

SPECIAL ARTICLE

How to Exploit China's AI-powered Platforms for Korean-Chinese Translation/Interpreting Education

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ABSTRACT: In the wake of the Fourth Industrial Revolution, artificial intelligence (AI) is rapidly transforming human lives at an unprecedented rate. As this new era begins and technological advancements continue to accelerate, there appears to be a parallel need for corresponding changes and reforms in the field of translation and interpretation education. Indeed, many interpreters and translators now incorporate automated translation tools in their work, and a significant number of researchers are advocating for the application of AI platforms in translation and interpretation education, proposing innovative teaching methods. Among these innovations, various platforms developed specifically for interpreter training can be categorized into training-based platforms, data storage-based platforms, and interpreter material storage-based platforms. This paper delves into the impact of such platforms on translation

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and interpretation education, with a particular focus on the neighboring country of China, which extensively utilizes Learning Management System (LMS)-based smart cloud platforms, AI platforms, and voice recognition applications in this educational field. Firstly, the analysis of classroom systems based on LMS, such as the iSmart smart educational cloud platform, the SHIYIBAO smart translation and interpretation education platform, and Oia developed in collaboration with Shanghai International Studies University, reveals their usage patterns. Secondly, experiments with applications capable of voice recognition, such as iFLYTEK, are examined. Thirdly, the impact of on-screen subtitles displayed on computer monitors on interpreters is considered. These case studies demonstrate that AI platforms can enhance the quality of translation and interpretation, and also significantly alleviate the fear and burden associated with interpreting practice for students. This positive effect, noted during their interpreting exercises, confirms that platform systems incorporating voice recognition and other AI technologies positively influence interpreter education and the quality of interpretation. Additionally, these findings highlight the pressing need for South Korea to actively adopt such platforms in its translation and interpretation education moving forward.

KEYWORDS: AI platform, translation and interpretation education, interpretation corpus, voice recognition, application

摘要: 人类进入第四次工业革命时期后, 包括人工智能在内的各种科技正以惊人的速度改变着人类的生活。随着时代变化与科技发展, 翻译教学也需随之做出相应的变革。目前有不少从事翻译的翻译工作者在自动翻译的帮助下完成口笔译工作, 也有很多将人工智能平台应用于翻译教学, 并为翻译教学建言献策的学者。为翻译培训开发的平台分为基于培训的平台、基于资料保管的平台、基于翻译资料保管的平台等。本文主要考察分析目前中国在这些领域的发展与应用情况。首先, 分析了中国基于LMS的教学系统中智能教育云平台外语智能学习平台(iSmart)。此外, 还介绍了智能翻译教学平台视译宝(SHIYIBAO), 以及上海外国语大学合作开发的创新口笔译智能教学服务平台(Oia)等的应用情况。之后考察了包括使用科大讯飞在内的语音识别技术的口译研究等多项实验研究。最后, 就电脑屏幕上显示的字幕对口译员影响的相关研究进行了考察。从这些案例中不难看出, 人工智能平台有助于提升翻译质量。从口译相关研究也可以了解到, 使用包括语音识别在内的人工智能技术平台系统, 对翻译教学及翻译品质有着积极作用, 今后的韩国翻译教育中也应积极利用这些平台与技术。

关键词: 人工智能、口笔译教学、口译语料库、语音识别、应用软件

1. Introduction

With the advent of the Fourth Industrial Revolution, life is changing at a rapid pace. Not long after Google developed Alpha Go, which shocked the world by surpassing humans in a game previously considered to be the domain of humans, a game thought to be impenetrable to machines, OpenAI released ChatGPT and astonished the global community. Powered by GPT-3's extensive natural language processing capabilities and speed, the upgraded versions, GPT-3.5 and GPT-4, are now being utilized worldwide, influencing every aspect of our lives, including the translation and interpreting market. Artificial intelligence technology has already established itself as a major field of interest in academia, with numerous related research papers being published annually.

With the myriad technological advancements, the evolution of translation and interpreting courses seems necessary to train translators and interpreters in a society developing toward advanced technologies. The field of translation and interpreting education cannot be the only field to ignore AI when the whole society uses AI and undergoes shifts due to its influence. In practice, many translators and interpreters use automatic translation to perform their tasks, and many researchers have suggested new modes of translation and interpreting courses through the application of AI platforms. The platforms developed for interpreting training can be classified into training-based platforms, data storage-based platforms, and interpreting data storage-based platforms (Choi, 2023). Currently, related research is actively being conducted in Europe (Lee, 2023). In Korea, numerous papers also highlight the necessity of introducing corpora, machine translation, computer-assisted translation programs, and various platform-based training methods in translation and interpreting classes (Choi, 2023; Chun, 2020; Jee et al., 2023; Jung & Han, 2019; Lee, 2023; Park, 2023).

This paper aims to investigate and analyze the current use of AI platforms in translation and interpreting education in China, a country that actively utilizes such technologies. By examining the impact of AI platforms on translation and interpreting classes, the paper seeks to derive insights for the use of AI technology in Korean translation and interpreting education.

2. Existing Research

2.1 Theoretical Background

According to Park et al. (2001), research on machine translation began in the 1940s and started to be actively developed for military purposes after the invention of computers in the 1950s. By the 1960s, direct translation methods and intermediary language translation methods were researched, and in the 1970s, machine translation was developed based on grammar. In the 1980s, due to the highly advanced performance of computers, including artificial intelligence-based technologies, the performance of machine translation also improved. By the 1990s, translation methods had evolved from previous rule-based methods to corpus-based methods. Recent machine translation research continues to evolve toward neural network-based methods.

In the 1990s, large-scale data collection to build corpora became a prominent research method, leading to increased academic interest in the development of corpus linguistics. Baker (1995, p. 225) defined a corpus as “machine-readable text that can be automatically analyzed in various ways.” To date, several types of large-scale corpora related to translation and interpreting have been built and are being used in research and education. Most of these have been translation corpora.

Choi (2016) reported that in studies related to corpus-based interpreting, universities and institutions in European countries, including Italy (EPIC, DIRSI-C, FOOTIE, CorIT, TIC), Germany (K6, K2), and Belgium, have built interpreting corpora. Additionally, Nagoya University in Japan has developed an interpreting corpus (SIDB) aimed at developing automatic simultaneous interpreting systems. Moreover, in China, Shanghai Jiao Tong University and The Hong Kong Polytechnic University have been continuously building corpora using government press conference materials. Choi (2016) emphasized the necessity of constructing interpreting corpora in Korea for the advancement of interpreting studies, highlighting the significant value of interpreting corpora in research and education in the field.

Liu and Hu (2015) introduced several major interpreting corpora constructed in China. One of these is the “Chinese-English Conference Interpreting Corpus (CECIC)” built by Shanghai Jiao Tong University, which Choi (2016) mentioned. This corpus contains 1.13 million words and is continuously updated. Additionally, Beijing Foreign Studies University

Figure 1: Example of multilayer annotation and alignment model for interpreting corpus (Liu & Hu, 2015, p. 81)

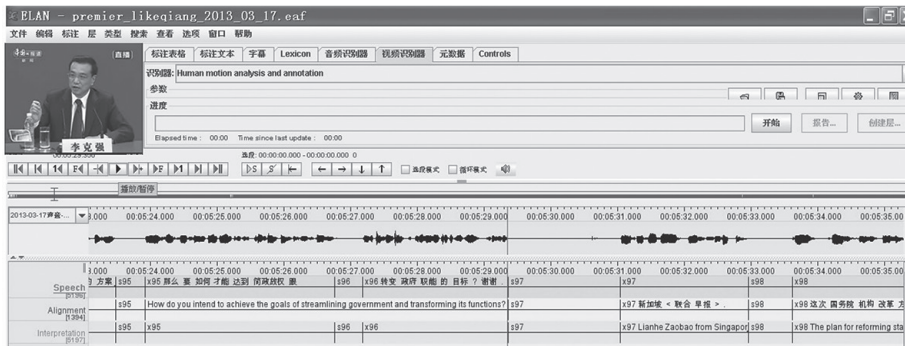


Figure 2: Example of search results for pauses (Liu & Hu, 2015, p. 82)



has constructed the Parallel Corpus of Chinese EFL Learners (PACCEL) which includes such sub-corpora as the Parallel Corpus of Chinese EFL Learners-Spoken (PACCEL-S) and the Chinese Learner Interpreting Corpus. The Chinese-English Conference Interpreting Corpus from Shanghai Jiao Tong University is edited using ELAN (EUDICO Linguistic Annotator).³ The

3 Developed in the Netherlands, the transcription tool provides the basis for annotating and exploring multimedia records (Yoon et al., 2014, p. 102).

following is an example of how this is done.

As seen in Figure 1, annotations can be marked in the corpus to indicate pauses, hesitations, content additions, prolongations of pronunciation, and abnormalities in pronunciation during the interpretation process. Additionally, it allows for the user to check for interpretation errors as well as annotate gestures, enabling various interpreting phenomena to be searched as in Figure 2 during corpus analysis.

As seen with the CECIC, multimodal interpreting corpora are useful for both interpreter education and machine translation training. Since the corpora included in the multimodal corpus are all from real interpreting sessions conducted on-site, they create a vivid atmosphere for interpreting education and allow learners to fully experience the tension of an on-site environment, thereby producing more effective interpreting training. Additionally, instructors can search for specific interpreting phenomena, such as pauses and omissions, that occur during the interpreting process to teach students specific and appropriate strategies and techniques related to those aspects.

2.2 Existing Research on AI Translation and Interpretation

Advancements in artificial intelligence technology have also stimulated research on AI in the field of translation and interpretation. Currently, on the Research Information Sharing Service (RISS), a Korean research paper database, about 900 papers related to AI and translation/interpretation can be found.⁴ Of these, 842 papers have been found with the keywords “artificial intelligence” and “translation”, 79 with “artificial intelligence” and “interpretation”, and 42 with “artificial intelligence” and “translation and interpretation”. It is evident that research on AI-related translation is most abundant, while interpreting research is comparatively lacking. Chang (2019) interprets the reason for the focus on translation in domestic AI research as the result of a lack of AI interpretation at professional international conferences.

An examination of research in China shows that there are about 3,000⁵ AI-related papers on translation and interpretation on the Chinese academic

⁴ The search was made as of March 11, 2024 on <https://www.riss.kr/index.do>.

⁵ The search was made as of March 11, 2024 on <https://www.cnki.net>.

search site CNKI. There are 2,398 papers found with the keywords “artificial intelligence” and “translation (written and spoken)”, 200 with “artificial intelligence” and “interpretation (spoken)”, and 498 with “artificial intelligence” and “translation and interpretation (spoken and written)”. It can be observed that AI-related research on translation is most actively produced in both countries. However, since *fān yì* [translation] in Chinese refers to both written translation and spoken interpretation, it can be inferred that AI-related interpretation is more actively researched in China than in Korea. Chang (2019) also mentioned that research on AI in interpretation is relatively active in China and that AI is actually being used in simultaneous interpretation. However, while much research related to AI has been conducted in the field of translation and interpretation, there is a dearth of studies applying AI to translation and interpretation education. Chapter 3 will further explore the use of AI platforms in translation and interpretation education in China.

3. A Case Study of the Utilization of AI Platforms in Education

3.1 Cases in China

3.1.1 LMS-based class systems

As the importance of online classes has significantly increased following the pandemic, the integration of remote education platforms into education processes to improve teaching outcomes has become a major research focus for educators. Currently, in China, translation and interpretation training programs are actively adopting class systems based on Learning Management Systems (LMS) such as iSmart, SHIYIBAO, and Oia.

(a) iSmart

iSmart (<https://ismart.hep.com.cn>) is a smart education cloud platform that has the advantage of being able to connect and integrate with MOOC, the largest online university class platform in China. It is convenient to access reference materials through MOOC before classes, and instructors can create classes and then generate various types of assignments such as multiple-choice, fill-in-the-blanks, grammar correction, sentence reading, spoken Q&A, writing,

Figure 3: Assignment type selection

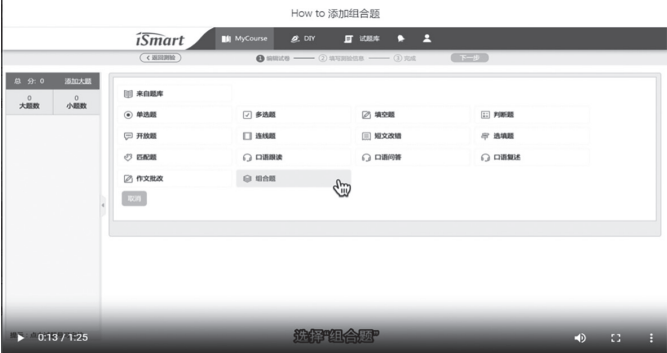


Figure 4: Generation of writing assignment

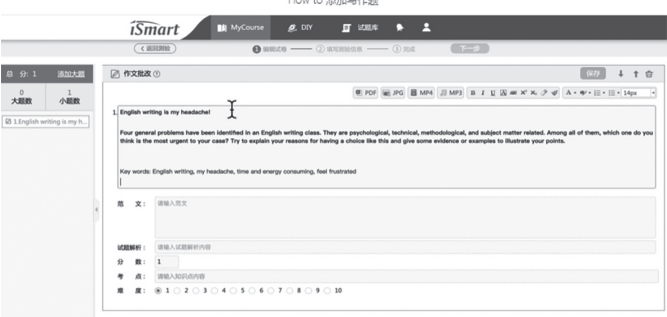


Figure 5: Example of paragraph-level grammar correction

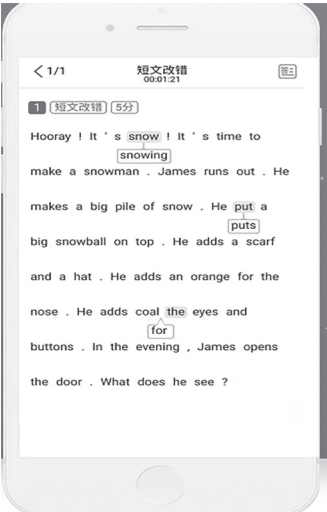


Figure 6: Personal screen



and blended assignments. Additionally, it features an automatic grading function, which makes it easy to use for translation classes.

In the platform, when creating assignments, it is possible to set the scoring for the assignment and adjust the difficulty of the task as shown in the last line of Figure 4. A higher number indicates a higher level of difficulty. Additionally, assignments involving the correction of the grammar of an entire paragraph can also be created, which are useful for training students in foreign language grammar.

Additionally, learners can customize their own learning content and menus on their personal screens, allowing them to add or remove elements as needed.

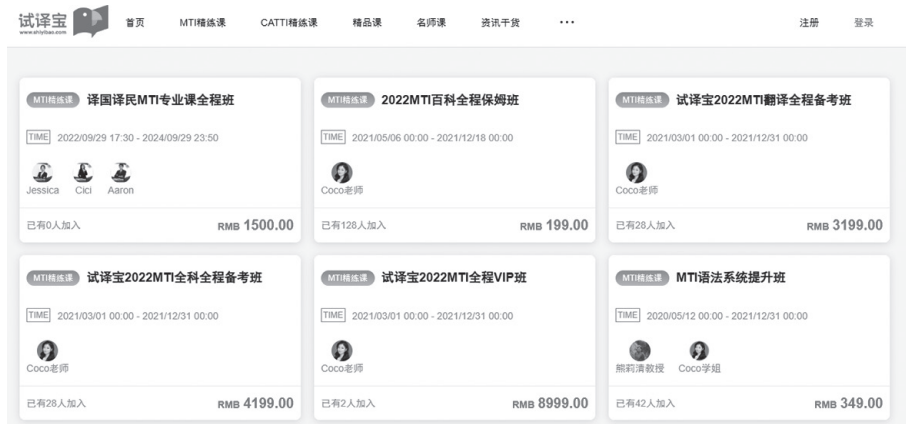
(b) SHIYIBAO

SHIYIBAO (<https://www.shiyibao.com>) is a smart translation and interpretation education platform that can be used for learning and testing, and it is utilized for online classes in translation, English education, and more. It is notable for having many paid courses related to translation available (Figure 7). There are also specialized courses designed for those preparing for master's degrees in translation and interpretation, such as preparation courses for translation

Figure 7: Translation courses on SHIYIBAO

<p>精品课 翻译技术从入门到进阶 (2024全年班)</p> <p>TIME 2023/11/16 08:00 - 2024/12/31 18:00</p> <p>师老师 魏老师</p> <p>已有67人加入 RMB 599.00</p>	<p>精品课 西北民族大学-试译宝2024翻译实习</p> <p>TIME 2024/03/10 08:00 - 2024/04/07 18:00</p> <p>师老师 魏老师</p> <p>已有59人加入 RMB 399.00</p>	<p>精品课 阜阳师范大学-试译宝2023秋季翻译实习</p> <p>TIME 2023/11/12 08:00 - 2023/12/24 18:00</p> <p>师老师 魏老师</p> <p>已有30人加入 RMB 399.00</p>
<p>精品课 三亚学院-试译宝2023翻译实习营</p> <p>TIME 2023/11/06 08:00 - 2024/01/28 18:00</p> <p>师老师 魏老师</p> <p>已有17人加入 RMB 500.00</p>	<p>精品课 试译宝翻译技术2023全年班</p> <p>TIME 2023/03/20 08:00 - 2023/12/31 18:00</p> <p>师建胜 魏贵鹏</p> <p>已有56人加入 RMB 499.00</p>	<p>精品课 宁夏师院-试译宝2023秋季翻译实习营 (12周)</p> <p>TIME 2023/09/09 08:00 - 2023/12/03 18:00</p> <p>师老师 魏老师</p> <p>已有20人加入 RMB 399.00</p>
<p>精品课 吉林师大-试译宝2023秋季翻译实习营 (10周)</p> <p>TIME 2023/09/09 08:00 - 2023/11/19 18:00</p> <p>师老师 魏老师</p> <p>已有40人加入 RMB 399.00</p>	<p>精品课 郑州航院-试译宝2023秋季翻译实习营</p> <p>TIME 2023/06/28 08:00 - 2023/09/24 18:00</p> <p>师老师 魏老师</p> <p>已有29人加入 RMB 199.00</p>	<p>精品课 试译宝2023暑期翻译实习营(8周)</p> <p>TIME 2023/07/03 08:00 - 2023/08/25 06:00</p> <p>师老师 魏老师</p> <p>已有72人加入 RMB 299.00</p>

Figure 8: MTI courses on SHIYIBAO



and interpretation master's entrance exams (Figure 8). Currently, over 400 universities in China—including Beijing Normal University, Beijing Foreign Studies University, Beijing Language and Culture University, China Foreign Affairs University, and China University of Political Science and Law—indicate that they use SHIYIBAO.

In addition to websites for translation courses, there are also specialized platforms for post-editing practica, where the login interface is divided between instructors and learners. Instructors can log in on the respective page to manage student assignments, while students can carry out post-editing exercises per the instructor's requirements. This allows translation and interpretation students to receive the post-editing training that is increasingly required in the profession.

As mentioned earlier, over 400 universities currently use SHIYIBAO, and the post-editing website also aggregates the number of characters post-edited to display rankings by field and by university, divided into monthly and overall totals. It also shows real-time rankings of the fields where post-editing is most frequently performed, allowing users to see where post-editing is most actively taking place. As of March 13, 2024, according to Figure 10, the field with the highest level of post-editing activity is the aviation sector.⁶ The rankings by university show that Zhengzhou University of Aeronautics has performed the most post-editing work.

⁶ The ranking on the right side of Figure 10.

Figure 9: Post-editing practicum platforms

Figure 10: Post-editing work volume and ranking per area

高校排行榜		热门领域排行榜	
月榜 总榜		排行榜为上一周综合数据	
排行榜为2月综合数据			
总字数 TOP5	总人数 TOP5	领域 TOP5	
1 郑州航空工业管理学院 19.7万字	1 郑州航空工业管理学院 9人	1 航空 147639字	
2 江西科技师范大学 14.1万字	2 江西科技师范大学 4人	2 CATTI练笔 14514字	
3 武汉科技大学 2.7万字	3 三亚学院 1人	3 化工 10476字	
4 济南大学 2.5万字	4 上海建桥学院 1人	4 教育资讯 9104字	
5 西南民族大学 1.5万字	5 吉林化工学院 1人	5 时政 3544字	

Xu (2018) published a study on a corpus-based teacher-student collaborative assessment (TSCA) of interpretation, utilizing the cloud platform SHIYIBAO for experiments. In the pre-class stage, instructors posted pre-recorded videos and audio, and students watched related videos on the Chinese educational platform MOOC, after which they performed translation tasks on SHIYIBAO. The platform is used to check commonly occurring problems. These issues are then addressed in lessons and feedback.

During the course, the objectives, requirements, and specific procedures of translation task evaluation are explained, and step-by-step educational

Figure 11: A conversation between a student and an AI on the revision of translated texts

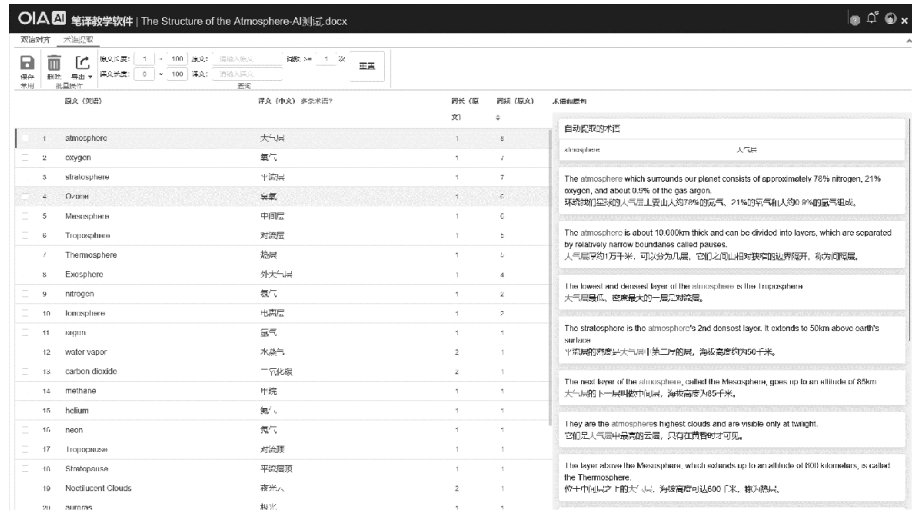


goals are set. Students view translation examples through the cloud platform, reflect on and discuss the examples, and then conduct feedback sessions with the instructor.

After the class, students perform comprehensive translation training as required by the instructor, complete peer and self-feedback, and then write a translation report based on the smart review system, evaluation functions, and discussions. The instructor then selects all or part of the translation report for evaluation and posts examples of high-quality work.

Xu's (2018) research questions were set around whether the TSCA model based on the cloud platform could improve students' translation grades and quality, whether it could enhance students' self-efficacy, and what the user feedback was like. The study divided participants into two groups: Group 1 (40 people, 8 males, 32 females) and Group 2 (40 people, 5 males, 35 females). It used SHIYIBAO and MOOC. The experiment was conducted through surveys, interviews, and reviewing SHIYIBAO electronic files. Results showed that after using SHIYIBAO, students' average translation test scores increased by 7.64 points out of 100, and errors in language aspects such as word usage and grammar significantly decreased, accompanied by an increased understanding of writing style. An investigation of self-efficacy, categorized into confidence, effort, ability, and control, showed no significant change in

Figure 12: Automated extraction of technical terms from source text and target text by AI



control but notable improvements in the other three aspects, with 95% of students approving or actively welcoming the use of the cloud platform.

(c) Oia

The Oia translation and interpretation platform (<https://www.chinanlsc.com>) is an AI platform that was developed primarily by the Graduate School of Translation and Interpretation at Shanghai International Studies University. It is currently being applied in translation and interpretation classes at several universities.

According to the descriptions of interpretation education found on *Baidu*, the platform can be used during classes, allowing instructors to listen to students' interpretations in real time. The platform has interpreting corpora with a volume of over 500 hours, from which instructors can select content for interpreting training. Additionally, instructors can show videos on the platform to simulate the environment of simultaneous interpretation, enabling students to perform simultaneous interpretation while watching the videos. Moreover, tests for simultaneous and consecutive interpretation can also be held on Oia, providing it with broad applicability in translation and interpretation classes.

Figure 13: Class screen for simultaneous interpretation techniques



3.1.2 Research on education using voice recognition applications

Zhu (2015) conducted a study on the impact of numerical voice recognition on Chinese-English consecutive interpretation. The experiment involved 10 experienced second-year master's students in interpretation, divided into groups A and B, both groups interpreting the same material. Group A was trained in the use of a voice recognition program and informed that the accuracy of number recognition might not be perfect. Group B did not use any voice recognition assistance but was fully briefed on background knowledge and technical terms before interpreting.

The results showed that Group A, which used the voice recognition assistance program, achieved an accuracy of 89% in number-related interpretation and a fluency of 91%, while Group B's accuracy and fluency were 73% and 82%, respectively. It was observed that students in Group B preferred to record up to the first two digits of numbers, likely because they needed to devote energy to analyzing and remembering the rest of the message. This tendency was not observed in Group A, which used the voice recognition program.

While the trained interpreters all showed high accuracy and fluency with simple numbers and technical terms, accuracy in interpreting complex numbers with many important digits was 28% higher in the group using the

program. Students using the voice recognition program interpreted more confidently and were measured to have higher fluency. The more complex the numbers, the more pronounced the role of the program, indicating that using voice recognition can enhance the quality of interpretation.

Li and Wang (2018) conducted experiments using iFLYTEK's app, which is capable of voice recognition in interpretation classes. The results indicated that using the voice recognition app reduced the perceived difficulty of simultaneous interpretation classes for students, thus facilitating the introduction to interpretation training. The study also presented a model of simultaneous interpretation using the voice recognition app in Figures 14 and 15, which visualized both the traditional model of simultaneous interpretation and the model based on the voice recognition app, clearly illustrating the differences between the two models.

Figure 14: Model of traditional simultaneous interpretation (Li & Wang, 2018, p. 13)

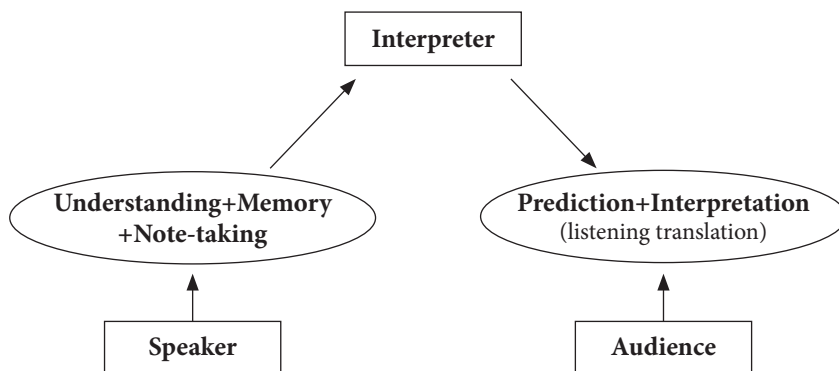
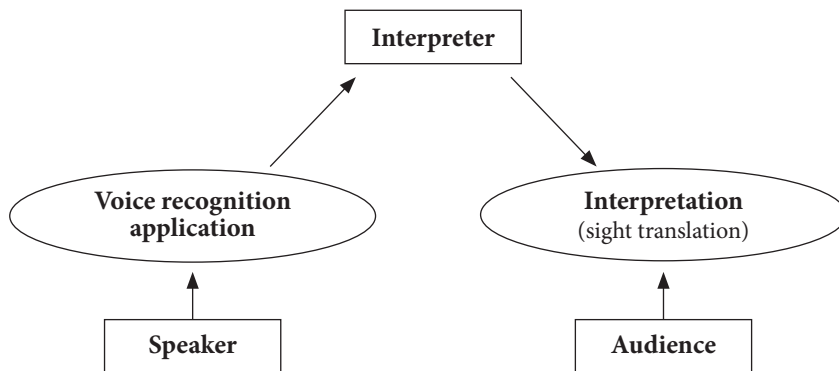


Figure 15: Model of simultaneous interpretation based on voice recognition application (Li & Wang, 2018, p. 14)



The two researchers conducted an experiment involving 40 first-year undergraduate students with no previous experience in interpretation-related courses. The quality of interpretation was evaluated using a research method based on principal component analysis to explore whether a voice recognition app could enhance the quality of simultaneous interpretation. The experiment was carried out in two stages. In the first stage, the students were divided into two groups—one group had prior access to the interpretation materials and the other interpreted without prior preparation. In the second stage, the groups were divided into those who used a simultaneous interpretation assistance app and those who did not. The changes in interpretation quality after using the assistance app were as follows:

Table 1: Degree of increase in interpretation quality in key areas when using a simultaneous interpretation assistance app (Li & Wang, 2018, p. 17)

	Completeness of interpretation	Accuracy of terminology	Fidelity in meaning	Simultaneity	Verbal expression	Vocal tone
Degree of increase	69.68%	96.43%	53.59%	27.16%	30.70%	14.61%

In conclusion, Li and Wang (2018) stated that using voice recognition apps like iFLYTEK can alleviate the fear and pressure that students feel regarding simultaneous interpretation, facilitate interpretation practice, and enhance the quality of interpretation. This is particularly useful when interpreting without prior preparation. Additionally, the use of the app helps reduce the skill gap among students, maintains a consistent level of interpretation quality, and is useful for improving the overall quality of simultaneous interpretation and the accuracy of interpreting technical terms. It was therefore assessed as being effective for conference interpretation and cultural-related interpretation.

3.1.3 Study of the role of computers in assisting English-Chinese interpretation

Lin (2013) conducted an experiment involving translation and interpretation master’s students with similar interpreting skills to study the impact on

interpreters of various factors such as the delay of subtitles displayed on a monitor, the language of the subtitles, and the volume of content.

The experiment divided the students into four groups. Group 1 was tested for when the accuracy of voice recognition reached a level where it could surpass traditional interpreting methods in providing assistance. Group 2 was examined for the impact of voice recognition subtitles and automatic translation speed, using the speed of subtitle generation as an independent variable. Group 3 was tested for the effect of changing subtitle languages on the monitor, such as English and Chinese, on interpreters. Group 4 was analyzed for the impact on interpreters based on the amount of information displayed on the monitor, whether the text in its entirety was provided or just keywords.

The results of the experiments for the four groups were as follows:

Group 1	When the voice recognition accuracy reached 85%, it was found to be helpful for interpretation, and when the accuracy reached 95%, there was an increase in time efficiency in interpretation. The students engaged in notetaking when the voice recognition accuracy was low, but as the accuracy approached 100%, they almost stopped taking notes.
Group 2	When the delay in subtitle generation on the monitor was within 4 seconds, it did not significantly impact the quality of interpretation. However, some participants reported being distracted and feeling interfered with by the continuously generated subtitles when interpreting while looking at the monitor. When the delay in subtitle generation exceeded 4 seconds, interpreting some shorter sentences actually imposed a psychological burden on the interpreters.
Group 3	When subtitles in both English and Chinese were displayed, the fidelity of the interpretation was higher, and when only English subtitles were shown, the participants' output was better in terms of sentence construction, and they also responded more agilely to changes in word order. Most participants preferred subtitles in the source language and abandoned notetaking when subtitles in both languages were visible. This can be understood as a lack of time to look at notes even if they were taken.
Group 4	For experiment subjects with limited listening skills, showing keywords helped with memorization, but when they could not understand the original content, displaying keywords did not enable them to understand the narrative. Additionally, participants showed a tendency to become dependent on the programs.

In terms of developing interpretation assistance programs, it was suggested that voice recognition rates should exceed 80% to be beneficial, and the time delay between subtitle generation and the heard audio should not exceed 3 to 4 seconds. Lin suggested that the screen should be designed to allow interpreters to choose between displaying subtitles in one or two languages based on their preference. Furthermore, Lin suggested that it would be practical to allow users to choose whether to see only keywords or the entire content. It was also recommended that the interpreters should be able to add or delete terms in the glossary, and that space for notetaking should be provided on screen.

3.2 Cases in Korea

Jee et al. (2023) conducted a survey and experimental study on undergraduate translation majors regarding ChatGPT, and they found that most students had a positive attitude towards using AI in classes. Moreover, 59.6% of respondents agreed that “using AI can contribute to learning if both instructors and students mutually agree to its use,” while only 8.7% opposed it. This suggests that more than half of the students perceive the use of AI in education as beneficial and aligned with current trends (Jee et al., 2023, p. 213).

In Korea, there has been almost no research on the application of computer assistance in interpretation classes. Lee (2023) conducted a small-scale survey, and according to this study, although some students use voice recognition and AI narration tools, overall awareness among students is low regarding computer assistance tools that are applicable to interpretation. Therefore, Lee (2023) suggests that there is a need to educate students about these technologies in the educational field.

3.3 Final Thoughts

In this chapter, we have examined the current application of artificial intelligence platforms in the field of translation and interpretation education in China, particularly focusing on interpretation education. Through various experiments, the effectiveness of these platforms in translation and interpretation education has been confirmed. Students are favorable towards the use of AI platforms, and it has been observed that the quality of translation and interpretation has improved through their use. This

demonstrates the supporting role of AI and how such support can reduce students' psychological burdens and increase self-efficacy, thus leading to greater confidence in interpretation. This in turn underscores the importance of confidence in this field. Furthermore, the application of AI technology in the educational setting not only physically aids in translation and interpretation but also plays a positive psychological role. A review of the situation in Korea also shows that while the application of technologies such as AI in classes is currently rare, there are scholars seeking to research its implementation in the field of translation and interpretation education.

4. Conclusion

In this study, we explored research on AI platforms related to translation and interpretation in China. Translation and interpretation technology has evolved from basic one-to-one translation and grammar-based machine translation systems of the early days to the AI platform translation systems based on large-scale corpora. The technology continues to develop toward neural network-based translation and interpretation technologies. Regions like Europe, Japan, China, and Korea have contributed to translation and interpretation research by consistently building large corpora, which has also made them widely usable in translation and interpretation education.

However, the field of interpretation still lags behind translation in terms of large corpora development. An examination of major research sites in Korea and China shows even in the case of research in the field of translation and interpretation related to AI, interpretation is less represented than translation, particularly in Korea where the scale is significantly smaller compared to China.

Additionally, this study analyzed prominent case studies related to AI platforms in China. First, the use of smart education cloud platforms such as iSmart, smart translation and interpretation education platform SHIYIBAO, and Oia, which was developed in cooperation with Shanghai International Studies University, were examined in the context of LMS-based classes. Second, experimental aspects of applications capable of voice recognition, such as iFLYTEK, were considered. Third, the study looked into the effects of the volume of subtitles shown on a computer monitor on interpreters. These cases illustrate that AI platforms can enhance the quality of translation and

interpretation and positively reduce the fear and burden of interpretation practice among students. However, despite significant advancements in technologies like voice recognition, there still exist limitations as these do not yet meet the voice recognition rates required in translation and interpretation education. Moreover, cognitive confusion caused by new information technologies and overload due to excessive information processing also arise, posing challenges in how to overcome these drawbacks in translation and interpretation classes and how to introduce new tech-based teaching methods to students to strengthen their skills. Nevertheless, as discussed in this paper, considering the numerous cases in China, where AI and other technologies are actively integrated into translation and interpretation education, there is a compelling case for Korea to also take the initiative to introduce such new information technologies into the educational field of translation and interpretation.

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