

The Development Direction and Realization Path of Vocational Education from the Perspective of Educational Informatization 2.0

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Abstract: In the three fields of higher education, vocational education and basic education, the informatization of Vocational Education in our country has its distinctive features. The in-depth discussion on the innovation and development of Vocational Education in the era of Education Informatization 2.0 will help the informatization of education better play a great role in supporting, leading and comprehensively promoting the modernization of vocational education. From the aspects of Educational Informatization 2.0 and vocational education modernization development, Educational Informatization 2.0 and vocational education integration innovation development, and Educational Informatization 2.0 and vocational education core elements reform, this paper focuses on how to better innovative development of Vocational Education in the era of educational informatization 2.0

1. Introduction

Since the 12th Five-Year Plan, China's education information industry has developed at an unprecedented speed and high quality, forming a strong momentum of accumulation and development. In this context, the socialism with Chinese characteristics entering a new era, the Ministry of Education timely proposed Educational Information 2.0 based on the situation. And issued "Educational Informatization 2.0 Action Plan", which issued a mobilization order for educational circles to promote educational modernization at a higher level, in a deeper level and in a wider range [1-3]. In the three fields of higher education, vocational education and basic education, the informatization of Vocational Education in China has its distinctive characteristics. This paper discusses the innovative development of Vocational Education in the era of Educational Informatization 2.0. It is helpful to give full play to the great role of supporting, leading and comprehensively promoting the modernization of vocational education, and to accelerate the realization of the modernization of Vocational Education in the era of wisdom with Chinese characteristics [4-5].

The realization of education modernization is the main goal of China's current education. The title of the chapter on education in the outline of the 13th Five-year plan of the state is "promoting education modernization". The first sentence of the general goal of education development in the 13th Five-year plan of the state is "making important progress in education modernization". In the new era, China's education modernization is the second education modernization in the human history, which is moving towards a new era of wisdom [6-7]. Therefore, to explore the impact of Educational Information 2.0 on the innovation and development of vocational education, we need to grasp the strategic promotion and role promotion of education informatization for education modernization.

2. Educational Informatization 2.0 and the New Modernization Development of Vocational Education

2.1 The Strategic Promotion of Educational Informationization 2.0 to Educational Modernization

As far as the modernization of vocational education is concerned, the educational informationization in the period of 1.0 is mainly to drive the modernization of vocational education, while the educational informationization in the period of 2.0 is to comprehensively promote the modernization of vocational education [8]. Accordingly, there are strategies to drive the modernization of vocational education with educational informationization and comprehensively promote the modernization of Vocational Education (hereinafter referred to as “driving” and “comprehensively promoting”). The change from “driving” to “all-round promotion” means that there should be unprecedented and profound changes at all levels of vocational education. Smart education and corresponding education transformation strategies are shown in Table 1

Table 1 Intelligent Education And Corresponding Educational Transformation Strategies

The road sign of intelligent education	Educational transformation strategy
Students' immersion in technology	Learning with any device
Personalized learning path	Learner centered process
Knowledge and skills	Building a learning community
Global integration of culture and resources	Specialized learning services
Close combination of education and economy	Systematic view of Education

What's the difference between the “comprehensive promotion” strategy and the “driving” strategy? The theoretical research of education is lagging behind, and the action of vocational education is relatively slow, so it's necessary to explore the essential difference between them first. “Driving” is the external force of education informatization as vocational education, which plays an exemplary role in accelerating the development with rapid changes, as well as the role of digital transformation. On the one hand, the core work is to build digital resources and digital environment, and create material conditions based on information technology for the modernization of vocational education. On the other hand, the core work is to promote the application of information technology in education and teaching, and improve the information literacy of teachers and students [9].

On the whole, “drive” is to make education change rapidly. “Comprehensive promotion” is the endogenous variable of educational informatization becoming the systematic change of vocational education, supporting, leading and comprehensively promoting the modernization of vocational education, deeply integrating information technology and vocational education teaching, promoting the reconstruction of education elements according to the requirements of the times, promoting the renewal of vocational education concept and mode, and generating a new form of vocational education.

2.2 The Upgrade of Educational Informatization 2.0 to the Modernization of Vocational Education

2.2.1 Promotion of Function Level

In traditional Chinese culture, there are four levels of “art and method”. In the 1.0 period, educational informationization mainly applies force on the level of “art” and “technique”. In the 2.0 period, educational informationization not only applies force on the level of “instrument” and “technique”, but also plays a greater role on the level of “law” and “way”, aiming at building new education. In the period of 1.0, the function scope and region of educational informatization mainly lie in the change of moves and parts. Information technology is used as tools and means. In the period of 2.0, the function scope and region of educational informatization lie in the systematic and integral change of vocational education, which is the integration and innovation of information technology and vocational education.

2.2.2 Function and Connotation Promotion

The effect of educational informatization in the period of 1.0 is mainly reflected in the change of vocational education. In the period of 2.0, educational informatization should make a profound change in vocational education and construct a new times of vocational education of the times. The essence of educational informatization in the period of 1.0 is to make current situation change. The essence of educational informatization in the period of 2.0 is to make people change, to make vocational teachers sublimate into real modern vocational teachers, to make vocational managers sublimate into real modern vocational managers, and to cultivate the first-class vocational students with the first-class vocational teachers of the times. Through a series of reform, innovation and construction, Educational Informatization 2.0 will make the development level of vocational education informatization and the modernization of Vocational Education in China take the lead in the world and play a leading role. The transformation of Education Informationization 1.0 to 2.0 is shown in Figure 1.

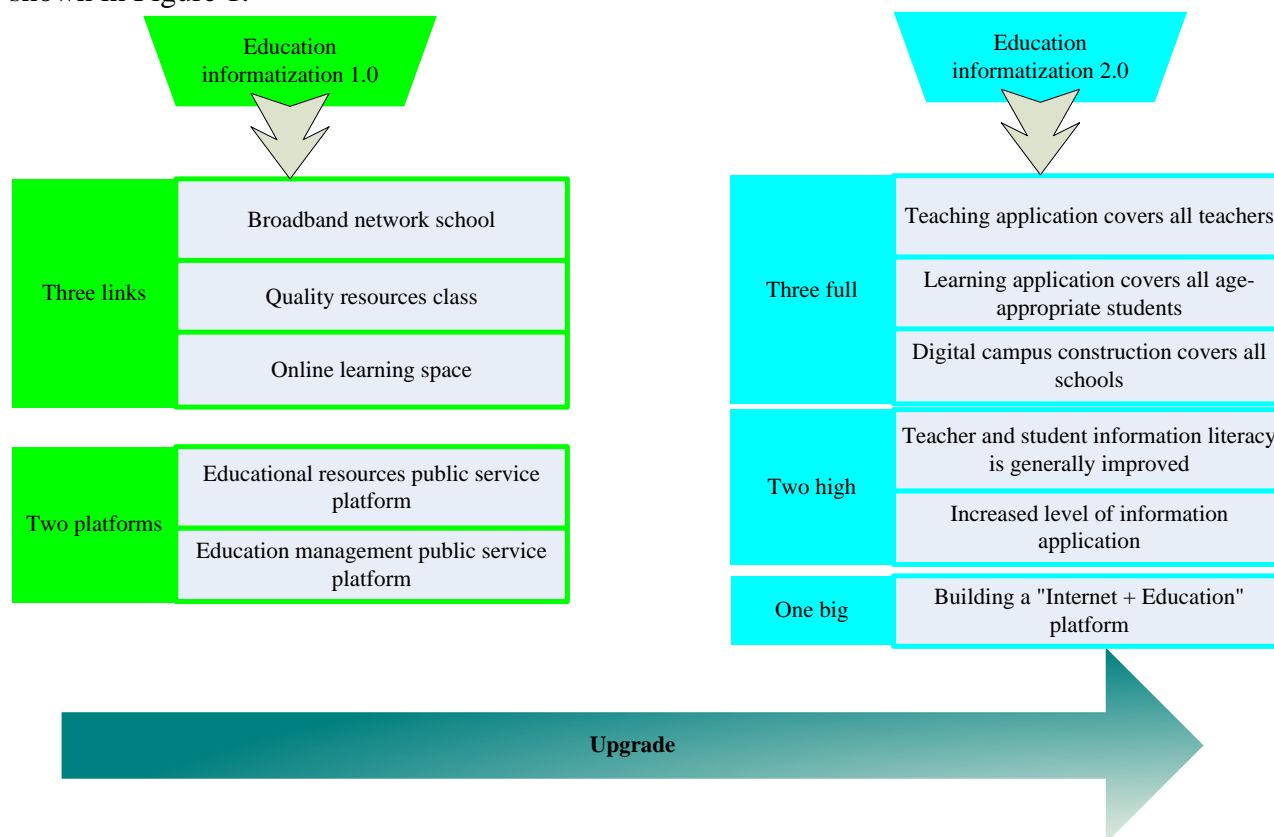


Fig.1 the Transformation of Education Information 1.0 to 2.0

Educational informatization 2.0 comprehensively promotes the modernization of education in the era of wisdom. All the work of vocational education informatization should focus on supporting and leading the modernization of Vocational Education in the era of wisdom. Some developed countries have realized the modernization of vocational education, which is the first modernization of Vocational Education in human history. In the era of wisdom, it can no longer be called the modernization of Vocational Education in a full sense. Chinese vocational educators should create a new journey of the second modernization of Vocational Education in human history with unprecedented spirit and great responsibility.

3. Educational Informatization 2.0 and Vocational Education Integration, Innovation and Development

3.1 Educational Informatization 2.0 Requires the Integration and Innovation of Vocational Education

UNESCO divides the development of educational informatization into four stages: “start, application, integration and innovation”. Based on the scientific demonstration, Chinese scholars tend to divide it into three stages: “start, application, integration and innovation”. One of the important changes of educational informatization from 1.0 to 2.0 is the transformation from the initial and application stage to the financial and creative stage.

In the period of 1.0, application driving is the basic work policy. In the period of 2.0, the work policy will be gradually promoted from application driving to innovation leading, paying more attention to innovation service, innovation development and innovation leading, and accelerating the realization of the three major integration of vocational education. The first is to realize the deep integration of modern information technology and vocational education teaching, and promote the deep-seated reform and innovation of vocational education; the second is to realize the integration of virtual world and real world; the third is to truly realize the integration of school and enterprise in the sense of modernization with the help of information technology. The new ecology of education in the perspective of Educational Informatization 2.0 is shown in Figure 2.

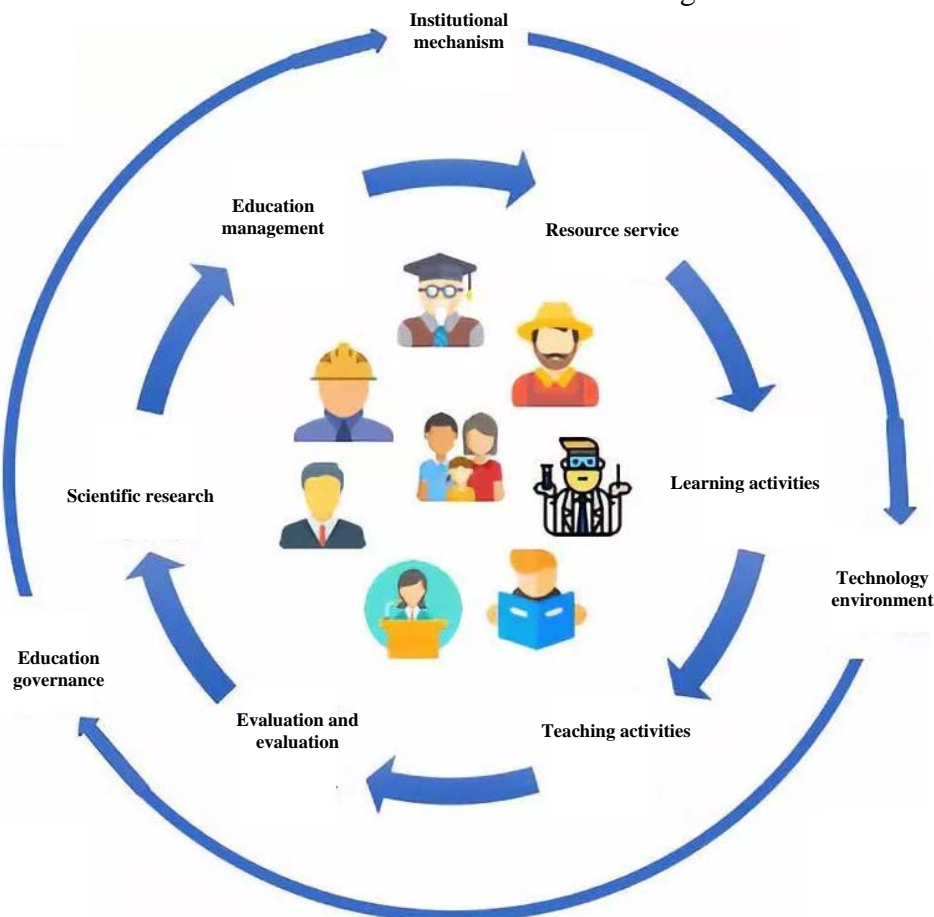


Fig.2 the New Ecology of Education from the Perspective of Educational Informatization 2.0

The transformation of educational informatization from application stage to financial innovation stage requires that the role of information technology in vocational education should be changed to deep application and all-round innovation, and vocational education must actively adapt to this change.

3.2 In the New Era, the Modernization of Human Beings Should Be Put First

As long as there is technology in the application stage, it is technology oriented. In the integration and innovation stage, we need not only technology and give full play to the technical advantages, but also thoughts and ideas, as well as innovative thinking, innovative methods and innovative design. We should not only change the traditional mode and promote the deep integration of new technology and education and teaching, but also reconstruct the new vocational education process, form and business form according to the new requirements of the times to achieve all-round innovation. These requirements are unprecedented for both the managers and teachers of vocational education. The task is unprecedented and arduous. The responsibility is unprecedented and significant. Moreover, the realization of this requirement can not learn from the experience of other countries. It can only be achieved through innovation based on national conditions. Therefore, its innovation is quite original innovation.

In the period of Educational Informatization 2.0, the vocational education must put the modernization of human beings first, and focus on the improvement of information technology ability in the past, and turn to the improvement of teachers' overall education modernization consciousness, concept, thought and ability. The Vocational Education Management Department of the Ministry of Education has taken measures to this, and will continue to build a national vocational education brand for 8 years. The National Vocational College Information Teaching Competition is renamed as the National Vocational College Skills Competition Teaching Ability Competition. The information-based teaching design competition, information-based practical teaching competition and information-based classroom teaching competition are renamed as the teaching design competition, practical teaching competition and classroom teaching competition respectively. In order to make the majority of vocational college teachers have the modern education and teaching ability matching with the education informatization and innovation stage (integration and innovation stage), it is necessary to carry out the modern teaching reform and innovation ability training for all the teachers in the vocational colleges nationwide, otherwise the advanced design is difficult to turn into reality.

4. Conclusion

To sum up, for China's vocational education, the core of Educational Informatization 2.0 is to build up a new era of vocational education and open up a great journey of socialist vocational education with Chinese characteristics. Vocational education has a long way to go. The construction task is heavy, and challenges and opportunities coexist. Only by redoubling efforts and innovating construction with new ideas, can we fulfill the mission of the times and make our vocational education go to a new glory.

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