

THE TEACHING MANAGEMENT OF ENVIRONMENTAL DESIGN MAJOR AT
THE UNDERGRADUATE LEVEL OF SHENYANG CITY
UNIVERSITY IN SHENYANG CHINA

การจัดการเรียนการสอน วิชาเอกการออกแบบสิ่งแวดล้อมระดับปริญญาตรี
ของเมืองเสิ่นหยาง มหาวิทยาลัยในเสิ่นหยาง ประเทศจีน

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ABSTRACT

The objectives of this research were: 1) To study the problems of the teaching management mode of environmental design at the undergraduate level of Shenyang City University; 2) To compare the teaching management mode of the environmental design major of LuXun Academy of Fine Arts and Shenyang City University; and (3) To develop the teaching management mode of the environmental design major at the undergraduate level of Shenyang City University.

The research was a mixed methodology research consists of quantitative research and qualitative research. Population was students majoring in environmental design at the undergraduate level of Shenyang City University and LuXun Academy of Fine Arts, totaling 252 students. The sample size was determined by more than 95% of the population, obtained by simple random sampling method, totaling 243 students perceptively The key informants were teachers of environmental design major at the undergraduate level of Shenyang City University, industry experts, and employers, obtained by purposive sampling method. The instruments used for data collection were questionnaire, and interview records. The statistics used for data analysis were percentage, mean, variance, and t-test.

The research findings revealed that: 1) There were a series of problems in the teaching mode of environmental design major in Shenyang City University, such as "lack of cultivating students' innovative thinking, lack of cognition of the importance of architecture, weak basic teaching, lack of practical teaching, and inadequate utilization of teaching resources"; 2) In the teaching mode of environmental design major of LuXun Academy of Fine Arts, "basic teaching and professional integration, organic integration of supporting disciplines, good architectural foundation, and many practical courses" were worthy of Shenyang City University's reference; and 3) Based on the interdisciplinary systems engineering and modularization theory, the researchers established a new environmental design teaching model for Shenyang City University. And based on this new model, a macroscopic environmental design teaching evaluation system was established.

Keywords: The Teaching Management of Environmental Design Major, Shenyang City University

บทคัดย่อ

การวิจัยครั้งนี้มีวัตถุประสงค์เพื่อ 1) ศึกษาปัญหาอุปสรรคในการจัดการเรียนการสอนวิชาการออกแบบสิ่งแวดล้อมระดับปริญญาตรีของมหาวิทยาลัยเมืองเสิ่นหยาง 2) เปรียบเทียบรูปแบบการจัดการเรียนการสอนของวิชาเอกการออกแบบสิ่งแวดล้อมของวิทยาลัยจิตรศิลป์ หลู่ ซุ่น และมหาวิทยาลัยในเสิ่นหยาง และ 3) พัฒนารูปแบบการจัดการเรียนการสอนวิชาเอกการออกแบบสิ่งแวดล้อมในระดับปริญญาตรีของมหาวิทยาลัยเมืองเสิ่นหยาง

การวิจัยเป็นการวิจัยแบบผสมผสานประกอบด้วยการวิจัยเชิงปริมาณและการวิจัยเชิงคุณภาพ ประชากรคือนักศึกษาวิชาเอกการออกแบบสิ่งแวดล้อมในระดับปริญญาตรีของมหาวิทยาลัย เมืองเสิ่นหยาง และวิทยาลัยจิตรศิลป์ หลู่ ซุ่น รวมนักศึกษา 252 คน หาขนาดของกลุ่มตัวอย่างมากกว่าร้อยละ 95 ของประชากร โดยวิธีการสุ่มอย่างง่าย จำนวนนักเรียน 243 คน ผู้ให้ข้อมูลสำคัญคืออาจารย์วิชาเอกการออกแบบสิ่งแวดล้อมในระดับปริญญาตรีของมหาวิทยาลัยเมืองเสิ่นหยาง ผู้เชี่ยวชาญในอุตสาหกรรม และนายจ้าง ซึ่งได้มาโดยวิธีการสุ่มตัวอย่างแบบเจาะจง เครื่องมือที่ใช้ในการเก็บรวบรวมข้อมูล ได้แก่ แบบสอบถาม แบบบันทึกการสัมภาษณ์ สถิติที่ใช้ในการวิเคราะห์ข้อมูล ได้แก่ ร้อยละ ค่าเฉลี่ย ความแปรปรวน และการทดสอบค่าที

ผลการวิจัยพบว่า 1) มีปัญหาหลายประการในโหมดการสอนวิชาเอกการออกแบบสิ่งแวดล้อมในมหาวิทยาลัยในเสิ่นหยาง เช่น "การขาดการปลูกฝังความคิดเชิงนวัตกรรมของนักศึกษา การขาดความรู้ความเข้าใจในสำคัญของสถาปัตยกรรม การสอนพื้นฐานที่อ่อนแอ, ขาดการสอนภาคปฏิบัติ และการใช้ทรัพยากรการสอนไม่เพียงพอ" 2) ในโหมดการสอนวิชาเอกการออกแบบสิ่งแวดล้อมของวิทยาลัยจิตร

ศิลป์ หลู่ ชุ่น "การสอนพื้นฐานและการบูรณาการทางวิชาชีพ การรวมสาขาวิชาที่สนับสนุนเข้าด้วยกัน พื้นฐานทางสถาปัตยกรรมที่ดีและหลักสูตรภาคปฏิบัติมากมาย" มีค่าสำหรับการอ้างอิงของมหาวิทยาลัย เมืองเสียนหยาง และ 3) จากทฤษฎีวิศกรรมระบบแบบสหวิทยาการและทฤษฎีการทำให้เป็นโมดูล นักวิจัย ได้สร้างรูปแบบการสอนการออกแบบสิ่งแวดล้อมใหม่สำหรับมหาวิทยาลัยในเสียนหยาง และจากโมเดลใหม่นี้ ระบบการประเมินการสอนการออกแบบสิ่งแวดล้อมระดับมหภาคได้ถูกสร้างขึ้น

คำสำคัญ: การจัดการเรียนการสอนวิชาเอกการออกแบบสิ่งแวดล้อม, มหาวิทยาลัยเมืองเสียนหยาง

Introduction

The teaching mode and research method of Chinese environmental design are imported from the West. Internationally, environmental design research began in the early 20th century. They believe that "at the beginning of design, the building is obliged to observe the changes of the environment at all times, live in harmony with the environment, and have the obligation to minimize the negative impact on the occupants. And meet the individual needs of the human beings living in it." (Christopher Day, 1990: 15-16) In China, "environmental design" evolved from "interior design". China's interior design profession began in 1957, when the Central Academy of Arts and Crafts established China's first "Department of Interior Decoration". After entering the 1980s, due to the reform of the social and economic system, the original concept of interior design education is far from meeting the market demand, and the connotation and pattern of China's interior design education have undergone great changes. In its place is a professional concept that integrates interior design, landscape design and architectural design - environmental design education. "The Department of Environmental Art and Design of the Academy of Arts and Design of Tsinghua University is the first teaching unit in China to offer the major of environmental design." (<https://www.ad.tsinghua.edu.cn/jgsz/xssz/hjyssjx.htm>, 2016) Since then, the Central Academy of Arts and Crafts, Tongji University, and Chongqing Institute of Architecture and Engineering have successively become pilots for environmental design. As the Ministry of Education set the environmental design major as a second-level discipline of "design art", the major became a popular domestic design discipline at that time. "According to the data provided by the National Bureau of Statistics, since 2001, the proportion of China's urban population has reached a height of 51.27%. At the same time, according to the data of six consecutive censuses, the urban population data has a significant increasing gradient: 12.84% (1953),

17.58% (1961), 20.43% (1982), 25.84% (1990), 35.39% (2000), 49.68% (2010)." (<http://www.stats.gov.cn/tjsj/pcsj/rkpc/6rp/indexch.htm>, 2016) Such huge population growth has naturally brought about the rapid development of related disciplines such as architecture, civil engineering, and municipal management, which are indispensable to human life. Environmental design is a discipline that explores how people and buildings, and the environment can coexist in harmony. Only by promoting the rapid construction of environmental design disciplines can related industries such as interior, architecture, and urban planning develop rapidly. Complementing each other is that the development of environmental design education can also significantly improve the spiritual image of the city.

As a new discipline, environmental design is developing rapidly under the impetus of the market. Due to the rapid development, the status quo is that problems and achievements coexist. As a highly practical discipline, its market positioning is very clear. This clear market positioning will not cause major changes due to different professional institutions and academic backgrounds that environmental design majors rely on. How to integrate under the market background, conduct in-depth investigation and research from the environmental design education system itself, and establish a more complete and reasonable environmental design teaching management model, this is one of the meanings of my research on this topic. The researchers in this paper will take Shenyang City University in Shenyang, China as an example, combine the development status of environmental design teaching models in other Chinese universities and the difficulties and priorities of environmental design majors, and study the major changes and challenges that environmental design education faces due to the development of the times. Such as the renewal of educational concepts, the transformation of models, and the reconstruction of systems. It is hoped that the teaching problem of environmental design major in Shenyang City University can be solved. To provide Shenyang City University with a feasible, inclusive, characteristic, stable and extensible teaching management model, and to promote the balanced and sustainable development of environmental design teaching. To achieve the purpose of "letting students directly face real and complex problems, conduct design research with comprehensive and interdisciplinary thinking, and use various knowledge, methods and skills to solve related problems through continuous exploration." (Rita C Richey, 2017). Therefore, through environmental design education to cultivate environmental design talents, to make China's urban image shine.

The research of this paper stems from the confusion and reflection on the problems existing in the teaching mode of environmental design major at the undergraduate stage of Shenyang City University. Shenyang City University is in Shenyang City, Liaoning Province, China, in the Northeast region. In recent years, with the rapid development of modernization in Northeast China, the optimization and protection of the environment has become a hot issue of people's attention. Therefore, the society's demand for environmental design professionals and compound talents is more and more urgent, and the requirements are getting higher and higher. Correspondingly, the teaching theory system of Shenyang City University urgently needs to be improved and reformed along with the social changes. Compared with other universities in China, the teaching mode of environmental design major in Shenyang City University is not mature enough, the curriculum design and practical experience are insufficient, and the professional discipline education is still in its infancy. Although the environmental design major offered by Shenyang City University has now become the key discipline of the school. However, how to learn from the advanced teaching concepts of other universities, realize the high adaptability and high-quality development of the discipline, and train high-quality design practitioners to meet the needs of the rapid development of environmental design in China and the construction of social-related industries. This is the direction I need to explore and think about.

According to CNKI's literature search, the researchers found that Shenyang City University has relatively few academic papers with "environmental design" such as "interior", "public art", "landscape", "garden" as key words. Environmental design is a new discipline full of vitality and continuous improvement. Whether in developed countries or in China, environmental design education is constantly innovating and developing. Discussing the localization reform of environmental design education has important practical significance in the field of environmental design. Therefore, the researchers hope that through this paper, based on interpreting the cognition and achievements of predecessors in the region, combined with the perspective of my own learning courses and teaching theories, to carry out research on the teaching management model of environmental design majors, to establish a new teaching mode. At the micro level, the researchers hope that this model can provide specific reference for the imperfect and immature professional teaching of Shenyang City University. It makes the setting and configuration of its professional teaching structure more reasonable, reduces the waste of manpower and material resources, saves educational

resources, and improves teaching efficiency. In order to cultivate environmental design talents who keep pace with the times and adapt to the needs of the market. At the macro level, the researchers hope that this model can be used as a methodological reference for environmental design professional teaching, a kind of epistemological enlightenment, and a specific feasibility test.

Research Objectives

1. To study the problems of the teaching management mode of environmental design at the undergraduate level of Shenyang City University
2. To compare the teaching management mode of the environmental design major of LuXun Academy of Fine Arts and Shenyang City University
3. To develop the teaching management mode of the environmental design major at the undergraduate level of Shenyang City University

Research Hypothesis

Teaching objectives, teaching content, teaching system, teaching implementation, and teaching evaluation have an impact on the teaching mode of the environmental design major of Shenyang City University.

Conceptual Framework

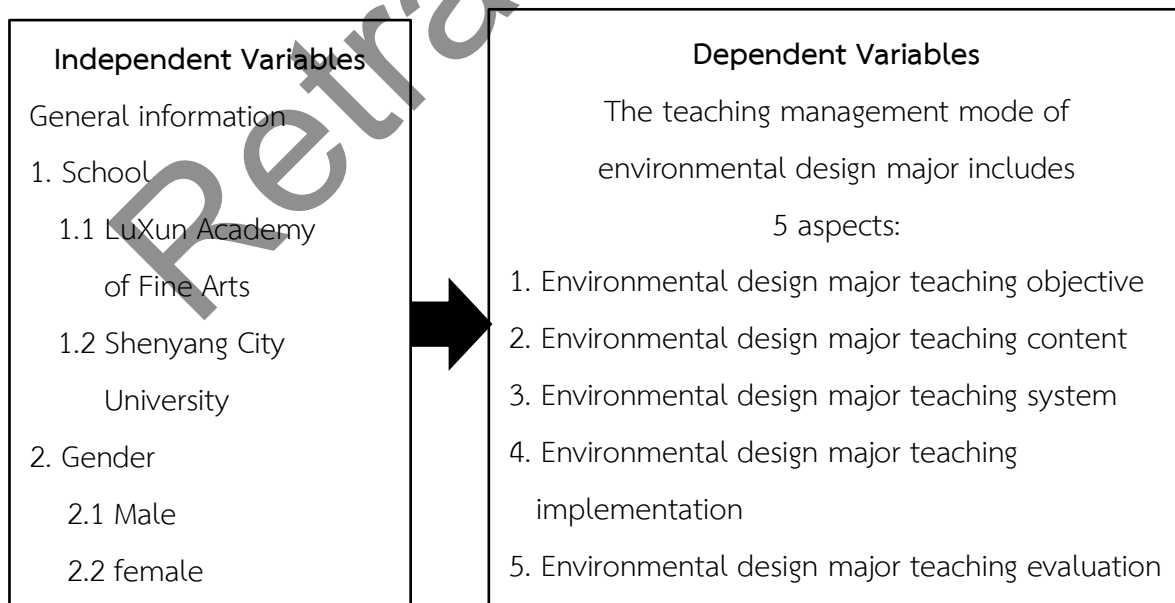


Figure 1: Conceptual Framework

Research Methodology

Population was students majoring in environmental design at the undergraduate level of Shenyang City University and LuXun Academy of Fine Arts, totalling 252 students. The sample size was determined by more than 95 % of the population, obtained by simple random sampling method, totalling 243 students. The key informants were teachers of environmental design major at the undergraduate level of Shenyang City University, industry experts, and employers, obtained by purposive sampling method. The instruments used for data collection were questionnaire, and interview records. The statistics used for data analysis were percentage, mean, variance, and t-test.

Population		Sample
The students of environmental design major at the undergraduate level of LuXun Academy of Fine Arts	144	139
The students of environmental design major at the undergraduate level of Shenyang City University	108	104
Total	252	243

Figure 2: (Objectives 1 and 2) Population and sample

Population		Sample
Teachers of environmental design major at the undergraduate level of Shenyang City University	16	3
Industry experts	2	2
Employers	2	2
Total	20	7

Figure 3: (Objectives 3) Population and sample

Role	Name	Educational Background	Work Experience	School/ Company	Position
Teacher	Wang Song	Master	8 Years	Shenyang City University	School of Architecture and Civil Engineering,

Role	Name	Educational Background	Work Experience	School/ Company	Position
					Director of School Office
	Zhang Bo	Master	6 Years		School of Architecture and Civil Engineering, Environmental Design Major, Lecturer
	Liu Xu	Master	6 Years		School of Architecture and Civil Engineering, Environmental Design Major, Lecturer
Expert	Zhao Chunyan	Doctor	18 Years	LuXun Academy of Fine Arts	School of Architecture Design and Art, Professor
	Kang Jing	Master	12 Years	Shenyang City University	BIM Center, Director
Employer	Wang Minggang	Undergraduate	20 Years	Shenyang Rongcheng	General manager
	Li Ning	Mid-Level Engineer	10 Years	Landscape Construction Engineering Co.,Ltd.	Project manager

Figure 4: Focus group composition

Research Findings

Table 1: The overall difference in teaching mode between two schools

Variable	School	n	$\bar{X}$	S.D.	t	p
Teaching objectives	LuXun Academy of Fine Arts	139	4.65	0.46	3.56	.00
	Shenyang City University	104	4.38	0.67		
Teaching content	LuXun Academy of Fine Arts	139	4.36	0.61	8.64	.00
	Shenyang City University	104	3.53	0.83		
Teaching system	LuXun Academy of Fine Arts	139	4.57	0.54	4.06	.00
	Shenyang City University	104	4.23	0.68		
Teaching implementation	LuXun Academy of Fine Arts	139	4.59	0.54	4.32	.00
	Shenyang City University	104	4.23	0.71		
Teaching evaluation	LuXun Academy of Fine Arts	139	4.59	0.53	4.02	.00
	Shenyang City University	104	4.27	0.67		
Teaching mode	LuXun Academy of Fine Arts	139	4.55	0.48	5.92	.00
	Shenyang City University	104	4.12	0.61		

According to Table 1,

1) LuXun Academy of Fine Arts and Shenyang City University environmental design majors have overall differences in the five dimensions of the teaching mode, and the differences are significant ($p < 0.001$).

2) Regarding the environmental design major teaching mode, the overall mean of LuXun Academy of Fine Arts is 4.55, and the standard deviation is 0.48; the overall mean of Shenyang City University is 4.12, and the standard deviation is 0.61. It shows that in general, the students of LuXun Academy of Fine Arts have a higher degree of recognition of the five dimensions of the environmental design teaching model than Shenyang City University.

3) Analyzing Shenyang City University from various dimensions, the order of students' recognition in each dimension of the teaching model is as follows: teaching objective > teaching evaluation > teaching system > teaching implementation > teaching content. The average value of students in the dimension of "teaching objective" is the largest, which is 4.38. The mean value in the dimension of "teaching content" is the

smallest, which is 3.53. It shows that the students at Shenyang City University agree with the teaching objectives of the environmental design major and have a low level of mastery of the teaching content of the environmental design major.

Table 2: The overall difference of gender in teaching mode

School	Gender	n	$\bar{X}$	S.D.	t	p
Shenyang City University	Male	45	4.24	0.61	1.84	0.07
	Female	59	4.03	0.59		
LuXun Academy of Fine Arts	Male	40	4.58	0.60	0.49	0.62
	Female	99	4.54	0.43		

According to Table 2,

1) There is no gender difference in the teaching mode of environmental design major between Shenyang City University and LuXun Academy of Fine Arts ($p>0.05$).

2) Shenyang City University has an average of 4.24 for males and 4.03 for females; LuXun Academy of Fine Arts has an average of 4.58 for males and 4.53 for females. Therefore, males in the two schools have a higher degree of recognition of the teaching model of environmental design than females.

Table 3: The gender comparison of Shenyang City University's teaching mode in 5 dimensions

Variable	Gender	n	Minimum	Maximum	$\bar{X}$	S.D.
Teaching objectives	Male	45	3.00	5.00	4.49	0.70
	Female	59	2.82	5.00	4.29	0.64
Teaching content	Male	45	1.55	5.00	3.63	0.75
	Female	59	2.00	5.00	3.45	0.87
Teaching system	Male	45	3.00	5.00	4.37	0.67
	Female	59	2.20	5.00	4.13	0.68
Teaching implementation	Male	45	3.00	5.00	4.38	0.68
	Female	59	2.00	5.00	4.11	0.72
Teaching evaluation	Male	45	3.00	5.00	4.38	0.68
	Female	59	2.70	5.00	4.18	0.67

Variable	Gender	n	Minimum	Maximum	$\bar{X}$	S.D.
Teaching mode	Male	45	3.00	5.00	4.24	0.61
	Female	59	2.73	5.00	4.03	0.59

According to Table 3,

A further analysis of the five dimensions of the teaching model of the environmental design major of Shenyang City University found that from the average value, the students at Shenyang City University agree with the five dimensions of the teaching model for males higher than females.

Discussion of Research Findings

1. Discussion of Research Objective 1

There were five components of problems existing in the teaching mode of environmental design major in Shenyang City University which consisted of teaching objectives, teaching content, teaching system, teaching implementation, and teaching evaluation. The major findings were revealed as such because through investigation and research, it is found that the problems existing in the teaching mode of environmental design major in Shenyang City University are consistent with other research findings. This research finding was in accordance with the research of Author Xu Minghao (2020, p46-48) which was found that analysis of the existing problems in environmental design education: the structure of teachers is not perfect; the training objectives are not clear enough; the curriculum system is old-fashioned; the teaching method is single; the teaching facilities are not perfect; the teaching management level needs to be improved; the teaching evaluation system needs to be more standardized.

Also, the findings were in the same direction with Researcher Yu Xiaoqian (2021, p3) that the problems existing in the teaching of environmental design courses are: the set environmental design teaching course system is not perfect; the training objectives are not clear; the set environmental design teaching courses lack practical application; the teaching content in the professional field of environmental design is outdated and the method is single.

Moreover, from the research of Researcher Chen Keqian (2009, p33), it was found that the problems of environmental design education are: the curriculum setting system is

not perfect; the scope of curriculum setting is not comprehensive; the setting of the specific content of the curriculum is still lacking; the curriculum setting lacks characteristics.

2. Discussion of Research Objective 2

The major findings were revealed as such because by comparing the teaching management modes of LuXun Academy of Fine Arts and Shenyang City University, it is found that the advantages of LuXun Academy of Fine Arts are consistent with the research on the teaching modes of environmental design majors in other excellent universities. It is worth learning from Shenyang City University.

This research finding was in accordance with the research of Author Zheng Shuyang (2019: 7) which was found that in the concept and method of design research, there should be not only individual thinking of experience and analysis, but also a systematic and comprehensive overall thinking. Only by developing academic resources in adjacent disciplines of humanities, science and engineering and related majors based on our own disciplinary advantages can we seek breakthroughs in the cooperation of integration and development.

Also, the findings were in the same direction with Zhong Yan (2006: 32) that the curriculum setting of the environmental design major is the carrier for each university to cultivate the compound design talents of the environmental design major. The rationality of the professional curriculum setting is not only related to whether the major itself has a reasonable logic of existence, but also to the environmental design cultivated by each university. Whether talents have strong social adaptability. Only by adapting to the needs of economic and social development, can the majors set by the university ensure that the talents it trains can meet the requirements of economic and social development. However, the cultivation of talents in universities is cyclical. Therefore, the setting of professional courses is not simply to adapt to the needs of economic and social development but should be carried out according to the needs of economic and social development for various types of senior professionals at all levels. Long-term prediction makes the professional setting have a certain advance and wide adaptability, so that the professional setting and the economic and social development can form a benign and mutually adaptive relationship.

Moreover, from the research of Researcher Yin Ni and Liu Jingjing (2021, p2), it was found that to cultivate high-quality environmental design professionals, universities need to introduce an applied talent training system, attach great importance to practical teaching, establish a suitable talent training mechanism, adjust the traditional talent training model, and greatly improve the quality of environmental design talent training.

3. Discussion of Research Objective 3

The major findings were revealed as such because the teaching management mode of the environmental design major should keep pace with the times and should be reformed with the development of the times, to cultivate more talents who can meet the needs of the market.

This research finding was in accordance with the theories of Author Pan Anqi (2012: 1-2) which was found that Taylor's theory of scientific management emphasizes the need to perform tasks efficiently. The purpose of management is to complete each project plan more efficiently. Therefore, in terms of the system, we must first clarify and refine the goals, establish a sound mechanism, and ensure the realization of the goal. Taylor believed that there should be a division of labor between managers and workers. Managers are responsible for planning, organizing, and making decisions, while workers are primarily responsible for getting the job done. The monitoring mechanism and the implementation of the system are inseparable. To improve the executive power of the system and improve the production efficiency, whether it is the decision-making supervision of the principal, the teaching supervision of teachers, and the academic evaluation of students, it is necessary to have a sound supervision mechanism.

Also, the findings were in the same direction with Researcher Lin Haifeng, Researcher Zhao Min, and Researcher Mo Rong (2016, p7-9) that the guaranteed path for the implementation of shared leadership in the introspection of the teacher team: Creating an ecological community of shared leadership training and development. Establishing an incentive system that matches shared leadership. Building an empowerment, empowerment, and responsibility performance mechanism for shared leadership enhancement. Building a shared leadership information platform for dialogue and sharing. Cultivating a team culture suitable for the development of a shared leadership model.

Moreover, from the research of Researcher Yu Xiaoqian (2021: 2-3) and Researcher Xu Minghao (2020, p54), it was found that the basic framework of the curriculum system is

from the perspective of the specific implementation of the construction of the environmental design professional curriculum system. A relatively complete teaching system should have clear goals in terms of research objects and teaching training and limit the logical relationship between the professional content in the teaching process and the professional compulsory courses. and related flexibility. For the professional field of environmental design, it is necessary to properly deal with the relationship between the public basic course modules and the professional course modules, and deal with the diverse perspectives involved, to play an effective role in guiding, guiding, and restricting. At the same time, it is necessary to establish a symbiotic system of living environment, technology, and art, and handle various interests between reality and the future. The basic characteristics of the modular system are planning, predictability, systematizations, characteristic, creativity, and adaptability. It is necessary to establish a systematic teaching management application, formulate and improve the rationality of education management systems and standards, establish a post-responsibility management system, and use Internet technology to develop and use a more reasonable education management platform.

Corresponding to the research of Wang Zhenggang and Li Jie (2014: 1-2), the research on the teaching system of environmental art design oriented by "practice and art" should construct a practical teaching system of "techniques + skills + innovation", so that students can firmly grasp the subject knowledge; implement "modeling training+ design appreciation + art inspection + expanding the horizon" sequence teaching to comprehensively improve students' comprehensive artistic literacy; build a stable training base to ensure students' smooth transition from classroom to society, from practice to practical creation.

Suggestion

1. The name of the New Model

Modular Teaching Model of Environmental Design Major at the Undergraduate Stage of Shenyang City University-"Five-Year Four-Stage Teaching Model"

2. Components

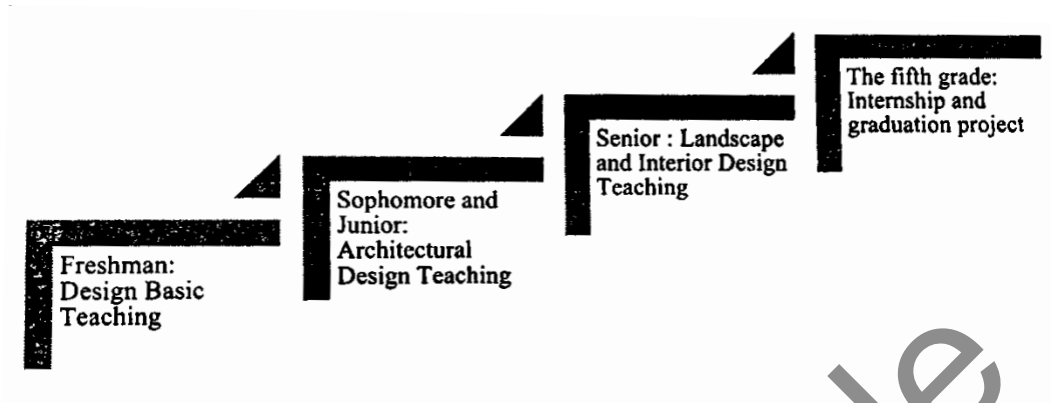


Figure 5: Five-year four-stage teaching model

The following explains the five-year four-stage teaching model in detail.

a. Targeted design of basic teaching modules (1 academic year)

Basic teaching aims to provide guidance for students' higher-level professional learning, and the cultivation of epistemology and methodology is particularly important. Setting up basic course arrangements according to the needs of professional development and strengthening basic teaching can improve students' professional adaptability and reflect the intersection, compound, and series of courses.

In the basic course stage, students are encouraged to establish innovative awareness, cultivate artistic personality, guide students to think more creatively, liberate design thinking, and let students learn to solve problems with creative thinking. Therefore, in the basic stage, there must be creative courses that combine hands and brains, such as thinking with pictures, design methodology, etc. At the same time, the display of creativity should also be emphasized in basic modeling and composition training, such as taking some theme creations, not just simple and monotonous body reproduction, and arrangement.

Freshman: Design Basic Teaching Module Curriculum Reference	
Freshman	Design Sketch (Interior, Architecture, Landscape), Professional Color (Interior, Architecture, Landscape), Professional Sketching (Interior, Architecture, Landscape), Plane Composition, Three-Dimensional Composition, Color Composition, Decorative Graphics, Form Research, Photography Basis, Design Introduction, Western Modern Design History, Chinese Design History, Design Methodology.

Figure 6

b. Architectural Design Course Module (2 academic years, including architectural design practice) Whether it is a business leader of a design company or a practitioner who has graduated from environmental design, when it comes to the relationship between architecture, interior design, and landscape design, all environmental graduates emphasize architectural knowledge. Architectural foundation, architectural professional design and its theory are the matrix of environmental design. Whether it is interior design or landscape design, they are inseparable from the foundation of architectural design.

This stage focuses on architectural foundation, architectural professional design, and its theory. The purpose is to prepare students for the next stage of professional teaching in interior design and landscape design through this stage of learning. This stage is the basic stage of environmental design professional learning, and the key stage in the teaching of interior design and landscape design. It needs to be emphasized here that the engineering courses offered by the department of environmental art are not the same as the engineering courses offered by the department of architecture, even if the subject names are the same. The emphasis of engineering content here is to emphasize the relationship between discipline content and design.

Sophomore and Junior: Architectural Design Course Module Setting Reference	
Sophomore	Introduction to Architecture, History of Chinese Architecture, Descriptive Geometry, Basic Architecture and Interior Perspective, Professional Expression Techniques (Hand-Painted Renderings), Professional Expression Sophomore Techniques (Hand-Painted Fast Expression), Ergonomics, Professional Color Design, Residential Area Planning, Scenic Area Planning, House Layout Design, Computer-Aided Design (AUTO-CAD). Design Institute Internship (Focus on drawing specifications and planning content), Principles of Architectural Design.
Junior	Analysis of Chinese Ancient Building Structure, Foreign Architectural History, Architectural Economics, Architectural Model, Building Structure, Building Physics (Sound, Light and Heat), Building Equipment Foundation (Water Heating and Electricity), Building Equipment Selection, Residential Surveying and Mapping, Urban Design, Landscape Architectural Design, Independent Residential Building Design, Computer-Aided Design (3DS- MAX, PHOTO-

Sophomore and Junior: Architectural Design Course Module Setting Reference	
	SHOP, SKETCH-UP). Design Institute Internship (Focus on design specifications and regulations).

Figure 7

c. Fuzzy landscape design and interior design professional teaching module (1 academic year, including engineering practice)

This stage mainly learns the basic theories, basic knowledge and related design skills of interior design and landscape design, so that students can exercise their design thinking skills through learning interior design and landscape design theories, and through professional modeling foundations, design principles and methods, studios and Basic training of engineering practice ability, with the ability to understand the history and current situation of interior design and landscape design, and to understand the development trend of the latest professional achievements. This year is a cross-arrangement of the landscape design and interior design course modules, so as to integrate the architectural design knowledge of the previous two years into the landscape design and interior design courses. At the same time, it is also hoped that students will rethink the relationship between architectural design, landscape design, and interior design, and use a holistic and systematic way of thinking to understand various factors related to environmental design and how to coordinate these factors. Instead of considering a single design object in isolation.

Senior: Environmental Design Course Module Setting Reference	
Senior	Interior Materials and Structure, Interior Design Procedures, Interior Furnishing Design, Furniture Design, Principles of Interior Design, History of Western Interior Design, History of Chinese Interior Design. Landscape Botany, Plant Configuration, Garden Design, Public Art, Introduction to Landscape, Principles of Landscape Design, History of Chinese Landscape Design, History of Western Landscape Design. Design Institute Internship (Focus on relevant regulations, standards, fire protection, and safety).

Figure 8

d. Landscape design or interior design teaching module, with the selected direction as the graduation design (1 academic year, included internship)

The final year of teaching is for students to learn something to their liking, building on one year of Design Fundamentals, two years of Architecture Design Fundamentals, and one year of "Landscape and Interior Design Teaching". At the same time, I also made an in-depth design project on graduation. Before the students have obtained qualified credits, the subject orientation of the graduation design and the opening report of the thesis have passed the examination and approval, to successfully enter the graduation degree program. Based on the previous courses, students will focus on developing their hobbies and expertise in the final year, and graduate with landscape design or interior design as the direction.

Major	Fifth Grade: Two Professional Direction Curriculum Module Setting Reference
Interior Design	Display Design, Architectural Decoration Design, Resort Hotel Interior Design, Architecture, Interior Lighting Design, Architecture and Interior Photography, Senior Residential Interior Design, Introduction to Interior Design Style, Outline of Chinese and Western Sculpture History, Design Marketing and Management. Graduation Internship (Focus on professional ethics, design marketing, business relations, contracts), Graduation Project, Graduation Thesis.
Landscape Design	Horticulture and Planting, Garden Investigation, Public Facility Design, Landscape Design, Architecture and Landscape Photography, Architecture, Landscape Lighting Design, Natural System or Site Ecology, Compendium of Chinese and Western Sculpture History, Design Marketing and Management. Graduation Internship (Focus on professional ethics, design marketing, business relations, contracts), Graduation Project, Graduation Thesis.

Figure 9

The four-stage five-year teaching model, the first-grade trains students from "natural persons" to "professionals" with certain professional knowledge. The second and third grades start to lay a good professional foundation-architectural design basic course. From the fourth to the fifth grade, focus on cultivating students from professionals to

designers with certain professional abilities, and focus on innovative talents that are pioneering, communicative, and application oriented. From fifth grade to graduation, choose one as a breakthrough, and then improve, and make a summary of the undergraduate study.

3. Teaching Control

The environmental art design teaching control system should have an operating mechanism to play its role and have an impact on the professional teaching. It is recommended to establish a self-financing environmental design teaching supervision agency (hereinafter referred to as the "institution").

The current situation in China is that there are many associations related to the environmental design profession, and there are also many names. However, these associations either have no activities or are only carrying out profitable business operations. No association is concerned about the standard construction of professional teaching, constantly adjusting the teaching content according to market changes, improving the professional status and reforming the drawbacks of teaching.

The establishment of such a professional control system operation mechanism cannot be the behavior of an individual or a school. I hope that more experts can care about this issue, evaluate, and improve or rebuild this control system, and test, promote and apply it in China as soon as possible.

Its operating mode is only partially suggested in this study, and more details require further research in the future.

Its operating mode is as follows:

- 1) Full decision-making body is the board of direct.
- 2) Staff composition. About 8-12 people, each member represents a different environmental design education and practice organization.
- 3) Committee. The appraisal committee is responsible for assessing whether all schools applied for meet the criteria. The Standards Committee is responsible for developing and revising standards. The Research Committee is responsible for researching new topics and making recommendations to the Standards Committee.
- 4) Sources of funds. Funding sources are fees paid by the schools applying and sponsorships from professional associations, companies, and individuals. It is self-financing.
- 5) Evaluation process. (1) The school understands the rules of accreditation. (2) Schools integrate guidelines into teaching arrangements. (3) School deems standards

met, and application assessment. (4) Institution receives application materials.(5) Receive a self-assessment from the school two months before the institutional field assessment.(6) Based on the self-assessment, the assessor has a preliminary understanding of the school and lists the key points of the on-site assessment. (7) Assessor goes to school for on-site assessment for 2-3 days and write an evaluation report. (8) The Board of Directors reviewed the evaluation report. (9) After the board of directors discusses the appraisal personnel's report, the final compliance period will be given: if more than 90% of the standards are met, a 6-year compliance period will be given; if they are basically qualified (about 70%-90%), they will be given 3 years; if many items are unqualified, will refuse to give any years. The entire appraisal process takes approximately one year from application to publication of the results.

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