

Identifying Barriers to the Use of Social Media in the Development of Sports Businesses

Barriers to the Use of Social Media in the Development of Sports Businesses

Abstract

Objective: The present study aims to identify the barriers to the use of social media in the development of sports businesses within a framework.

Methodology: The research employs an exploratory mixed-method approach (qualitative and quantitative), utilizing thematic analysis for the qualitative part and structural equation modeling for the quantitative part. The qualitative sample consisted of university professors and owners of sports businesses, with 17 individuals selected after reaching theoretical saturation. In the quantitative phase, 417 individuals, including professors, graduates, and postgraduate students in sports management and marketing from across the country, were selected as the sample. The research tools included semi-structured interviews for the qualitative part and a 32-item researcher-designed questionnaire derived from the qualitative findings for the quantitative part, with both content and construct validity confirmed, and reliability determined to be 91% using Cronbach's alpha. Data analysis was conducted using SPSS and Amos version 24.

Findings: A total of 151 open codes were extracted in this study, categorized into 7 variables. In the quantitative analysis, their prioritization included filtering restrictions, legal and regulatory barriers, political and economic obstacles, management challenges, cultural and social limitations, and deficiencies in technological infrastructure. Only insufficient knowledge regarding social media did not have a significant effect.

Originality: This research adopts an innovative approach to identifying the barriers to the use of social media in sports businesses in Iran. Unlike previous studies that have mainly focused on the benefits of social media, this research comprehensively identifies the existing challenges in this area and provides practical solutions for overcoming them. Given the specific conditions of sports businesses in Iran, this study can contribute to improving the management of these barriers and fostering their sustainable development.

Keywords: Online Marketing; Social Media; Sports Business; Sports Industry.

شناسایی موانع بکارگیری رسانه‌های اجتماعی در توسعه کسب و کارهای ورزشی

موانع بکارگیری رسانه‌های اجتماعی در توسعه کسب و کارهای ورزشی

چکیده

هدف: پژوهش حاضر با هدف شناسایی موانع بکارگیری رسانه‌های اجتماعی در توسعه کسب و کارهای ورزشی در قالب یک الگو انجام گرفته است.

روش شناسی: روش پژوهش از نوع آمیخته اکتشافی (کیفی_کمی) می‌باشد که در بخش کیفی از روش تحلیل مضمون و در بخش کمی از روش تحلیل معادلات ساختاری استفاده گردید. جامعه آماری در بخش کیفی شامل اساتید دانشگاه و صاحبان کسب و کارهای ورزشی می‌باشد که پس از رسیدن به حد اشباع نظری، ۱۷ نفر به عنوان نمونه آماری انتخاب شدند و در بخش کمی نیز ۴۱۷ نفر از اساتید، فارغ‌التحصیلان و دانشجویان تحصیلات تکمیلی مدیریت ورزشی و بازاریابی کل کشور به عنوان نمونه آماری انتخاب گردید. ابزار پژوهش در بخش کیفی شامل مصاحبه نیمه ساختار یافته و در بخش کمی، پرسشنامه محقق ساخته ۳۲ سوالی برگرفته از بخش کیفی بود که روایی صوری و سازه آن تایید و پایایی آن با آزمون آلفای کرونباخ ۹۱ درصد تعیین شد. تجزیه و تحلیل داده‌ها با استفاده از نرم‌افزار Spss و Amos نسخه ۲۴ انجام گرفت.

یافته‌ها: در این پژوهش تعداد ۱۵۱ کد باز استخراج گردید که در ۷ متغیر دسته بندی گردید. در بخش کمی اولویت‌بندی آنها به ترتیب شامل محدودیت‌های فیلترینگ، موانع حقوقی و قانونی، موانع سیاسی و اقتصادی، چالش‌های مدیریتی، محدودیت‌های فرهنگی و اجتماعی و نقص زیرساخت‌های فناوری می‌باشند. تنها دانش ناکافی نسبت به رسانه‌های اجتماعی اثر معناداری نداشت.

اصالت و ابتکار مقاله: این پژوهش با رویکردی نوآورانه به شناسایی موانع بکارگیری رسانه‌های اجتماعی در کسب و کارهای ورزشی ایران پرداخته است. برخلاف مطالعات قبلی که بیشتر به مزایای رسانه‌های اجتماعی توجه داشته‌اند، این تحقیق به صورت جامع چالش‌های عملی و مدیریتی را در این زمینه بررسی کرده و راهکارهای کاربردی برای رفع آنها ارائه می‌دهد. با توجه به شرایط خاص کسب و کارهای ورزشی در ایران، این مطالعه می‌تواند به بهبود مدیریت این موانع و توسعه پایدار آنها کمک کند.

واژه‌های کلیدی: بازاریابی آنلاین، رسانه‌های اجتماعی، صنعت ورزش، کسب و کار ورزشی.

1. Introduction

In the present era, social media has become an inseparable part of daily life and has profoundly impacted social and economic aspects. These platforms have fundamentally changed the way we communicate and exchange information by providing new avenues for online interactions. Particularly in the business world, social media has emerged as a key tool for brand promotion, customer acquisition, and strengthening relationships (Jamil et al., 2022). The sports industry has not been exempt from these changes, as social media plays a crucial role in shaping how athletes, teams, and clubs connect with their fans and audiences (Yalina & Rozas, 2020). Given the rapid expansion of social media and its increasing usage among adolescents and young adults—who are primary target groups for sports services and products—effective utilization of these tools has become a key priority in the development of sports businesses (Azadi, Askarian, Abdavi, & Ghasemi, 2023). Social media, relying on the technological foundations of Web 2.0, facilitates the creation and exchange of user-generated content (Kaplan & Haenlein, 2010). As one of the most effective communication tools, social media significantly influences the relationships between business owners and their customers (Algharabat, Alalwan, Rana, & Dwivedi, 2017). These platforms are recognized as key instruments for establishing direct communication with customers and enhancing their satisfaction and loyalty (Rathore, Das, & Ilavarasan, 2018). By fostering deeper interactions and collecting data, social media contributes to improving marketing strategies and attracting customers (Geurin, 2023). Additionally, optimal use of social media can assist sports businesses in increasing brand awareness and enhancing their website traffic (Alalwan, Dwivedi, Rana, & Williams, 2016). In fact, rapid advancements in information technology have enabled sports businesses to enhance customer communications and improve the customer experience through the implementation of innovative digital strategies (Palvia, Ghosh, Jacks, & Serenko, 2021). Research shows that the virtual space, as a widespread and low-cost communication tool, influences the improvement of startups by providing access to a broad customer base and reducing advertising costs (Rasouli & Azadi, 2022). Meanwhile, the sports industry also has the potential to benefit from social media and is gaining attention due to its role in creating diverse jobs (López-Carril, Escamilla-Fajardo, González-Serrano, Ratten, & González-García, 2020). Due to its high attractiveness and the dependence of fans on sports brands, the sports industry has leveraged social media to establish deeper interactions with its supporters. These tools not only help increase engagement but also enhance marketing strategies and customer acquisition by utilizing the collected data (Smith, 2024). Furthermore, social media has significantly improved sports brand management, sports advertising, and fan engagement, especially in the sports industry, which is characterized by loyal and passionate supporters (Abeza & Sanderson, 2022). The importance of this issue is further emphasized by the fact that sports generate demand for sports services and products, creating appeal for communities and laying the groundwork for the development of sports businesses (Acquah-Sam, 2021). In recent years, internet access and the development of social media platforms have dramatically increased the use of these communication tools among teenagers and young adults, who are the primary consumers of sports services and equipment (Newman, Peck, & Wilhide, 2017). The expansion of social media usage in recent years, particularly in Iran, has been remarkable. By early 2023, the number of social media users globally reached approximately 4.7 billion, with Iran accounting for 48 million users, equivalent to 54 percent of the total population. Additionally, internet access in Iran has reached 78.6 percent, with the number of internet users estimated at around 69.83 million (Dixon, 2024). This increase clearly indicates the high potential of social media in the sports business landscape of the country. Although the use of social media by sports businesses has become commonplace in developed countries, companies and sports organizations in Iran face several limitations (Azadi et al., 2023). Despite the many advantages that social media offers, there remains a need for a deep understanding of the factors that influence the success of these tools and the specific challenges that may arise in this journey (Jiang & Phakdeephrot, 2024).

The current state of research shows that, although social media is recognized as a powerful tool for increasing interactions and improving marketing strategies, there are significant gaps in understanding the key factors that can influence the success of these tools. Many studies have addressed the impact of social media on customer

interactions and brand recognition, but a more detailed analysis of the barriers that could limit the utilization of these tools in the sports industry has received less attention. Additionally, existing studies have not adequately examined the specific challenges that may affect the effective use of social media. These gaps indicate a need for more in-depth research and a more comprehensive model for the optimal development and utilization of social media in the sports industry. Considering the unique cultural landscape of Iranian society, sports companies and organizations face certain limitations in employing this method. The findings of this research can assist sports businesses in more effectively adjusting their marketing strategies and better leveraging available opportunities. In a context where a majority of the global population is active in the virtual space, online shopping has expanded, and trust in social media has increased, this presents an opportunity for sports businesses to maximize their utilization of these platforms. Designing a proposed model to identify the barriers to the use of social media in the development of sports businesses has numerous advantages. This model can improve marketing strategies and assist businesses in better utilizing social media, advertising, and interactions. Furthermore, by identifying and addressing these barriers, it can lead to increased revenue and the attraction of new customers.

Given the importance of this topic, the current research aims to identify the barriers to the use of social media in the development of sports businesses and seeks to provide a comprehensive model for optimal utilization of social media in the sports industry. Therefore, the overarching question posed by the researcher is: What are the barriers to the use of social media in the development of sports businesses in the context of a comprehensive model?

2. Theoretical background

With the rise of social media and its increasing influence in everyday life, leveraging these platforms for the development of sports businesses has become essential. However, numerous barriers hinder the effective utilization of social media, and understanding these barriers is vital for success in this field. The objective of this paper is to identify and examine the obstacles to utilizing social media in sports business development. In recent years, several studies have investigated the impact of social media on the development of sports businesses. Azadi et al (2023) identified factors influencing social media in the development of sports businesses, including the nature of social media, organizational structure, online marketing, management, culture and society, and human resources. Jeswani (2023), in his article titled *The Role of Social Media Marketing in Brand Building*, explored the profound impact of these platforms on interactions between businesses and their audiences. **The researcher** found that utilizing social media to accurately identify target audiences and create personalized content not only helps attract more customers but also significantly strengthens brand identity and increases customer engagement. Camacho, Mas, & Benítez (2022) showed that the communicative role, customer relationships, information disclosure, speed, customer engagement, reach, costs, recognition, publication content, and monitoring are among the contributions of social networks to startups. Bruce, Shurong, Akakpo, & Opong (2022) highlighted the influence of social media on the efficiency and effectiveness of startups from the perspective of a developing country. The results of Karimi, Bahrami, & Rasekh (2022) showed that implementing a paradigm model for advertising through social media impacts customers' willingness to purchase sports products, contributing to social and sociological development, marketing and economic growth, and purchasing development within the framework of social economic beliefs. The findings of Syaifullah, Syaifudin, Sukendar, & Junaedi (2021) indicated that the use of social media for marketing positively impacts the performance of small and medium-sized enterprises, particularly in sales growth, customer engagement, productivity, and creativity. Isozaki, Suyama, Imai, Arai, & Kobayashi (2021) found that the popularity of social media creates a positive mindset among business customers, serving as a high-capacity tool for customer communication with minimal costs, thereby generating extensive opportunities for business growth. Şahin, Demirsel, & Adam, (2020) in their study titled *The Effect of Social Media on Sports Marketing: The Case of Konyaspor Football Club*, found that the effective use of the club's social media significantly increases fans' tendency to consume the club's products. They demonstrated that factors such as obtaining information, communication, and sharing with others positively impact fans' consumer behavior and their inclination to purchase licensed club products. Pourhossein, Abdavi, Jawani, & Pashaei (2020) found that social networks significantly influence word-of-mouth advertising

through loyalty and attachment to brands among fans of Premier League football teams. Alam, Seyed Ameri, Khabiri, & Amiri (2018) discovered that using the social media marketing model of Iranian Premier League football clubs has cultural and social consequences, economic impacts, marketing-related consequences, fan-related consequences, and social media-related outcomes.

A review of the conducted studies indicates that social media has a significant impact on businesses. However, most of the research has focused on the role of these media in businesses, and there is a noticeable lack of studies that examine the barriers to the use of social media in the development of sports businesses, especially within the country. This highlights the necessity for such research. This issue has been identified as a research gap and a lack of practical solutions tailored to the culture and existing conditions in Iranian sports businesses, which has become the main objective of this study. Identifying the barriers to the use of social media in the development of sports businesses can assist decision-makers in formulating more effective strategies for utilizing these platforms. By understanding these barriers, actions can be taken to overcome them, thereby improving the performance of sports businesses.

3. Methodology

This study employed a mixed-method approach (qualitative and quantitative). In the qualitative section, thematic analysis was utilized, while the quantitative section employed Structural Equation Modeling (SEM). The target population for the qualitative part of the study included sports marketing professors and owners of sports businesses. In the quantitative section, the population consisted of all professors, graduates, and postgraduate students in sports management and marketing across the country.

The sample size for the qualitative section was determined to be 17 individuals. Non-random convenience sampling was employed in the qualitative section, using both purposive and snowball sampling methods. Initially, 8 participants were selected through purposive sampling to ensure that individuals with relevant knowledge and experience related to the research topic were included in the study. Subsequently, to complete the sample, 9 additional participants were selected through snowball sampling, where initial participants referred other individuals who were relevant to the research topic. These methods, considering time and resource constraints, as well as the difficulty of accessing a random sample, provided an efficient and accessible way to collect data. Based on the population size, the sample size was calculated to be 384 individuals according to Morgan's table. Ultimately, 417 valid questionnaires were collected and used in the statistical analysis. In the quantitative section, due to the large population and its geographical dispersion, the questionnaire was distributed both online and in person to ensure broad coverage. Non-random convenience sampling was used as this method, given the time and resource limitations, as well as the difficulty of reaching a random sample, was an efficient and accessible means of data collection. Based on Morgan's table, the sample size for the quantitative section was calculated to be 384 individuals. Ultimately, 417 valid questionnaires were collected and used in the statistical analysis.

The tool used in the qualitative section was semi-structured interviews, while the quantitative section utilized a researcher-made questionnaire based on the qualitative data, consisting of 35 questions (4 questions were designed for each variable). The validity of this tool was ensured through the opinions of sports management professors, and its reliability was calculated using Cronbach's alpha, which can be observed in the table below.

Table 1. Final Cronbach's Alpha for the Study Variables.

Variable	Number of Questions	Item Reliability	Overall Reliability
Legal and Regulatory Barriers	0.79	4	
Managerial Challenges	0.83	5	
Filtering Limitations	0.82	4	
Political and Economic Barriers	0.76	5	0.91
Lack of Knowledge and Awareness in Social Media	0.72	5	
Cultural and Social Limitations	0.85	4	
Deficiencies in Technological Infrastructure	0.81	4	

As shown in Table 1, the Cronbach's alpha coefficient for the reliability of the research questionnaire was obtained at 91 percent. Since the obtained coefficient is greater than 0.9, it can be interpreted that the reliability of the measurement tool is high. Additionally, due to the researcher-designed questionnaire, exploratory factor analysis was employed, and from the 35 designed questions, 3 questions had a factor loading of less than 0.5. The Bartlett test at a confidence level of 99 percent and the suitable value of the Kaiser-Meyer-Olkin (KMO) statistic indicate the correlation and appropriateness of the variables for conducting factor analysis. Table 2 presents the results of the factor analysis using the KMO statistic and the Bartlett test.

Table 2: Exploratory Factor Analysis, KMO, and Bartlett Test for Research Variables in Barriers Section.

Questions	Factor Loading	KMO	BT	Sig
Legal and Regulatory Barriers				
Business and Media Regulations	0.58			
Non-compliance with Intellectual Property and Copyright	0.69			
Lack of Clarity in Supporting Institutions	0.65	0.75	341.3	0.001
Legal Gaps in Supporting Social Media	0.54			
Management Challenges				
Negative Management Attitude and Lack of Support for Social Media	0.58			
Lack of Clear Goals for Using Social Media	0.69			
Financial Problems and Resources for Developing Social Media	0.37	0.49	127.4	0.001
Human Resources and Training Problems	0.71			
Management Resistance to Change and Innovation	0.65			
Filtering Limitations				
Limited Access to Social Media Due to Filtering	0.69			
Decreased Audience and Customer Communication Due to Filtering	0.60	0.89	1160.2	0.001
Additional Economic Costs	0.64			
Legal and Security Issues	0.66			
Political and Economic Barriers				
Political Interference in Social Media	0.56			
Monopoly of State Broadcasting	0.41			
Limitations of Some Foreign Social Media for Iranian Users	0.59	0.85	588.2	0.001
Infrastructure and Information Technology Problems	0.58			
Negative Attitude of Officials Towards Foreign Social Media	0.44			
Insufficient Knowledge About Social Media				
Lack of Education and Resources	0.81			
Lack of Technical Skills and Content Production	0.88	0.81	928.8	0.001
Inability to Analyze Data	0.80			
Lack of Awareness About Optimal Use of Media	0.88			
Unfamiliarity with Risks and Threats of Social Media	0.83			
Cultural and Social Limitations				
Negative Social Attitudes	0.89			
Cultural Barriers in Content Production and Consumption	0.83	0.85	1514.6	0.001
Weakness in Media Literacy in Society	0.86			
Lack of Awareness About Optimal Use of Media	0.80			
Technological Infrastructure Deficiencies				
Lack of Access and Poor Internet Quality	0.62			
Infrastructure and Information Technology Equipment Problems	0.62	0.61	445.3	0.001
Weakness in Security Systems and Data Security Assurance	0.80			
Lack of Investment and Financial Resources in Infrastructure	0.62			
Lack of Business Development				
Weakness in Attracting More Customers	0.85			
Increase in Unemployment	0.87	0.81	706.9	0.001
Recession in Sports Businesses	0.79			
Lower Revenue Generation	0.82			

As shown in Table (2), the exploratory factor analysis findings for this research indicated that the factor loading and variance of each identified item, except for three questions with a factor loading of less than 0.5, were higher than this threshold for the remaining 32 questions, confirming the validity of the questionnaire used. Therefore, in the statistical analyses, all 35 questions were utilized, with the three mentioned questions being

excluded due to their low factor loadings. These three excluded questions were from the variables of managerial barriers and political and economic barriers.

The method of data analysis in the qualitative section employed thematic analysis to identify the research variables. In the quantitative section, inferential statistical methods were used to calculate the construct validity of the questionnaire and to examine the exploratory factor structure using SPSS software version 24. The final model of the research was tested using structural equation modeling via AMOS 24 software.

4. Results

As previously mentioned, to identify the barriers to utilizing social media in the development of sports businesses, a sequential exploratory mixed-method approach (qualitative and quantitative) was employed.

4.1. Section One: Qualitative Research Findings

In the first phase, qualitative data were collected through in-depth interviews with the research participants to explore their perspectives. After reaching theoretical saturation, a total of 17 individuals were selected as the statistical sample using purposive non-random and snowball sampling methods. Out of the 17 participants, 8 were selected through purposive non-random sampling, and 9 were selected through snowball sampling. The descriptive findings of the participants and the codes used to analyze their interviews are presented in the table below.

Table 3. Distribution of Participant Groups in the Qualitative Section of the Research and the Codes Used.

Expertise	Frequency	Percentage	Codes Used
University Faculty	41.0%	7	P1, p2, p3, P4, P5, P6, P7
Managers of Sports Startups	24.0%	4	P8, p9, p10, p11
Activists in Business and Social Media	35.0%	6	P12, P13, P14, P15, P16, P17
Total	100.0%	17	

*Three of the participants were female, and the rest were male.

The participants in this stage included 7 members of the faculty in sports management and marketing with expertise in media and sports businesses, 4 managers of sports startups, and 6 activists in the business and social media sectors. The interviews were conducted in-depth using semi-structured questions, allowing for flexibility and a deeper exploration of the topics. Each interview lasted between 30 to 45 minutes. The main question asked at the beginning of the interviews was: 'What are the main barriers and challenges in utilizing social media for the development of sports businesses?' Based on this main question, additional, more specific questions were developed to explore various aspects of the topic and gather more detailed data, which helped in identifying additional codes for data analysis. The qualitative findings of this section aim to identify the variables related to the barriers to utilizing social media in the development of sports businesses. The table below shows the results of the coding derived from the conducted interviews in this section.

Table 4. Results of Open and Axial Coding from Interviews.

Category	Concepts	Final Codes
Barriers to the Utilization of Social Media in the Development of Sports Businesses	Legal Barriers	Burdensome business and media regulations, lack of supportive laws for social media, lack of transparency in media laws, copyright restrictions, harsh penalties for media violations, complex business registration requirements, deficiencies in data protection laws, limitations on online advertising, lack of legal credibility for online content, stringent laws for data collection, disregard for intellectual property rights, conflicts between local and national laws, lack of coordination among supervisory bodies, legal challenges arising from sanctions, legal threats over the use of others' content, high costs of legal consultations.
	Management Challenges	Lack of management support for social media, unstable management, lack of financial resources for social media development, absence of clear objectives for media use, inadequate training for managers, disregard for market needs in media, lack of effective communication between teams, insufficient expertise in social media management, difficulties in evaluating media performance, lack of coordination in decision-making, weakness in change management, absence of specific goals for media use, inability to analyze media data, inadequate internal communication, resistance to innovation, weakness in organizational culture, lack of a specialized team for media management, undefined roles in teams, internal pressures for changing approaches, lack of use of management consulting, insufficient time to review new trends, deficiencies in decision-making processes, internal challenges arising from organizational structure, lack of clarity in objectives, lack of analytical tools, inability to manage media crises.

Filtering Limitations	Access limitations to social media due to filtering, disruption in online communication, need for VPN to access, reduced credibility of businesses due to filtering, legal issues arising from the use of VPNs, negative impact on customer relations, reduction of audience due to filtering, additional costs for using VPN, security weaknesses due to VPN, inability to advertise effectively due to filtering, limitations in establishing contact with international brands, increased content management problems, inability to access analytical data, reduced diversity of content presented, impact on revenue generation from online advertising, limitations in engaging with foreign audiences, increased user dissatisfaction, limitations in online training, challenges in using digital tools, inability to conduct market research, reduced efficiency of advertising campaigns due to filtering, difficulties in conducting competitive analyses.
Political and Economic Barriers	The impact of macro and cultural policies on media activities and sports content production, regulatory and limited use of media due to domestic policies, instability in the country's political and economic environment, the impact of international sanctions and restrictions on the growth and activities of sports businesses, challenges related to maintaining public policies and freedom of expression, insufficient support for critical and analytical sports content, conflicts of interest and lack of coordination among various public and private entities, security challenges, weaknesses in managing macro crises, instability of supportive laws, difficulties in accessing international resources and information, reduced effective communication with global sports organizations, concerns over content feedback related to the government and the country's political environment, the need to improve information and communication technology infrastructure, public negative perception of social media, deficiencies in policy-making to support social media in sports, lack of private sector participation in the development of social media, and international legal challenges arising from differing laws.
Lack of Knowledge and Awareness of Social Media	Unfamiliarity with social media tools, lack of trust in social media, insufficient specialized training in this area, inability to analyze data, lack of necessary skills for content production, unawareness of new trends, lack of specialized consultations, failure to identify online audiences, weaknesses in communication skills, insufficient technical knowledge, inability to manage online crises, lack of practical experience in using media, failure to identify marketing strategies, weaknesses in planning online campaigns, inability to identify new opportunities, insufficient knowledge regarding competitor analysis, lack of familiarity with digital marketing principles, lack of proficiency in analytical software, absence of appropriate educational resources, lack of specialized books and articles, inability to use data for decision-making, lack of development of new skills, and lack of access to online training courses.
Cultural and Social Limitations	Social pressures on the use of these media, negative attitudes towards online content, cultural barriers in establishing communications, lack of family support for online activities, lack of awareness about optimal use of media, cultural biases, lack of acceptance of social media by certain groups, weaknesses in the community's media literacy, restrictions on providing specific content, resistance to cultural changes, absence of a culture of exchanging views in media, challenges arising from cultural differences, pressure to adhere to traditions and norms, lack of attention to cultural needs in content, lack of consideration for cultural diversity in media activities, insufficient local and relevant content, inability to build trust among audiences, lack of interaction with diverse communities, lack of cultural activities in media, absence of social support for media innovations, deficiencies in intercultural collaborations, cultural restrictions related to content, prejudices and discrimination, and the influence of traditional media patterns.
Technological Infrastructure Deficiencies	Lack of access to high-speed internet, inadequate information technology infrastructure, problems with necessary equipment and technology, weaknesses in online security systems and data security guarantees, insufficient development of communication networks, lack of investment in infrastructure, absence of suitable service centers, insufficient training related to infrastructure, technical challenges in project implementation, weaknesses in providing necessary hardware, problems in establishing international communications, lack of necessary capabilities in servers, absence of appropriate technical support, insufficient financial resources for developing infrastructure, inability to update systems, challenges arising from power and internet outages, absence of laboratories and research centers, lack of strategic plans to improve infrastructure, lack of international cooperation in infrastructure development, weaknesses in inter-institutional collaboration to improve infrastructure, and the need for national strategies to enhance technology infrastructure, issues arising from the lack of standardization in technological equipment, and challenges in securing specialized human resources for infrastructure.

As shown in the table above, from a total of 151 open codes identified, 7 key variables were extracted, which include legal barriers, managerial challenges, filtering limitations, political and economic barriers, lack of knowledge and awareness of social media, cultural and social limitations, and deficiencies in technological infrastructure. These barriers are recognized as serious obstacles to the effective use of social media in sports businesses. Not only do these barriers affect marketing processes, but they can also challenge the overall development and growth of these businesses. Especially considering the breadth and diversity of social media marketing subsets, addressing these challenges and barriers in each of the mentioned areas is essential. Such actions can significantly improve the current status of social media marketing and, consequently, contribute to the sustainable development of sports businesses.

4-2. Section Two: Quantitative Results of the Research

As explained in the previous section, the table below shows the frequency distribution of the personal characteristics of the participants in the quantitative part of the research. Of the total 417 sample respondents, 54% are male and 46% are female. Additionally, 41% are in the age range of 20 to 30 years, 43% between 30 to 40 years, and 16% are over 40 years old. In terms of education, 56% hold a doctorate, while 44% hold a master's degree.

Table 5. Demographic Characteristics of Participants in the Research.

Feature	Category	Frequency	Percentage
Gender	Female	191	46
	Male	226	54
Age	20 to 30 years	170	41
	31 to 40 years	180	43
	Over 40 years	67	16
Education	Master's Degree	183	44
	Doctorate	233	56

The Kolmogorov-Smirnov test in this section also indicated that the significance level of the main variables of the research is higher than the significance level of 0.05, therefore the data is normally distributed and parametric statistics will be used for data analysis. Table 6 shows the mean, standard deviation, and correlation between the main variables of the research among the sample respondents.

Table 6. Mean, Standard Deviation, and Correlation between Research Variables.

Row	Variable	Mean	Standard Deviation	Pearson Correlation Test	
				Not Development of	Significance Level
1	Legal Barriers	3.74	0.61	0.50	0.001
2	Managerial Challenges	3.61	0.69	0.53	0.001
3	Filtering Limitations	3.45	0.72	0.48	0.001
4	Political and Economic Barriers	3.92	0.56	0.59	0.001
5	Lack of Knowledge and Awareness	3.01	0.87	0.28	0.001
6	Cultural and Social Limitations	3.29	0.79	0.32	0.001
7	Deficiencies in Technological Infrastructure	3.60	0.60	0.43	0.001

As seen in Table 6, from the perspective of the sample respondents in this research, political and economic barriers have the highest mean (3.92), while the variable for insufficient knowledge has the lowest mean (3.01) among the research variables. To analyze the relationships between the researches variables, Pearson correlation tests were used; as observed, there is a significant relationship between all identified barriers and the lack of development of sports businesses (all data at a significance level of 0.001).

As mentioned in the methodology section, a quantitative survey method was used to test the proposed model of the research. The significance level of this test is determined by the standardized t coefficient. If the standardized t coefficient is greater than 1.96, it will be significant at 95% confidence. Figure 1 shows the output from the Amos software for the proposed model of the research with standardized coefficients.

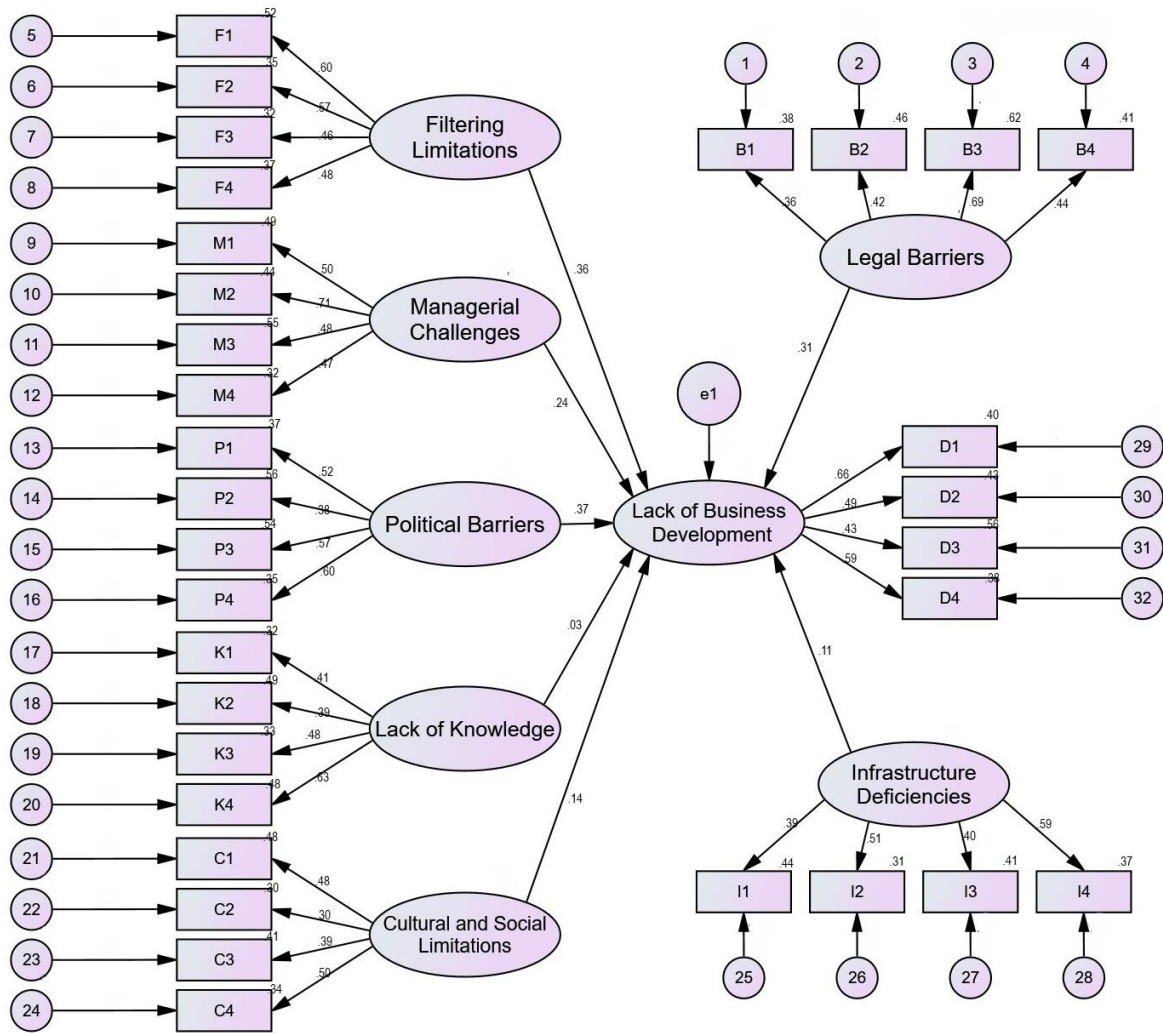


Figure 1. Structural Equation Modeling Test of Barriers to the Utilization of Social Media in the Development of Sports Businesses.

As shown in Figure 1 and Table 7, except for the variable of insufficient knowledge regarding social media, all other pathways in the proposed research model were confirmed. Among these, the highest impact was related to the barrier of filtering, with a value of 36%.

Table 7. Results of the Structural Equation Modeling of the Research Model in Order of Impact.

Rank	Path	Effect Size	T-Statistic	Significance Level
1	Filtering Limitations ---> Lack of Business Development	0.36	5.29	0.001
2	Legal Barriers ---> Lack of Business Development	0.31	4.86	0.001
3	Political and Economic Barriers ---> Lack of Business Development	0.29	4.21	0.001
4	Managerial Challenges ---> Business Development	0.24	3.89	0.001
5	Cultural and Social Limitations ---> Lack of Business Development	0.14	2.93	0.001
6	Deficiencies in Technological Infrastructure ---> Lack of Business Development	0.11	2.61	0.001
7	Lack of Knowledge and Awareness ---> Lack of Business Development	0.03	0.49	0.102

According to Table 7, the assessment of the barriers to utilizing social media in the development of sports businesses indicates that the absolute value of the T-statistic for the path of filtering on business development is

5.29, which is greater than 1.96, meaning that at a 95% confidence level, filtering limitations have a significant impact on the development of sports businesses with an effect size of 50%. Other pathways also demonstrated significant effects; except for the effect of the factor of insufficient knowledge, which has a T-statistic value of less than 1.96 and a significance level greater than 0.05, hence its effect was not confirmed.

Based on the effect sizes of the identified variables in this research, among the 7 identified barriers affecting the development of sports businesses through social media, 6 factors had a significant impact, which are prioritized as follows: filtering limitations (36%), legal barriers (31%), political and economic barriers (29%), managerial challenges (24%), cultural and social limitations (14%), and deficiencies in technological infrastructure (11%). The results of all the effects of the proposed model's variables are visible in Table 7.

To confirm the model, it is also necessary to validate its fit. Various methods exist to evaluate the overall goodness of fit of the model with the observed data. These tests answer the question of how well the model aligns with the research data. The relevant indices, along with the coefficients obtained from the research, are presented in the table below.

Table 8. Fit Indices for the Research Model.

Indices	AGFI	GFI	CFI	IFI	NFI	RMR	RMSEA	CMIN/DF
Acceptable Value	>0.90	>0.90	>0.90	>0.90	>0.90	<0.10	<0.10	<3
Fit Values	0.94	0.93	0.90	0.89	>0.91	0.12	0.083	2.92

Based on the values of the indices presented in Table 8, it is observed that the chi-square to degrees of freedom ratio is less than 3, indicating an appropriate fit of the model. Additionally, the fit indices NFI, CFI, IFI, GFI, and AGFI are all above 0.90, and the values of RMSEA and RMR are less than 0.10, which confirm the validity of the model.

5. Managerial implications

The findings of this research highlight several critical implications for managers in the sports business sector seeking to effectively utilize social media for development and growth. The identified barriers to social media utilization necessitate a strategic approach to overcome these challenges, ensuring that organizations can leverage digital platforms for marketing, audience engagement, and brand enhancement.

1. **Legal and Regulatory Considerations:** Managers must navigate the complex legal landscape surrounding social media use in their marketing strategies. Understanding and complying with existing laws and regulations is crucial. Organizations should invest in legal consultations to ensure adherence to copyright laws, data protection regulations, and advertising guidelines. Developing clear policies and protocols for social media use that align with legal requirements can help mitigate risks and enhance credibility.
2. **Enhancing Management Support and Training:** The qualitative findings emphasize the importance of managerial support in adopting social media strategies. Leaders should foster an organizational culture that encourages innovation and experimentation with social media platforms. This can be achieved through targeted training programs aimed at improving employees' skills in social media management, content creation, and data analysis. By empowering staff with the necessary tools and knowledge, organizations can enhance their social media effectiveness.
3. **Addressing Filtering Limitations:** Given the significant impact of filtering on social media access and content dissemination, managers should develop contingency plans to navigate these challenges. This includes exploring alternative platforms or channels that are less affected by filtering regulations and investing in VPN technologies where permissible. Additionally, managers should engage in advocacy efforts aimed at promoting more favorable regulatory environments for digital communication in the sports sector.
4. **Fostering Awareness and Knowledge:** To combat the lack of knowledge and awareness regarding social media among employees, organizations should implement continuous education initiatives. Workshops, seminars, and access to online resources can help build competencies related to digital marketing, audience

analysis, and content strategy. Encouraging a learning mindset can significantly enhance the organization's overall social media capabilities.

5. **Cultural Sensitivity and Community Engagement:** The cultural and social limitations identified in the research call for a deeper understanding of the local audience. Managers should prioritize culturally relevant content that resonates with their target demographic. Engaging with the community through localized campaigns and user-generated content can foster trust and improve brand loyalty. Additionally, organizations should strive to create an inclusive environment that reflects diverse perspectives and encourages open dialogue.
6. **Infrastructure Investment:** To overcome technological infrastructure deficiencies, managers should prioritize investments in IT capabilities, ensuring that the organization has access to high-speed internet, updated hardware, and secure systems. Collaborating with tech providers to enhance infrastructure and staying informed about technological advancements can facilitate better engagement on social media platforms.
7. **Continuous Evaluation and Adaptation:** Lastly, organizations must adopt a proactive approach to evaluating their social media strategies. Regular assessments of performance metrics, audience feedback, and market trends will allow managers to adapt their strategies in real time, ensuring that their social media efforts align with evolving consumer needs and technological advancements.

By addressing these managerial implications, sports organizations can better navigate the barriers to utilizing social media, ultimately enhancing their marketing effectiveness and fostering sustainable growth in the competitive sports industry.

6. Conclusion

Given the rapid advancement of technology and the expansion of social media, these tools are recognized as vital opportunities for advertising and communicating with business audiences. However, sports businesses in Iran face numerous challenges that hinder their full exploitation of these opportunities. Therefore, this study has focused on identifying and analyzing the barriers to the utilization of social media in the development of sports businesses in Iran. In this research, seven variables were identified as barriers to the use of social media in the development of sports businesses, which are prioritized as follows: filtering limitations, legal barriers, political and economic barriers, managerial challenges, cultural and social limitations, and deficiencies in technological infrastructure. The only barrier that did not have a significant impact was the lack of knowledge regarding social media. The analysis and discussion of these findings follow.

Filtering is identified as the largest barrier in this research, with a 36% impact, having profound negative effects on the performance of social media in developing sports businesses. Conforti et al. (2016) also noted the negative impact of filtering on online business activities in their research (Conforti, La Rosa, & Ter Hofstede, 2016). Filtering is clearly identified as the most significant barrier and adversely affects the performance of social media in the development of sports businesses. These restrictions lead to reduced online interactions and decreased access to target audiences. To mitigate the negative effects of filtering, it is recommended that businesses utilize not only credible social media platforms but also alternative and local platforms that are less affected by filtering. Additionally, creating creative digital marketing strategies and diversifying produced content can help alleviate the adverse effects of filtering.

Legal barriers are recognized as the second most important obstacle, with a 31% impact. The results of this study align with the research of (Srebalová, Horvat, Vačok, Vojtech, & Filip, 2020), which addressed the restrictive impact of laws on the development of digital businesses. Strict regulations in many countries hinder the effective implementation of marketing and advertising strategies on social media, preventing businesses from fully capitalizing on the potential of these platforms, thereby missing growth opportunities. Sports businesses face challenges in complying with existing laws, such as understanding the complexities of regulations and frequent changes in them. Non-compliance can lead to penalties, business closures, and damage to brand credibility. To reduce the impact of these barriers, collaboration with legal advisors is recommended. This collaboration can assist businesses in complying with laws and identifying legal risks. Furthermore, sports businesses should seek legal reforms through participation in legislative processes and collaboration with government entities. Such measures can help create a more favorable environment for the development of digital businesses and provide new opportunities for utilizing social media. Addressing legal barriers requires an active

and strategic approach that includes identifying and understanding these barriers and taking actions to comply with regulations and collaborate with relevant entities. This will lead to improved business performance and sustainable development of the sports industry.

Political and economic barriers are identified as the third major factor in the utilization of social media in the development of sports businesses, accounting for 29%. These barriers not only affect access to media platforms but also impact online interactions and the ability of businesses to advertise and market. Existing policies within the country have restricted access to well-known global platforms. These limitations prevent businesses from effectively using these tools to attract customers and promote their products and services. To address these barriers, businesses should seek to establish effective relationships with government entities. These connections can facilitate access to resources and necessary facilities for utilizing social media. A key strategy for confronting political barriers is to use domestic platforms. These platforms usually have greater compatibility with local laws and can serve as substitutes for global platforms. Businesses can focus on domestic platforms to create target communities and enhance interactions with customers.

Managerial challenges include a lack of adequate knowledge and familiarity with social media tools and the absence of effective strategies in this area. This finding aligns with the research of (Cubric, 2020), which identified managerial barriers in the utilization of modern technologies in advancing businesses. Managerial challenges encompass insufficient knowledge and familiarity with social media tools. The absence of specific strategies can lead to an underutilization of existing potentials and reduced effectiveness of advertising and marketing. To address these challenges, it is essential to conduct training courses for managers and staff regarding the use of social media and digital marketing. These courses can help enhance the necessary knowledge and skills for creating and implementing effective strategies. Furthermore, creating suitable platforms for sharing experiences and knowledge among sports businesses can improve managerial skills. One effective approach could be to establish training groups and joint workshops among various managers to benefit from each other's experiences. Additionally, utilizing consultants and experts in this field can assist businesses in designing and executing better strategies. Ultimately, creating an organizational culture that values continuous learning and innovation can help sports businesses address existing managerial challenges and effectively leverage the benefits of social media. By focusing on training, knowledge sharing, and improving managerial strategies, sports businesses will be able to make better use of social media's potential and continue to grow and develop.

Cultural and social limitations have also been identified as one of the barriers, accounting for 14%. Cultural and social limitations can influence the acceptance and use of social media. These limitations include traditional attitudes and societal beliefs regarding online advertising and marketing. In societies where cultural values hold more conservative views towards new technologies and digital communications, the acceptance of social media as marketing and advertising tools may face resistance. This resistance may arise from uncertainty about the security of personal information, concerns about online fraud, or even ignorance about the benefits of using social media. For sports businesses, these barriers are particularly challenging, as many of them require extensive advertising and continuous communication with fans and customers. Without effective acceptance and use of social media, sports businesses may not be able to take advantage of advertising, marketing, and communication development opportunities. One crucial strategy for overcoming these limitations is to raise public awareness through educational advertising. Such education can emphasize online purchasing security, the benefits of using social media, and their role in improving communications and developing businesses. Therefore, to foster the growth of sports businesses in societies with cultural and social limitations, approaches aligned with the values and beliefs of those communities need to be adopted, utilizing educational tools and reputable figures to enhance public trust and acceptance of social media.

Deficiencies in infrastructure, including technological and internet-related issues, have also been identified as barriers, and the results of this research are consistent with the research of (Omelianenko et al., 2024), which explored existing challenges in digital infrastructure. One of the main infrastructural problems is the lack of access to quality internet. In many areas, especially in less developed regions, low quality and insufficient internet speed not only limit the use of social platforms but also challenge online interactions and regular updates. Businesses without access to quality internet cannot capitalize on marketing opportunities, thereby diminishing their chances for growth and development. Investment in improving technological and internet infrastructure in these areas is essential to establish stronger and more sustainable internet networks and to enhance the conditions for utilizing digital technologies. Collaborating with government entities to secure quality internet can also help

improve access to social media. Businesses can assist this goal by requesting the government to create the necessary infrastructure and invest in internet projects. Ultimately, infrastructural weaknesses are a serious barrier to utilizing social media in developing sports businesses. Identifying these barriers and taking actions to improve infrastructure and collaborate with government entities can help businesses effectively leverage social media and contribute to the growth and development of the sports industry.

Based on the findings of this research regarding the barriers to utilizing social media for the development of sports businesses, it is evident that these issues clearly represent serious and multifaceted challenges that sports businesses in Iran face. This research has identified the main barriers, which include filtering, legal barriers, political barriers, managerial challenges, cultural and social limitations, and deficiencies in technological infrastructure. Each of these factors significantly impacts businesses' ability to effectively use social media and reduces the efficiency and effectiveness of advertising and marketing activities. Filtering, as the largest barrier, clearly has a serious impact on access to information and online interactions and hinders effective communication with customers. Additionally, strict regulations and political barriers can diminish public trust in social media and related products. Accurately identifying these barriers is essential for managers and policymakers to develop effective strategies for improving conditions and facilitating the use of social media. The practical recommendations from this research include enhancing infrastructure, increasing awareness and training regarding effective social media usage, and employing strong communication strategies. Emphasizing collaboration with government entities and improving relevant regulations can help facilitate the activities of sports businesses and reduce existing limitations. Furthermore, considering the important role of social media in business development, addressing barriers and providing practical solutions can contribute to the success and sustainable growth of sports businesses in Iran. Adopting a comprehensive and multifaceted approach to managing these barriers not only helps improve current conditions but can also lead to the establishment of a favorable environment for the future growth and development of these businesses. Ultimately, this research serves as a foundation and information resource for future studies in this area and can contribute to the advancement of knowledge in utilizing social media in the sports industry.

Disclosure statement

The authors declare that there are no potential conflicts of interest regarding the research conducted in this study. The findings and conclusions presented in this paper are solely those of the authors and do not reflect the views or opinions of any affiliated organizations or individuals.

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