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Study at Non-formal Education Institution PKBM: The Suitability between IT and Business Strategy Using SAMM

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ABSTRACT

Community Learning Activity Centers (PKBM) provide non-formal education to enhance skills and education access, particularly for individuals excluded from formal systems. PKBM Cerme Gresik integrates information technology (IT) to improve operations; however, aligning IT with business strategies remains a challenge critical for optimizing performance. This study evaluates the alignment between IT and business strategies at PKBM Cerme Gresik using the Strategic Alignment Maturity Model (SAMM). A quantitative approach, involving surveys, was employed to assess six SAMM dimensions: Communication, Competence & Value Measurement, Governance, Partnership, Scope & Architecture, and Skills. Scores were aligned with SAMM's five maturity levels (1–5). The SAMM evaluation revealed the following scores: Communication (3.0), Competence & Value Measurement (2.1), Governance (1.6), Partnership (2.5), Scope & Architecture (2.25), and Skills (2.16). Communication was rated at level 3 (established process), while other dimensions fell at level 2 (committed process), except Governance, which was at level 1 (initial process). The overall alignment maturity score was 2, indicating a committed process. PKBM Cerme Gresik demonstrates a partial commitment to IT-business alignment, focusing on operational coordination. However, challenges such as limited resources, inefficient IT management, and insufficient alignment hinder progress toward higher maturity levels. The study concludes that IT-business strategy alignment at PKBM Cerme Gresik is at a committed process level (level 2). To advance educational impact, efforts to enhance IT resources, management efficiency, and alignment must be prioritized.

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1. INTRODUCTION

Formal education in Indonesia encounters several major obstacles such as restricted availability in remote locations, varying teaching standards in different areas (Pratiwi & Prihartanti, 2022), and the growing need to incorporate technology into the education system (Lelatobur et al., 2023). The system

faces challenges with insufficient resources, including a lack of skilled educators and appropriate facilities (Kusmiran et al., 2022). However, non-formal education, especially in Pusat Kegiatan Belajar Masyarakat (PKBM), encounters further challenges such as societal stigma, with this type of education frequently seen as a secondary option, reducing students' drive (Ibrahim et al., 2020). Furthermore, the results of non-formal education are often not formally acknowledged, creating challenges for individuals seeking recognition in the job market or seeking additional educational opportunities (Hidayat, 2019). Lack of funding and resources can also impede the efficient administration of these programs. Dealing with these challenges necessitates a teamwork among the government, private sector, and local communities to boost funding, enhance teacher education, and provide official recognition for accomplishments in non-formal education (Syaadah et al., 2022).

PKBM offers a fresh perspective in addressing the challenges faced by the education system in Indonesia (Ibrahim et al., 2020). It serves as a substitute, supplement, or complement to formal education, contributing to the broader goal of lifelong learning (Tleuzhanova et al., 2024). This approach fosters the development of a learning society (Brezuleanu et al., 2024). PKBM provides diverse programs designed to support individuals, particularly those excluded from formal education, in continuing their education and enhancing their skills (Lukman, 2021). Through these efforts, non-formal education delivered by PKBM significantly improves the quality of education and broadens access for people across Indonesia (Siti Nuraeni Mitra et al., 2024). PKBM Cerme Gresik, a non-formal educational institution overseen by the Early Childhood Education and Community Education Development Center (BPPAUD & DIKMAS) of East Java Province, offers various programs including Tunas Cendekia Playgroup, Cendekia Kindergarten, and equivalency programs such as Package B (equivalent to Junior High School) and Package C (equivalent to Senior High School). It also provides a Package C program for adults aged 22 and above, as well as sewing courses. PKBM Cerme Gresik integrates information technology (IT) into its operations to support these programs. However, to enhance its performance and achieve its objectives, it is crucial to assess IT performance from a business perspective (Coltman et al., 2015). By identifying and bridging the gap between technology and business needs, PKBM can enhance the quality of educational programs and services provided to the community.

Information Technology (IT) is crucial in non-formal education, especially in Community Learning Activity Centers (PKBM), as it expands access and improves the quality of education (Siti Nuraeni Mitra et al., 2024). In PKBM, IT provides a strong solution to overcome challenges like limited resources and infrastructure often encountered (Tulloh et al., 2023). Through the incorporation of IT, PKBM is able to utilize a range of educational resources such as digital modules and tools to enhance teaching and learning, which may have been challenging to acquire in informal settings (Auliya et al., 2024). IT allows for more versatility in providing educational materials through methods such as online learning, video guides, and interactive tools, making distance education easier (Tricahayu et al., 2024). This is especially important in Indonesia, where numerous distant regions continue to encounter difficulties in obtaining adequate formal education (Huraerah et al., 2024). Technology enables PKBM to reach a larger number of students and provide more extensive learning options, surpassing limitations related to time and location (Iskandar et al., 2024). Additionally, it is crucial to synchronize IT with PKBM's business strategy in order to enhance educational results (Purnomo et al., 2024). Incorporating IT into broader strategic plans ensures PKBM aligns technology choices with specific learning needs. It includes offering training for PKBM managers and instructors to make the most of IT effectively (Supadi et al., 2019). Moreover, it is essential to monitor and evaluating educational results consistently to guarantee the technology improves the learning experience. By merging technology with a defined educational plan, PKBM can optimize IT's potential to enhance educational quality and results, all the while equipping students for increased success in both their careers and advanced studies (Iskandar et al., 2024).

IT performance from a business standpoint is essential to ensure that IT investments align with and support the organization’s strategic goals. Effective IT performance is not only judged by technical metrics, such as system speed and efficiency, but also by how well IT contributes to achieving business objectives. This assessment includes considering the impact of IT on productivity, operational efficiency, and

competitive advantage (Luftman J. , 2017). By adopting a business perspective, organizations can evaluate how IT supports the overall business strategy, including benefits like improved processes, cost reductions, and enhanced customer satisfaction (Coltman et al., 2015). Utilizing frameworks such as the Strategic Suitability Maturity Model (SAMM) enables organizations to measure how well their IT strategy aligns with their business strategy and to identify areas for improvement (Luftman & Kempaiah, 2007). This approach ensures that IT investments provide both technical and strategic advantages, contributing to long-term organizational success.

For instance, research demonstrated that companies using SAMM and advancing through higher maturity stages achieve better suitability between IT and business strategies, which enhances operational efficiency and competitiveness. The study also highlighted the importance of leadership and effective communication between the IT department and top management in achieving higher SAMM maturity levels (Rachman & Pakarbudi, 2024). Evaluating and managing strategic suitability through SAMM helps organizations identify discrepancies between IT and business strategies and offers guidance for ongoing improvement (Mutakin & Sumitra, 2021; Nastiti et al., 2015). Their study underscores the need for regular evaluation of strategic maturity and the impact of changes in the business environment on strategic suitability.

Given that previous studies have not specifically addressed PKBM as a non-formal education provider in Indonesia, and recognizing the importance of IT in supporting business functions, it is essential for PKBM to assess the suitability between its IT strategy and business goals. This study aims to evaluate the suitability of IT and business strategies using SAMM in PKBM institutions. Measuring this suitability helps PKBM ensure that its technology not only meets current operational needs but also effectively supports its long-term goals, thereby enhancing the quality, efficiency, and relevance of services provided to the community.

2. METHODS

This study adopts a quantitative approach utilizing a survey method to assess the maturity level of IT and business strategy suitability at PKBM Cerme, Gresik, employing the Strategic Suitability Maturity Model (SAMM). The survey method was selected to evaluate how well IT and business strategies align in supporting operational and educational services at the institution. Quantitative approaches and survey methods are effective for assessing IT and business strategy alignment in PKBM because they allow for systematic data collection from multiple respondents, providing measurable insights into trends and relationships. The study's sample comprised all staff and management at PKBM Cerme engaged in managing and implementing IT and business strategies. Purposive sampling was employed to select respondents with relevant expertise and experience in IT and business strategy management (Creswell & Creswell, 2017). SAMM consists of six key dimensions of alignment: Communication, Competence & Value Measurement, Governance, Partnership, Scope & Architecture, and Skills (Luftman & Ben-Zvi, 2010). The results of the SAMM analysis obtained were then aligned with 5 levels of maturity, alignment of IT strategy and business strategy at PKBM Cerme Gresik level 1-5

Data collection was conducted using a structured questionnaire based on the SAMM framework, with questions tailored to the context of PKBM. Structured questionnaires facilitate the measurement of alignment levels, as well as allowing for assessment of diverse perspectives from various stakeholders. The SAMM framework is tailored to the PKBM structure, including IT integration systems in community-based learning. Survey interviews are complemented by providing in-depth qualitative insights. Purposive sampling was chosen to obtain data from respondents with relevant knowledge, such as IT managers and decision makers. The questionnaire scale using a Likert scale (1-5) helps identify factors that influence alignment. The validation process involved a panel of experts, and the reliability of the instrument was tested with Cronbach's Alpha which showed a high value (>

0.7), ensuring consistency of measurement. Data analysis using Excel to determine the average value for each criterion and finally create a total average value for all aspects.

3. FINDINGS AND DISCUSSION

3.1 Findings

The SAMM criteria in this study include Communication, Competence & Value Measurement, Governance, Partnership, Scope & Architecture, and Skills (Luftman & Ben-Zvi, 2010). Below we will present the results for each criteria.

Based on results of the study that SAMM value on criteria *Communication* that can seen in Table 1.

Table 1. Criteria Communication

Sub Criteria	Score
Understanding of Business by IT	2
Understanding of IT by Business	2
Inter/Intra Organizational Learning	4
Protocol Rigidity	4
Knowledge Sharing	4
Liaison(s) effectiveness	2
Average	**3**

Table 1 shows that in the SAMM criteria, namely Communication based on 5 sub-criteria items, a score of 2 was obtained. A score of 2 indicates the level of maturity, and alignment of IT strategy and business strategy at PKBM Cerme Gresik on *Communication* with the committed process criteria in level 2.

Based on the results study, SAMM value on criteria *Competence & Value Measurement* which can seen in Table 2.

Table 2. Criteria Competence & Value Measurement

Sub Criteria	Score
IT Metrics	1
Business Metrics	4
Balanced Metrics	2
Service Level Agreement (SLA)	2
Benchmarking	3
Formal Assessment / Reviews	1
Continuous Improvement	2
Average	**2.1**

Table 2 shows that in the SAMM criteria, namely *Competence & Value Measurement* based on 7 sub-criteria items, a score of 2.1 was obtained. A score of 2 indicates that the level of maturity, alignment of IT strategy and business strategy at PKBM Cerme Gresik on *Competence & Value Measurement* with the committed process criteria in level 2.

Based on the results study the SAMM value on criteria *Governance* can seen in Table 3.

Table 3. Criteria Governance

Sub Criteria	Score
Business Strategic Planning	2
IT Strategic Planning	2
Organizational Structure	1
Reporting	1
Budgetary Control	3
IT Investment Management	2
Steering Committee	1
Prioritization Process	1
Average	**1.6**

Table 3 shows that in the SAMM criteria, namely *Governance* based on 8 sub-criteria items, a score of 1.6 was obtained. A score of 1.6 indicates the level of maturity, alignment of IT strategy and business strategy at PKBM Cerme Gresik on *Governance* with the *initial process* criteria in level 1.

Based on the results study, the SAMM value on criteria *Partnership* can seen in Table 4.

Table 4. Criteria Partnership

Sub Criteria	Score
Business Perception of IT Value	3
IT Role of IT in Strategic Business Planning	2
Shared, Goals, Risk, Rewards / Penalties	4
IT Program Management	1
Relationship / Trust Style	2
Business Sponsor Champion	3
Average	**2.5**

Table 4 illustrates the evaluation of the SAMM (Strategic Alignment Maturity Model) criteria, specifically focusing on the "Partnership" dimension, which is assessed through six sub-criteria items. The analysis reveals a score of 2.5, reflecting the level of maturity and the alignment between IT strategy and business strategy at PKBM Cerme Gresik. This score indicates that the organization is positioned at Level 2 of the maturity model under the committed process criteria, signifying that foundational efforts to integrate IT and business objectives are in place, although opportunities for further alignment remain.

Additionally, Table 5 provides a detailed breakdown of the SAMM score for the "Partnership" criterion, highlighting the individual sub-criteria contributing to the overall assessment. The results underscore the organization's current capabilities in fostering collaboration between IT and business stakeholders, with specific areas requiring strategic improvement to elevate maturity to higher levels, such as formalizing shared objectives and enhancing communication mechanisms.

Table 5. Criteria Scope & Architecture

Sub Criteria	Score
Traditional, External Enabler/Driver	3
Standards Articulation	2
Architectural Integration	2
Architectural Transparency, Agility, Flexibility	2
Average	**2.25**

Table 5 shows that in the SAMM criteria, namely Criteria Scope & Architecture based on 4 sub-criteria items, a score of 2.25 was obtained. A score of 2.25 indicates the level of maturity, alignment of IT

strategy and business strategy at PKBM Cerme Gresik on Scope & Architecture with the committed process criteria in level 2.

Based on the results of the study, the SAMM value on criteria *Skills* can be seen in Table 6.

Table 6. Criteria Skills

Sub Criteria	Score
Innovation Entrepreneurship	1
Locus of Power	2
Change Readiness	4
Career Crossover	1
Education, Cross Training, Social Political, Trusting Interpersonal Improvement	2
Hiring and retaining	3
Average	**2.16**

Table 6 shows that in the SAMM criteria, namely Skills based on 6 sub-criteria items, a score of 2.16 was obtained. A score of 2.16 indicates the level of maturity, alignment of IT strategy and business strategy at PKBM Cerme Gresik on Skills with the committed process criteria in level 2.

The maturity level for the alignment of IT strategy with business strategy at PKBM Cerme Gresik is as follows: level 3 for Communication, level 2 for Competence & Value Measurement, Scope & Architecture, Partnership, and Skills, and level 1 for Governance. Level 1 (Initial/Ad hoc process) represents the lowest maturity stage in strategic alignment, where achieving alignment is particularly challenging. For PKBM Cerme Gresik, being at this level indicates significant difficulty in aligning IT and business strategies effectively. Level 2 (Committed process) marks the beginning of maturation in strategic alignment, with IT starting to be recognized as a valuable asset. While alignment remains challenging at this stage, it is an improvement over Level 1. Level 3 (Established process) is characterized by the development of mutual understanding between IT and business units, with IT being regarded as a crucial asset for the organization. This stage also signals the initiation of career transitions, where leadership within units requires expertise that encompasses both business and IT domains. After analyzing each criterion, the next step is to calculate the total for all criteria as follows:

Table 6. Total maturity

Criteria	Score
Communication	3
Competence & Value Measurement	2.1
Governance	1.6
Partnership	2.5
Scope and Architecture	2.25
Skills	2.16
Average	**2.27**

The results of the total maturity analysis yielded an overall score of 2, indicating that PKBM Cerme Gresik is currently at Level 2 in the Strategic Alignment Maturity Model (SAMM). This level reflects a "Committed Process" stage, where initial steps towards integrating IT strategy and business strategy have been established. At this stage, the organization demonstrates some alignment between IT and business objectives, but the processes and collaboration mechanisms remain in their developmental phase.

A score of 2 suggests that while foundational frameworks for strategy alignment are in place, there is considerable room for improvement. Efforts such as formalizing governance structures, enhancing communication between IT and business units, and implementing standardized processes could help the organization transition to higher maturity levels. Strengthening these areas will enable PKBM

Cerme Gresik to achieve a more robust synergy between its IT and business strategies, fostering improved operational efficiency and strategic adaptability.

3.2 Discussion

The findings of this study align with previous research, on the level of alignment maturity in CV. Adiwarna Tunggal Jaya is at level 2 with a score of 2.14 (Mutakin & Sumitra, 2021). The Communication Component achieved a maturity score of 4.04, while the IT Benefits and Competence Component scored 3.64. The Governance Component had a maturity value of 3.27, and the Partnership and Business Value Component with IT scored 3.57. The Scope and Architecture Component was rated at 3.35, and the Human Resources Expertise Component received a score of 3.47. Overall, the combined maturity score of these components is 3.56, placing the East Java Provincial Cooperatives and SMEs Service at Level 3 (established). This indicates that the organization has a fairly well-developed alignment between IT and business, where IT is seen as contributing significant value to the operations of the agency(Rachman & Pakarbudi, 2024).

Research highlights that organizations at this stage may focus more on operational areas rather than strategic alignment. They struggle to fully integrate IT with their core objectives, largely due to insufficient resources and governance frameworks. Effective IT management in such environments requires strategic planning and better resource allocation to overcome inefficiencies and improve the educational impact. Governance mechanisms such as ITIL and COBIT frameworks are often recommended for improving alignment and operational efficiency, but they are complex and require dedicated resources, which can be a challenge in resource-constrained environments like PKBM Cerme (Ghildyal & Chang, 2017). These points are consistent with broader findings in strategic management and IT governance, which show that educational institutions often face unique hurdles when trying to align IT with educational goals (Mutiara & Koesmawan, 2020). This is because the alignment of IT and business strategies is a concern not only for commercial organizations, in a non-profit organization, the role of IT strategy in question is to increase efficiency in carrying out work and improve performance in carrying out service activities. As in the education sector, the alignment of IT and business strategies needs to be implemented, considering that IT in education in this digital era plays a role as the most important aspect in supporting the efficiency and effectiveness of the education process as a whole (Alami, 2019).

Based on the results of this study, the recommendation that can be given is that it is necessary to strengthen resources, efficient IT management, and IT alignment with business to advance education. In addition, further research is also needed to analyze the Conformity between IT and Business Strategy Using SAMM in other non-formal education and formal education as an evaluation for future improvements.

4. CONCLUSION

The conclusion of this study is that the maturity level for the alignment of IT strategy with business strategy at PKBM Cerme Gresik is as follows: level 3 for Communication, level 2 for Competence & Value Measurement, Scope & Architecture, Partnership, and Skills, and level 1 for Governance. The results of the total maturity analysis obtained a score of 2, meaning it is at level 2 (committed process) IT strategy and business strategy at PKBM Cerme Gresik. Level 2 with committed process criteria which illustrates that PKBM Cerme has begun to dedicate to IT coordination, business, and agency focus on operational areas. However, alignment is difficult to achieve due to low resources, low efficient IT management, and IT alignment with business to advance education in PKMB is still low. Based on the findings of this study, it is recommended that PKBM Cerme Gresik address the discrepancies between technology and business requirements by enhancing several key areas. These include improving

criteria related to competency and value assessment, governance, scope and architecture, as well as skill development. Such improvements are essential for elevating the quality of educational programs and services offered by PKBM Cerme Gresik. This study, further studies are needed with a more in-depth analysis of other informal educational institutions to gain a comprehensive understanding of the overall quality of educational programs and services throughout Indonesia.

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REFERENCES

Alami, T. (2019). Faktor-faktor yang Mempengaruhi Keselarasan Strategi Teknologi Informasi dan Bisnis pada Pendidikan Tinggi. *Journal of Education Informatic Technology and Science (JeITS)*, *1*(2), 13–26.

Auliya, Y. A., Fadah, I., Baihaqi, Y., Ranggianto, N. A., & Yuswanto, I. B. (2024). Pemberdayaan PKMB Rumah Pintar Melalui Penerapan Aplikasi "ROOMPI" untuk Meningkatkan Layanan dan Literasi Bagi Masyarakat Desa Karangharjo, Kabupaten Jember. *JPM Jurnal Pengabdian Masyarakat*, *04*(02), 74–83.

Brezuleanu, C.-O., Sîrghea, A., Mihalache, R., Ungureanu, E., & Brezuleanu, S. (2024). Influence of Formal and Non-Formal Educational Activities on The Academic Integration of First-Year Students of "Ion Ionescu De La Brad" University Of Life Sciences (IULS) Iași, Romania, For Reducing Early Dropout. *Scientific Papers Series Management, Economic Engineering in Agriculture and Rural Development*, *24*(2), 215–228.

Coltman, T., Tallon, P., Sharma, R., & Queiroz, M. (2015). Strategic IT alignment: Twenty-five years on. In *Journal of Information Technology* (Vol. 30, Issue 2, pp. 91–100). Palgrave Macmillan. https://doi.org/10.1057/jit.2014.35

Ghildyal, A., & Chang, E. (2017). IT Governance, IT/Business Alignment and Organization Performance for Public Sectors. *Journal of Economics, Business and Management*, *5*(6), 255–260. https://doi.org/10.18178/joebm.2017.5.6.522

Hidayat, Y. (2019). Manajemen Peningkatan Mutu Pendidikan Non Formal Pada Pusat Kegiatan Belajar Masyarakat. *Jurnal Pendidikan Pembelajaran Pemberdayaan Masyarakat*, *I*(2), 84–92.

Huraerah, A. J. A., Abdullah, A. W., & Rivai, A. (2024). Pengaruh Teknologi Informasi dan Komunikasi Terhadap Pendidikan Indonesia. *Journal of Islamic Education Policy*, *8*(2), 133–146.

Ibrahim, A., Rifa, B., Dewi, R., & Djati, G. (2020). Pemberdayaan Masyarakat Melalui PKBM untuk Meningkatkan Keterampilan Masyarakat Miskin. *Jurnal Pengembangan Masyarakat Islam*, *5*, 475–496.

Iskandar, R., Sinurat, M., & Pemerintahan Dalam Negeri, I. (2024). Enhancing The Quality Of Non-Formal Education: A Study On Performance Management At PKBM Imam Syafe'i In Bandung Regency). *Jurnal Scientia*, *13*. https://doi.org/10.58471/scientia.v13i03

Kusmiran, Husti, I., & Nurhadi. (2022). Pendidikan Formal, Non Formal dan Informal dalam Desain Hadits Tarbawi. *Jurnal Penelitian Ilmu Pendidikan Indonesia*, *1*(2), 485–492. https://jpion.org/index.php/jpi485Situswebjurnal:https://jpion.org/index.php/jpi

Lelatobur, L. E., Nurwidayati, P., & Satyawati, S. T. (2023). Studi Komparatif Implementasi Manajemen Pembelajaran Daring Pada Satuan Pendidikan Formal dan Nonformal. *Jurnal Paedagogy*, *10*(3), 820. https://doi.org/10.33394/jp.v10i3.7411

Luftman, J. (2017). Competing in the Information Age: Align in the Sand. *Journal of Information Technology Management*, *28*(2), 1-14. doi:https://doi.org/10.1080/10407385.2017.1366905

Luftman, J., & Ben-Zvi, T. (2010). Key issues for IT executives 2010: Alignment, business productivity, and the economic environment. *MIS Quarterly Executive*, *9*(4), 263-272.

Luftman, J., & Kempaiah, R. (2007). An Update on Business-IT Alignment: 'A Line' Has Been Drawn. *MIS Quarterly Executive, 6*(3), 165-177. doi:https://doi.org/10.1007/978-3-642-16719-2_5

Lukman, A. I. (2021). Pemberdayaan Masyarakat melalui Pendidikan Nonformal di PKBM Tiara Dezzy Samarinda. *Diklus: Jurnal Pendidikan Luar Sekolah*, *5*(2), 180–190. https://doi.org/10.21831/diklus.v5i2.43669

Mutakin, M. I., & Sumitra, I. D. (2021). Perencanaan Strategi dan Kebijakan untuk Mengukur Keselarasan TI dengan Bisnis Menggunakan SAMM. *JTK3TI Jurnal Tata Kelola Da Kerangka Kerja Teknologi Informasi*, *7*(2).

Mutiara, D., & Koesmawan, M. (2020). Strategic Management in Achieving Service Standards at the Center for Community Learning Activities (PKBM). *Asian Journal of Contemporary Education*, *4*(1), 57–68. https://doi.org/10.18488/journal.137.2020.41.57.68

Nastiti, P., Nugroho, E., & Ferdiana, R. (2015). Model Perencanaan Strategis SI/TI Untuk Industri Startup Menggunakan Metode Ward Peppard dan SAMM. *Seminar Nasional Ilmu Komputer*, 101–108.

Pratiwi, P. D., & Prihartanti, N. (2022). The Effect of Formal Education and Adversity Intelligence on Marital Satisfaction on Working Women. *AL-ISHLAH: Jurnal Pendidikan*, *14*(1), 803–810. https://doi.org/10.35445/alishlah.v14i1.1586

Purnomo, P., Hufad, A., Sutarni, N., & Mutaman, M. H. A. (2024). Technology-Based Education Marketplace Software for Adult Learning. *Journal of Advanced Research in Applied Sciences and Engineering Technology*, 85–100. https://doi.org/10.37934/araset.62.2.85100

Rachman, S. N., & Pakarbudi, A. (2024). Analisa Pengukuran Keselarasan Strategi Bisnis dan TI Menggunakan Metode SAMM LUFTMAN. *SNESTIK Seminar Nasional Teknik Elektro, Sistem Informasi, Dan Teknik Informatika*. https://doi.org/10.31284/p.snestik.2024.5836

Siti Nuraeni Mitra, Tintin Handiyati, Siti Qomariyah , Siti Rahmawati , & Andi Sukandi. (2024). Perencanaan dan Implementasi Pendidikan Dengan Metode Nilai Tambah (LKP IT) Pada PKBM Hidayatul Mu'alimin Kota Sukabumi. *Jurnal Arjuna : Publikasi Ilmu Pendidikan, Bahasa Dan Matematika*, *2*(2), 291–303. https://doi.org/10.61132/arjuna.v2i2.692

Supadi, Rasul, T., Hamidah, N., Dalmeri, & Nuriah, Y. (2019). Classroom Action Research Mentoring for Instructors at PKBM Harapan Mandiri Depok. *Communnity Development Journal*, *5*(6), 10943–10948.

Syaadah, R., Ary, M. H. A. A., Silitonga, N., & Rangkuty, S. F. (2022). Pendidikan Formal, Pendidikan Non Formal dan Pendidikan Informal. *PEMA: Jurnal Pendidikan Dan Pengabdian Kepada Masyarakat*, *2*(2), 125–131. https://jurnal.permapendis-sumut.org/index.php/pema

Tleuzhanova, G., Joldanova, D., & Karimova, G. (2024). Issues of Formation of Professional Foreign Language Competence of Students in The Context of Convergence of Formal and Non-Formal Education. *Higher Education in Kazakhstan*, *48*(3), 17–25. https://doi.org/10.59787/2413-5488-2024-48-4-17-25

Tricahayu, B., Sari, M., Rizkiah Putri Siregar, A., & Ayunestia Widyati, N. (2024). Analisis Efektivitas Penggunaan Teknologi Informasi Dalam Proses Pembelajaran di Sekolah Dasar. *Nazmi Ayunestia Widyati INNOVATIVE: Journal Of Social Science Research*, *4*, 3725–3731.

Tulloh, R., Negara, R. M., Nurmantris, D. A., Hariyani, Y. S., Mayasari, R., & Vidyaningtyas, H. (2023). Pemanfaatan Teknologi Website pada PKBM Walidayna Kota Medan untuk Mendukung Operasional Program Kejar Paket A, B Dan C Bagi Anak Putus Sekolah. *Prosiding PKM-CSR*, *6*, 2655–3570. https://yayasanwalidayna.id/.