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RESEARCH ARTICLE

Teaching Competencies of Visual Communication Design Lecturers of Yunnan Universities in China

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ABSTRACT

The research objectives of this study are to understand the significance of the teaching competence of lecturers of visual communication design in Yunnan universities under different demographic variables, to obtain the views of lecturers of visual communication design in Yunnan universities on the evaluation indicators of teaching competence, and to obtain the specific indicators of teaching competence evaluation indicators of lecturers of visual communication design in Yunnan universities. This study adopts a mixed research method. First, a questionnaire was conducted on lecturers of visual communication design in 23 universities in Yunnan Province to collect their self-evaluation of teaching competence and the weight scores of various indicators for evaluating teaching competence in Yunnan universities. The questionnaire was analyzed using descriptive analysis, one-way analysis of variance, and difference analysis. Secondly, semi-structured interviews were conducted with administrators of 9 universities and were analyzed by thematic analysis. Finally, the evaluation indicators were modified according to the guidance suggestions obtained from the focus group discussion of 5 industry experts. The research results show that the teaching competence evaluation system of lecturers in the visual communication design major of Yunnan Universities can help lecturers and schools understand the current status of lecturers' teaching competence, motivate lecturers to improve their shortcomings and improve their teaching competence, and is a simple and effective teaching competence evaluation indicator. Based on the discussion of the research results, only by constructing a scientific, comprehensive, and accurate teaching competence evaluation indicator system can we provide strong support for improving teaching quality and teaching improvement. It is recommended that future research adjust the direction of professional evaluation to serve more lecturers in different disciplines.

INTRODUCTION

The Ministry of Education and six other departments issued the "Guiding Opinions on Strengthening the Reform of Lecturer Team Building in Colleges and Universities in the New Era," emphasizing the need for colleges and universities to strengthen lecturer development and professionalization. This includes improving the lecturer development system, training system, guarantee system, incentive system, and supervision system. The document also encourages active responses to the challenges of new technologies in talent training (Ministry of Education of the People's Republic of China, 2021).

Additionally, it highlights the importance of enhancing lecturers' ability to use information technology to improve teaching, as well as improving their practical ability, innovation ability, and professional quality (Ministry of Education of the People's Republic of China, 2020).

In recent years, the application of visual communication design in society and various fields has significantly impacted and rapidly developed the education of visual communication design in China's media colleges (H. Zhu, 2018; Kanval et al., 2024). Currently, many media colleges and art departments at all levels in the country have yet to offer such courses. New teaching explorations have led to the emergence of new concepts and ideas, rendering old teaching methods increasingly unfeasible (Y. Zhao, 2020). To adapt to social and aesthetic creation needs while promoting educational reform, continuous innovation and development in visual communication design education will be a prevailing trend (C. Li, 2017; Jam et al., 2011).

Undeniably, China has achieved remarkable results through five rounds of teaching evaluation in higher education institutions. However, this evaluation work has also exposed several problems, such as a unified evaluation index system, a single evaluation subject, and unclear connotation; lack of initiative from universities; complex organizational management procedures; and the lack of binding force and enforceability of the evaluation results (Ministry of Education of the People's Republic of China, 2020). Different majors have distinct professional characteristics, necessitating a reasonable evaluation scheme for lecturer teaching competence tailored to each major's requirements to obtain the most sensible and applicable evaluation indicators.

Researchers are gaining insight into this new research perspective and striving to make a difference. They aim to construct a new evaluation index system for the teaching competence of visual communication design lecturers in Yunnan universities. This will provide a valuable reference for evaluating the teaching competence of visual communication design lecturers in universities nationwide.

LITERATURE REVIEW

The core of visual communication design in college education is to cultivate students' innovation and practical ability, and the teaching competence of lecturers directly affects the quality of students' training. Foreign universities emphasize interdisciplinary integration and practical ability training, and domestic universities are also actively exploring education models that adapt to local needs (Zhang Chibo and Zhao Yongli (2023). The development of visual communication design in colleges and universities in Yunnan Province started late. Colleges and universities in the province have continuously improved their curriculum setting, faculty team construction, and teaching resource allocation and gradually formed an education system with local characteristics.

Eko Marpanaji et al. (2018) Think about the overview of visual communication design. The rise of visual communication design is inseparable from China's economy and cultural development. Simply put, the visual communication design major cultivates design talents, aiming to vividly express the designer's ideas through certain expressions so that the information receiver can fully understand a series of visual symbols. L. J. Ravelli and T. V. Leeuwen (2018) From the perspective of teaching methods, the traditional lecturer-led teaching method has been difficult to adapt to the requirements of the digital age. Teaching based on digital visual communication design must be combined with teaching and practical operation and focus on cultivating students' hands-on ability based on theory. Therefore, more emotional experience, case teaching, problem teaching, and other methods should be adopted. Through the interaction between lecturers and students, students and society, multimedia, the Internet, and other digital technologies should be fully utilized.

Teaching competence is an integral part of the quality of lecturers and a critical factor in determining the quality of teaching and the art of teaching. Studying lecturers' teaching competence has also become an important research direction in education and linguistics (Shulman, 1986; Meng, 2017).

"Teaching competence" is closely related to teaching skills and learning environments, and lecturers must master these skills and environments to cope with various teaching scenarios (Caena, 2022).Selvi (2010) proposed a general standard for lecturers' teaching competence, including nine abilities: field ability, research ability, curriculum ability, lifelong learning ability, social and cultural ability, emotional ability, communication ability, information and communication technology (ICT) ability and environmental ability. Zhen Wang et al. (2023) believe that the teaching competence of lecturers is an integral part of teaching activities and reflects the professional quality of lecturers. This can more intuitively explore learning participation and students' learning outcomes. Teaching competence is an integral part of the quality of lecturers and a critical factor in determining the quality of teaching and the art of teaching.

Some higher education institutions have developed teaching competence self-assessment scales. Swank et al. (2021) from the University of Florida developed the Teaching Competence Scale (TCS) from the lecturers' perspective. The study identified four factors through exploratory factor analysis of 288 subjects, covering 67 items in four areas (knowledge, skills, behaviors, and disposition). Teaching competence is tested by assessing the extent to which the lecturer's responses reflect three interrelated dimensions: awareness, knowledge, and skills. These dimensions are identified in the original American version (56 items) of the 16-item scale proposed by Spanierman et al. (2010). Wong, G., Greenhalgh, et al. (2013) believe that when constructing teaching competence evaluation indicators, attention should be paid to ensuring their validity and reliability. Evaluation indicators should have clear definitions and operability and can accurately reflect teaching quality and effectiveness. In addition, the evaluation process should be fair, transparent, and verifiable to ensure the objectivity and fairness of the evaluation results. Basic evaluation capabilities are assessed through quantitative and qualitative questions to compare critical variables accordingly (Hou, 2020; Jam et al., 2017).

Research Objectives

1. To determine the significance of teaching competencies by demographic variables of visual communication design lecturers in Yunnan universities.
2. To gain the perspectives about teaching competencies evaluation indicators of visual communication design lecturers in Yunnan universities.
3. To obtain the specific indicators for the teaching competencies evaluation of visual communication design lecturers in Yunnan universities.

METHODOLOGY

This study adopted a mixed research method, combining quantitative and qualitative research methods. First, the research preparation stage included literature review and clarifying research questions and methods; second, the instrument construction stage included validity and reliability testing, questionnaire development and pilot testing, and semi-structured interview arrangements; then, the data collection stage collected data through questionnaires of 52 lecturers and interviews with 9 administrative staff; next, the data analysis stage used SPSS for numerical data analysis and NVIVO for content analysis; finally, the indicators were critically evaluated through a focus group discussion with 5 education experts in the field to draw guidance.

Data Collection

The lecturer samples of the questionnaire survey came from the following 23 schools that offer visual communication design majors, namely 1) Yunnan University College of Art and Design,2) Kunming University of Science and Technology College of Art and Media ,3) Yunnan Normal University ,4) Yunnan Minzu University ,5) Yunnan University of Finance and Economics ,6) Yunnan Art University Design College ,7) Dali University,8) QuJing Normal University ,9) Kunming University ,10) Yuxi

Normal University ,11) Yunnan university Changxin International Art College ,12) City College of Kunming University of Science and Technology ,13) Southwest Forestry University ,14) Yunnan Arts University College of Higher Vocational Education ,15) Chuxiong Normal University ,16) HongHe University ,17) DianChi College ,18) Kunming City College ,19) Kunming Arts and Sciences College ,20) Kunming Communication College ,21) Lijiang Culture and Tourism College ,22) Yunnan Technology and Business University ,23) Yunnan University of Business Management. The sample size is determined based on the selection criteria of Neuman's (2003) concepts. The sample size is 15-30% if the population is hundreds. Therefore, for the population of 345 lecturers, the researchers calculated a 15% sample of lecturer questionnaires, equivalent to a sample of 52 lecturers in this study. The questionnaire was distributed online by application, and the data was collected using the SoJump. For the quantitative data collected by the questionnaire, frequency analysis of demographic variables, descriptive statistics analysis, and one-way analysis of variance were used.

Another source of data was a group of nine managers selected from the deans, vice deans, or department heads of these 23 universities. The interviews were problem-centered (Witzel, 2000), referring to the research of Michael Ruloff and Dominik Petko (2021). The interviews lasted approximately 30-45 minutes (Creswell, 2018) and were transcribed into English using iFlytek. The qualitative data was analyzed using the thematic analysis method developed by Virginia Braun and Victoria Clarke (2006), based on Patton (1990).

In the focus group discussion part, the researchers organized a discussion with 5 experienced experts. These experts were professors from related fields (Cohen et al., 2017; Punch, 2009) with 20 years or more of teaching experience. They were invited to discuss the details of the indicators for evaluating the teaching competence of lecturers, and the discussion was transcribed into English using iFlytek. After receiving the expert opinions, the researchers revised the indicator system based on the suggestions and feedback provided by the experts.

RESULTS

Data Analysis

Analysis of Demographic Variables

As shown in Table 1, significant differences were found between males and females in skills ($P<0.05$), behavior ($P<0.05$), and disposition ($P<0.05$). Males scored significantly higher in these areas compared to females. However, there was no significant difference in knowledge ($P=0.097>0.05$) between genders.

Table 1: Gender Independent Sample T-test Analysis Table for Each Variable

Variable	Sex	Sample Capacity	M	SD	T-statistic	Significance
Knowledge	Male	20	4.13	0.596	1.692	0.097
	Female	32	3.81	0.714		
Skills	Male	20	4.24	0.420	2.428	0.019
	Female	32	3.89	0.558		
Behavior	Male	20	4.33	0.415	2.061	0.045
	Female	32	4.04	0.522		
Disposition	Male	20	4.37	0.475	2.151	0.035
	Female	32	4.08	0.475		

As shown in Table 2, there were no significant differences in knowledge, skills, and behaviors between Han people and ethnic minorities (P>0.05). Han people generally scored higher in knowledge and skills, but these differences were not significant. Ethnic minorities scored higher in disposition (P=0.047<0.05) compared to Han people.

Table 2: Independent Sample T-test Analysis Table for Each Variable by Ethnicity

Variable	Nationality	Sample	M	SD	T-statisti	Significance
Knowledge	The Han Nationality	43	3.97	0.583	0.651	0.531
	Minority Nationality	9	3.73	1.068		
Skills	The Han Nationality	43	4.03	0.474	0.122	0.905
	Minority Nationality	9	3.99	0.798		
Behavior	The Han Nationality	43	4.13	0.452	-0.408	0.692
	Minority Nationality	9	4.23	0.711		
Disposition	The Han Nationality	43	4.13	0.457	-2.038	0.047
	Minority Nationality	9	4.49	0.572		

As shown in Table 3, significant differences in knowledge, skills, and behavior were observed across different age groups (P < 0.05). Younger lecturers (under 30 years old) exhibited higher significance in knowledge compared to those aged 46-60 years. Similarly, younger lecturers showed greater significance in skills and behavior than their older counterparts. Generally, knowledge, skills, and behavior decreased with age.

Table 3: One-way Analysis of Variance Table of Age on Each Variable

Variable	Age	Sample	M	SD	F	Significa	LSD
Knowledge	Under 30 Years of	11	4.31	0.547	3.28	0.046	1>3
	30-45 Years Old	37	3.88	0.630			
	46-60 Years Old	4	3.40	1.120			
Skills	Under 30 Years of	11	4.38	0.460	4.196	0.021	1>2, 3
	30-45 Years Old	37	3.95	0.480			
	46-60 Years Old	4	3.66	0.814			
Behavior	Under 30 Years of	11	4.46	0.446	4.71	0.013	1>2, 3
	30-45 Years Old	37	4.11	0.462			
	46-60 Years Old	4	3.68	0.574			
Disposition	Under 30 Years of	11	4.49	0.429	2.71	0.077	
	30-45 Years Old	37	4.15	0.536			
	46-60 Years Old	4	4.54	0.259			
Note: Under 30 Years Old = 1; 30-45 Years Old = 2; 46-60 Years Old = 3							

As shown in Table 4, significant differences were observed in knowledge and skills between different professional titles ($P < 0.05$). Higher professional titles were associated with higher scores in knowledge and skills. Teaching assistants and lecturers scored significantly lower than associate professors and professors in both knowledge and skills.

Table 4: One-way ANOVA with Professional Title for Each Variable

Variable	Professional Ranks and Titles	Sample	M	SD	F	Significance	LSD
Knowledge	Assistant	26	3.76	0.776	4.413	0.008	1, 2＜3, 4
	Lecturer	18	3.86	0.355			
	Associate Professor	6	4.57	0.543			
	Professor	2	4.90	0.141			
Skills	Assistant	26	3.94	0.568	2.993	0.040	1, 2＜4
	Lecturer	18	3.94	0.415			
	Associate Professor	6	4.39	0.496			
	Professor	2	4.79	0.071			
Behavior	Assistant	26	4.08	0.544	2.12	0.110	
	Lecturer	18	4.11	0.361			
	Associate Professor	6	4.33	0.565			
	Professor	2	4.90	0.141			
Disposition	Assistant	26	4.16	0.472	1.189	0.324	
	Lecturer	18	4.13	0.503			
	Associate Professor	6	4.35	0.564			
	Professor	2	4.75	0.113			
Note: Assistant=1; Lecturer=2; Associate Professor=3; Professor=4							

As shown in Table 5, significant differences were found in knowledge and skills among different teaching experience groups ($P<0.05$). More experienced lecturers (over 10 years) scored higher in knowledge and skills compared to those with less experience (under 5 years). Skills were also significantly higher in lecturers with over 15 years of experience compared to those with less than 5 years.

Table 5: One-way ANOVA Table of Teaching Experience for Each Variable

Variables	Teaching	Sample	M	SD	F	Significa	LSD
Knowledge	Under 5 Years	32	3.71	0.662	4.181	0.01	1＜3, 4
	5-10 Years	12	4.1	0.624			
	10-15 Years	3	4.53	0.416			
	More than 15 Years	5	4.56	0.41			
Skills	Under 5 Years	32	3.87	0.535	3.228	0.03	1＜4
	5-10 Years	12	4.17	0.491			
	10-15 Years	3	4.28	0.064			
	More than 15 Years	5	4.51	0.369			
Behavior	Under 5 Years	32	4.05	0.516	1.727	0.174	
	5-10 Years	12	4.2	0.473			

	10-15 Years	3	4.3	0.2			
	More than 15 Years	5	4.56	0.416			
Disposition	Under 5 Years	32	4.1	0.508	2.218	0.096	
	5-10 Years	12	4.2	0.437			
	10-15 Years	3	4.39	0.269			
	More than 15 Years	5	4.67	0.386			
Note: Under 5 Years = 1; 5-10 Years = 2; 10-15 Years = 3; More than 15 Years = 4							

As shown in Table 6, there were no significant differences in disposition among different educational backgrounds (P>0.05). However, significant differences were observed in knowledge, skills, and behavior based on academic qualifications (P<0.05). Higher academic qualifications were associated with higher scores in these areas, with doctoral students scoring significantly higher than master's and bachelor's degree holders.

Table 6: One-way ANOVA Analysis Table of Educational Background on Each

Variable	Educational Background	Sample	M	SD	F	Significance	LSD
Knowledge	Bachelor's Degree	7	3.6	0.937	4.183	0.021	1，2＜3
	Master's Degree	42	3.9	0.606			
	Doctoral Degree	3	4.9	0.115			
Skills	Bachelor's Degree	7	3.8	0.672	4.632	0.014	1，2＜3
	Master's Degree	42	3.9	0.481			
	Doctoral Degree	3	4.8	0.131			
Behavior	Bachelor's Degree	7	3.9	0.547	5.126	0.010	1，2＜3
	Master's Degree	42	4.1	0.460			
	Doctoral Degree	3	4.9	0.115			
Disposition	Bachelor's Degree	7	4.1	0.407	2.880	0.066	
	Master's Degree	42	4.1	0.494			
	Doctoral Degree	3	4.8	0.165			
Note: Bachelor's Degree=1; Master's Degree=2; Doctoral Degree=3							

As shown in Table 7, there were no significant differences in knowledge and disposition among different teaching subjects (P>0.05). However, significant differences were found in skills and behaviors (P<0.05). Lecturers teaching visual communication design subjects showed higher skills and behaviors compared to those teaching other subjects or a combination of visual communication design with other subjects.

Table 7: Independent Sample T-test Analysis Table for Each Variable by Taught Subjects

Variables	Professor Subject	Sample	M	SD	T-statistic	Significance
Knowledge	Visual Communication Design	34	4.06	0.549	1.904	0.063
	Visual Communication Design and Other Subjects	18	3.69	0.849		
Skills	Visual Communication Design	34	4.15	0.387	2.077	0.049
	Visual Communication Design and Other Subjects	18	3.78	0.688		

Behavior	Visual Communication Design	34	4.26	0.401	2.244	0.029
	Visual Communication Design and Other Subjects	18	3.94	0.606		
Disposition	Visual Communication Design	34	4.29	0.424	1.990	0.052
	Visual Communication Design and Other Subjects	18	4.01	0.569		

These findings provide insights into the varied teaching competencies among visual communication design lecturers in Yunnan universities across different demographic variables.

Reliability and Validity Analysis

Reliability Analysis of Teaching Competency Indicator Weight Dimension, that the reliability α values for knowledge, skills, behavior, and disposition are 0.823, 0.941, 0.921, and 0.945, respectively, all exceeding 0.7. The overall scale α coefficient is 0.971, surpassing the 0.8 standard, indicating good consistency in the questionnaire results. Validity Analysis of Teaching Competency Indicator Weight Dimension, KMO values between 0.710 and 0.872, indicating good sample data. The Bartlett sphericity test results have significance levels less than 0.05, indicating non-random correlations between variables and good validity of the evaluation index for lecturer teaching competence.

Analysis on the weight of teaching competency evaluation indicators

As shown in Table 8, the average score ranges from 4.25 to 4.62 with standard deviations between 0.565 and 0.864. The skewness and kurtosis values are less than 5, indicating normal distribution.

Table 8 : Descriptive Analysis Table for Each Knowledge Item

Question Item	Min	Max	M	SD	Skewness	Kurtosis
Knowledge 1	3	5	4.25	0.682	-0.361	-0.793
Knowledge 2	3	5	4.46	0.576	-0.485	-0.701
Knowledge 3	1	5	4.37	0.864	-1.558	3.057
Knowledge 4	2	5	4.40	0.664	-1.092	1.901
Knowledge 5	3	5	4.62	0.565	-1.153	0.408

As shown in Table 9, the average score ranges from 3.96 to 4.48 with standard deviations between 0.539 and 0.928. Skill 19 received the lowest score at 3.96, indicating it is perceived as less important.

Table 9 : Descriptive Analysis Table of Each Skills Item

Question Item	Min	Max	M	SD	Skewness	Kurtosis
Skills 1	3	5	4.44	0.574	-0.412	-0.747
Skills 2	2	5	4.02	0.727	-0.347	-0.076
Skills 3	2	5	4.37	0.715	-1.011	1.010
Skills 4	2	5	4.23	0.757	-0.981	1.232
Skills 5	2	5	4.23	0.757	-0.699	0.054
Skills 6	3	5	4.42	0.605	-0.520	-0.584
Skills 7	3	5	4.42	0.605	-0.520	-0.584
Skills 8	2	5	4.29	0.637	-0.801	1.918

Skills 9	3	5	4.35	0.653	-0.495	-0.647
Skills 10	3	5	4.48	0.542	-0.306	-1.131
Skills 11	3	5	4.35	0.623	-0.396	-0.612
Skills 12	3	5	4.31	0.673	-0.457	-0.727
Skills 13	3	5	4.31	0.701	-0.512	-0.817
Skills 14	3	5	4.42	0.667	-0.738	-0.496
Skills 15	3	5	4.29	0.667	-0.404	-0.719
Skills 16	3	5	4.44	0.539	-0.153	-1.180
Skills 17	3	5	4.38	0.599	-0.387	-0.636
Skills 18	2	5	4.27	0.819	-0.989	0.514
Skills 19	2	5	3.96	0.928	-0.534	-0.556

As shown in Table 10, the average score ranges from 4.38 to 4.62 with standard deviations between 0.530 and 0.667. Skewness and kurtosis values are within acceptable limits for normal distribution.

Table 10： Descriptive Analysis Table for Each Behavioral Item

Question Item	Min	Max	M	SD	Skewness	Kurtosis
Behavior 1	3	5	4.62	0.53	-0.896	-0.351
Behavior 2	3	5	4.50	0.577	-0.636	-0.555
Behavior 3	3	5	4.46	0.609	-0.66	-0.468
Behavior 4	3	5	4.58	0.537	-0.714	-0.689
Behavior 5	3	5	4.44	0.608	-0.589	-0.534
Behavior 6	3	5	4.46	0.576	-0.485	-0.701
Behavior 7	3	5	4.42	0.667	-0.738	-0.496
Behavior 8	3	5	4.38	0.631	-0.519	-0.588
Behavior 9	3	5	4.44	0.608	-0.589	-0.534
Behavior 10	3	5	4.46	0.541	-0.229	-1.164

As shown in Table 11, the average score ranges from 4.37 to 4.58 with standard deviations between 0.537 and 0.658. Skewness and Kurtosis values are also within acceptable limits.

Table 11： Descriptive Analysis Table of Each Disposition Item

Question Item	Min	Max	M	SD	Skewness	Kurtosis
Disposition 1	3	5	4.54	0.576	-0.795	-0.331
Disposition 2	3	5	4.46	0.609	-0.66	-0.468
Disposition 3	3	5	4.58	0.537	-0.714	-0.689
Disposition 4	3	5	4.44	0.608	-0.589	-0.534
Disposition 5	3	5	4.40	0.664	-0.675	-0.553
Disposition 6	3	5	4.54	0.541	-0.544	-0.926
Disposition 7	3	5	4.46	0.609	-0.66	-0.468
Disposition 8	2	5	4.37	0.658	-0.983	1.82
Disposition 9	3	5	4.52	0.542	-0.463	-1.013

Disposition 10	3	5	4.52	0.542	-0.463	-1.013
Disposition 11	3	5	4.46	0.576	-0.485	-0.701
Disposition 12	3	5	4.50	0.542	-0.384	-1.081

These findings suggest that the questionnaire data on the Teaching Competency Evaluation Indicators for visual communication design lecturers in Yunnan universities are reliable and valid for further analysis and interpretation. The high reliability and validity coefficients ensure confidence in the consistency and suitability of the data for drawing conclusions and making recommendations based on the study's objectives.

Analysis of Qualitative Data

This study utilized grounded theory to conduct qualitative data analysis through three steps: open coding, axial coding, and selective coding, ensuring study validity through a theoretical saturation test. During open coding, the text was analyzed line by line, confirming and developing concepts along with their characteristics and dimensions. Similar events and situations were named and classified to form initial categories, resulting in a list of coding codes and categories. In the open coding process of this study, a total of 46 initial categories with 192 nodes were generated. Building upon this, axial coding was employed to derive four primary categories: knowledge, skills, behavior, and disposition.

Analysis of Focus Group Discussion

Through the suggestions of the focus group discussion, six guiding suggestions were extracted by integrating the content: 1) The indicators were changed to master the basic knowledge of the subject major, understand the relevant historical knowledge, and auxiliary subject-related knowledge. 2) Integrate similar items and delete the items that expressed standing, concern, and sympathy for students' emotions and needs in the disposition indicator. 3) Delete and merge the indicators. There are four first-level indicators and up to 10 second-level indicators each. 4) Integrate regional characteristics as indicators to reflect the influence of regional culture. 5) Detail the subject background investigation, and add one item to check whether the significance studied is the same. 6) Integrate the similarities of the content, delete and merge the indicators, delete the specific humorous teaching style, and respect the teaching style of each lecturer.

DISCUSSION

Hanushek and Rivkin (2012) mentioned that when constructing teaching competence evaluation indicators, the lecturer's knowledge level, teaching skills, disposition characteristics, and professional behavior must be considered. These factors comprehensively reflect the lecturer's teaching competence and professional quality, which is significant for evaluating teaching quality. According to the data analysis results of this study, teaching experience and academic qualifications significantly impact a lecturer's teaching competence, consistent with Darling-Hammond (2012). Additionally, the study shows that factors such as gender, ethnicity, and age are not the main factors affecting teaching competence, aligning with the views of Nye, Konstantopoulos, and Hedges (2004).

Jacqueline M. Swank's (2021) Teaching Competence Scale (TCS) is designed to assess the teaching competence level of doctoral students and faculty members. It includes four evaluation areas: knowledge, skills, behavior, and disposition. Xie Jian, Chu Dan, and Ge Han (2015) argue that the teaching competence of university lecturers includes six aspects: role cognition ability, students' learning and understanding ability, curriculum design and development ability, teaching design and implementation ability, academic reflection and evaluation ability, and technology improvement teaching competence. They constructed an evaluation index system for the teaching competence of university lecturers.

In short, constructing a teaching competence evaluation index is a complex task that requires multiple considerations. These include the clarity and appropriateness of teaching objectives, the scientificity and objectivity of evaluation methods, the weight distribution and comprehensiveness of evaluation indicators, the lecturer's knowledge level, teaching skills, disposition characteristics, and professional behavior. Additionally, the effectiveness and reliability of evaluation indicators, and the fairness, transparency, and verifiability of the evaluation process must be ensured.

CONCLUSION

This study explored the significance of the teaching competence of visual communication design lecturers in Yunnan universities across different demographic variables. The data analysis showed that gender had no significant impact on the knowledge aspect of teaching competence, but males scored slightly higher than females in skills, behavior, and disposition. Ethnicity did not significantly affect knowledge, skills, and behavior, though ethnic minorities scored slightly higher than Han people in disposition. Age did not show any significant difference in knowledge, skills, behavior, and disposition.

The study also found that the higher the academic title, the higher the scores in knowledge and skills. Similarly, more teaching experience correlated with higher scores in knowledge and skills. Undergraduate and master's students scored less significantly in knowledge, skills, and behavior compared to doctoral students. Lecturers whose teaching subjects were solely visual communication design had greater significance in skills and behaviors compared to those who taught visual communication design along with other subjects.

Additionally, the study explored the perspectives of visual communication design lecturers in Yunnan universities on the evaluation indicators of teaching competence. Based on the lecturers' scores on the preliminary evaluation indicators from the questionnaire, 4 first-level indicators and 46 specific second-level indicators were identified. The samples showed a high level of agreement on the importance of these 46 items, with skewness and kurtosis values less than 5, indicating a normal distribution and suggesting that the preliminary teaching competence evaluation indicators are reasonable.

Furthermore, the study identified specific indicators for evaluating the teaching competence of visual communication design lecturers by coding collected information and modifying the preliminary indicators based on focus group discussions. This resulted in 26 criteria, categorized into four main areas: knowledge, skills, behavior, and personality.

Visual Communication Design Lecturers Teaching competency evaluation Self-Assessment Form 视觉传达设计教师教学胜任力评价自评表						
Knowledge Questions知识类题						
Score based on self-mastery **根据自我掌握情况**评分	Incompetent 1 point **不**胜任 1 **分**	competence 2 points **有限**胜任 2**分**	Moderate competence 3 points **中等**胜任 3**分**	Limited Competent 4 points 胜任 4**分**	Very competent 5 points **非常**胜任 5**分**	
1	Understand various subject knowledge and possess subject professional abilities. (Understand the professional basic knowledge and public basic knowledge of various visual communication design disciplines, and possess subject professional abilities, such as practical teaching competencies, practical ability, etc.)**了解各学科知**识，具备学科专业能力。（了解各视觉传达设计学科的专业基础知识、公共基础知识，具备学科专业能力，如实践教学胜任力、实践能力等。）					
2	Master and apply educational methods and strategies, and integrate scientific research results into teaching. (Master and apply educational methods and strategies considered most effective and beneficial in undergraduate-level education. Integrate personal and expert scientific research results into teaching					

	cases for teaching.) **掌握并运用教育方法与策略，将科研成果融入教学。（掌握并运用本科教育中最有效、最有益的教育方法与策略，将个人及**专家的科研成果融入教学案例进行教学。）	
3	Be familiar with relevant standards of professional ethics for lecturers. (Be familiar with the rules, principles and guidelines related to lecturers' professional ethics and education and teaching ethics, namely the "Ten Codes of Professional Conduct for College lecturers in the New Era".)**熟悉教**师职业道德相关标准。（熟悉教师职业道德、教育教学伦理相关的规则、原则和准则，即《新时代高校教师职业行为十条规范》。）	
4	lecturers' knowledge system is updated to enable them to acquire and effectively impart relevant knowledge to students. (Their own knowledge system can keep pace with the times, update their own knowledge system, and effectively impart relevant knowledge and information acquired through in-depth study of visual communication design disciplines, fields or topics to students.)**教**师的**知**识体系更新，使其能够获得相关知识并有效地传授给学生。（教师自身的知识体系能够与时俱进，更新自身的知识体系，并有效地将通过深入学习视觉传达设计学科、领域或主题所获得的相关知识和信息传授给学生。）	
5	Develop professional course syllabus, select teaching aids, and teach based on training objectives. (Able to formulate the syllabus for this professional course based on the talent training plan.)**制定**专业课程教学大纲，选择教学辅助工具，根据培养目标开展教学。（能根据人才培养计划制定本专业课程教学大纲。）	

Skills Questions技能类题

Score based on self-mastery **根据自我掌握情况**评分	Incompetent 1 point **不**胜任 1 **分**	competence 2 points **有限**胜任 2**分**	Moderate competence 3 points **中等**胜任 3**分**	Limited Competent 4 points 胜任 4**分**	Very competent 5 points **非常**胜任 5**分**

1	Grasp the rhythm of the teaching process, arrange the distribution of course structure, flexible and innovative classrooms, and link curriculum development. (According to the actual class situation, the lecturers can grasp the rhythm of the class, reasonably distribute the time of the teaching process and the distribution of the course structure. The lecturers innovates in the classroom and does not copy the textbook content mechanically. The organization actively supports and advocates for necessary changes and improvements in educational curricula and is able to link course outcomes, reading materials, teaching methods and learning assessments when developing curricula.) **把握教学**过程节奏，安排课程结构分布，灵活创新课堂，衔接课程发展。（教师能根据课堂实际情况，把握课堂节奏，合理分配教学过程时间和课程结构分布。教师在课堂上创新，不生搬硬套教科书内容。组织积极支持和倡导教育课程的必要变革和改进，在课程开发时能够将课程成果、阅读材料、教学方法和学习评估联系起来。）	
2	Course knowledge is conveyed clearly and students answer questions quickly and accurately.(Communicate and explain course concepts, knowledge and information to students in a clear, easy-to-understand way that is directly related to the course content. Respond quickly when students ask questions, provide accurate, detailed and helpful answers to help students understand course content and resolve doubts) 课程知识传达清晰，学生回答问题快速准确。（以清晰、易懂、与课程内容直接相关的方式向学生传达和解释课程概念、知识和信息。在学生提问时快速回应，提供准确、详细和有用的答案，帮助学生理解课程内容并解决疑惑。）	
3	Ability to self-aware and provide effective teaching feedback. (lecturers can identify their strengths, weaknesses and room for growth, design assignments that are accurate, reliable and fair, and provide students with feedback on their academic abilities.)**具有自我**认知能力并提供有效的教学反馈。（**教**师能够识别自己的优势、劣势和成长空间，设计准确、可靠、公平的作业，并为学生提供有关其学术能力的反馈。）	

4	Teaching order and environmental maintenance. (Take steps to ensure that students comply with the policies, rules and expectations established within the school or class, actively maintain order in the school, promote learning and create a positive academic and social environment)**教学秩序与**环境维护。（采取措施确保学生遵守学校或班级内制定的政策、规则和期望，积极维护学校秩序，促进学习，营造积极的学术和社会环境）	
5	Have a relaxed teaching style.(Possess a humorous and light-hearted style and be able to use humor, jokes or interesting stories in class to attract students' attention, increase learning enjoyment and relieve tension) **教学**风格轻松。（具有幽默轻松的风格，能够在课堂上运用幽默、笑话或有趣的故事来吸引学生的注意力，增加学习乐趣，缓解紧张情绪）	
6	Proficient in using professional design software and teaching tools. (Proficient in Photoshop, Illustrator, InDesign, CorelDRAW, 3Ds Max, etc., and able to use Blackboard, Curtain Projector, DSL, Canvas, etc.) **熟**练使用专业设计软件及教学工具。（熟练使用Photoshop、Illustrator、InDesign、CorelDRAW、3Ds Max**等**，**并能使用**Blackboard、Curtain Projector、DSL、Canvas**等**）	
7	Provide personalized student teaching guidance and professional learning strategy suggestions, and use reasonable teaching methods and strategies. (Develop personalized plans based on students' performance problems in specific courses or fields to help them improve relevant professional skills or knowledge levels, provide students with learning strategies or suggestions to make it easier for them to adapt to the major, and adopt effective methods and strategies to inspire students' curiosity and interest in learning while developing their critical thinking skills) **提供个性化的学生教学指**导和专业学习策略建议，采用合理的教学方法和策略。（根据学生在特定课程或领域的表现问题制定个性化计划，帮助学生提高相关专业技能或知识水平，为学生提供学习策略或建议，使其更容易适应专业，采用有效的方法和策略，激发学生的好奇心和学习兴趣，同时培养学生的批判性思维能力）	
8	Demonstrate good professionalism, teaching skills and knowledge. (The professionalism, teaching skills and professional knowledge demonstrated in his educational work, attending classes on time, being prepared for students' questions at any time, and providing timely feedback on students' homework) **展**现良好的专业素养、教学技巧和知识。（在教育工作中展现的专业素养、教学技巧和专业知识，按时上课，随时准备回答学生的问题，及时反馈学生的作业）	

Behavior Questions行为类题

Score based on self-mastery **根据自我掌握情况**评分	Incompetent 1 point **不**胜任 1 **分**	competence 2 points **有限**胜任 2**分**	Moderate competence 3 points **中等**胜任 3**分**	Limited Competent 4 points 胜任 4**分**	Very competent 5 points **非常**胜任 5**分**

1	Complete student formative assessment forms and summative assessment forms. (lecturers can complete student summative assessment forms and student formative assessment forms seriously and responsibly.) **填写学生形成性**评估表和总结性评估表。（老师能认真负责地填写学生总结性评估表和学生形成性评估表。）	
2	Create a good classroom atmosphere and encourage active classroom communication. (Create an orderly, supportive and encouraging classroom atmosphere so that students are more willing to participate and devote themselves to the course content. lecturers encourage active classroom communication and create an active classroom atmosphere.) 营造良好的课堂氛围，鼓励积极的课堂交流。（营造有序、支持、鼓励的课堂氛围，让学生更愿意参与、投入到课程内容中。教师鼓励积极的课堂交流，营造活跃的课堂氛围。）	
3	Cultivate students' abilities and learning disposition. (Cultivate students' ability to learn independently and a positive learning attitude, and provide students with appropriate support and challenges to promote their learning and growth.) **培养学生的能力和学**习态度。（**培养学生自主学**习的能力和积极的学习态度，为学生提供适当的支持和挑战，促进学生的学习和成长。）	

4	Believe in students' learning potential and abilities and guide students to dialogue and think. (Believe that every student has the potential and ability to learn, regardless of their background, characteristics or previous academic performance, and guide students to have in-depth, meaningful and inspiring conversations and thinking.) **相信学生的学**习潜能与能力，引导学生对话与思考。（相信每一位学生都有学习的潜能与能力，不论其背景、特质或过往的学业成绩如何，并引导学生进行深入、有意义、有启发性的对话与思考。）	
5	Ensuring appropriate professional relationships in lecturers-student interactions. (lecturers need to ensure an appropriate, professional relationship in their interactions with students.) **确保**师生互动中存在适当的专业关系。（教师需要确保与学生互动中存在适当的专业关系。）	
6	Sharing of personal experiences, opinions, emotions or ideas promotes student growth. (lecturers share personal experiences, opinions, emotions or ideas in appropriate contexts in a conscious and purposeful manner to enhance student learning and development.) **分享个人**经历、观点、情感或想法可促进学生成长。（教师在适当的情境中，有意识、有目的地分享个人经历、观点、情感或想法，以促进学生的学习和发展。）	
7	Have a positive attitude towards teaching activities and student learning. (Demonstrate enthusiasm, concern and a positive attitude towards teaching activities and student learning in the educational process.) 对教学活动和学生学习抱有积极的态度。（在教育过程中表现出对教学活动和学生学习的热情、关心和积极的态度。）	

Disposition Questions性格类题

Score based on self-mastery **根据自我掌握情况**评分	Incompetent 1 point **不**胜任 1 **分**	competence 2 points **有限**胜任 2**分**	Moderate competence 3 points **中等**胜任 3**分**	Limited Competent 4 points 胜任 4**分**	Very competent 5 points **非常**胜任 5**分**	
1	Facing other people's inquiries enthusiastically and actively questioning others. (lecturers can enthusiastically face inquiries from others and actively ask others.) 热情面对别人的询问，积极向别人提问。（教师能热情面对别人的询问，积极向别人提问。）					
2	Maintain an attitude of humility, open-mindedness and respect. (Maintain a humble, open-minded and respectful attitude, do not overemphasize one's status or authority, but are willing to listen to students' opinions, accept feedback, and continue to learn and grow.) **保持**谦逊、开放和尊重的态度。（保持谦逊、开放和尊重的态度，不过分强调自己的地位或权威，但愿意倾听学生的意见，接受反馈，并不断学习和成长。）					
3	Recognize and understand personal biases, stereotypes and discriminatory beliefs. (Ability to identify and understand biases, stereotypes or discriminatory beliefs that one may have and understand how these biases impact teaching and interactions with students.) 认识和理解个人偏见、刻板印象和歧视性信念。（能够识别和理解个人可能存在的偏见、刻板印象或歧视性信念，并了解这些偏见如何影响教学和与学生的互动。）					
4	lecturers-student interaction and educational attitude are correct, lecturers and students communicate and discuss, and lecturers-student interaction is good. (Demonstrate authenticity, honesty, and transparency in interactions and education with students, and be able to communicate with students in an open, honest, and supportive manner to discuss various difficulties, challenges, or issues students may face in their daily lives or outside the campus, maintain a friendly, approachable, equal and respectful attitude when interacting with students.) 师生互动与教育态度端正，师生沟通讨论，师生互动良好。（在与学生的互动和教育中表现出真实、诚实、透明，能够以开放、诚实、支持的态度与学生沟通，讨论学生在日常生活中或校外可能面临的各种困难、挑战或问题，在与学生互动时保**持友善、平易近人、平等、尊重的**态度。）					
5	Maintain a stable emotional state regarding educational challenges and student needs. (Ability to remain calm, peaceful, and emotionally stable in the face of a variety of educational challenges and student needs.) **保持**对教育挑战和学生需求的稳定情绪**状**态。（面对各种教育挑战和学生需求时能够保持冷静、平和和情绪稳定。）					

6	Maintain an inclusive and patient attitude towards students. (Maintain a tolerant and patient attitude towards students and be able to accept their shortcomings and mistakes.) 对学生保持包容和耐心的态度。（对学生保持宽容和耐心的态度，能够接受他们的缺点和错误。）	

Limitations and Future Research Recommendation

Limitations

This study investigates the current status of the teaching competence of visual communication design lecturers in Yunnan universities. The sample size is small, and the research results cannot be considered universal or representative of the teaching competence of all visual communication design lecturers in China. The evaluation index system for teaching competence constructed in this study may require more evaluation conditions and a broader scope. The application of this evaluation index system is limited and cannot be used to evaluate the teaching competence of lecturers in other majors in China.

Future Research Recommendation

Given these limitations, future research should aim to:

1. Increase Sample Size and Geographic Scope: Include more universities across China to enhance the representativeness of the findings.
2. Enhance Evaluation Criteria: Develop more comprehensive assessment criteria to capture a broader range of teaching competencies.
3. Adapt Evaluation Index System: Modify the system to be applicable to other majors, ensuring its relevance across different disciplines.
4. Conduct Longitudinal and Qualitative Studies: Provide deeper insights into teaching competence over time and from qualitative perspectives.
5. Collaborate with Educational Experts: Work with experts to refine and validate the evaluation system, ensuring its accuracy and reliability.

CONFLICT OF INTEREST AND ETHICAL STANDARDS

During the research period, there was no conflict of interest or unethical behavior related to the research content and the current organization.

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REFERENCES

Braun, V. & Clarke, V. (2006) Using thematic analysis in psychology, Qualitative Research in Psychology, 3:2, 77-101, DOI:10.1191/1478088706qp063oa https://doi.org/10.1191/1478088706qp063oa

Caena, F. & Vuorikari, R. (2022). Teacher learning and innovative professional development through the lens of the Personal, Social and Learning to Learn European key competence. European Journal of Teacher Education, 45(4), 456-475. https://doi.org/10.1080/02619768.2021.1951699

Cohen, L., Manion, L., & Morrison, K. (2017). Research Methods in Education (8th ed.). Routledge. https://doi.org/10.4324/9781315456539

Creswell, J. W., & Creswell, J. D. (2018). Research design: qualitative, quantitative, and mixed methods approaches (Fifth edition). Los Angeles: SAGE. 88-98

Hanushek, E. A., & Rivkin, S. G. (2012). The distribution of lecturers' quality and implications for policy. Annual Review of Economics, 4(1), 131-157.

Hou, S.I. (2020). Evaluating online courses via course-related competencies --A mixed-methods quasi-

experiment evaluation study of an HIV Prevention Web courses among college students. Journal of Scholarships of Teaching and Learning, 20(1), 22-39.

Kanval, N., Ihsan, H., Irum, S., & Ambreen, I. (2024). Human Capital Formation, Foreign Direct Investment Inflows, and Economic Growth: A Way Forward to Achieve Sustainable Development. Journal of Management Practices, Humanities and Social Sciences, 8(3), 48-61.

Li, C.& University, N.N. (2017). Study on the effect of teaching mode of school-enterprise on professional development of visual communication design. *Heilongjiang Science, 4*(3), 1104-1109.

Marpanaji, E., & Mahali, M. I. (2018). Survey on How to Select and Develop Learning Media Conducted by Teacher Professional Education Participants. *Journal of Physics Conference Series, 1140*(1). https://doi.org/10.1088/1742-6596/1140/1/012014

Meng, Q. L. (2017). A multi-dimensional approach to foster the practical teaching ability of college English normal students--taking Shaoguan University as an example. Journal of Shaoguan University, 5, 53-56.

Ministry of Education of the People's Republic of China. (2020). The fifth round of subject evaluation work plan (Online). http://www.moe.gov.cn/jyb_xwfb/moe_1946/fj_2020/202011/t20201102_497819.html

Ministry of Education of the People's Republic of China. 2020）. Comprehensively improve the educational and teaching abilities of college teachers in the new era.http://www.moe.gov.cn/jyb_xwfb/moe_2082/zl_2020n/2020_zl57/202010/t20201020_495742.html

Ministry of Education of the People's Republic of China. (2021). Guiding Opinions of the Ministry of Education and Six Other Departments on Strengthening the Reform of the Construction of the Faculty Team of Higher Education Institutions in the New Era. http://www.moe.gov.cn/srcsite/A10/s7151/202101/t20210108_509152.html

Neuman, W. L. (2003). Social Research Methods: Qualitative and Quantitative Approaches. Boston: Pearson Education.

Nye, B., Konstantopoulos, S., & Hedges, L. V. (2004). How large are lecturers' effects? Educational Evaluation and Policy Analysis, 26(3), 237-257.

Patton, M.Q. （1990）: Qualitative evaluation and research methods, second edition. Sage.

Punch, K. F. (2009). Introduction to research methods in education. Los Angeles; London: SAGE. p 144-147

Ravelli, L. J. & Leeuwen, T. V. (2018). Modality in the digital age. Visual communication, vol. 17, no. 3, 277-297

Ruloff, M. & Petko, D. (2021). School principals' educational goals and leadership styles for digital transformation: results from case studies in upper secondary schools, International Journal of Leadership in Education, DOI:10.1080/13603124.2021.2014979

Selvi, K. (2010). Teachers' competencies. International Journal of Philosophy of Culture and Axiology,7(1), 167–175.

Shulman, L. (1986). Those who understand: knowledge growth in teaching. Educational Researcher, 2, 55-59. https://doi.org/10.3102/0013189X015002004

Smith, K. & Hill, J. (2019). Defining the Nature of Blended Learning through Its Depiction in Current Research. Higher Education Research & Development, 38, 383-397.https://doi.org/10.1080/07294360.2018.1517732

Swank, J. M., Houseknecht, A. & Liu, R. (2021) Development of the teaching competencies scale, Assessment & Evaluation in Higher Education.

Swank, J. M., Liu, R., Colburn, A. A. N., & Williams, K. M. (2021). Development of the teaching competencies scale. Assessment & Evaluation in Higher Education, 46:3, 483-493, DOI: 10.1080/02602938.2020.1778634

Spanierman, L.B., Oh, E., Heppner, P.P., Neville, H.A., Mobley, M., Wright, C.V., Dillon, F.R. & Navarro, R. (2010). The multicultural teaching competency scale (MTCS): Development and initial validation. Urban Education.1-25. http://sagepublications.com.

Witzel, A. (2000). Das problemzentrierte Interview. Forum Qualitative Sozialforschung, 1(1). 22. http://www.qualitative-research.net/index.php/fqs/article/view/1132/2519

Wong, G., Greenhalgh, T., Westhorp, G., Buckingham, J., & Pawson, R. (2013). RAMESES publication standards: realist syntheses. BMC medicine, 11(1), 21.

Xie Jian, Chu Dan, Ge Han (2015). Research on the evaluation system of college teachers' teaching competencies based on hierarchical analysis. Chinese Adult Education. (4): 122-125.

Zhang, C & Zhao, Y. (2023). Design and Application of Multimedia Technology-Based Curriculum for Visual Communication Majors.Advances in Multimedia Volume 2023, Article ID 5061929, 11 https://doi.org/10.1155/2023/5061929

Zhao, Y. & Luo, Y. (2020). Autonomous learning mode based on a four-element teaching design for visual communication course. International Journal of Emerging Technologies in Learning (iJET).5(19).1-10.

Zhen Wang , Keqing Qian, Xiaoli Zhu, Xinyu Hu.(2023).Influences of online teaching ability of university lecturers on learning engagement of learners Vienna, International journal of emerging technologies in learning,

vol. 18, Iss. 5, 203-216. DOI:10.3991/ijet.v18i05.37809 https://doi.org/10.3991/ijet.v18i05.37809

Zhu, H. (2018). On the teaching of decorative painting for the major of visual communication design. *Journal of Landscape Research, 10*(4), 429-438.

Jam, F.A., Khan, T.I., Zaidi, B., & Muzaffar, S.M. (2011). Political Skills Moderates the Relationship between Perception of Organizational Politics and Job Outcomes.

Jam, F., Donia, M., Raja, U., & Ling, C. (2017). A time-lagged study on the moderating role of overall satisfaction in perceived politics: Job outcomes relationships. Journal of Management & Organization, 23(3), 321-336. doi:10.1017/jmo.2016.13