



DAFTAR PUSTAKA

- [1] Y. Rishko, D. Boboshko, E. Eliseeva, A. Malkin, and D. Treistar, "Analysis of the impact of the transition to online education during the covid-19 pandemic on the future academic performance of university students," *SAGE Open*, vol. 15, no. 1, p. 21582440251324753, 2025.
- [2] C. N. Akpen, S. Asaolu, S. Atobatele, H. Okagbue, and S. Sampson, "Impact of online learning on student's performance and engagement: a systematic review," *Discover Education*, vol. 3, no. 1, p. 205, 2024.
- [3] B. A. Betthäuser, A. M. Bach-Mortensen, and P. Engzell, "A systematic review and meta-analysis of the evidence on learning during the covid-19 pandemic," *Nature human behaviour*, vol. 7, no. 3, pp. 375–385, 2023.
- [4] S. G. T. Ong and G. C. L. Quek, "Enhancing teacher–student interactions and student online engagement in an online learning environment," *Learning environments research*, vol. 26, no. 3, pp. 681–707, 2023.
- [5] S. Moskovich and A. Hershkovitz, "Teachers' perceptions of student engagement in online learning," *Journal of Online Learning Research*, vol. 10, no. 2, pp. 215–253, 2024.
- [6] S. Agrawal and S. M. Krishna, "Examining procrastination in online learning environments: Implications for student performance," in *Proceedings of the 2024 10th International Conference on Frontiers of Educational Technologies*, 2024, pp. 126–131.
- [7] B. A. N. Cenka, H. B. Santoso, and K. Junus, "An investigation of online learning challenges and online self-regulated learning strategies of computer science students," *Education and Information Technologies*, vol. 30, no. 16, pp. 23 871–23 895, 2025.
- [8] B. J. Zimmerman, "Becoming a self-regulated learner: An overview," *Theory into practice*, vol. 41, no. 2, pp. 64–70, 2002.
- [9] D. Prasse, M. Webb, M. Deschênes, S. Parent, F. Aeschlimann, Y. Goda, M. Yamada, and A. Raynault, "Challenges in promoting self-regulated learning in technology supported learning environments: an umbrella review of systematic reviews and meta-analyses," *Technology, Knowledge and Learning*, vol. 29, no. 4, pp. 1809–1830, 2024.
- [10] S. Sone, "Designing agile kanban to enhance learning chinese vocabulary and sentences: From the cognitive engagement theory perspective," Master's thesis, National Taiwan Normal University (Taiwan), 2024.
- [11] P. Salza, P. Musmarra, and F. Ferrucci, "Agile methodologies in education: A review," *Agile and lean concepts for teaching and learning*, pp. 25–45, 2019.
- [12] S. Strickroth, M. Kreidenweis, and Z. Wurm, "Learning from agile methods: using a kanban board for classroom orchestration," in *International Conference on Interactive Collaborative Learning*. Springer, 2022, pp. 68–79.



- [13] T. de Oliveira, J. V. de Medeiros Júnior, A. M. Gurgel, and V. de Almeida Silva, "Adoption of kanban in procurement process risk management in a public higher education institution." *Revista Contabilidade, Gestao e Governanca*, vol. 25, no. 1, 2022.
- [14] J. Wong, M. Baars, M. He, B. B. de Koning, and F. Paas, "Facilitating goal setting and planning to enhance online self-regulation of learning," *Computers in Human Behavior*, vol. 124, p. 106913, 2021.
- [15] T. H. Bui, A. Kaur, and M. Trang Vu, "Effectiveness of technology-integrated project-based approach for self-regulated learning of engineering students," *European Journal of Engineering Education*, vol. 47, no. 4, pp. 591–605, 2022.
- [16] T. Paavilainen, S. López-Pernas, S. Väisänen, S. Kontkanen, and L. Hirsto, "Using learning analytics to support self-regulated learning in primary education—a learning design perspective," *Technology, Knowledge and Learning*, vol. 30, no. 3, pp. 1299–1319, 2025.
- [17] X. Li, Y. Fan, T. Li, M. Rakovic, S. Singh, J. van der Graaf, L. Lim, J. Moore, I. Molenaar, M. Bannert *et al.*, "The flora engine: Using analytics to measure and facilitate learners' own regulation activities," *arXiv preprint arXiv:2412.09763*, 2024.
- [18] M. A. Chatti, V. Yücepur, A. Muslim, M. Guesmi, and S. Joarder, "Designing theory-driven analytics-enhanced self-regulated learning applications," in *Visualizations and dashboards for learning analytics*. Springer, 2021, pp. 47–68.
- [19] M. Kubsch, S. Strauß, A. Grimm, S. Gombert, H. Drachsler, K. Neumann, and N. Rummel, "Self-regulated learning in the digitally enhanced science classroom: Toward an early warning system," *Educational Psychology Review*, vol. 37, no. 2, pp. 1–38, 2025.
- [20] P. G. de Barba, E. A. Oliveira, and N. English, "Development and validation of a learning analytics rubric for self-regulated learning," *Educational technology research and development*, pp. 1–23, 2025.
- [21] G. Maimaiti and K. F. Hew, "Gamified self-regulated learning improves efl reading comprehension, motivation, self-regulation skills and process patterns: Quasi-experiment with process mining," *The Internet and Higher Education*, p. 101042, 2025.
- [22] R. Azevedo, F. Bouchet, M. Duffy, J. Harley, M. Taub, G. Trevors, E. Cloude, D. Dever, M. Wiedbusch, F. Wortha *et al.*, "Lessons learned and future directions of metatutor: Leveraging multichannel data to scaffold self-regulated learning with an intelligent tutoring system," *Frontiers in Psychology*, vol. 13, p. 813632, 2022.
- [23] L. N. Campos, M. D. Porto, and F. A. S. de Almeida, "A utilização das ferramentas trello, scrum e kanban como possibilidades para a transdisciplinaridade na educação," *Caderno Pedagógico*, vol. 20, no. 1, pp. 353–370, 2023.
- [24] M. Csernoch, E. G. Szűcs, and D. Máté, "Kanban method in digital data processing," *International Review of Applied Sciences and Engineering*, vol. 16, no. 2, pp. 275–291, 2025.



- [25] E. Panadero, “A review of self-regulated learning: Six models and four directions for research,” *Frontiers in psychology*, vol. 8, p. 422, 2017.
- [26] B. Zheng and Y. Zhang, “Self-regulated learning: the effect on medical student learning outcomes in a flipped classroom environment,” *BMC medical education*, vol. 20, no. 1, p. 100, 2020.
- [27] Y. Uzun, W. Suraworachet, Q. Zhou, A. Gauthier, and M. Cukurova, “Engagement with analytics feedback and its relationship to self-regulated learning competence and course performance,” *International Journal of Educational Technology in Higher Education*, vol. 22, no. 1, p. 17, 2025.
- [28] S. Heikkinen, M. Saqr, J. Malmberg, and M. Tedre, “Supporting self-regulated learning with learning analytics interventions—a systematic literature review,” *Education and Information Technologies*, vol. 28, no. 3, pp. 3059–3088, 2023.
- [29] S. J. Aguilar, S. A. Karabenick, S. D. Teasley, and C. Baek, “Associations between learning analytics dashboard exposure and motivation and self-regulated learning,” *Computers & Education*, vol. 162, p. 104085, 2021.
- [30] R. P. Alvarez, I. Jivet, M. Perez-Sanagustin, M. Scheffel, and K. Verbert, “Tools designed to support self-regulated learning in online learning environments: A systematic review,” *IEEE Transactions on Learning Technologies*, vol. 15, no. 4, pp. 508–522, 2022.
- [31] M. Liu, L. J. Zhang, and T. J. Neufeld, “Chinese efl learners’ genai literacy in digital multimodal composing and self-regulated writing: chain mediation effects of needs satisfaction and creative self-concept,” *Innovation in Language Learning and Teaching*, pp. 1–26, 2025.
- [32] H. Ateş and M. Polat, “Leveraging augmented reality and gamification for enhanced self-regulation in science education,” *Education and Information Technologies*, pp. 1–32, 2025.
- [33] G. M. van Jaarsveld, J. Wong, M. Baars, M. Specht, and F. Paas, “Enhancing goal attainment in higher education with a scripted conversational agent: Effects of monitoring and reflection support in digital learning,” *Computers & Education*, p. 105441, 2025.
- [34] N. Edisherashvili, K. Saks, M. Pedaste, and Ä. Leijen, “Supporting self-regulated learning in distance learning contexts at higher education level: Systematic literature review,” *Frontiers in psychology*, vol. 12, p. 792422, 2022.
- [35] T.-Y. Chen and C.-C. Hung, “An integrated self-regulated learning and flipped classroom approach for teaching nursing skills to undergraduate nursing students: A randomized controlled study,” *Nurse Education in Practice*, p. 104445, 2025.
- [36] J. P. Ellison and H. Tang, “Self-regulated learning and video annotation in a high school acting classroom,” *Instructional Science*, pp. 1–21, 2025.
- [37] L. Huang, T. Doleck, B. Chen, X. Huang, C. Tan, S. P. Lajoie, and M. Wang, “Multi-modal learning analytics for assessing teachers’ self-regulated learning in planning



- technology-integrated lessons in a computer-based environment,” *Education and Information Technologies*, vol. 28, no. 12, pp. 15 823–15 843, 2023.
- [38] A. Gorbunova, C. Lange, A. Savelyev, K. Adamovich, and J. Costley, “The interplay of self-regulated learning, cognitive load, and performance in learner-controlled environments,” *Education Sciences*, vol. 14, no. 8, p. 860, 2024.
- [39] R. J. Robillos, “The impact of the flipgrid application within the genre-based framework on students’ writing skills and self-regulation of learning awareness,” *Studies in Self-Access Learning Journal*, vol. 14, no. 4, 2023.
- [40] D. J. Rivers, M. Nakamura, and M. Vallance, “Online self-regulated learning and achievement in the era of change,” *Journal of Educational Computing Research*, vol. 60, no. 1, pp. 104–131, 2022.
- [41] Z. Xu, Y. Zhao, J. Liew, X. Zhou, and A. Kogut, “Synthesizing research evidence on self-regulated learning and academic achievement in online and blended learning environments: A scoping review,” *Educational Research Review*, vol. 39, p. 100510, 2023.
- [42] A. Kitsantas, H. Bembenuity, T. J. Cleary, P. A. Alexander, M. K. DiBenedetto, A. Kaplan, A. Kolovelonis, B. E. Mandell, A. J. Martin, M. T. McCrudden *et al.*, “Barry j. zimmerman’s enduring legacy: The inspiring fusion of self-regulated learning theory, practice, and mentorship,” *Educational Psychology Review*, vol. 37, no. 3, p. 78, 2025.
- [43] R. A. Nyaaba, E. K. Attipoe, D. K. Anhwere, A.-G. Sayibu, and A. O. Darko, “Comparative analysis of student performance using learning management systems (lms) and traditional teaching methods in academic tasks: A case study of the university of cape coast (ucc),” *Creative Education*, vol. 16, no. 1, pp. 103–134, 2025. [Online]. Available: <https://doi.org/10.4236/ce.2025.161007>
- [44] I. Villagrán, R. Hernández, G. Schuit, A. Neyem, J. Fuentes, L. Larrondo, E. Margozzini, M. T. Hurtado, Z. Iriarte, C. Miranda, J. Varas, and I. Hilliger, “Enhancing feedback uptake and self-regulated learning in procedural skills training: Design and evaluation of a learning analytics dashboard,” *Journal of Learning Analytics*, vol. 11, no. 2, pp. 138–156, Jul. 2024. [Online]. Available: <https://www.learning-analytics.info/index.php/JLA/article/view/8195>
- [45] C. Azzaroiha, I. W. Redhana, and K. Suma, “The effect of scaffolding strategies on learning outcomes in science learning: A systematic literature review,” *Jurnal Penelitian Pendidikan IPA*, vol. 11, no. 1, pp. 45–55, 2025.
- [46] T. Li, Y. Fan, Y. Tan, Y. Wang, S. Singh, X. Li, M. Raković, J. Van Der Graaf, L. Lim, B. Yang *et al.*, “Analytics of self-regulated learning scaffolding: effects on learning processes,” *Frontiers in psychology*, vol. 14, p. 1206696, 2023.
- [47] T. J. Faber, M. E. Dankbaar, W. W. van den Broek, L. J. Bruinink, M. Hogeveen, and J. J. van Merriënboer, “Effects of adaptive scaffolding on performance, cognitive load and engagement in game-based learning: a randomized controlled trial,” *BMC Medical Education*, vol. 24, no. 1, p. 943, 2024.



- [48] A. Sarmasan, “Experiences of agile in higher education: Learning and work life readiness,” 2024. [Online]. Available: <https://www.diva-portal.org/smash/record.jsf?pid=diva2%3A1899496&dswid=4491>
- [49] J. Saltz and R. Heckman, “Exploring which agile principles students internalize when using a kanban process methodology,” *Journal of Information Systems Education*, vol. 31, no. 1, pp. 51–60, 2020. [Online]. Available: <https://aisel.aisnet.org/jise/vol31/iss1/4>
- [50] D. I. Batubara, H. Kusmanto, M. A. Nasution, and A. Purba, “Kaizen and kanban implementation in management of education to support of total quality management improvement at council of al washliyah of north sumatera, indonesia,” *Academic journal of economic studies*, vol. 4, no. 3, pp. 154–166, 2018. [Online]. Available: <https://www.ceeol.com/search/article-detail?id=696095>
- [51] B. J. Zimmerman, “Becoming a self-regulated learner: An overview,” *Theory Into Practice*, vol. 41, no. 2, pp. 64–70, 2002. [Online]. Available: https://doi.org/10.1207/s15430421tip4102_2
- [52] N. Selwyn, “Re-imagining ‘learning analytics’ ... a case for starting again?” *The Internet and Higher Education*, vol. 46, p. 100745, 2020. [Online]. Available: <https://www.sciencedirect.com/science/article/pii/S109675162030021X>
- [53] T. Linden, “Scrum-based learning environment: Fostering self-regulated learning,” *Journal of Information Systems Education*, vol. 29, no. 2, pp. 65–74, 2018. [Online]. Available: <https://aisel.aisnet.org/jise/vol29/iss2/3>
- [54] C. Lang, G. Siemens, A. Wise, and D. Gašević, Eds., *Handbook of Learning Analytics*, 1st ed. Vancouver, BC: Society for Learning Analytics Research (SoLAR), May 2017.
- [55] M. Siadaty, D. Gasevic, and M. Hatala, “Trace-based micro-analytic measurement of self-regulated learning processes,” *Journal of Learning Analytics*, vol. 3, no. 1, pp. 183–214, 2016.
- [56] M. Yamasaki, H. Tanaka, and T. Mendori, “Proposal of a method for analyzing self-regulated learning processes with trace-data of learning log from digital textbooks,” in *International Conference on Learning Evidence and Analytics*, 2025. [Online]. Available: <https://library.apsce.net/index.php/ICLEA/article/view/5516>
- [57] T. Duncan and W. J. Mckeachie, “A manual for the use of the motivated strategies for learning questionnaire (mslq),” *no. January*, vol. 2015, 1991.
- [58] B. Laugwitz, T. Held, and M. Schrepp, “Construction and evaluation of a user experience questionnaire,” in *Symposium of the Austrian HCI and usability engineering group*. Springer, 2008, pp. 63–76.
- [59] S. Radović and N. Seidel, “Introduction to the srl-s rubric for evaluation of innovative higher educational technology for self-regulated learning,” *Innovative Higher Education*, pp. 1–34, 2025.



- [60] R. K. Ningrum, “Validitas dan reliabilitas motivated strategies for learning questionnaire (mslq) pada mahasiswa kedokteran,” *PENDIPA Journal of Science Education*, vol. 5, no. 3, pp. 421–425, 2021.
- [61] T. J. Cleary, S. J. Durning, and A. R. Artino Jr, “Microanalytic assessment of self-regulated learning during clinical reasoning tasks: recent developments and next steps,” *Academic medicine*, vol. 91, no. 11, pp. 1516–1521, 2016.
- [62] M. A. Andrews, C. A. Okuliar, S. A. Whelton, A. O. Windels, S. R. Kruse, M. G. Nachnani, D. A. Topol, E. C. McBee, M. T. Stein, R. C. Singaraju *et al.*, “Using self-regulated learning microanalysis to examine regulatory processes in clerkship students engaged in practice questions,” *Perspectives on medical education*, vol. 12, no. 1, p. 385, 2023.
- [63] R. I. Medina-Ramírez, D. D. Álamo-Arce, F. Rodriguez-Castro, D. Cecilio-Fernandes, J. Sandars, and M. J. Costa, “Self-regulated learning microanalysis for the study of the performance of clinical examinations by physiotherapy students,” *BMC medical education*, vol. 20, no. 1, p. 233, 2020.
- [64] A. J. Ko, T. D. LaToza, and M. M. Burnett, “A practical guide to controlled experiments of software engineering tools with human participants,” *Empirical Software Engineering*, vol. 20, no. 1, pp. 110–141, 2015.
- [65] S. Noor, O. Tajik, and J. Golzar, “Simple random sampling,” *International Journal of Education & Language Studies*, vol. 1, no. 2, pp. 78–82, 2022.
- [66] S. K. Ahmed, “How to choose a sampling technique and determine sample size for research: A simplified guide for researchers,” *Oral Oncology Reports*, vol. 12, p. 100662, 2024.
- [67] J. Pribadi, A. Ridwan, and A. Tjalla, “Comparison of the accuracy of stratified random sampling and simple random sampling methods in national assessment (an),” *Eduvest-Journal of Universal Studies*, vol. 5, no. 6, pp. 6886–6895, 2025.
- [68] O. J. Ballance, “Sampling and randomisation in experimental and quasi-experimental call studies: Issues and recommendations for design, reporting, review, and interpretation,” *ReCALL*, vol. 36, no. 1, pp. 58–71, 2024.
- [69] T. Tuononen, H. Hyytinen, M. Räisänen, T. Hailikari, and A. Parpala, “Metacognitive awareness in relation to university students’ learning profiles,” *Metacognition and Learning*, vol. 18, no. 1, pp. 37–54, 2023.
- [70] B. B. Frey, *The SAGE encyclopedia of educational research, measurement, and evaluation*. Sage Publications, 2018.