

Application of ChatGPT in College Students' Autonomous Oral English Learning

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Abstract: In the context of globalization and educational digitalization, oral English proficiency has become an essential literacy for college students, which is not only an important embodiment of cross-cultural communication ability, but also closely related to their academic development and career prospects. As a new type of generative AI tool, ChatGPT has gradually penetrated into the field of education in general, and oral English learning specially by virtue of its unique interactive nature and rich functional support, providing new horizons and means for solving the dilemmas of traditional oral English autonomous study. This paper adopts literature review and case analysis as research methods to explore the application value, specific scenarios, implementation paths, existing problems and optimization strategies of ChatGPT concerning the topic. It is suggested that ChatGPT can alleviate autonomous study dilemmas, meet personalized learning needs, enrich practice scenarios and cultivate autonomous learning ability of college students. Meanwhile, this tool also features such weaknesses as insufficient authenticity of productions, students' over-reliance, limited functional adaptability and lack of effective supervision in the application process. Consequently, the paper puts forward counter strategies such as enhancing the authenticity and naturalness of productions, reducing over-reliance of students on the tool, improving the adaptability and optimizing the supervision and guidance system. ChatGPT, with proper improvements, is expected to be a powerful and convenient tool in compensating the teaching system of oral English for college students.

Keywords: ChatGPT; College Oral English; Autonomous Learning; Application

1. Introduction

In recent years, with the progression of globalization and the rapid development of educational informatization, oral English, as an important carrier of cross-cultural communication and international exchanges, has become an indispensable competence for college students. Undoubtedly autonomous self-study is an indispensable complement to students' acquirement of this ability. However, the traditional oral English autonomous study model in China has long been faced with such dilemmas: lack of practice partners, delayed feedback on learning effects, limited learning contents, and difficulty in meeting the personalized needs of different students. With the continuous progress of AI technology, ChatGPT, as a powerful generative language model, has been widely applied in the field of education due to its interactive nature, personalized adaptation and rich scenario simulation functions. It can effectively compensate the deficiencies of the traditional autonomous study model, providing a new path for college students' oral English learning, promoting the transformation and upgrading of oral English teaching.

At present, the integration of ChatGPT into college oral English learning just begins. Most related researches only stay at scenario description and function introduction, lacking systematic analysis. Therefore, based on the actual learning needs of college students, this paper comprehensively explores the application of ChatGPT in college students' autonomous oral English learning in detail to provide a more comprehensive and in-depth theoretical and practical support for college students to use AI tools to improve their oral English.

The College English Teaching Guide (2020 Edition) [1] clearly points out that college English teaching should focus on cultivating students' language output ability and autonomous learning ability by actively promoting the integration of information technology into English teaching. ChatGPT, as a

typical representative of AI technology, has the core characteristics of natural interaction, personalized adaptation, and rich scenario simulation, which highly match the needs of college students' autonomous oral English learning. It can not only provide students with a real and vivid language practice environment, but also give targeted feedback and guidance according to the differences of students, helping students overcome the psychological barriers of oral expression, improving learning efficiency, and realizing the organic loop of "learning, practicing, correcting and improving". This paper targets at ChatGPT as the research object, focuses on its application in college students' autonomous oral English learning, and systematically discusses its theoretical basis, application value, specific scenarios, existing problems and optimization strategies, to provide practical reference for college students to improve their oral English level and for the innovation and development of college oral English teaching.

2. Theoretical Foundations and Core Features of ChatGPT Application

2.1 Theoretical Foundations

The application of ChatGPT in college students' autonomous oral English learning is based on two core educational theories, which provide a solid theoretical support for its rational application and functioning.

The first is the autonomous learning theory proposed by Holec [2] in 1981, defining autonomous learning as the ability of learners to independently plan their learning goals, select learning content, arrange learning time, monitor learning processes and evaluate learning effects. In college students' autonomous oral English learning, this theory requires students to take the initiative to participate in the whole process of learning, rather than passively accepting knowledge and guidance. ChatGPT, as an auxiliary tool, can perfectly fit the core requirements of this theory: it can adjust the learning content and difficulty according to the students' own level, help students formulate personalized learning plans, record learning processes, and provide targeted feedback, which is conducive to students' independent completion of learning tasks, and then cultivate their self-direction, self-management and self-improvement abilities. For example, students can

set their own oral practice goals according to their own level, and ChatGPT will provide corresponding practice content and feedback suggestions, helping students gradually form the habit of independent learning and autonomous management.

The second is the constructivist learning theory [3]. This theory holds that learning is not a passive process of accepting knowledge, but an active process of learners constructing knowledge based on their own existing experience and cognitive structure. It emphasizes that learning should be carried out in a real context, and interaction and communication are important ways to promote knowledge construction. ChatGPT can simulate real communication scenarios, provide natural interaction opportunities, and enable students to actively construct the meanings of oral English in the process of dialogue and practice. At the same time, through real-time feedback and guidance, it helps students connect new knowledge with existing experience, forming a complete knowledge construction system. For example, in the practice of situational dialogues, students can apply the knowledge they have learned to real communication scenarios with the help of ChatGPT, and continuously adjust and improve their expression ability through the feedback given by ChatGPT.

In addition, Krashen's Input Hypothesis also provides an important theoretical basis for the application of ChatGPT. The Input Hypothesis points out that language learning requires sufficient, comprehensible and appropriate input [4]. ChatGPT can adjust the difficulty of language input according to the students' oral level, provide targeted input content slightly higher than the students' current level, help students gradually improve their oral expression ability on the basis of understanding, and avoid too difficult or too simple inputs.

2.2 Core Features of ChatGPT

Combined with the actual needs of college students' autonomous oral English learning, ChatGPT has four core features that are highly compatible, which provides important support for its wide application in oral English autonomous study.

Firstly, natural interactive communication. Different from the rigid response mode of traditional learning tools, ChatGPT can conduct natural and smooth dialogues with students in

accordance with the expression habits of oral English, simulating real interpersonal communication scenes [5]. Students can communicate with ChatGPT in the same way as they communicate with teachers and classmates, without a mechanical sense of AI. This natural interaction mode can effectively reduce students' psychological pressure and make oral practice more relaxing and efficient.

Secondly, personalized adaption. ChatGPT can accurately identify the students' oral level, learning goals and learning habits through the students' practice records and feedback, and adjust the difficulty of dialogue content, the depth of guidance and the form of feedback accordingly. For example, for students with weak oral foundation, it will focus on basic expression training and simple dialogue practice; for students with high oral level, it will provide more complex situational dialogue and professional expression guidance, realizing personalized learning of "one person, one plan".

Thirdly, real-time feedback and correction. In the process of dialogue and practice, ChatGPT can timely point out the errors in students' oral expression, including pronunciation, grammar, vocabulary use and logical expression, providing standard correction suggestions and model expressions. This real-time feedback can help students find their own problems in time, avoid the solidification of wrong expressions, and improve the efficiency of oral practice.

Fourthly, rich scenario simulation. ChatGPT can create a variety of oral practice scenarios closely related to college students' study and life, including campus communication, academic discussion, job interview, cross-cultural communication and other scenarios. Each scenario is designed according to the actual needs of students, which can effectively solve the problem that traditional oral practice lacks real context, and enable students to apply oral English in real scenarios, improving the practicality of oral learning.

3. Application Value of ChatGPT in College Students' Autonomous Oral English Learning

3.1 Alleviating Dilemmas and Lowering Practice Thresholds

The biggest difficulty in traditional oral English autonomous study is that it is difficult to form effective practice and feedback. Most college students have the problem of "no partner to

practice with, no one to guide, and no way to correct errors". ChatGPT effectively solves these pain points and greatly lowers the threshold of oral practice [6]. On the one hand, ChatGPT can serve as a permanent practice partner for students, breaking the time and space limitations of traditional oral practice. On the other hand, ChatGPT's non-judgmental interactive mode eliminates the psychological pressure of students. Students can boldly try without worrying about being laughed at for incorrect expressions, helping overcome the fear of speaking and enhance the confidence of oral expression.

In addition, ChatGPT can provide targeted guidance according to the students' oral level. For students with weak foundation, it focuses on the training of basic pronunciation and simple sentence patterns, helping them lay a solid foundation; for students with medium level, it strengthens the training of fluency and authenticity; for students with high level, it provides more complex dialogue content and professional expression guidance. This hierarchical guidance mode makes oral practice more targeted, avoids the problem of one size fitting all in traditional learning, and ensures that each student can get effective improvement in oral practice.

3.2 Meeting Diversified Learning Needs and Improving Learning Initiatives

College students have different learning needs due to different majors, learning goals and oral levels. Some students focus on improving the fluency of daily oral expressions, some need to prepare for CET-4, CET-6 and other exams, and some hope to improve their major-related oral English ability. The traditional oral learning resources are relatively limited, difficult to meet the diversified needs of students.

ChatGPT can customize the learning plan according to the specific needs of students. For students who focus on daily communication, it provides simple and practical dialogue content and pronunciation guidance, helping them master the basic skills of oral expression; for students preparing for exams, it simulates the exam environment and question types, provides exam skills and answer templates, and helps students improve their exam adaptability; for students majoring in science, engineering, medicine and other majors, it can provide professional oral expression guidance related to their major, realizing the organic combination of

professional learning and oral practice [7]. This personalized service not only improves the learning efficiency of students, but also stimulates their learning initiative and learning enthusiasm.

3.3 Enriching Practice Scenarios and Enhancing Application Ability

Oral English learning is closely related to practical application. Traditional oral autonomous study often stays in the form of recitation and memorization, lacking real application scenarios, leading to the phenomenon of "being able to recite but not use". ChatGPT can create a variety of real and vivid communication scenarios according to the study and life of college students, including campus communication, academic discussion, job interview, cross-cultural communication and other scenarios closely related to students' life and study.

In these scenarios, students can not only practice oral expression, but also understand the cultural background and language habits behind different scenarios, improving the authenticity and practicality of oral expression. For example, in the job interview scenario, ChatGPT can simulate the interviewer's questions and guide students to organize their language and express their ideas clearly and logically; in the cross-cultural communication scenario, it can help students understand the cultural differences between different countries and regions, and master the appropriate expressions in cross-cultural communication [8]. This immersive scenario practice enables students to truly apply the learned oral knowledge to practical communication, and effectively improve their oral application ability.

3.4 Cultivating Autonomous Learning Ability and Promoting Lifelong Learning

Autonomous learning ability is an important quality that college students need to master in the information age, and it is also the core goal of oral English autonomous study. ChatGPT runs through the whole process of students' oral autonomous study, guiding students to independently formulate learning goals, select learning contents, arrange learning time, and evaluate learning effects [9]. In the process of using ChatGPT for oral practice, students need to independently complete the setting of learning goals, the choice of contents for practice, and the

summary of learning effects, conducive to cultivating their self-planning and self-management abilities.

At the same time, ChatGPT provides detailed learning reports and feedback suggestions, helping students clarify their own advantages and disadvantages, adjust learning plans in time, and form a closed loop of "goal setting → practice implementation → feedback correction → summary improvement". This learning mode not only improves students' oral level, but also enables them to master scientific learning methods, laying a foundation for lifelong learning and sustainable development.

4. Application Scenarios and Implementation Paths

4.1 Core Application Scenarios

4.1.1 Basic scenarios for training

These scenarios are mainly aimed at students with weak oral foundations, focusing on solving the problems of non-standardized pronunciation and unfamiliar sentence patterns. Students can input the words, phrases and sentence patterns that need to be practiced into ChatGPT, and request standard pronunciation guidance and shadowing practice. ChatGPT will provide detailed pronunciation demonstrations, stress marking, intonation display of words and sentences, and generate simple dialogues containing target sentence patterns, helping students consolidate basic knowledge through imitation and repetition [10]. At the same time, it will correct the wrong pronunciation and expression of students in real time, ensuring that students can master the basic skills of oral expression.

4.1.2 Exam-oriented scenarios

Aiming at students who need to take CET-4, CET-6 and various other oral exams, these scenarios simulate the real exam process and scoring standards, providing targeted exam training. ChatGPT can generate exam questions consistent with the exam outline, including oral dialogues, topic discussions and other question types, and give detailed scoring standards and answer templates [11]. Students can practice accordingly, master the skills of answering questions, and improve their exam adaptability and performance. For example, in the CET-4 oral exam, ChatGPT can simulate the exam process, ask questions according to the exam requirements, and give feedback on the students'

answers, helping them find their own deficiencies and improve their exam skills.

4.1.3 Professional scenarios

Combined with the majors and future development needs of college students, these scenarios provide professional oral practice contents. For example, for students majoring in international trade, it can simulate the scenario of foreign trade negotiation, provide relevant professional vocabulary and expression guidance; for students majoring in medicine, it can create the scenario of medical consultation and academic exchange, helping students master professional oral expression skills [12]. These scenarios closely combine oral practice with professional learning, improving the practical value of oral learning.

4.1.4 Daily communication scenarios

These scenarios is suitable for all students, focusing on improving the fluency and authenticity of oral expressions. ChatGPT simulates daily communication scenes, such as campus communication, shopping, travel and other scenarios closely related to students' life, and carries out natural dialogues with students [13]. In the process of dialogue, it timely corrects the inappropriate expressions of students, provides more authentic and natural expressions, and helps students improve their oral expression ability in daily communication [14].

4.2 Specific Implementation Paths

4.2.1 At the preparatory stage

Before carrying out oral practice, students need to clarify their own learning goals, such as improving daily oral expression, preparing for exams, or strengthening professional oral skills. At the same time, they should master the basic operation of ChatGPT, understand the functions and characteristics of ChatGPT, and set personalized parameters according to their own levels, such as the difficulty of dialogues, the types of practice contents, etc., to ensure that ChatGPT can better meet their own learning needs. In addition, students can conduct a self-assessment to clarify their own oral level and existing problems, so as to formulate more targeted practice plans.

4.2.2 At the implementation stage

According to their own oral level and learning goals, students choose the corresponding practice scenarios and contents. For students with a weak foundation, they should focus on

practicing basic pronunciation and simple sentences, and gradually improve their oral fluency through repetition; for students with a medium level, they should focus on practicing situational dialogues, improving the authenticity and fluency of oral expressions; for students with a high level, they should focus on practicing professional expressions and cross-cultural communications, improving their comprehensive oral ability. During the process, students should make full use of the real-time feedbacks of ChatGPT, correct their own errors in time, and summarize the experience and skills in practice.

It is recommended that students arrange 20-30 minutes every day to ensure the continuity of learning. At the same time, they should record their own practice process and feedback, so as to facilitate subsequent review and improvement. In addition, students can carry out interactive practice with ChatGPT according to their own time arrangement, and gradually form a good learning habit of "practicing every day, reviewing every week".

4.2.3 At the evaluation and improvement stage

After a period of practice, students need to conduct a comprehensive evaluation of their own learning effects, including self-evaluation, peer evaluation and ChatGPT feedback evaluation. Self-evaluation mainly focuses on whether the learning goals are achieved, whether the oral fluency and accuracy are improved, and whether the learning methods are appropriate; peer evaluation can be carried out with classmates with similar learning levels, exchanging practice experience and pointing out each other's problems; ChatGPT feedback evaluation can provide objective data and suggestions, helping students clearly understand their own deficiencies [15].

According to the evaluation results, students adjust their learning goals, practice contents and methods, compensate their own shortcomings, and continuously improve their oral English level and autonomous learning ability. At the same time, students should summarize the effective learning experience and skills, and apply them to subsequent learning, forming a virtuous cycle of learning.

5. Problems in Applying ChatGPT in Oral English Autonomous Study

5.1 Insufficient Authenticity and Naturalness

of Language Expressions

Although ChatGPT can generate fluent oral dialogues, its training corpora are global and standardized, somewhat lacking pertinence to the immediate learning and life scenarios of college students [16]. For example, in daily communication scenarios on campus, the oral expressions generated by ChatGPT may be too standardized, lacking the casualness and authenticity of daily communication, inconsistent with the actual oral expression habits of college students.

In addition, due to the differences in the training corpora some expressions generated by ChatGPT are not completely consistent with the actual oral habits of college students, and even have minor errors in individual professional fields, which may mislead students with weak discrimination ability. At the same time, the language expressions of ChatGPT lack emotional profiles, and cannot fully reflect the intonation and emotional changes in real communication, resulting in the lack of vividness and authenticity of students' oral expressions.

5.2 Students' Over-Reliance on ChatGPT

In the process of using ChatGPT for oral practice, some students have a strong dependence on ChatGPT. They only passively accept the feedback and guidance provided by ChatGPT, and do not take the initiative to think about the application of oral knowledge and the optimization of expression methods. For example, some students directly copy the model expressions provided by ChatGPT without independent thinking and innovation, resulting in the lack of flexibility in their oral expressions, and even the inability to independently organize language when there is no guidance from ChatGPT.

In addition, some students rely too much on the error correction of ChatGPT, and do not take the initiative to find and correct their own problems, resulting in the inability to form their own independent thinking and problem-solving ability. This kind of over-reliance not only affects the improvement of students' oral expression, but also is not conducive to the cultivation of their autonomous learning ability.

5.3 Limited Functional Adaptability and High Usage Threshold

The speech recognition function of ChatGPT is

affected by the students' oral level and environmental factors. For students with heavy accents, the recognition accuracy of ChatGPT will be reduced, affecting the effect of oral practice [17]. At the same time, some advanced functions of ChatGPT, such as professional scenario customization and personalized learning plans, require certain operational skills and professional knowledge, which brings certain difficulties to students with poor digital literacy and weak learning foundation.

In addition, some advanced functions of ChatGPT require paid services, and the cost of using them increases the economic burden of students. For some students from ordinary families, it is difficult to use these paid functions, which limits the popularization of ChatGPT. At the same time, the operation of some functions are relatively complex, and students who are not familiar with the technology need to spend a lot of time learning and adapting, which affects the efficiency of oral practice.

5.4 Lack of Effective Supervision and Professional Guidance

Oral English autonomous study requires strong self-discipline, which many college students are weak in, hence difficult to persist in long-term oral practice. ChatGPT itself does not have a perfect supervision mechanism, and cannot effectively supervise the learning process of students, resulting in some students only using ChatGPT occasionally, failing to form continuous practice, and the learning effect is not obvious.

In addition, most college students lack professional guidance in oral practice. They do not know how to use ChatGPT to carry out targeted practice according to their own level, and cannot effectively combine their own learning goals with ChatGPT's functions, resulting in low practice efficiency. At the same time, there is a lack of professional teachers' guidance in the process of oral practice, and students cannot get timely and professional suggestions, which affects the improvement of their oral level.

6. Optimization Strategies for ChatGPT Application in Oral English Autonomous Study

6.1 Improving Authenticity and Naturalness of Training Contents

According to the learning needs and life scenarios of college students, ChatGPT should be optimized to enhance the pertinence of language outputs. For example, combined with the campus life, professional learning and future career development of college students, the scenario setting and language expressions should be adjusted to make the generated content more in line with the actual situation of college students. At the same time, the language expressions should be optimized to increase the colloquial and emotional profile of the language, reduce the sense of machinery, and make the oral expression more natural and authentic. In addition, students should be guided to compare the differences between the expressions generated by ChatGPT and the real oral expressions, and learn to screen and optimize the low-quality ones, so as to avoid being misled by the standardized expressions of ChatGPT. Teachers can also provide students with authentic oral expressions, help students understand the differences between writing and speaking, and improve the authenticity of students' oral expressions.

6.2 Guiding Students to Reduce Over-Reliance

Universities and teachers should strengthen the guidance for students, let students clearly realize that ChatGPT is only an auxiliary tool for oral learning, not a substitute for independent thinking and practice. Guide students to take the initiative to set learning goals, formulate learning plans, and independently complete the whole process of oral practice, feedback and improvement. Encourage students to think independently, combine their own learning experience and professional knowledge, and avoid blind dependence on ChatGPT.

At the same time, through the form of group discussion and mutual evaluation, guide students to communicate and learn from each other, improve their independent thinking ability and problem-solving ability, and realize the organic combination of "AI assistance with independent learning". For example, organize students to carry out oral practice exchange activities, let students share their experience of using ChatGPT, and guide each other to reduce over-reliance.

6.3 Improving Functional Adaptability and Lowering Use Threshold

Efforts should be made to optimize ChatGPT's speech recognition and scenario customization functions, improve the accuracy of speech recognition, reduce the impact of accents and environmental noise, and ensure that the feedback and guidance are more accurate. Increase the free basic functions, open more basic oral practice resources to students for free, reduce the economic burden of students, and promote the popularization of ChatGPT.

At the same time, universities should carry out training courses on the use of ChatGPT, teach students how to use ChatGPT to carry out oral practice efficiently, help students master the operation skills, and improve the efficiency of using it. For students with poor digital literacy, targeted guidance should be provided to help them master the basic operation methods and improve the effect of oral practice.

6.4 Establishing a Perfect Supervision and Guidance System

Self-supervision of students should be combined with the mutual supervision of peers and the guidance of teachers to form a three-in-one supervision system. Students should formulate detailed learning plans and strictly implement them to ensure the continuity of oral practice; peers should supervise each other, exchange practice experience and point out each other's problems; teachers should regularly check the students' practice records, provide professional guidance and suggestions, and help students solve the difficulties encountered in the practice process.

In addition, universities can establish a learning evaluation system, combine the practice records of students, the feedback of ChatGPT and the evaluation of teachers to comprehensively evaluate the learning effect of students, and guide students to adjust their learning plans and methods in time to ensure the continuous improvement of students' oral English level.

7. Conclusion

ChatGPT, as a new type of AI tool, has obvious application value in college students' autonomous oral English learning. It can effectively solve such dilemmas as lack of practice partners, delayed feedback and limited learning content, and provide personalized support and immersive practice environment for students. Through the organic combination of autonomous learning theory, constructivist

learning theory and input hypothesis, it helps students improve their oral expressing ability, cultivate autonomous learning ability and cross-cultural communication ability.

However, in the actual application process, ChatGPT also has such problems as insufficient authenticity of language expressions, students' over-reliance, limited functional adaptability and lack of effective supervision. Through targeted optimization strategies, such as improving the pertinence of content design, improving functional adaptability and building a perfect supervision and guidance system, these problems can be effectively solved, to give a full play to the role of ChatGPT in oral English autonomous study and promote the high-quality development of oral English teaching for college students.

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