Journal of Project Management 10 (2025) ***-***

Contents lists available at GrowingScience

Journal of Project Management

homepage: www.GrowingScience.com

Analysis of policy regulations and market access as drivers of collaboration in enhancing sustainable competitiveness in the project creative industry

Lukmandono^{a*}, Ni Luh Putu Hariastuti^a, Mochamad Junaidi Hidayat^b, and Zeplin Jiwa Husada Tarigan^c

^aDepartment of Industrial Engineering, Adhi Tama Institute of Technology Surabaya ^bDepartment of Product Design, Adhi Tama Institute of Technology Surabaya ^cSchool of Business and Management, Petra Christian University, Siwalankerto 121-131, Surabaya, Indonesia

ABSTRACT

Article history: Received October 2, 2024 Received in revised format December 25, 2024 Accepted March 7 2025 Available online March 7 2025 Keywords: Government regulations and policies Access to market Collaboration and networking Creative industries Competitiveness This study uses a structural equation model to analyze the role of regulation and policy with market access through collaboration and networking to sustainably improve the creative industry's competitiveness. Questionnaires were distributed to respondents in the creative sector in four big cities in Indonesia, namely Surabaya, Bandung, Yogyakarta, and Solo. The results of distributing questionnaires to 280 respondents and 250 questionnaires can be further processed with a response rate of 89.29%. Based on the goodness of fit test results, the model tested fits the data very well. All evaluation criteria met or exceeded the recommended values. Market access is the most influential variable on collaboration, networking, and competitiveness in the creative industry, with a coefficient value of 0.60. Collaboration and networking are essential variables in improving creative sectors, with a coefficient of 0.59. Although influential on collaboration and networking, regulations and policies do not significantly affect the creative industry's competitiveness because the coefficient index value is -0.11. However, rules and guidelines can indirectly affect the competitiveness of the creative sector through collaboration and networking, with a coefficient value of 0.189. The practical contribution of research provides insight for the government to create policies and regulations that support the creative industry and protect imported products so they do not kill domestic creative products. Contribution for practitioners to build collaboration with various parties in the country and build market access so they can export products. Theoretical contributions can enrich studies on resources-based views and national competitiveness.

© 2025 by the authors; licensee Growing Science, Canada.

1. Introduction

The existence of a global economic revolution and an increasingly advanced industry requires every business actor to be able to design and formulate their business strategy to adapt to changes in the business environment (Siagian & Tarigan, 2021). Business actors are forced to have higher competitiveness targets due to uncertain technological and economic changes to achieve sustainable competitive advantage (Liu, 2020; Hariastuti et al., 2021; Alrajhi, 2025). This will undoubtedly impact all industries, especially creative ones (Mahrinasari et al., 2024; Khlystova et al., 2022). The creative industry in Indonesia continues to develop rapidly, with various projects prioritizing innovation, digitalization, and collaboration (Yuniarta & Purnamawati, 2023). Through different policies and regulations, the government seeks to create an ecosystem that supports this industry's growth, including providing incentives, protecting intellectual property rights, and access to funding. Projects in the creative industry are increasingly integrated with digital technology, enabling business actors to expand their market reach both at the national and global levels (Mbaidin, 2024). The success of these projects shows that with the proper regulations and strong ecosystem support, creative industries can be a key driver of economic growth. Collaboration and networking are essential aspects of the sustainability of creative industry projects in Indonesia (Basuki et al., 2023). Many initiatives encourage synergy between industry players, government, academics, and the creative community to create more competitive products and services. Creative industry players can access greater resources, technology, and market

* Corresponding author

ISSN 2371-8374 (Online) - ISSN 2371-8366 (Print) © 2025 by the authors; licensee Growing Science, Canada. doi: 10.5267/j.jpm.2025.3.003

E-mail address lukmandono@itats.ac.id (Lukmandono)

2

opportunities with a vast network. Besides that, collaboration between the creative sector and technology is increasingly accelerating the innovation process to present creative solutions that suit global market needs (Fedrerika & Ongkowijoyo, 2024). Through various projects and programs that continue to develop, the creative industry in Indonesia is increasingly showing strong competitiveness (Yuniarta & Purnamawati, 2023). Support from multiple parties, in terms of regulations, infrastructure, and strategic collaboration, plays a major role in ensuring the sustainability and growth of this sector. By strengthening the creative industry ecosystem, Indonesia has great potential to become one of the creative industry centers that is considered at the global level.

The creative industry is an economic sector with challenges, experiencing growth in uncertain conditions and facing a financial crisis (Mahrinasari et al., 2024). Building a competitive business advantage is quite difficult for the creative industry. This is because the creative industry is more indicated by small and medium enterprises with limitations and challenges in keeping up with technological developments (Subagyo et al., 2020; Mariyudi, 2019). Limitations in terms of building networking and cooperation, limited internet network technology infrastructure, unfavorable regulations, and restricted market access make obstacles for creative industry business actors in sustainably increasing their competitiveness (Fahmi, 2019; Morgner & Peters, 2024; Borre et al., 2023). Creative industry is a strategic industry crucial in improving the economy by contributing to the country's gross domestic product (GDP). This industry can produce, and present various goods and services based on the level of creativity, skills, and talents of business people (Baskoro et al., 2023; Morgner & Peters, 2024). The development of the creative economy sector is one of the focuses of the implementation of the Sustainable Development Goals (SDGs) in the long term (Anjaningrum & Rudamaga, 2019). Support from various interested parties is a must to oversee the creative industry to continue to grow and develop so that it can contribute positively to improving the country's economy. Creative industries need government regulations and policies to protect and safeguard business activities (Gianelle et al., 2024). Government regulation through the role of local wisdom and government can strengthen sustainable competitive advantage for the creative industry (Mahrinasari et al., 2024). The creative industry's increased innovation is undoubtedly strongly influenced by government policies that support and influence this formation. One is intellectual property rights protection for creative industry products or services. Intellectual property proper protection incentivizes companies to innovate by ensuring their intellectual property rights are protected from imitation or infringement (Sreenivasan & Suresh, 2023; Judijanto et al., 2024). Substantial intellectual property rights protection can increase bank confidence in companies applying for loans for innovation development, so these creative industry companies have a greater chance of succeeding in the market and protecting the value of their innovations (Bae & Yoo, 2015). Government regulations, including intellectual property rights policies, can create a more conducive environment for innovation and entrepreneurship, ultimately contributing to sustainable economic growth (Shkabatur et al., 2022).

On the other hand, the creative industries, which include art, design, media, film, music, fashion, and others, require an ecosystem that supports innovation and cross-disciplinary collaboration. Good market access allows creative industry players to be in an ecosystem that supports efforts to expand the reach of products and services and increase the scale of their business (Lazić, 2023). Ease of market access is also a determining factor for the creative industry to continue to exist and be recognized by the public (Varotsis, 2022). The ease of accessing the market with the help of digital marketing technology can expand the market reach that the creative industry can achieve in introducing the products and services provided (Su et al., 2023). This is also reinforced by other research, which shows that market access is essential in increasing the creative industry's competitiveness (Bravo et al., 2022; Dellyana et al., 2023). Easy market access allows creative industry players to expand the range of their products and services and increase competitiveness by entering new markets and attracting more customers (Hermayanto, 2023). The ease of market access through the application of digital marketing technology affects creative organizations' growth and long-term sustainability (Alrajhi, 2025). Digital marketing can be a powerful tool for growth and sustainability in the cultural and creative sector, although its implementation is not easy, given the limitations of this cluster (Khursheed, 2024). Investigate in further detail how government policies and regulations are impacted, particularly how easy it is to access potential markets to boost sustainable competitiveness (Basuki et al., 2023). This research was conducted to examine the alternative model of improving the competitive advantage of the creative industry in the creative industry sector, especially in Indonesia. The research refers to collaboration and networking variables as intervening variables that bridge the role of government regulations and policies and market access in achieving sustainable competitiveness for the creative industry sector through several objectives. First, this research aims to analyze the influence of government regulations and ease of market access that can encourage forming internal and external networking and inter-sectoral networks for creative industry groups. Strong networks are not only between creative industry groups but also involve other sectors as supporters of creative industry activities and business models to grow and develop, which is essential to consider (Santoro et al., 2020). Second, this study investigates the direct influence of government regulation and market access on achieving sustainable creative industry competitiveness. The role of the government through appropriate regulations can influence business environment factors and play an essential role in strengthening the competitive advantage of creative industry in the face of dynamic changes in the global market (Mahrinasari et al., 2024). Third, a strategy for achieving sustainable competitive advantage for the creative industry should be formulated based on the context of strengthening market access and networking of industry groups supported by government regulation in favor of this industry sector. Competitive advantage is a strategic ability that allows the creative industry to improve superior performance in a highly competitive business environment (Anjaningrum & Rudamaga, 2019). Therefore, this research recommends appropriate creative industry strategies for enhancing sustainable industrial competitiveness.

2. Literature review and hypothesis development

2.1. Regulations and Policies

Many countries have recognized creative industries as a key economic growth and innovation driver. In this case, government policy regulations are essential in supporting or hindering the ease of networking among creative industry players (Herawati et al., 2020). Regulations that cover various aspects, ranging from economic policy, trade, and digital infrastructure to the protection of intellectual property rights, are essential things that need to be regulated by policymakers to support the growth and competitiveness of this industry sector. Effective regulations not only facilitate interactions between business actors but also increase the competitiveness of creative industries at the national and global levels (Townsend et al., 2017; Yi et al., 2018; Phradiansah et al., 2022). The ease of networking in the creative industry is strongly influenced by policy regulations that support easy access to digital platforms, venture capital, and industry cluster programs. Research by Rofaida et al. (2020) shows that policies that support the development of digital infrastructure, such as high-speed internet access and reliable communication technology, play a key role in enabling better collaboration and networking among creative industry players. The government needs to incentivize technology companies and creative startups to participate in international networks and digital collaboration platforms to increase engagement and exchange of creative ideas that more effectively enhance competitiveness (Chen et al., 2021; Niroumand et al., 2021). Furthermore, research by Rosyadi et al. (2021) concluded that policies that support the formation of creative clusters in certain cities or regions encourage the formation of a dynamic creative ecosystem. These policies allow industry players to share their resources, ideas, and networks more effectively, resulting in innovative collaborations. In addition, collaboration between creative industry players is also strongly influenced by the existence of policy regulations that support the protection of intellectual property rights, tax incentives, and funding support (Roziqin et al., 2021). Strong intellectual property rights protection policies are key to creating a safe collaboration environment. These protections ensure that creative industry players feel safe to share their ideas and innovations without the risk of theft or copyright infringement (Goel et al., 2017). Policies that support funding programs and startup accelerators play an essential role in facilitating collaboration through policies that offer grants, low-interest loans, or venture funds for creative industry players. This encourages productive cooperation between startups, educational institutions, and the government, creating opportunities for innovation and increasing the competitiveness of the creative sector (Octoviani, 2023). Based on this review, a research hypothesis can be designed that refers to:

H₁: Government regulations and policies have a positive effect on the creation of collaboration and networking.H₃: Government regulations and policies directly affect the creation of the competitive advantages of the creative industry.

2.2. Market Access

Ease of access to markets plays a vital role in fostering the collaboration and networking necessary to enhance sustainable competitiveness in creative industries (Su et al., 2023). According to recent research, market attractiveness and collaboration strategies play an essential role in business performance, where better access to markets increases collaborative opportunities between firms and stakeholders (Lizardo & Colline, 2023). Market access indicators such as the availability of e-commerce platforms (Alrajhi, 2025) and the ability to penetrate international markets are key factors in building wider networks and enabling better information flow between industry players (Liu & Kou, 2024). On the other hand, collaboration driven by better market access has been proven to increase innovation and productivity (Mbaidin, 2024). Through collaboration, creative industries can optimize internal and external resources that can be used to produce more innovative and attractive products (Zahrah, 2024; Fedrerika & Ongkowijoyo, 2024). Cross-sector collaboration is also essential in building a sustainable ecosystem (Basuki et al., 2023), where creative companies can work with actors from other industries to integrate digital technology into their creative processes (Klein & Spychalska-Wojtkiewicz, 2020). The involvement of digital technologies can strengthen the relationship between innovative companies and strategic partners (Siagian & Tarigan, 2021). Emerging innovations create added value for companies and the entire creative industry by strengthening competitiveness sustainably. Effective collaboration and companies' ability to access broader markets drive increased sustainable competitiveness. Access to global markets opens new opportunities for creative companies to innovate and develop products that can be accepted in various international markets (Lizardo & Colline, 2023). Moreover, collaboration with global partners enables firms to adopt best practices and relevant international standards, further strengthening the company's competitive position (Zahrah, 2024).

Overall, easy access to markets is important in strengthening collaboration and networking in the creative industry. This enables the creation of synergies between various stakeholders that ultimately support the sustainability and competitiveness of companies in the long run. Thus, sound marketing strategies, e-commerce platforms, and international exports are key pillars supporting sustainable competitiveness in the creative industries (Liu & Kou, 2024; Klein et al., 2021). By capitalizing on technological innovation, strengthening global networks, and developing adaptive collaboration strategies, creative industries have the potential to enhance sustainable competitiveness in an ever-evolving global market. Based on the review above, the research hypothesis can be formulated based on the role of market access, including:

H2: Market access significantly positively affects the collaboration and networking process.

H4: Market access has a direct positive significant effect on efforts to improve the competitive advantage of the creative industry.

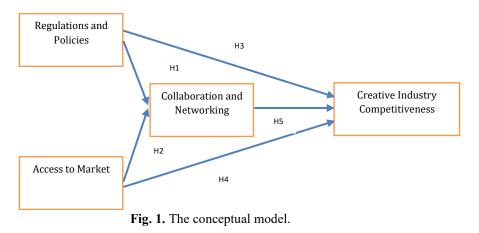
2.3. Collaboration and Networking and Sustainable Competitiveness

Collaboration and networking have become key elements in strengthening sustainable competitiveness in creative industries. Studies by (Mohiuddin et al., 2024) highlight that collaboration between firms and business partners improves supply chain effectiveness, including information management, joint planning, and new product development. With good collaboration, firms in creative industries can integrate resources and expertise to enhance innovation and adapt to market changes more quickly. Olko (2023) states that collaboration networks in the creative industries, called action nets, help create important emotional value, such as artistic and cultural value. These networks enable creative firms to build stronger collaborative relationships, which foster knowledge transfer and effective management of innovation. This collaboration can support competitive growth, where companies can access the full range of creative resources needed to create high-value products and services. Cross-functional and cross-organizational collaboration improves supply chain flexibility and competitiveness in the face of market uncertainty. By combining knowledge synergy and innovation, collaborative knowledge creation can enhance collaborative capabilities between organizations by sharing and creating new knowledge (Stank et al., 2001). Effective knowledge transfer and innovation between organizations can also improve customer response and the ability to cope with uncertainty in operations (Lin & Tseng, 2016). Collaborative innovation can therefore be key to building sustainable supply chains and improving their economic, environmental, and social performance (Zhou & Wang, 2021). According to Kou (2024), cross-sector cooperation in the creative tourism sector speeds up the growth of new markets. One example of this is the use of digital platforms. The competitiveness of small and medium-sized businesses in the industry is greatly increased by the local and international knowledge exchange made possible by a coordinated collaboration plan among stakeholders. This confirms the importance of cross-sector networks facilitating innovation and sharing best practices across the value chain. On the other hand, digital technology also plays an important role in supporting collaboration and networking in creative industries. According to Shahadat et al. (2023), integrating digital technologies increases supply chain operations' flexibility and agility, enabling companies to respond more quickly and effectively to market changes. Digital technologies strengthen collaboration by enabling real-time communication and faster data exchange, improving performance and sustainable competitiveness (Hariastuti et al., 2022). Collaboration and networking in the context of the creative industries contribute directly to increased sustainable competitiveness (Su et al., 2023). The use of digital technology and the development of strong collaborative networks strengthen the ability of companies to adapt to market changes, capitalize on innovation, and create unique value for global consumers (Bari et al., 2022). Collaboration support can increase competitive advantage based on price/cost factors, quality, distribution network, and business flexibility. The policy of lower selling prices, higher product and service quality, good reliability, and a fast delivery process supports the company in increasing its market share (Cahyono et al., 2023). Ultimately, increasing market share through expanding the marketing network to a broader global market will impact an increasing competitive advantage for the Company (Haseeb et al., 2019).

Based on this description, the research hypothesis that underlies the relationship between variables can be formulated as follows:

H₅: Collaboration and networking activities significantly positively influence the achievement of competitive advantages in the creative industry.

The following research conceptual model is given in Fig. 1.



3. Research Methods

This approach to research is to determine the influence of regulations and policies, as well as access to the market, on creative industry competitiveness through collaboration and networking. Research using grant funds obtained from the government of the Republic of Indonesia in a fundamental grant scheme so that permission to collect data has been obtained. The research

determined the measurement items in Regulation and Policies (RP), namely government support (RP1), intellectual property protection (RP2), and availability of supporting infrastructure (RP3) (Phradiansah et al., 2022; Sreenivasan & Suresh, 2023; Mahrinasari et al., 2024; Judijanto et al., 2024; Lazić, 2023). The second variable is access to Market (AM) with measurement items marketing strategy (AM1), export and internationalization (AM2), and e-commerce platform availability (AM3) (Hermayanto, 2023; Khursheed, 2024). Collaboration and Networking (CN) as an intervening variable is determined by measuring items partnership (CN1) and professional network (CN2) (Olko, 2023; Mohiuddin et al., 2024; Liu & Kou, 2024). Fourth is the Creative Industry Competitiveness (C) variable with market share items (C1), export creative products (C2), competitive selling price (C3) (Anjaningrum & Rudamaga, 2019; Varotsis, 2022; Fahmi, 2019; Haseeb et al., 2019; Cahyono et al., 2023). The questionnaire that has been determined in the question items is given to practitioners or creative industry owners in a closed manner by determining answers on a Likert scale of 1 (strongly disagree) to 5 (strongly agree). This study's population consisted of creative industry players in various Bandung, Yogyakarta, Solo, and Surabaya regions. Data was collected through surveys using measurement instruments related to efforts to improve the creative industry's competitiveness. The 200 respondents used in the sample were declared to have met the minimum sample limit required in this study. The questionnaires were distributed to respondents by the research team domiciled in Surabaya by traveling locally in the Surabaya area, traveling by land to the city of Yogyakarta, DKI Yogyakarta Province for 325 km, traveling by land to the city of Solo, Central Java Province for 258 km, and traveling to the Bandung area, West Java Province, 701 km. This research uses a structural equation model approach because it can analyze complex relationships and model latent variables. The first step in this research is to design a theoretical model that describes the relationship between variables that affect the competitiveness of the creative industry sustainably (Byrne, 2016). This model consists of a measurement model (the relationship between indicators and latent constructs) and a structural model (the relationship between latent constructs). The validity test is carried out through confirmatory factor analysis (CFA) to test the suitability of indicators to constructs. The reliability test is conducted using composite reliability. The step taken is to analyze the relationship between the natural variables of the structural model. Relationship analysis is done by looking at the path coefficient, t-value, and p-value. The relationship is significant if the p-value ≤ 0.05 or t-value ≥ 1.96 .

4. Analysis and discussion

The researchers distributed the questionnaires to 280 respondents, and 250 questionnaires could be further processed. The results of distributing questionnaires given to creative industries with the characteristics in Table 1, with male respondents amounting to 137 respondents (55%), while for female gender, there were 113 respondents (45%). Most creative industries were found in the food business, where relatively many chefs were male, followed by creative industries in design, with 25 respondents (10%).

Characteristics	Description	Amount	%
Gender	Man	137	55%
Gender	Woman	113	45%
	Advertising	10	4%
	Gender Woman Advertising Advertising Architecture Art Market Craft Design besign Fashion Photography Music Publishing & Printing Application & Game Developer Culinary 20-29 years old Age 30-39 years old 20-29 years old 20-29 years old Autoral (Master/Doctor) SMA/SMK Undergraduate Postgraduate (Master/Doctor) Business Owner Suiness Owner sition in the Creative Manager Industry Workers/Employees Freelancer <1 year	9	4%
	Art Market	15	6%
	Gender Man Woman Advertising Advertising Architecture Art Market Craft Design Fashion Photography Music Publishing & Printing Application & Game Developer Culinary 20:29 years old Age 30-39 years old 20:39 years old 20:39 years old 20:49 years old 20:90 years Story of years SMA/SMK Undergraduate (Master/Doctor) Postgraduate (Master/Doctor) Story of Years Freelancer soition in the Creative Industry Manager Industry Vorkers/Employees Freelancer <1 year	15	6%
		25	10%
Creative Industries Sector		20	8%
		15	6%
		13	5%
Age	Publishing & Printing	15	6%
	Application & Game Developer	18	7%
	ender Woman Advertising Architecture Art Market Craft Design Hotography Music Publishing & Printing Application & Game Developer Culinary 20-29 years 20-29 years old 40-49 years old 20-29 years old 40-49 years old 20-29 years old 40-49 years old 20-29 years old Elementary/Middle School SMA/SMK Undergraduate Postgra	95	38%
	< 20 years	13	5%
Age Last education Position in the Creative Industry		88	35%
Age	GenderWomanAdvertisingArchitectureArt MarketCraftDesignBesignFashionPhotographyMusicPublishing & PrintingApplication & Game DeveloperCulinary20-29 years20-29 years old30-39 years old40-49 years old25 0 yearsElementary/Midle SchoolSMA/SMKUndergraduatePostgraduate (Master/Doctor)Business Ownersition in the Creative IndustryManagerIndustryQuers1-3 years4-7 years	75	30%
		50	20%
	\geq 50 years	24	10%
	Elementary/Middle School	43	17%
Last advantion	SMA/SMK	75	30%
Last education	Undergraduate	128	51 %
	Postgraduate (Master/Doctor)	4	2%
	Business Owner	123	49%
40-49 years old ≥ 50 years Last education Elementary/Middle School SMA/SMK Undergraduate Postgraduate (Master/Doctor) Business Owner Position in the Creative Industry Workers/Employees Freelancer	Manager	53	21%
	Workers/Employees	50	20%
	MA/SMK ndergraduate ostgraduate (Master/Doctor) usiness Owner anager orkers/Employees eelancer 1 year	24	10%
	< 1 year	25	10%
Long Punning Business	1-3 years	88	35%
Long Running Busilless	4-7 years	75	30%
		62	25%

Table 1

|--|

Based on Table 1. Characteristics of respondents based on age. The largest number of respondents in the creative industry were 163 respondents (65%) aged 20-39 years, followed by 50 respondents (20%) aged 40-49 years. Respondents who own a business or work in a creative industry are of a productive age and can face rapid changes in adequately developing their business. The most extensive study in the field of education was undergraduate, with 128 respondents (51%), and postgraduate with 4 respondents (2%). This condition illustrates that the manager or owner of the creative industry has a business development concept and has carried out adequate imports. The largest number of respondents who had positions in the organizational structure were business owners, with 123 respondents (49%), followed by manager positions in the creative industry with 53 respondents (21%). The creative industry development carried out has been sufficient to maintain creative industry competitiveness with the authority and responsibility of the respondent. The question items given regarding the length of time the creative industry business has been running were found to be between 1-3 years of business age, and as many as 88 respondents (35%) described the creative industry as just being formed so that business sustainability has not been demonstrated well. However, considering the large number of creative industries that have been running businesses for more than 4 years, namely 137 respondents (55%), it can show that the business has been running for a long time and has been able to survive during the difficult conditions for business since large-scale social restrictions occurred during COVID. The business has been running and is still operating, showing that it has been able to mitigate risks during that period. Based on calculations using AMOS software version 2023, the significance and validation results for each indicator forming exogenous and endogenous research variables are obtained, with the results presented in Table 2.

Table 2

Indicators	Estimate	S.E	C.R	Р	Decision
RP3	1.000				valid
RP2	0.992	0.025	39.719	***	valid
RP1	0.998	0.023	43.284	***	valid
AM3	1.000				valid
AM2	0.966	0.025	37.941	***	valid
AM1	1.017	0.024	42.828	***	valid
CN2	1.000				valid
CN1	1.028	0.028	36.997	***	valid
C1	1.000				valid
C2	1.032	0.034	30.104	***	valid
C3	1.025	0.036	28.609	***	valid

Based on the results of the relationship analysis with a confidence level of 95%, Table 2 shows that the P value of each indicator forming the variable Regulation and Policies (RP), Access to Market (AM), Collaboration and Networking (CN) and Creative Industry Competitiveness (C) are smaller than 0.05 and the C.R. value > 1.96, this indicates that all indicators are significant and valid as measuring indicators of the RP variable. Structural model data processing is carried out to evaluate the general degree of fit or Goodness of Fit (GOF) between the data and the model. Table 3 shows the results of testing the overall fit of the structural model.

Table 3

The Goodness of Fit Model Test Results

GOF measure	Recommended Value	GOF Value	Description		
CMIN/DF	\leq 3.0	0.972	Very good		
Chi-Square	-	36.930	Very good		
p-value	≥ 0.05	0.519	Very good		
RMSEA	≤ 0.08	0	Very good		
GFI	≥ 0.90	0.973	Very good		
AGFI	≥ 0.90	0.954	Very good		
CFI	≥ 0.90	1	Very good		
TLI	≥ 0.90	1	Very good		

Based on Table 3, the CMIN/DF value of 0.972 indicates the model fits perfectly because the value is below the 3.0 limit. The lower this value, the better the fit of the model. The Chi-Square value of 36.930 is low, which means the model can represent the data well. The p-value of 0.519 is well above the recommended value of ≥ 0.05 . This indicates no significant difference between the hypothesized model and the actual data. This condition indicates a perfect model. The RMSEA value of 0 is perfect because it is far below the maximum limit of 0.08. RMSEA indicates the level of approximation error, and this result identifies a perfect model fit. The GFI value of 0.973 meets the criterion of ≥ 0.90 . GFI measures the extent to which the model can explain variation in the data, and this result indicates a good fit. The AGFI result of 0.954 is above the recommendation of ≥ 0.90 , indicating that the model still has a good fit despite considering the model's complexity. The CFI value of 1 indicates a perfect fit, supporting the conclusion that the model is excellent. Based on the Goodness of Fit test results, the tested model fits well with the data. All evaluation criteria meet or exceed the recommended values. This indicates that the hypothesized model fits the research data. The results of the research hypothesis are shown in Fig. 2 and Table 4.

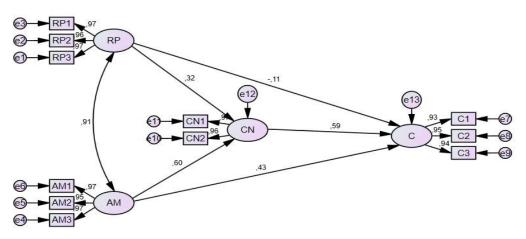


Fig. 2. Structural Model Results of Sustainable Creative Industry Competitiveness

Table 4			
Estimates of Regression	Weights of Direct Relationship	p between Research	Variables

Hypothesis	Relationship between (exogenous and endogenous)	Estimate	S.E	C.R	Р	Hypothesized Decision
H1	$CN \leftarrow RP$	0.290	0.077	3.755	***	Significant effect
H2	$CN \leftarrow AM$	0.538	0.077	7.005	***	Significant effect
H3	$C \leftarrow CN$	0.510	0.073	6.959	***	Significant effect
H4	$C \leftarrow RP$	-0.090	0.073	-1.238	0.216	Not
H5	$C \leftarrow AM$	0.333	0.081	4.130	***	Significant effect

Based on Table 4, the Regulation and Policies (RP) variable has a significant positive effect on Collaboration and Networking (CN) with an influence size of 0.290, so the first hypothesis can be accepted. The government's ability to support creative industries in creating regulations and policies, intellectual property protection, and adequate infrastructure can result in increased collaboration and networking. This condition allows creative industry companies to build partnerships and professional networks between other companies and other institutions. The results of this research support research results which state that regulations and policies have an influence on collaboration and networking (Gianelle et al., 2024; Herawati et al., 2020; Rofaida et al., 2020; Chen et al., 2021; Niroumand et al., 2021; Roziqin et al., 2021). The Access to Market (AM) variable significantly positively affects Collaboration and Networking (CN). The estimated value shows that AM is a more dominant factor than RP in increasing CN with a coefficient of 0.538, so the second hypothesis is accepted. The marketing and export strategy determined by the creative industry impacts company collaboration and networking by increasing the number of partnerships formed. Creative industry companies can build networks with other companies to export products to other countries as new and potential markets. Access to markets needs to be supported by the government in connecting creative industry businesses with governments of other countries by providing stimulus to collaborate internationally. The results of this research support research result which state that access to markets has an impact on strengthening collaboration and networking (Lizardo & Colline, 2023; Liu & Kou, 2024; Klein & Spychalska-Wojtkiewicz, 2020; Lizardo & Colline, 2023). Collaboration and Networking (CN) variables significantly positively affect creative industry competitiveness (C). Each increase of one unit of CN will increase C by 0.510 units. This shows that CN is important in increasing Creative Industry Competitiveness (C), so the third hypothesis can be accepted. Collaboration and networking that is formed through partnerships and professional networks can produce an increase in creative industry competitiveness. Creative industries that have been able to build collaboration and networking have increased their competitiveness with the links they have found from the national and international networks that have been formed. The results of this research support research results which state that collaboration and networking have an impact on increasing creative industry competitiveness (Fahmi, 2019; Morgner & Peters, 2024; Borre et al., 2023; Morgner & Peters, 2024; Zahrah, 2024; Mohiuddin et al., 2024; Zhou & Wang, 2021; Hariastuti et al., 2022; Bari et al., 2022; Cahyono et al., 2023).

The Regulation and Policies (RP) variable does not significantly affect Creative Industry Competitiveness (C). The negative coefficient value indicates that increased RP does not contribute significantly to C in this model, so the fourth hypothesis is rejected. Regulations and policies established in the creative industry with the current availability of supporting infrastructure, intellectual property protection, and government support cannot increase Creative Industry Competitiveness (C). This condition makes the company unable to produce an increase in market share and competitive selling price. This research results differ from research that states that regulations and policies directly impact creative industry competitiveness (Mahrinasari et al., 2024). The research is in accordance with previous research, which states that regulations and policies have an impact on creative industry competitiveness through collaboration and networking (Shkabatur et al., 2022; Townsend et al., 2017; Yi et al., 2018; Phradiansah et al., 2022; Octoviani, 2023). The Access to Market (AM) variable significantly positively affects Creative Industry Competitiveness (C). An increase in AM by one unit will increase by 0.333 units. This shows that Access to Market (AM) is important in increasing Creative Industry Competitiveness, so that is the fifth hypothesis.

The creative industry's ability to access the market with marketing strategy, export and internationalization, and e-commerce platform availability can increase Creative Industry Competitiveness (C) by establishing market share, exporting creative products, and competitive selling prices. The creative industry in Indonesia is currently able to produce products, most of which can be exported to other countries, mainly craft and art products. The results of this research support research results which state that access to markets has an impact on increasing creative industry competitiveness (Lazić, 2023; Varotsis, 2022; Bravo et al., 2022; Dellyana et al., 2023; Hermayanto, 2023; Zahrah, 2024; Liu & Kou, 2024; Klein et al., 2021). The consequences in Figure 3 show an additional hypothesis, namely the existence of a reciprocal relationship between Regulation and Policies (RP) and Access to Market (AM) of 0.91. This shows that the government's role in determining intellectual property protection and supporting infrastructure availability can increase creative industry access to markets. The creative industry can increase export and internationalization activities to other countries and build e-commerce platform availability. The results of this research support research result that state that regulation and policies correlate with market access (Bae & Yoo, 2015; Shkabatur et al., 2022). The practical contribution of research to the government is determining creative industry projects, so it is necessary to build synergy with industry players to produce product competitiveness. Regulations and policies are important in forming a competitive creative industry ecosystem. Supportive policies, such as tax incentives, protection of intellectual property rights, and access to funding, can encourage the growth of creative industries by providing space for innovation and market expansion. On the other hand, regulations that are too strict or less adaptive to technological developments can become obstacles for creative industry players in developing products and services that align with global trends. The government must maintain a balance between regulations that protect and those that encourage the competitiveness of the creative industry on an ongoing basis. The government can encourage the creative industry to build collaboration and networking to increase its competitiveness.

Collaboration between industry players, both with the government and the private sector, can accelerate innovation through sharing resources, technology, and knowledge. Partnerships between technology startups and digital artists or designers can produce creative products that are more innovative and have global competitiveness. Strong networking also opens new market opportunities and allows access to broader resources, including investment and funding. With the right policies and strong collaboration, the creative industry can develop more rapidly and be highly competitive globally. Flexible regulations and close collaboration between various stakeholders can create a conducive environment for the creative industry. The government and industry players must work together to create an ecosystem that supports innovation, protects intellectual property rights, and expands collaboration networks so that the creative industry can continue developing and contributing to the national economy. The theoretical contribution of the research is to strengthen and enrich the resources-based view theory by increasing the competitiveness and creativity of industry in generating improvements in the country's economy.

5. Conclusion

The government has initiated various creative industry projects to encourage economic growth based on innovation and digitalization. Through strategic policies and special programs, the government seeks to create an ecosystem that supports the development of the creative sector in various fields of art, design, media, and technology. The government has launched a program to increase creative industry players' competitiveness by providing skills training and expanding market access for local products. The government's role in establishing regulations and policies in intellectual property protection and the availability of supporting infrastructure is closely related to market access. Regulations regarding intellectual property rights are also strengthened to protect innovation and creative works. Government regulations and policies regulating intellectual property protection and infrastructure increase collaboration and networking. Rules and guidelines established in the creative sector and the availability of government assistance, intellectual property protection, and supporting infrastructure cannot increase creative industry competitiveness, so collaboration and networking are needed. The creative industry's ability to access the market with marketing strategy, export and internationalization, and e-commerce platform availability can increase company collaboration and networking by increasing partnerships formed and Creative Industry Competitiveness. A creative industry that has been able to build collaboration and networking makes the creative industry competitive by increasing market share, exporting creative products, and competitive selling prices. Therefore, developing innovative market strategies and establishing strong partnerships and networks are necessary to improve creative industries' competitiveness internationally. Supportive regulations remain important, but effective market initiatives and strong collaboration must be combined to improve competitiveness.

Acknowledgment

The authors would like to thank DRTPM Kemendikbudristek for its financial support under the Regular Fundamental Research Scheme 2024 (Contract No. 109/E5/PG.02.00.PL/2024 and 083/SP2H/PT/LL7/2024).

References

Alrajhi, A.S. (2025). Impacts of marketing strategies on casual restaurant sales. *Journal of Project Management*, 10(1), 53-60, DOI: 10.5267/j.jpm.2024.11.003

Anjaningrum, W. D., & Rudamaga, H. (2019). Creative industry: Enhancing competitive advantage and performance. Asia

Pacific Management and Business Application, 007(03), 123–146. https://doi.org/10.21776/ub.apmba.2019.007.03.1

- Bae, S. H., & Yoo, K. (2015). Economic modeling of innovation in the creative industries and its implications. *Technological Forecasting and Social Change*, 96, 101–110. https://doi.org/10.1016/j.techfore.2015.02.010
- Bari, N., Chimhundu, R., & Chan, K.-C. (2022). Dynamic capabilities to achieve corporate sustainability: A roadmap to sustained competitive advantage. Sustainability, 14(3), 1531. https://doi.org/10.3390/su14031531
- Baskoro, G., Mariza, I., & Sutapa, I.N. (2023). Innovation to improve critical thinking skills in the generation Z using peeragogy as a learning approach and Artificial Intelligence (AI) as a Tool. *Journal of Industrial Engineering: Research and Application*, 25(2), 121–130, DOI: https://doi.org/10.9744/jti.25.2.121-130
- Basuki, R., Wonoseputro, C & Tarigan, Z.J.H. (2023). The effect of tourism village development project on economic sustainability through tourism villages based on natural and cultural potentials. *Journal of Project Management*, 8(2), 133-140, DOI: 10.5267/j.jpm.2022.11.001
- Borre, J. R., Romero, G. C., Gutierrez, J. M., & Ramirez, J. (2023). Discussion of the aspects of the cultural and creative industries that impact on sustainable development: A systematic review. *Procedia Computer Science*, 224, 532–537. https://doi.org/10.1016/j.procs.2023.09.077
- Bravo, R., Gonzalez Segura, M., Temowo, O., & Samaddar, S. (2022). How does a pandemic disrupt the benefits of ecommerce? A case study of small and medium enterprises in the US. *Journal of Theoretical and Applied Electronic Commerce Research*, 17(2), 522–557. https://doi.org/10.3390/jtaer17020028
- Byrne, B. M. (2016). Structural equation modeling with AMOS. Routledge. https://doi.org/10.4324/9781315757421
- Cahyono, Y., Purwoko, D., Koho, I. R., Setiani, A., Supendi, S., Setyoko, P. I., Sosiady, M., & Wijoyo, H. (2023). The role of supply chain management practices on competitive advantage and performance of halal agroindustry SMEs. Uncertain Supply Chain Management, 11(1), 153–160. https://doi.org/10.5267/j.uscm.2022.10.012
- Chen, X., Liu, C., Gao, C., & Jiang, Y. (2021). Mechanism underlying the formation of virtual agglomeration of creative industries: Theoretical analysis and empirical research. *Sustainability*, *13*(4), 1–21. https://doi.org/10.3390/su13041637
- Dellyana, D., Arina, N., & Fauzan, T. R. (2023). Digital innovative governance of the Indonesian creative economy: A governmental perspective. Sustainability, 15(23), 16234. https://doi.org/10.3390/su152316234
- Fahmi, F. Z. (2019). Business networks, social capital and the economic performance of creative and cultural industries: The case of Indonesia. *Asia Pacific Viewpoint*, 60(3), 370–385. https://doi.org/10.1111/apv.12211
- Fedrerika & Ongkowijoyo, G. (2024). Is innovation the missing link in the competitive advantage of Indonesia's small and medium enterprises in the fashion industry? *Petra International Journal of Business Studies*, 7(2), 221-234, DOI: https://doi.org/10.9744/petraijbs.7.2.221-234
- Gianelle, C., Guzzo, F., Barbero, J., & Salotti, S. (2024). The governance of regional innovation policy and its economic implications. Annals of Regional Science, 72(4), 1231–1254. https://doi.org/10.1007/s00168-023-01241-2
- Goel, R. K., Göktepe-Hultén, D., & Grimpe, C. (2017). Who instigates university-industry collaborations? University scientists versus firm employees. Small Business Economics, 48(3), 503–524. https://doi.org/10.1007/s11187-016-9795-9
- Hariastuti, N. L. P., Pratikto, P., Santoso, P. B., & Tama, I. P. (2021). Analyzing the drivers of sustainable value creation, partnership strategies, and their impact on business competitive advantages of small and medium enterprises: a PLSmodel. *Eastern-European Journal of Enterprise Technologies*, 2(13 (110)), 55–66. https://doi.org/10.15587/1729-4061.2021.228864
- Hariastuti, N. L. P., Pratikto, P., Santoso, P. B., & Tama, I. P. (2022). Identifying driving factors of technological innovation to create sustainable value in metal manufacturing SMEs. *Industrial Engineering & Management Systems*, 21(1), 43–57. https://doi.org/10.7232/iems.2022.21.1.043
- Haseeb, M., Hussain, H. I., Kot, S., Androniceanu, A., & Jermsittiparsert, K. (2019). Role of social and technological challenges in achieving a sustainable competitive advantage and sustainable business performance. *Sustainability*, 11(14), 3811. https://doi.org/10.3390/su11143811
- Herawati, D., Astuti, W., & Rini, E. F. (2020). Madiun city's readiness for the implementation of the creative city of gastronomy concept. *Village-City*, 2(2), 143. https://doi.org/10.20961/desa-kota.v2i2.12940.143-157
- Hermayanto, R. (2023). Effective marketing strategies in business: Trends and best practices in the digital age. Jurnal Ad'ministrare: Jurnal Pemikirian Ilmiah dan Pendidikan Administrasi Perkantoran, 10(1), 61. https://doi.org/10.26858/ja.v10i1.45101
- Judijanto, L., Sumerli, C. H., Firmansyah, Solapari, N., & Raihana. (2024). Challenges and opportunities in implementing intellectual property rights protection system for creative industry development in Indonesia. West Science Law and Human Rights, 2(1), 28–35. https://doi.org/10.58812/wslhr.v2i01.605
- Khlystova, O., Kalyuzhnova, Y., & Belitski, M. (2022). The impact of the COVID-19 pandemic on the creative industries: A literature review and future research agenda. *Journal of Business Research*, 139(October 2021), 1192–1210. https://doi.org/10.1016/j.jbusres.2021.09.062
- Khursheed, A. (2024). Is technological innovation good or bad? An empirical investigation of technology startups. *The Journal of High Technology Management Research*, 35(2), 100513. https://doi.org/10.1016/j.hitech.2024.100513
- Klein, M., Gerlitz, L., & Spychalska-Wojtkiewicz, M. (2021). Cultural and creative industries boost innovation and sustainable development of companies in an innovation process. *Procedia Computer Science*, 192, 4218–4226. https://doi.org/10.1016/j.procs.2021.09.198
- Klein, M., & Spychalska-Wojtkiewicz, M. (2020). Cross-sector partnerships for innovation and growth: Can creative industries support traditional sector innovations? *Sustainability (Switzerland)*, 12(23), 1–19.

10

https://doi.org/10.3390/su122310122

- Lazić, M. (2023). Digitalization and Creative Industries—Trends and Perspectives. International Scientific Conference on Digital Transformation in Business: Challenges and New Opportunities, 23. https://doi.org/10.3390/proceedings2023085023
- Lin, Y. H., & Tseng, M. L. (2016). Assessing the competitive priorities within sustainable supply chain management under uncertainty. *Journal of Cleaner Production*, 112, 2133–2144. https://doi.org/10.1016/j.jclepro.2014.07.012
- Liu, C. H. (2020). Creating competitive advantage through network ties, entrepreneurial orientation, and intellectual capital. Management Decision, 59(9), 2238–2263. https://doi.org/10.1108/MD-02-2020-0191
- Liu, T., & Kou, I. T. E. (2024). Determinants for the development of creative tourism: A stakeholder perspective. *Helion*, 10(13), e33727. https://doi.org/10.1016/j.heliyon.2024.e33727
- Lizardo, J., & Colline, F. (2023). The influence of market attractiveness and unique capability on collaboration strategy and business performance: A study at digital creative industry in Java. *The Winners*, 24(1), 45–56. https://doi.org/10.21512/tw.v24i1.10034
- Mahrinasari, M. S., Bangsawan, S., & Sabri, M. F. (2024). Local wisdom and government's role in strengthening the sustainable competitive advantage of creative industries. *Helion*, 10(10). https://doi.org/10.1016/j.heliyon.2024.e31133
- Mariyudi. (2019). Success factors of SMEs: The case of Indonesia. International Journal of Business Innovation and Research, 19(2), 204–231. https://doi.org/10.1504/IJBIR.2019.100074
- Mbaidin, H.O. (2024). The striking mechanisms of innovation theories to create collaborative competitive advantage opportunities in global digital marketing. *Journal of Project Management*, 9(4), 433-456, DOI: 10.5267/j.jpm.2024.7.004
- Mohiuddin, M., Karuranga, E., & Cao, Y. (2024). Developing Measurement of Collaboration Between the Supplier and Client Firms. *Journal of Global Information Management*, 32(1), 1–24. https://doi.org/10.4018/JGIM.342838
- Morgner, C., & Peters, T. (2024). Creative industries in transition: A study of Santiago de Chile's autopoietic cultural transformation. *Poetics*, *104*. https://doi.org/10.1016/j.poetic.2024.101891
- Niroumand, M., Shahin, A., Naghsh, A., & Peikari, H. R. (2021). Frugal innovation enablers, critical success factors, and barriers: A systematic review. *Creativity and Innovation Management*, 30(2), 348–367. https://doi.org/10.1111/caim.12436
- Octoviani, A. (2023). Implementation of the triple helix in increasing the competitive advantage of the creative industry. *Digital Journal of Business, Human Capital, Marketing, Entrepreneurship, Finance, & Business Strategy (Dimension),* 3(1), 13. https://doi.org/10.32897/dimmensi.v3i1.2319
- Olko, S. (2023). From networks to action nets: knowledge management in networks and clusters in creative industries in Poland. *Scientific Papers of Silesian University of Technology. Organization and Management Series*, 2023(177), 447–463. https://doi.org/10.29119/1641-3466.2023.177.26
- Peñarroya-Farell, M., & Miralles, F. (2022). Business model adaptation to the COVID-19 crisis: Strategic response of the Spanish cultural and creative firms. *Journal of Open Innovation: Technology, Market, and Complexity*, 8(1), 39. https://doi.org/10.3390/joitmc8010039
- Phradiansah, P., Jamaludin, I. I., & Astaginy, N. (2022). The role of regional government in strengthening entrepreneurial innovation creativity in the creative economy of the culinary sub sector of Kendari City. *Musamus Journal of Public Administration*, 5(1), 104–120. https://doi.org/10.35724/mjpa.v5i1.4746
- Rofaida, R., Suryana, Asti Nur Aryanti, & Yoga Perdana. (2020). Innovation strategy in the digital creative industry: Efforts to gain competitive advantage in the era of industrial revolution 4.0. *Journal of Management and Finance*, 8(3), 402–414. https://doi.org/10.33059/jmk.v8i3.1909
- Rosyadi, S., Sabiq, A., Ahmad, A. A., & Yamin, M. (2021). The cross-sector collaboration for development policy of rural creative economy: The case of Bengkoang creative hub. *Journal of Governance and Public Policy*, 8(1), 10–21. https://doi.org/10.18196/jgpp.811339
- Roziqin, A., Retnandari, N., Fajrina, A., Sihidi, I., & Kamil, M. (2021). The local government and creative industry: experience from batik tulis lasem industries. *Civil Development Journal*, 13(3), 419–429. https://doi.org/10.21787/jbp.13.2021.419-429
- Santoro, G., Bresciani, S., & Papa, A. (2020). Collaborative modes with cultural and creative Industries and innovation performance: The moderating role of heterogeneous sources of knowledge and absorptive capacity. *Technovation*, 92– 93(June 2017), 102040. https://doi.org/10.1016/j.technovation.2018.06.003
- Shahadat, M. M. H., Chowdhury, A. H. M. Y., Nathan, R. J., & Fekete-Farkas, M. (2023). Digital technologies for firms' competitive advantage and improved supply chain performance. *Journal of Risk and Financial Management*, 16(2). https://doi.org/10.3390/jrfm16020094
- Shkabatur, J., Bar-El, R., & Schwartz, D. (2022). Innovation and entrepreneurship for sustainable development: Lessons from Ethiopia. *Progress in Planning*, *160*(May 2021), 100599. https://doi.org/10.1016/j.progress.2021.100599
- Siagian, H., & Tarigan, Z.J.H. (2021). The central role of IT capability to improve firm performance through lean production and supply chain practices in the COVID-19 era. Uncertain Supply Chain Management, 9(4), 1005-1016, DOI: 10.5267/j.uscm.2021.6.012
- Sreenivasan, A., & Suresh, M. (2023). Exploring the contribution of sustainable entrepreneurship toward sustainable development goals: A bibliometric analysis. *Green Technologies and Sustainability*, 1(3), 100038. https://doi.org/10.1016/j.grets.2023.100038
- Stank, T. P., Keller, S. B., & Daugherty, P. J. (2001). Supply chain collaboration and logistical service performance. Journal

of Business Logistics, 22(1), 29-48. https://doi.org/10.1002/j.2158-1592.2001.tb00158.x

- Su, J., Zhang, Y. & Wu, X. (2023). How market pressures and organizational readiness drive digital marketing adoption strategies' evolution in small and medium enterprises. *Technological Forecasting and Social Change*, 193, 122655, https://doi.org/10.1016/j.techfore.2023.122655
- Subagyo, N. A., Kumar, V., & Ernestivita, G. (2020). Entrepreneurial parameters and performance of MSMEs in East Java province of Indonesia. *International Journal of Business Innovation and Research*, 23(2), 267. https://doi.org/10.1504/IJBIR.2020.110102
- Townsend, L., Wallace, C., Fairhurst, G., & Anderson, A. (2017). Broadband and the creative industries in rural Scotland. *Journal of Rural Studies*, 54, 451–458. https://doi.org/10.1016/j.jrurstud.2016.09.001
- Varotsis, N. (2022). Digital Entrepreneurship and creative industries in tourism: A research agenda. *Economies*, 10(7), 167. https://doi.org/10.3390/economies10070167
- Yi, H., Suo, L., Shen, R., Zhang, J., Ramaswami, A., & Feiock, R. C. (2018). Regional governance and institutional collective action for environmental sustainability. *Public Administration Review*, 78(4), 556–566. https://doi.org/10.1111/puar.12799
- Yuniarta, G., A. & Purnamawati, I.G.A. (2023). Sustainable competitive decline analysis of small medium wood crafts industry in Bali. *Petra International Journal of Business Studies*, 6(1), 31-41, DOI: https://doi.org/10.9744/petraijbs.6.1.31-41
- Zahrah, N. A. (2024). The influence of collaborative strategies in promoting increasing sales volume of creative industry MSMEs. *Trending: Journal of Management and Economics*, 2(2). https://jurnaluniv45sby.ac.id/index.php/Trending/article/view/2377%0Ahttps://jurnaluniv45sby.ac.id/index.php/Trendin g/article/download/2377/1908
- Zhou, Q., & Wang, S. (2021). Study the relations of supply chain digitization, flexibility, and sustainable development a moderated multiple mediation model. *Sustainability*, *13*(18). https://doi.org/10.3390/su131810043





 \bigcirc 2025 by the authors; licensee Growing Science, Canada. This is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC-BY) license (http://creativecommons.org/licenses/by/4.0/).