

# The Dilemma and Reform of the Blended Teaching Model in Chinese Universities in the Internet Era

Yan Wu\*, Xuan Wang

*Business School, University of Shanghai for Science and Technology, Shanghai, China*

**Abstract:** In the context of the Internet Era, with the promotion and application of information technology in the field of education, the practice and reform of the Blended teaching model have ushered in new development opportunities. In the past, the practice of China's Blended teaching model followed a top-down development path. In the process of exploration, due to the deviation of value cognition, insufficient ability support and insufficient support guarantee, the model presented means to replace goals, formalism and other development obstacles. The Blended teaching model in the future should clarify the value orientation, build a blended teaching support network based on improving the governance system of higher education, and promote the optimization of the ability of each link of the Blended teaching model.

**Keywords:** Blended Teaching Model; Higher Education; Teaching Reform; China

## 1. Introduction

The outbreak of COVID-19 in 2020 has brought great influence on the reform of teaching mode in universities. Based on the technology blessing of 'Internet +', large-scale online distance education is a homeopathic move to deal with the epidemic. During the period, the network platform and MOOC resources supporting online education have developed rapidly. The wide application of online distance education provides a pull for the implementation of blended teaching model. In the future, blended learning and teaching will become the general trend [1]. Therefore, how to organically combine the advantages of online education and offline education in the future is a problem that needs to be seriously considered at present, which is also an important fork in the development of Blended teaching model.

With the development of the Internet era, Blended teaching model has attracted wide

attention in the academic and practical circles. Abundant research has been done on the definition, practical exploration, manifestation and operation carrier of Blended teaching model. Since 2003, English literature has focused on Blended Learning. Subsequently, Chinese scholars began to study blended learning and blended teaching model in 2004, but it was not until 2016 that the related research on blended teaching began to increase year by year.

In the existing literature, many studies in China have mixed the concept of Blended / Hybrid Learning with the concept of Blended Learning. English literature is mostly biased towards Blended Learning, and there is little expression of Blended teaching, which highlights the domestic "teaching-centered" concept. At the same time, it also shows that in the Internet era, students and teachers also need to adjust and change their roles. Garrison et al. (2004) [2] defined it as the deep integration of classroom face-to-face learning and online learning; He Kekang (2004) [3] believed that the so-called Blending Learning is to combine the advantages of traditional learning methods with the advantages of E-Learning (digital or networked learning). Stefan Hrastinski (2019) [4] sorted out the concept of blended learning based on previous literature and found that it is a umbrella term. It is generally believed that the key element of blended learning is the mixture of face-to-face and online teaching or learning. At the same time, blended learning is also used to describe the mixture of different teaching methods and techniques, although these mixtures do not conform to the mainstream definition. From the definition of the above concepts, it can be found that the connotation of blended learning includes two categories: teaching and learning, which can be regarded as two sides of the same coin.

Any type of education can be called blended learning as long as it includes a mixture of face-to-face teaching and online learning. Under different stages of development, the degree of

mixing is deepening, and blended teaching has undergone a transformation from formal combination to structured integration. In this paper, blended teaching is defined as the organic integration of online learning and offline face-to-face teaching by using smart classrooms, cloud services, mobile networks and other carriers in the online virtual environment and offline physical scenes under the background of 'Internet +'. However, blended teaching is by no means a simple application of information technology, and the difficulty in promoting teaching reform is by no means at the technical level. The key lies in the teaching design concept behind it and the 'student-centered' development orientation.

The existing research has done a lot of exploration around the blended teaching model, but most of them focus on the implementation and operation of the blended teaching model from a micro perspective. There is a lack of targeted discussion on the practical misunderstandings of the blended teaching model in practice, especially the development path of the model in the Internet era. This paper will analyze the development path and practice block of the blended teaching model in universities, and explore the reform trend of the blended teaching model.

## **2. The Development Dilemma of Blended Teaching Model in Chinese Universities**

Through literature review, it is found that there have been studies on blended learning in China since 2004, but it was not until 2016 that the related research began to increase significantly. On the one hand, it reflects the proposal of the 'Internet +' action plan in 2015 and its application in the field of education. On the other hand, it also reflects the 'policy orientation' of the development of higher education in China. At the end of 2015, the Ministry of Education mentioned the promotion of new teaching models such as flipped classroom and blended teaching in the 'next step of higher education reform and development'. After five years of development. From the initial exploration of 2015-2016 to 2018, we have paid attention to the use of blended teaching model to create excellent courses, first-class courses and 'golden courses', and have successively issued relevant policies and regulations to guide professional teachers to carry out the teaching research of blended teaching model through

project declaration, and take the pilot work of related topics as an important indicator for assessing colleges and departments. Therefore, the blended teaching model has achieved rapid growth of application scale under the leadership of the Chinese government.

Under the high-level promotion of the government and the blessing of the "Internet +" era, the practice of China's blended teaching model follows a top-down development path. When implementing the relevant requirements of the Ministry of Education and local education departments, universities are in the early exploration period of online resources such as MOOCs. To a certain extent, there is a deviation in the implementation of policies. The specific manifestation is that the offline teaching resources are copied online, and the technical dividend brought by the Internet + is not fully utilized. This also reflects the misunderstanding of the value cognition of the blended teaching model by the relevant subjects. The blended teaching model is the specific application of technology governance and 'Internet +' in the field of education, which embodies the process of information and communication technology in the field of higher education. It should be noted that technology is only a means, not a purpose, and under the support of technical means, the organic integration and penetration of online and offline education are realized. However, in the process of practice, the exploration of the blended teaching model has fallen into the quagmire of formalism, such as the purpose of awarding awards, the lagging concept of curriculum design, the single online teaching model, and the low utilization rate of courses [5]. In addition, there are differences in the teaching methods of different disciplines, and there is a one-size-fits-all implementation of the relevant policies of the blended teaching model, which makes it impossible to straighten out the internal logic of policy implementation. The reason is that this paper analyzes the practical dilemma of the blended teaching model from the three dimensions of value, ability and support.

### **2.1 The Dilemma of Value Cognition in the Implementation of Blended Teaching Model**

In the practice of blended teaching model in Chinese universities, there is a phenomenon of innovation for innovation, which leads to the misunderstanding of goal replacement, rather

than starting from the needs of educational situation. The incentive mechanism behind it mainly comes from the vertical administrative contracting mechanism and the horizontal yardstick competition mechanism.

The government plays a leading role in the field of higher education. The education policy is transmitted from the central ministry of education to local government departments, and then to local colleges and universities, showing an administrative contract-type operation mechanism, top-down level-by-level task allocation indicators. The source of motivation behind it is often motivated by the need for political promotion. Specific to the internal management level of colleges and universities, the contract of tasks is transmitted from the office of teaching affairs to colleges, departments and professional teachers in turn, and the reform of blended teaching model is included in the scope of college assessment. In the form of teaching reform projects, professional teachers are encouraged to apply for and carry out the reform and exploration of teaching model. Under this pressure-type system, teachers and students at the grass-roots level are passively executed, rather than endogenous to the actual teaching needs. Therefore, the development of the previous blended teaching model highlights the development orientation of "teacher-centered" rather than "student-centered" to a certain extent, and this also reflects that the reform of first-class universities is more inclined to respond to the needs of the government, rather than the development needs of society and students. Therefore, how to improve the relationship between the government and universities, optimize the reform of "decentralization, management and service," and improve the governance system of multi-subject participation in higher education is particularly important.

On the other hand, there is a certain degree of yardstick competition between local governments and universities, which is also reflected in the innovation field of teaching model. When neighboring areas or other universities at the same level explore the blended teaching model, to win the assessment of the higher authorities, the region often takes other regions as the yardstick, and will also take measures to implement similar reforms, and explore how to achieve innovative breakthroughs in the field of teaching. It can be

copied and promoted by other regions or universities to highlight the 'achievements' of undergraduate education in colleges and universities. Under the operation of the above-mentioned incentive mechanism, local governments or universities have changed only for the purpose of competing for projects and resources. The reform has not been transformed into the conscious behavior of the reform subject. As a result, the reform of higher education is often 'there are policies at the top and countermeasures at the bottom'. The 'vigorous' reform at the government or university level is in stark contrast to the 'cold' at the department or teacher level [6].

## **2.2 The Dilemma of Ability Support in the Implementation of Blended Teaching Model**

The implementation of the blended teaching model requires not only an online virtual teaching platform, but also the ability of professional teachers to master relevant information technology and ensure that students have a good network environment.

Blended teaching model is the product of the information age, so the information gap is also reflected in the field of education. In the process of practice, it is inevitable to encounter regional gap, urban-rural gap and group gap. For example, compared with young teachers, old teachers have rich teaching experience, but they are often at a disadvantage in the mastery of information and communication technology. Compared with economically developed areas with perfect network infrastructure, colleges and universities in underdeveloped areas cannot guarantee a good network operating environment when implementing online teaching. Therefore, the blended teaching model may encounter some resistance in the practice process.

Since professional teachers are the main body of implementing the blended teaching model, whether they have good information technology and teaching ability is the key link in the implementation process. Under the blended teaching model, in order to realize the deep interaction and integration of online teaching and offline teaching, it is necessary to carry out scientific teaching design for professional courses, rather than completely copying offline resources to the Internet, which puts forward higher requirements for the teaching ability of professional teachers in colleges and universities, brings greater teaching burden, and the result of

struggling to cope leads to the breeding of formalism. Moreover, there are great differences between different disciplines. How to effectively play the reform effect of the blended teaching model requires professional teachers to find the entry point of the chemical reaction between 'Internet +' and professional courses, and the principle and flexibility can be effectively combined.

### **2.3 The Dilemma of Support and Guarantee for the Implementation of Blended Teaching Model**

The implementation of the blended teaching model needs the support of various stakeholders, rather than the wishful thinking of government departments and universities. The internal and external relations of higher education in China are closed. In addition to party committees and governments at all levels and their higher education authorities, the internal administrative organizations of colleges and universities and related party affairs and administrative personnel, other stakeholder organizations, citizen groups and individuals are basically excluded from school running and management. There is no right to participate in various aspects such as holding, decision-making, supervision and benefit sharing [7]. Therefore, the smooth implementation of the blended teaching model is closely related to the improvement of the higher education governance system. First of all, in the decision-making stage, many colleges and universities simply start from the policy orientation when exploring teaching model, and do not absorb the opinions and suggestions of third-party platforms, teachers and students. Secondly, in the implementation phase, for example, whether the carrying capacity of real-time interaction of third-party platforms can meet the demand? Is the function of the teaching platform perfect? Can it meet the needs of students, teachers and management departments, and whether the connection between universities and third-party interactive platforms and teaching platforms is smooth? Whether it can be effectively implemented is also limited by the quality of the previous decision-making. This series of problems need the support of all parties.

### **3. The Reform Trend of Blended Teaching Model in Chinese Universities in the Internet Era**

Blended teaching model will become the new normal of teaching development in colleges and universities in the Internet era. The outbreak of the COVID-19 epidemic has provided an important opportunity. Online teaching that integrates 'Internet + ', artificial intelligence, and big data technology will become the development direction and new normal of the teaching model in colleges and universities. However, both the traditional offline teaching and the simple online teaching have their own advantages and disadvantages. Therefore, in practice, the development of the blended teaching model has entered a new stage through the improvement of the three dimensions of value, support and ability.

#### **3.1 Clarify the Value Orientation of the Blended Teaching Model and Realize 'Learning-Centered'**

The external manifestation of the blended teaching model is the combination of face-to-face teaching and online teaching. Colleges and universities need to adhere to the principle and flexibility in the process of implementation according to their own development characteristics and considering the differences of disciplines, that is, they need to grasp the spiritual essence of the blended teaching model in the process of adaptation. The key is how to view the role of information technology in the blended teaching model. The process of integrating information technology with curriculum is not only the application process of modern information technology means, but also will be accompanied by a profound change in the field of education and teaching [8].

Online teaching during the prevention and control of COVID-19 has provided rich online curriculum resources for the promotion of blended teaching model. Educational administration departments, teachers and students have experienced the advantages of eliminating spatial distance brought by information technology in the online teaching stage, and the convenience and real-time performance of learning have been enhanced. However, it is a challenge for students' autonomous learning ability and teachers' teaching design ability. Traditional offline teaching has its advantages, and the communication between teachers and students is more sufficient. Therefore, in the post-epidemic

era, we should continue the online teaching in the anti-epidemic period, integrate the changes of teaching technology, teaching methods and teaching paradigm into offline classroom teaching, give full play to the advantages of online and offline teaching, improve the teaching effect through scientific teaching design, and create first-class undergraduate courses and 'gold courses', to better realize the public value of education. The practice of blended teaching model can be regarded as a means-target system. Online and offline teaching and learning play a role as a means. The purpose and value are to realize the "learning-centered" development orientation, improve students' autonomous learning ability, and create a blended gold course.

### **3.2 Improve the Governance System of Higher Education and Build a Blended Teaching Support Network**

The modernization of the higher education governance system is also reflected in the reform track of the blended teaching model. The implementation of this model is not only a two-way interaction between teachers and students, but also inseparable from the effective support of multi-party participants, such as the government, universities and industry enterprises. Within the university, it involves educational administration departments, professional teachers and students. Different governance subjects play different roles. Only by fully participating in the reform of the teaching model can the multi-party subjects play a better role in governance. The interaction between the subjects will form a blended teaching network. Finally, it will shape the multi-center governance pattern and education governance community with government guidance, university subjects and social forces participation.

As an important governance subject of higher education, the operation mechanism of project system and administrative contracting highlights the "policy orientation" of the blended teaching model. Online teaching during the COVID-19 has accumulated rich online resources and related teaching experience. Therefore, the government's reform focuses on changing its role, doing top-level design for the development of higher education, strengthening the promotion of "decentralization, management and service" in the field of education, guiding colleges and

universities to actively explore and innovate, and mobilizing enterprises and social organizations to participate in the process of creating an upgraded version of the blended teaching model. Give full play to the advantages of each governance body. Specifically, first, the government decentralizes power to colleges and universities, alleviates the constraints and pressures brought by the top-down development path, and provides a relaxed institutional environment for colleges and universities to explore the pilot and innovation of blended teaching model; secondly, the government should strengthen supervision and management, and supervise the behavior that violates the development of higher education. The management institution is not only the decision maker of declaration and project, but also the communicator of ideas, the guide of application and the supervisor of effectiveness. It should implement the whole process management of the reform process.<sup>[9]</sup> The third is to provide public services, protect intellectual property rights, and provide a good market operating environment for third-party platforms to participate in the promotion of blended teaching models in colleges and universities. In addition, it provides a platform for teaching exchange, promotes the co-construction and sharing of excellent course resources in colleges and universities, and improves the utilization rate of online resources. The reform of the current blended teaching model also poses challenges to the macro management and institutional support of colleges and universities. Under the long-term control of the logic of government regulation, colleges and universities do not have the institutional ability to undertake and standardize the exercise of school-running autonomy, and even lack the willingness to expand school-running autonomy [10]. Therefore, the first is the role orientation, which clarifies what the needs of the teaching subject are from the perspective of students and teachers, and combines the value of the blended teaching model to publicize and mobilize, so as to change the current situation of teachers and students. In the decision-making process, teachers and student representatives are involved, and suggestions are made for the reform decision-making of the teaching model. At the same time, attention should be paid to ensuring that teachers, as an important subject of reform, have strong flexible choices and cannot be



implemented in a one-size-fits-all manner for different disciplines. In the implementation process, it is necessary to strengthen management, evaluation and incentive work to mobilize the enthusiasm of teachers and students.

The second is to provide training, to achieve a comprehensive coverage of blended teaching training, to help teachers understand and master the methods and abilities of designing, implementing and evaluating blended teaching [11]. Young teachers and teachers with rich teaching experience can complement each other in blended teaching training. On the one hand, they should master the digital literacy of online teaching. On the other hand, they should also learn how to better carry out teaching design in the Internet era. The third is infrastructure construction, which provides technical support for the large-scale promotion of blended teaching model. Promote the construction of smart classrooms, check-in, monitoring of classroom teaching effects (statistics of student head-up rates), etc., can be achieved with the help of smart classrooms. The facilities and layout of the classrooms are specifically designed according to the number of students and teaching needs, equipped with teaching tools.

Enterprises and third-party platforms in the education industry should grasp the opportunities and challenges brought by the Internet era. During the COVID-19 period, the literature data publishing institutions openly shared data resources to the society, which not only reflected the fulfillment of organizational social responsibility, but also expanded the coverage of users to a certain extent. When the epidemic situation was gradually alleviated, these literature data publishing institutions should be based on the needs of universities and researchers. Targeted and university docking cooperation will help promote the blended teaching model. After the test during the COVID-19 period, the third-party platform has made great progress, and the online form has become the first choice for the current conference. It has the advantages of high efficiency and low cost. In the future, how these teaching platforms and interactive platforms can better serve the reform of teaching model requires the cooperation and communication between third-party platforms and universities, teachers and students.

### **3.3 Optimize the Links of Blended Teaching Model and Improve the Ability of Teaching Design**

The promotion of blended teaching model requires college teachers to explore the transformation of their roles in teaching practice. The adjustment from lecturer, leader to promoter puts forward higher requirements for teachers' ability, which is embodied in teaching design, teaching technology, teaching evaluation and reflection ability. The exploration of online teaching during the COVID-19 period has laid a foundation for the promotion of the blended teaching model. A lot of work has been carried out on the experience summary and training of teachers. Under the guidance of the goal of clarifying why to blend, the fine design of what to blend and how to blend is carried out.

Specifically, online teaching can play a role in the whole process of teaching before, during and after class, effectively supplementing and enhancing offline teaching. The two can be used as different links in the teaching process, and can operate at the same time. For example, the flipped classroom is integrated into the curriculum system to develop online learning modules for face-to-face courses. Before class, the assessment requirements are clearly defined, and high-quality online courses are provided for students to self-study. Students learn relevant teaching videos online to master the theoretical knowledge points of the course. On this basis, offline face-to-face classroom discussions are carried out to carry out student-centered learning activities. This flipped classroom-style teaching goal examines students' abilities more advanced. In addition to summarizing and deducing the basic concepts and core viewpoints of the course, it can also better use knowledge points to analyze, explain practical problems and make evaluations. In the course, the online teaching platform is used to assist face-to-face teaching by issuing check-in, discussion, answering, questionnaire survey, sharing data, online evaluation, student mutual evaluation and other functions. In the after-school session, due to the limited time for teachers and students in the offline classroom, the seminar can be continued online by using the online platform or other media, and online Q & A counseling and homework can be arranged. Teachers can also use the data statistics function of the online teaching platform to evaluate and summarize the

teaching effect of the offline classroom.

#### 4. Conclusion

In the Internet era, the iterative upgrading and popularization of information technology provides a new development opportunity for the practice of blended teaching model in Chinese universities. How to grasp this opportunity to improve the effect of teaching reform will be an important issue to be considered at present. The outbreak of the COVID-19 epidemic has provided an important opportunity for the reform of blended teaching model. Blended teaching integrating 'Internet + ', artificial intelligence and big data technology will become the new normal of college teaching model in the post-epidemic era. Therefore, in the exploration of teaching reform in colleges and universities, there are great differences in the practical effects of blended teaching model, which depends on the combination of value orientation, resource allocation, ability foundation and other elements of blended teaching model. In the future, how to use blended teaching model to improve the educational effect of curriculum ideological and political education and realize the coordinated promotion of blended education and curriculum ideological and political education will be an important way for Chinese colleges and universities to create "Golden Courses".

#### Acknowledgments

This paper is supported by Shanghai Planning Project of Philosophy and Social Science (No. 2024ESH012).

#### References

- [1] Yu Xinjie. This paper introduces the situation of online education in primary and secondary schools during the epidemic period and the next work consideration [EB/OL]. (2020-05-14)[2024-06-01].<http://www.moe.gov.cn/fbh/live/2020/51987/twwd/202005/t20200514454317.html>
- [2] Garrison D R, Kanuka H. Blended learning: Uncovering its transformative potential in higher education [J]. The Internet and Higher Education, 2004, 7(2):95-105.
- [3] He Kekang. Viewing the New Development of Educational Technology Theory from Blending Learning (I) [J]. Electrified Education Research, 2004 (03): 1-6.
- [4] Hrastinski S. What Do We Mean by Blended Learning? [J]. Techrends, 2019. 63(5):564-569.
- [5] Wu Daguang. Review and Reflection on the Evolution of Educational Technology - - From the Perspective of Online Teaching in Colleges and Universities under the Background of Novel Coronavirus Pneumonia [J]. China Higher Education Research, 2020 (04): 1-6 + 11.
- [6] Mattingly. Higher education reform model and its practice: connotation, dilemma and innovation [J]. Journal of National College of Education Administration, 2020 (04): 3-11.
- [7] Biedunrong. The relationship between the modernization of governance system and governance capacity and the modernization of higher education [J]. China Higher Education Research, 2015 (01): 29-33.
- [8] He Kekang. A profound educational revolution: e-Learning and teaching reform in higher education [J]. Modern distance education research, 2002 (03): 13-20 + 63.
- [9] Han Xiaogang. Rectification: Application and Thinking of Blended Learning [J]. Adult Education in China, 2019 (12): 73-76.
- [10] Yao Rong. Why is the reform of "decentralization, regulation and service" in higher education so difficult? A new institutional perspective based on organizational analysis [J]. Educational Development Research, 2020,40 (07) : 1-7.
- [11] Feng Xiaoying, Wang Ruixue, Wu Yijun. A Review of Blended Teaching Research at Home and Abroad - An Analytical Framework Based on Blended Teaching [J]. Journal of Distance Education, 2018,36 (03): 13-24.