The Teaching and Innovation Reform of College Ideological and Political Theory Course from the Perspective of Big Data

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Abstract: In the era of big data, it provides data thinking ideas, interactive communication platforms, sufficient quality resources, and intelligent management services for the innovation of teaching methods of college ideological and political theory courses. It also brings serious challenge in teaching concepts, management models, technology applications, and ideology security. The use of big data technology and the maintenance of corresponding development tools require profound theoretical foundations and practical skills. The reform of teaching methods accompanying the big data teaching model has become the limitation of the current ideological and political theory course reform. This paper briefly introduces the basic connotation and characteristics of big data, expounds the development of the teaching mode of ideological and political theory courses in colleges and universities from the perspective of big data, introduces big data technology into the classroom and promotes the implementation of teaching practice as the key research content, combined with the current The technical dilemma and the dilemma of the rational teaching mode are studied in depth, and the innovative strategy of the ideological and political theory teaching in colleges and universities in the era of big data is proposed.

1. Introduction

The arrival of the era of big data has optimized the living environment and quality of life of Chinese people. As an important place for modern information technology, colleges and universities have benefited the majority of teachers and students. The related theories and techniques of big data have become the focus of education reform in colleges and universities[1]. Opening up new teaching theories and teaching models is the most important task in colleges and universities, and is an important direction of curriculum reform in China. However, due to the depth of data and the depth of relevance, how to improve the connection between big data and education and teaching process, and promote their role in specific teaching practice, become the difficulty in carrying out relevant teaching practice in the current era of big data, and also explore the teaching mode. The key to innovation and reform. The ideological and political theory course in colleges and universities is an important position to consolidate the guiding position of Marxism in the field of ideology in colleges and universities. It is the main channel for implementing the fundamental tasks of Lideshu people, and is the core course to help college students establish a correct world outlook, outlook on life and values. The ideological and political theory courses in colleges and universities in the era of big data are facing unprecedented opportunities and challenges. To this end, we seize opportunities and meet challenges, establish modern teaching concepts based on the characteristics of big data, apply innovative teaching methods and teaching evaluation of big data, and adapt to construction. The high-quality teachers required in the data age are the ineviTable choices for improving and innovating the ideological and political theory courses in colleges and universities.

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2. Overview and application of big data theory

2.1 The concept and characteristics of big data

Big data can be defined as: the significant improvement of human data acquisition and utilization based on the development of information technology, the resulting record of massive information resources and the creative discovery of its value, as well as the human social life and way of thinking under the influence of both. Great change. Big data has pushed human society into a new era of "data". This big data era has four basic characteristics: First, the automatic recording and storage of massive data. With the increasing use of technologies such as mobile Internet, cloud computing, and Internet of Things, all aspects of human life are automatically recorded in an all-round and full-scale manner, resulting in massive, multi-class, fragmented data storage. Second, data flow acceleration and information transparency have been greatly enhanced. In the era of big data, all information barriers caused by technical reasons will be greatly reduced. This will speed up the dissemination of data among different individuals and regions, and enhance the transparency of information, reflecting the significant timeliness of data generation and change. Third, quantifiable, full-data analysis of human society, the natural environment, and overall human behavior. Big data technology can achieve a full data record of the human social living environment, as Schonberg said that big data can achieve "dataization of everything in the world." Fourth, individual privacy protection faces enormous challenges. In the era of big data, people's personal information will be collected and stored more conveniently. People's behavior will always be exposed to the "third eye" monitoring. Individuals will lose a lot of "hidden" space and ability.

2.2 The Application of Big Data Technology to College Ideological and Theoretical Courses.

The practice of applying big data technology to the ideological and political theory courses in colleges and universities has been developed to some extent, and the popularity and development of campus wireless networks and cable networks[2]. In the general teaching, colleges and universities comprehensively promote the digital teaching mode, and combine the different situations to make a new exploration in digital teaching. Campus network, teacher and student information management system, smart card recharge system, etc. are all examples of the application of digital technology to university management. Specific to the ideological and political theory class, with the development of the campus network and the advancement of big data technology, the ideological and political education in colleges and universities has gradually opened the microblogging platform and the WeChat public number, and the political frontier and theoretical system construction content of the frontier of the country can be timely. Sharing, on the one hand, can improve the level of interaction between teachers and students, on the other hand, it can improve the efficiency of the popularization of ideological and political theory. In the era of big data, the data collection range is wide and the sample is huge. On the one hand, the Internet platform can collect current hotspots of current domestic and international portal websites, and combine the hot content of new websites such as video websites and WeChat public numbers to carry out the teaching content innovation of ideological and political theory courses. The collection of illustrations enriches the content of the theoretical lesson and is closely integrated with current current events. As a specific channel for the use and function of big data technology, the university Internet platform combines its own data processing and integration capabilities in the development process to timely share and integrate the relevant content of the ideological and political theory course.

3. The Present Situation and Existing Problems of the Teaching Mode of Ideological and Political Theory Courses in Colleges and Universities

3.1 The Development Status of the Teaching Mode of Ideological and Political Theory Courses in Colleges and Universities

(1) Traditional teaching mode
In addition to teaching the subject and object, the traditional teaching model includes textbooks

and chalk. Generally, teachers of ideological and political theory courses in colleges and universities combine the contents of textbooks to develop blackboards, display teaching points, key points and difficulties. They also design course content according to the chapters of textbooks and teach them. Teachers often explain and explain the teaching points through examples and side-by-side quotations. The method generally combines attendance, test paper assessment and other methods to calculate the final score. However, this traditional mode has the characteristics of one-way infusion, and it is not easy to stimulate the enthusiasm and initiative of college students.

(2) Multimedia teaching mode

Since the end of the 20th century, with the continuous popularization of computers and the Internet, multimedia technology has been greatly developed, and the number of procurement grants for multimedia technology has gradually increased. Colleges and universities have generally used PPT as an auxiliary tool for teaching in ideological and political theory courses, thus transforming the traditional mode of teaching[3]. Multimedia teaching has greatly improved the efficiency of teaching, and gradually integrated video, audio and other content, enriching the teaching form of ideological and political theory courses, but still failed to achieve substantive classroom teaching interaction.

(3) "Big Data Teaching Model"

A new teaching model that has just emerged in recent years in China. The "data" in the era of big data is characterized by a wide variety, high-speed operation, and large capacity. It has become the practical basis for the innovation of education and teaching models in college ideological and political theory courses. Under the condition of big data, by summarizing the data structure and characteristics, clarifying the meaning of the data features, through the promotion of the induction and deductive methods, on the basis of data collation and analysis, the relationship between different factors is clarified, and then the species is Linking to the construction of teaching models in specific disciplines has become a key point in the connection between big data and college ideological and political theory. The big data teaching model can be divided into two parts: "online teaching" and "offline counseling". The online teaching of the big data teaching mode can cancel the formal classroom and spread the teaching content through the online data. Students can receive educational information through the Internet at any time and place, and feedback the questions to the instructors through the Internet. Offline counseling should be conducted at the specified time and place, mainly in the form of group counseling and discussion, and organized by the instructor. In the classroom teaching accompanied by the "barrage interaction", face-to-face discussion and other forms, this relatively novel teaching mode attracts students' enthusiasm for learning and greatly enhances the interactive effect of teaching. The teaching mode of big data is shown in Figure 1.

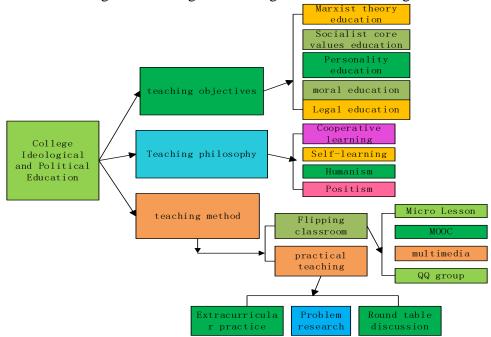


Figure 1. Big Data Teaching Mode of College Ideological and Political Courses

3.2 Problems in the Teaching Mode of Ideological and Political Theory Courses in Colleges and Universities

1) The content of the lecture cannot be kept up to date

Whether it is traditional board teaching or multimedia teaching, the main content of the lecture is from the textbook. Once the content of the textbook can not be closely integrated with the development practice, the college students will lose interest in learning. In the process of teaching ideological and political theory courses in colleges and universities, the teaching content, structural framework and basic viewpoints of the "Basic Principles of Marxism", "Ideological and Moral Cultivation and Legal Basis" are relatively sTable[4]. The changes in teaching materials have been relatively rare for many years. It is necessary to follow the prescribed syllabus and follow the traditional teaching content to teach. If the teaching case is not updated in time, it will lead to the separation of theory and reality. In the era of big data, social events are emerging one after another. Hot issues have repeatedly aroused widespread concern in society. College students can also receive such information through various online channels, which leads to doubts and puzzles about the content of teaching. The development of digital technology and the development of mobile internet technology enable students to have a better ability to perceive current events, which makes the content of traditional teaching methods less attractive and does not lead to the participation of students. The key is to "exist in existing In the teaching mode (see Table 1), the case update is not timely enough, which leads to the teaching content not being able to keep pace with the times.

Table 1 Comparison of traditional classroom teaching and big data technology teaching

Comparison	Traditional classroom teaching	Big data technology classroom teaching
project	technology	
The internet	Fixed cable or closed	WIFI, 3G, 4G,
	wireless network	Mobile intelligent terminal device
space	Dedicated classroom	Ordinary basic audio education
		Facility classroom
software and	Based on hardware construction,	Based on software development and
hardware	Software development	utilization
Input costs	Large labor costs, may require	One-time investment in software
	repeated investment	development and easy upgrade

2) Fragmentation of lecture content

Although the textbooks of college ideological and political theory courses are complete ideology, the case cases and corresponding auxiliary cases listed by the teachers are not universal or typical, and the case is not related to other cases, and it is happening in real life. There is also a lack of direct internal connection between the events, which will lead to the students' lack of recognition of the case. Under the conditions of big data, traditional qualitative research gradually develops toward quantitative research. Relying on data to interpret facts has become an important direction for the development of different disciplines. Previous sample surveys have been replaced by big data and have greater persuasive power. In contrast, the fragmented teaching methods of traditional college ideological and political theory courses lead to lack of co-ordination of current affairs hotspots and national development policies, and the statistical significance of data is not strong, which in turn affects the persuasiveness of the curriculum system[5]. In the teaching process, teachers also feel powerless because students make different and even opposite cases. It can be seen that it is difficult to convince college students if they do not restore individual events or cases to history and reality, and demonstrate them systematically and completely as much as possible, especially the establishment of a collaborative education mechanism between ideological and political theory courses.

3) Students' integration and participation are low

College ideological and political theory courses have entered the initial stage of interactive teaching, students can gradually integrate into the classroom, but due to the lack of interactive mechanisms and corresponding assessment mechanisms to guide students to participate in and complete the learning tasks, student integration can not be developed in an institutionalized form, and

In the end, the traditional model of "teacher-teaching-student learning" has not been fundamentally changed. Students still show greater passiveness in their studies. This is the main problem in the teaching mode of ideological and political theory courses in traditional colleges and universities. Among them, the grasp of key and difficult points, the screening and application of specific multimedia big data technology require the active participation and integration of college students, and the connection between teaching objects and teaching content has become an important limitation of college ideological and political theory courses. In the process of the development of big data technology, the integration of data analysis and the overall evolution of education and teaching methods is an important direction for the development of ideological and political theory courses in colleges and universities.

4. Feasibility Analysis on the Innovation of Teaching Methods of Ideological and Political Theory Courses in Colleges and Universities from the Perspective of Big Data

The ideological and political theory course in colleges and universities is the most important carrier for the cultivation of political quality and moral quality of college students. Its teaching effect and quality of education are directly related to the national ideological construction and the healthy development of young college students' psychological personality[6]. In order to ensure the teaching effect of ideological and political theory courses in colleges and universities, its teaching mode needs to be constantly reformed, innovated and self-improved according to the development of the times.

4.1 Adapt to the requirements of the era of big data, and innovate teaching concepts

In the era of big data, teachers of ideological and political theory courses in colleges and universities must establish a "people-oriented" teaching philosophy. "People-oriented" refers to "the essential attributes of human beings as the main body of social activities, with basic characteristics such as autonomy, initiative and creativity." The "people-oriented" teaching philosophy respects teachers as the main body of teaching and plays an important role in the organization and leading role of teaching, respecting students as the main body of learning to play the initiative and initiative. Teachers use big data technology in teaching to mobilize students' subjective initiative, which is conducive to the creation of a teacher's life and other teaching environment. In the era of big data, teachers of ideological and political theory courses in colleges and universities should make full use of big data technology to analyze the students' ideological dynamics and learning behaviors, so as to understand the learning characteristics of different individual students and different student groups, and then according to these characteristics, the students are targeted[7]. Teaching, providing students with personalized teaching. Integrate big data information resources and optimize the teaching content of ideological and political theory courses in colleges and universities.

4.2 Use big data and new media technology, and innovate teaching security

Under the era of big data, college students have a wide range of sources of information, active thinking, and extensive knowledge. They also have a unique self-awareness and distinctive personality. This requires the teachers of ideological and political theory courses in colleges and universities to grasp the ideological state and personality characteristics of contemporary college students through big data analysis, and to teach ideological and political theory courses in accordance with their aptitude. Under the guidance of diversified and personalized teaching thinking in the era of big data, the teaching method was reformed, and a multi-faceted teaching method such as network, study group, interest group, and classroom learning group was formed. Innovative teaching methods of college ideological and political theory courses in the era of big data, on the one hand, can use the vivid, accurate and detailed resources provided by the era of big data to conduct multimedia teaching, to meet the needs of college students in the era of big data, to enhance their interest in learning. On the other hand, we should adopt a variety of teaching methods such as topic discussion, debate, and research study to guide college students to think positively and establish a correct world outlook, outlook on life, and values. In addition, college ideological and political theory teachers should also upload the ideological and political theory course learning resources, classroom teaching content, and

hot and difficult issues to the online teaching platform according to the characteristics of the big data era, adopting the online and offline teaching methods[8]. Improve students' initiative in learning, better carry out the teaching of ideological and political theory courses, and improve the effectiveness of teaching ideological and political theory courses.

4.3 Rely on the big data network platform to expand the teaching space

The vast amount of information resources in the era of big data and new media networks has greatly expanded the time and space of the teaching of ideological and political theory courses in colleges and universities[9]. The teaching of ideological and political theory courses in colleges and universities should make full use of big data platform to expand network teaching, establish a special ideological and political theory course quality course website, forum, MOOC, micro-class platform or WeChat public number, mobile APP, open newsletter hot discussion and so on. In the columns related to the teaching content of the ideological and political theory course, teachers provide excellent teaching materials on this platform for students to consult and study, publish the latest theories, policies, policies and current hotspots of the party and the state, showcase outstanding works of students, etc., in order to expand the thinking of colleges and universities. Political theory class network teaching position. Through this multi-channel and multi-form interaction, the communication between teachers and students can be maximized, and the teaching space of ideological and political theory courses in colleges and universities can be expanded.

4.4 Keep up with the pace of the big data era and improve the quality of teachers

Teachers of ideological and political theory courses in colleges should strengthen the study of basic knowledge of big data, participate in training related to big data technology, master the technology of big data, and use big data to carry out teaching work. In the era of big data, college ideological and political theory teachers need to further improve their comprehensive quality, including ideological and moral quality, scientific and cultural quality and psychological quality, especially ideological and political quality[10]. From the perspective of big data, college teachers of ideological and political theory only have good ideological and political quality and cultivation, can use the correct theory to guide college students to effectively absorb and select the information they need, to avoid the erosion of bad information and help them establish scientific Values, enhance college students' sense of social responsibility and integrity.

5. Conclusion

In summary, the use of big data technology to carry out the teaching reform of ideological and political theory courses is an objective requirement for improving the quality of teaching and the effectiveness of education in ideological and political theory courses. From the perspective of big data, this paper makes an in-depth study on the reform of teaching methods of ideological and political theory courses in colleges and universities, which can provide useful reference for the reform of teaching methods of ideological and political theory courses in colleges and universities, so as to improve the teaching quality of ideological and political courses in colleges and universities. In essence, the fundamental task of education reform is truly implemented. The advent of the era of big data has brought unprecedented challenges to the teaching reform of ideological and political theory courses in colleges and universities. At the same time, it has also given a fleeting development opportunity for the teaching of ideological and political theory courses in colleges and universities. Only by taking a proactive attitude to meet the challenges of big data, overcoming difficulties, and constantly improving themselves, developing ourselves, and perfecting themselves in a rapidly changing environment can we seize the historical opportunity and realize the teaching of ideological and political theory courses in colleges and universities in the new era. Reform and innovation.

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