

Exploration of the Mechanism of Practical Education in Colleges and Universities

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Abstract: Under the current educational background, the task of practical education in universities is particularly important. Practical education aims to help college students hone their skills, enhance their practical operational abilities, cultivate innovative thinking, and become high-quality talents who integrate theory and practice. Therefore, universities need to establish a mechanism to manage practical education, in order to standardize and promote sustainable development.

Keywords: University; Practice Education; Management mechanism

The mechanism of practical education in universities plays an important role in ensuring the quality of education, improving teaching effectiveness, and cultivating students' practical abilities. It consists of a system of institutions, operating entities, guarantee systems, and quality monitoring. A scientific and efficient mechanism for practical education can help ensure the orderly progress of practical education work, assist teachers in accurately understanding and grasping students' learning situations, develop personalized teaching plans, motivate students to participate in learning, and ultimately improve the quality of education. Practical education has expanded the space and time of traditional classrooms. In a real environment, it can better mobilize students' learning initiative, improve their learning effectiveness, and ultimately enhance the overall quality of talent cultivation.

1 A Comprehensive Institutional System For Overall Planning

The institutional system plays an important role in the practical education mechanism of universities. The systems formulated by schools, functional departments, and secondary colleges will directly affect the development direction,

support strength, and evaluation orientation of practical education work.

One is the institutional system at the school level, which requires overall planning and systematic thinking of practical education work at the macro level, and fully considers the importance of practical education in cultivating students' comprehensive abilities. It should be included in the entire process of talent cultivation, requiring the participation of all staff and covering all aspects of students' growth.

The second is for functional departments to formulate corresponding detailed plans based on the top-level design of the school, decompose tasks to individuals, clarify time nodes, or develop corresponding management systems for certain specific fields, take multiple measures to standardize practical education work, effectively mobilize diverse education subjects and allocate various types of practical education resources, ensure that practical education is carried out in an orderly manner according to plans and standards, and achieve the expected goals of the school.

Thirdly, the secondary colleges shall formulate a series of management systems and implementation rules in accordance with the refined plans of functional departments, combined with the professional characteristics and education system of the colleges, to effectively supervise and guide practical education activities, and form a "one college, one product" practical education system.

2 Each Operating Entity Performs Its Own Duties

Functional departments and secondary colleges shall formulate their own implementation plans based on the overall plan of the school, refine specific measures, decompose tasks, set time limits, perform their respective duties, divide labor and cooperate, mobilize and play the role of different entities, and jointly promote practical education work.

One is to incorporate practical education into the curriculum, schedule progress, and leverage the role of teachers. Because they are the main guides and organizers of practical education work, responsible for imparting knowledge and skills, and demonstrating and guiding students to carry out practical activities. the professional competence of teachers is an important guarantee for implementing and completing practical education. It includes: professional knowledge, teaching ability, and research ability. the professional abilities and qualities of teachers will deeply affect students' understanding of knowledge and mastery of skills. It is imperative to establish a moderate incentive mechanism in order to motivate teachers to enhance their professional abilities and mobilize their subjective initiative. It includes economic incentives, career development incentives, recognition and honor incentives, and work environment incentives. For example, establishing a fair and reasonable salary system, increasing the weight of promotion of professional titles in practical education, rotating positions to participate in school affairs management, strengthening the recognition and publicity of practical education work, providing standardized office space and equipment for practical education, etc. Of course, attention should also be paid to the physical and mental health of teachers, and regular physical examinations and psychological tests should be conducted to enable teachers to carry out their work in a comfortable environment.

The second is to use practical education as an assessment indicator for counselor work, and to play its role. Because counselors are life mentors for students' growth and success, they have the most contact time with students, understand their needs and difficulties, and can effectively help students participate in practical activities. As mentioned above, referring to the system of building a high-level teaching staff, design a reward mechanism and career development path that are in line with the professional development of counselors. On the one hand, this will enhance the work ability of counselors, and on the other hand, it will increase their enthusiasm and initiative in practical education.

Thirdly, practical activities use class hours or points as student assessment indicators to

motivate students to actively participate. the current needs of students are diverse, and their learning situations are also varied. Even though practical education is important for students' growth, they may not necessarily have enough motivation to participate. Because students are the direct audience and subject of practical education, it is necessary to promote their emphasis on practical activities through academic studies, competitions, etc., cultivate their abilities of unity, cooperation, exploration and innovation, and actively participate in practice and apply knowledge to solve practical problems with the help of teachers and counselors.

3 Stable and Sustainable Guarantee Mechanism

Practical education is a long-term process that requires continuous investment or construction in teacher teams, practical venues, educational resources, operational funds, and other aspects. Therefore, establishing a stable and sustainable guarantee mechanism is an important foundation for promoting the continuous progress of this work.

One is to continuously build a high-level teaching staff. Through school enterprise cooperation, specialized training, talent exchange, collective lesson preparation, and the establishment of teacher innovation teams, we continuously enhance the professional, teaching, and research abilities of teachers, establish a scientific incentive mechanism, strengthen the integration of industry, academia, and research, promote the effectiveness of practical application and achievement transformation, and consolidate the human resource foundation for practical teaching and education. Teachers need to have a deep understanding and comprehension of their professional field, grasp the theoretical framework, core viewpoints, development trends, etc. of the field, accurately understand various concepts and meanings, conduct academic research, project development, technical breakthroughs, etc. during the teaching process, discover new knowledge, apply new technologies, and improve professional level. At the same time, it is necessary to improve the ability to apply learned knowledge to teaching, optimize teaching design, set appropriate goals, adopt various methods, analyze students' learning

situations, formulate corresponding strategies, continuously stimulate students' desire to explore knowledge, motivate independent and cooperative learning, and cultivate students' innovative and collaborative literacy.

The second is to continuously optimize various types of practical venues. the practice venue includes both on campus and off campus facilities. Key laboratories and training rooms will be constructed on campus to meet the needs of students in conducting empirical, scientific experiments, skill training, practical innovation and other activities, promoting students' deepening understanding of professional knowledge, improving their practical operation and problem-solving abilities, and cultivating innovative thinking and teamwork spirit. Establishing an off campus internship practice base to provide students with on-the-job experience and practical skills, allowing them to experience the real atmosphere of production, technological breakthroughs, and research and development innovation, and accumulate practical experience; Facilitating students to conduct in-depth investigations and research in the community and among the people, truly experiencing social and public conditions, and cultivating patriotism.

The third is to continuously enrich various forms of educational resources. Based on the trend of digitalization in education, we will build online and offline educational resources, including new digital textbooks, online courses, ideological and political case libraries, teaching resource libraries, smart teaching platforms, etc. Teaching software provides strong technical support for practical teaching, while online education platforms offer diverse practical teaching approaches with abundant resources and flexible combinations. It contains teaching videos, teaching documents, teaching cases, rules and regulations, etc., providing rich learning materials for teachers and students, and enabling timely inquiry of knowledge points; We have built a platform for online and timely communication, supplemented by intelligent upgrades, which can actively push tasks and provide timely feedback on learning progress.

The fourth is to continuously invest in assessable operating funds. Adequate funding guarantee is essential, but we must adhere to the principle of "spending according to the

amount and money following the situation", regularly conduct performance evaluations of fund use, comprehensively measure the effectiveness of fund use, and make full use of every penny. At the same time, universities also need to explore diversified ways of fundraising, such as accepting corporate donations, joint projects, etc.

The fifth is to continuously cultivate a practical culture of affinity. the culture of practical education is guided by cultivating the practical attitude and outstanding qualities of college students, truly achieving the goal of practical education. It mainly includes: understanding the significance of practical culture, grasping the connotation and requirements of practical culture, and taking conscious actions to practice practical culture. Efforts can be made from multiple dimensions such as teaching, scientific research, and evaluation to jointly promote the construction and role of practical culture.

4 Scientific and Comprehensive Quality Monitoring

Quality is the lifeline of all work. Without quality, there can be no success in practical education. Therefore, establishing a scientific and comprehensive quality assurance mechanism is an important guarantee for promoting practical education and achieving significant results.

One is to build a curriculum system that meets the growth needs of students. Practical education mainly serves the growth and development of students. It is necessary to systematically construct a practical curriculum system, including on campus and off campus practice, in order to ensure that practical teaching has goals, teaching processes have requirements, and student assessments have standards. Extracurricular practice mainly involves conducting experiments, internships, and practical training to enable students to understand and master knowledge through hands-on experience in the classroom. Extracurricular practice places more emphasis on learning in real environments, including social practice, club activities, competition activities, etc., emphasizing the close integration of learning with real life, social production, and social services. Through extracurricular practice, students can apply the knowledge and skills they have learned to

solve practical problems, thereby enhancing and improving their knowledge and skills. Production internship is to enable students to participate in real production activities, achieve a close integration of teaching and production, and cultivate students' professional qualities and skills. Innovation and entrepreneurship education aims to inspire and guide students' innovative thinking and entrepreneurial spirit, allowing them to learn and experience the process of innovation and entrepreneurship through practice.

The second is to develop a digital system for monitoring and early warning of key indicators. Based on the relevant theories of quality management, set key indicators for quality management, issue timely warnings, supervise the progress of diagnosis and improvement, monitor the effectiveness of diagnosis and improvement, and form a closed loop of quality management. In order to ensure that the implementation process of practical education can be carried out according to the pre designed goals and curriculum standards, it is necessary to use digital systems to extract key indicators of student participation in practical activities, such as task completion, accuracy, standardization, etc., and screen data or individuals with significant differences from the target values, actively push tasks, assist students in completing established tasks, and achieve learning goals.

The third is to establish a mechanism for tracking investigations and showcasing teaching achievements. the effectiveness of practical education ultimately lies in whether students benefit and grow. Therefore, it is necessary to track the subsequent development of students and investigate and provide feedback on the implementation process. This can help students better understand their performance in practical teaching, guide them to adjust their learning strategies, and improve practical effectiveness. Meanwhile, after a period of practice, individual students or teams should be able to produce corresponding results, which can be demonstrated through various forms such as research reports, solutions, technological improvements, process optimization, initial product testing, on-site defense, etc. These forms provide students with the opportunity to apply their learned knowledge, test their skills in a real environment, stimulate their desire to explore,

and then invest more energy into practical activities. Series exhibitions can also provide teachers and enterprises with a comprehensive understanding of students' growth in practical activities, give objective and fair evaluations, and infer the degree of goal achievement. In addition, attention should be paid to the individual differences of students, recognizing the achievements of different students, guiding them according to the situation, highlighting their strengths and weaknesses, helping them strengthen their confidence in learning, and achieving the expected goal of practical education.

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