THE INFLUENCE OF SELF-EFFICACY ON STUDENT LEARNING OUTCOMES WITH ENVIRONMENT AS A MODERATING VARIABLE

Fauzi Farchan[1], Taransa Agasya Tutupoly[2], Krisna Mediyantoro Baharuddin[3], Gabriel Amadeus Sitompul[4], Andy Soenanta[5]
Universitas Wiralodra, Indonesia[1] Universitas Nusa Mandiri Jakarta, Indonesia[2] Kazian School of Management[3] Universitas Sumatera Utara, Indonesia[4] Sekolah Tinggi Ilmu Ekonomi IEU Surabaya, Indonesia[5]
Correspondence E-mail: farchani@gmail.com

Abstract

This research is a quantitative research with an explanatory approach. The data used in this study are primary data from interviews with 400 high school students spread throughout Indonesia. The interview consisted of 10 questions with three main teams around Self-Efficacy, Student Learning Outcomes, and School Environment. The interview content contained 5 statements, namely strongly agree, agree, normal/so-so, disagree, and strongly disagree. The data was analyzed using the smart PLS 4.0 analysis tool. The result in this article show that each hypothesis proposed by the researcher in the research methodology section can be accepted. In the first hypothesis section which is in line with the five previous studies, namely (Revita 2019); (Pertiwi 2021); (NURLATIFAH RANGKUTI 2021); (Hartini 2023) & (Faadhilah 2020)shows similar results, namely the Self-Efficacy variable can have a positive relationship direction and a significant influence on Student Learning Outcomes because the P-Values are positive and below the significance level of 0.05, namely 0.023. This is because self-efficacy can create self-confidence or potential, competitive ability, and other things that can improve student learning outcomes. In the second hypothesis, as well as proof of the researcher's creativity in adding the Environment variable as a moderating variable, it also shows similar results, namely the Environment variable can moderate the influence of the Self-Efficacy variable on Student Learning Outcomes. This is because the P-Values value leads to the positivity and is below the significance level of 0.05, which is 0.000, which is more significant than direct testing of 0.023. Thus, the first and second hypotheses in this article can be accepted and proven.

Keywords: Self-Efficacy, Student Learning Outcomes, Environment

INTRODUCTION

In the learning process, students need self-efficacy. Self-efficacy is a belief in one's ability to do a task in order to achieve goals and overcome various obstacles encountered. Self-efficacy is one's own perception of how well one can function in a particular situation (Winda Meidina and Netty Laura 2022). Self-efficacy is related to the belief that one has the ability to perform the expected action. According to Baron and Byrne, self-efficacy is defined as a person's evaluation of their ability or competence to perform a task, achieve goals, and overcome obstacles. According to Bandura and

Wood, self-efficacy refers to the belief in an individual's ability to drive motivation, cognitive abilities, and actions needed to meet the demands of the situation. Self-efficacy is the belief that one can master a situation and produce positive results (Cahyadi 2022) .

Schunk said that self-efficacy plays a very important role in influencing the efforts made, how strong the efforts are in predicting the success that will be achieved. This is in line with what Woolfolk stated that Self-Efficacy is a person's assessment of themselves or the level of belief in how much ability they have in doing a certain task to achieve certain results (Syah 2020). Gits and Mitchell said that self-efficacy can lead to different behaviors between individuals with the same abilities because self-efficacy influences choices, goals, problem solving, and persistence in trying.23 A person with self-efficacy believes that they are able to do something to change the events around them, while a person with low self-efficacy considers themselves basically incapable of doing everything around them. In difficult situations, people with low self-efficacy tend to give up easily. While people with high self-efficacy will try harder to overcome the challenges that exist. This is also in line with what Gist expressed, who showed evidence that feelings of self-efficacy play an important role in motivating workers to complete challenging work in relation to achieving certain goals (Faadhilah 2020).

Referring to the various interpretations above, it can be concluded that self-efficacy is a person's belief or confidence in their ability to carry out tasks given to them, and to achieve goals and overcome obstacles to achieve a result in a particular situation (Heriyantho and Leon 2022). The characteristics of individuals who have high self-efficacy according to Bandura are: (1) individuals are confident in their ability to handle events and situations faced effectively, (2) are persistent in completing tasks, (3) believe in their own abilities, (4) view difficulties as challenges, (5) set their own goals to be achieved, (6) instill and increase strong efforts when facing obstacles, (7) focus on tasks and think of strategies to overcome difficulties, (8) can restore self-confidence quickly after experiencing failure, (9) are able to face obstacles with the belief that the individual is able to control them (Cahyadi 2022).

Students who have high self-efficacy will believe in their ability to complete tasks given by the teacher and try to overcome challenges, while students who have low self-efficacy consider themselves incapable of completing tasks and tend to give up in difficult situations (Faadhilah 2020). This is in accordance with the opinion of Schunk and Pajares that students with high self-efficacy are more likely to persist with efforts on learning tasks than students with low self-efficacy. Based on this, researchers believe that Self-Efficacy can have a positive relationship direction and significant influence on Student Learning Outcomes (Pertiwi 2021).

Several previous studies have shown (Revita 2019); (Pertiwi 2021); (NURLATIFAH RANGKUTI 2021); (Hartini 2023) & (Faadhilah 2020)showing a positive relationship

direction and significant influence on Student Learning Outcomes. Unlike the five studies above, this article adds the Environment variable as a moderating variable.

METHODS

Figure 1
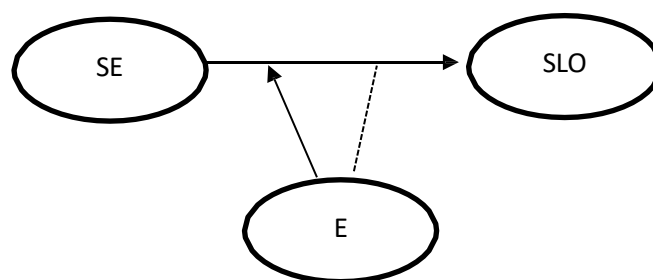
Noted:

SE: Self-Eficacy

SLO: Student Learning Outcomes

E: Environment

Hypothesis:

H1: The Influence of Self-Eficacy on Student Learning Outcomes

H2: Environment Can Moderates The Influence of Self-Eficacy on Student Learning Outcomes

It is true that in the five studies (Revita 2019); (Pertiwi 2021); (NURLATIFAH RANGKUTI 2021); (Hartini 2023) & (Faadhilah 2020) showed that the results of the Self-Efficacy variable can have a positive relationship direction and a significant influence on Student Learning Outcomes (Lestari and Ghaby 2018). As evidence of the researcher's creativity, the researcher added the Environment variable as a moderating variable which is believed to be able to strengthen the influence of the Self-Efficacy variable on Student Learning Outcomes (Ahmad 2010). This research is a quantitative research with an explanatory approach. The data used in this study are primary data from interviews with 400 high school students spread throughout Indonesia. The interview consisted of 10 questions with three main teams around Self-Efficacy, Student Learning Outcomes, and School Environment (Jonathan Sarwono 2016). The interview content contained 5 statements, namely strongly agree, agree, normal/so-so, disagree, and strongly disagree. The data was analyzed using the smart PLS 4.0 analysis tool (Lexy J. Moleong 2014).

RESULT AND DISCUSSION

Background Analysis

In the learning process, students need self-efficacy. Self-efficacy is a belief in one's ability to do a task in order to achieve goals and overcome various obstacles

encountered. Self-efficacy is one's own perception of how well one can function in a particular situation (Winda Meidina and Netty Laura 2022). Self-efficacy is related to the belief that one has the ability to perform the expected action. According to Baron and Byrne, self-efficacy is defined as a person's evaluation of their ability or competence to perform a task, achieve goals, and overcome obstacles. According to Bandura and Wood, self-efficacy refers to the belief in an individual's ability to drive motivation, cognitive abilities, and actions needed to meet the demands of the situation. Self-efficacy is the belief that one can master a situation and produce positive results (Cahyadi 2022) .

Schunk said that self-efficacy plays a very important role in influencing the efforts made, how strong the efforts are in predicting the success that will be achieved. This is in line with what Woolfolk stated that Self-Efficacy is a person's assessment of themselves or the level of belief in how much ability they have in doing a certain task to achieve certain results (Syah 2020). Gits and Mitchell said that self-efficacy can lead to different behaviors between individuals with the same abilities because self-efficacy influences choices, goals, problem solving, and persistence in trying.23 A person with self-efficacy believes that they are able to do something to change the events around them, while a person with low self-efficacy considers themselves basically incapable of doing everything around them. In difficult situations, people with low self-efficacy tend to give up easily. While people with high self-efficacy will try harder to overcome the challenges that exist. This is also in line with what Gist expressed, who showed evidence that feelings of self-efficacy play an important role in motivating workers to complete challenging work in relation to achieving certain goals (Faadhilah 2020).

Referring to the various interpretations above, it can be concluded that self-efficacy is a person's belief or confidence in their ability to carry out tasks given to them, and to achieve goals and overcome obstacles to achieve a result in a particular situation (Heriyantho and Leon 2022). The characteristics of individuals who have high self-efficacy according to Bandura are: (1) individuals are confident in their ability to handle events and situations faced effectively, (2) are persistent in completing tasks, (3) believe in their own abilities, (4) view difficulties as challenges, (5) set their own goals to be achieved, (6) instill and increase strong efforts when facing obstacles, (7) focus on tasks and think of strategies to overcome difficulties, (8) can restore self-confidence quickly after experiencing failure, (9) are able to face obstacles with the belief that the individual is able to control them (Cahyadi 2022).

Students who have high self-efficacy will believe in their ability to complete tasks given by the teacher and try to overcome challenges, while students who have low self-efficacy consider themselves incapable of completing tasks and tend to give up in difficult situations (Faadhilah 2020). This is in accordance with the opinion of Schunk and Pajares that students with high self-efficacy are more likely to persist with efforts on learning tasks than students with low self-efficacy. Based on this, researchers believe

that Self-Efficacy can have a positive relationship direction and significant influence on Student Learning Outcomes (Pertiwi 2021).

Several previous studies have shown (Revita 2019); (Pertiwi 2021); (NURLATIFAH RANGKUTI 2021); (Hartini 2023) & (Faadhilah 2020)showing a positive relationship direction and significant influence on Student Learning Outcomes. Unlike the five studies above, this article adds the Environment variable as a moderating variable.

Validity Test

To prove the assumptions and creativity of researchers quantitatively by using PLS 4.0 software requires several stages in sequence, namely the validity test stage, the reliability test stage, and the path coefficient stage. The following are the results of the validity test in this article (Sarstedt et al. 2014).

Table 1

Validity Test

Variable	Question Item	Loading Factor
Self-Eficacy (X1)	Self-efficacy can make students more confident	0.852
	Self-efficacy can make students' targets easily achieved	0.866
	Self-efficacy can improve Student Learning Outcomes	0.859
	Self-efficacy can make students compete with other students well	0.841
Student Learning Outcomes (Y)	Student Learning Outcomes can be influenced by Self-Efficacy	0.898
	Student Learning Outcomes can be influenced by students' good competitiveness	0.912
	Student Learning Outcomes can be influenced by a good physical environment	0.925

		0.918
	Student Learning Outcomes can be influenced by a good non-physical environment	
Environment (Z)	The environment can influence students' self-efficacy	0.952
	The environment can influence student learning outcomes	0.941

Valid > 0.70

Validity Test

According to the sequence explained after passing the reliability test stage, the next stage that can be done is the validity test stage. This stage aims to analyze each variable used in this article, namely the Self-Efficacy variable, student learning outcome variables, and environmental variables. The following are the results of the validity test in this article (Ghozali 2016).

Table 2

Validity Test

Variable	Composite Reliability	Cronbach Alfa
Self-Eficacy	0.882	0.841
Student Learning Outcomes	0.941	0.901
Environment	0.962	0.941

Validity Test > 0.70

Path Coefisien

After passing the validity and reliability test stages, the next stage that can be passed is the Path Coefficient stage. This stage is the stage of proof of the hypotheses formulated by researchers in the research methodology section. The following are the results of the path coefficient in this stage (Sugiyono 2019).

Table 3

Path Coefisien

	Variable	P-Values	Noted
Direct Influence	SE->SLO	0.023	Accepted
Indirect Influence	E*SE->SLO	0.000	Accepted

Significant Level < 0.05

The results of the third table of path coefficients above show that each hypothesis proposed by the researcher in the research methodology section can be accepted. In the first hypothesis section which is in line with the five previous studies,

namely (Revita 2019); (Pertiwi 2021); (NURLATIFAH RANGKUTI 2021); (Hartini 2023) & (Faadhilah 2020)shows similar results, namely the Self-Efficacy variable can have a positive relationship direction and a significant influence on Student Learning Outcomes because the P-Values are positive and below the significance level of 0.05, namely 0.023. This is because self-efficacy can create self-confidence or potential, competitive ability, and other things that can improve student learning outcomes. In the second hypothesis, as well as proof of the researcher's creativity in adding the Environment variable as a moderating variable, it also shows similar results, namely the Environment variable can moderate the influence of the Self-Efficacy variable on Student Learning Outcomes. This is because the P-Values value leads to the positivity and is below the significance level of 0.05, which is 0.000, which is more significant than direct testing of 0.023. Thus, the first and second hypotheses in this article can be accepted and proven.

CONCLUSION

The results of the third table of path coefficients above show that each hypothesis proposed by the researcher in the research methodology section can be accepted. In the first hypothesis section which is in line with the five previous studies, namely (Revita 2019); (Pertiwi 2021); (NURLATIFAH RANGKUTI 2021); (Hartini 2023) & (Faadhilah 2020)shows similar results, namely the Self-Efficacy variable can have a positive relationship direction and a significant influence on Student Learning Outcomes because the P-Values are positive and below the significance level of 0.05, namely 0.023. This is because self-efficacy can create self-confidence or potential, competitive ability, and other things that can improve student learning outcomes. In the second hypothesis, as well as proof of the researcher's creativity in adding the Environment variable as a moderating variable, it also shows similar results, namely the Environment variable can moderate the influence of the Self-Efficacy variable on Student Learning Outcomes. This is because the P-Values value leads to the positivity and is below the significance level of 0.05, which is 0.000, which is more significant than direct testing of 0.023. Thus, the first and second hypotheses in this article can be accepted and proven.

REFERENCES
Ahmad, Rodi. 2010. "Pengaruh Lingkungan Kerja Terhadap Kinerja Karyawan Pada Dinas Pendididkan, Pemuda Dan Olahraga Kabupaten Sleman." bkd.jabarprov.go.id/artikel/86-.
Cahyadi, Lukman. 2022. "Mengukur Turnover Intention, Konflik Peran, Dan Self Efficacy." *Jurnal Ekonomi : Journal of Economic* 13(01): 16.
Faadhilah, Annisa Hasna. 2020. "PENGARUH UMPAN BALIK POSITIF DARI TEMAN SEBAYA TERHADAP PRESENTASI DIRI YANG DIMODERASI OLEH EFIKASI DIRI PADA REMAJA AKHIR PENGGUNA INSTAGRAM DI KOTA BANDUNG." UNIVERSITAS PENDIDIKAN INDONESIA.

Ghozali, I. 2016. *Aplikasi Analisis Multivariete Dengan Program (IBM. SPSS)*. Diponergoro: Univrsitas Dipenogoro.

Hartini, Sinta. 2023. "PENGARUH EFIKASI DIRI TERHADAP HASIL BELAJAR DENGAN LINGKUNGAN BELAJAR SEBAGAI VARIABEL MODERATOR (Survei Pada Siswa Kelas XI SMA Negeri Se-Kota Sukabumi)." FAKULTAS PENDIDIKAN EKONOMI DAN BISNIS UNIVERSITAS PENDIDIKAN INDONESIA BANDUNG.

Heriyantho, D V, and F M Leon. 2022. "Analisis Literasi Keuangan, Efikasi Diri, Dan Perilaku Kredit Berisiko Pada Mahasiswa Di DKI Jakarta." *Jurnal Pendidikan Tambusai* 6: 13202–16. https://www.jptam.org/index.php/jptam/article/view/4542%0Ahttps://www.jptam.org/index.php/jptam/article/download/4542/3831.

Jonathan Sarwono. 2016. *Meode Penelitian Kualitatif Dan Kuantitatif*. Bandung: Graha Ilmu.

Lestari, Endah Rahayu, and Nur Kholifatul Fithriyah Ghaby. 2018. "The Influence of Organizational Citizenship Behavior (OCB) on Employee's Job Satisfaction and Performance." *Industria: Jurnal Teknologi dan Manajemen Agroindustri* 7(2): 116–23.

Lexy J. Moleong. 2014. *Metode Penelitian Kualitatif*. Bandung: Remaja Rosdakarya.

NURLATIFAH RANGKUTI. 2021. "PENGARUH EFIKASI DIRI DAN MOTIVASI BELAJAR TERHADAP HASIL BELAJAR MATEMATIKA PADA SISWA SEKOLAH DASAR." PASCASARJANA UNIVERSITAS ISLAM NEGERI MAULANA MALIK IBRAHIMMALANG.

Pertiwi, Mifta Ayu. 2021. Ilmu Tarbiyah dan Kependidikan Madrasah Ibtidaiyah "Hubungan Efikasi Diri (Self Efficacy) Terhadap Motivasi Belajar."

Revita, Novira. 2019. Skripsi "Hubungan Self-Efficacy (Efikasi Diri) Terhadap Hasil Belajar IPA Siswa Kelas VII SMPN 1 Tanah Putih Tahun Ajaran 2019/2020." Siswa yang memiliki efikasi diri yang tinggi akan percaya terhadap kemampuannya dalam menyelesaikan tugas-tugas yang diberikan oleh guru dan berusaha mengatasi tantangan, sedangkan siswa yang memiliki efikasi diri yang rendah menganggap dirinya tidak ammp.

Sarstedt, Marko et al. 2014. "Partial Least Squares Structural Equation Modeling (PLS-SEM): A Useful Tool for Family Business Researchers." *Journal of Family Business Strategy* 5(1): 105–15.

Sugiyono. 2019. *Metode Penelitian Kuantitatif, Kualitatif, R&D*.

Syah, Y. H. 2020. "Pengaruh Efikasi Diri, Kelelahan Kerja Dan Produktivitas Kerja Terhadap Stres Kerja Staf Administrasi Kantor PT HM SAMPOERNA TEGAL." Universitas Pancasakti Tegal.

Winda Meidina, Dwi, and dan S Netty Laura. 2022. "The Effect of Employees' Mental Health on Performance Mediated by Welfare in the Workplace (Empirical Study on Information Technology Division Employees During Work From Home." *Business Management Journal* 18(1): 85–105. https://journal.ubm.ac.id/index.php/business-

management/.