

The Transformation Path of Curriculum Ideological and Political Education Resources Based on Double-diamond Model from the Perspective of User Experience

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Abstract: This article aims to explore the effective transformation path of ideological and political education (IPE) resources in universities, so as to enhance the pertinence and effectiveness of IPE and enhance students' interest and participation in learning. The research introduces the double-diamond model and user experience theory, and through a systematic methodological framework, namely, four stages of discovery, definition, development and delivery, the ideology elements in curriculum resources are deeply excavated and naturally integrated into the teaching of professional knowledge. In the discovery stage, the research explores resources and analyzes users' needs through multi-dimensional methods. In the definition stage, the specific objectives of the course IPE are defined, and the instructional content is designed accordingly. The development stage focuses on the innovation and interactive design of instructional methods to enhance students' learning experience. In the delivery stage, through the effect assessment and feedback loop, the course content is continuously optimized to form a closed-loop iteration. The transformation path of curriculum IPE resources based on double-diamond model and user experience theory can significantly improve the instructional effect of the course and promote the ideological and moral quality of students in professional knowledge learning.

1. Introduction

In today's tertiary education system, curriculum IPE, as an important way to cultivate people, is gradually becoming a hot topic in education reform [1]. Since 2017, the Central Committee of the Communist Party of China and the State Council clearly put forward the concept of "all-round education in the whole process", universities have responded positively and explored ways and paths to integrate IPE into professional courses [2]. This move aims at enhancing students' ideological and moral quality, and at the same time, it strives to cultivate students' sense of social responsibility and national feelings through the organic integration of professional knowledge and ideology elements [3]. However, in the practice of ideological and political course, how to balance the relationship between professional knowledge imparting and value leading and avoid students' resistance caused by the blunt implantation of IPE content has become an urgent problem to be

solved [4].

User Experience (UX) is the overall feeling formed by users in the process of using products or services, covering many aspects such as cognition, emotion and behavior [5]. Good user experience is the key to product success, which requires designers to deeply understand users' needs, expectations, behavior patterns and use environment, so as to create practical and pleasant products or services [6]. User experience theory emphasizes the user-centered design principle, and advocates the continuous optimization of products through user research, prototype testing, user feedback and other means to enhance user satisfaction and loyalty [7]. In the field of education, user experience theory is also applicable, which guides teachers to design instructional activities that are more in line with students' learning habits and stimulate their interest in learning, making the learning process more efficient and enjoyable.

This research is carried out under this background, aiming at providing new ideas and methods for the effective transformation of IPE resources in courses by introducing the double-diamond model and user experience theory, so as to improve the instructional effect and promote the all-round development of students. This article focuses on the transformation path of IPE resources in universities, especially how to realize the deep integration of ideology elements and professional knowledge by relying on the double-diamond model as a design thinking tool and combining with the user experience theory. The research strives to comprehensively and deeply understand the current situation and predicament of curriculum IPE, and provide an empirical basis for the follow-up path exploration.

2. Detailed explanation of double-diamond model

Double-diamond model is a methodological framework derived from design thinking, which provides a structured process for solving problems and innovation. It is divided into two main stages, and each stage contains two subdivision steps, which are shaped like two connected diamonds, hence the name [8]. The first stage is "discovery" and "definition", focusing on the in-depth exploration of the problem and the clear demand. In the "discovery" stage, potential problems or opportunities are identified by collecting information extensively, observing user behavior and analyzing existing products or services. Then enter the "definition" stage, integrate the collected information, clarify the core of the problem, and set specific design goals or the direction of the solution. The second stage is "development" and "delivery", focusing on the implementation and optimization of the scheme. In the "development" stage, based on the defined goals, the prototype design and test iteration are carried out, and the optimization is constantly adjusted until the best state is reached. The "delivery" stage is to push the results to the market or users, collect feedback, and provide a basis for subsequent iterative upgrades. The double-diamond model emphasizes user-centered, and ensures that the solution meets the actual needs and is innovative through cyclic iteration.

3. The integration path of double-diamond model and user experience

The combination of the "Double Diamond" model and user experience theory offers a new perspective and approach for the transformation of curriculum IPE resources [9]. This integrated approach not only ensures the relevance and effectiveness of curriculum IPE but also fosters innovation in instructional methods and enhances students' learning experiences. The details are as follows:

In the "discovery" stage, through the methods of user experience research (such as questionnaire survey, interview, observation, etc.), we can deeply understand students' learning needs, interests and learning obstacles, and at the same time tap the potential ideology elements in professional

courses to lay the foundation for the subsequent curriculum design.

In the "definition" stage, based on the insight of user experience, the objectives of IPE (such as cultivating students' sense of social responsibility, patriotism, humanistic feelings, historical honor, etc.) are defined, and the instructional content and instructional methods are designed accordingly to ensure the natural integration of ideology elements and professional knowledge.

In the "development" stage, the principles of user experience design (such as ease of use, fun, interaction, etc.) are used to optimize the course presentation and enhance the learning experience.

In the "delivery" stage, student learning feedback is collected, the instructional effect is evaluated, and the course content is continuously adjusted and optimized, forming a closed-loop iteration that improves the teaching quality of ideological and political courses.

4. The transformation path of IPE resources in courses based on the double-diamond model

4.1. Discovery stage: resource mining and user demand analysis

In the transformation path of curriculum IPE resources based on the double-diamond model, the discovery stage is a crucial link. The core task of this stage is to dig deep into the ideology elements contained in professional courses and accurately grasp students' learning needs and expectations. Through the comprehensive use of literature analysis, expert interviews, student surveys and other methods, teachers can systematically sort out the knowledge points that can reflect the outstanding Chinese traditional culture, socialist core values, patriotic feelings, social responsibility and other ideological and political points in professional courses. Teachers can understand students' interests, learning difficulties and expectations for IPE through questionnaires and in-depth interviews. This ensures that the subsequent curriculum design not only meets educational objectives but also stimulates students' interest in learning.

4.2. Definition stage: clear goal and content design

After the excavation of resources and the analysis of users' needs, the definition stage focuses on the definition of ideological and political objectives of the course and the careful design of instructional content. Based on the previous research results, teachers need to define the specific goals of IPE, as shown in Figure 1, which should complement the teaching of professional knowledge.

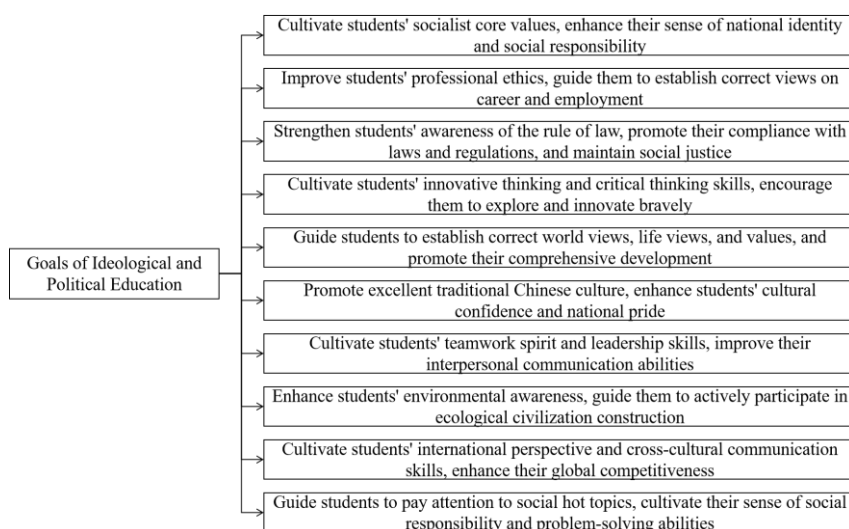


Figure 1: Goals of IPE

Then, according to the goal, the course content is carefully designed to ensure that ideology elements are naturally integrated into professional knowledge and avoid blunt preaching. Content design should not only pay attention to the systematization and logicity of knowledge, but also pay attention to the guidance of emotion and the shaping of values, so that students can deeply understand and agree with the core concept of IPE while learning professional knowledge.

4.3. Development stage: instructional methods and interactive design

The development stage is a key step in the transformation of IPE resources, which involves the selection and innovation of instructional methods and the ingenious design of classroom interaction. At this stage, teachers should actively explore instructional methods suitable for the IPE characteristics of the course, as shown in Table 1. These methods can stimulate students' interest in learning and promote deep thinking.

Table 1: Teaching Methods Suitable for IPE in Courses

Teaching Method	Description
Case Analysis	By analyzing real cases, guide students to explore the ideology elements within, enhancing their understanding and application of theoretical knowledge.
Group Discussion	Divide students into groups to discuss ideological and political topics, encouraging them to express their views and cultivate teamwork and critical thinking skills.
Flipped Classroom	Students autonomously learn professional knowledge through videos, readings, and other materials before class, while class time is mainly used for discussion, clarification of doubts, and deepening understanding of ideological and political connotations.
Role-Playing	Allow students to simulate ideological and political scenarios by playing specific roles, experiencing different positions and viewpoints, and enhancing emotional resonance and value identification.
Project-Based Learning	Design project tasks related to IPE themes, enabling students to learn professional knowledge while developing problem-solving abilities in the process of completing the projects.
Mind Mapping	Use mind mapping tools to help students organize IPE knowledge points, form a knowledge system, and improve memory and understanding efficiency.
Situational Simulation	Create situations related to IPE content, allowing students to learn and experience in simulated situations, enhancing the practicality and fun of learning.
Interactive Q&A	Through teacher-led questions and student responses, guide students to deeply consider IPE issues, stimulating learning interest and enthusiasm.
Interdisciplinary Integration	Integrate IPE content with knowledge from other disciplines to form an interdisciplinary teaching plan, broadening students' knowledge horizons and depth of thinking.
Reflective Journal	Require students to write reflective journals, recording their understanding and insights into IPE content, promoting self-reflection and internalization of values.

Teachers can design interactive instructional activities to enhance the communication and cooperation between teachers, students and students, so that students can deepen their understanding and recognition of IPE content in interaction.

4.4. Delivery stage: effect assessment and feedback cycle

The delivery stage is the end of the transformation path of curriculum IPE resources and the

beginning of a new round of iteration. The main task of this stage is to assess the instructional effect and collect feedback. Through diversified assessment methods, such as Table 2, we can fully understand students' mastery of the course content, acceptance of IPE and satisfaction with learning experience.

Table 2: Assessment and Feedback Collection Methods for the Effectiveness of IPE in Courses

Assessment & Feedback Method	Description
In-class Tests & Exams	Design tests or exams that include IPE knowledge points to assess students' mastery and understanding of the course content.
Questionnaires	Distribute questionnaires to collect feedback on students' overall satisfaction with the course, the integration effect of IPE, and suggestions for improvement.
Group Discussions & Presentations	Organize group discussion sessions where students share their learning experiences and insights on ideological and political topics, with teachers observing and recording students' performance and understanding levels.
Individual Interviews	Conduct one-on-one interviews with selected students to gain a deeper understanding of their learning experiences, acceptance of IPE, and personal growth.
Assignment & Project Assessment	Analyze students' assignments, project reports, etc., to assess their ability to apply IPE knowledge in practice and their innovative thinking.
Peer Assessment	Encourage students to assess each other's learning of IPE content and understanding, promoting mutual learning.
Reflective Journal Analysis	Collect and analyze students' reflective journals to understand their internalization of IPE, self-reflection abilities, and changes in values.
Online Interaction Data Analysis	Analyze students' interaction data on online learning platforms, such as discussion forum posts and Q&A records, to assess learning activity and participation.
Practical Performance Assessment	Observe and record students' performance in practical activities, assessing their ideology qualities and sense of social responsibility.
Instructional Effectiveness Summary Meeting	Organize an instructional effectiveness summary meeting for the teacher team to share teaching experiences, discuss assessment results, and propose improvement measures.

Based on the assessment results, teachers need to carefully analyze the problems and shortcomings in teaching, adjust the instructional contents and methods in time, and form a closed-loop feedback mechanism. Furthermore, teachers should encourage students to put forward valuable opinions and suggestions to provide strong support for the continuous improvement of the curriculum.

5. Conclusions

This study systematically explores the transformation path of IPE resources in universities by introducing the double-diamond model and user experience theory. It covers the discovery stage, which involves resource mining and user demand analysis; the definition stage, which includes goal definition and content design; the development stage, which focuses on instructional methods and interactive design; and finally, the delivery stage, which encompasses effect assessment and

feedback cycles. Each of these steps closely revolves around the "student-centered" educational concept, and strives to achieve the deep integration of ideology elements and professional knowledge. The research shows that the transformation path of curriculum IPE resources based on the double-diamond model can enhance students' learning interest and participation. Furthermore, it can enhance the pertinence and effectiveness of IPE, and provide strong support for cultivating socialist builders and successors with all-round development of morality, intelligence, physique and beauty.

In a word, as an important part of higher education, curriculum ideological and political education is of great significance for inheriting the Chinese context and cultivating students' ideological and moral quality, social responsibility and national feelings. This study provides a new perspective for the transformation of curriculum IPE resources by relying on the double-diamond model and user experience theory. Although there are still some challenges in practical application, it is believed that through continuous exploration and practice, the IPE curriculum system can be gradually improved, contributing to the cultivation of more outstanding talents who possess a Chinese heart, are imbued with Chinese sentiment, and exude a Chinese flavor.

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