

-RESEARCH ARTICLE-

## DIGITAL TRANSFORMATION AND INNOVATION IN VIETNAMESE SMES: A PATHWAY TO SUSTAINABLE GROWTH

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Citation (APA): Dang, H. T. M., Tran, D. T. P., Cao, P. T., Thien, T. V., Thuy, L. T., Thi, T. N. (2025). Digital Transformation and Innovation in Vietnamese SMES: A Pathway to Sustainable Growth. *International Journal of Economics and Finance Studies*, 17(04), 455-473. doi: 10.34109/ijefs.202517421

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### —Abstract—

Sustainable growth has been the foremost requirement for the every firm around the globe and this aspect requires the focus of recent literature. Hence, the present article examines the impact of digital transformation on technological innovativeness and technological innovativeness impact on sustainable growth in Vietnamese SMEs. The study also examines the moderating impact of employee willingness and organizational support among these associations. The study used the primary data collected from the employees of the SMEs to check the association among variables. For this purpose, the study used the survey questionnaires. To check the data reliability and association among variables, the study used the smart-PLS. The outcomes indicated that the digital transformation has a positive association with technological innovativeness and technological innovativeness has a positive linkage with sustainable growth. The results also exposed that the technological innovativeness plays a positive mediating role while employee willingness plays a positive while organizational support plays negative moderating role in the framework. The study guides the policymakers that the sustainable growth could be achieved by effective use of digital transformation and technological innovativeness.

**Keywords:** Digital transformation, technological innovativeness, sustainable growth, employee willingness, organizational support.

## INTRODUCTION

With the increasing people social and environmental awareness, it's got essential for organizations to work on the goal of sustainable business growth for securing a special place in local and international markets as well as set position in community. An organization's sustainable growth is its ability to undertake all business practices without leaving devastating influences on environmental condition and human well-being in community. Organizations run with the aim to accomplish the current needs and enhance business growth without compromising on survival and needs of future generation (Al Malki, 2023). When an organization achieves sustainable growth with environmental preservation and human well-being, it itself has numerous benefits. Consumers not only want to fulfill their current needs but they desire the products and services which can't damage their health and natural resources. So, business with sustainability, enjoy potential customers and high marketing for goods (Edwards, 2021). Also, the sustainable businesses have high support from legal authorities, trust

from investors, and shareholders retention, as these firms are sure to perform selfless practices, showing higher profits, and caring for well-fare of others. In addition, when ecological friendly practices are performed and social welfare programs are launched, employees enjoy good health, high organizational commitment, and more productivity as well as reduction in wastage of resources reduces business costs. For its utmost importance, sustainable business growth is essential to be studied and implemented (Islam & Wahab, 2022).

Environmental issues are associated with economic practices like increasing toxic wastes, polluting production processes, use of chemical-based materials and resources, excessive use of energy sources, and machines mostly relying on fuel combustion. Business with their ignorance and acting on sole purpose of profits-making, also creates issues for society or people who are somehow linked to it (Deyanova et al., 2022). The sustainable business growth is dependent on business strategies like digital transformation and technological innovativeness. Digital transformation refers to the integration of digital technologies in or all business areas bringing a change into the ways organizations conduct operations, add value, interact with customers and sell products. In this process of change, technologies that modernize, improve, and speed up the business activities are involved like AI, cloud computing, customer relationship management, communication technologies, process automation, content management systems, and enterprise resource planning etc. It helps generate useful knowledge, refine communication structure, integrate resources in effective manner, and tackle with the wastes eradicating all environmental pollution. Thus, it leads to sustainable business growth (Su & Wu, 2024). Technological innovativeness is the way of creating new or improving the existing processes, business models, products, and services applying existing or new technologies to resolve issues and increase efficiency. Beside, information management technologies, communication technology, data analytics, the use of renewable energy technologies, energy efficient technologies, energy storage system, and carbon capture technologies etc. all enables the business organization to create a balance in profits, people, and planet and achieve sustainable growth.

The study is to examine sustainable growth for SMEs in Vietnam. Vietnam is a developing country with a lower-middle-income economy and socialist-oriented market economy. Its nominal GDP for 2025 is \$484.73 billion which sets the country at 30<sup>th</sup> rank. Whereas the purchasing power parity for 2025 is \$1.81 trillion according to which Vietnam is at 23<sup>rd</sup> rank. The economy is divided into three sectors like industry, service, and agriculture with 38.1%, 42.5%, and 11% contribution to country GDP. In the 21<sup>st</sup> century, Vietnam has become part of international economy (Nguyen et al., 2025). In Vietnam, about all the Vietnamese enterprises are small and medium enterprises (SMEs). Vietnamese SMEs are critical to Vietnamese economy, covering more than 98% of businesses. Only SMEs contribute over 40% to GDP growth of the country. More than half of the workers are employed in SMEs, although there are the

issues like lack of digital adoption, lack of access to finance, and beaurocratics' hurdles (DP Tran et al., 2024). With the rapid increase in economic growth, CO2 emissions from the country has been increasing as well. CO2 emissions from Vietnam, has been rising and reached 3.7 tons per capita in 2023 which accounts for more than the global average. The country is making struggle for clean energy, such as controlling carbon intensity of electricity grid, caused by sectors like industry, exports, household use, and projects in process for energy efficiency and biogas (Kim & Tran, 2024).

For the increasing environmental and associated social issues, SMEs are not making rapid and persistence progress in local and national markets as well as being a major part of economy, they add to economic vulnerability. Hence, there is the need to make SMEs pay attention to sustainable growth and the need is met by present study. The study objective is to examine the impact of digital transformation and technological innovativeness on business sustainable growth. Its aim is also to determine the role of employee willingness, and organizational support in relationships between digital transformation, technological innovativeness, and sustainable growth. The current study has great significance to academics for making contribution to literature on sustainability. The study examines the influences of digital transformation and technological innovativeness on a business' sustainability growth. It contributes to literature by analyzing the digital transformation influences on a firm's sustainability growth through a mediator of technological innovativeness. The study also records moderating impacts of employee willingness and organizational support in building relationship among digital transformation, technological innovativeness, and sustainable growth. It also addresses a literary gap by testing the model including employee willingness, organizational support, digital transformation, technological innovativeness, and sustainable growth in Vietnamese SMEs.

The paper is composed of five parts: in the second part, literature review is conducted to examine the relationship among employee willingness, organizational support, digital transformation, technological innovativeness, and a firm's sustainable growth. In the third part, methods for data collection and testing relations have been described. In the fourth part, results about data are analyzed to confirm hypotheses. In the end, study results are supported by previous similar studies. Study Implications, conclusion, and limitations are given.

## LITERATURE REVIEW

In the previous literature, several researchers have expressed their views about employee willingness, organizational support, digital transformation, technological innovativeness, and sustainable business growth. But there is the different among their findings and contexts where the hypotheses are tested. The current study reviews

previous literature to examine the relationships among aforementioned factors and construct hypotheses.

The integration of digital technologies into different business areas, changes the way of operations in all these business areas. It removes problems, improves efficiency, and gives better outcomes adaptive to change in community and market requirements. It enhances knowledge, improves workforce talents, and refine organizational structure leading to adoption of innovative technologies to perform the same business functions in better way satisfying the stakeholders along with raising profits. Thus, digital transformation into organization promotes technological innovativeness (Andriushchenko et al., 2020). Mai et al. (2024), wrote to investigate relationship among digital transformation, IT capabilities, and technological innovativeness along with analyzing the role of government policy. Questionnaires were distributed and data were acquired from SMEs personnel in Vietnam and SEM was applied to check the accuracy of research propositions in light of evidential data. The study implies that the introduction of digital devices and tools in business organization, improves the capabilities of personnel in IT department. They can better collect information on some event, object, or phenomenon, process data efficiently, and generate useful knowledge. With quality information and knowledge, value adding changes can be brought into business technologies giving better results. So, digital transformation boosts technological innovativeness in business. Malekpour et al. (2025), conducted a study in Iran to investigate digital transformation and technological innovativeness. Data were acquired retail market conducting both interviews and questionnaire survey and data were examined using PLS-SEM. The study focuses on the point that in a business organization, digital transformation makes it easy to train the employees along with their jobs enhancing their knowledge, cognitive abilities, and physical skills. It enables them to handle business processes in new ways by using innovative technologies. Thus, digital transformation leads to technological innovativeness.

**H1:** *Digital transformation has a positive association with technological innovativeness.*

The policy of technological innovativeness encourages business management to bring change into business technologies in different areas, whether the change may be through adopting entirely new technologies or improvement in functioning of existing technologies. The change into technologies improves work efficiency, removes the elements causing pollution from production processes and marketing of goods. The environmental preservation along with better economic outcomes, adds to business sustainable growth (Liu et al., 2022). Khan et al. (2025), examines the relationship among technological innovativeness, green innovation, renewable energy, and sustainable growth. Time-series data for 1990 to 2023 were collected from Pakistan. ARDL modelling, FMOLS, and DOLS were conducted for results. The study shows that when technological innovativeness is employed, there is an effective information

and communication system, facilitating in access to green information and green resources. In this situation, green innovation flourishes and renewable energy use for business processes increases. Providing better quality product and services with ecological friendly features to customers, assists business to achieve sustainable growth. [Stankevičienė et al. \(2025\)](#), checks the association between technological innovativeness and sustainable business success also recording change in process and performance. Using the European Innovation Scoreboard data were acquired from 27 EU countries for 2016-2023. GMM models and robust regression were used for analysis. The study reveals that the firms which adopt technological innovativeness, considers the environmental and social issues come into existence during business processes and bring change into technologies accordingly. The use of energy efficient technologies and renewable energy sources mitigates environmental impacts. It saves society from health and resource scarcity issues. Thus, technological innovativeness enhances sustainable business growth.

**H2:** *technological innovativeness has a positive association with sustainable growth.*

In digital transformation, business areas are reformed or managed as the business functions are performed using digital devices or techniques. The use of digital technologies is itself is a technological innovation and it also facilitates the access to and implementing other technologies as per the changing business requirements. The technological innovativeness, improves the business processes as to produce goods or services without creating contaminating substances and adding value for customers. It improves environmental and social performance contributing to sustainable growth of business firm. Through an empirical research, [Chen and Kim \(2023\)](#) examines the relationship among digital transformation, green technology innovation, and sustainable development. Data to examine the relationship among factors were taken from A-share companies listed on Shanghai and Shenzhen, stock exchanges for the period of 2007-2020. The study implies that digital transformation promotes technological innovativeness. It enables management to attain information about ecological friendly resources, pollution free technologies, and strong relations with suppliers. This all helps to choose and acquire ecological-friendly resources to be used for business purposes. It mitigates environmental influences, maintain natural climate, and preserves natural resources. It denotes business growth with sustainability. [Chen et al. \(2023\)](#), investigates the association between digital transformation, innovativeness of green technologies, and sustainable business growth. Energy Conservation and Environmental Protection Enterprises (ECEPEs) database was used to acquire data from Chinese enterprises during 2011 and 2019. The study states that the use of digital computational, information, analytical, and communication technologies as well as robotics or automation technologies, enhances environmental awareness, creates ability to acquire innovative technologies, and develops ability to run green technologies. While business innovation is brought through green

technologies, it creates ecological value to goods and services contributing to green business growth.

**H3:** *Technological innovativeness plays a significant mediating role between digital transformation and sustainable growth.*

Employee willingness is employee inclination, readiness, and eagerness to learn through experience, adapt to changes, participate, and put efforts beyond job requirements. In the presence of eager and inclined employees, digital technologies can be employed to perform the activities in different business departments. Moreover, the employees who are willing to learn and adapt to changes work more energetically to bring technological innovation. The innovation through ecological friendly and social friendly technologies, enables the organizational administrators to reduce environmental problems associated with the business practices and satisfy firm stakeholders about their needs. It leads to increase technological innovativeness. Thus, employee willingness improves the role of digital transformation in technological innovativeness. [Ahn and Chen \(2022\)](#), checks the role of employee perception and employee willingness towards AI, in digital transformation and technological innovativeness. For collecting data, a survey was conducted towards US government employees through using Amazon's Mechanical Turk (MTurk). The study posits that when employees have the good perceptions about AI (usefulness, ease, and security), and are willing to learn about and develop skills to interact with different AI models, the strategy to promote digital transformation can be effectively implemented. Also, the employees who take the use of technologies positively and agree to adopt innovative technologies, facilitate the change of traditional technologies with the new ones or improvement in the existing technologies. So, employee willingness strengthens the role of digital transformation in technological innovativeness. The study of [Ahn and Chen \(2022\)](#), examines the relationship between employee acceptance means willingness, digital transformation, and technological innovativeness in smart cities. An online survey was conducted to approach employees in 10 smart cities in Saudi Arabia. The study reveals that high employee willingness assists in moving towards digital transformation of different organizational departments, promotes technological innovativeness, and thereby, improves the role of digital transformation into technological innovativeness.

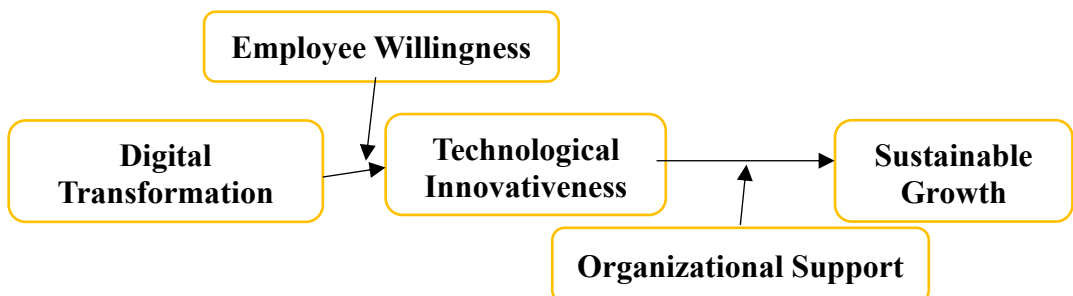
**H4:** *Employee willingness is significant moderator between digital transformation and technological innovativeness.*

Organizational support is the behavior of an organization through its administrative personnel towards employees, where employees are valued and cared for while operating business functions. When organization is supportive, training and learnings sessions are launched for employee to address their weakness and improve employees' cognitive and physical capabilities. The periodically trained and learnt employees

better understand changing trends and interact with innovative technologies. Also, under supportive supervision, the trained and educated employees are able to address environmental issues, enhance social wellbeing, and run firms with sustainable growth. Thus, organizational support moderates the relationship between technological innovativeness and sustainable growth (K.-H. Wang et al., 2021). Castillo-Acobo et al. (2022), integrates the relationship between organizational support, autonomy, risk taking, competitive aggressiveness, technological innovativeness, and sustainable growth. Surveys were held covering 200 manufacturing firms in Poland in 2020 and data were collected through questionnaires. PLS-SEM was employed to analyze the research hypotheses. The study implies that when administrative personnel are supportive, they give the right to employees to share their views, allow them for applying creativity, and create an environment, where employees have facility to perform business processes effectively. It encourages technological innovativeness. And the green innovation guarantees sustainable business growth. Castillo-Acobo et al. (2022), identifies the association among perceived organizational support, innovation, circular economy readiness, and sustainable growth with environmental sustainability. Questionnaires got filled for collecting data from Peru and data were analyzed through smart-PLS. The study claims that in case, employee perceive high support from administrators and supervisors, they are emotionally attached and think for the goodness of organization. These employee struggle more, learn better, and run the innovative technologies. In result of employing green innovative technologies, organization achieves sustainable growth.

**H5:** *Organizational support is a significant moderator between technological innovativeness and sustainable growth.*

Based on the above discussions and mentioned literature, the present article has established the theoretical framework in Figure 1 given below:



**Figure 1:** Research framework

## RESEARCH METHODS

The article examines the impact of digital transformation on technological

innovativeness and technological innovativeness impact on sustainable growth and the study also examines the moderating impact of employee willingness and organizational support among these associations. The study used the primary data collected from the employees of the SMEs to check the association among variables. For this purpose, the study used the survey questionnaires. The study used the items to measure the variables that are extracted from the past studies such as digital transformation is measured with three items extracted from [Oh et al. \(2022\)](#). These items are given in [Table 1](#).

**Table 1: Measurement Items of Digital Transformation**

Items	Statements	Sources
DT1	I think positively about using products with digital technology applied.	<a href="#">(Oh et al., 2022)</a>
DT2	I feel good about using products with digital technology.	
DT3	I am actively in favor of the use of products to which digital technology is applied.	

In addition, technological innovativeness is used as the mediating variable in the study and measured with four items extracted from [\(Oh et al., 2022\)](#). These items are given in [Table 2](#).

**Table 2: Measurement Items of Technological Innovativeness**

Items	Statements	Sources
TI1	I think digital technology is made with the latest technology.	<a href="#">(Oh et al., 2022)</a>
TI2	Digital technology is innovative.	
TI3	Digital technology is original, creative, and novel.	
TI4	Digital technology differs greatly from existing technology.	

Moreover, employee willing is used as the moderating variable in the study and measured with four items extracted from [\(Shah & Ghulam Sarwar Shah, 2010\)](#). These items are given in [Table 3](#).

**Table 3: Measurement Items of Employee Willingness**

Items	Statements	Sources
EMW1	I would consider myself to be "open" to the changes the working style.	<a href="#">(Shah &amp; Ghulam Sarwar Shah, 2010)</a>
EMW2	I am looking forward to the changes in my working according to the technology.	
EMW3	I think that the implementation of digital technology will have a positive effect on how I accomplish my work.	
EMW4	From my perspective, the proposed changes in the working will be for the better.	

In addition, organizational support is also used as the moderating variable in the study

and measured with six items extracted from (Islam & Ahmed, 2018). These items are given in Table 4.

**Table 4: Measurement Items of Organizational Support**

Items	Statements	Sources
OS1	My organization takes pride in my accomplishment.	(Islam & Ahmed, 2018)
OS2	My organization really cares about my well-being.	
OS3	My organization contributions to my values.	
OS4	My organization strongly considers my Goals and values.	
OS5	My organization shows concern for me.	
OS6	My organization is willing to help me when I need a special favor.	

Finally, the sustainable growth is used as the dependent variable in the study and measured with four items extracted from (Bruce et al., 2023). These items are given in Table 5.

**Table 5: Measurement Items of Sustainable Growth**

Items	Statements	Sources
SG1	Digital transformation can improve their sales growth.	(Bruce et al., 2023)
SG2	Digital transformation enables SMEs to get larger market access.	
SG3	Digital transformation platforms help to improve organizational performance and achieve competitive advantage.	
SG4	In my view, digital transformation helps to understand customers better.	

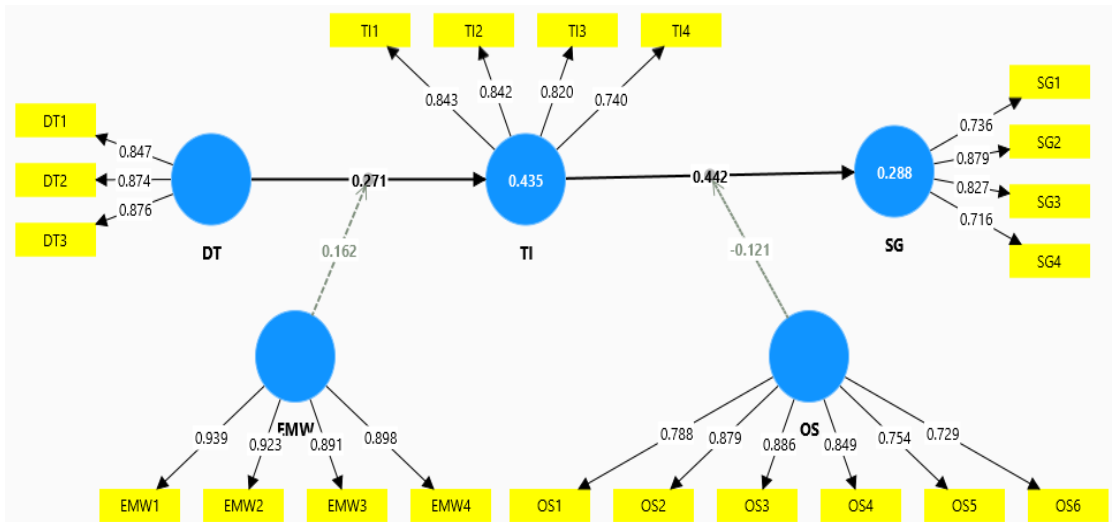
The questionnaires were distributed to the employees of the SMEs using personal visits by the researchers to the SMEs. The employees were chosen by using simple random sampling. The researchers have distributed 567 surveys but after one month only 357 valid responses were received that have around 62.96 percent response rate. In addition, to check the data reliability and association among variables, the study used the smart-PLS. It checks the data reliability using measurement model while it checks the association among constructs using structural model (Hair & Alamer, 2022).

## RESEARCH FINDINGS

The study checks the items correlation to check the convergent validity and the outcomes indicated that the factor loadings of all the items are larger than 0.50. In addition, average variance extracted (AVE) values are also bigger than 0.50 of all the variables and composite reliability (CR) and Alpha values are also higher than 0.70. These results exposed a high correlation that is the indication of valid convergent validity. These outcomes are mentioned in Table 6 and Figure 2.

**Table 6: Convergent Validity**

Constructs	Items	Loadings	Alpha	CR	AVE
Digital Transformation	DT1	0.847	0.833	0.900	0.750
	DT2	0.874			
	DT3	0.876			
Employee Willingness	EMW1	0.939	0.933	0.952	0.833
	EMW2	0.923			
	EMW3	0.891			
	EMW4	0.898			
Organizational Support	OS1	0.788	0.899	0.923	0.666
	OS2	0.879			
	OS3	0.886			
	OS4	0.849			
	OS5	0.754			
	OS6	0.729			
Sustainable Growth	SG1	0.736	0.801	0.870	0.628
	SG2	0.879			
	SG3	0.827			
	SG4	0.716			
Technological Innovativeness	TI1	0.843	0.827	0.886	0.660
	TI2	0.842			
	TI3	0.820			
	TI4	0.740			



**Figure 2: Measurement Assessment Model**

The study also checks the variable correlation to check the discriminant validity and the outcomes indicated that the first figure in the column is higher than other figures in the same column. These results exposed a low correlation that is the indication of valid discriminant validity. These outcomes are mentioned in [Table 7](#).

**Table 7: Fornell Larcker**

	<b>DT</b>	<b>EMW</b>	<b>OS</b>	<b>SG</b>	<b>TI</b>
DT	0.866				
EMW	0.410	0.913			
OS	0.618	0.369	0.816		
SG	0.444	0.378	0.296	0.792	
TI	0.472	0.590	0.357	0.501	0.812

The study also checks the variable correlation to check the discriminant validity and the outcomes indicated that the values that show the correlation with construct itself are higher than the values that show the correlation with other variables. These results exposed a low correlation that is the indication of valid discriminant validity. These outcomes are mentioned in [Table 8](#).

**Table 8: Cross-loadings**

	<b>DT</b>	<b>EMW</b>	<b>OS</b>	<b>SG</b>	<b>TI</b>
DT1	0.847	0.393	0.599	0.414	0.401
DT2	0.874	0.322	0.472	0.391	0.399
DT3	0.876	0.351	0.533	0.352	0.425
EMW1	0.363	0.939	0.359	0.320	0.520
EMW2	0.402	0.923	0.358	0.383	0.544
EMW3	0.324	0.891	0.296	0.351	0.534
EMW4	0.407	0.898	0.335	0.323	0.552
OS1	0.528	0.269	0.788	0.262	0.284
OS2	0.585	0.323	0.879	0.270	0.286
OS3	0.519	0.325	0.886	0.251	0.280
OS4	0.500	0.286	0.849	0.213	0.290
OS5	0.438	0.303	0.754	0.246	0.270
OS6	0.433	0.304	0.729	0.188	0.359
SG1	0.269	0.293	0.172	<b>0.736</b>	0.417
SG2	0.357	0.295	0.227	<b>0.879</b>	0.375
SG3	0.294	0.280	0.164	<b>0.827</b>	0.327
SG4	0.449	0.311	0.337	<b>0.716</b>	0.433
TI1	0.428	0.529	0.293	0.417	<b>0.843</b>
TI2	0.420	0.432	0.285	0.393	<b>0.842</b>
TI3	0.338	0.404	0.242	0.445	<b>0.820</b>
TI4	0.341	0.539	0.335	0.373	<b>0.740</b>

The study also checks the variable correlation to check the discriminant validity and the outcomes indicated that the values are lower than 0.90.

**Table 9: Heterotrait Monotrait Ratio**

	<b>DT</b>	<b>EMW</b>	<b>OS</b>	<b>SG</b>	<b>TI</b>
DT					
EMW	0.465				
OS	0.710	0.404			
SG	0.531	0.430	0.331		
TI	0.567	0.667	0.419	0.603	

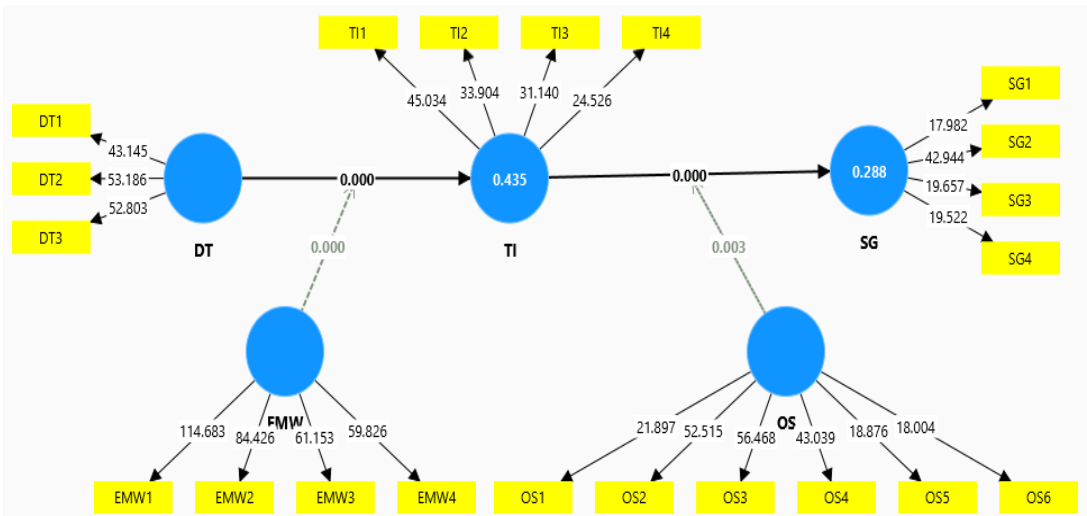
These results exposed a low correlation that is the indication of valid discriminant validity. These outcomes are mentioned in Table 9.

The outcomes indicated that the digital transformation has a positive association with technological innovativeness and accept H1. In addition, the study also exposed that the technological innovativeness has a positive linkage with sustainable growth and accept H2. The results also exposed that the technological innovativeness plays a positive mediating role among digital transformation and sustainable growth and accept H3. Moreover, the employee willingness plays a positive moderating role among digital transformation and technological innovativeness and accept H4. Finally, the results exposed that the organizational support plays negative moderating role among technological innovativeness and sustainable growth and accept H5.

**Table 10: Path Analysis**

Relationships	Beta	Standard deviation	T statistics	P values
DT -> TI	0.271	0.058	4.700	0.000
EMW -> TI	0.511	0.053	9.665	0.000
OS -> SG	0.135	0.051	2.656	0.008
TI -> SG	0.442	0.054	8.178	0.000
EMW x DT -> TI	0.162	0.043	3.758	0.000
OS x TI -> SG	-0.121	0.042	2.922	0.003
EMW x DT -> TI -> SG	0.072	0.020	3.608	0.000
DT -> TI -> SG	0.120	0.033	3.590	0.000
EMW -> TI -> SG	0.226	0.030	7.550	0.000

These outcomes are mentioned in Table 10 and Figure 3.



**Figure 3: Structural Assessment Model**

## DISCUSSION

The results showed that technological innovativeness has a positive association with sustainable growth. These results are supported by (Raihan & Tuspekova, 2022), which reveals that the firms where innovation is brought into technologies to handle business matters, sustainability in business growth can be achieved. These results are also in line with (M. Wang et al., 2021), which highlights that the improvement or newness into the business technologies, helps implement the ecological friendly practices to mitigate the environmental issues in different business areas. It preserves environment and assures sustainable business growth. The results showed that digital transformation has a positive association with technological innovativeness. These results are supported by (Chen et al., 2023), which states that if the policy of digital transformation is executed effectively, organizational personnel have fresh knowledge about technological advancements and operate successfully for technological innovativeness. These results are also in line with (Slavković et al., 2024), which indicates that the boosting digital technologies use in different departments, enhance adaptability and encourages value adding changes in technologies. So, digital transformational assists in technological innovativeness.

The results showed that technological innovativeness plays a significant mediating role between digital transformation and sustainable growth. These results are supported by (Gavrila Gavrila & De Lucas Ancillo, 2022), which posits that when digital technologies are introduced within the organization, it promotes technological innovativeness which develops climate suitable for sustainable growth. These results are also in line with (Philbin et al., 2022), which implies that when there is digital transformation, innovation in organizational technologies is at height and technological innovativeness enhances sustainable growth. The results showed that organizational support is a significant moderator between technological innovativeness and sustainable growth. These results are also in line with (Fernandes et al., 2021), which states that in case, employee received support from organization, technological innovativeness cannot play a better role in achieving sustainable growth. These results are supported by (Omri, 2020). This study explains that when in a business organization supervisors are not supportive to employees, they are not trained as to run innovative technologies. The resultant technological innovativeness cannot enables the organization to get the goal of sustainable growth.

The results showed that employee willingness is significant moderator between digital transformation and technological innovativeness. These results are supported by (Yang et al., 2025), which claims that the organization where employees thinking and skills are polished to attain their willingness for implementing organizational strategies, digital transformation can be implemented effectively and technological innovation can be ensured. These results are also in line with (Yang et al., 2025). The study has the view that in case employees have willingness to experience something

new, it is easy to adopt digital transformation and boosts technological innovativeness.

## **IMPLICATIONS**

Environmental pollution is prevailing across the globe and climate changes have been occurring with the expansion of businesses. The present study with focus on sustainable business growth is significant to SMES in countries like Vietnam to tackle with environmental issues. The current study provides guidelines to business management and regulators how to promote a business sustainable growth. The study guides that organizational management must pass policies to promote technological innovativeness and they may accelerate sustainable growth. The study also suggests that digital transformation should be encouraged and facilitated within business organizations to be efficient in achieving high sustainable growth. There is also a suggestion that regulators must try to encourage digital transformation in businesses in order to bring technological innovativeness and thereby, increase business sustainable growth. The study conveys that management must motivate employee willingness through training, learning, and development processes. It would be helpful in implementing digital transformation and have good outcomes from technological innovativeness. Moreover, the study has a guideline that organization should be supportive, so that technological innovativeness can be brought and sustainable business growth can be achieved.

## **CONCLUSION**

The objective of the study is to elaborate the influences of the digital transformation influences on a firm's sustainability growth with a mediator of technological innovativeness. Its aim is also to examine the role of employee willingness between digital transformation and technological innovativeness as well as the role of organizational support between technological innovativeness and firm's sustainable growth. Hypotheses were tested with evidential data from Vietnamese SMEs. The study revealed a positive association of technological innovativeness with sustainable growth. The organizations which have the policy of technological innovativeness, adopt eco-friendly technologies to integrate the resources in the way, they leave least impact on environment, enhances social welfare, and help achieve sustainable growth. The study found a positive link between digital transformation and technological innovativeness. The firms acting on business strategy like digital transformation, bring changes into the business operating and production technologies, according to change requirements of stakeholders. Hence digital transformation leads to technological innovativeness. The study concluded that technological innovativeness significantly mediates between digital transformation and sustainable growth. Firms which effectively execute digital transformation are able to bring technological innovativeness which facilitate to achieve sustainable business growth. The study shown that employee willingness is a significant moderator between digital

transformation and technological innovativeness. The employee willingness enhances employee engagement to implement digital transformation and thus, technological innovativeness can be assured within organization. The study also highlighted that organizational support is a significant moderator between technological innovativeness and firm's sustainable growth. When organization have responsible and supportive behavior with employees technological innovativeness can better lead to achieving sustainable business growth.

## LIMITATIONS

The present study also carries some limitations. First, the study scope is limited as the research framework only proposes the relationship of digital transformation, technological innovativeness, and a firm's sustainable growth. It recommends the authors to include more factors to turn the study into comprehensive one. Second, the present study checks only indirect relation of digital transformation to a firm's sustainable growth as it examines relationship between digital transformation and sustainable growth with a mediating role of technological innovativeness. In further studies, there is the need also to check the direct influence of digital transformation on sustainable growth. Third, this study is based on information Vietnamese SMEs and expect from research to test the same model in more economies.

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