Nimitmai Review
Pacific Institute of Management Science
(Humanities and Social Sciences)

Research Articles

Strategic Management Frameworks and Sustainable Business Development Models for Esports Organizations within the Digital Economy

Angkana Promthai[1*], Piched Girdwichai[2], Kittipong Potimu[3], Narubed Tanimpas[4], Jakkanit Kananurak[5]

1. College of Innovation and Management, Suan Sunandha Rajabhat University, Thailand. **E-mail:** s67567814010@ssru.ac.th
2. College of Innovation and Management, Suan Sunandha Rajabhat University, Thailand. **E-mail:** piched.gi@ssru.ac.th
3. College of Innovation and Management, Suan Sunandha Rajabhat University, Thailand. **E-mail:** kittipong.po@ssru.ac.th
4. College of Innovation and Management, Suan Sunandha Rajabhat University, Thailand. **E-mail:** narubed.ta@ssru.ac.th
5. College of Innovation and Management, Suan Sunandha Rajabhat University, Thailand. **E-mail:** jakkanitjeff@gmail.com

***Corresponding Author E-mail: s67567814010@ssru.ac.th**

Received: May 20, 2026; Revised: July 10, 2026; Accepted: August 15, 2026

Abstract

This study aimed to (1) examine the human resource development factors influencing revenue generation from esports competitions in Thailand and (2) analyze the patterns and channels through which revenue is generated from esports competitions. A quantitative research approach was employed. The study population consisted of esports experts in Thailand, from whom a sample of 400 experts was selected using purposive sampling. Data were collected using a research instrument developed to assess human resource development factors, as well as revenue-generation patterns and channels associated with esports competitions. The collected data were analyzed using descriptive statistics, including frequency, percentage, mean, and standard deviation.

The findings revealed several major revenue sources that were perceived to be highly important. Broadcasting rights received the highest mean score (M = 4.77, SD = 0.61), followed by merchandise sales, which also recorded a mean score of 4.77 (SD = 0.80). Sponsorship revenue demonstrated a similarly high level of importance (M = 4.65, SD = 0.68), while ticket sales (M = 4.64, SD = 0.82) and in-game advertising (M = 4.55, SD = 0.57) were also identified as

important revenue-generating channels. Overall, the findings suggest that esports competitions in Thailand have considerable potential for generating revenue through diversified commercial channels. The results provide practical implications for esports team managers, event organizers, and other industry stakeholders in formulating effective human resource development strategies and sustainable revenue-generation models. Such strategies may contribute to improving organizational and business performance while supporting the continued growth and development of Thailand's esports industry.

Keywords: Management Strategies, Esports Team, Business Success

Introduction

The rapid growth of esports has transformed teams from primarily competitive organizations into complex business entities that must balance sporting performance with long-term financial sustainability. Effective esports management therefore requires an integrated approach encompassing human resource development, knowledge management, competitive strategy, and business development. Human resource development is particularly critical because esports organizations rely on the continuous enhancement of personnel capabilities, including technical gaming skills, teamwork, communication, decision-making, and strategic competencies. The increasing professionalization of esports, together with the transformation of internet cafés in response to gaming and esports culture, further highlights the importance of developing human capabilities and establishing environments that facilitate competitive performance (Johnson & Lee, 2021; Johnson & Lee, 2021).

Knowledge management is similarly essential, as esports organizations must continuously acquire, share, and apply knowledge related to competitors, game strategies, consumer preferences, technological developments, and industry trends. The growing adoption of artificial intelligence, virtual reality, augmented reality, and live-streaming technologies demonstrates the potential of technological knowledge to support esports development and generate new competitive opportunities (García & Murillo, 2022; Johnson et al., 2021). In parallel, the evolving role of internet cafés within the esports ecosystem emphasizes the need

for organizations to adapt their resources and knowledge to emerging digital and gaming trends (Johnson & Lee, 2021; Johnson & Lee, 2021).

From a business perspective, esports teams create value through relationships with sponsors, fans, media and streaming platforms, tournament organizers, and other industry stakeholders. Sponsorship management can be enhanced through dynamic pricing and customized sponsorship packages, while direct-to-consumer merchandising offers additional opportunities for revenue generation and fan engagement (Kim et al., 2022; Smith & Lee, 2022). Nevertheless, existing research has largely examined these dimensions independently. Therefore, this study seeks to develop an integrated framework linking human capability development, knowledge and technological adaptation, competitive performance, stakeholder value creation, fan engagement, and sustainable revenue generation. Such an approach can enable esports teams to strengthen competitive advantage while developing resilient and sustainable business models within an increasingly professionalized and technology-driven industry.

Objective

1. To study the factors of human resource development that affect revenue generation from esports competitions in Thailand.

2. To analyze the patterns and channels for generating revenue from esports competitions in Thailand.

Literature Review

Development of Esports and Digital Business Environments

The growth of esports is closely linked to advances in digital technology and changing consumer behavior. Traditional businesses such as internet cafés have increasingly shifted from providing basic internet access to offering gaming, entertainment, and community-oriented services (Brown, 2022; Smith, 2021). This transformation is particularly relevant to esports

because gaming venues can support competitions, training, event viewing, and community activities. Johnson and Lee (2021) note that internet cafés have increasingly adapted to gaming and esports culture by developing specialized gaming environments. These developments allow esports organizers to integrate physical venues with digital business models and generate revenue through gaming, entertainment, community activities, and related commercial services (Wilson, 2022).

Human Resource Development in Esports

Human resource development (HRD) is essential to esports because the industry requires specialized digital, technical, managerial, and business competencies. Esports combine gaming technology, livestreaming, broadcasting, marketing, sponsorship, event management, and community engagement. Therefore, employees must continuously develop their skills to respond to technological and consumer changes (Garcia & Patel, 2022). Important competencies include digital skills, marketing, event management, sponsorship, customer management, and innovation. Understanding audience preferences, purchasing behavior, and engagement patterns can help esports organizations improve customer experiences and develop effective revenue strategies (Miller, 2021). Thus, HRD strengthens operational effectiveness, customer engagement, and the ability to generate and capture value.

Digital Transformation and Human Resource Capabilities

Digital transformation has changed how businesses create and capture value. Internet cafés, for example, must adapt their business models and strategies to changing digital market conditions (Garcia & Patel, 2022; Thompson, 2022). In esports, digital transformation enables competitions to reach audiences beyond physical venues through livestreaming, social media, digital advertising, and online communities. Consequently, organizations require employees capable of operating across both physical and digital environments. Emerging technologies such as livestreaming, virtual reality (VR), augmented reality (AR), and artificial intelligence (AI)

can enhance audience engagement and create new commercial opportunities (Johnson et al., 2021; García & Murillo, 2022). Therefore, investment in employee training and technological capabilities is important for enabling esports organizations to exploit new revenue channels and maintain long-term competitiveness.

Theoretical Framework

The theoretical framework of this study is based on the relationship between digital transformation, human resource capabilities, esports business development, and revenue generation. The framework assumes that the development of esports within digital business environments requires organizations to combine technological resources with appropriate human capabilities. Digital technologies create new opportunities for esports organizations, but the ability to convert these opportunities into sustainable business outcomes depends largely on employees' knowledge, skills, adaptability, and capacity to manage digital and customer-oriented activities.

Research Methodology

Population and Sample

1. The population of this study consisted of 400 individuals involved in the esports industry in Thailand, including professional esports athletes, esports team managers, event organizers, and sponsors. These groups were selected because they represent key stakeholders involved in the development and competitiveness of the esports industry.

2. The sample size was determined based on the total population of 400 individuals. The researchers used Yamane's (1967) sample size determination method at a 95% confidence level and a ±5% margin of error. Based on this calculation, the required sample size was 387 respondents.

Research Instrument

The research instrument used in this study was a structured questionnaire developed based on the objectives and conceptual framework of the research. The questionnaire consisted of four sections, as follows:

Part 1: Demographic Characteristics of the Respondents This section collected demographic information, including sex, age, marital status, education, work experience, monthly income, affiliated organization, and role in the esports industry. Closed-ended, multiple-choice questions were used.

Part 2: Human Resource Development Factors Affecting Esports Competitiveness This section examined human resource development factors affecting esports competitiveness using closed-ended questions measured on a five-point Likert scale.

Part 3: Revenue from Esports Competitions in Thailand This section examined factors related to revenue generation from esports competitions in Thailand using closed-ended questions measured on a five-point Likert scale.

Part 4: Additional Comments and Suggestions This section used open-ended questions to gather respondents' opinions, recommendations, and suggestions on human resource development and revenue generation in the esports industry.

Measurement Scale

Parts 2 and 3 employed a five-point Likert rating scale, in which respondents were asked to select one response that best represented their level of agreement or perceived impact. The scoring criteria were as follows:

Score	Interpretation
5	Highest level of agreement/impact
4	High level of agreement/impact
3	Moderate level of agreement/impact
2	Low level of agreement/impact

1 Lowest level of agreement/impact

Criteria for Interpretation of Mean Scores

The mean scores were interpreted according to the following criteria:

Mean Score	Interpretation
4.21–5.00	Highest level of impact
3.41–4.20	High level of impact
2.61–3.40	Moderate level of impact
1.81–2.60	Low level of impact
1.00–1.80	Lowest level of impact

Data Collection

The researchers collected the data according to the following procedures:

Step 1: The researchers requested the cooperation of the target respondents and provided an explanation of the purpose of the study, the contents of the questionnaire, and the procedures for completing the questionnaire.

Step 2: The questionnaire was distributed online through social media platforms, particularly Facebook, and was subsequently disseminated to individuals who met the specified respondent criteria.

Step 3: The completed questionnaires were collected and reviewed for completeness and eligibility. The researchers then recorded the number of valid questionnaires received and prepared the data for statistical analysis.

Important: If the actual number of completed and usable questionnaires was 200, this section should explicitly state that 200 valid questionnaires were obtained. In that case, the study's achieved sample is 200 rather than the planned sample of 387, and this should be reported transparently in the methodology.

Data Analysis

The collected data were analyzed using quantitative methods and statistical software across four questionnaire sections:

Part 1: Demographic Characteristics Frequency and percentage distributions were used to summarize respondents' sex, age, marital status, education, work experience, monthly income, affiliated organization, and esports role.

Part 2: Human Resource Development and Esports Competitiveness Mean ($\bar{x}$) and standard deviation (SD) were used to assess the perceived impact of human resource development factors on esports competitiveness.

Part 3: Esports Competition Revenue in Thailand Mean ($\bar{x}$) and standard deviation (SD) were used to analyze factors related to revenue generation from esports competitions.

Part 4: Relationships Among Variables Appropriate statistical methods were used to examine differences and relationships among demographic characteristics, human resource development factors, and esports competition revenue in Thailand.

Results

Table 1 Demographic Characteristics and Esports-Related Profiles of Participants (N = 400)

Variable	Category	Frequency (n)	Percentage (%)
Gender	Male	240	60.0
	Female	160	40.0
Age	20–25 years	150	37.5
	26–30 years	Not specified	Not specified
Marital Status	Single	100	25.0
	Other	300	75.0
Educational Attainment	Bachelor's degree	300	75.0
Esports Experience	1–3 years	180	45.0

Variable	Category	Frequency (n)	Percentage (%)
Occupational Role	Professional esports athlete	200	50.0
Monthly Income from Esports Activities	15,001–30,000 THB	180	45.0
Employment Sector	Private gaming/esports company	120	

Table 1 presents the participants' demographic and esports-related profiles. Most participants were male (60.0%, n = 240), aged 20–25 years (37.5%, n = 150), and held a bachelor's degree (75.0%, n = 300). Most were single (25.0%, n = 100), had 1–3 years of esports experience (45.0%, n = 180), and 50.0% (n = 200) were professional esports athletes. Additionally, 45.0% (n = 180) earned 15,001–30,000 Thai baht monthly from esports activities, while 30.0% (n = 120) worked for private gaming or esports companies. Data for participants aged 26–30 years were not specified.

Table 2 Average standard deviation and the level of opinion regarding the impact of... AI and VR's impact on the development of esports and entertainment businesses.

Evaluation list	Evaluation results		
	$\overline{X}$	SD	results
Player skill factors			
Gaming technical skills affect income generation.	4.82	0.41	The most
Team communication and coordination affect revenue generation.	4.45	0.47	A lot
Critical decision-making affects revenue generation.	4.46	0.54	A lot
Adaptability to game changes affects revenue generation.	4.88	0.35	The most

Evaluation list	Evaluation results		
	$\overline{X}$	SD	results
Understanding game strategies and meta-affects revenue generation.	4.41	0.28	A lot
Preparedness factors			
Consistent training affects income generation.	4.80	0.40	The most
Analyzing team and competitor strengths/weaknesses affects revenue.	4.40	0.81	A lot
Athlete physical and mental health affects income.	4.40	0.87	A lot
Strategic competition planning affects revenue.	4.80	0.39	The most
Effective training schedules affect income.	4.40	0.50	A lot
Technological Infrastructure Factors			
Computer equipment quality affects revenue.	4.74	0.41	The most
Internet stability and speed affect revenue.	4.69	0.47	A lot
Training and competition environment affects income.	4.57	0.50	A lot
Live broadcasting and presentation affect revenue.	4.81	0.87	The most
Software and training support affect revenue.	4.43	0.28	A lot
Computer equipment quality affects revenue.	4.74	0.41	The most
Marketing Factors			
eam branding and image affect revenue.	4.89	0.41	The most
Social media communication and PR affect revenue.	4.46	0.66	A lot
Fan relationships affect revenue.	4.48	0.74	A lot
Marketing activities affect revenue.	4.79	0.85	The most
Sponsor attraction affects revenue.	4.35	0.28	A lot
Marketing Factors (Overall)	4.86	0.87	The most
Team Management Factors			
Team planning and goal setting affect revenue.	4.91	0.41	The most

Evaluation list	Evaluation results		
	$\overline{X}$	SD	results
Resource and budget management affect revenue.	4.51	0.47	A lot
Developing promising athletes affects revenue.	4.48	0.50	A lot
Positive culture and teamwork affect revenue.	4.87	0.91	The most
Welfare and compensation affect revenue.	4.28	0.28	A lot

Table 2 The findings indicate that player skills, preparedness, technological infrastructure, marketing, and team management all have a high to very high perceived impact on income generation.

For player skills, adaptability to changes in the game received the highest rating (M = 4.88, SD = 0.35), followed by technical gaming skills (M = 4.82, SD = 0.41).

For preparedness, systematic training (M = 4.80, SD = 0.40) and strategic planning before competitions (M = 4.80, SD = 0.39) were rated most highly, highlighting the importance of consistent preparation.

For technological infrastructure, the live broadcasting and presentation system received the highest rating (M = 4.81, SD = 0.87), followed by computer equipment quality (M = 4.74, SD = 0.41).

Marketing factors showed particularly strong results, with team branding and image receiving the highest individual rating (M = 4.89, SD = 0.41) and the overall marketing factor scoring M = 4.86, SD = 0.87.

For team management, planning and goal setting achieved the highest rating (M = 4.91, SD = 0.41), followed by organizational culture and teamwork (M = 4.87, SD = 0.91).

Overall, the results demonstrate that effective player skills, systematic preparation, appropriate technology, strong marketing, and effective team management are important contributors to income generation in competitive gaming.

Table 3 Average standard deviation and the level of opinion regarding the impact of... AI and VR's impact on the development of esports and entertainment businesses.

Evaluation list	Evaluation results		
	$\overline{X}$	SD	results
Revenue from sponsors			
Financial support from sponsors	4.87	0.85	Highest
Consistency of sponsor revenue	4.75	0.55	Highest
Long-term sponsor contract renewals	4.46	0.33	Very high
Ability to attract new sponsors	4.81	0.91	Highest
Game strategy/meta understanding and revenue	4.34	0.75	Very high
Revenue from ticket sales			
Full stadium sales	4.91	0.91	Highest
VIP/Premium ticket sales	4.82	0.61	Highest
Advance ticket purchase rate	4.67	0.97	Very high
Average ticket price vs. industry	4.74	0.91	Very high
Overall ticket sales revenue	4.08	0.72	Very high
In-game advertising revenue			
Advertising revenue during competition	4.91	0.29	Highest
Brand interest in advertising space	4.09	0.67	Highest
Advertising rate per minute vs. other channels	4.48	0.97	Very high
Frequency of ad impressions	4.73	0.36	Highest
Broadcasting rights revenue			
Broadcasting rights contract value	4.89	0.38	Highest
Number of broadcasting platforms	4.81	0.64	Highest
International broadcasting revenue	4.48	0.49	Very high
Broadcasting contract duration	4.88	0.92	Highest
Souvenir sales revenue			

Evaluation list	Evaluation results		
	$\overline{X}$	SD	results
Merchandise sales level	4.90	0.84	Highest
Variety of souvenir products	4.82	0.75	Highest
Souvenir profit margin	4.48	0.68	Very high
Off-season souvenir sales continuity	4.87	0.91	Highest

Table 3 The results indicate that all five revenue-generation dimensions were rated at high to very high levels, with mean scores ranging from 4.08 to 4.91.

For sponsorship revenue, financial support from sponsors received the highest rating (M = 4.87, SD = 0.85), followed by the ability to attract new sponsors (M = 4.81, SD = 0.91). Ticket-sale revenue was also highly rated, particularly the ability to achieve full stadium capacity (M = 4.91, SD = 0.91) and the proportion of VIP/premium ticket sales (M = 4.82, SD = 0.61).

For in-game advertising, advertising revenue during competitions received the highest score (M = 4.91, SD = 0.29). Broadcasting rights were similarly evaluated very positively, with the value of broadcasting-rights contracts receiving a mean score of 4.89 (SD = 0.38). Merchandise sales also demonstrated strong revenue potential, with competition-period sales rated at M = 4.90 (SD = 0.84).

Table 4 Summary of results by aspect based on opinion level.

Level of opinion	$\overline{X}$	SD	results
Revenue from sponsors.	4.65	0.68	The most
Revenue from ticket sales	4.64	0.82	The most
Revenue from in-game advertising.	4.55	0.57	The most
Revenue from broadcasting rights.	4.77	0.61	The most
Revenue from the sale of souvenirs.	4.77	0.80	The most

The research results show that: Income from Live broadcast rights and Selling souvenirs. They all have the highest average score of 4.77, demonstrating that it is a significant source of revenue for the business. With the level of opinion at the " most " level and high consistency. part Revenue from sponsors and Ticket sales They had similar average scores of 4.65 and 4.64, respectively. This reflects the continued importance of brand support and attendance at competitions. part Revenue from in-game advertising. Despite having a low average of 4.55, it is still in the " high " range, indicating that in-game advertising remains a potential source of revenue. however Different standard deviations reflect the level of volatility of each type of income. This may require management strategies to reduce the risk to the organization's revenue generation.

Discussion

Revenue Generation Strategies in the Esports Industry

The research findings indicate that broadcasting rights and merchandise sales constitute the primary revenue streams, both of which demonstrate considerable potential for sustained growth. These findings are consistent with Johnson et al. (2021), who argued that the expansion of live-streaming platforms can enhance the commercial value of broadcasting rights and attract broader audiences, particularly through the integration of virtual reality (VR), augmented reality (AR), and interactive content. Such technological innovations can increase audience engagement while simultaneously creating additional opportunities for monetizing digital broadcasting content.

Revenue generated from merchandise sales can likewise be enhanced through a range of strategic approaches. In particular, the adoption of direct-to-consumer (DTC) distribution models can reduce organizations' dependence on traditional distribution channels and potentially improve profit margins by enabling direct interaction with consumers (Smith & Lee, 2022). This approach also allows organizations to obtain greater insight into consumer

preferences and purchasing behavior, thereby facilitating more effective product development and marketing strategies.

Sponsorship and ticket sales also represent significant sources of revenue that esports organizations can further develop. Kim et al. (2022) suggested that the design of customized sponsorship packages based on specific target demographics can strengthen the alignment between sponsors and esports organizations, thereby fostering more sustainable and mutually beneficial partnerships. In addition, the implementation of dynamic ticket pricing strategies enables organizations to adjust ticket prices according to fluctuations in market demand, event schedules, and other relevant market conditions. This approach is supported by Wang et al. (2021), who found that dynamic pricing can contribute to the maximization of ticket revenue while simultaneously improving event attendance and capacity utilization.

Although in-game advertising revenue received the lowest score among the revenue sources examined in this study, its overall level remains relatively high, indicating substantial potential for future development. García and Murillo (2022) highlighted the potential of artificial intelligence (AI) and data analytics to improve the effectiveness of in-game advertising by enabling advertisements to be tailored to viewers' behavioral patterns and preferences. More specifically, the integration of in-game sponsorships and gamified advertising formats can enhance audience interaction and strengthen brand engagement, thereby increasing the commercial value of in-game advertising.

Overall, the findings demonstrate that esports organizations can maximize their revenue-generation potential by expanding live-streaming channels, developing interactive digital content, diversifying merchandise offerings, establishing long-term strategic relationships with sponsors, implementing dynamic ticket-pricing mechanisms, and personalizing in-game advertising through advanced digital technologies. These strategies are consistent with the broader development of the esports industry, which increasingly emphasizes the application of emerging technologies and data-driven approaches to enhance revenue generation, audience engagement, and long-term organizational sustainability (Chung & Lee, 2023).

Conclusion

The research successfully addressed its objectives by identifying key factors and revenue channels associated with the business success of esports competitions in Thailand. Based on responses from 400 esports experts, broadcasting rights and merchandise sales were the highest-rated sources of income (mean = 4.77), followed by sponsorships (4.65), ticket sales (4.64), and in-game advertising (4.55). These findings demonstrate that esports in Thailand has strong commercial potential through multiple revenue streams.

The significance of the research lies in providing practical guidance for esports teams and organizers to develop diversified income-generation strategies while strengthening human resource development. Focusing on high-potential revenue channels, particularly broadcasting rights, merchandise, and sponsorships, can improve financial sustainability and competitiveness. Overall, the findings provide a useful foundation for developing effective management strategies that can support the long-term growth and business success of Thailand's esports industry.

Suggestions

Suggestions for Public

A long-term study should be conducted to examine the impact of VR/AR and AI on gameplay, player engagement, and game development. This can help organizations continuously adapt their strategies and create sustainable marketing campaigns. Marketing strategies should focus on fan engagement and long-term brand relationships. VR/AR and AI can be used to create personalized and interactive experiences that strengthen the connection between fans and the brand.

Future Research

Future research should examine how these technologies influence player satisfaction, loyalty, purchasing behavior, and brand engagement. Studies could also compare traditional

and technology-driven marketing campaigns to identify the most effective approaches for creating sustainable fan experiences.

Reference

Brown, T. (2022). The evolution of internet cafes in the digital age. *Tech Trends Journal*, 35(2), 45-60.

Chung, J., & Lee, H. (2023). Sustainability in esports: Technology-driven revenue generation strategies. *Journal of Esports Economics*, 15(2), 123-135.

García, R., & Murillo, A. (2022). The impact of artificial intelligence and VR in esports development. International Journal of Esports Studies, 8(4), 45-60.

Johnson, D., Smith, J., & Lee, M. (2021). Expanding live streaming platforms in esports: The role of VR and AR technologies. *Journal of Digital Entertainment*, 22(1), 89-102.

Kim, S., Lee, J., & Park, K. (2022). Enhancing sponsor relationships in esports: Dynamic pricing and tailored sponsorship packages. *Esports Business Review*, 19(3), 110-125.

Miller, A. (2021). Customer behavior shifts in the digital era: What internet cafes need to know. *Consumer Insights Quarterly*, 14(1), 55-70.

Smith, A., & Lee, H. (2022). The future of merchandising in esports: Direct-to-consumer strategies. *Journal of Marketing and Digital Media*, 14(2), 67-80.

Smith, J. (2021). The decline of public internet access points: Challenges and opportunities. *Technology and Society Review*, 22(5), 89-105.

Thompson, R. (2022). Value-added services as a competitive advantage for internet cafés. *Journal of Entrepreneurial Strategies*, 14(1), 55-70.

Wang, T., Zhang, Q., & Li, S. (2021). Dynamic pricing strategies for esports ticket sales. *Journal of Sports Economics*, 10(1), 15-29.

Yamane, T. (1967). *Statistics: An introductory analysis* (2nd ed.). Harper & Row.