

Exploring a Supportive Ecosystem for Creative Teaching in Higher Education

Weijing Han and Nur Aira Abdrahim
Universiti Putra Malaysia, Malaysia
303679843@qq.com, nuraira@upm.edu.my

Abstract: This study aims to explore the construction of a supportive ecosystem in the development of teacher creativity within the education domain. The research primarily focuses on the emergence and development of teachers' individual creativity within the organizational context and their interaction with the organizational environment, in support of the teacher's professional development. As a result, the mechanisms underlying the occurrence of individual creativity within the organizational context are summarized, and supportive policies to foster teacher creativity development are proposed. This research has significant implications for the development of individual teacher creativity, professional development, and organizational creativity management.

Keywords: Ecosystem, creative teaching, higher education

1. Introduction

1.1 Background

In the era of rapid change and globalization, the field of education is facing unprecedented transformations and challenges. Particularly, since the outbreak of the COVID-19 pandemic, traditional teaching methods have been reshaped by modern technology and digital education. In this context, the ability of educators to adapt and embrace change, as well as creatively address challenges in educational practices, becomes crucial (Bruggeman et al., 2021).

In their professional careers, teachers encounter continuous learning and growth, and those possessing creativity are better equipped to adapt to the diverse demands of different subjects and teaching domains. They expand their teaching skills and educational perspectives through creative teaching practices and actively exploring new educational methods. This proactive approach helps teachers gain more opportunities and achievements in their professional development. Creativity is a skill that can be acquired through learning and experience (Kaufman & Sternberg, 2006). In order to foster teacher creativity, requisite and purposeful professional development is essential (Cropley & Patston, 2019).

Over the past few decades, the academic community has maintained a sustained enthusiasm for researching creative teaching. Scholars have primarily approached this issue from two perspectives: One aspect of research focuses on the implementation of creative teaching practices within the classroom. For example, researchers have explored the use of critical thinking cards (Holland & Ulrich, 2016), the integration of new teaching technologies (Madumarova et al., 2020) and the application of game-based approaches (McEnroe-Petitte & Farris, 2020) to foster creative teaching. On the other hand, there is an analysis of the influencing factors of creative teaching. These factors encompass personal aspects (Pashazadeh & Alavinia, 2019), leadership factors (Chen & Yuan, 2021), and environmental factors (Lapeniene & Dumciene, 2014). Scholars assert that a teacher's creative teaching is a part of the education system, which includes other subsystems such as school culture, leadership style, student characteristics, infrastructure, and even some broader collectives, like employment, admissions, social needs, and education policies. In this context, the creative behavior of teachers is not merely an individual act but requires maintaining a dynamic balance in the social environment (Zamana, 2022).

However, due to the context-specific nature of creativity (Cropley & Patston, 2019), the formation process and underlying mechanisms of creativity in the field of education still require further examination (Qian et al., 2019). Moreover, in practice, teachers continue to face formidable challenges in implementing creative teaching. Many educators lack a systematic understanding of creative teaching, and some even believe they do not possess creative

capabilities (Katzbuonincontro et al., 2020). Furthermore, the education sector still lacks a dedicated system for cultivating teacher creativity, and there is a notable absence of robust organizational support for teachers' creative teaching behavior (Borodina et al., 2019). These issues collectively impact the realization of creativity within educational organizations and also influence teachers' professional development prospects.

Therefore, this study aims to address the research gaps by adopting a managerial perspective, and investigating how creativity among teachers can be managed and fostered from an organizational standpoint. By doing so, it seeks to unveil the mechanisms through which teacher creativity is formed within the organizational context, promote the sustainable development of teacher creativity, and ultimately enhance teachers' professional growth as well as the continuous development of organizational creativity.

1.2 Research Objectives

This study aims to explore the creativity process in higher educational institutions through investigating the teachers' everyday creative teaching experience, reveal teachers' creativity mechanism in organizations and finally establish an ecosystem for teachers' creative teaching. In particular, this research lend support to the notion of teacher's professional development by exploring on the following research questions: (1) How teachers establish their creative teaching behaviors in the educational context? (2) How teachers' creative teaching behaviors interplay with the organizational context? (3) How to foster teachers' creativity in the organizational context?

1.3 Significance

This study carries both theoretical and practical significance within the body of knowledge. Theoretically, by exploring the mechanisms behind daily creative teaching, the study contributes to the broader understanding of creativity within educational settings. Practically, for individual teachers, it enables them to comprehend the process of creative teaching and provides timely assistance to enhance the efficiency of their creative teaching practices as part of their professional development. Second, for educational managers and administrators, the findings of this study provide valuable insights for developing supportive policies and creating an environment conducive to fostering creative teaching. This, in turn, helps cultivate a culture of sustained organizational creativity, leading to positive transformations and improvements within educational institutions.

2. Literature Review

2.1 The Concept of Creative Teaching

Previous scholars have mainly defined it in two ways. One view is that creative teaching refers to the creation and application of novel, new forms, innovative or creative teaching strategies to stimulate students' interest in learning (Gibson, 2010; Lee, 2011). Another way of thinking about creative teaching can also be defined as those behaviors that promote students' creativity (Liu et al., 2020). In this study, the creative teaching refers to the former.

2.2 The Dynamic Componential Model of Creativity (DCMC)

The inception of the DCMC model originated from understanding the daily experiences of employees engaged in innovation projects within organizations (Amabile & Pratt, 2016). Similarly, teachers, being frontline practitioners in education, also integrate creative teaching as part of their daily work.

The model describes the process of creativity in organizations in terms of both organizations and individuals. The organizational innovation process consists of five stages:

Stage 1: Agenda setting. Stage 2: Stage setting. Stage 3: Producing ideas. Stage 4: Testing and implementing the ideas. Stage 5: Outcome assessment. The individual creative process also consists of five stages: Stage 1: Task presentation. Stage 2: Preparation. Stage 3: Idea generation. Stage 4: Idea validation. Stage 5: Outcome assessment.

2.3 Theoretical Framework

This study attempts to employ the DCMC as the theoretical framework. Firstly, it intends to incorporate the five stages of both the organizational and individual levels from the DCMC model. Secondly, it analyzed the specific elements involved in creative teaching activities within the educational context. Finally, this study aims to analyze the mechanism of the teachers' creativity in the organizational context and propose the supportive ecosystem.

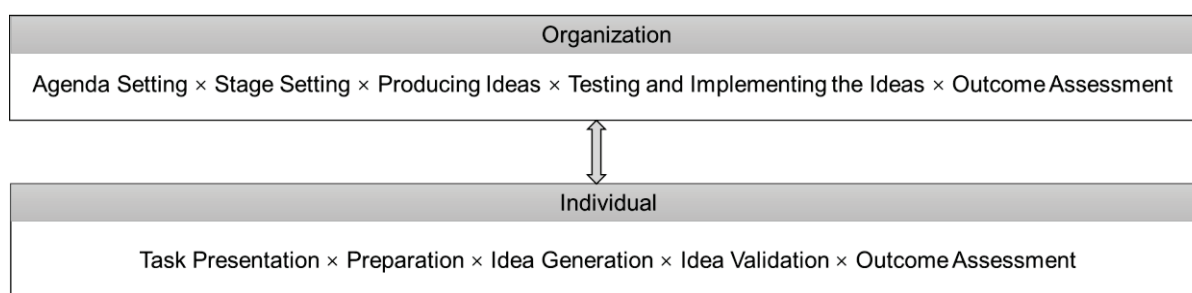


Figure 1. The theoretical framework

3. Method

3.1 Research Design

This study plans to employ a qualitative research approach and select a private university in China as the research case. In this research, creative teaching is considered a normalized teacher development activity, with a specific focus on cultivating creative teachers.

Specifically, this research intends to implement five stages of intervention measures based on the DCMC framework at the organizational level. These measures are aimed at fostering and supporting creative teaching among teachers within the selected private university. Additionally, at the individual level, five stages of intervention measures will be provided to support and enhance the creative teaching capabilities of individual teachers.

3.2 Sampling

The participants will be provided by the faculty, which will offer a list of candidates participating in the creative teaching competition. Formal participants will be chosen after obtaining the candidates' consent.

3.3 Data Collection

This study plans to employ three methods for data collection: interviews, observation memos, and reflective diaries. Interviews constitute the primary data collection method in this research and will involve both individual interviews and focus group interviews. Observation memos refer to the researcher's records during the research process. Reflective diaries will be maintained by the teachers, wherein they record their reflections and experiences throughout this process. By utilizing these three methods of data collection and employing triangulation, this research aims to enhance the trustworthiness and validity of the study.

4. Conclusion and Future Plan

This paper discusses the following conclusions based on the aforementioned discussion above. Creative teaching is a daily manifestation of creativity within the organizational context and constitutes an integral component of teachers' professional development. Organizations can foster the management of creative endeavors by constructing a supportive ecosystem, thereby enabling sustainable professional development for their employees.

This is an undergoing Ph.D study for the first author. Currently, the data collection for this study has been completed. With enthusiasm and dedication, the researcher is eager to immerse in the data analysis phase and explore the possibilities it holds.

References

- Anderson, R. E. (1992). Social impacts of computing: Codes of professional ethics. *Social Science Computing Review*, 10(2), 453-469.
- Borodina, T., Sibgatullina, A., & Gizatullina, A. (2019). Developing creative thinking in future teachers as a topical issue of higher education. *Journal of Social Studies Education Research*, 10(4), 226-245.
- Bruggeman, B., Tondeur, J., Struyven, K., Pynoo, B., Garone, A., & Vanslambrouck, S. (2021). Experts speaking: Crucial teacher attributes for implementing blended learning in higher education. *The Internet and Higher Education*, 48.
- Chen, H.-H., & Yuan, Y.-H. (2021). The study of the relationships of teacher's creative teaching, imagination, and principal's visionary leadership. *SAGE Open*, 11(3).
- Cropley, D. H., & Patston, T. J. (2019). Supporting creative teaching and learning in the classroom: Myths, models, and measures. In C. A. Mullen (Ed.), *Creativity Under Duress in Education?* (pp. 267-288). Springer.
- Gibson, R. (2010). The 'art' of creative teaching: Implications for higher education. *Teaching in Higher Education*, 15(5), 607-613.
- Holland, C., & Ulrich, D. (2016). Critical thinking cards: An innovative teaching strategy to bridge classroom knowledge with clinical decision making. *Teaching and Learning in Nursing*, 11(3), 108-112.
- Katzbuonincontro, J., Perignat, E., & Hass, R. W. (2020). Conflicted epistemic beliefs about teaching for creativity. *Thinking Skills and Creativity*(36), 100651.
- Kaufman, J. C., & Sternberg, R. J. (2006). *The international handbook of creativity*. Cambridge University Press.
- Lapeniene, D., & Dumciene, A. (2014). Teachers' creativity: Different approaches and similar results. *Procedia - Social and Behavioral Sciences*, 116, 279-284.
- Lee, Y.-J. (2011). A study on the effect of teaching innovation on learning effectiveness with learning satisfaction as a mediator. *World Transactions on Engineering and Technology Education*, 9(2), 92-101.
- Liu, H. Y., Tsai, H. M., Wang, I. T., & Chen, N. H. (2020, May - Jun). Predictors of self-perceived levels of creative teaching behaviors among nursing school faculty in Taiwan: A preliminary study. *J Prof Nurs*, 36(3), 171-176.
- Madumarova, M. K., Yusupova, A. M., Tilekova, N. D., Ismailova, B. T., Batyrkulova, A. B., & Batyrkulova, A. B. (2020). Modern ways of application of innovative teaching methods for the development of creative activity in the teaching process. In *Growth Poles of the Global Economy: Emergence, Changes and Future Perspectives* (pp. 37-47).
- McEnroe-Petitte, D., & Farris, C. (2020). Using gaming as an active teaching strategy in nursing education. *Teaching and Learning in Nursing*, 15(1), 61-65.
- Pashazadeh, F., & Alavinia, P. (2019). Teacher creativity in light of autonomy and emotional intelligence. *Teaching English Language*, 13(1), 177-203.
- Qian, M., Plucker, J. A., & Yang, X. (2019). Is creativity domain specific or domain general? Evidence from multilevel explanatory item response theory models. *Thinking Skills and Creativity*, 33, 100571.
- Zamana, F. (2022, Nov 10). The Future of Education as a Creative Ecosystem: A Sociocultural Framework for the Development of Creativity. *J Intell*, 10(4).