ISSN 1799-2591
Theory and Practice in Language Studies, Vol. 13, No. 1, pp. 27-34, January 2023
DOI: https://doi.org/10.17507/tpls.1301.04

Investigating the Relationship Among Metacognitive Awareness, Self-efficacy, and EFL Learners' Listening Comprehension Performance

Sudarat Payaprom
Department of English, Faculty of Humanities, Chiang Rai Rajabhat University, Thailand

***Abstract*—Listening comprehension is difficult for foreign language learners, but, in recent years, an increasing number of studies assert that enhancing learners' awareness of listening metacognition and self-efficacy can help address this issue. Accordingly, this research sought to 1) investigate the level of metacognitive listening awareness in performing listening comprehension and 2) to examine the association between EFL students' listening performance, self-efficacy, and metacognitive listening awareness. The sample comprised 256 third-year English-major students. Students' self-efficacy and their metacognitive listening awareness were measured using the English listening self-efficacy scale and Metacognitive Awareness Listening Questionnaire (MALQ), respectively. Data were analyzed using descriptive statistics and Pearson correlation coefficient. The findings indicated that the students possessed a modest level of metacognitive listening awareness. A strong positive relationship was observed between MALQ scores and listening comprehension ability. Listening self-efficacy was also discovered to be associated with students' listening proficiency. Additionally, the results of this research indicated a significant association between self-efficacy and students' awareness of listening metacognition. Overall, the results suggest that teaching EFL listening should place greater emphasis on learners' metacognitive listening awareness and self-efficacy to improve their listening skills.**

***Index Terms*—EFL learners, listening comprehension, metacognitive awareness, self-efficacy**

I. Introduction

Listening comprehension is hard for English as a Foreign Language (EFL) learners owing to numerous factors, such as a lack of control over the speaker's speed, an unfamiliar speaker accent, inability to get things repeated, the length of listening texts, limited grammar and insufficient vocabulary (e.g. Graham, 2006; Suwannasit, 2019). These various factors impede students' listening comprehension, which eventually affects their listening performances. However, listening is considered essential for the development of learners' second or foreign language.

In an attempt to enhance the listening skills of students, most prior studies focused on metacognitive awareness and the listening strategy used for L2 listening development (Goh & Hu, 2013; Li, 2013; Vandergrift et al., 2006). According to Vandergrift and Goh (2012), metacognitive awareness (or metacognitive knowledge) refers to a mental state in which we are aware of our own thoughts while concentrating on a specific cognitive or learning task. It has a crucial role in the process of learning, since it can influence a student's approach to learning by guiding them to plan, monitor, as well as gain control over their own learning and thinking processes (Goh & Hu, 2013). Additionally, it has been noted that learners with a relatively higher metacognitive awareness level have a better ability to process and store newly obtained knowledge and information, and they also have a better ability to choose appropriate strategies when dealing with listening tasks (Goh &Taib, 2006; Vandergrift et al., 2006).

Previous studies discovered the correlation between students' listening test performance and their metacognitive listening awareness (e.g. Al-Alwan et al., 2013; Goh & Hu, 2013; Li, 2013; Ratebi & Amirian, 2013; Vandergrift et al., 2006). Moreover, previous studies revealed that learner's metacognitive awareness was a major predictor of listening comprehension, accounting for 13-22% of the variation in listening comprehension (Goh & Hu, 2013; Vandergrift et al., 2006; Zeng, 2012). However, success in listening comprehension requires not only linguistic and schematic knowledge to construct meaning, it also requires learners' sense of self-efficacy for listening. Persons who have a greater degree of self-efficacy generally believe they possess the capability to exercise control over what they do, even in the face of adversity (Bandura, 1997). Previous research has shown self-efficacy to be positively associated with EFL listening achievement (e.g. Graham, 2011; Rahimi & Abedi, 2014; Taguchi, 2017).

In Thailand, listening comprehension remains a serious problem for Thai EFL learners, but very few studies (e.g. Khiewsod, 2016; Robillos, 2019) have probed into L2 learners' metacognitive awareness of listening. Furthermore, an association between students' self-efficacy, metacognitive listening awareness, and their listening test performance has never been investigated in Thailand. Thus, this research was conducted to answer two primary questions:

Research Questions

1. What is the EFL students' level of metacognitive awareness in listening?
2. Are there any relationships among EFL university students' self-efficacy, metacognitive listening awareness, and their performance on the listening test?

II. Relevant Literature

A. Metacognition and Metacognitive Awareness of L2 Listening

Empirical research has demonstrated that metacognition has a crucial influence on learners' success in second or foreign language learning (e.g. Latip et al., 2020; Sok & Shin, 2021; Valizadeh & Farvardin, 2020). The term "metacognition" was coined by Favell in 1970 (Flavell, 1979). It refers to people' awareness and knowledge of their cognitive processes and controlling such processes to achieve personal learning goals. The metacognitive theory was then applied to language learning (Wenden, 1998). It comprises two key components: metacognitive knowledge (knowledge of cognition) and metacognitive strategies (regulation of cognition) (Flavell, 1979; Wenden, 1998). As per Flavell (1979), knowledge of cognition is further subdivided into three groups, namely person, task, and strategic knowledge. Person knowledge is what individuals know about themselves as learners. It also involves the perceptions of their capabilities to perform specific tasks and factors affecting the overall failure or success in their learning such as gender, age, aptitude, as well as motivation. For task knowledge, it refers to the knowledge about the requirements, purpose, and characteristics of learning tasks. Task knowledge also involves procedural knowledge that need to accomplish any learning task. However, strategic knowledge involves strategies which the learners require for achieving the purpose of learning tasks. It entails knowing when and how to employ particular strategies in performing learning tasks (Goh, 2010; Wenden, 1999). Another component of metacognition is regulation of cognition, which is the application of metacognitive strategies to control the cognitive processes involved in learning. It is evident that learners with metacognitive approaches tend to be successful learners as metacognition enables them to monitor, manage, and have control over their own learning processes (Goh, 2008; Rahimirad, 2014). In other words, promoting metacognitive development in the classroom will assist students become more autonomous in their learning.

In the field of listening, the framework based on metacognitive theory (Flavell, 1979) for students' second language (L2) listening development was created by Vandergrift and Goh (2012). Students' metacognitive listening awareness includes their perception as listeners, their understanding of task demands, effective ways they will take to do the work and the strategies they employ to assist their overall listening comprehension. Several studies (e.g Latip et al., 2020; Goh & Hu, 2013; Sok & Shin, 2021; Valizadeh & Farvardin, 2020) have investigated students' awareness of listening metacognition using a Metacognitive Awareness Listening Questionnaire (MALQ) proposed by prior work (Vandergrift et al., 2006). The MALQ comprises 21 items assessing five factors that affect listening comprehension: planning and evaluation, problem solving, directed attention, (no) mental translation, and person knowledge. For example, Valizadeh and Farvardin (2020) explored the association between metacognitive listening awareness and L2 listening comprehension among Iranian EFL learners. The findings found a significant association between metacognitive listening awareness and L2 listening comprehension performance. Additionally, a strong positive relationship existed between problem-solving strategies and listening proficiency. Meanwhile, Goh and Hu (2013) examined metacognitive awareness in English listening among Chinese ESL students and found that the level students' metacognitive listening awareness in performing listening comprehension was medium. The findings showed that metacognitive listening awareness was significantly related to L2 listening proficiency and that problem solving and person knowledge significantly predicted L2 listening comprehension. Similar results were found in other studies, indicating that students' metacognitive awareness of listening correlates positively with their listening performance. Likewise, Latip et al.'s (2020) study of 169 Malaysian ESL learners, found a significant relationship between students' MALQ scores and their L2 listening proficiency. Additionally, person knowledge was positively related with scores on a listening test, whereas mental translation strategies and scores on listening test were inversely related. Recently, Sok and Shin (2021) exploring the influence of metacognitive awareness and aptitude on L2 listening performance with 107 Korean EFL learners, found that both metacognitive listening awareness and aptitude predicted L2 listening ability, accounting for 41 percent of the variation in the listening scores. The value of a correlation coefficient ranged from moderate to strong positive significant (e.g. Al-Alwan, et al., 2013; Goh & Hu, 2013; Latip et al., 2020; Ratebi & Amirian, 2013; Sok & Shin, 2021; Valizadeh & Farvardin, 2020).

Several studies also investigated metacognitive awareness in L2 listening between more- and less-skilled listeners by using MALQ. In one of those studies, Li (2013) revealed that the level of metacognitive listening awareness differed significantly between more- and less-skilled listeners. This was supported by Tavakoli et al. (2012), who observed that more-proficient listeners employed metacognitive strategies (problem solving) and cognitive strategies (directed attention) more frequently than the less proficient ones. A study involving Iranian university students also noted the existence of such differences (Ratebi & Amirian, 2013).

In sum, empirical research reviewed above shows that metacognitive awareness of listening helps students' listening comprehension. It helps learners regulate their listening processes and become more autonomous listeners. However, previous research (e.g. Goh & Hu, 2013; Latip et al., 2020; Rahimi & Abedi, 2014; Valizadeh & Farvardin, 2020; Sok & Shin, 2021; Taguchi, 2017) mainly focused on the correlation between listening comprehension performance and

learners' self-efficacy or metacognitive awareness. Hence, the present study extends previous research to examine the interplay among metacognitive listening awareness, self-efficacy, and L2 listening ability.

B. Self-Efficacy and L2 Listening

Almost twenty years of educational research has confirmed that self-beliefs are positively related to students' academic achievement. Among others, self-efficacy has been shown to have a significant positive effect on students' academic achievement across disciplines, including language teaching and learning (Kim & Shin, 2021; Wang et al., 2021). Self-efficacy has been considered a core structural component of Bandura's Social Cognitive Theory; this refers to an individual's belief in his or her own ability to complete a certain task or accomplish a goal. It determines the goals people set for themselves, the amount of effort that they put out in reaching a goal, and the duration they persist in the face of difficulties (Bandura, 1986, 1997). Students with strong self-efficacy frequently set difficult goals for themselves and adhere to them more tenaciously, which, in turn, influence their academic performances. Perceived self-efficacy also shapes the academic outcome expectations. Students with high self-efficacy expect themselves to attain favorable outcomes, such as a high grade, whereas those with low self-efficacy tend to question their abilities and visualize failure scenarios (Bandura, 1997; Schunk & DiBenedetto, 2016). According to Bandura (1997), four principal sources of self-efficacy include enactive mastery experiences, vicarious experiences, verbal persuasion, and physiological and affective states. Enactive mastery experience is identified as the main source of influence as it represents past success. Successful experiences raise self-efficacy beliefs, whereas repeated failures decrease efficacy beliefs (Bandura, 1997). Vicarious experience also contributes to efficacy. It refers to learning through modelled attainment or observing others' achievements. Watching other people complete a task successfully can motivate individuals who doubt their capabilities to carry out a given task (Bandura, 1986, 1997; Schunk & DiBenedetto, 2016). However, the effectiveness of enhancing efficacy beliefs through vicarious experience is strongly influenced by the model-observer similarity (Bandura, 1986, 1997). A third source of efficacy beliefs is verbal persuasion. Perceived self-efficacy is also influenced by feedback from significant others. Finally, physiological and emotional states such as stress, anxiety, mood, and arousal states can also affect individual's efficacy beliefs. Less-anxious learners tend to perform better in tasks than those with high level of anxiety (Bandura, 1997; Raoofi et al., 2012).

Previous research has revealed a link between students' listening achievement and their sense of self-efficacy (e.g. Bakti et al., 2019; Razmi & Jabbari, 2021; Taguchi, 2017; Todaka, 2017). For example, Bakti et al.'s (2019) survey of 40 Indonesian EFL students found that TOEFL listening score was significantly positively correlated to students' self-efficacy. Similar results were observed by Taguchi (2017) who investigated the self-efficacy effects on listening proficiency among Japanese EFL learners. They also noted that learners with a strong sense of efficacy achieved higher TOEIC listening scores than those with low self-efficacy. Likewise, a recent study involving 230 Iranian EFL learners by Razmi and Jabbari (2021) also found a significant association between self-efficacy and students' listening ability. Since self-efficacy is important for L2 listening development, it should be given due attention in EFL listening comprehension classes.

However, while earlier research has studied the association between self-efficacy and listening comprehension, less research has investigated self-efficacy in relation to students' metacognitive listening awareness (e.g. Rahimi & Abedi, 2014). Thus, more studies in the EFL context are warranted to investigate the correlation between these two variables.

III. Research Methodology

A. Participants

A cross-sectional study was carried out among undergraduates pursuing English major at Chiang Rai Rajabhat University. This research aimed to explore EFL learners' metacognitive awareness in listening and to examine the correlation among metacognitive listening awareness, self-efficacy, and students' listening comprehension. A total of 256 third-year students majoring in English were selected using purposive sampling to participate in this research. These EFL undergraduate students were required to complete two questionnaires: the MALQ and English listening self-efficacy scale.

B. Instruments

The listening test adapted from Payaprom (2000) was employed for the purpose of measurement of students' English listening comprehension performance. The 30-question multiple-choice listening test consisted of two lectures, where the topics were "Learning the first language" and "Global problems". The listening comprehension test was examined by three experts and had the index of item objective congruence (IOC) of 0.67-1.00. In addition, the test possessed adequate reliability (Kuder-Richardson coefficient = 0.78), and selected test items had an acceptable level of difficulty and discrimination indices. The participants were instructed that they would hear the audio recording once, and they had sufficient time to answer all questions. The number of correct answers were added together to form the sum of listening test score for each participant.

In this research, Vandergrift et al.'s (2006) MALQ was utilized for assessing the metacognitive listening awareness of participants regarding their perceived strategy use as well as their perceptions of anxiety and difficulty in L2 listening. The questionnaire comprises 21 items assessing five distinct factors of listeners' metacognitive knowledge. Each item

was measured by a 6-point Likert scale from "strongly disagree" to "strongly agree", with no neutral point. This questionnaire was divided into five subparts including person knowledge (3 items), planning and evaluation (5 items), problem-solving (6 items), directed attention (4 items), and mental translation (3 items). The four parts of MALQ were designed to assess listeners' metacognitive knowledge about strategy use, whereas person knowledge measures the perceived listening difficulties and self-confidence of L2 listeners in relation to the listening task. The planning and evaluation factor represents the strategies that students apply before (pre-listening preparation), during, and after listening (self-evaluation of their performance). Directed attention strategies are skills used for maintaining focus on tasks while listening. Problem solving represents strategies that listeners use for making inferences and monitoring such inferences. Mental translation strategies (Items 4,11 and 18) were assessed with three statements about obstacles that listeners should overcome to be effective listeners. In the questionnaire, items 3 and 8 (for person knowledge) as well as item 16 (for directed attention) contained negative words, while items 4,11 and 18 (for mental translations) were avoided in the case the language learners needed to become efficient listeners. Therefore, six items (3, 4, 8, 11, 16, and 18) were reversed scored. The total MALQ score was determined by adding the scores for all items and then divided by 21, since there were 21 questions (items). The average score of MALQ could range from 1 to 6. A high score represents higher level of metacognitive awareness in terms of perceived use of strategies and confidence in listening. Cronbach's alpha for the MALQ (0.83) and its subscales had sufficient internal consistencies (Planning and evaluation α =0.81; Problem solving α =0.86; Directed attention α =0.80; Person knowledge α =0.77; Mental translation α =0.74).

The second questionnaire was an English listening self-efficacy scale. A 10-item questionnaire on self-efficacy in listening that was developed by Todaka (2017) was used to assess participant's confidence in their listening skills. A 4-point Likert scale was used to report participants' responses ranging from "not at all true" to "exactly true". The sum of the item scores yielded the overall self-efficacy score, which ranged from 10 to 40. Cronbach's alpha for listening self-efficacy scale was 0.88, indicating sufficient reliability.

The researcher gained permission to utilize the MALQ and English listening self-efficacy scale in this study, and the original questionnaires without any modifications were used for the present study. In order to enhance participants' understanding of the questions, the Metacognitive Awareness Listening Questionnaire and English listening self-efficacy scale used in this study were independently translated into Thai language by the researcher and two English language teachers, who were fluent in both English and Thai languages. The differences between translation and interpreting were discussed until a consensus was reached. Thai versions of the questionnaires were then back-translated into English by two translators who were also fluent in both languages. The back-translated versions were compared to the original, and the points of divergence were identified and corrected to more closely correspond to the meaning of the original Thai text.

C. Data Collection

The Self-efficacy Scale for English listening was initially administered to the participants of the study. They had 15 minutes to complete the listening self-efficacy questionnaire. After this, they took a listening comprehension test. The researcher then distributed the MALQ questionnaire and specifically assured the participants that responses would have no effect on their grades in the course they were pursuing. The questionnaires were scanned for completeness prior to the analysis phase.

D. Data Analysis

Descriptive statistics were applied to calculate metacognitive listening awareness, self-efficacy, and listening test scores. Pearson product-moment correlation coefficients were performed to determine whether the two variables were significantly correlated. If the obtained p-value is less than 0.05, the results are considered statistically significant.

IV. Results

This study enrolled 256 third-year English-major students, where descriptive statistics analyzed the scores of the respondents' metacognitive listening awareness, self-efficacy, and listening proficiency. As illustrated in Table 1, the mean scores for metacognitive listening awareness and listening self-efficacy were 3.83 and 29.01, respectively. The students' mean score for listening comprehension test was 17.06.

TABLE 1
DESCRIPTIVE STATISTICS OF STUDY VARIABLES

	N	Total score	Mean	Median	SD.	Range	Maximum	Minimum
Metacognitive awareness of listening	256	6	3.83	3.76	0.30	2.38	5.48	3.10
Listening self-efficacy	256	40	29.01	28.50	2.33	8.00	33.00	25.00
Listening test scores	256	30	17.06	16.00	4.26	14.00	24.00	10.00

TABLE 2
DESCRIPTIVE STATISTICS OF METACOGNITIVE AWARENESS OF LISTENING AND THE FIVE SUBSCALES (N=256)

	No. of items	Mean	SD
MALQ	21	3.83	.30
Planning and evaluation	5	3.80	.38
Directed attention	4	3.94	.37
Problem solving	6	4.22	.44
Person knowledge	3	3.44	.51
Mental translation	3	3.36	.47

The mean of the overall metacognitive awareness of listening was 3.83 out of 6 (Table 2), suggesting that, generally, participants had a moderate degree of metacognitive listening awareness. The dominant strategies employed by the participants were problem solving (M = 4.22, SD =.44), directed attention (M = 3.94, SD =.37), and planning and evaluation (M= 3.80, SD=.38). The mean score for mental translation was the lowest (M= 3.36, SD =.47). Additionally, the students' mean score for person knowledge was 3.44, showing a moderate level of self-confidence in listening.

A Pearson product-moment correlational analysis was performed to determine the association among metacognitive listening awareness, self-efficacy, and listening comprehension test scores of students. Table 3 summarizes the findings. Students' listening comprehension test score was significantly associated with their metacognitive awareness in listening (r=.64, p<.05). The correlation coefficient (r) was .64, indicating that the two variables have a moderate linear relationship. Additionally, a significant association was observed between listening test performance and all subscales of the MALQ. The findings also found a positive link between students' metacognitive listening awareness and their self-efficacy. Furthermore, there was a positive association between learners' listening proficiency scores and their self-efficacy (r=.50, p<.05).

TABLE 3
PEARSON PRODUCT CORRELATIONS OF MEASURED VARIABLES

Variables	1	2	3	4	5	6	7	8
1. Listening test performance		.64**	.46**	.52**	.59**	.52**	.44**	.50**
2. MALQ			.62**	.53**	.60**	.56**	.74**	.37**
3. Planning and evaluation				.31**	.29**	.30**	.40**	.28**
4. Directed attention					.31*	.25	.25**	.29 **
5. Person knowledge						.51**	.37**	.34**
6. Mental translation							.30**	.36**
7. Problem solving								.26 **
8. Listening Self-efficacy								

**p=.01

V. DISCUSSION

The current study comprised two main objectives: (1) to explore the level of EFL students' metacognitive listening awareness; and (2) to examine the relationship among students' listening comprehension performance, metacognitive awareness, and self-efficacy. The findings showed that EFL students generally possessed a moderate degree of metacognitive awareness in listening (M= 3.83, SD =.30). In other words, the respondents were aware of the L2 listening process, the strategy use, as well as their confidence in terms of listening at intermediate level. A possible explanation for the moderate level of metacognitive awareness by our students may be that Thai EFL learners have limited exposure to a variety of listening activities. In Thailand, the teaching of listening comprehension places a greater emphasis on the listening test results rather than the listening process (how to listen). In addition, there is no explicit listening strategy instruction in the EFL curriculum of most universities in the country, thereby limiting undergraduates' knowledge of listening processes and listening strategies to facilitate comprehension. Accordingly, students' awareness of listening metacognition was at a moderate level in this study. Other researchers also found similar results in their work (Goh & Hu, 2013; Liu & Goh, 2006; Rahimi & Abedi, 2014).

Out of all the five factors, problem-solving strategies were mostly applied, followed by directed attention, and planning and evaluation strategies, accordingly. The high level of metacognitive listening awareness for problem-solving strategies showed that students used inferencing strategies (i.e. using clues to determine appropriate meaning of unfamiliar terms and interpreting the spoken text based on their previous understanding to make sense of incoming information) more often than others to overcome difficulties encountered during the listening comprehension process. In other words, they relied on background knowledge and context. Directed attention ranked second highest with a mean score of 3.94 (SD = .37), indicating that the participants tended to use this strategy to maintain and regain concentration on a listening task. For planning and evaluation strategies, the mean score was at a moderate level (M=3.80, SD=.38). According to Vandergrift et al. (2006), learners deployed such particular strategies to better prepare for listening and evaluate their efforts. Planning and evaluation strategies are considered crucial for L2 listening as they have positive influence on listening performance (Vandergrift, 2003; Wenden, 1998). The modest metacognitive listening awareness for planning and evaluating strategies found in this research underlines the necessity for teaching listening strategies explicitly to EFL students.

Person knowledge and mental translation strategies were seldom used when compared to others. Person knowledge included three items assessing students' perception of the difficulty in listening comprehension, their confidence in L2 listening, as well as anxiety level associated with listening. Person knowledge received the second lowest mean rank (M=3.44, SD=.51). The findings revealed that, in general, Thai EFL learners perceived listening skills to be more complex and difficult to acquire than other language skills. In fact, some students acknowledged feeling anxious while listening. This can be attributed to our students not having enough knowledge regarding listening processes and strategy use. When they were unable to comprehend spoken texts, they lost control over the L2 listening process and their self-confidence (Ratanapruks, 2015; Robillos, 2019).

Additionally, the present study found mental translation to be the least frequently used by the participants. Mental translation strategies have been defined as inefficient methods for listening comprehension. These strategies involve translating the target language (L2) to the native language (L1) (Vandergrift et al., 2006). In the present study, participants scored lowest in mental translation strategies (M=3.36 SD=.47). The mean score indicated that students used some mental translation strategies to compensate for the deficit in L2 language proficiency (Bonk, 2000; Goh, 2000). These findings support previous research suggesting the development of learners' awareness of listening metacognition for the listening courses (e.g. Goh & Hu, 2013; Vandergrift, 1999). The results are in line with those by Rahimi and Katal (2012), Goh and Hu (2013), and Rahimi and Abedi (2014), who discovered that, overall, EFL students only had an intermediate level of metacognitive listening awareness.

In relation to the second research objective, significant positive correlations were observed among listening ability, MALQ scores, and listening self-efficacy (Table 3). Students who reported a higher metacognitive awareness in listening, tended to perform better in L2 listening. There is extensive evidence that students' awareness of listening metacognition has been shown to have positive effects on their listening comprehension achievement (e.g. Goh & Hu, 2013; Li, 2013; Vandergrift, 1997, Vandergrift et al., 2006; Zeng, 2012). It has been argued that metacognitive awareness of listening enables learners to take an active role in managing and self-regulating their listening and learning processes, as well as selecting appropriate strategies or special techniques to enhance their listening comprehension (Goh, 2008; Vandergrift, 1999). Additionally, this study found listening self-efficacy to be strongly associated with metacognitive awareness of listening. This supports the fact that students with a high degree of efficacy have greater control over listening tasks. They are more aware of certain listening strategies and are able to employ them more effectively (Rahimi & Abedi, 2014).

Furthermore, Pearson's correlation coefficient was calculated. The results (Table 3) showed that there was a correlation between students' listening self-efficacy and their listening test scores, meaning students with higher self-efficacy scored higher for listening tasks than those with lower self-efficacy. Self-efficacy refers to a person's belief that he or she is capable of performing a certain activity or task successfully. It can influence goals, outcome expectancies and motivation. Individuals with high self-efficacy have confidence in executing tasks successfully and tend to set higher goals, commit to them (goals), and persevere in the face of adversities (Bandura, 1997). Conversely, low self-efficacy people are more likely to avoid challenging tasks as beyond their capabilities, lack motivation, put less efforts into the task, and give up more easily in the face of difficulties (Mills et al., 2006). Accordingly, Self-efficacy is a key determinant of task performance. Previous studies concluded that learners with high self-efficacy experienced lower anxiety than those with low self-efficacy (Bandura, 1997; Mills et al., 2006). This is because perceptions of self-efficacy help listeners to cope more effectively with the demands and nature of listening tasks (Graham, 2011). Prior research has shown a positive link between students' sense of efficacy and their listening achievement (e.g. Rahimi & Abedini, 2009; Taguchi, 2017).

The findings of the current study provided useful information to improve EFL students' English listening skills. The participants' listening comprehension ability was discovered to be significantly associated with metacognitive listening awareness and with self-efficacy beliefs. This implies that enhancing metacognitive awareness in listening could sharpen students' listening skills and increase their self-efficacy for listening. Students who have higher metacognitive awareness in listening are better at processing and retaining what they hear, as well as using appropriate strategies to deal with the listening inputs (Vandergrift et al., 2006). It has also been suggested that metacognitive instruction in listening could improve learners' self-efficacy, their ability to apply suitable strategies, and awareness of their listening and learning processes, thereby making them feel more confident in handling listening tasks (Goh, 2008; Liu & Goh, 2006; Vandergrift, 2004). Hence, one possible way of raising students' awareness about the listening processes is by holding discussions during pre- and post-listening sessions. For example, during the pre-listening phase, students must be prepared to predict what they are going to hear and what they are expected to do. They should also be encouraged to anticipate potential problems, to consider ways to solve such problems, and to determine the best strategies for addressing certain tasks. Upon completing the tasks, they can discuss the suitability of the strategies used and the factors affecting their listening comprehension (Goh, 1997; Li, 2013; Vandergrift, 1999). This way, students can assess themselves and choose appropriate strategies to hone their listening skills. In addition, teachers should encourage the use of effective strategies to develop listening comprehension by giving guidance, modelling techniques and strategies, and conducting scaffolded listening practices (Goh, 2008). Furthermore, students should be encouraged to examine their person knowledge by reflecting on their feelings, the challenges they face while listening and finding ways to deal with them.

This current study has also found listening self-efficacy to correlate positively with students' performance in listening. One way teachers can help students develop their self-efficacy is by assigning listening tasks that are tailored to language proficiency levels of students. Successful execution of these tasks represents a key factor in building self-efficacy (Chen, 2007). Teachers giving positive feedback and encouragement can also raise self-efficacy beliefs. In fact, previous studies have found a positive relationship between self-efficacy and listening achievement (i.e. Chen, 2007; Rahimi & Abedini, 2009).

This research was carried out at one university in Thailand. Thus, the generalizability of study results was limited. Additionally, self-report questionnaires were used to collect data. Therefore, future research should seek to replicate the findings in larger samples and incorporate both quantitative and qualitative data into the study to provide a more comprehensive understanding of L2 learners' metacognitive listening awareness. Despite its limitation, the results of this research may have substantial implications for enhancing students' English listening skills at Chiang Rai Rajabhat University, Thailand, or other settings with similar EFL teaching situations.

VI. Conclusion

The present study sheds light on undergraduate EFL learners' metacognitive listening awareness and their self-efficacy. The results of this research revealed that EFL listeners possessed a moderate level of metacognitive listening awareness. In addition, the findings provide further evidence of a positive relationship among students' self-efficacy, metacognitive awareness, and their listening comprehension achievements. This underscores the need to integrate metacognitive awareness instruction in EFL classrooms to improve students' listening comprehension. Classroom activities that can help develop students' sense of efficacy should also be promoted. By fostering students' sense of efficacy and improving their metacognitive listening awareness, they can achieve comprehension success and become a better listener.

References

[1] Al-Alwan, A., Asassfeh, S., & Al-Shbou, Y. (2013). EFL Learners' Listening Comprehension and Awareness of Metacognitive Strategies: How Are They Related? *International Education Studies, 6*(9), 31-39. https://dx.doi.org/10.5539/ies.v6n9p31

[2] Bakti. A. M. P, Sofyan, D., & Elfrida. (2019). The correlation between students' self-efficacy and their listening comprehension. *Journal of English Education and Teaching, 3*(1), 66-77.

[3] Bandura, A. (1986). *Social fondations of thought and action: A social cognitive theory*. Prentice-Hall.

[4] Bandura, A. (1997). *Self-efficacy: the exercise of control*. Freeman.

[5] Bonk, W. (2000). Second language lexical knowledge and listening comprehension. *International Journal of Listening, 14*, 14-31. https://doi.org/10.1080/10904018.2000.10499033.

[6] Chen, H.Y. (2007). *The relationship between EFL learners' self-efficacy belief and English performance* [Unpublished doctoral dissertation]. The Florida State University, Florida, USA.

[7] Flavell, J. H. (1979). Metacognition and cognitive monitoring: A new area of cognitive-developmental inquiry. *American Psychologist, 34*, 906-911. https://doi.org/10.1037/0003-066X.34.10.906

[8] Graham, S. (2006). Listening comprehension: The learners' perspective. *System, 34*(2), 165-182. https://doi.org/10.1016/j.system.2005.11.001

[9] Graham, S. (2011). Self-efficacy and academic listening. *Journal of English for Academic Purposes, 10*, 113-117. https://doi.org/10.1016/j.jeap.2011.04.001

[10] Goh, C. (1997). Metacognitive awareness and second language listeners. *ELT Journal, 51*(4), 361–369. https://doi.org/10.1093/elt/51.4.361

[11] Goh, C. (2000). A cognitive perspective on language learners' listening comprehension problems. *System, 28*(1), 55-75. https://dx.doi.org/10.1016/S0346-251X(99)00060-3.

[12] Goh, C. (2008). Metacognitive instruction for second language listening development: Theory, practice and research implications. *RELC Journal, 39*(2), 188-213. https://doi.org/10.1177/0033688208092184.

[13] Goh, C. (2010). Listening as process: Learning activities for self-appraisal and self-regulation. In N. Harwood (Ed.), *English language teaching materials* (pp. 179-206). Cambridge UniversityPress.

[14] Goh, C. & Hu, G. (2013). Exploring the relationship between metacognitive awareness and listening performance with questionnaire data. *Language Awareness, 23*(3), 255–274. https://dx.doi.org/10.1080/09658416.2013.769558.

[15] Goh, C., &Taib, Y. (2006). Metacognitive instruction in listening for young learners. *ELT Journal, 60*(3), 222-232. https://doi.org/10.1093/elt/cc1002.

[16] Khiewsod, M.P. (2016). *Metacognitive listening strategies used by high school students in Bangkok* (Master thesis). Thammasat University, Thailand. Retrieved November 21, 2020, from http://ethesisarchive.library.tu.ac.th/thesis/2016/TU_2016_5821042636_6921_4683.pdf.

[17] Kim, S. H., & Shin, H. W. (2021). Second Language Learners' self-efficacy and English Achievement: the Mediating Role of Integrative Motivation. *English Teaching & Learning, 45*(3), 325–338. https://doi.org/10.1007/s42321-021-00083-5.

[18] Latip, N. A. A., Swanto, S., Din, W. A. (2020). Metacognitive Awareness of Listening Strategies among Science Pre-University Students. *Universal Journal of Educational Research, 8*(11), 5265-5270.

[19] Li, W. (2013). A Study of metacognitive awareness of non-English majors in L2 listening. *Journal of Language Teaching and Research. 4*(3): 504-510. https://doi.org/10.4304/jltr.4.3.504-510.

[20] Liu, X.L., & Goh, C. (2006). Improving second language listening: Awareness and involvement, In T.S.C. Farrell (Ed.), *Language Teacher Research in Asia* (pp. 91-106). TESOL.

[21] Mills, N., Pajares, F., & Herron, C. (2006). A reevaluation of the role of anxiety: Self-efficacy, anxiety, and their relation to reading and listening proficiency. *Foreign Language Annals, 39*(2), 276-294. https://doi.org/10.1111/j.1944-9720.2006.tb02266.x
[22] Payaprom, S. (2000). *A Study of the Relationship Between Listening Strategies and Listening Ability of Fourth-Year English Majors* [Unpublished Master Thesis]. Srinakharinwirot University.
[23] Rahimi, M., & Katal, M. (2012). Metacognitive listening strategies awareness in learning English as a foreign language: A comparison between university and high-school students. *Procedia-Social and Behavioral Sciences, 31*, 82-89. https://doi.org/10.1016/j.sbspro.2011.12.020.
[24] Rahimi, A. & Abedini, A. (2009). The interface between EFL learners' self-efficacy concerning listening comprehension and listening proficiency. *Novitas-ROYAL, 3*(1), 14-28. https://doi.org/10.1016/j.sbspro.2011.12.019.
[25] Rahimi, M., & Abedi, S. (2014). The relationship between listening self-efficacy and metacognitive awareness of listening strategies. *Procedia-Social and Behavioral Sciences, 98*(6), 1454-1460. https://doi.org/10.1016/j.sbspro.2014.03.565
[26] Rahimirad, M. (2014). The impact of metacognitive strategy instruction on the listening performance of university students. *Procedia-Social and Behavioral Sciences, 98*, 1485-1491. https://doi.org/10.1016/j.sbspro.2014.03.569.
[27] Ratanapruks, A. (2015) *The description and evaluation of listening on a Thai university fundamental English course: A case study* [PhD thesis]. University of Essex.
[28] Ratebi, Z., & Amirian, Z. (2013). The use of metacognitive strategies in listening comprehension by Iranian university students majoring in English: A comparison between high and low proficiency listeners. *Journal of Studies in Education, 3*(1), 140-154. https://dx.doi.org/10.5296/jse.v3i1.2969.
[29] Raoofi, S. Tan, B.H. & Chan, S.H. (2012). Self-efficacy in Second/Foreign Language Learning Contexts. *English Language Teaching, 5*(11), 60-73. https://doi.org/10.5539/elt.v5n11p60.
[30] Robillos, R.J. (2019). Crossing Metacognitive Strategy Instruction in an EFL Classroom:Its Impact to Thai Learners' Listening Comprehension Skill and Metacognitive Awareness. *The Asian EFL Journal, 21*(2.2), 311-363.
[31] Razmi, M. H., & Jabbari, A. A. (2021). An Investigation into Perfectionism, self-efficacy, Metacognitive Strategy Use, and Second Language Listening Comprehension: A path analysis approach. *Jounal of Teaching Language Skills, 40*(2), 119-159.
[32] Schunk, D. H., & Di Benedetto, M. K. (2016). Self-efficacy theory in education. In K. R. Wentzel, & D. B. Miele (Eds.), *Handbook of motivation at school* (2nd ed.), pp. 34–53). Routledge.
[33] Sok, S., & Shin, H.W. (2021). Investigating the Role of Cognitive variables in Second Language Learners' Listening Comprehension: Aptitude and Metacognitive Awareness. *International Journal of Listening*, 1-14. https://doi.org /10.1080/10904018.2021.1954926.
[34] Suwannasit, W. (2019). EFL Learners' listening problems, principles of teaching listening and implications for listening instruction. *Journal of Education Naresuan University, 21*(1), 345-359.
[35] Taguchi, K. (2017). A Follow-up study on listening strategy use and self-efficacy in relation to listening proficiency in EFL. *The Economic Review of Toyo University, 42*(2), 155-166.
[36] Tavakoli, M. Shahraki, S.H., Rezazadeh, M. (2012). The Relationship between metacognitive awareness and EFL listening performance: Focusing on IELTS higher and lower scorers. *The Journal of Language Teaching and Learning, 2*, 24-37.
[37] Todaka, Y. (2017). Self-Efficacy of English listening skills in Japanese college EFL learners: Quantitative and qualitative analyses. *European Journal of English Language Teaching, 2* (1), 93-120. https://doi.org/10.5281/zenodo.321540.
[38] Valizadeh, F. & Farvardin, M.T. (2020). The Relationship between Metacognitive Awareness and L2 Listening Comprehension Performance in Junior High School Students. *International Journal of Linguistics, Literature and Translation, 3*(6), 40-45.
[39] Vandergrift, L. (1997). The comprehension strategies of second language (French) listeners: A descriptive Study. *Foreign Language Annals, 30*, 387-409. https://doi.org/10.1111/j.1944-9720.1997.tb02362.x.
[40] Vandergrift, L. (1999). Facilitating second language listening comprehension: acquiring successful strategies. *ELT Journal, 53*(3), 168-176. https://doi.org/10.1093/elt/53.3.168.
[41] Vandergrift, L. (2003). From prediction through reflection: Guiding students through the process of L2 listening. *Canadian Modern Language Review, 59*, 425-440. https://doi.org/10.3138/cmlr.59.3.425.
[42] Vandergrift, L. (2004). Listening to Learn or Learning to Listen?. *Annual Review of Applied Linguistics, 24*, 3–25. https://doi.org/10.1017/S0267190504000017.
[43] Vandergrift, L., Goh, C. Mareschal, C.J. & Tafaghodatari, M.H. (2006). The Metacognitive Awareness Listening Questionnaire (MALQ): Development and validation. *Language Learning, 56*, 431-462. https://doi.org/10.1111/j.1467-9922.2006.00373.x.
[44] Vandergrift, L., & Goh, C. (2012). *Teaching and learning second language listening: Metacognition in Action.* Taylor & Francis.
[45] Wang, Y., Shen, B., & Yu, X. (2021). A latent profile analysis of EFL learners' self-efficacy: Associations with academic emotions and language proficiency. *System, 103*, 1-12. https://doi.org/10.1016/j.system.2021.102633
[46] Wenden, A. L. (1998). Metacognitive Knowledge and Language Learning. *Applied Linguistics, 19*(4), 515–537. https://doi.org/10.1093/applin/19.4.515
[47] Wenden, A. L. (1999). An introduction to metacognitive knowledge and beliefs in language learning: Beyond the basics. *System, 27*(4), 435-441. https://doi.org/10.1016/S0346-251X(99)00043-3
[48] Zeng, Y. (2012). *Metacognition and self-regulated learning (SRL) for Chinese EFL listening development*. NIE Digital Repository Library and Information Services Center. Retrieved February 11, 2021, from http://hdl.handle.net/10497/4668

Sudarat Payaprom works as an instructor in the Department of English, Chiang Rai Rajabhat University, Thailand. She got her Ed.D. in TESOL from the University of Wollongong, Australia. Her research interests include English Language Teaching (ELT) and Systemic Functional Linguistics (SFL).