

# Methods and Strategies of Cultivating Students' Autonomous Learning in the Environmental Design Course by Informational Teaching Mode

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**ABSTRACT.** *Taking the environmental design course as an example, based on the concept of autonomous learning and informational teaching, through a variety of interactive two-way integration methods, promote the cooperation between teachers and students, and then achieve the organic combination of information technology and student learning, and achieve the improvement of college students' Autonomous learning ability.*

**KEYWORDS:** *Information Technology; Autonomous Learning; Teaching Method*

## **1. The importance of autonomous learning**

In the traditional classroom teaching, the main subjects of teaching are “teaching” and “learning”, teachers' initiative teaching, students passive learning, the two main tasks of the classroom are clear, the roles are fixed, and the teachings are less cross-cutting[1]. In order to increase the participation of students, teachers' classrooms are undoubtedly a good way to close the relationship between the two, but they can't change the subjective characteristics of students' passive learning[2].

It is the ideal state of education that students receive knowledge from passively to actively After the enthusiasm is mobilized. Based on this direction, the cultivation of students' autonomous learning is constantly being upgraded to a new level. The form of curriculum, stimulating students' initiative in learning has become the top priority of teaching methods[3].

## **2. The advantages of informational teaching mode to improve the teaching effect of the environmental design course**

In the teaching process of the environmental design course, through the combination of information technology and curriculum, the knowledge points can be effectively enlarged. The form of classroom changes from "teaching → learning" to

"learning → knowledge". In this transformation, the "teaching" of teacher is weakened and the "learning" of students is strengthened. The convenient operation mode and novelty characteristics of information technology have become the highlights in the classroom teaching. The students' participation can be generally improved. Under the guidance of various information-based teaching methods, students change from passive acceptance of knowledge to initiative and students change from object to subject in class participation[1].

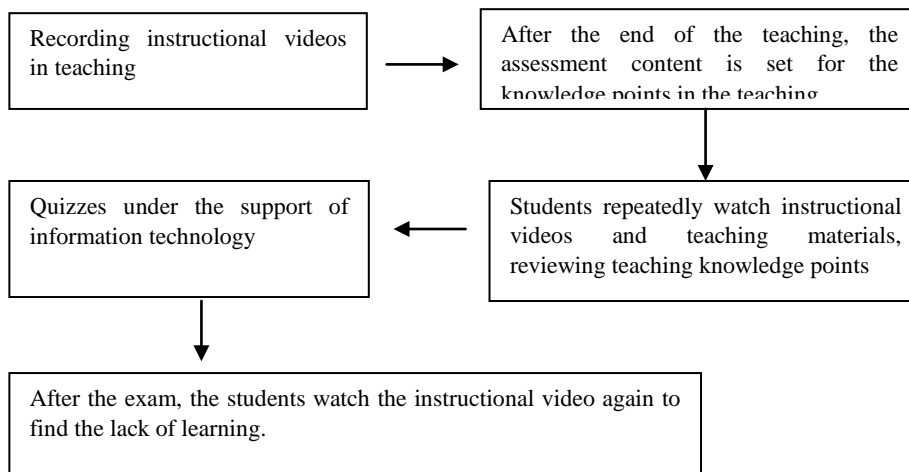
### **3. Informatizational methods and strategies for cultivating students' autonomous learning in the environmental design course**

#### ***3.1 Rich learning resources under information technology***

Focusing on the knowledge points of the environmental design course, the Moso Teach APP is used to share books, pictures, texts, videos and other learning resources. Students encounter learning problems in their studies, and then through the resources published by the teachers can effectively solve the problems and achieve the desired learning effect[2-3]. Similarly, teachers propose learning tasks in teaching, and students complete tasks through access to materials, etc., which are effective ways to improve students' Autonomous learning.

#### ***3.2 Teaching video sharing combined with teaching assessment***

Instructional video sharing and quizzes are effective ways to improve autonomous learning. Video sharing refers to sharing under the support of information technology, and classroom testing refers to testing based on teaching content and goals. The specific operation process is as follows:



Through this purposeful and targeted teaching and assessment process, students will actively learn knowledge in their learning, independently test the mastery of classroom knowledge, self-check and fill in the gaps, and realize the effective dissemination of knowledge.

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### ***3.3 Comprehensive application of various teaching and testing methods under information technology***

The traditional era of "a test paper is all" is no longer suitable for modern university education, and more democratization, openness and pluralism are reflected in the teaching evaluation under the support of information technology. "Brainstorming" tests students' understanding of knowledge mastery. "Student mutual evaluation" enables students to have a more comprehensive understanding of learning effect, achieve mutual learning and complement each other. Learning results have been made public and transparent. Diversified teaching effectiveness test methods such as "Group Discussion", "Online Test", "online Q&A" and "voting questionnaire" allow students to play a more active role in this whole process. This teaching test process also becomes a learning process for students. In the teaching test, the teacher is the director, the student is the protagonist, and the knowledge is the plot.

The comprehensive assessment method of informatization further determines the dominant position of students in the assessment. Students carry out independent learning and independent learning test in this environment. Thereby a new situation of teacher-student interaction is created.

### ***3.4 Analysis of academic conditions under information technology***

In the environmental design course, the teaching process and assessment methods supported by information technology are retained in the form of electronic information. The Moso Teach can use computer to analyze and analyze data. The analysis results are helpful for teachers to master the students' learning situation, and can adjust the teaching content and progress in a targeted manner, and can provide help timely to students with weak learning ability and urge them to learn.

The informational analysis of the situation has the characteristics of openness and transparency, which enables students to understand their own learning state. According to the teaching analysis data, students have more initiative in formulating new learning plans based on their own characteristics. With the support of information technology, students will no longer be a small boat in the process of learning, but will become a leader who will move forward on the prescribed route.

#### **4. Summary**

In the teaching of the environmental design course, through the integration and integration of information technology, students are placed in the information learning atmosphere, deeply feel the information culture life of applying information technology to learn new knowledge, and stimulate the internal motivation and needs of learning to master new knowledge. The whole process is well cultivated and improves students' learning autonomy. Practice shows that the teaching effect is satisfactory.

#### **Acknowledgments**

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