



Analysis of the Construction Plan for the Education System Based on Artificial Intelligence

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ABSTRACT

The current education system faces problems, such as uneven distribution of educational resources, shortage of teacher resources, and unstable educational quality. These issues constrain education development and require the search for new solutions. Artificial intelligence technology has powerful data processing and pattern recognition capabilities and can play an important role in education. For example, intelligent teaching systems can provide personalized teaching based on students' learning situations and ability levels, improving learning effectiveness. The intelligent evaluation system can automatically grade assignments and exams, reducing teachers' workload. Intelligent management systems can optimize the allocation of educational resources and improve resource utilization efficiency. This article proposes a construction plan for the education system based on artificial intelligence technology, aiming to enhance the quality of education and efficiency and adapt to future education development needs.

Keywords: Artificial Intelligence, Intelligent Evaluation, Entrepreneurship, High Efficiency, Education System

1. Introduction

Artificial intelligence, a hot topic in the 21st Century, has been spread to every corner of the world [1]. People long for the pleasures and conveniences of life that artificial intelligence brings. The ability of artificial intelligence to save a great deal of manpower and material resources, as well as the ability to analyze and handle things hundreds of millions of times per second, makes people sigh in the wind of the era of rapid development of science and technology. The computer industry is a promoter and pioneer of scientific and technological development [2]. Its products have penetrated every corner of the world. At the same time, because of China's large population base and the population explosion, all areas of our society are also affected in some aspects. How to convert this effect into a beneficial influence becomes the driving force for the development of the industry and the direction that people are working towards [3]. Given the education industry, imagining what sparks can be created by combining artificial intelligence with it [4].

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The educational mechanism in China has a profound foundation, and after years of reform and promotion, a stable operation mode has been achieved. However, some problems still exist up to now. We must link the educational system with modern technology, improve the operational efficiency of the education system, and focus on the training of talents [5]. Students are the flowers of our motherland, and teachers are diligent gardeners. The injection of artificial intelligence into the education system is about to change the adjectives of the above two sentences. Teachers will not be so strenuous based on caring about the psychological growth of students and guiding their lives. Students will all bloom together based on studying actively and improving their knowledge reserve. Our original intention is to study artificial intelligence intensively and build an entrepreneurship education system, as well as the driving force of unremitting struggle.

2. Research Status

According to statistics, the coverage rate of the artificial intelligence entrepreneurship education system in the United States has reached 21.5%, and the scope of application is still expanding [6]. A major difference between the American education system and the education systems of most other countries is that American education is for everyone in society, not for the few [7]. In addition to general school subjects, such as math, history, language and literature, sewing, typing, radio, auto repair, and other subjects, use the artificial intelligence education system. Through the integration of data in all aspects, the system can intelligently feed the student's interests, personal plans and personal talents, which reflects that the main purpose of American education is to develop the talents of each child, no matter how high or low it may be, it can infuse consciousness of citizenship in each child at the same time [8].

Our education system adopts the examination system. The knowledge and atmosphere that all students accept before they go to universities are the same, which limits each student's divergent thinking and suppresses the students' creative thinking and nature to some extent [9]. The entrepreneurship education system for computer majors based on artificial intelligence can change the fate and life of students to some extent [10]. The system can draw a series of students' situations and specialties by collecting and processing students' information on all aspects. On the one hand, it can help schools and parents to understand each student further; on the other hand, it also reduces the pressure on schools and their guardians. There is no need to complain or scold the students because the system's feedback is various personality traits and advantages of students [11]. As it can effectively improve the relationship between students and schools, students and parents, and schools and parents, the entrepreneurship education system for computer majors based on artificial intelligence will set off a powerful positive energy in our country [12].

3. Methodology

3.1. Design Factors

If the idea is going to be injected into reality, there must be a tentative idea, which should be expressed to some extent. In constructing an entrepreneurship education system for computer majors based on artificial intelligence in this paper, considering that the system will have different experience effects for all kinds of users and the system is new to our country, there may be deficiencies to be improved and some unnecessary effects. There must be some ways that can be followed to promote the development of things. A complete design system should take the coherence of the system into account. The connection should be formed in three parts to construct the corresponding model: information collection, information processing and information output. The system's design needs strong logic, innovativeness, and the ability to process real-time information. The original intention of benefiting the public can only be achieved by combining with constant modification and improvement processes. To complete the construction of the application of artificial intelligence in the education system blueprint, our initial design patterns are mainly those shown in Figure 1.

As shown in Figure 1, a data acquisition terminal is built first. The main role of the port is to enter the student's academic achievements into the system, including the scores of their cultural courses, physical fitness tests and other data. Dedicated files are established for

each student, and their advantages and disadvantages are obtained through the analysis and processing of artificial intelligence [13]. After integrating it, different feedback mechanisms are generated for different students' characteristics. For example, the mathematical achievement of student A is general, but student A's historical achievement is top-notch. The system will automatically screen students' excellent subjects and unsatisfactory subjects, analyze and guide the students from all aspects to make the students spend more time studying science. In the situation of letting the student maintain the stable achievements of advantageous subjects, more time is left for the student to study the relatively difficult subjects. The student's outstanding subjects during school are collected to analyse which industry is suitable for the student, and this is beneficial to improve students' comprehensive academic achievements and provide a better guide for them to enter society and engage in industries. Ultimately, information processed by the system will be issued to all employers, companies or higher education institutions before graduation. All employers, companies or higher educational institutions will communicate with students directly in combination with the speciality and needs of companies and schools. At the same time, a series of social focus problems, such as the difficulty of students in applying to universities and finding jobs, are alleviated. Students don't have to throw around resumes and then spend a lot of time running in with their units, instead of saving a lot of effective time to really face and devote themselves to industries and institutions that are suitable for them. Moreover, it is more conducive for higher educational institutions to give play to their advantage and to improve the teaching quality. In some ways, feedback from artificial intelligence systems can also help students and parents get an objective evaluation and cognition of themselves and their children.

Conceptual sources	The concept of orientation	Point of view
Physiology	The relationship between individual physiological function and emotion	Emphasize the physiological attributes of emotion
Action	Explicit behavior of emotional activities	Emphasis on emotion can only be defined by explicit behavior
Cognition	The relationship between emotion and cognition	Emphasis on cognitive evaluation is the antecedent of emotion
Motive	The relationship between emotion and motivation	Emphasize the function of emotion
Society	The relationship between individual social environment and emotion	Emphasis on emotion is a social construct

Table 1. List of common emotion research directions

Table 1 shows the hardware composition of the overall system. Using an entrepreneurship education system for computer majors based on artificial intelligence, students won't be influenced by the system for some time. On the contrary, the school's faculty will be affected directly. At the initial stage of the system being put into use, schools that have been engaged in traditional teaching methods and management methods are bound to be affected greatly. In the initial stage of injecting new things, all aspects of cognition of the school's teaching team for the system can't achieve the desired results, which requires the joint efforts of two aspects to integrate the innovative education system with school management and teaching policy, take everything for students as the starting point, develop the expected operating model of the system together, and enlarge its advantages gradually. Under the premise of basic acceptance, the function of this innovation system can be comprehended better and

thoroughly in the shortest time. During this period, the school's acceptance largely affects the starting point of further development. The second is the impact on students, students can reflect and recognize themselves according to the feedback information in learning and living, and have independent thinking ability and the desire to solve things efficiently in the same educational mode. Through the artificial intelligence education system, each student has his or her own file which records his or her growth and stories of each stage in life. Therefore, the feedback information will have a profound impact on students and the cultivation of their independent thinking.

3.2. Construction Principle and Process of Entrepreneurship Education System for Computer Majors Based on Artificial Intelligence

After the utilization of an entrepreneurship education system for computer majors based on artificial intelligence is analyzed, and the method of extracting feedback information is defined, the entrepreneurship education system can be constructed. Meanwhile, the system's construction principles should also be considered. The first is the design principle based on experience, and this principle is the research purpose of this paper. Therefore, in addition to requiring the system's functionality and performance to meet the requirements, the main principle of construction is to take the demand experience of users as the first principle in the design process [14]. The second design principle is the functional continuity principle, and the function of the artificial intelligence education system is the primary purpose of the construction. If the construction of any product can't meet the functional requirements, it will fail. Besides, the function of the system should have continuity based on assuring function, that is, users can innovate on the basic functions. The third principle is the auxiliary principle. The function of this system is complex and diverse, and it will also bring problems when it is convenient for users, which is the auxiliary principle. The system is only an auxiliary tool for educational systems, and its purpose is to improve the teaching quality and the all-round development of students. Artificial intelligence provides people with convenience, but artificial intelligence software can't replace the human brain in thinking and judging. Thus, although the artificial intelligence system is recognised, its position can't be misplaced. The system is only an auxiliary tool, and judgments and decisions can't be made entirely based on the system's feedback information. The system is built to serve people instead of guiding people and providing for people to rely on. People should pay attention to the principle of using the system and use it appropriately. The feedback information of the system is filtered and processed, and corresponding judgments and thinking are made according to the conditions of the system. The fourth principle is the principle of confidentiality, and the premise of the artificial intelligence system for information processing is the input of information. Users are entirely confident in entering their own information and privacy into the system for processing and analysis. The system must also maintain absolute confidentiality of the information entered by the user and the user's personal information and eliminate the leakage of user information through various means to achieve a variety of purposes.

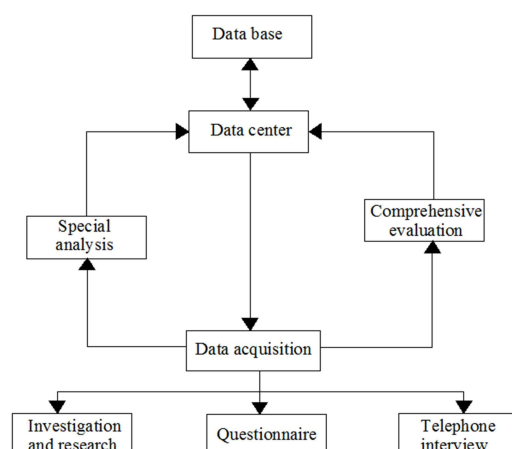


Figure 2. Communication structure of remote monitoring system

The system can be built after defining the construction principle of the artificial intelligence education system. In this paper's research process, the system construction takes three major directions. The first is the information acquisition phase. Because the original intention of developing an artificial intelligence system is for special populations, users' personal information and other necessary information must be entered into the system. The second is the information processing stage, that is, after inputting the user information needed by the system, the system will carry out artificial intelligence processing and analysis on the information, feedback a series of information processing results based on the users for different users, and provide all users of the system with the results for reference and analysis. The third stage is information integration based on users' needs. The artificial intelligence system analyzes users' needs and then integrates the data and information that users need. The last phase is the information output phase; that is, the information the user needs is fed back to the user through the artificial intelligence education system for user reference and use. These four construction stages are the operating principles of the artificial intelligence education system. Each system unit is linked to the operation process of these four stages to reflect the advantages of artificial intelligence.

4. Result Analysis and Discussion

In the construction process of an entrepreneurship education system for computer majors based on artificial intelligence and the process of system construction and putting into use, the system construction should adopt existing mature conditions in computer technology as much as possible for improving research efficiency, maturing technology and saving time. After designing the system, it is necessary to test the system's performance accordingly. To test the performance of the system, the corresponding login interface is set up after completing the settings of the computer-assisted architectural design system, and users log into the system according to the account number and password provided (Figure In the setting of the system, the preservation and application analysis of the user's historical data can grasp the results of the test more accurately.



Figure 3. User login system interface

The artificial intelligence education system constructed in this paper can avoid the mistakes and the influence caused by various technical problems to the greatest extent. It also considers whether the system's running speed can satisfy the user's demand, which can achieve a satisfactory user experience. It is determined that mature computer professional software is adopted to integrate as much as possible. In the premise of not affecting the use functions, the system's CPU operating rate should be improved as much as possible, and the technical problems that affect the user's use experience should be avoided as far as possible.

Based on the security of the network's personal information, the system should conduct archival filing in the relevant department before it is put into use. Meanwhile, the network firewall strength should be increased, and adequate protection work should be done to prevent criminals from sneaking into the system and causing losses to the user. In operation, the operation drive of the CPU passes the test authentication. The graphics card drivers should be Microsoft-certified drivers or officially released drivers, and the model and version should also be checked strictly, thus avoiding CPU resources occupied by 100%, and many beta drivers are not the same, to eliminate the possibility of

failure. The operating speed of the CPU is shown in the following table:

MB Intelligent Tweaker(M.I.T.)		MB Intelligent Tweaker(M.I.T.)	
Robust Graphics Booster	[Auto]	Robust Graphics Booster	[Auto]
CPU Clock Ratio	[8 X]	CPU Clock Ratio	[10 X]
Fine CPU Clock Ratio	[+0.0]	Fine CPU Clock Ratio	[+0.5]
CPU Frequency	1.60GHz(200x8)	CPU Frequency	2.80GHz(266x10.5)
CPU Host Clock Control	[Disabled]	CPU Host Clock Control	[Enabled]
CPU Host Frequency(Mhz)	266	CPU Host Frequency(Mhz)	[266]
PCI Express Frequency(Mhz)	[Auto]	PCI Express Frequency(Mhz)	[Auto]
Performance Enhance	[Standard]	Performance Enhance	[Standard]
System Memory Multiplier (SPD)	[Auto]	System Memory Multiplier (SPD)	[Auto]
Memory Frequency(Mhz)	800 800	Memory Frequency(Mhz)	800 1066
***** System Voltage Optimized *****		***** System Voltage Optimized *****	
System Voltage Control	[Manual]	System Voltage Control	[Auto]
DDR2 OverVoltage Control	[Normal]	x DDR2 OverVoltage Control	Normal
FSB OverVoltage Control	[Normal]	x FSB OverVoltage Control	Normal
CPU Voltage Control	[Normal]	x CPU Voltage Control	Normal
Normal CPU Vcore	1.28750V	x Normal CPU Vcore	1.28750V

Figure 4. CPU operating rate

In terms of security, it is needed to do relevant security tests for existing systems, including application security testing, OS security test, database security testing, IIS server security test, and network environment security test, as shown in the following table:

Project	Impersonation attack	Security	Stability
Application security testing	100	100%	System fluency
OS security test	100	99%	System fluency
Database security testing	100	100%	System fluency
IIS server security test	100	100%	System fluency
Network environment security test	100	100%	System fluency

Table 2. Comprehensive performance test of the system

The normal operation of the system requires the components of many aspects to cooperate with each other, so the key projects should be considered and handled; the user experience effect is improved based on ensuring the operating speed, and the security and confidentiality of the system are taken into account at the same time [15]. When the system is running, maintenance should also be continued so that the system will continue to repair different issues that arise in different stages, thus ensuring the system's normal operation. And a user feedback mechanism is established. Through experience problems that users fed back in the using process, the operation effect of the system is improved and modified further. The construction of the system is for all users, and users will encounter different problems while using this system. Users' feedback is integrated and consolidated, and consideration should be given to both the requirements of a wide range of users and the requirements of a small range of users in terms of details.

5. Conclusions

China has never given up any opportunity to enhance education, and education reform is progressing steadily. As a new thing, the entrepreneurship education system for computer majors based on artificial intelligence is rising in novelty and doubt. Every year, society and universities are plagued by some educational system problems that need to be improved, and the birth of artificial intelligence education systems can effectively solve this problem. Therefore, an entrepreneurship education system for computer majors based on artificial intelligence is essential. The adoption of this system is conducive to the optimization and promotion of educational work and the improvement of reference value and application ability in education and teaching. Finally, more satisfactory results have been achieved through the overall test of the security and fluency of the system. While we are relieved, we shouldn't forget to consider a series of concerns caused by the system and how to eliminate people's concerns about the system is what we're going to do next. The research proves the system's feasibility and the construction of an entrepreneurship education system for computer majors based on artificial intelligence is successful. We will also understand people with reserved attitudes and take this as the general direction for the next step.

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