

Table 1. Accuracy of BP neural network.

Sample category	Normal		Abnormal	
Test result	1	0	1	0
Accuracy	0.9516	0.0124	1	0

The accuracy of BP neural network training is reflected in the above table. It can be seen that this method accurately improves the accuracy of College Students' psychological crisis identification system, improves the efficiency of College Students' psychological crisis identification, and has higher practical application value.

Conclusions: After years of development, data mining technology has achieved good results in the wide application of various fields, which is unmatched by other technologies and methods. Data mining technology is to mine the hidden laws and value content in the data to solve specific problems. Therefore, this paper proposes to introduce data mining technology into psychological crisis signal recognition, mine and analyze the causes of students' psychological crisis factors, and provide a scientific basis for early prevention and early intervention to control the emergence of campus psychological crisis. Students' psychological crisis directly affects students' mental health, and its research is of great value.

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TEACHING EFFICACY OF CHINESE AS A FOREIGN LANGUAGE TEACHER FROM THE PERSPECTIVE OF COGNITIVE PSYCHOLOGY

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Background: With the continuous vigorous development of China's economy and the continuous enhancement of its comprehensive national strength, China's position in the world is also rising steadily. Her culture and language have attracted more and more foreign students, which has promoted the promotion and popularization of Chinese teaching all over the world. As the writing symbol system of Chinese, Chinese characters occupy a special position in the promotion of Chinese as a foreign language. The beauty of the structure of Chinese characters has stimulated people's enthusiasm for learning, but at the same time, because of its complex structure, Chinese characters are difficult to remember, write and recognize, which frightens many foreign learners. Especially in today's upsurge of Chinese, Chinese character teaching has restricted the development of teaching Chinese as a foreign language. The problem of "difficulty of Chinese characters" has become an indisputable fact and a new focus in the academic circle. In recent years, the research results of Chinese character teaching as a foreign language are quite rich, but because of its short research history, most researchers study one side and lack of systematicness, so the teaching efficiency is not high and the effect is not ideal. At present, although the research on Teaching Chinese characters as a foreign language has made some progress, it has also promoted the teaching of Chinese characters as a foreign language to some extent. However, in the actual teaching of Chinese as a foreign language, the problem of difficult Chinese characters has not been fundamentally solved, and the efficiency and quality of Chinese character teaching have not been greatly improved. Based on the existing research results of cognitive language psychology theory, combined with their own practical teaching experience and the results of traditional Chinese teaching research in China, this paper analyzes the characteristics, cognitive law and learners' cognitive psychology of Chinese characters, and reexamines the sense of efficacy of Chinese character teaching as a foreign language.

Based on the main line of how Chinese characters promote "recognition" and "writing", this paper studies and discusses the relationship between "recognition" and "writing", as well as the classroom operation steps and specific methods in the theory of cognitive psychology. In order to get an effective teaching model and operable methods, and provide some theoretical reference for the compilation of Chinese character teaching materials, serve the teaching of Chinese as a foreign language, and promote the more detailed, scientific and effective development of Chinese character teaching as a foreign language.

Subjects and methods: The position and development of teaching Chinese characters as a foreign language in teaching before the 1980s, there was no independent textbook for Chinese character teaching, which has always been an auxiliary part of intensive reading course. The content of teaching Chinese

characters as a foreign language is also integrated into intensive reading course, and it is mainly carried out in the basic stage. At that time, the general Chinese textbooks mainly focused on intensive reading, and the knowledge of Chinese characters was very little, and appeared in incidental forms. There were only simple strokes, stroke order, structural analysis and other contents. For font analysis, it only appeared in the new word list attached after class. After the later stage of the primary stage, the introduction of Chinese character knowledge was almost rare. The Chinese characters were separated from the basic teaching materials in the late 1980s and used with the matching teaching materials. At this time, the content of Chinese characters tends to be completer and more substantial than before. Academic experts have noticed the lagging status of the study of Chinese characters and jointly called for attention and Reform in view of its weak links. From the initial vassal stage to the stage of independent research, Chinese characters have become the focus of academic research. It can be said that this conference is a historic turning point.

Study design: Based on the analysis of the cognitive characteristics of Chinese characters and the problems of foreign learners in learning Chinese character writing, the author uses the existing achievements of Chinese character teaching and research as a foreign language, and increases the reliability of the research through data analysis.

A. Experimental purpose

This paper explores the relationship between “recognition and writing” through experiments, so as to provide some experimental basis for the smooth development of Chinese character teaching.

B. Subjects

The school of international education of XX University participated in two zero basic classes of Chinese courses, including 20 students, 13 students in the autumn of 2011 and 7 students in the spring of 2011, including 1 student from Bangladesh, 11 students from Saudi Arabia, 1 student from Zambia, 2 students from Kenya, 4 students from Pakistan and 1 student from Niger. All subjects’ first language characters were Pinyin characters.

C. Experimental materials: 180 Chinese characters learned in the first semester of the primary stage were selected, and sentences were composed of these characters.

D. Test method

The subjects were divided into two groups according to whether they had Chinese character class or not. Group A had Chinese character class (after the phonetic stage, the subjects were taught Chinese characters by using the new method of separation of recognition and writing, more recognition and less writing). Group B has no Chinese character class (only students are required to recognize, not to write). The Chinese character recognition test is divided into two parts. The first part randomly shows the selected 100 Chinese characters from the learned Chinese characters for students to read. The second part uses the selected Chinese characters to form two short essays of about 30 words (30 different Chinese characters) for students to read. At the same time, record the correct number. Chinese character writing test: first, dictation, let the students write out according to the words or sentences they hear; 2. Give the scene or picture and let the students write the learned Chinese characters corresponding to the scene.

Methods of statistical analysis: According to the above method, the results are shown in Table 1.

Table 1. Statistics of test results.

Full name	Correct number				
	Single character reading	Passage recognition	Dictation	Picture dictation	
Group A	Wang **	98	54	47	51
	Liu *	89	46	36	33
	Qian **	93	49	36	38
	Li *	97	52	46	48
	Zhao **	91	48	39	42
	Qi *	88	42	36	38
	Ma **	85	39	30	33
Group B	Li *	96	46	32	36
	Yang **	92	38	32	36
	Zhou **	97	39	30	35
	Qin *	99	30	28	31
	Jiang *	87	36	25	30

The comprehensive results obtained from the above results are shown in Table 2.

Table 2. Comprehensive results.

	Single character reading/%	Passage recognition/%	Dictation/%	Picture dictation/%
Group A	92.67	80.83	58.33	69.44
Group B	92.17	60.33	49.17	55.83

Results: It can be seen from the chart of test results that group A's performance in both reading and writing is significantly higher than that of group B, especially in dictation and picture reading writing. Moreover, the performance of short passage reading is higher than that of single character reading, and the performance of picture reading dictation is higher than that of single dictation. These data once again prove that in terms of difficulty, the "recognition" of Chinese characters is easier than "writing", Dictation with pictures is easier than dictation without pictures. In the task of Chinese character recognition, the incomplete information of some Chinese characters may be a stroke and an overall structural feature, which is enough to awaken the complete information about that Chinese character stored in learners' memory. At the same time, the above data also proves that the opening of Chinese character course is conducive to the common improvement of students' recognition and writing, because only by expanding students' cognitive range can more be output.

Conclusions: This paper studies the teaching efficacy of Chinese as a foreign language teacher from the perspective of cognitive psychology. In the process of human cognition, "recognition" and "writing" belong to two different cognitive levels respectively. "Recognition" is the recognition of information, and "writing" is the reproduction of information. Then there is the same relationship between Chinese character recognition and writing. The two represent two different aspects of Chinese character cognition, which are neither completely equal nor completely separated. In the specific process of Chinese character teaching, the two promote and complement each other. After predecessors put forward the method of "separating recognition from writing, recognizing more and writing less", it is further affirmed from the aspects of teaching effect and student evaluation. It further combines the cognitive characteristics of Chinese characters with the two aspects of "recognition and writing", and explains the application of iconicity and motivation of Chinese characters in teaching.

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APPLICATION OF COGNITIVE PSYCHOLOGY IN THE TEACHING REFORM OF ENVIRONMENTAL ART DESIGN AND THE CULTIVATION OF CREATIVE THINKING ABILITY

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Background: Design is inseparable from innovation. The so-called innovation means putting aside the old and creating new ones; Creative and innovative (Modern Chinese Dictionary). Some scholars define it as "creating valuable and unprecedented new material or spiritual products for the civilization and progress of human society"; "The practical ability to transform innovative ideas, theories and designs into valuable and unprecedented spiritual or material products is the innovative ability." while "environmental art design is a kind of creative object activity combining art and production technology", its essence is the practical process of transforming innovative ideas into physical objects. It can be seen that innovation and design are closely linked, and even innovation is the core and soul of design. Therefore, the cultivation of innovation ability should also be the core issue in environmental art design education.

From the perspective of cognitive psychology, this paper discusses how to cultivate students' innovative ability in the creative thinking ability of environmental art design education reform. Through the discussion of the discipline attribute of environmental art design, this paper obtains the characteristics of creative thinking in the process of environmental art design activities, analyzes the processing mode and psychological operation model of nonrandom creative thinking activities, puts forward that art and culture should pay attention to the promotion of design innovative thinking in environmental art design education, and points out the importance of cultivating rational thinking.

Subjects and methods: From the perspective of thinking and psychology, innovation ability mainly refers