanji retention. The findings showed that students used a range of strategies rather than relying on only one approach. Inference-based strategies, particularly guessing meaning from contextual clues, kanji components, and radicals, were the most frequently used. However, the strategy perceived as most effective was writing kanji together with its reading as a mnemonic aid. These results suggest that the strategies students use most often are not always the same as those they consider most helpful for long-term retention.

The study also found that several strategies — particularly asking teachers, asking Japanese friends, and using spaced repetition flashcards — were seen as useful but were not regularly practiced. This points to a gap between what students actually do and what they believe works best. These findings highlight the importance of explicit strategy instruction in kanji learning, especially in intensive JIB contexts. Teachers should encourage students to make greater use of effective mnemonic, digital, and cooperative strategies to support kanji retention. These insights may also apply to other Japanese language programs that serve learners from non-kanji backgrounds. Future research should extend to learners from different institutions and proficiency levels, and should combine self-reported data with qualitative or performance-based methods to better understand how strategy instruction can improve kanji learning outcomes over time.

VIII. PRACTICAL APPLICATION IN JIB CONTEXT

To further extend the implications of this study, it is important to consider how mnemonic strategy instruction can be systematically integrated into the JIB curriculum. Given the intensive nature of Japanese language learning in the JIB program, structured support for kanji learning strategies should be embedded into classroom practice rather than left to individual learner preference.

One possible approach is the incorporation of short strategy-training sessions within regular kanji instruction. For example, instructors may explicitly demonstrate how to combine writing practice with phonological reinforcement, such as writing kanji alongside its readings, which was identified as the most effective strategy in this study. Additionally, guided activities that encourage students to consult peers, teachers, or native speakers could help normalize the use of cooperative strategies, which were found to be underutilized despite their high perceived effectiveness.

Furthermore, digital learning tools, particularly flashcard applications that help students review kanji regularly, can be

more actively promoted as part of structured homework or self-study tasks. Providing students with curated digital resources or integrating such tools into course requirements may reduce the gap between perceived usefulness and actual usage.

By systematically integrating these approaches, educators in JIB and similar programs can help learners develop a more balanced and effective strategy repertoire. This, in turn, may enhance long-term kanji retention and support learners in achieving the level of proficiency required for academic and professional communication in Japanese.

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