

The Current Situation of English Intonation Acquisition among Chinese EFL Learners

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Abstract: *With the shift in the focus of college English curriculum content in China, the traditional teaching model centered on imparting grammar and vocabulary knowledge is gradually evolving into a new model that caters to the needs of cross-cultural communication and emphasizes the cultivation of oral English skills. Against this backdrop, English learners are paying increasing attention to English intonation. However, they encounter numerous problems during the actual acquisition process. To address the issue of poor intonation accuracy among English learners, represented by college students, this study takes 113 students from the 2020 - 2024 grades at Guangzhou City University of Technology as the research subjects. Data is collected through the Quwenjuan system, covering three aspects: basic cognition of English intonation, listening tests, and speaking tests. Excel is used for data analysis. The study reveals that learners have achieved certain results in mastering basic intonation rules, but they lack the ability to apply complex intonation. There is also a gap between their cognitive and practical abilities. The consistency among listening, speaking, and cognitive abilities is poor, with problems such as the mechanical application of intonation patterns and an inability to express meaning flexibly. Based on these findings, this study puts forward targeted suggestions: learners should strengthen practical training and make diverse use of learning resources; teachers need to systematically teach English intonation knowledge and implement a diversified teaching model. This research aims to provide references for English intonation learning and teaching in China, improve the quality of language communication, reduce intonation-related misunderstandings in cross-cultural communication, and promote cross-cultural communication.*

Keywords: English intonation, Current situation, Intonation teaching, Chinese English learners.

1. Introduction

1.1 Research Background

As an important linguistic phenomenon in verbal communication, language has always attracted people's attention. It usually plays a role in helping or enabling discourse to convey the intended meaning. As an important part of language communication, English intonation has unique rhythmic characteristics and communicative functions. It can not only convey the speaker's emotions, attitudes, and intentions but also affect the listener's understanding and acceptance of the information. However, due to the significant differences between Chinese and English in the intonation system, Chinese learners often face great challenges in mastering English intonation, such as the lack of configuration and changes in intonation. In view of this, this paper deeply understands the characteristics and problems of Chinese learners in intonation acquisition, aiming to attract the attention of foreign language scholars in my country to the teaching of English phonetics and intonation and help Chinese English learners learn English intonation more effectively.

1.2 Research Objectives

This study aims to systematically investigate Chinese EFL learners' cognitive and practical competence in English intonation acquisition, proposing optimized strategies through multidimensional evaluation. Firstly, it examines learners' subjective awareness of their theoretical understanding of English intonation systems, including their grasp of basic intonation patterns and contextual application rules, thereby identifying strengths and gaps in their knowledge framework to inform pedagogical improvements. Subsequently, through meticulously designed listening comprehension tests, the research empirically evaluates learners' sensitivity to

intonation cues in speech perception, specifically assessing their ability to discern semantic nuances, emotional attitudes, and pragmatic intentions conveyed through intonation, which helps uncover potential intonation-related decoding barriers in listening comprehension. Furthermore, oral production tests are employed to systematically analyze learners' accuracy and appropriateness in applying intonation patterns during spontaneous communication, investigating whether they can flexibly adapt contextually relevant intonation contours to align with communicative goals and emotional expressions, while also elucidating how intonation usage impacts oral fluency and semantic effectiveness. Finally, by synthesizing learners' self-reported feedback with empirical test data, the study formulates a targeted intonation training framework across three dimensions: pedagogical strategy refinement, learning resource optimization, and personalized skill development, ultimately fostering learners' holistic progression from theoretical intonation awareness to practical communicative competence.

1.3 Research Significance

Theoretically, it can improve the ability to perceive intonation. Accurately learning intonation can help learners keenly perceive the rhythmic beauty of the English language, thereby better understanding the musicality and rhythm of the English language, which is of great significance for understanding the expressiveness of language in literary works such as English poetry and drama.

In practice, the study of English intonation by Chinese English intonation learners can help improve the effectiveness of oral communication. Correct intonation can make the expression more natural and fluent, making it easier for listeners to understand the speaker's intentions, emotions, and attitudes. For example, using appropriate rising intonation can

express emotions such as doubt and surprise, while falling intonation can express statements and affirmation, which can help avoid misunderstandings in communication. In addition, it can also help enhance listening comprehension ability. Familiarity with English intonation patterns can help learners better understand the speaker's meaning during the listening process. When learners are sensitive to intonation changes, they can understand the key points of sentences based on intonation clues (such as intonation rises and falls, pauses, etc.), so as to understand the listening content more accurately. The correct use of English intonation is conducive to helping Chinese English learners integrate into English culture. Intonation reflects the cultural habits and language usage styles of English-speaking countries to a certain extent. Learning the correct English intonation can help learners better adapt to and integrate into the English environment in cross-cultural communication and reduce communication barriers caused by cultural differences.

2. Literature Review

2.1 Domestic Research on English Intonation

Domestic research on English intonation is characterized by multi-dimensional exploration, a combination of empirical evidence and theory, and a focus on teaching application. In terms of research methods, a variety of means are used in combination, focusing on the complementarity of empirical evidence and theory; in terms of research purpose, it is closely centered on teaching practice and is committed to improving learners' intonation level. In terms of research content, it deeply analyzes learners' intonation learning status from different levels and covers all aspects of Chinese English learners' English intonation learning, including the overall status of intonation acquisition, the mastery of intonation in different sentence patterns, intonation application and perception ability, learners' cognition and attitude, etc.

In the study of intonation acquisition, Zhai Ying (2023) found through experiments and data analysis that Chinese English learners lack flexibility and accuracy in the use of English intonation, and find it difficult to accurately adjust intonation according to the context to convey semantics and emotions. Zou Yu (2021) focused on the intonation of interrogative sentences and pointed out that learners have difficulties in the correct use of intonation in special and general interrogative sentences, which affects their expression in actual communication.

In terms of intonation characteristics and perception, Bai Duyue (2021) studied the intonation characteristics of English major students when reading aloud and found that students had problems such as unnatural intonation, inaccurate stress, and rhythm when reading aloud. Lu Liangjie (2016) focused on learners' perception of English intonation. The study showed that learners had differences in intonation perception, and some learners had difficulty perceiving some complex intonation patterns.

In the study of intonation habits and mother tongue transfer, Ye Xuanchen (2016) pointed out that the intonation habits of Mandarin have a transfer effect on Chinese students' learning of English intonation. The characteristics of Chinese

intonation make it difficult for learners to adapt to the changing rules of English intonation, and they are prone to intonation errors. Bu Youhong (2016) conducted a comprehensive analysis of the intonation acquisition problems of Chinese English learners, emphasizing that negative transfer of the mother tongue is one of the important factors that lead to learners' difficulty in intonation acquisition. At the same time, it also explored problems in learners' own cognition, learning strategies, etc.

In the empirical research on intonation teaching, Liu Yunhong and Bai Lan (2020) verified the effectiveness of diversified teaching methods in improving students' English intonation levels through teaching experiments. They found that the teaching model combining phonetic training, contextual teaching, and interactive activities can better improve students' intonation application ability. Pan Hong (2013) analyzed the problems of college students' English intonation acquisition and pointed out that college students have problems such as insufficient attention and lack of systematic learning in English intonation learning, and called for strengthening English intonation teaching.

2.2 Foreign Studies on English Intonation

There are few studies on the intonation patterns of Chinese English learners abroad, and most of them focus on the intonation patterns of foreign English learners. Munro (1999) conducted a study on 10 native speakers and 10 non-native speakers and found that there were significant differences between the intonation patterns of non-native speakers and native speakers.

In terms of the basic theory and system construction of intonation, Hirst and Di Cristo (1998) investigated the intonation systems of multiple languages, providing a cross-language perspective for the study of English intonation, which helps to understand the commonalities and characteristics of English intonation in different language environments, enabling researchers to grasp the essence of English intonation from a more macro perspective, and has important reference value for in-depth research on the structure and function of English intonation. Nolan (2020) gave a comprehensive explanation of English intonation, covering all aspects of intonation, such as the basic components of intonation and its specific role in language communication, providing a systematic theoretical framework for the study of English intonation, helping researchers to sort out and understand the complex system of English intonation.

In the study of the combination of theory and practice of intonation, Levis (1999) re-examined the application of intonation in theory and practice and explored how to better apply intonation theory to actual language teaching and learning. This has a great significance for improving the intonation practice ability of English learners and provides important ideas and directions for subsequent related teaching research.

2.3 Similarities and Differences between Research on English Intonation at Home and Abroad

Domestic and foreign English intonation surveys have the following similarities: First, they focus on learners' intonation problems. Domestic and foreign studies focus on the problems that English learners have in intonation learning. Domestic studies have found that Chinese English learners have difficulties in intonation flexibility, accuracy, and intonation mastery of special questions and general questions; foreign studies have also pointed out that there are significant differences between the intonation patterns of non-native speakers and native speakers, reflecting the importance attached to learners' intonation problems. Second, they attach importance to teaching application research. They all focus on applying research results to teaching practice to improve learners' intonation levels. Domestic empirical research verifies the effectiveness of diversified teaching methods and calls for strengthening intonation teaching; foreign countries explore the application of intonation theory in actual teaching and learning, providing ideas for teaching research. Third, multiple research methods are used. Domestic and foreign studies use multiple research methods. Domestic studies use a combination of experiments, data analysis, and teaching experience summary methods; foreign studies use comparative studies, cross-language surveys, theoretical explanations, and other means to conduct in-depth research on English intonation from different angles.

In addition, by comparing the research on English intonation at home and abroad, we found that, on the one hand, the research objects have different focuses. Domestic research mainly focuses on Chinese English learners and deeply analyzes the intonation acquisition of Chinese learners; foreign research focuses more on the intonation patterns of foreign English learners, and less research on the intonation patterns of Chinese English learners. On the other hand, the depth and breadth of the research are different. Foreign countries are more mature in the basic theory and system construction of intonation, such as Hirst and Di Cristo's (1998) investigation of the intonation systems of multiple languages, and Nolan's (2020) comprehensive and systematic explanation of English intonation. Domestic research is relatively weak in the construction of theoretical systems, and focuses more on starting from the actual problems of Chinese learners, studying intonation acquisition, perception, teaching, and other aspects.

In addition, English-speaking countries are more mature in the study of intonation. Alan Cruttenden's book *Intonation* (1997) summarizes the relevant contents of the British and American intonation school theories. Alan Cruttenden believes that intonation is composed of rise and fall. Rise includes high rise, low rise, and fall rise; fall includes high fall, low fall, and high rise. In English, declarative sentences usually use falling intonation by default, while interrogative sentences mostly rising intonation. However, the correspondence between sentence type and intonation type is not static. The fluctuation of intonation will cause differences in semantics and language communication and is interrelated with syntax, semantics, and pragmatics. Therefore, these experiences are of great reference significance to my country, and provide a broader perspective and theoretical basis for the study of English intonation acquisition.

However, the current research on intonation acquisition by

Chinese English learners has a significant gap in learners' cognition of intonation. Existing research focuses on external manifestations such as intonation use, perception, and mother tongue transfer, but pays insufficient attention to the internal aspects of how learners themselves perceive English intonation, such as its importance, components, and functions. Few studies have explored in depth whether learners clearly understand the key role of intonation in conveying attitudes, and emotions, and distinguishing semantics. There is also a lack of systematic research on learners' mastery and cognitive level of the basic components of English intonation, such as intonation groups, intonation cores, and intonation patterns. Moreover, there is almost no research on learners' cognition of the laws of intonation changes in different contexts.

Therefore, this study conducts in-depth analysis from multiple dimensions, focusing not only on learners' intonation performance but also on the relationship between listening, speaking, and cognition. At the same time, considering the influence of mother tongue transfer, this study explores the factors that affect Chinese English learners' English intonation acquisition and explores the learning and teaching issues behind it. This provides a more in-depth and comprehensive perspective for understanding Chinese English learners' intonation learning.

3. Research Methods

3.1 Research Subjects

This study takes 113 students from the undergraduate college Guangzhou City Polytechnic from 2020 to 2024 as an example, of which 24 are male, accounting for 21.2%, and 89 are female, accounting for 78.8%. In terms of grade, there are 5 participants from the 2020 grade, accounting for 4.4%, 16 participants from the 2021 grade, accounting for 14.2%, 21 participants from the 2022 grade, accounting for 18.6%, the 2023 grade has the largest number of participants, reaching 44, accounting for 38.9%, and 24 participants from the 2024 grade, accounting for 21.2%.

3.2 Research Tools

This study uses the Fun Questionnaire system to collect questionnaire survey data. The questionnaire covers three aspects: basic cognition of English intonation, English intonation listening questions, and English intonation oral questions. Among them, the English intonation basic cognition questionnaire examines the respondents' ability to distinguish between rising, falling, falling-rising, and flat intonation from three dimensions: intonation recognition ability, comprehension ability, and application ability. It examines the respondents' ability to distinguish between rising, falling, falling-rising, and flat intonation, as well as their understanding of the emotions or intentions conveyed by different intonations, and their ability to accurately convey semantics and emotions using intonation in oral expression. There are 33 items in total. The English intonation oral questions contain 10 questions, which are collected in the form of recordings. The English intonation listening questions are set with reference to the "Pute Listening Lecture Hall" compiled by Wang Jing, a famous scholar in English language and literature. There are 14 questions in total, which are

divided into four levels using the total score system: 14 points are the highest level, indicating clear intonation cognition; 13 - 8 points are relatively high-level and clear; 8 - 5 points are in the middle level, less clear; and 5 points or less are the lowest level, which is unclear. Then Excel is used for data analysis.

3.3 Research Results and Discussion

3.3.1 Intonation Cognitive Analysis

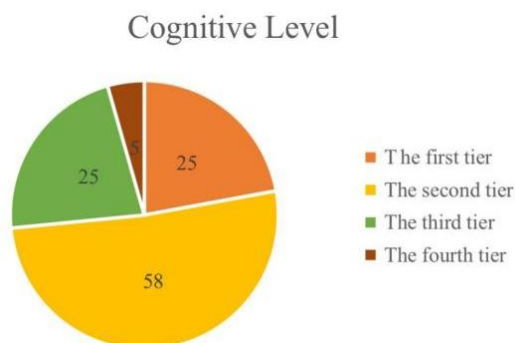


Figure 1

In the process of learning English, the acquisition of intonation is one of the important dimensions to measure English language proficiency. In order to gain a deeper understanding of Chinese English learners' cognition and actual level of English intonation, this study collected information on Chinese English learners' intonation acquisition through a questionnaire survey. The content of the questionnaire was designed based on basic English sentence patterns such as declarative sentences, general questions, and special questions. Seven questions about the basic level of English intonation cognition were designed, and specific sentences were used to examine Chinese English learners' understanding of the use of rising and falling intonation in actual situations. For example, Question 27 "Can you accurately read the following sentence with falling intonation: 'Chocolate is my favorite food.' The correct way to read the sentence should be with a falling tone. The data we collected showed that the students who thought they could read the falling tone more accurately accounted for the largest proportion, 40.6%. The students who thought they were not very accurate and were accurate enough accounted for 27.1% and 26.0% respectively, while the students who thought they were inaccurate and completely inaccurate accounted for a smaller proportion, 4.2% and 2.1% respectively. This shows that most English learners think they can read the falling tone more accurately, and some people have a low evaluation of their own ability. In terms of the distribution of the total score of cognitive level, most students are concentrated in the middle two levels, with more people at the top (first level) than at the bottom (fourth level), showing a distribution with more in the middle and fewer at both ends, and the top being larger than the bottom.

For example, in question 28, "Can you accurately read the following sentence with a rising tone: 'Can you give me the chocolate?' The students who thought they could read the falling tone more accurately also accounted for the largest proportion, 38.5%. The students who thought they were not very accurate and were accurate enough accounted for 32.3% and 24.0% respectively, while the students who thought they were inaccurate and completely inaccurate still accounted for

a smaller proportion, 5.2% and 0% respectively. The overall trend is the same as the former. This obvious difference in cognitive level further reveals the complex situation of Chinese English learners in learning English intonation. Based on the statistics of the overall data collected from the questionnaire, there are 25 people with a total cognitive level score in the first level [10,14], who believe that they are proficient and proficient; there are only 5 people in the fourth level [-11,-5], who believe that they have mastered very little. Most of the students are concentrated in the second level [3,9] and the third level [-4,2], with 58 and 25 people respectively, indicating that Chinese English learners have a large difference in their own cognitive level of English intonation acquisition. The overall distribution is more in the middle, less at the two ends, and the top is greater than the bottom. This is consistent with the trend shown in the previous specific topic survey, reflecting that Chinese English learners have obvious differences in their level of cognition of English intonation, and the matching degree between English learners' cognition and actual ability is uneven. Many students' cognition of their own English intonation-related abilities is inconsistent with their actual performance.

Each level corresponds to a different performance description (as shown in Figure 1), such as "excellent performance, far exceeding the expected standard" and "good performance, meeting most of the standard requirements". Combined with the method of adding and subtracting points, the five-level options are divided as follows: very accurate corresponds to 2 points, accurate is 1 point, unclear is 0 points, inaccurate corresponds to -1 point, and completely inaccurate is -2 points. On this basis, the score range is divided into four levels: the first level [10,14]: is excellent performance, far exceeding the expected standard; the second level [3,9]: is good performance, meeting most of the standard requirements; the third level [-4,2]: average performance, basically meeting the basic standards; the fourth level [-11,-5]: poor performance, with a large gap from the standard. Different levels can correspond to different assessment results. For example, individuals in the first level [10,14] may receive higher bonus points in the assessment, while individuals in the fourth level [-11,-5] may be deducted points. This grading method helps to quantify the assessment of individuals based on specific values, which can more intuitively reflect the performance level of individuals under relevant standards and provide a clear reference for subsequent evaluations and decision-making.

In summary, most Chinese English learners perform well in mastering basic intonation rules. The correct rate of oral test questions designed for basic intonation rules generally reaches more than 90%, indicating that learners have made certain achievements in acquiring basic rising and falling intonation and common sentence intonation patterns. However, problems arise in the use of complex intonation and actual communication scenarios. Once complex oral questions are involved, such as antonymic questions and enumeration sentences that are rarely involved in daily life, many learners find it difficult to accurately grasp the intonation, resulting in improper use of intonation and a significant drop in the correct rate.

3.3.2 Oral Test Analysis

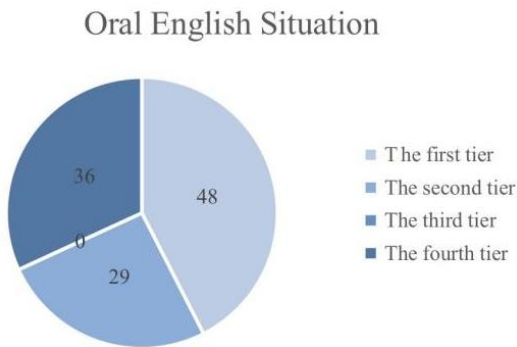


Figure 2

In order to achieve accurate and detailed quantitative analysis in individual oral assessment, this study has formulated relevant scoring criteria and grading principles and adopted the form of a two-person group assessment combined with a third-party review for scoring. The scoring criteria are: adopting a total score system, with a total score set at 10 points. The evaluation content covers basic sentence patterns such as declarative sentences, general interrogative sentences, special interrogative sentences, antonymous interrogative sentences, and imperative sentences. When scoring specifically, 1 point is given to each sentence based on the accuracy of the expression. If all 10 sentences are accurate, a full score of 10 points can be obtained; if it is accurate, 1 point is given to each sentence; if it is unclear or inaccurate, 0 points are given to each sentence. This setting provides a basic quantitative basis for subsequent grade grading and individual performance evaluation. The scores are further divided into four levels (see Figure 2): Level 1 (8–10 points): Individuals in this range perform extremely well, and their abilities and performance far exceed the expected standards; Level 2 (5–7 points): Individuals in this level perform well and can meet most of the standard requirements; Level 3 (3–4 points): Individuals in this level perform generally and basically meet the basic standards; Level 4 (0–2 points): Individuals in this level perform poorly and there is a large gap with the standards. This grading method is based on specific values and provides a clear quantitative assessment of individuals, which can intuitively reflect the performance level of individuals under the corresponding standards, and provides a reference basis for subsequent English intonation teaching guidance.

In the context of globalization, oral English expression is becoming more and more important. However, English teaching in my country has long been focused on the cultivation of pronunciation and intonation. Although many students have a basic vocabulary and grammar, their oral expression has problems such as inaccurate intonation and monotonous intonation, which seriously affects the actual communication effect. In order to investigate the use of English intonation by Chinese English learners in actual oral situations, this study designed 10 questions including declarative sentences, special questions, antonymous questions, and imperative sentences. Among them, the one with the highest correct rate was question 1: “I like reading books.” This sentence is a declarative sentence and should use a falling tone. This shows that many students have a certain degree of mastery of simple sentences with clear structure and easy-to-grasp intonation, and have a clear understanding of the basic rules of declarative sentence intonation. The one

with the highest error rate was question 9: “It’s a nice house, isn’t it?” This sentence is an anonymous question and should use a falling tone, which shows that Chinese English learners have insufficient mastery of complex sentence intonation. The intonation rules of tag questions are relatively complex. Learners may lack sufficient practice and understanding and cannot accurately grasp when to use the correct intonation such as falling intonation. Moreover, the correct use of English intonation is closely related to the context. Learners may not fully consider the contextual factors when answering questions and simply judge the intonation from the perspective of sentence pattern, which leads to the wrong choice of intonation. By statistically analyzing the audio data of Chinese English learners, the correct rate of oral questions from questions 1 to 8 is above 90%. This data directly reflects that most learners have a good grasp of the basic intonation rules and have achieved certain learning results in the basic level of English intonation, such as basic rising and falling intonation and the use of intonation patterns in common sentence patterns.

Although most Chinese English learners perform well in simple oral questions with basic intonation rules, their accuracy rate will drop when faced with more complex oral sentence patterns. For example, the accuracy rate of question 9 is only 55.75%: “It’s a nice house, isn’t it?” Compared with question 8, which is also a question with an antonym, question 9 may have a more complex context. For example, the speaker may say this sentence with different emotional attitudes, such as simply stating facts, expressing admiration, or with irony. The Intonation will change in different contexts, and learners may find it difficult to accurately grasp the specific context and thus fail to choose the right intonation. Secondly, question 10: “We went to France, Spain, Germany, Denmark, America, and China.” The accuracy rate of this sentence is 85.84%. Compared with the first eight questions, the reason for the lower accuracy rate of this question is the complex sentence structure and diverse intonation rules. This sentence contains multiple parallel country names and belongs to a longer enumeration sentence pattern. Compared with the simple declarative sentences and special interrogative sentences in the first eight questions, the structure is more complex and the intonation changes are more difficult to grasp. Chinese English learners may lack sufficient practice and understanding of the intonation rules of such complex sentences. When listing multiple things in a sentence, there is usually a change in intonation (such as rising or flat intonation) before the last item, and there is also a requirement for intonation consistency throughout the listing process. Learners may find it difficult to master these rules accurately, resulting in errors.

In summary, most Chinese English learners perform well in mastering basic intonation rules. The correct rate of oral test questions designed for basic intonation rules generally reaches more than 90%, indicating that learners have made certain achievements in acquiring basic rising and falling intonation and common sentence intonation patterns. However, problems arise in the use of complex intonation and actual communication scenarios. Once complex oral questions are involved, such as antonymic questions and enumeration sentences that are rarely involved in daily life, many learners find it difficult to accurately grasp the

intonation, resulting in improper use of intonation and a significant drop in the correct rate.

3.3.3 Listening Test Analysis

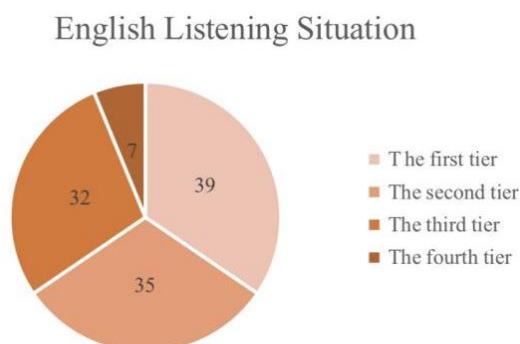


Figure 3

In order to achieve accurate quantitative analysis in individual listening assessment, this study has formulated relevant scoring criteria and grading principles, among which the scoring criteria adopts a total score system, and the total score is set to 14 points. If all 14 sentences are correct, the full score is 14 points; 1 point per sentence is correct; 0 point per sentence is wrong. This setting provides a basic quantitative basis for subsequent grade grading and individual performance evaluation. The grades are further divided into four grades (see Figure 3): Grade 1 (11–14 points): learners in this range have excellent listening skills; Grade 2 (7–10 points): learners in this grade have good listening skills; Grade 3 (4–6 points): learners in this grade have average listening skills; Grade 4 (0–3 points): learners in this grade have poor listening skills. This grading method is based on specific values and provides a clear quantitative assessment of individuals, laying a basic quantitative basis for subsequent assessment of individual listening performance.

The assessment content covers the intonation of different sentence patterns, the meaning of intonation changes, and their actual application in dialogue, aiming to comprehensively test learners' mastery and application of intonation. Judgment of sentence pattern intonation involves intonation testing of declarative sentences, interrogative sentences, and imperative sentences. Antonymous interrogative sentences such as "Pro. Wang's lecture wasn't great, was it?" and "Pro. Wang's lecture was great, wasn't it?" require intonation judgment to understand the speaker's attitude; special interrogative sentences such as "How did the woman like Paris?" test whether learners can judge the speaker's focus and tone of inquiry from intonation. Normal intonation is a simple inquiry; if the intonation changes, it may be emphasized, curious, or other emotions. Different intonations reflect the difference in intonation intensity and test the understanding of the relationship between intonation and intonation.

In terms of understanding the meaning of intonation changes, in question 4, "What did the woman want to express?", option c is "She thought that it was unbelievable that Mike had been to America." If the woman uses a rising tone to say the relevant content in the conversation, she may express surprise and doubt, that is, she finds it unbelievable that Mike had been to America; if she uses a falling tone, she may just be stating an opinion. Through such questions, we can test whether

learners can understand the speaker's true intention based on intonation changes.

In terms of testing the use of intonation in dialogue, in question 7, "What does the man imply?", option b is "The man didn't believe what the woman said." When a man responds to a woman in a dialogue, if he uses an antithetical question with a rising tone, such as "You said that, didn't you?", it will have a questioning tone, reflecting his distrust of the woman's words. This requires learners to understand and be able to use appropriate intonation to express attitudes in dialogue. In listening to dialogue comprehension questions, learners need to judge the speaker's intentions, attitudes, and emotions based on intonation. When hearing a rising tone, judge whether the speaker is asking for information; when hearing a falling tone, judge whether he is stating an opinion or giving an order. This examines the actual use and understanding of intonation in real communication scenarios.

Listening comprehension plays an important role in language learning and is also an important way to perceive and acquire correct intonation. In order to gain a deeper understanding of the current status of Chinese English learners in intonation acquisition, especially their ability to understand and use intonation in different sentence patterns in listening scenarios, the questionnaire designed in this study comprehensively evaluates the strengths and weaknesses of Chinese English learners in intonation acquisition by setting listening questions covering a variety of sentence patterns. From the evaluation results, questions with relatively high accuracy rates, such as questions 2, 5, 10, and 12, may involve intonation applications related to daily scenarios or basic grammatical knowledge that students are more familiar with, such as declarative sentences and simple interrogative sentences commonly seen in daily conversations. Learners are exposed to these intonation expressions more frequently in daily learning and have a relatively solid foundation, so they can understand and answer them better. Question 2, "What does the woman mean?", has the highest accuracy rate of 78.7%. This question involves scenarios that Chinese English learners are familiar with in daily life and basic and simple intonation knowledge. For example, common general interrogative sentences frequently.

3.3.4 Discussion on the relationship between listening, speaking, and cognition

When evaluating the English intonation-related abilities of Chinese English learners, there are three grading criteria for listening and cognition, speaking and cognition, and speaking, listening and cognition. The first is the grading criteria for listening and cognition, which is judged by comparing the corresponding grades of listening and cognition. If the two are at the same grade, it is marked as "consistent"; if the two are at different grades, it is marked as "inconsistent". Secondly, the grading criteria for speaking and cognition are the same as those for listening and cognition. That is, the corresponding grades of speaking and cognition are also compared. When the two are at the same grade, it is marked as "consistent"; if the two are at different grades, it is marked as "inconsistent". Finally, the grading criteria for speaking, listening, and cognition need to comprehensively consider the corresponding grades of the three. Among them, when

speaking, listening, and cognition are all at the same grade, it is marked as “completely consistent”; if only two of speaking and cognition, or listening and cognition are at the same grade, it is marked as “partially consistent”; if the three are at different grades, it is marked as “inconsistent”. These grading criteria provide clear standards and a basis for comprehensively and systematically evaluating learners’ performance in English intonation.

When exploring the performance of English intonation among Chinese English learners, we first focus on the consistency between listening and cognition. From the perspective of consistency, 44 consistent samples show that some learners have achieved a certain degree of consistency in the listening comprehension and cognitive level of English intonation. This means that these learners can more effectively apply the knowledge of intonation they have learned to listening comprehension in the process of learning English intonation. However, the number of inconsistent samples is as high as 69, which reflects that there is a disconnect between the listening performance and cognitive level of more learners. On the one hand, learners may have a certain understanding of the rules and meanings of English intonation in cognition, but in the actual listening process, due to the interference of factors such as speaking speed, accent, and context, they cannot accurately match the intonation they hear with their cognition.

The consistency between oral expression and cognition is also an important dimension of analysis. From the perspective of consistency, 32 consistent samples show that some learners have achieved a certain degree of consistency between oral expression and cognition of English intonation. This means that these learners can apply the knowledge of intonation they have learned to oral expression. However, the number of inconsistencies is as high as 81, reflecting that most learners have a disconnect between oral performance and cognitive level, do not have a deep or flexible grasp of intonation knowledge, and cannot adjust oral intonation according to different contexts and expression needs, resulting in inconsistency between oral expression and cognition.

The consistency in the relationship between speaking, listening, and cognition is more complicated. There are only 13 completely consistent samples, which shows that it is not common to have completely consistent intonation performance in speaking, listening, and cognition at the same time. This reflects that for most Chinese English learners, it is difficult to achieve a high degree of consistency in the three dimensions of oral expression, listening comprehension, and cognition of intonation; there are 54 partially consistent samples, which means that there are quite a few learners who have shown a certain consistency in intonation in two of the three aspects of speaking, listening and cognition; there are 45 inconsistent samples, reflecting that there are large differences in the performance of intonation in the three aspects of speaking, listening and cognition among many learners, and no consistency is shown.

In general, on the one hand, learners use intonation patterns mechanically. For example, special questions are all in falling intonation, while declarative sentences, imperative sentences, general questions, etc. are all in rising intonation. This results in learners being able to handle short sentences, but not

knowing how to handle the ups and downs of pitch when encountering long or complex sentences, and not knowing how to use rhythm, pauses, pitch, and sound to highlight the effect of oral communication. At the same time, due to little knowledge of the expression of English intonation, many learners do not understand the relationship between intonation and information transmission, which leads to ambiguity or even misunderstanding due to improper use of intonation.

On the other hand, learners cannot flexibly use English intonation to express their true intentions. Because learners lack a systematic English intonation learning system, they tend to simply imitate sentence patterns and basic intonation patterns or only follow the default intonation of sentence patterns in the use of specific intonations, while ignoring the paralinguistic functions of English intonation and the large amount of knowledge related to social and cultural factors in intonation. As a result, learners often fail to communicate with native English speakers while overcoming pronunciation barriers and achieving relatively satisfactory speech effects, which is what we often say is that they cannot hear the hidden meaning. In fact, when native English speakers communicate, in addition to the semantics formed by syntactic vocabulary, they will naturally use the communicative functions of intonation and paralinguistic meanings to enhance the effect of discourse. For Chinese students, due to the lack of a natural language learning environment and process and the influence of negative transfer from Chinese, the difficulty of learning English intonation is self-evident.

3.4 English Intonation Learning and Teaching Suggestions

3.4.1 Study Suggestions

To improve the learning effect of English intonation, learners should strengthen practical training and diversify learning resources. First, in daily oral communication, students can design a series of rich practical exercises and actively try to apply theoretical learning to actual communication scenarios, such as oral dialogue, role-playing, and group discussion, to help learners transform intonation knowledge into practical application ability. Through practical training, students can better master the application skills of intonation and improve the accuracy and fluency of oral expression. Moreover, they can not only refine their intonation skills but also identify and correct mistakes in practice, thereby continuously enhancing their oral accuracy. Additionally, practical training boosts students’ self-confidence and oral communication skills, laying a solid foundation for them to use English intonation effectively in future studies and work.

Second, learners should make full use of diverse learning resources. One crucial approach is increasing opportunities to communicate with native English speakers, as this allows learners to observe the natural use of intonation and adapt it to different contexts, emotions, and intentions—an experience that textbooks or software cannot replicate. Another effective method is enrolling in specialized intonation training courses, where experienced instructors can provide personalized guidance. In these courses, students learn intonation theory and techniques while reinforcing their skills through practical exercises. Furthermore, learners can utilize English intonation

learning software and websites, which offer extensive materials and exercises for activities like intonation imitation and speech recognition. By selecting resources that match their needs, they can engage in personalized learning. At the same time, these tools provide instant feedback, helping learners track their progress and adjust their strategies accordingly.

In summary, combining practical training with diverse learning resources ensures a comprehensive approach to mastering English intonation.

4. Conclusion

This study focuses on the acquisition of English intonation by Chinese English learners and deeply analyzes the consistent relationship between listening, oral expression, and cognitive ability in intonation acquisition by Chinese English learners, as well as the key factors that affect the consistency of the three. From the research results, it can be seen that Chinese English learners have a relatively good grasp of both speaking and listening in basic simple sentences, but they have difficulty grasping intonation in complex sentences.

In view of the problems found in the study, the proposed learning and teaching suggestions provide a feasible direction for improving the current situation. However, to truly improve the English intonation level of Chinese English learners, the joint efforts of learners and educators are needed. Learners should actively participate in practical training, make full use of various learning resources, and continuously strengthen their perception and application of English intonation; educators need to pay more attention to intonation teaching in the teaching process, carefully design teaching content, innovate teaching methods, create a good language learning environment, and guide students to gradually master the essence of English intonation.

In the future, as cross-cultural communication becomes more frequent, the importance of English intonation in language communication will become more prominent. It is hoped that this study can attract more scholars and educators to pay attention to English intonation teaching, conduct further in-depth research, continuously optimize teaching methods and learning strategies, provide more effective support for Chinese English learners, and help them express themselves more confidently and accurately in cross-cultural communication, and achieve smoother communication.

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