

Paths of Digital-Intelligent Empowerment for Ideological and Political Education Through Red Culture in Old Revolutionary Base Areas: A Case Study of Northern Anhui

Wencong Li

*School of Marxism, Fuyang Normal University, Fuyang, China
19738169465@163.com*

Abstract. Ideological and political theory courses serve as the core position for colleges and universities to fulfill the fundamental task of fostering virtue through education, and red culture in old revolutionary base areas is an important education carrier for carrying forward the red bloodline and conducting value guidance. Promoting the creative transformation of red resources based on the national strategy of educational digitalization is a vital path for local colleges and universities to improve the quality and efficiency of ideological and political teaching. Taking the old revolutionary base areas in northern Anhui as the field research object, this paper finds that in the integration process of digital-intelligent technology and local red ideological and political education, there are four practical difficulties: superficial exploitation of red resources, insufficient digital teaching literacy of teachers, disconnected regional digital resources, and imperfect comprehensive education evaluation mechanisms. A review of surveys on classrooms and red venues in multiple universities in northern Anhui shows that most existing studies separate the two topics of red culture and educational digitalization, and there are few empirical achievements specifically targeting northern Anhui that combine field research with implementation measures. Based on Marxist theories of ideological and political education, this paper constructs an integrated implementation path from four dimensions: curriculum, teaching staff, digital platforms and evaluation, which can provide practical references for the digital reform of ideological and political education in colleges and universities in similar old revolutionary base areas across China.

Keywords: digital-intelligent technology, red culture, ideological and political theory courses in colleges and universities, holistic ideological and political courses

1. Introduction

The report to the 20th National Congress of the Communist Party of China proposed that we should make good use of red resources, deepen patriotic education, and strive to cultivate young people of the new era who are capable of shouldering the mission of national rejuvenation [1]. Systematically and digitally integrating local red cultural resources into the teaching of ideological and political theory courses in colleges and universities is not only an inevitable choice for promoting the reform

and innovation of ideological and political courses and carrying forward local red cultural heritage, but also a proper meaning for cultivating the ambition, backbone and confidence of young people in the new era and fulfilling their mission and responsibility [2]. In July 2024, the Third Plenary Session of the 20th Central Committee of the Communist Party of China clearly put forward "advancing educational digitalization, empowering the building of a learning society, and strengthening the guarantee of lifelong education". Digital tools such as VR/AR, 3D modeling, big data, AI material push and cloud classrooms provide brand-new technical support for the creative transformation of red culture [3]. With the continuous advancement of the digital transformation of ideological and political education in the new era, ideological and political courses should not only consolidate the foundation of theoretical teaching, but also rely on digital technology to strengthen the functions of political guidance, value shaping and cultural immersion. Northern Anhui is rich in red relics such as those of the Huaihai Campaign and the anti-Japanese base areas in northern Anhui, but local colleges and universities still have obvious shortcomings in the digital development and utilization of red resources.

A review of existing studies reveals that the academic circle generally has a tendency of one-sided research, with most studies focusing solely on red culture inheritance or educational digitalization construction. There are relatively few empirical studies combined with the local teaching reality of northern Anhui that integrate survey data and practical operation plans, and some achievements also show a one-sided tendency of valuing technical forms while neglecting ideological guidance. Based on classroom visits to multiple colleges and universities in northern Anhui and field surveys of red venues, this paper sorts out the existing obstacles to the integration of the two, and extracts optimization paths adapted to the school-running conditions of northern Anhui, so as to provide references for the ideological and political reform of similar old revolutionary base areas across the country.

2. Value implications of integrating red cultural resources in northern Anhui into college ideological and political theory courses under digital-intelligent technology

The iterative upgrading of digital technology can make up for the shortcomings of traditional red ideological and political classrooms from four dimensions: resource supply, classroom form, collaborative education and youth cognitive adaptation, and comprehensively improve the comprehensive effectiveness of ideological and political education in colleges and universities in old revolutionary base areas of northern Anhui.

Traditional red ideological and political teaching relies heavily on offline field study at venues. Restricted by transportation, class hours and geographical conditions, a large number of remote revolutionary sites cannot be regularly brought into classrooms. Relying on digital means such as 3D scanning, panoramic modeling, VR virtual simulation and big data storage, scattered red sites such as Linhuan Wenchang Palace in Huaibei, Shuangduiji Martyrs Cemetery and the martyrdom site of Jiang Shangqing in Sixian County can be built into online digital exhibition halls. Intangible historical materials such as revolutionary manuscripts, oral interviews and red ballads can be digitally archived to build a regional red resource database. Digital means break the shackles of time and space in traditional education. With the help of new media and online teaching platforms, red content can be pushed in a lightweight way, realizing "learning red resources anytime and anywhere", and greatly expanding the coverage of red education [4].

Traditional ideological and political classrooms are dominated by one-way teaching by teachers, and straightforward narration of historical facts is difficult to arouse young people's emotional resonance. With digital technology, the battlefields of the Huaihai Campaign and scenes of behind-

enemy guerrilla warfare can be restored through VR real scenes; artificial intelligence can accurately push adapted red materials combined with students' majors and learning trajectories; interactive forms such as online knowledge competitions and cloud seminars can fully mobilize classroom participation. At the same time, digital carriers facilitate interdisciplinary integration: literature majors create red digital prose, art majors produce red animations, and computer majors develop red interactive mini-programs. Diverse forms of expression eliminate the dullness of red historical texts, guide students to jump out of shallow memorization of historical facts, and achieve deep emotional identity.

Digital technology reshapes the main body and overall pattern of ideological and political education, breaks down communication barriers between colleges and universities, local cultural and tourism departments, party history venues and primary and secondary schools, and forms a two-level collaborative education structure: a school-local collaborative community is built for party history and cultural tourism departments to realize the co-construction and sharing of red resources, lecture teachers and practice bases; a holistic ideological and political course integration system is built for basic education to promote the vertical connection of ideological and political teaching in primary, secondary and tertiary schools [5]. In the past, colleges and universities and red venues independently carried out educational activities, resulting in repeated construction of resources and disconnected activities. The online sharing platform opens up channels for the interconnection of courses, teachers and practice bases. Students complete theoretical study online and carry out field study offline. Practice pictures and texts, short videos and learning logs are uploaded to the platform simultaneously for preservation, forming a complete education chain linking theoretical learning and field experience, and truly integrating knowledge and action.

Contemporary young people are native digital natives who rely heavily on short videos, online communities and cloud learning tools to obtain information, and the attractiveness of traditional paper books and offline lectures continues to weaken. Digital-intelligent empowered red teaching fits young people's cognitive habits. Immersive scenes, lightweight content and interactive tasks can activate young people's autonomous learning motivation, guide young people to understand the ideals and beliefs behind the revolutionary history of northern Anhui, and consolidate the foundation for cultivating young Marxists.

3. Realistic obstacles to the integration of red cultural resources in northern Anhui into college ideological and political theory courses under digital-intelligent technology

Digital-intelligent technology creates development opportunities for the integration of red culture in northern Anhui into ideological and political courses. However, combined with the teaching practice of local colleges and universities, there are still four prominent obstacles to the integration of the two, which restrict the release of the educational value of regional red culture.

Red cultural resources are the core educational resources for fostering virtue through education. At present, the development of red resources in colleges and universities generally suffers from insufficient depth and fragmented integration [6]. First, the excavation of red stories stays at the superficial level. Classrooms only simply list major historical facts such as the Huaihai Campaign and the Lujiamiao Battle, lacking detailed narratives of historical background, revolutionary figures' spirits, grassroots people supporting the front, and Peng Xuefeng's revolutionary course, resulting in insufficient emotional appeal. Second, the contemporary interpretation of the red spirit is absent. It fails to interpret the practical value in combination with Chinese-style modernization and the youth's mission of the times. Students only master historical knowledge and find it difficult to transform value recognition into practical responsibility. Third, the integration of red resources is fragmented.

Courses display single historical elements in isolation, failing to coordinate multiple historical materials such as revolutionary sites, red ballads and revolutionary literature and art. Students cannot systematically sort out the development context of red culture in northern Anhui, which has become the primary bottleneck for the implementation of red soul-casting education.

At present, the comprehensive digital teaching literacy of ideological and political teachers in colleges and universities has obvious shortcomings, which is difficult to meet the practical needs of digital education of red culture. On the one hand, most teachers' digital teaching only stays at the level of using basic multimedia courseware, and they lack mastery of cutting-edge digital teaching technologies such as VR virtual simulation, big data learning situation analysis and AI personalized material push. On the other hand, some teachers lack systematic research on red culture in northern Anhui, are unfamiliar with the local red context and spiritual core, and find it difficult to find the entry point for the integration of red resources and ideological and political classrooms. At the same time, red culture has multiple attributes of history, literature and art. Teachers have insufficient interdisciplinary reserves and single interpretation perspectives; some teachers stick to the traditional mode of one-way teaching, ignore students' dominant position, have weak awareness of digital innovation, and cannot vividly and contemporarily interpret the red spirit of northern Anhui.

The construction of regional red digital resources lacks unified planning. Colleges and universities, party history museums and cultural and tourism institutions have built independent online resource libraries respectively, with inconsistent platform standards and non-interoperable data. A large number of repeated shooting of former sites and recording of micro-courses cause waste of resources. Various online teaching systems are incompatible with each other, making it difficult for red historical materials and student practice files to circulate and share across schools. Platform operation and maintenance are only completed by ideological and political teachers part-time, without full-time digital operation and maintenance personnel. Historical materials are updated slowly, and teaching supporting modules such as intelligent retrieval and learning situation tracking are missing, making it difficult to give play to the aggregated educational effect of regional red resources.

The existing evaluation mechanism has three defects: the evaluation subject is limited to course teachers, and practitioners of red venues, off-campus theoretical experts and student representatives are not involved in the assessment; evaluation indicators focus on superficial quantitative indicators such as online learning duration and classroom attendance, weakening core educational achievements such as ideals and beliefs and red practice perception; evaluation methods are mainly quantitative means such as test papers and online quizzes, lacking qualitative evaluation channels such as interviews and practice text analysis, which cannot objectively evaluate the effectiveness of digital red ideological and political education, and is difficult to reversely guide the optimization of classroom teaching.

4. Innovative paths for integrating red cultural resources in northern Anhui into college ideological and political theory courses empowered by digital intelligence

In view of the above four practical obstacles, combined with the actual school-running conditions of local colleges and universities in northern Anhui, such as limited funds and shortage of digital talents, this paper constructs a feasible and sustainable collaborative optimization path from four dimensions: curriculum, teaching staff, digital platforms and comprehensive evaluation.

Relying on the integrated construction idea of holistic ideological and political courses, break the boundary between classroom teaching and social practice, and embed red resources in northern Anhui into compulsory ideological and political courses at different levels [7]. *Outline of Modern*

Chinese History adds special topics on the revolutionary development of northern Anhui; *Ideology, Morality and Rule of Law* integrates the spirit of supporting the front in the Huaihai Campaign and the narrative of Jiang Shangqing's youth responsibility; *Situation and Policy* regularly offers special topics on the local digital development of red culture. Online, promote the joint construction of a unified general database of red resources in northern Anhui by multiple regional schools, and cooperate with literature and history teachers and party history workers to develop VR virtual courses and red thematic micro-courses to restore real revolutionary scenes [8]; offline, regularly carry out study tours in red venues, rehearsal of red melodramas, and voluntary services for sorting out revolutionary historical materials, require students to upload practice insights on the resource platform, build a complete teaching chain of "online independent learning - offline field practice - online review and reflection", interpret the contemporary value of the red spirit combined with hot spots of youth growth, and build an emotional bridge between history and reality.

Colleges and universities establish a normalized layered dual-line training mechanism. Offline, organize ideological and political teachers to visit local red positions for study, and deeply study the revolutionary history and red spiritual connotation of northern Anhui; online, offer practical courses on digital teaching, systematically explain the use of VR classrooms, online interactive platforms and learning situation data analysis tools. Colleges and universities set up special teaching and research topics on red digital teaching, provide financial support, and encourage teachers to independently develop micro-courses and virtual teaching materials. Colleges and universities link local party history research institutions and digital technology enterprises to establish long-term cooperation, and reduce implementation costs through lightweight cooperation modes such as joint material construction and public welfare technical lectures; regularly invite party history experts and technical practitioners to enter schools for collective lesson preparation and special exchanges; form an interdisciplinary teaching and research team of ideological and political education, literature and history, and computer science to complete the sorting of historical materials, curriculum design and development of digital materials by division of labor, so as to make up for teachers' dual shortcomings of red text interpretation and digital teaching.

Led by local publicity and education authorities, build a unified digital resource platform for red ideological and political education in northern Anhui, and collect all red resources in the region, including images of revolutionary sites, documentary manuscripts, oral historical materials, and red literary and artistic works. The platform adds functions such as multi-dimensional retrieval, intelligent material push, online discussion, practice file retention and learning situation statistics, and is equipped with an intelligent evaluation module for learning effects. It comprehensively judges young people's learning effects combined with online tests and practice task data, providing data support for teaching optimization and youth value guidance [9]; simultaneously connect with mainstream online teaching systems in colleges and universities such as Xuexitong (Superstar Learning System), establish a long-term operation and maintenance mechanism of co-construction by schools and localities and regular updates, and completely solve the problems of platform fragmentation and resource closure.

Adhere to the orientation of fostering virtue through education, casting souls with red culture and cultivating new people of the times, build a comprehensive evaluation mechanism integrating multiple subjects, multi-dimensional indicators and multiple methods, and promote the quality and efficiency of ideological and political teaching through scientific evaluation [10]. Evaluation subjects include practitioners of red venues, student representatives, and off-campus researchers of Marxist theory; evaluation indicators weaken external forms such as the use of digital tools and online learning duration, and take students' mastery of red knowledge, changes in ideals and beliefs,

and offline practice performance as core observation dimensions; evaluation methods integrate quantitative data of online learning with qualitative research and judgment such as classroom interviews and practice text analysis, output complete evaluation feedback every semester, and dynamically adjust red teaching plans.

5. Conclusion and prospect

With the continuous implementation of the educational digitalization strategy, it provides new opportunities for the innovation of red ideological and political teaching in old revolutionary base areas of northern Anhui. The rich revolutionary relics in the region are unique local resources for local colleges and universities to carry out soul-casting education. At present, the integration of digitalization and red culture has four shortcomings: curriculum, teaching staff, platform and evaluation, which restrict the comprehensive effectiveness of ideological and political education. Building an integrated collaborative education framework based on the existing regional school-running conditions can provide referable practical schemes for the digital reform of ideological and political education in similar old revolutionary base areas in China.

Digital technology is only an auxiliary carrier of ideological and political teaching, and inheriting the red spirit is the core of ideological and political education. Digital construction must avoid the one-sided tendency of valuing technical forms while neglecting value guidance. Local colleges and universities can continuously link with party history research institutions to expand the regional red digital resource database, improve the normalized teacher training mechanism, iterate the multi-dimensional closed-loop evaluation mode, fully build the whole chain of digital-intelligent empowered red ideological and political education, activate local revolutionary narratives with digital innovation, and fully release the core function of red culture in old revolutionary base areas of fostering virtue through education.

References

- [1] Xi, J. (2022). *Hold high the great banner of socialism with Chinese characteristics and strive in unity for building a modern socialist country in all respects: Report to the 20th National Congress of the Communist Party of China*. Beijing: People's Publishing House.
- [2] Xia, Y., & Chen, Z. (2024). Three dimensions of integrating local red cultural resources into the teaching of ideological and political courses in colleges and universities. *School Party Building and Ideological Education*(24), 66-68.
- [3] Xi, J. (2024, July 22). Decision of the Central Committee of the Communist Party of China on further comprehensively deepening reforms and advancing Chinese-style modernization. *People's Daily*.
- [4] Hu, Z. (2025). Practical exploration of red cultural resources empowering ideological and political theory courses in colleges and universities. *Theory and Practice of Education*(21), 45-49.
- [5] Wu, H., & Chen, D. (2023). Logic, dilemma and path of digital empowerment for the construction of "holistic ideological and political courses". *Ideological and Political Education Research*(5), 89-93.
- [6] Li, G. (2025). A brief discussion on promoting red culture to cast souls and educate people in colleges and universities in the new era. *School Party Building and Ideological Education*(3), 55-57.
- [7] Zhang, L. (2024). Constructing a collaborative education system of "holistic ideological and political courses" for forging a strong sense of community for the Chinese nation. *Journal of Ningxia University (Social Science Edition)* (4), 1-3.
- [8] Zhang, L., Zhang, T., & Lü, K. (2024). Research on the value and path of integrating Hebei red cultural resources into the teaching of ideological and political courses in colleges and universities. *Journal of North China University of Science and Technology (Social Science Edition)*(1), 66-71.
- [9] Hou, Y. (2025). Research on youth cognitive adaptation path of red resources integrating into ideological and political courses in colleges and universities driven by digital-intelligent technology. *Youth of the Times*(25), 47-49.

- [10] Wen, M. (2024, November 19). Research on the significance and innovative path of integrating red cultural resources into ideological and political courses in colleges and universities. *China Culture Daily*, p. 003.