

Evaluation on the Cultivation of Applied Talents in Local Undergraduate Art Colleges under the Background of Digitalization

Guang Lu*

Inner Mongolia Academy of Arts, Hohhot, Inner Mongolia, 010000, China

*Corresponding author

Abstract: *The cultivation of talents with practical skills at the undergraduate level in the local area art colleges under the background of digitalization is one of the hot topics of academic and social concern. The purpose of this study is to investigate the current situation and problems in the cultivation of talents with practical skills at the undergraduate level in the local area art colleges, and to provide data support for the cultivation of applied talents. The survey adopts a questionnaire survey method, covering multiple local undergraduate art colleges, with a sample size of 350 people. The results show that 92% of respondents believe that cultivating moral character is an important aspect of cultivating applied talents, while over 70% of respondents believe that cultivating technical practical abilities and broadening and deepening knowledge are the core contents of cultivating applied talents. This study provides relevant suggestions for the cultivation of talents with practical skills at the undergraduate level in the local area art colleges under the digital background, and provides a data foundation for further research.*

Keywords: *Digital Era, Applied Talents, Local Undergraduate Art Colleges, Innovation in Training Mode*

1. Introduction

With the arrival of the digital era, more and more art talents are turning to the field of digital art and innovation, because digital technology provides great convenience and innovation possibilities for art creation [1-2]. In this trend, many local undergraduate art colleges are also paying attention to how to cultivate applied digital talents to adapt to changes in the times and market demands. However, there is still a need for in-depth research and exploration in the cultivation mode of applied talents in the digital era in local undergraduate art colleges [3-4]. Compared to the traditional pure art creation training mode, applied talents in the digital context need to possess richer subject knowledge and skills in order to better complete digital art creation and design. Therefore, how to comprehensively promote the cultivation of applied talents in curriculum design, teaching methods, and faculty construction is an important issue faced by local undergraduate art colleges in the digital era [5].

In recent years, many scholars and experts have conducted research on the cultivation of talents with practical skills at the undergraduate level in the local area art colleges. Among them, Lee G proposed that virtual reality art education is a new form of education that utilizes virtual reality technology to provide students with a more vivid, rich, intuitive, and interactive learning environment. It can break the time and space limitations in traditional art teaching and promote students to better understand and comprehend art knowledge and skills [6]. Kopeck á K explained that the advent of the digital age has provided more and broader opportunities for cooperation among higher education institutions. Educational institutions can leverage digital platforms and technologies to expand their influence and visibility, while also gaining more resources and opportunities through partners [7]. The innovative model of digital interactive education is based on new technologies, and Price M adopted online teaching methods to achieve the goals of knowledge sharing, interactive learning, and resource sharing. It is a hot and trendy development in the current education field. The core characteristics of this model are adaptive teaching, personalized learning, and interactive teaching [8].

This article aims to explore the key issues and development trends of applied talent cultivation in local undergraduate art colleges under the digital background. Through empirical research, case analysis, and other methods, it deeply explores the important significance of applied talent cultivation,

innovation and promotion of training models, and provides reference and reference for digital talent cultivation in local undergraduate art colleges.

2. Evaluation of the Current Situation of Applied Talent Cultivation in Local Undergraduate Art Colleges under the Digital Background

2.1 Definition and Characteristics of Applied Talent Training in Local Undergraduate Art Colleges

The cultivation of talents with practical skills at the undergraduate level in the local area art colleges refers to the cultivation of applied talents with practical and innovative abilities that meet the current needs of social art creation and cultural industry development in accordance with social and industry requirements, combined with educational and teaching practical experience and job market demand, as shown in Figure 1 [9-10]:

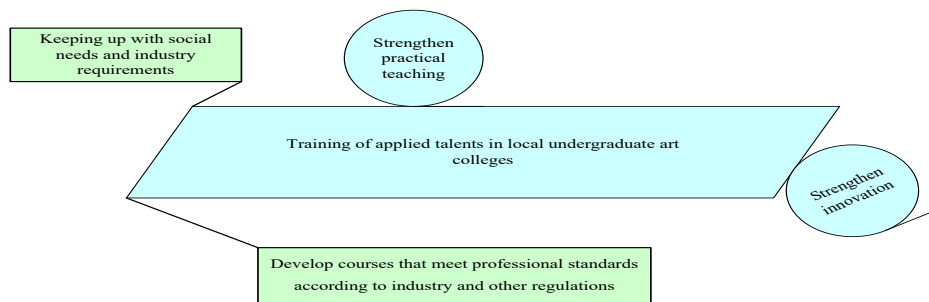


Figure 1: Characteristics of Applied Talent Training in Local Undergraduate Art Colleges

As shown in Figure 1, the characteristics of this type of cultivation mainly include the following four aspects:

1) It is necessary to keep up with social needs and industry requirements, and pay attention to industry development trends [11-12].

To cultivate applied talents that adapt to the current society, it is necessary to comply with social needs and industry trends, closely monitor industry development, adjust teaching direction and content, reasonably allocate subject time and content proportion, and enable students to acquire more practical skills and innovative abilities.

2) It is necessary to strengthen practical teaching and improve students' application abilities [13-14].

The most important feature of applied talent cultivation is practical teaching. Local undergraduate art colleges not only focus on imparting students' knowledge, but also on cultivating students' practical abilities and skills. They strengthen practical teaching, such as offering practical courses, internship projects, industry cooperation, etc., to enhance students' innovative practical ability to integrate and utilize various art forms, and to provide students with a deeper understanding of practical application scenarios.

3) It is necessary to strengthen the cultivation of innovative and practical talents, and pay attention to the cultivation of talent creativity and collaborative ability. By implementing strategies such as curriculum restructuring and teaching method upgrading, people aim to synergistically cultivate students' innovative thinking and practical skills [15-16].

4) It is necessary to develop courses, practices, and practical simulations that meet professional standards in accordance with industry regulations, to create high-quality works and enhance students' overall quality. In the talent market of this major, the professional quality and good practical experience of graduates are crucial.

In short, the cultivation of talents with practical skills at the undergraduate level in the local area art colleges deeply implements the educational philosophy of putting practice first, applying skills as the main line, and emphasizing innovation and guidance, providing high-quality, high-level, specialized, and diversified teaching services, and doing a good job in basic work to adapt to career development, enhance comprehensive quality, and cultivate practical work abilities [17-18].

2.2 Education Theory in the Digital Background

In the context of digitalization, education needs to deeply understand and grasp the significance of change and innovation, better implement educational concepts and teaching methods, and cultivate talents in the digital era. In the context of digitalization, education emphasizes learner centered teaching, emphasizing personalization, customization, and contextualization of education. It is necessary to better utilize digital technology to provide students with more opportunities for autonomous learning and interactive practice.

In the context of digitalization, the cultivation of talents with practical skills at the undergraduate level in the local area art colleges needs to pay attention to the guidance of educational theory in the context of digitalization. Digital technology has provided more beneficial support and assistance for modern art education, such as virtual reality technology and augmented reality technology, which can change the traditional way of art education and enhance students' creative and expressive space. Mobile internet technology can move learning scenarios from classrooms to broader social and cultural fields. In addition, teaching in the digital context also needs to pay attention to teaching content and the synergy between teaching and learning, emphasizing practice and exploration. The main fields of educational theory in the digital context are shown in Figure 2:

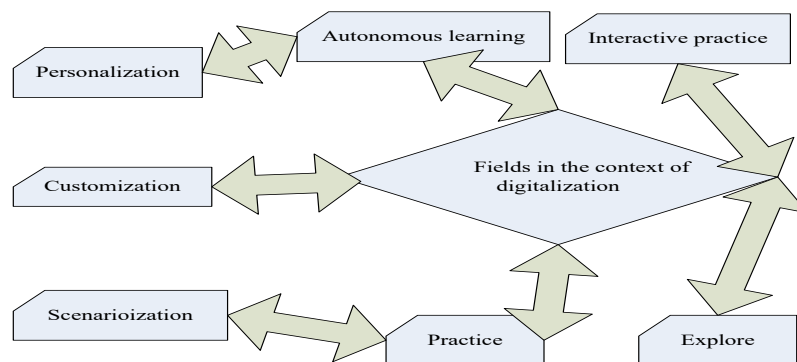


Figure 2: Domains in the Digital Context

2.3 Theoretical Basis for Cultivating Applied Talents in Art Colleges

The theoretical basis for the cultivation of applied talents in art colleges mainly includes theories related to art education, applied talent cultivation, and innovative education. Among them, art education is an innovative form of education that inherits artistic traditions, such as creative design and digital media. The cultivation of applied talents focuses more on the cultivation of students' practical and technical abilities, emphasizing their professional and practical skills to meet the needs of society. Innovation education emphasizes the cultivation of innovative thinking, methods, and spirit, enabling students to have the ability to face future uncertainty and complexity [19-20].

The theoretical basis for cultivating applied talents in art colleges provides guidance for local undergraduate art colleges to cultivate applied talents in the digital context. The theory of applied talent cultivation and innovative education focuses on cultivating students' practical and innovative abilities, which meets the needs of society in the digital context. At the same time, the theory of art education can also provide reference and inspiration for practical teaching in art colleges. Therefore, the cultivation of talents with practical skills at the undergraduate level in the local area art colleges needs to focus on inheriting artistic traditions, cultivating students' practical and technical abilities, and emphasizing innovative education and the synergy between teaching and learning.

In short, in the context of digitalization, the cultivation of talents with practical skills at the undergraduate level in the local area art colleges needs to be based on the current situation, and deeply understand and grasp the theory of applied talent cultivation, education theory in the context of digitalization, and the theoretical foundation of applied talent cultivation in art colleges. With this as guidance, people can construct an education system and mode that meets the development requirements of the digital era, and better innovate the traditional methods of art education, and improve the quality and level of applied talent cultivation.

3. Questionnaire Evaluation Experiment on the Cultivation of Talents with practical skills at the undergraduate level in the local area Art Colleges under the Digital Background

3.1 Questionnaire Evaluation Design

In the context of the digital era, local undergraduate art colleges need to cultivate applied talents to meet the needs of the market and society. Under this premise, in order to better investigate the current situation and problems of applied talent cultivation in local undergraduate art colleges, a questionnaire survey experiment was designed.

This questionnaire survey is divided into three parts. The first part mainly aims to understand the respondents' personal basic information and their exposure to digital technology. The second part would conduct an in-depth survey on the respondents' views and expectations on the cultivation of applied talents, as well as their identification with the cultivation of applied talents in schools. The third part is to collect the respondents' learning and feelings about digital technology, as well as the improvement of their practical abilities. According to the content of the questionnaire, this survey would be conducted in the form of multiple choice questions, single choice questions and question and answer questions [21].

3.2 Questionnaire Distribution and Collection

In order to complete the questionnaire survey, questionnaires would be distributed within the local undergraduate art colleges. Before distributing the questionnaire, consent would be obtained from the head of the institution, stating the purpose of this survey and ensuring the confidentiality of the questionnaire information. Through on-site distribution and online filling, people would strive to obtain as many effective questionnaires as possible.

After the questionnaire survey, data cleaning and organization work would be carried out. Based on the questionnaire situation, effective data would be screened and analyzed. The organization and statistics of data would be processed using SPSS software, including descriptive statistics, t-tests, analysis of variance, and other statistical methods.

3.3 Statistical Data Results

According to the results of the questionnaire survey, Table 1 shows the respondents' exposure to digital technology, and Figure 3 shows their views and expectations on various aspects of applied talent cultivation:

Table 1: Respondents' Exposure to Digital Technology

total	Contact time less than 1 year	Exposure time 1-3 years	Exposure time 3-5 years	Contact time greater than 5 years
Number of people	30	40	15	15
Proportion (%)	25.00%	33.33%	12.50%	12.50%

Table 1 shows the respondents' exposure to digital technology in the survey. Among them, 30 people (25%) had contact time less than 1 year; 40 people (33.33%) had contact time between 1-3 years; 15 people (12.5%) had contact time between 3-5 years; 15 people (12.5%) had contact time greater than 5 years. The significance of the table is to help understand the distribution of respondents' exposure to digital technology, and further provide a basis for solving the problem of cultivating application-oriented talents in local undergraduate art colleges [22].

Figure 3 shows the opinions and expectations of the respondents participating in the survey on various aspects of applied talent cultivation. The important and unimportant values in Figure 3 respectively indicate the degree to which the respondents participating in the survey attach importance to the cultivation of applied talents, which is reflected in their emphasis on moral character cultivation, technical practice ability cultivation, and knowledge broadening and deepening. From the results of the table, it can be seen that over 60% of respondents believe that cultivating moral character and technical practical ability is the key to cultivating applied talents, while over 70% of respondents believe that it is important or important to broaden and deepen their knowledge. These data has certain reference value for the decision-making of local undergraduate art colleges to cultivate applied talents.

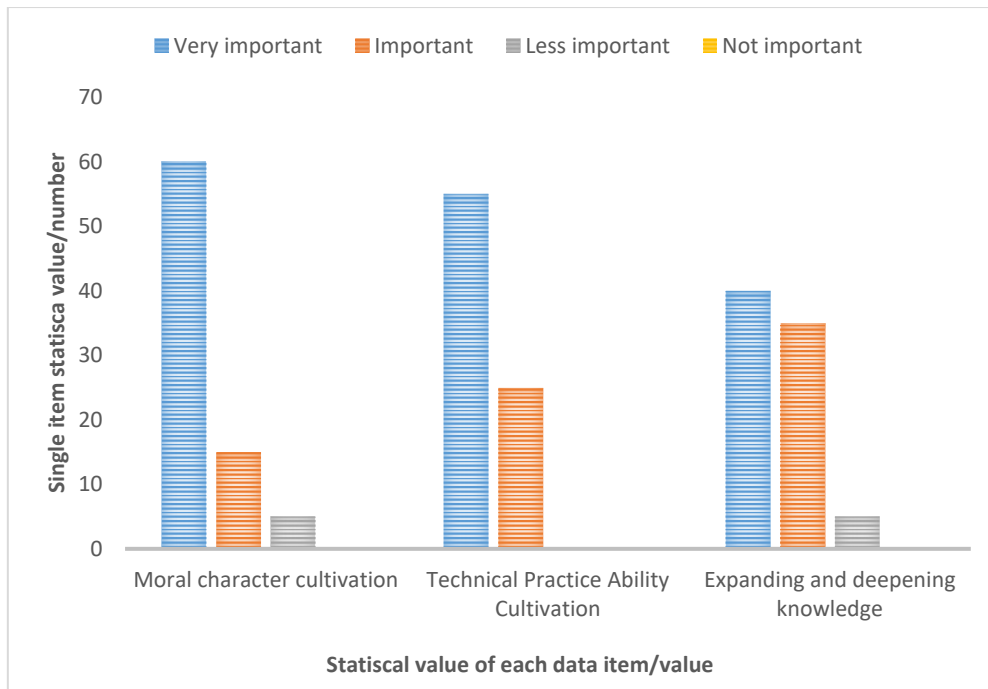


Figure 3: Respondents' Opinions and Expectations on the Cultivation of Applied Talents

4. Results and Discussion on the Cultivation of Talents with practical skills at the undergraduate level in the local area Art Colleges under the Digital Background

4.1 Current Situation of Applied Talent Training in Local Undergraduate Art Colleges under the Background of Digitalization

In the context of digitalization, the cultivation of talents with practical skills at the undergraduate level in the local area art colleges faces many challenges and opportunities. In recent years, both national policies and market demand have been driving the transformation of local undergraduate art colleges towards applied talent cultivation. However, facing the huge market demand and increasingly fierce competition, local undergraduate art colleges still have many problems in cultivating applied talents.

Firstly, the teaching philosophy of some local undergraduate art colleges is still relatively traditional, emphasizing theoretical knowledge in the art field and cultivating academic talents, with less emphasis on practice and innovation. Secondly, due to the advent of the digital age, many art industries have undergone significant changes. However, the teaching content and methods of undergraduate art colleges in many places are still in the traditional stage and cannot adapt to the new needs of the times. Finally, due to the limitations of teaching facilities, technology, and resources in local undergraduate art colleges, some excellent applied talents often need to further their studies at prestigious universities in big cities, leading to the loss of local talents.

4.2 Evaluation and Results of Applied Talent Training in Local Undergraduate Art Colleges under the Digital Background

In response to the above issues, local undergraduate art colleges need to continuously adjust their teaching content, enhance teaching quality, focus on practical innovation, deeply understand the needs of enterprises, strengthen cooperation between industries and schools, and cultivate applied talents that are in line with the market.

Firstly, local undergraduate art colleges and universities need to focus on practical teaching, breaking down disciplinary divisions in the teaching process, adjusting teachers' teaching methods and content to a certain extent, and emphasizing practical innovation. Secondly, local undergraduate art colleges need to have close contact with enterprises and industries, and with the help and guidance of enterprises, offer relevant physical courses to enable students to quickly integrate into corporate life

and cultivate applied talents. Finally, it is necessary to improve the software and hardware facilities of local undergraduate art colleges, strengthen the construction of teaching staff, provide students with a comprehensive teaching environment and resources, and attract more outstanding talents to come to the school, as shown in Figure 4:

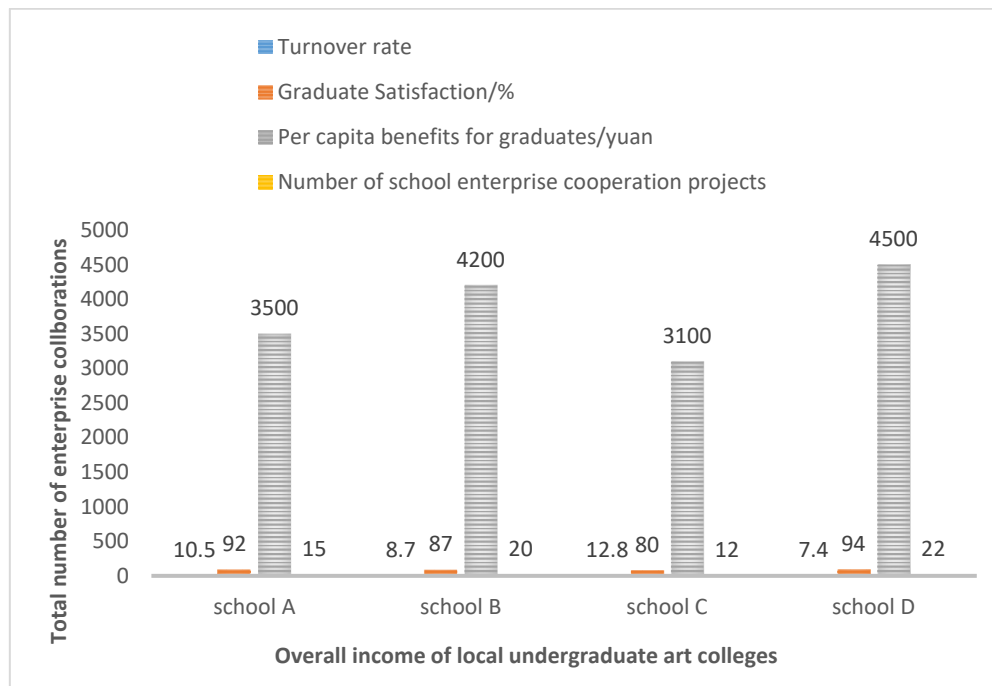


Figure 4: Application-oriented Talent Cultivation in Local Undergraduate Art Colleges under the Digital Background

As shown in Figure 4, it can be seen that the four local undergraduate art colleges have different performances in cultivating applied talents. Firstly, in terms of the turnover rate of applied talents, School D performed the best at only 7.4%, while School C performed the worst at 12.8%. Secondly, in terms of graduate satisfaction, School A achieved a high score of 92%, which is the highest among the four universities, while C school's satisfaction is only 80%. Once again, in terms of per capita treatment for graduates, School D performed the best, reaching 4500 yuan, while School C had the worst performance, only reaching 3100 yuan. Finally, in terms of the number of school enterprise cooperation projects, School B and School D both have 20 and 22, leading the other two universities.

4.3 Strategies for Cultivating Talents with practical skills at the undergraduate level in the local area Art Colleges under the Digital Background

In order to better address the issue of cultivating application-oriented talents in local undergraduate art colleges under the digital background, universities can improve from the following aspects:

- 1) There is a need to focus on practical teaching, break the division of disciplines, and cultivate students' practical and innovative abilities.
- 2) There is a need to strengthen cooperation between industries and schools, and establish more school enterprise cooperation projects with enterprises, so that students can quickly enter the working environment of enterprises, utilize the resources of enterprises, and truly master the skills and knowledge of applied talents.
- 3) There is a need to improve the software and hardware facilities of local undergraduate art colleges, improve teaching resources and teaching staff, and provide students with a better teaching environment.
- 4) It is necessary to conduct market analysis, understand the needs of various industries, adjust teaching content and methods, and provide students with more market-oriented education.

Finally, local undergraduate art colleges and universities should be data-driven, analyze problems, think about solutions, and continuously evaluate and optimize the results of applied talent cultivation, in order to provide more outstanding talents for society.

5. Conclusions

In the context of digitalization, the cultivation of talents with practical skills at the undergraduate level in the local area art colleges faces many challenges, but some progress has also been made. The data analyzed indicates that these universities have made significant improvements in practical teaching, internship programs, and industry cooperation. In order to further promote the cultivation of talents with practical skills at the undergraduate level in the local area art colleges, while also meeting the needs of the market and personal development requirements, schools should strengthen teacher construction, curriculum design, and practical links, and engage in extensive industry university research cooperation to improve students' practical application ability and industry competitiveness.

References

- [1] Chen P, Li S. *New Challenges and Opportunities for the Cultivation of Applied Talents in Art Colleges. Higher Education Research in Areas of Nationalities*, 2019, 5(5):57-60.
- [2] Ling W, Oinas-Kukkonen H. *Persuasive systems design: Key issues, process model, and system features. Communications of the ACM*, 2020, 63(6):58-67.
- [3] Krull G. *Education 3.0: A new era for digital learning? Journal of Distance Education*, 2020, 34(2):14-25.
- [4] Huang X, Zhang K. *The application of multimedia technology in the teaching of painting in Art and Design Majors. Journal of Kaifeng University*, 2020, 41(2):85-87.
- [5] Yuan J, Han X. *Exploration and Practice of Digital Art Design Teaching in Local Undergraduate Colleges. Journal of Communication and Computer*, 2021, 18(5): 122-126.
- [6] Li G, Lin H. *Conceptual Framework of Virtual Reality-based Art Education for Art Majors in Universities of Taiwan. Journal of International Education Research*, 2021, 17(1):55-64.
- [7] Kopecká K, Jiroutová K. "DigiArt"—an Innovative Model of Digital Interactive Education in the Arts. *Pedagogical Research*, 2022, 7(1):1-10.
- [8] Price M, Goldsmith D. *Creating higher education partnerships in the digital age: A case study. Journal of Higher Education Outreach and Engagement*, 2020, 24(1):23-30.
- [9] Twigg C A. *Culture, Technology and Creativity: A Study of Digital Art and Design. International Journal of Education and Development using Information and Communication Technology*, 2020, 16(3): 23-35.
- [10] Honeycutt S, Sindelar P T. *The Role of Education Policy in Developing Digital Citizenship Skills. The Clearing House: A Journal of Educational Strategies, Issues and Ideas*, 2023, 96(2):75-82.
- [11] Li Y, Ma C, Zhao Y. *Study on Innovative Talents Cultivation Mode of Digital Arts Major. Journal of Shandong University of Arts*, 2020, 42(1): 118-124.
- [12] Hanna R, Barber C. *Digital Technologies, Creative Arts and the Curriculum. International Journal of Technology and Design Education*, 2023, 33(2): 401-417.
- [13] Wang X, Xu X. *Digitalization Trend of Art Design Education in Local Colleges. Journal of Art and Design Education*, 2019, 36(2): 54-57.
- [14] Feng J, Li X, Zhang Y. *Exploring a Practical Model of Digital Arts Based on Industry-Academia Collaboration. International Journal of Emerging Technologies in Learning*, 2022, 17(8): 15-29.
- [15] Zhang Y, Huang L. *Research on the Integration of Digital Technology and Traditional Art in Local Undergraduate Colleges. Mobile Networks and Applications*, 2022, 27(6): 1754-1761.
- [16] Sun X, Wei H. *Exploration and Practice of Digital Art Design Teaching in Local Undergraduate Colleges. Art Science & Education*, 2021, 1(1): 27-31.
- [17] Chen L, Sun Y. *Problems and Countermeasures in the Cultivation of Applied Talents in Art and Design Majors under the Background of Online Distance Education. Journal of Distance Education*, 2021, 39(3):113-120.
- [18] Wang J, Guo Q. *Exploration of Innovative Teaching Mode for Digital Art Design Specialty. Education and Teaching Forum*, 2019, 3(32):72-73.
- [19] Lv G, Zhang M. *Research on the Curriculum System and Teaching Reform in Digital Art Design Major. Frontiers of Education in China*, 2021, 16(1): 134-140.
- [20] Lewis J, Boud D. *Developing graduate capabilities in a digital age: Future challenges for universities. Higher Education Research & Development*, 2019, 38(3): 14-15
- [21] Frey Davide. *Talent Quality of Postgraduates in Ship and Ocean Engineering Relying on Improved Random Forest Algorithm. Frontiers in Ocean Engineering (2021), Vol. 2, Issue 3: 21-28.*
- [22] Li F., Wang C., Yue X. (2022). *Impact of Doctoral Student Training Process Fit on Doctoral Students' Mental Health. International Journal of Mental Health Promotion*, 24(2), 169–187.