Impact of market orientation on competitiveness: Analysis of in vocational colleges in Thailand

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Abstract

Sustainability in competitiveness is a challenge in the current comitative market. Similar with the business companies, the educational institutions are facing the issues of sustainable competitiveness. Particularly, the vocational colleges working in Thailand are facing stiff competition which require sustainability in competitiveness. For this purpose, the current study is an attempt to propose market orientation as a tool to promote sustainable competitiveness. The objective of this study is to examine the effect of market orientation in sustainable competitiveness among the vocational colleges in Thailand. Primary data is collected through questionnaire survey which is used to examine the relationship between market orientation and sustainable competitiveness. It is found that; market orientation has positive role to promote sustainable competitiveness. Market orientation has the potential to promote competitor identification, technology implementation and customization which further causes to enhance sustainable competitiveness.

Keywords. Market orientation, competitor identification, technology implementation, customization, sustainable competitiveness, vocational college Thailand.

I. Introduction

Vocational institutions are those educational institutions which provide skill-based training to the students (Sergeieva et al., 2021; Widtayakornbundit & Phinaitrup, 2021) the skill-based training has central importance to do effective work in any activity. The development of skills among the students also has significant importance for the organizations. Thailand government is now focusing on these institutions to promote skills among the students along with the theory. In this way number of colleges working in Thailand to provide vocational training. These colleges include; private as well as government-based colleges (Borja, 2019). All these institutions are contributing to the society as well as at national level by providing the education through skillbased training.

On the other hand, these vocational colleges are facing competition in the market. As number of private as well as government colleges are providing skill-based training and the number of these institutions are increasing significantly. Although it is one of the positive signs for the society because the increase in number of these colleges can increase the students with skillbased education, however, it increases the competition in the education industry. The competition in the education industry is also helpful to provide quality of education. That is the reason these institutions are trying to promote quality education along with quality training activities which has significant importance for the students. However, the survival of these colleges is challenge in such competitive market. Therefore, these colleges are facing the issue of competitiveness. It is not for colleges easv these to sustain competitiveness for a longer period of time. The decrease in competitiveness (Palmer et al., 2010) has negative effect on these colleges because they are facing the threat of failure in such competitive market. To capture the greater number of students by these institutions, it is promote important to sustainable competitiveness which is not easy for these

institutions. Because it is based on sufficient resources to enhance competitive position.

To promote sustainable competitiveness the current study proposed the phenomena of market orientation. Market orientation is one of the important tools (Khamaludin et al., 2022) which can promote competitive position of these institutions. As highlighted in the literature that market orientation has a significant relationship with competitive advantage. The market orientation is linked with various factors such as competitor identification, technology implementation and customization. The market orientation of the colleges can make their strategies similarly. Furthermore, market orientation can also promote the technology implementation. To get success in sustainable competitiveness is necessary for the colleges to promote latest technology in the education sector. In addition to this, the customization is also most important which can be achieved with the help of market orientation. The market orientation helps the colleges to gather knowledge from the market about the education system and these institutions can improve the education system as well as education quality with the help of public requirement. All these elements have the ability to promote sustainable competitiveness (Mills et al., 2021)

Thus, the objective of this study is to examine the effect of market orientation on sustainable compositeness among the vocational colleges of Thailand. The problem of sustainable competitiveness is not examined by the previous studies, although, studies are available on this (Arsić & Fedajev, 2022; Gomes et al., 2022) however, it is rare in education sector. This phenomenon is most important to address in the literature to enhance the performance of vocational colleges. Therefore, this ignored area is considered by the current study and contributing to the literature as well as practice. In addition, the current study also identified various important factors such as competitor identification, technology implementation and customization in education sector which is rarelv addressed bv previous studies (Abdeljaber et al., 2020; Abulela & Harwell, 2020; Afitah & Isra, 2020; Akçay & Akcay, 2020; Anugrah & Dianawati, 2020).

2. Literature Review and Hypotheses Development

2.1 Market Orientation and Sustainable Competitiveness

Market orientation is a method that prioritizes classifying the requirements and desires of consumers as well as creating products and services that satisfy them. Among the vocational colleges the priority to the stakeholders is most important. The most important stakeholder of these colleges is students. The students must be satisfied from the education as well as training delivery from the colleges. In this way the colleges must ensure the preference of students as well as the need of industry for the students which must be delivered by the education as well as skills which are required by the industry (Acar & Kayaoglu, 2020; Agrawal & Singh, 2020; Aksoy-Pekacar et al., 2020; Alvis, 2020; Amani & Akbari, 2021). This study Introduced market orientation as a significant element for the development of vocational colleges. It has significant influence on competitiveness of the colleges. The competitiveness is the situation of the institutions that can help to compete with the competitors in the market. Most importantly the sustainable competitiveness is the long-term benefits for the Institution, however it is not easy to gain a long-term competitiveness in which sustainability is one of the major issues. In this way market orientation can help to enhance sustainable competitiveness. The activities of the institutions to get information from market and provide various quality services related to the needs of the customer can promote sustainable competitiveness. Previous studies highlighted that market orientation has effect on sustainability of the institutions (Mitchell et al., 2013; Nasution et al., 2020; Sari et al., 2020)Therefore, the current study proposed that market orientation has significant positive relationship with sustainable competitiveness of vocational colleges. The current study shows the framework of the study in Figure 1 which indicated the relationship between market orientation and sustainable competitiveness (Akanle & Shadare, 2020; Altounjy et al., 2020; Amarulla Octavian, 2020; Antoni et al., 2020; As'ari et al., 2021).

Hypothesis 1. Market orientation has positive effect on sustainable competitiveness.



Figure 1. Theoretical framework of the study

2.2 Competitor Identification

In the competitive market the identification of potential competitors is most important. Similar with other business industries the educational industries also have significant issues related to the competition. In this way the competitiveness of the operations is most important to attain to survive in a competitive environment. Therefore, it is most important for the institutions to promote sustainable competitive operations for long term benefits in which market orientation has most important role. The identification of competitor helps the institutions to make various strategies to compete with the competitor. It helps to take different actions related to the improvement in the quality and to promote the services with the help of technology to gain sustainable competitiveness. Previous studies also show that market orientation has a relationship with competitive advantage (Murray et al., 2011). This study proposes that market orientation has a significant role to promote competitor identification which can lead to the sustainable competitiveness.

Hypothesis 2. Market orientation has positive effect on competitor identification.

Hypothesis 3. Competitor identification has positive effect sustainable competitiveness.

Hypothesis 4. Competitor identification mediates the relationship between market orientation and sustainable competitiveness.

2.3 Technology Implementation

In the current competitive environment, the introduction of new technology is most

important to survive in the market (Doringin, 2019; Hair et al., 2017) The institutions that focus on new technology implementation always get success in various activities and achieve better performance. In the current environment of latest technology, the latest technology is always available in the market, however, it is not easy for the institutions to adopt that technology. Even for the educational institutions the latest technology is important for the education system is also important. Therefore, in education sector, it is also important to introduce new technology for the delivery of lecture and to conduct the examination along with the management of student's data. The relationship between market orientation and technology is already addressed by previous studies (Al-Henzab et al., 2018; Kazakov et al., 2020), however it is not addressed in vocational colleges. This study also proposed that technology implementation has positive role to promote competitiveness which is also mentioned in previous studies. Therefore, this study proposes that market orientation can promote technology implementation which further enhances the sustainable competitiveness.

Hypothesis 5. Market orientation has positive effect on technology implementation.

Hypothesis 6. Technology implementation has positive effect sustainable competitiveness.

Hypothesis 7. Technology implementation mediates the relationship between market orientation and sustainable competitiveness.

2.4 Customization

The action of making or changing something according to the buyer's or user's needs: The website allows users some customization. In the education sector the customization is described as the provision of various facilities based on innovation and technology to introduce latest education methods to fulfill the needs of the students and enhance the overall performance. In this way it is needed to promote the activities of the company related to the needs of the students. In highly competitive market the provision of education based on the requirements of the people is most important. Most importantly the introduction of latest technological in education and the ease of students along with the delivery of High-Quality Services is most important. In this way, customization is most important to modify the services. For the services given to the students must be modified in modern ways with the help of new technology. Therefore, along with other business industries the customization is also important in education sector. As several studies highlighted customization in various industries, however the phenomena of customization are ignored in education sector. Most importantly it is ignored in vocational institutions. In this way the current study proposes that customization require market orientation and customization is also helpful to promote sustainable competitiveness. To enhance customization, market orientation has significant importance which lead to the sustainable competitiveness among the vocational colleges in Thailand (Abdeljaber et al., 2021; Água & Morgado, 2020; Aragonés-Jericó et al., 2020; Hong, 2020; Metcalfe et al., 2020).

Hypothesis 8. Market orientation has positive effect on customization.

Hypothesis 9. Customization has positive effect on sustainable competitiveness.

Hypothesis 10. Customization mediates the relationship between market orientation and sustainable competitiveness.

3. Research Methodology

The selection of suitable method in research study is most important to get original result. In this way, the current study uses quantitative research approach by following the literature. Several studies in the literature recommended quantitative approach to measure these variables. Although number of research approaches are available in the literature and recommended by several previous studies, however, quantitative research approach is more suitable in this study. While considering quantitative research, cross-sectional research design is used in the current study in which questionnaire survey is followed. In questionnaire survey the current study used cross sectional research design (Duke & Osim, 2020).

The questionnaire development is based on five namely: variables. market orientation competitor identification, technology implementation, customization and sustainable competitiveness. The independent variable namely market orientation is selected based on the policies of the institution to consider market knowledge in relation to the competitiveness. To measure this variable the current study considered market orientation based on the information collected from the stakeholders to make various strategies. Furthermore, competitor identification is measured by using the intention of the colleges to identify various potential competitors and make various strategies to compete in competitive market. Technology implementation is measured by using the intention of the colleges to use this latest technology in education system. Furthermore, customization is based on to measure the policies of the college to provide customized education as well as various other educational facilities. Finally, sustainable competitive is measured with the help of various strength of the colleges in relation to the competitiveness as well as weaknesses.

The development of questionnaire lead to the data collection from the employees working in vocational colleges of Thailand. Only employees are selected in this study because employees have better idea about the market orientation strategies as well as sustainable competitiveness. In this way the current study used 600 questionnaires for data collection and distributed among the employees working in vocational colleges of Thailand. Area sampling is used in this study for data collection because it is more suitable technique while collecting data from widespread population. Finally, this study received 310 research questionnaires in response to the data collection. Five

questionnaires were not usable. Therefore, total 305 questionnaires were used in this study to achieve the study objective.

After the data collection, the data is entered in the excel sheet to proceed data analysis. Even in this process, various errors including the missing value as well as outlier in the data is possible. To remove the missing values as well as outlier, the current study carried out data screening. While data screening various missing values in different variables are identified and removed with the help of recommended technique. In addition to this, this study has not found any outlier in the data. Find the data statistics are provided in Table 1.

	No.	Missing	Mean	Median	Min	Max	Standard	Excess	Skewness
							Deviation	Kurtosis	
MO1	1	0	3.151	3	1	7	1.481	-0.492	0.109
MO2	2	0	3.328	3	1	7	1.806	-0.543	0.494
MO3	3	0	3.398	3	1	7	1.624	-0.243	0.34
MO4	4	0	3.339	3	1	7	1.713	-0.587	0.258
MO5	5	0	3.301	3	1	7	1.718	-0.921	0.089
MO6	6	0	3.516	3	1	7	1.821	-0.661	0.305
MO7	7	0	3.403	3	1	7	1.785	-0.383	0.537
CI1	8	0	3.376	3	1	7	1.854	-0.833	0.274
CI2	9	0	3.317	3	1	7	1.726	-0.38	0.429
CI3	10	0	3.5	3	1	7	1.748	-0.469	0.368
TI1	11	0	3	3	1	7	1.444	0.109	0.702
TI2	12	0	3.059	3	1	7	1.4	0.801	0.89
TI3	13	0	3.118	3	1	7	1.31	1.206	0.935
CUS1	14	0	3.022	3	1	7	1.379	0.645	0.766
CUS2	15	0	2.973	3	1	7	1.33	0.356	0.589
CUS3	16	0	3.065	3	1	7	1.394	0.275	0.581
SB1	17	0	2.989	3	1	7	1.299	0.629	0.687
SB2	18	0	2.935	3	1	7	1.397	0.036	0.545
SB3	19	0	3.086	3	1	7	1.353	0.37	0.63
SB4	20	0	3.032	3	1	7	1.436	0.156	0.667
SB5	21	0	3.043	3	1	7	1.387	0.282	0.666
SB6	22	0	3.113	3	1	7	1.345	-0.001	0.5
SB7	23	0	3.059	3	1	7	1.333	0.197	0.523

 Table 1. Data Statistics

4. Data Analysis

Previous studies such as (Hair et al., 2017; Hair et al., 2019; Hameed et al., 2021) recommended that Partial Least Square (PLS) is most suitable statistical tool to analyze the data collected through questionnaire survey. The data analysis of this study is grounded on PLS structural equation modeling (SEM). PLS-SEM is based on two major steps which include measurement model as well as structural model. Figure 2 shows the measurement model which is based on the outer model assessment. The outer model assessment is grounded on the factor loadings which should be above 0.5, however, the items having factor loading below 0.5 must be deleted from the analysis. Figure 2 shows the factor loading along with Table 2 and it is evident that all the scale items are above 0.7. Figure 2 shows that market orientation is measured by using seven items. Sustainable competitiveness is measured by using seven scale items. technology Furthermore, implementation, customization and competitor identifications are measured by using three items each. These variables have achieved the minimum threshold level in factor loadings.



Figure 2. Measurement Model Assessment

Table	1.	Factor	Loadings
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Variables	Items	Loadings	Alpha	CR	AVE
Competitor Identification	CI1	0.915	0.912	0.945	0.851
	CI2	0.932			
	CI3	0.919			
Customization	CUS1	0.91	0.914	0.946	0.853
	CUS2	0.922			
	CUS3	0.938			
Market Orientation	MO1	0.881	0.955	0.963	0.788
	MO2	0.865			

	MO3	0.903			
	MO4	0.906			
	MO5	0.894			
	MO6	0.89			
	MO7	0.876			
Sustainable Competitiveness	SB1	0.882	0.949	0.958	0.767
	SB2	0.858			
	SB3	0.888			
	SB4	0.888			
	SB5	0.848			
	SB6	0.887			
	SB7	0.877			
Technology Implementation	TI1	0.897	0.901	0.938	0.835
	TI2	0.924			
	TI3	0.92			

Factor loading confirmation in measurement model achieved the internal item reliability Furthermore, to check the reliability of the variables the current study considered composite reliability. Composite reliability is given in Table 2 which shows that market orientation has composite reliability 0.963, customization has composite reliability 0.946, competitor identification has composite reliability 0.945, sustainable competitiveness has composite liability 0.958 and finally, technology implementation has composite liabilities 0.938. Therefore, all the variables have achieved the minimum reliability criteria. Furthermore, average variance extracted (AVE) is used to check the convergent validity and according to previous studies, it should be above 0.5 for all variables. The AVE is above 0.5 as shown in Table 2 which confirmed the convergent validity. Finally, measurement model of the current study examined discriminant validity (Afthanorhan, 2013; Khamaludin et al., 2022; Nasution et al., 2020) by using cross loadings which shown in Table 3.

 Table 3. Discriminant Validity

	Competitor Identification	Customization	Market Orientation	Sustainable Competitiveness	Technology Implementation
CI1	0.915	0.586	0.89	0.57	0.568
CI2	0.932	0.586	0.849	0.567	0.595
CI3	0.919	0.577	0.823	0.576	0.578
CUS1	0.585	0.91	0.611	0.852	0.816
CUS2	0.591	0.922	0.624	0.853	0.812

CUS3	0.577	0.938	0.607	0.881	0.788
MO1	0.826	0.642	0.881	0.632	0.618
MO2	0.797	0.609	0.865	0.606	0.593
MO3	0.831	0.602	0.903	0.597	0.603
MO4	0.811	0.578	0.906	0.582	0.58
MO5	0.824	0.573	0.894	0.551	0.567
MO6	0.846	0.576	0.89	0.533	0.549
MO7	0.825	0.546	0.876	0.542	0.55
SB1	0.609	0.863	0.644	0.882	0.81
SB2	0.583	0.841	0.626	0.858	0.805
SB3	0.53	0.825	0.531	0.888	0.795
SB4	0.506	0.804	0.552	0.888	0.789
SB5	0.57	0.797	0.594	0.848	0.777
SB6	0.505	0.79	0.522	0.887	0.804
SB7	0.487	0.798	0.518	0.877	0.81
TI1	0.533	0.801	0.567	0.846	0.897
TI2	0.614	0.803	0.637	0.828	0.924
TI3	0.577	0.786	0.588	0.828	0.92

The measurement model of the current study confirmed that the data as well as scale is reliable and valid to proceed for further analysis. In this way, the current study carried out structural model assessment as shown in Figure 2. The structural model is also known as inner model in which t-value 1.96 and beta value is most important to observe the significance of the relationship (Afthanorhan, 2013; Hair et al., 2017; Hair et al., 2019; Hameed et al., 2021; Mohammed et al., 2022). The results are given in Table 4 which shows that market orientation has significant effect on competitor identification. It also has a significant effect on technology implementation. Additionally, it is found that market orientation has also significant relationship with customization and sustainable competitiveness. The results of the study also proved that competitor identification. Technology implementation and customization significant influence on sustainable has competitiveness. Finally, it is evident that all the direct hypotheses are supported as the t-value is above 1.96 and beta value is positive.



Figure 2. Structural Model Assessment

	Original Sample (O)	Sample Mean (M)	Standard Deviation (STDEV)	T Statistics (O/STDEV)	P Values
Competitor Identification -> Sustainable Competitiveness	0.024	0.022	0.005	4.79	0.0
Customization -> Sustainable Competitiveness	0.576	0.573	0.051	11.182	0
Market Orientation -> Competitor Identification	0.927	0.927	0.01	96.174	0
Market Orientation -> Customization	0.665	0.666	0.045	14.611	0
Market Orientation -> Sustainable Competitiveness	0.022	0.02	0.011	1.999	0.041
Market Orientation -> Technology Implementation	0.654	0.656	0.048	13.642	0
Technology Implementation -> Sustainable Competitiveness	0.412	0.414	0.055	7.554	0

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This study is not only limited to the direct effect of variables, the current study also considered the indirect effect of competitor identification, technology implementation and customization between market orientation and sustainable competitiveness. It is observed from Table 5 that competitor identification is not a mediating variable between market orientation and sustainable competitiveness as the t-value is 0.47. On the other hand, customization is a mediating variable between market orientation and sustainable competitive with t-value 8.31. In addition to this, technology implementation is also a mediating variable between market orientation and sustainable competitiveness with t-value 7.518. Therefore, from this indirect

effect it is found that customization and technology implementation have the ability to

develop a relationship between market orientation and sustainable competitiveness.

	Original Sample (O)	Sample Mean (M)	Standard Deviation (STDEV)	T Statistics (O/STDEV)	P Values
Market Orientation -> Competitor Identification -> Sustainable Competitiveness	0.022	0.02	0.047	0.47	0.639
Market Orientation -> Customization -> Sustainable Competitiveness	0.383	0.382	0.046	8.31	0
Market Orientation -> Technology Implementation -> Sustainable Competitiveness	0.269	0.271	0.036	7.518	0

Table 5. Results of In-Direct Effect

This study also observed the variance explained with the help of r-squared value(Hayajneh et al., 2022; Nasution et al., 2020). The r-squared value given in Figure 2 is 0.912 for sustainable competitiveness. It indicates that all the variables can bring 91.2% change in sustainable competitiveness which is considered as strong.

5. Conclusion

It is concluded that market orientation is one of the influential factors to promote sustainable competitiveness among the vocational colleges of Thailand. The issues related to the sustainable competitiveness can be managed by developing various strategies related to the market orientation which may have important contribution to promote overall. As results of the study shows that market orientation has positive effect on competitor identification. The competitor identification in the market may lead to develop various strategies to look after the competitor activities and develop various strategies to compete in competitive market. Furthermore, market orientation is important in sustainable competitiveness in a way that it helped to introduce new technology in education system. Market orientation bring the intention of the management to introduce latest technology which is one of the most significant steps to promote competitiveness. In addition to this, sustainable competitiveness is one of the important elements which always require customization by the educational institution. The customizations among education institutions can also be promoted for market

orientation. Therefore, market orientation is an important tool to promote sustainable competitiveness with the help of competitor identification, technology implementation and customization. It is recommended to the vocational colleges of Thailand to promote sustainable competitiveness through promotion of competitor identification, technology implementation and customization by making various strategies to promote market orientation.

References

- Abdeljaber, O., Ab Yajid, M. S., Ariffin, I. A., & Shukri, S. M. (2021). The Impact Of Authentic Learning On Achievements Of Geography Studies Students And Their Attitudes In The Direction Of Geographic Information System. *PalArch's Journal of Vertebrate Palaeontology*, 18(2), 1-20.
- [2] Abdeljaber, O., Al-masaeed, S., Azam, S. M. F., Ab Yajid, M. S., Alsoud, A. R., & Johar, M. G. M. (2020). The role of Trade Integration and Cross-Border Entrepreneurship in International Relations: A moderating role of IT Infrastructure. *Croatian International Relations Review*, 27(87), 63-94.
- [3] Abulela, M. A. A., & Harwell, M. (2020). Data analysis: Strengthening inferences in quantitative education studies conducted by novice researchers. *Educational Sciences: Theory & Practice*, 20(1), 59-78.

https://doi.org/https://doi.org/10.12738/je stp.2020.1.005

- [4] Acar, A., & Kayaoglu, M. N. (2020). MOODLE as a Potential Tool for Language Education under the Shadow of COVID-19. Eurasian Journal of Educational Research, 90, 67-82. <u>https://doi.org/https://doi.org/10.14689/ej</u> <u>er.2020.90.4</u>
- [5] Afitah, I., & Isra, E. P. (2020). Analysis of Forest and Land Fire with Hotspot Modis on Various Types of Land Cover in Central Kalimantan Province. *AgBioForum*, 23(2), 13-21.
- [6] Afthanorhan, W. (2013). A comparison of partial least square structural equation modeling (PLS-SEM) and covariance based structural equation modeling (CB-SEM) for confirmatory factor analysis. *International Journal of Engineering Science and Innovative Technology*, 2(5), 198-205.
- [7] Agrawal, M., & Singh, R. (2020). Factors Associated with Police Depression: A Systematic Review. *International Journal* of Criminal Justice Sciences, 15(1), 34-50.
- [8] Água, P. B., & Morgado, A. V. (2020). Project Governance, An essay on the business policy approach as applied to the governance of megaprojects. *The Journal* of Modern Project Management, 8(2), 1-17.
- [9] Akanle, O., & Shadare, B. R. (2020). Why has it been so difficult to Counteract Cyber Crime in Nigeria? Evidence from an Ethnographic Study. *International Journal of Cyber Criminology*, *14*(1), 29-43.
- [10] Akçay, B. D., & Akcay, D. (2020). What are the factors that contribute to aggression in patients with co-occurring antisocial personality disorder and substance abuse? Archives of Clinical Psychiatry (São Paulo), 47, 95-100. <u>https://doi.org/https://doi.org/10.1590/01</u> 01-6083000000240
- [11] Aksoy-Pekacar, K., Kanat-Mutluoğlu, A., & Hakki-Erten, İ. (2020). " I am just shy and timid": Student teachers' explanations for their performances of their presentations. *Eurasian Journal of Applied Linguistics*, 6(3), 459-480. <u>https://doi.org/https://doi.org/10.32601/ej</u> <u>al.834657</u>
- [12] Al-Henzab, J., Tarhini, A., & Obeidat, B.Y. (2018). The associations among market

orientation, technology orientation, entrepreneurial orientation and organizational performance. Benchmarking: An International Journal.

- [13] Altounjy, R., Alaeddin, O., Hussain, H. I., & Sebastian, K. O. T. (2020). Moving from bricks to clicks: Merchants' acceptance of the mobile payment in Malaysia. International Journal Of Ebusiness And Egovernment Studies, 12(2), 136-150.
- [14] Alvis, J. W. (2020). A Phenomenology of Discernment: Applying Scheler's 'Religious Acts' to Cassian's Four Steps. *European journal for philosophy of religion*, 12(4), 63-93. <u>https://doi.org/https://doi.org/10.24204/ej</u> <u>pr.v12i4.3524</u>
- [15] Amani, V. J., & Akbari, H. (2021). Effects Of Consumer Perception On Decision To Purchase: A Case Of Samsung Electronics. *International Journal of Business and Management Studies*, 13(1), 22-37.
- [16] Amarulla Octavian, J. W., I Nengah Putra, A. Kukuh Susilo, Okol S. Suharyo. (2020). Risk Analysis of Islamic State (IS) Network Development in Southeast Asia Based on 3D Matrix. *International journal of operations and quantitative management*, 26(3), 195-223. <u>https://doi.org/https://doi.org/10.46970/2</u> <u>021.26.3.3</u>
- [17] Antoni, X. L., Dlepu, A., & Notshe, N. (2020). A comparative study of financial literacy among undergraduate commerce and arts students: A case of a South African University. INTERNATIONAL JOURNAL OF ECONOMICS AND FINANCE, 12(2), 563-580. <u>https://doi.org/https://doi.org/10.34109/ij</u> <u>efs.202012101</u>
- [18] Anugrah, Y. R., & Dianawati, W. (2020). Corporate Social Responsibility (CSR) Disclosure, Earnings Response Coefficient (ERC), and the Chance to Grow. *Cuadernos de Economía*, 43(123), 382-390. <u>https://doi.org/https://doi.org/10.32826/c</u> ude.v43i123.302
- [19] Aragonés-Jericó, C., Kúster-Boluda, I., & López, N. V. (2020). Value-experience transfer through sports sponsorship: Background and consequences. *Revista de*

Psicología del Deporte (Journal of Sport Psychology), 29(1), 133-142.

[20] Arsić, S., & Fedajev, A. (2022). The Impact of Investment on Sustainable Competitiveness Aspects: Is There a Difference Between the Old and New EU Member States? In Handbook of Research on Global Aspects of Sustainable Finance in Times of Crises (pp. 333-354). IGI Global. <u>https://doi.org/https://doi.org/10.4018/97</u>

8-1-7998-8501-6.ch016

- [21] As'ari, H., Airawaty, D., & Faisol, B. Z. (2021). Corporate Action, Share Prices, Random Effect Model Approach. *International Journal of Social Sciences* and Humanity Studies, 13(1), 102-126.
- [22] Borja, C. (2019). Public Relations and Communication Management in Technical-Vocational Schools in the Province of Rayong, Thailand. *Thailand* (*June 3, 2019*). <u>https://doi.org/https://doi.org/10.2139/ssr</u> n.3697659
- [23] Doringin, F. (2019). The steps of technology implementation in education for sustainable development of junior highschool in Jakarta. The 1st Workshop on Multimedia Education, Learning, Assessment and its Implementation in Game and Gamification in conjunction with COMDEV 2018,
- [24] Duke, E. O., & Osim, S. E. (2020). The culture of slavery in traditional context and globalised society. *socialspacejournal. eu*, 145.
- [25] Gomes, J. M., Sousa, B. B., & Dieguez, T. (2022). Encouraging Internationalization and Sustainable Competitiveness in Construction: A Preliminary Approach in Portugal. *International Journal of Social Ecology and Sustainable Development (IJSESD)*, 13(4), 1-11. <u>https://doi.org/https://doi.org/10.4018/IJS ESD.290321</u>
- [26] Hair, J. F., Hult, G. T. M., Ringle, C. M., Sarstedt, M., & Thiele, K. O. (2017). Mirror, mirror on the wall: a comparative evaluation of composite-based structural equation modeling methods. *Journal of the academy of marketing science*, 45(5), 616-632.

https://doi.org/https://doi.org/10.1007/s1 1747-017-0517-x

- [27] Hair, J. F., Ringle, C. M., Gudergan, S. P., Fischer, A., Nitzl, C., & Menictas, C. (2019). Partial least squares structural equation modeling-based discrete choice modeling: an illustration in modeling retailer choice. *Business Research*, 12(1), 115-142. <u>https://doi.org/https://doi.org/10.1007/s4</u> 0685-018-0072-4
- [28] Hameed, W. U., Nisar, Q. A., & Wu, H.-C. (2021). Relationships between external knowledge, internal innovation, firms' open innovation performance, service innovation and business performance in the Pakistani hotel industry. *International Journal of Hospitality Management*, 92, 102745. https://doi.org/https://doi.org/10.1016/j.ij

hm.2020.102745

[29] Hayajneh, J. A. M., Elayan, M. B. H., Abdellatif, M. A. M., & Abubakar, A. M. (2022). Impact of business analytics and π -shaped skills on innovative performance: Findings from PLS-SEM and fsQCA. *Technology in Society*, 68, 101914. https://doi.org/https://doi.org/10.1016/j.te

<u>https://doi.org/https://doi.org/10.1016/j.te</u> chsoc.2022.101914

- [30] Hong, L. (2020). Challenges in application of German higher vocational education mechanism in Chinese Schoolenterprises. *Revista de psicología del deporte*, 29(4), 115-125.
- [31] Kazakov, S., Ruiz-Alba, J. L., & Muñoz, M. M. (2020). The impact of information and communication technology and internal market orientation blending on organisational performance in small and medium enterprises. *European Journal of Management and Business Economics*. <u>https://doi.org/https://doi.org/10.1108/EJ</u> <u>MBE-04-2020-0068</u>
- [32] Khamaludin, K., Syam, S., Rismaningsih, F., Lusiani, L., Arlianti, L., Herlani, A., . . . Widiyatun, F. (2022). The influence of social media marketing, product innovation and market orientation on Indonesian SMEs marketing performance. *International Journal of Data and Network Science*, 6(1), 9-16. <u>https://doi.org/https://doi.org/10.5267/j.ij dns.2021.11.002</u>
- [33] Metcalfe, A., Soboroff, S., & Kelley, C. P. (2020). Social and Leadership Processes

within the Kurdish Women's Freedom Movement. *Res Militaris*, 10(2), 61-75.

- [34] Mills, E. F. E. A., Dong, J., Yiling, L., Baafi, M. A., Li, B., & Zeng, K. (2021). Towards sustainable competitiveness: How does financial development affect dynamic energy efficiency in Belt & Road economies? *Sustainable Production and Consumption*, 27, 587-601. <u>https://doi.org/https://doi.org/10.1016/j.s</u> pc.2021.01.027
- [35] Mitchell, R., Wooliscroft, B., & Higham, J. E. (2013). Applying sustainability in national park management: balancing public and private interests using a sustainable market orientation model. *Journal of Sustainable Tourism*, 21(5), 695-715.

https://doi.org/https://doi.org/10.1080/09 669582.2012.737799

- [36] Mohammed, M., Shafiq, N., Al-Mekhlafi, A.-B. A., Rashed, E. F., Khalil, M. H., Zawawi, N. A., . . . Sadis, A. M. (2022). The Mediating Role of Policy-Related Factors in the Relationship between Practice of Waste Generation and Sustainable Construction Waste Minimisation: PLS-SEM. *Sustainability*, *14*(2), 656. <u>https://doi.org/https://doi.org/10.3390/su</u> 14020656
- [37] Murray, J. Y., Gao, G. Y., & Kotabe, M. (2011). Market orientation and performance of export ventures: the process through marketing capabilities and competitive advantages. *Journal of the academy of marketing science*, *39*(2), 252-269.

https://doi.org/https://doi.org/10.1007/s1 1747-010-0195-4

- [38] Nasution, M. I., Fahmi, M., & Prayogi, M. A. (2020). The Quality of Small and Medium Enterprises Performance Using the Structural Equation Model-Part Least Square (SEM-PLS). Journal of Physics: Conference Series,
- [39] Palmer, R. T., Davis, R. J., Moore III, J. L., & Hilton, A. A. (2010). A nation at risk: Increasing college participation and persistence among African American males to stimulate US global competitiveness. *Journal of African American Males in Education (JAAME)*, 1(2), 105-124.
- [40] Sari, R., Junita, D., & Anugerah, R. (2020). Market Orientation, Innovation and Its Impact on Environmental Sustainability Practices: Evidence from Indonesian Palm Oil Companies. Progress in Social Science, Humanities and Education Research Symposium,
- [41] Sergeieva, L. M., Hriadushcha, V. V., Dubov, G. O., Didych, T. O., & Saienko, M. I. (2021). Compliance of the quality of educational services provided by vocational education institutions with the labor market demand in qualified staff under economic crisis. *Studies of Applied Economics*, 39(9). <u>https://doi.org/https://doi.org/10.25115/ee</u> <u>a.v39i9.5659</u>
- [42] Widtayakornbundit, S., & Phinaitrup, B.-A. (2021). A study of leadership in educational institution using dual systems and the effects on personal behavior: A case study of Thailand private vocational system. *Kasetsart Journal of Social Sciences*, 42(3), 527-534. <u>https://doi.org/https://doi.org/10.34044/j.</u> <u>kjss.2021.42.3.12</u>