

Translation Teaching Based on Language Big Data

Ying Xu

Zhejiang Yuexiu University, Shaoxing, Zhejiang 312000

Abstract: With the continuous development of information technology, China has officially entered the information age. Big data information technology has changed people's lifestyles and promoted the transformation and upgrading of various industries. In the era of language big data, the requirements for translators have also been improved. To train translation talents to adapt to the development of the times, colleges and universities should update the concept of translation talents training in time, actively explore the relationship between language big data and translation, actively adjust the translation teaching mode, realize intelligent teaching, build a new translation teaching system, enhance students' translation skills and train talents with higher professional level for the society. This paper will discuss the concept of big data, the influence of language big data on translation teaching, the existing problems in translation teaching and the translation teaching strategies based on language big data.

Keywords: Language big Data; Translation Teaching; Teaching Strategy

Introduction

Under the background of big data, the language service market is experiencing explosive growth, especially with translation technologies advancing by leaps and bounds in the era of big data. The combination of artificial intelligence and language service has spawned a brand-new era of language big data. With the development of language big data, translation education needs to keep up with the pace of the big data era in order to adapt to the society, serving the society and creating the value of translation, which will inevitably bring about profound changes in translation teaching. Professor Liu Heping from Beijing Language and Culture University believes that the language service industry has undergone earth-shaking changes under the impetus of science and technology, and classroom teaching in colleges and universities, as the main position for training language service professionals, should be reformed accordingly, and the training mode and teaching mode of language service professionals should be changed according to the development trend of the times and the changes of social needs.

1 The concept of big data

With the continuous development of information technology in China, big data and cloud computing technology have been widely used. As a major branch of information technology, big data technology mainly refers to data groups with functions beyond traditional database software, which are responsible for storing, capturing and analyzing massive data. People use cloud computing and big data technology to cross-reuse, integrate and share massive related data, and finally form valuable knowledge service capabilities and intellectual resources to provide effective services for people. Generally speaking, big data technology has the ability to collect and analyze information. Through the analysis of big data technology, people can find effective information in massive information, and then continuously improve the efficiency of people's study and work, and help people make correct decisions. In addition, big data technology can also provide online learning through the operation of online terminals, so that students' learning behavior will no longer be constrained and restricted by conditions such as time and place. Teaching and interaction with teachers can happen online on the network platform, thus changing the traditional learning mode. The foundation of big data technology is intelligent analysis and speech processing. Through the integration of artificial intelligence and big data technology, people can effectively improve students' translation ability, cultivate students' good technical thinking and provide them with more efficient learning methods.

2 The influence of language big data on translation teaching

2.1 Enriching teaching resources

Big data technology and network environment can provide more teaching resources for translation teaching, while rich teaching resources can further ensure the order of teaching activities and provide students with technical teaching technology and teaching environment. Traditional translation teaching resources generally come from textbooks and teachers, including hardware resources in classrooms. However, these resources are very limited, and will be restricted by practical conditions. However, in the era of big data, the network platform can provide teachers and students with massive teaching resources and information resources, such as the corresponding network teaching platform, massive open online course platform, teaching forum, corpus and other resources.

Compared with traditional teaching resources, these teaching resources are not only featured by strong interactivity and timeliness, but also can provide diversified and visualized real language materials for students and teachers. For students, the big-data-based teaching resources can enrich their learning content, thus enhancing students' interest in translation courses and promoting the reform and development of translation teaching. ^[1]

2.2 Digitalizing teaching

Different from traditional teaching mode, using big data technology can make full use of teaching resources online, realize the sharing of teaching resources and break through the limitation of learning resources. Traditional translation professionals are usually only familiar with the discourse system of a certain professional field (such as economics, politics, medicine, etc.). In the era of big data, the language service industry relies on the high-speed Internet, background computing technology and cloud storage, and builds a large number of bilingual/multilingual corpora to provide information query systems and searches for practitioners in the language service industry. Computer-aided translation systems and Internet translation software can not only perform local calculations in a certain field, but also efficiently provide translators with terms of a certain professional that they are not familiar with. In addition, language data technology also provides a unique perspective and tool for translation research and teaching. The language database electronizes representative corpora, provides massive data support for teaching, and enables users to quickly retrieve and extract corpora and make relevant statistics. For example, researchers not only use the descriptive function of the corpus of interpretation and translation to describe translation phenomena and the complex factors involved, but also use the corpus to analyze, explain and verify translation rules, and also use the corpus to discuss common problems in translation, or to study translation language features, translator style, translation norms, translation teaching, translation quality evaluation, etc. (Wang Kefei, Qin Hongwu, 2015; Zhu Yubin, Chen Jianlin, 2015; Li Dechao and Wang Kefei, 2011). The direct application of these studies to translation teaching will greatly promote the reform of translation teaching. The types of language databases most relevant to translation are: parallel language databases for comparison and reference of translation examples, comparable language databases for studying the universality of translation, learner language databases for learning and teaching translation and interpretation (Olohan, 2004), and translation language databases specially containing translations.

In translation practice and teaching, student translators can use language database to stimulate their thinking, query, compare and refer to bilingual and multilingual terminology expressions and translation examples in language database. However, most language databases play the role of "dictionaries". Only when translators observe and summarize the phenomena and laws of language use, actively carry out Data-Driven Learning, and comprehend the translation methods of mature translators can the accuracy and fluency of translations be improved (Laviosa, 2002), and the role of language databases can be truly brought into play. The combination of language database, modern educational technology and translation technology has great potential development and utilization value. Big data mining and analysis technology can enhance the efficiency of language learning (Yu, 2015), which provides unprecedented opportunities for learners, and greatly improves the efficiency of translation learning through language learning media, artificial intelligence, big data technology and other rapidly emerging technologies.

2.3 Interactive teaching evaluation

As a necessary link in curriculum teaching, Teaching evaluation is a process in which teachers and students reasonably evaluate students' learning achievements and teachers' teaching according to the general features and rules for teaching as well as scientific indicators for teaching evaluation. In the traditional teaching process of translation course for English majors in colleges and universities, teachers will make teaching evaluation according to students' translation achievements. For students, this is a one-way evaluation model. Students can only be provided with an evaluation result, with no chance to communicate with teachers, making it difficult to learn and understand in-depth knowledge, not to mention making progress through reflecting. Fortunately, the application of big data technology can bring change to this situation. Through online platform, teachers can monitor students' learning tracks and be provided with data of language inputs. Students' learning performance is no longer limited to subjective judgment, but can be given objective and visualized evaluation through data analysis conducted automatically. Teachers can communicate with students through online discussion, so as to shorten the distance between them. In addition, teachers can interact with students through various online social activities (Olohan, 2004).

3 Problems with present translation teaching

3.1 Backward teaching mode

As far as the current situation is concerned, the translation teaching currently used in colleges and universities in China relatively lags behind and is out of date to some extent. Teachers have not innovated their teaching theories in time. At present, there still exists a serious problem of one-way output. Many teachers are not aware of students' dominant position in the teaching classroom, resulting in many students' becoming passive recipients of knowledge. What's worse, the textbooks used in college translation teaching are relatively traditional and away from college students' life, which does not meet the needs of the times. Secondly, because of the large number of students in the current class, it is difficult for teachers to carry out differentiated teaching, resulting in the negligence of students' personalized development. Finally, the limited class hours for translation courses in many universities makes it difficult for teachers to conduct high-quality translation teaching practice.

3.2 Less interaction

Translation teaching itself is to highlight the practical language output. Teachers should value the cultivation and promotion of students' communication skills through enhancement of the interaction between teachers and students. However, as far as the current situation is concerned, in many translation classes of colleges and universities, teachers take the initiative to fully control students' learning progress and even learning methods. As a result, the communication and interaction between teachers and students, between students and students is reduced, which will eventually lead to students' losing their real and comparable language output environment

and gradually losing their interest in translation learning.

3.3 Lack of timely evaluation and feedback

No matter what subject is taught, teachers' evaluation of students' performance is very important. Thus, students can reveal their problems with learning in time so as to promote their own learning progress by fully reflecting on their learning with teachers' evaluation and feedback. For translation courses, the quality of students' translation works can directly reflect the students' understanding, mastery and application of translation skills. However, due to the larger size of classes and the large amount of translation work completed, it is difficult for teachers to evaluate and give feedback timely on students' translation works. As a result, this subjective evaluation will affect students' enthusiasm about practice, and makes it difficult for them to get accurate and direct feedback from the evaluation, thus making it less possible for them to improve their translation proficiency (Yu, 2015).

4 Translation teaching strategies based on language big data

4.1 To establish an online language data teaching platform

Big data technology and information network technology have been fully applied to language teaching through corpora and other forms. For translation teaching, teachers should also make full use of big data technology and network teaching resources by establishing an online language data teaching platform and constantly improving the network teaching system. To be specific, teachers should constantly improve the interactive platform between teachers and students, and use network technology to set units like introductory guidance, translation theories and library of translation materials on the platform. At the same time, they should also add to the platform functions such as performance evaluation as well as teaching and learning reflection, so that students can make their own assessment online, which helps cultivate students' autonomous learning and improve their learning quality. Secondly, teachers should also make full use of information technologies to build an interactive communication channel for students, through which they can perform online communication, make mutual evaluation on homework or even online automatic evaluation, as well as share resources or push notifications of interesting topics and learning materials to them. Finally, teachers should also provide opportunities for students to communicate with professional translators out of campus. It can be initiated by some leading universities to co-establish an interactive platform integrating the providers of translation materials, teachers and students, so that students can communicate with the original authors, interact with teachers and other students in real time, realizing mutual learning and promotion. Students can improve their translation ability through better translation experience, and improve the efficiency of translation teaching (Li & Wang, 2011).

4.2 To reform and innovate teaching methods

Influenced by the traditional teaching mode, the translation teaching in many colleges and universities still stays in the pure text, which can no longer meet the needs of the current social development. Students trained in this way can hardly meet the requirements of the society in the future. Therefore, today's teachers should update their teaching concepts, reform and innovate their teaching methods in time, transforming the traditional translation teaching style into the mode that focuses on practical needs and services, so as to promote the cultivation of translation professionalism. First of all, teachers should initiatively master the technology of translation teaching and research by using corpus. The research on Corpus-based language analysis and teaching with big data has broken through the limitations of traditional researchers or educators' sense of language, focusing on language use in the real situations with the return to observation and learning of language facts. Traditional language teaching seldom records students' questions on learning while Big data makes it possible to collect, analyze and utilize students' questions in the form of pictures, words posted, and chats with each other. All these construct a new language learning database with students as the center. Secondly, teachers need to understand and learn how to make and use big data analysis. Big data analysis technology not only has the potential to help improve language teaching tools and innovate teaching methods, but also can further promote the application of personalized big data to language learning so as to improve the effectiveness of language learning. By analyzing big data of language, personal learning performance and learning progress can be tracked. Continuous feedback for students' language learning can be provided timely as an effective analysis tool for personalized language learning to make students more aware of their learning process and shortcomings. In addition, teachers should guide students to give their attention to language data processing technology in order to infiltrate practical problems and needs into translation teaching and learning, like text processing technology, translation technology and corpus use, for students' social development and adaptability (Wang & Qin, 2015).

(1) To improve technical literacy

In the era of language big data, in order to improve the quality of translation teaching, teachers should not only improve their professional quality, but also reserve knowledge of language big data utilization, artificial intelligence and translation technology, improve teaching assessment system, strengthen teachers' interpretation and translation skills, and continuously expand teachers' knowledge on translation. In addition, teachers should take the initiative to improve their information technology, participate in the construction of online learning platform, and continuously improve the quality of translation teaching.

5 Conclusion

To sum up, translation teaching based on language big data requires teachers to master big data technology, innovate teaching methods by establishing language data teaching platform, to cultivate students' technical awareness as well as the awareness and ability to make data analysis and utilization, for improving translation teaching, and training compound translation professionals for the society.

References:

[1] Laviosa, S. *Corpus-based Translation Studies: Theory, Findings, Applications* [M]. Amsterdam/New York: Rodopi, 2002.

- [2] Olohan, M. *Introducing Corpora in Translation Studies* [M]. London/New York: Routledge, 2004.
- [3] Yu Q., *Learning Analytics: The next frontier for computer assisted language learning in big data age*[C]// EDP Sciences, 2015.
- [4] Dechao Li, Wang Kefei. Teaching DDL translation based on bilingual tourism corpus [J]. *Audio-visual Teaching of Foreign Languages*, 2011(1).
- [5] Kefei Wang, Qin Hongwu. On the Application of Parallel Corpus in Translation Teaching [J]. *Foreign Language Teaching and Research*, 2015 (5).
- [6] Yubin Zhu and Chen Jianlin. Theoretical conception and engineering practice of computer-aided translation teaching platform based on corpus [J]. *Audio-visual Teaching of Foreign Languages*, 2015(4).
- [7] Mingjiong Chai, Wang Jing. Translation Teaching Reform in the Technological Age: Exploration on the Construction of Translation Teaching Corpus [J]. *Audio-visual Teaching of Foreign Languages*, 2017(06):25-31.
- [8] Mingjiong Chai. Exploration of Professional Translation Teaching-Construction of Professional Translation Teaching Platform Based on Corpus [J]. *Oriental Translation*, 2019(02):4-7.
- [9] Xiaoping Xie, Zhou Limin. A study on language learning in the era of big data-also on Google translation learning case [J]. *Education Research Monthly*, 2019(11): 95-103.
- [10] Yanying Xu. a summary of the research on language service personnel training in the era of big data [J]. *Journal of changchun university of science and technology (Social Science Edition)*, 2019,32(06):159-163.
- [11] Xianghong Zeng. Corpus-assisted teaching of MTI translation [J]. *Shanghai Translation*, 2019(01):76-79.