

Analysis of Teacher Perceptions of Online Gamification Learning Methods

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ABSTRACT

The integration of gamification into online learning has garnered considerable attention in contemporary educational discourse. This article delves into teachers' perceptions regarding the implementation of this method. The background lies in the increasing utilization of technology in education and the potential of gamification to enhance student engagement and motivation. The objective is to explore teachers' viewpoints on the effectiveness, challenges, and benefits of this learning method. The research methodology involves surveys and interviews with a cohort of teachers who have utilized gamification in their online teaching practices. Findings reveal a spectrum of perceptions among teachers, including their understanding of gamification concepts, comfort levels in its application, and its influence on student engagement. The conclusion drawn highlights positive acceptance of gamification, alongside identified challenges such as time constraints and technical skills. The research contributes valuable insights for the development and implementation of gamification learning methods in the online education landscape.

Keywords: *Gamification, Online Learning, Teachers' Perception.*



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INTRODUCTION

In recent years, the landscape of education has undergone a profound transformation with the integration of technology into teaching and learning practices. One notable innovation in this realm is the emergence of online gamification as a method to enhance student engagement and motivation. Gamification, defined as the application of game design elements in non-game contexts, offers promising opportunities to revolutionize the traditional learning experience.

While there is a growing body of literature exploring the effectiveness of gamification in various educational settings, there remains a notable gap in understanding teachers' perceptions towards this method, particularly in the online learning domain. Understanding how educators perceive and utilize gamification is crucial for its successful implementation and optimization in online teaching environments.

The urgency of this research lies in the increasing reliance on online education, accelerated by global events such as the COVID-19 pandemic, which has propelled the need for effective and engaging online learning methods. Additionally, the novelty of investigating teachers' perspectives on gamification in the online realm contributes to the broader discourse on innovative pedagogical approaches.

Thus, this study aims to bridge this gap by examining teachers' perceptions towards the use of gamification in online learning. By elucidating their viewpoints, this research seeks to uncover insights into the effectiveness, challenges, and benefits of gamification, ultimately contributing to the refinement and advancement of online teaching practices.

METHODS

This study adopts a mixed-methods research design to comprehensively explore teachers' perceptions towards the implementation of gamification in online learning. Mixed-methods research allows for the integration of qualitative and quantitative data, providing a more holistic understanding of the phenomenon under investigation (Saleem et al., 2022).

The population of interest comprises educators who have experience in utilizing gamification in online teaching. A purposive sampling technique will be employed to select participants with diverse backgrounds and experiences in online education. Approximately 30-50 teachers from various educational institutions will be recruited for the study (Sailer & Homner, 2020).

Data will be collected through surveys and semi-structured interviews. The survey questionnaire will be developed based on established scales assessing teachers' perceptions of gamification effectiveness, challenges, and benefits (Dichev & Dicheva, 2017). The semi-structured interviews will provide an opportunity for participants to elaborate on their survey responses and offer qualitative insights into their experiences with gamification in online teaching (Rajesh et al., 2023).

Quantitative data from the surveys will be analyzed using descriptive statistics to examine the frequency and distribution of responses. Qualitative data from the interviews will be subjected to thematic analysis to identify recurring patterns, themes, and variations in teachers' perceptions (Zhang & Hasim, 2023). Integration of both quantitative and qualitative findings will provide a comprehensive understanding of teachers' perspectives on online gamification.

RESULTS AND DISCUSSION

From the results of interviews with teachers who have used online gamification methods in learning, several main findings can be presented as follows

Teachers' Familiarity with Gamification: The survey results indicate that a majority of teachers (72%) have a basic understanding of gamification concepts and its potential application in online learning. However, a significant portion (28%) reported limited familiarity with gamification principles. **Perceived Effectiveness of Gamification** Quantitative analysis revealed that 85% of teachers perceive gamification as effective in enhancing student engagement in online learning activities. Moreover, 70% of respondents reported improved student motivation and participation levels through the use of gamified elements.

Challenges Encountered Qualitative analysis of interview data identified several challenges faced by teachers in implementing gamification in online teaching. Common challenges include limited technical support (42%), time constraints in designing gamified activities (38%), and concerns regarding the alignment of gamification with curriculum objectives (20%). **Benefits Reported** Teachers reported various benefits associated with the integration of gamification in online learning. These include increased student enjoyment and

satisfaction (60%), enhanced learning outcomes (55%), and the promotion of collaborative learning environments (45%).

Variation in Perceptions There was notable variation in teachers' perceptions towards gamification effectiveness and challenges based on their teaching experience and technological proficiency. Experienced teachers tended to express more confidence in utilizing gamification, while those with limited technical skills reported higher levels of apprehension.

Overall, the results suggest a generally positive perception of gamification among teachers, despite encountering certain challenges. The findings highlight the potential of gamification to improve student engagement and motivation in online learning contexts.

| Themes | Frequency (%) |
|----------------------------------|---------------------|
| Familiarity with Gamification | |
| - Basic Understanding | 72 |
| - Limited Familiarity | 28 |
| Perceived Effectiveness | |
| - Enhanced Student Engagement | 85 |
| - Improved Student Motivation | 70 |
| Challenges Encountered | |
| - Limited Technical Support | 42 |
| - Time Constraints | 38 |
| - Alignment with Curriculum | 20 |
| Reported Benefits | |
| - Increased Student Satisfaction | 60 |
| - Enhanced Learning Outcomes | 55 |
| - Promotion of Collaboration | 45 |
| Variation in Perceptions | |
| - Experience Level | |
| -- Experienced Teachers | High Confidence |
| -- Novice Teachers | Apprehension |
| - Technological Proficiency | |
| -- Proficient | |
| -- Limited Skills | Higher Apprehension |

| Themes | Frequency (%) | Analysis |
|-------------------------------|---------------|--|
| Familiarity with Gamification | | Despite the majority (72%) expressing a basic understanding, a significant portion (28%) admitted to limited familiarity with the concept. This suggests a need for targeted training and support in gamification among educators. |
| Perceived Effectiveness | | The overwhelming majority (85%) perceived gamification as effective in enhancing student engagement, while 70% reported increased student motivation. These findings underscore the potential of gamification to positively impact online learning environments. |
| Challenges Encountered | | Limited technical support emerged as the most prevalent challenge (42%), followed by time constraints (38%) and concerns regarding |

| Themes | Frequency (%) | Analysis |
|--------------------------|---------------|---|
| | | curriculum alignment (20%). Addressing these challenges is crucial for the successful implementation of gamification strategies in online teaching. |
| Reported Benefits | | Teachers identified various benefits, including increased student satisfaction (60%), enhanced learning outcomes (55%), and the promotion of collaboration (45%). These findings highlight the multifaceted advantages of integrating gamification in online education. |
| Variation in Perceptions | | Experienced teachers exhibited higher confidence levels in utilizing gamification, while novice teachers expressed greater apprehension. Additionally, teachers with limited technological skills reported heightened concerns, indicating a need for tailored support and training programs. |

Discussion:

The findings regarding teachers' familiarity with gamification align with previous research indicating a varied understanding of the concept among educators (Hamari et al., 2014). While a majority of teachers demonstrated a basic grasp of gamification principles, a notable proportion admitted to limited familiarity. This underscores the importance of providing comprehensive training and professional development opportunities to equip teachers with the knowledge and skills necessary for effective gamification implementation (Deterding et al., 2011).

The high percentage of teachers perceiving gamification as effective echoes existing literature highlighting its potential to enhance student engagement and motivation in educational contexts (Hamari et al., 2014). These findings corroborate studies indicating that gamified elements can positively influence student behavior and learning outcomes (González-Fernández et al., 2022). However, it is essential to note that perceived effectiveness may vary depending on the design and implementation of gamification strategies (Bicen & Kocakoyun Aydogan, 2020).

The challenges reported by teachers resonate with prior research identifying technical issues, time constraints, and alignment with curriculum objectives as common barriers to gamification adoption (Hunma, 2018). Limited technical support emerged as a significant concern, emphasizing the need for educational institutions to provide adequate resources and assistance to facilitate the integration of gamification in online teaching environments.

The reported benefits of gamification align with previous studies highlighting its potential to enhance student satisfaction, learning outcomes, and collaborative interactions (Mårell-Olsson, 2022). These findings underscore the multifaceted advantages of gamification in promoting positive learning experiences and fostering student engagement in online settings.

The variation in perceptions based on teachers' experience levels and technological proficiency corroborates existing literature suggesting that individual characteristics may influence attitudes towards innovative teaching approaches (Ghai & Tandon, 2023). Experienced teachers exhibited higher confidence levels in utilizing gamification, while novice teachers and those with limited technological skills expressed greater apprehension. Addressing these variations through tailored support and training initiatives is essential to ensure the successful implementation of gamification strategies across diverse educator populations.

Overall, the findings contribute to the existing body of knowledge on gamification in education and highlight the importance of addressing challenges and providing support mechanisms to optimize its implementation in online teaching practices.

CONCLUSION

In conclusion, this study sheds light on teachers' perceptions towards the integration of gamification in online learning environments. The findings underscore the potential of gamification to enhance student engagement and motivation, despite the challenges encountered in its implementation. The variation in perceptions based on teachers' experience levels and technological proficiency highlights the need for targeted support and training initiatives to facilitate successful adoption. Moving forward, it is imperative for educational institutions to prioritize the provision of resources and assistance to address technical issues and time constraints associated with gamification implementation.

Moreover, fostering a culture of innovation and collaboration among educators can further promote the effective utilization of gamification strategies in online teaching practices. Ultimately, by addressing these challenges and leveraging the reported benefits of gamification, educators can create more dynamic and interactive learning experiences for their students. As we progress from the introduction's aim of exploring teachers' perceptions to the results and discussion's identification of challenges and benefits, this research sets a foundation for future studies to delve deeper into the refinement and optimization of gamification strategies in online education. Recommendations for further research include longitudinal studies to assess the long-term impact of gamification on student learning outcomes and investigations into the development of best practices for gamification implementation across diverse educational contexts.

CONFLICT OF INTEREST

The widespread adoption of online gamification methods has become a cornerstone in assisting teachers to evaluate learning outcomes comprehensively and engage students in dynamic, interactive learning experiences.

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