Discussion on Colleges and Universities’ Innovation Educational Mechanism in the Era of Mass Higher Education

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Abstract-At present, China’s higher education is faced with a very severe situation, that is, college students generally have poor practical ability and insufficient innovation ability, which is the source promoting the constant progress of the society. Therefore, in recent years, cultivating college students’ innovation ability has been receiving more and more attention, and currently, colleges and universities are actively exploring establishing innovation educational mechanism. Starting from relevant concepts of innovation education, this paper elaborates on the importance of updating education concepts, reforming course system and deepening teaching reform to the establishment of innovation educational mechanism in colleges and universities, thus it is of some referential and practical significance.

Keywords-Higher education; Innovation ability; Innovation educational mechanism; Educational concept; Course system

I. INTRODUCTION

In recent years, China’s rapid economic development, rapid social progress, the source of power is innovation, so it can be said that innovation is the main driving force for the development of the new era. Innovation is ultimately rely on the talent, in the fierce competition who can cultivate a high level of innovative talents, who will take the commanding heights. And innovative talent training needs the support of innovative education, and now it is necessary to establish and improve the innovation education in Colleges and universities. At present, one of the most striking features of higher education in China is the popularization of the public, which is the inevitable result of the current economic globalization, the knowledge economy and the increasingly fierce competition in the core competitiveness of the country. Popular demand for innovative education is also the demand of the times.

Innovative Education aims to develop students’ awareness of innovation, innovation ability and personality, but it is also deepening a new concept of education in the practice of education reform drawn, with quality education, comprehensive development of consistent value orientation of education. Current quality education and overall development of education implemented if the lack of innovation and education, would lose its true meaning, it is not a true quality education and comprehensive development of educational sense.

II. RELEVANT CONCEPTS OF INNOVATION EDUCATION

A. Connotation of Innovation

Innovative connotation consists of three levels, namely the unprecedented discovery, knowledge and the knowledge to regroup again found. In recent years, many experts and scholars on innovation carried out a series of in-depth research, today's innovation is no longer confined to the field of economics, it also contains a series of activities of the scientific, educational, technical, financial and other.

Innovation is divided into "before innovation", "quasi-innovation" and "True Innovation" (original): "before the innovation" is relative to its own terms, the first time things; "quasi-innovation" is relative to the population in terms of , others have not raised; "True innovation" (original) is relative to the society, with originality and social significance of things or activities. For different stages of education, for innovative educational requirements vary, for example, in basic education will focus on the first two innovative education, and higher education is more emphasis on "real innovation" (original) [1,2].

B. Connotation of Innovation Educational Mechanism

Many experts and scholars for innovative education also put forward their own views, but have advantages and disadvantages, difficult to fully reflect the innovative education. So how can we truly reflect the ideals of innovative education it should be from the values, fundamental changes, theory and operation of a new qualitative level, to make a comprehensive analysis and refining, the only way to a comprehensive, scientific, sound reflects innovation the essence of the concept of education.

The value orientation innovation from the point of view of education, it is a development of education, self-improvement and enhancement of education; education from fundamental changes in terms of innovation, refers to it in comprehensiveness, functionality, quality and structural aspects innovation; from new theoretical innovation education quality point of view, it is a different from the traditional examination-oriented
education of the new education; from the operational level of innovation in terms of education, it is a focus on teaching mode, ideas, content and method level education, and as a quality education and deepen educational reform breakthrough, eventually become an educational reform experiment activities staff and students to participate.

Through the above discussion and understanding of innovation education, the concept of innovation education can be summarized as follows:

(1) In terms of the substance of innovative education, its goal is to cultivate innovation personality, based on full-scale development of the overall quality of the people, the purpose is to enhance the quality of life of individuals. In short, it is a new type of education to improve the quality of the people and the country's competitiveness.

(2) In terms of the relationship between innovation and education, entrepreneurship education, innovation and personnel training and other concepts in terms of a broad point of view, they are similar in meaning, the content is linked, in the sense that the same can be used as synonyms for use and replacement; but from the perspective of academic research, and there are some differences [2, 3].

III. UPDATE EDUCATIONAL CONCEPT AND STIMULATE STUDENTS’ DESIRE FOR INDEPENDENT INNOVATION

Educational concept is the prerequisite education, and different concepts of education will produce different forms of education and educational value. Timely and effective updates education idea is to reform the educational values suited to the times, talent and quality concept.

In terms of educational values, it should be emphasized in the past to change the concept of social development, changes to facilitate the coordination of social and human, unified development up; change the past, exam-oriented education concepts into innovative educational values; change the past, only the emphasis on knowledge and skills taught concepts of education, get into lifelong learning, viability and ability to create value.

In view of talents, we should change the strict teacher-student relationship in the traditional education, change the idea of equality and democracy, change the orientation of the traditional education, change the teaching idea of students as the teaching center, change the concept of traditional education, and change the concept of science and technology education.

On the education quality, clear the relationship between knowledge and ability, and, the establishment of on practice ability training as the focus of education quality view; change the previous exam oriented education to the concept of memory is dominant, with test scores to measure, the concept of student evaluation; establishing new era to all-round development for the purpose, to ability training, with the focus on the content of the new education quality by the concept of comprehensive quality assessment.

IV. REFORM COURSE SYSTEM AND ENHANCE STUDENTS’ INDEPENDENT INNOVATION INTEREST AND ABILITY

In the new period, the social development is swift and violent, the competition is increasingly fierce, the science and technology development trend is also becoming more and more obvious, and the integration of natural science and social science is very obvious. The all-round development of college education in the new era will pay more attention to students’ personality, knowledge and ability. Therefore, the traditional for the division of professional and meticulous, resulting in too narrow professional caliber also will no longer meet the requirements of a new era of talent development.

A. Reform Course Setting and Optimize Course Structure

At present, the most important task of Cultivating College Students’ innovative thinking and ability is to break the traditional curriculum system frame and update the teaching content. Curriculum system, teaching content and methods of training directly affect the knowledge, quality and ability structure of personnel training to meet the requirements of the times. Therefore, the majority of colleges and universities want to meet the requirements of training innovative talents, must be in accordance with the requirements of the curriculum reform, optimize the curriculum structure, update the education content, expand the education extension, to build a more reasonable, scientific knowledge structure [5].

B. Teach Students in Accordance of their Aptitude

Individualized curriculum reform is a requirement must adapt, which is the students' diverse requirements and personality development. During a required course setting, should ensure a solid foundation for students to master knowledge, focusing on the combination of science and humanities curriculum course, using curriculum teaching students basic knowledge and ability to be trained and strengthened, so that students from a single type of talent converted to compound talents.

In addition, it should also be strengthened and optimization settings Elective. Specifically, you can moderate increase in the proportion of elective courses in the curriculum, encouraging students across different professional selection of elective courses, which will help students to acquire specialized knowledge, based on personal preferences on the basis of elective courses to learn to optimize students’ knowledge structure and quality structure, but also to a greater degree to stimulate students' interest in learning, so innovative and proactive initiative to be strengthened in this process[6].

C. Update Teaching Contents

Students’ ability to innovate and constantly updated course content are inseparable, the only constant updating teaching content so that students will be able to timely understand the latest development level and dynamic world of science and technology, so that students' knowledge structure and level with the world's advanced level are able to phase adapt. Based on innovative features,
teachers in the classroom should discipline appropriate to introduce some of the latest research trends and results of discipline, so that students understand the world cutting-edge information and results of the discipline in order to achieve expand students' knowledge horizons, to enhance awareness of the purpose of innovation.

All in all, curriculum system and teaching content reform is to give students the knowledge to build a comprehensive system to help them better grasp the essence of innovation; individualized, increase the proportion of elective courses in the curriculum is designed to develop students' personality characteristics, promote independent learning, to explore the initiative and enthusiasm; teaching content updates to keep up with cutting-edge science dynamic, knowledge to help students expand their horizons, to stimulate student interest and passion to explore. Reform education system and curriculum are interrelated and through, with a fundamental role in strengthening students' creative ability [7, 8].

VI. DEEPEN TEACHING REFORM, HIGHLIGHT CULTIVATING INNOVATIVE SPIRIT AND PRACTICAL ABILITY

Reform of the Curriculum and Teaching Content had to rely on teachers to implement teaching practices, traditional teaching teachers often focus on imparting knowledge and theory and explanation, and modern teaching will focus on innovative spirit and practical ability on culture, the two have substantive difference, while the latter is the key to innovation and education lies. In modern education, especially among the higher education, attaches great importance to cultivating innovative spirit and practical ability, and cultivate this spirit and ability than a single curriculum that can be supported, it should rely on the joint role of moral, physical, intellectual and aesthetic education , but also all the modern teacher's responsibility [9].

A. Highlight Cultivating Ability and Promote Students to Learn Independently

In actual teaching practice, every teacher should focus on cultivating students' innovative thinking and scientific spirit, have students gather in teaching awareness, the ability to process information, acquire new knowledge, self-analysis and problem-solving skills, the language skills and social skills and so on. The spirit, the ability to develop these also require teachers and students to work together, not just rely on the guidance of teachers, but also need to rely on the active participation of students. Thus, the majority of teachers should change the past, the traditional teaching habits, not to teaching as his own one-man show teachers should allow students to fully participate in them. In this process of active participation, students will be transformed from the traditional passive learning to active learning; students can timely and effective communication with teachers to discuss possible proactive thinking; let the students as the main teaching activities, of teachers teaching content, the way to make recommendations by the chemical conversion process to teach, it is to explore the key innovation, but also promote the formation of students' independent study [10].

B. Highlight Practical Teaching, Cultivate Students’ Innovative Spirit and Ability

Practice is crucial to innovation education, we can say the practice is conceived innovative spirit and ability of the soil, therefore, university teachers should focus on practical teaching. Want a correct understanding and handling the relationship between student learning in theory and practice, it is necessary to change the traditional heavy way of teaching the theory and practice of light fundamentally, it should be closely linked to the theory and practice, learning to learn and understand the theory in practice. Currently, colleges and universities exist in traditional experimental teaching mode suited to requirements of the times, the model with a single course settings to validation experiments mainly stifle students' creative spirit. Therefore, we must change this experimental teaching model, the implementation of open laboratory for students, adding some designs, exploratory nature of experimental projects for students to literature independent access, content and design according to the respective requirements, develop programs, select equipment and other operations, the first hypothesis test, making the results of the analysis and report writing. In addition, according to the different characteristics of each professional to develop a variety of skills, expertise and other social surveys and practices [11,12].

VI. CONCLUSION

In summary, innovation is very concerned about the current higher education should focus on training and capacity, but also a new era of innovative talents necessary capabilities, it is indispensable to social progress a major driving force. Therefore, we must establish a mechanism for Innovative Education in Colleges and Universities in Higher Education for Masses for the country to nurture talent. Good universities want to implement innovative education system, we must practice teaching management in continuous exploration and summary, to be able to make the mechanisms become more mature, perfect, and thus better convey the pillars of the community.

REFERENCES

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