

Long-Distance Online Learning During Pandemic: The Role of Communication, Working in Group, and Self-Directed Learning in Developing Student's Confidence

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ABSTRACT

The Covid-19 pandemic resulted in the learning process being carried out online, even on campuses with face-to-face traditions such as Andalas University. Although Unand has initiated the development of blended-learning, compulsory implementation of online learning is a challenge for lecturers and students. This study aims to examine the effect of communication with lecturers, teamwork, and self-directed learning on student self-confidence regarding the achievement of learning outcomes. The research was conducted with a survey method involving 106 accounting students of Unand. Data was collected by convenience via google form. Data were analyzed using multiple regression. The study results show that lecturer-student communication and the ability to do self-directed learning affect student self-confidence. Meanwhile, the group work carried out did not affect student self-confidence. These findings imply the importance of communication and a willingness to learn independently. In addition, these results also provide messages regarding the development and design of group work.

Keywords: *Online Learning, Communication, Work in Group, Self-Directed Learning, Confidence*

1. INTRODUCTION

The Covid-19 pandemic that occurred has affected almost all human life sectors, including the teaching and learning process. The threat of the risk of spreading the virus makes the learning process at the University entirely remotely and virtual. The same thing also happened at Andalas University, which requires virtual distance learning in the odd semester of the 2020-2021 academic year. Although distance learning practices are not unfamiliar anymore, implementing them suddenly with limited readiness often creates problems. In addition to infrastructure support, teachers' and students' readiness in the learning process is also critical. Use of gadgets) especially laptops and cellphones are very crucial to the success of this distance learning. With these two devices, students can build communication with lecturers and fellow students, search for learning sources in cyberspace, and various other benefits.

Communication media is a container or means used as an intermediary to communicate with one another. Suranto (2011) [1] states that the method of interpersonal communication using (indirect) media in certain situations can be an option, for example, in conversations by telephone, email, correspondence, SMS, etc. The use of communication media in the current era of globalization makes communication in certain situations and conditions efficient and provides

essential background for the social, emotional, and cognitive development of young people, accounting for most of their time (Pempek, Yermolayeva, and Calvert, 2009) [2]

Among the critical challenges of gadget-mediated distance learning is communication between student-lecturers, communication, working in groups among fellow students, and students' willingness to study independently. These challenges and essential features are strongly thought to determine students' self-confidence and learning performance. Apart from that, these three factors are indeed critical features in collaborative and interactive learning. These features become even more crucial when learning is done remotely (without meeting face to face in class). Sharpe (1992) [3] states there are four features of a modern learning process that he called 4C, particularly in the context of language learning, namely communication, culture, context, and confidence. Kurniawan (2017) [4] suggests that communication and the ability to work in teams are vital skills that students need to have to be successful in a career. Narti (2017) [5] found that interpersonal communication through the Whatsapp application built students' ability to communicate with lecturers in the thesis guidance process. Communication through applications such as WhatsApp provides benefits in terms of the communication period available to share that is freer in time and space than face-to-face

communication. Afriyenti and Misra (2019) [6] found that collaborative learning is useful in building student leadership skills. They suggest that cooperative learning through task groups can build leadership skills, improve communication between students, and increase student satisfaction in collaboration. Tahar and Enceng (2006)

[7] suggest that independence is an essential factor in supporting student performance. Roger (1969) [8] implies that pushing oneself in the learning process will shape motivational aspects and internal cognitive development. In a similar vein, Garrison (1997) [9] states that self-directing in learning contains two issues at once, namely social and mental problems.

The use of short messages through cell phones is a popular communication style in the current era of globalization. A study quoted from www.vemale.com ("teenagers prefer 'thumbs up' communication over talking," 2012) said that the average teenager sent a written message 3,417 times a month, or an average of

7 times a month. Hour. Young women used text messages more. On average, they sent messages 3,952 times per month, while young men only sent text messages 2,815 times a month. The activity of sending short messages can fulfill our need to communicate with others. However, formal communication in the process of online learning in the faculty is expected to have a different trend from informal communication in daily life.

Previous studies have suggested that mobile phones have brought significant benefits to teachers and students (Machmud & Abdulah, 2017; [10] Baliu & Machmud, 2017 [11]; Alzu'bi & Sabha, 2013 [12]

). Suranto (2011) [1], in the context of interpersonal communication, although it is more advisable to conduct direct interpersonal communication to minimize the risk of misunderstanding, the use of media in interpersonal transmissions (indirect contact), such as using SMS or social networks, is still considered efficient in terms of the situation and specific conditions. Statement Suranto (2011) [1] also gives impressions that communicating directly provides several advantages, such as reducing misunderstandings.

In addition to good communication with lecturers and fellow students, distance learning's effectiveness is also influenced by collaboration and interaction in workgroups and students' willingness to encourage themselves to learn independently. Williams, Duray, and Reddy (2006) [13], in the study of collaborative learning with computer support, found that the orientation of teamwork and cohesiveness in the group determines MBA student learning outcomes. Anwar (2016) [14] found that group-based tasks succeeded in building group pride, interpersonal attractiveness, and commitment to functions from another perspective. All three of these effects affect the outcomes of learning. Loyens, Magda, and Rikers (2008) [15] suggest that self-directed learning plays a decisive role in self-regulated learning. Self-regulated learning is a characteristic of the distance learning process. These findings imply the importance of

students' abilities in determining learning outcomes such as satisfaction, confidence in the result, and learning performance. Given the practice of distance learning at Universitas Andalas through and based on the University's policy officially, then tested the effectiveness of distance learning with expensive features such as communication, teamwork, and self-directed learning is affecting confidence student on achievements outcome, it becomes essential to do.

This study aimed to examine the effect of communication students with professors, communication between the members and the dynamics of group learning, and self-directed learning to believe students' learning outcomes on the outcomes online of distance learning. More specifically, this study will evaluate these features before testing their relationship with student confidence. This study limits testing only to self-confidence in learning outcomes because the survey was conducted on students whose learning process was still up to the Mid-Semester Examination. The performance outcome could not yet be obtained.

It is expected that this study will contribute to increasing the effectiveness of distance learning, especially in mandatory and sudden conditions due to the Covid-19 pandemic, by evaluating the features and challenges faced in the virtual remote learning process. Especially for the Andalas University environment, even though the moodle-based e-learning platform has been around for a long time, this semester is the first semester of online learning, which is mandated. Therefore, this study's findings will help provide insight into efforts to develop the distance learning process at Andalas University in a more comprehensive manner.

2. LITERATURE REVIEW

2.1 Distance Learning

Distance learning or distance education is the path that must be chosen for educational institutions today in dealing with the COVID-19 pandemic situation. Distance learning is a learning process between teachers and students or lecturers and students or teachers and physically in different places. Ardiansyah explained that distance learning is a learning system used as a means for the teaching and learning process, which is carried out without having to meet face to face directly between teachers and students (Ardiansyah, 2013) [16]. In another sense, the distance learning process combines the principles of the learning process with technology (Chandrawati, 2010) [17]

Conventional educational methods carry out the teaching process between teachers and learners at the same place and simultaneously. Whereas in distance learning, teaching and education can be carried out in different places and at different times or what we often refer to as asynchronous learning (Kusuma, 2020) [18]. The conventional method also considers that the teacher is an information center for learners. While the

methods of distance learning, a teacher designing a method teaching *Student-Centered Learning*. The SCL method provides direction for learners to be independent in their learning and be responsible for their understanding (Cucus, 2016) [19]. The teacher only acts as a mediator for the learner if he finds problems in the learning process.

Slameto (2003) [20] suggests several factors that influence student achievement. These factors are divided into two parts, namely, internal factors and external factors. Internal factors include physicality, intelligence, motivation, attention, interests, talents, and readiness. External factors such as family conditions, community conditions, learning methods, curriculum, learning facilities, and infrastructure. Pandemic times require everyone to use technology in the learning process. One of the technology applications used is information and communication technology. Information and communication technology-based learning transforms conventional or traditional pattern learning systems into patterns that have media. The Internet is a connector, and the computer is a source of individuals to connect (Munir, 2009) [21]. Multimedia creativity in distance learning will improve the quality of distance learning because the main problem is that the content in i-learning cannot explain learning material clearly, and in general, the content on e-learning only contains slides and material from the teacher in the form of a display that less attractive and attractive (Cucus, 2016) [19].

According to Setiawan (2019) [22], advantages notion of distance learning, including learning, can be carried out in a different place. The learning process can be carried out at different times, the transfer of information facilitated by the Internet, the learning process is flexible, and an open-access learning process broader for anyone who teaches and anyone who learns. While deficiency of distance learning include: the ability to use technology that has not been evenly distributed between teachers and learners, the limitations of the internet signal in several regions in Indonesia, the limitations of supporting devices to carry out distance learning for teachers and learners, the process of interaction between teachers and learners are limited, and the curriculum structure has not been fully adopted for distance learning.

2.2 Lecturer-Student Communication in the learning processes.

Along with technological advances that have provided the Internet for all people, making this distance learning process easy. We cannot imagine what would happen if this pandemic occurred when internet technology was not as sophisticated as it is today. Which requires inter-human pandemic not meet each other, to keep a distance, reducing the number of people in one place, marouses conventional teaching methods can not be implemented.

In the distance learning process between instructors and learners, it requires a media link for transferring information. Based on a search on the spada.kemdikbud.go.id website, 101 universities in Indonesia already have their own LMS (Learning Management System). LMS is a system designed for online learning. However, both universities that already have an LMS and those that do not still need other media can connect them in *real-time* to coordinate the learning process. One of the media currently used by all institutions is Whatsapp.

Whatsapp, as a platform owned by everyone in Indonesia, is considered a very reliable medium as the primary medium of communication. Various WhatsApp features to support the distance learning process very well, such as sharing text and voice messages, voice and video calls, sending files in the form of document images, and group features. This makes WhatsApp very ideal for managing the learning process traffic (Kusuma, 2020) [18]. However, WhatsApp still has shortcomings when compared to LMS, where Whatsapp does not provide features for collecting assignments placed in a container, attendance features, call features for dozens of people, and features for assignment and quiz methods for many participants. However, WhatsApp is sufficient to complement LMS's shortcomings, which can directly convey information into the hands of the learner's participants in real-time. Maybe in the future, if LMS is increasingly being developed into an application installed on everyone's device so that every notification there is a notification on the device, WhatsApp is no longer needed.

Besides the need for hardware and software for the learning process, teachers' and students' closeness is also an essential component in the distance learning process. Good communication between them is indicated by the openness for the teacher to accept questions and discussions from students and the freedom for learners to ask questions. This will not happen if one party or both parties block the way to establish communication. So it requires teaching human resources who respond well to every communication made in the media liaison.

2.3 Group Work in Learning

Group work in learning is a method that brings together several learners to work together to carry out assignments, discussions and solve cases given by the teacher so that the learning objectives are achieved. According to Gordon (Moeslichatoen, 2004: 138) [23], group work is a learning activity that allows children to learn to be able to organize themselves in order to build friendships, participate in group activities, solve problems faced by groups, and work together to achieve common goals.

The group work process carried out by learners has several advantages. According to Sudjana (2010) [24], the advantages of the group work method provide ample opportunities for children to express ideas,

responses, experiences so that students are active and learning activities will be better, increase students' learning motivation, enforce mutual respect for friends' opinions, foster excitement. Students' learning, using group work can increase the closeness between students; member participation is needed to carry out collaborative work in completing group assignments given by the teacher.

Behind all the advantages of the group work learning method, there are inherent weaknesses, such as there are individual students who cannot convey their opinions to their groups, there are gaps in the ability of the group, students who feel they understand better than others become victims to complete assignments and work, the lack of good communication within the group, and the tasks are divided equally by individuals. The last condition implies that work returns to being like individual work and loses the essence of group work itself. Therefore, teachers who decide to implement the group work learning method must develop strategies to carry out the work scenario in groups effectively.

2.4 Student Learning Independence and Self-directing

The distance learning method puts student center learning in the process. SCL has the main factor for its sustainability in the form of student independence in independent learning. The condition of a student being a learner in college requires him to be responsible for himself. This demand for independence is high and must be more comprehensive in understanding every theory and concept being studied. All sides of the science that is occupied must be discussed in depth. Independence does not mean that teachers let go of learners, but independence is manifested in courage from an intellectual perspective.

Cheng (2011) [25] states that in independent learning, learners need to set goals, make plans, choose strategies, monitor the process, and evaluate their learning outcomes. Specifically, the problem of independence demands an individual's readiness, both physically and emotionally, to organize, manage, and carry out activities on his responsibility without much dependence on others. Monk et al. (2006) [26] show that independent people show explorative behavior, make decisions, are confident and creative, besides being able to act critically, are not afraid to do something, and have satisfaction in carrying out their activities, and can accept reality.

Independence is an individual attitude that is obtained cumulatively during development, where individuals will continue to learn to be independent in dealing with various situations in the environment so that individuals can ultimately think and act on their own. Independence is one of the factors that determine the high or low motivation of students in completing education. Students must be able to solve problems, make decisions, carry out the chosen decisions, regulate

their attitudes and behavior, and have a high initiative level.

The condition of the family is also one of the factors forming student independence. A good relationship between parents and children makes children confident in their life processes. The parents' economic condition also determines the students' calmness carry out their assignments in college. Stable parents will support their children to be independent. Independent children, thanks to their parents' encouragement, will not let go of their families but will always ask for input and suggestions from the family regarding decisions to be taken. The environment around students also takes part in shaping student independence. So independence becomes an essential factor for a teenager who is growing up to be motivated to complete his obligations.

Independent learning is a term discussed in research on education, goal setting, self-assessment, and looking for factors that influence learning (Boekaerts 1999 [27]; Paris and Paris 2001 [28] and Zim Merman 1989) [29]. Independent learning is the best factor in academic performance (Minnaert and Janssen, 1999) [30]. However, it has been stated that all learners will indeed integrate themselves into the learning process by organizing themselves, starting from the planning stage, then implementing and evaluating their actions (Winne 1995) [31].

2.5 . Confidence

In tertiary institutions, students are required to be able to adapt to the environment, complete assignments, get achievements, survive, and develop their abilities (Asiyah, 2013) [32]. Asiyah further stated that some students could not go through higher education, and more struggle was needed. This struggle must be accompanied by confidence in their abilities so that students can show their personalities.

Independent students will show an explorative spirit and action, be able to make decisions, be confident, act critically, accept reality and be creative, and have satisfaction with themselves for the activities they carry out (Monk, 2006)[26]. Goleman (2003) [33] explains that self-confidence is a strong awareness of one's values and abilities in increasing an understanding of accounting to achieve goals and ideals. Students who have self-confidence will dare to appear with self- confidence, state their existence, convey their views, and are willing to sacrifice for the truth and make the right decisions even in uncertainty and depression situations.

Emotions in students are related to self-confidence. Students who have good emotional intelligence will be able to get along and organize well, understand themselves, and be responsible for their lives. This makes students feel confident. (Ariantini, 2014) [34]. To hone and increase self-confidence, the students need to do emotional intelligence training. This training will affect students' self-confidence to show their potential, hoping that students will achieve their life

goals successfully (Stein & Book, 2002) [36]. Kaddoura (2010) [37] found that nursing school student confidence was built through precise clinical simulations.

2.6. Hypothesis Development

2.6.1. Communication with Lecturers and Student Confidence

Lecturers and students are a reciprocal relationship that needs each other and is established through communication. Interpersonal communication is communication in oral, written, and nonverbal forms that exist between individuals to convey their intentions and goals (Liliweri, 2017) [38]. As separate individuals, students and lecturers have more power than the other, causing obstacles in the communication process. Students have obstacles to convey opinions and questions to the lecturer, as a higher party.

Students' self-confidence that is already well-formed may disappear when they meet lecturers who do not communicate well with students. Especially during the pandemic era, communication was only established through electronic devices without seeing the state of feelings, and other communication opponents' facial expressions, adding to the pressure students had to face in communicating with lecturers. Avtgis (2001) [39] found that Gen reason educators (*teacher clarity*), together with significant learning and motivation of students, affect learners' confidence. In an online learning setting, clarity will be achieved, one of which is through open communication channels between teachers and students. based on the explanation and empirical findings, hypothesis 1 is formulated as follows:

H1. Communication with Lecturers affects Student Confidence regarding the learning outcomes

2.6.2. The effect of Group Learning and Student's Confidence.

Dolmans and Schmidt (2000) [40] conducted a search related to lessons that learners decided to learn using different curricula at four levels. Whether learners' behavior in seeking information is based on assessment, learning objectives, study groups, learning resources, and teachers' curriculum. The results in each curriculum have the factors that drive them. The source of learning becomes the driving factor for first-year learners, while their seniors choose to study groups that are the source of the spirit of learning.

Learning in groups consists of several individuals who have different levels of self-confidence. A good group will have a warm discussion in completing the tasks given in a lesson. Sudjana (2010) [24] states the advantages of the group work method: providing opportunities for learners to express ideas, responses, and experiences. This will increase individual activity,

increase learning motivation, hone an attitude of respect for other people's opinions, increase enthusiasm for learning and increase the closeness between learners in completing group assignments given by the teacher. Juniati (2017) [41] concluded that through group discussions given to students, it gave a significant difference in students' scores. Belief in the importance of group learning and a willingness to open communication channels and work in groups is becoming increasingly important in online learning where students are geographically separated in various places. Afriyenti and Misra (2019) [6] found that collaboration in groups succeeded in developing leadership skills and improving group learning performance. Fushino (2010) [42] found a causal relationship between self-confidence in communication, belief in group learning, and the willingness to communicate in the group. From the description above, the hypothesis is stated as follows:

H2: The effectiveness of learning in groups affects student self-confidence regarding the learning outcomes

2.6.3. Independent Learning and Student Self-Confidence

Student independence will arise when he finds a position that demands self-confidence (Desmita, 2011) [43]. Higher education provides a forum for students to hone their self-confidence skills such as class presentations, asking or arguing in class, and student organizations on campus. Parents are the key to children's independence. How parents care for and raise children, giving children opportunities in the decision-making process, encouragement, and support at every opportunity, and there is always every child in need, will be the basis for forming children's self-confidence (Asiyah, 2013) [32].

Tahar and Enceng (2006) [7] suggest that independent learning is the readiness of individuals who are willing and able to learn on their initiative, with or without the help of other parties in determining learning objectives, learning methods, and evaluating learning outcomes. Related to this explanation, Sugilar (2000)

[44] summarizes the opinion of Guglielmino, West & Bentley, which states that the characteristics of individuals who have independent learning readiness are characterized by (1) love for learning, (2) self-confidence as students, (3) openness to learning challenges, (4) curiosity, (5) self-understanding in learning, and (6) accepting responsibility for learning activities.

Indicators from the aspect of independence are: (1) how to start learning; (2) managing study time; (3) using their learning style; (4) able to think critically, creatively and innovatively; (5) not easily influenced by the opinions of others; (6) not running away or avoiding problems; (7) solving problems by thinking deeply; (8) if you find that the problem is solved by yourself without the help of others; (9) do not feel inferior in the realm of being different from other people; (10) trying to work with full diligence and

discipline; and (11) are responsible for their actions (Nursa'ban, 2013) [45]. The ability to learn independently will foster self-confidence in students. Tahar and Enceng (2006) [7] found that independence positively affects student performance in the Financial Management course. Roger (1969) [8] states that independent learning will encourage student cognitive development and provide a vital motivational aspect to learners. Based on this description, hypothesis 3 is formulated as follows:

H3: The effectiveness of independent learning has a significant effect on Student Confidence regarding the achievement of learning outcomes.

3. RESEARCH METHOD

3.1 Research Design, Population and Sampling

This research is a descriptive study that examines the correlational relationship between the independent variable and the dependent variable. This study's population were students of the Accounting Department, Faculty of Economics, Andalas University, who conducted online lectures. Sampling was carried out by a convenience sampling method for students from semester three and above. This method is considered permanent because this study does not require specific competence or experience as a prerequisite for responding. Data was collected online using google form. The questionnaire was sent to 128 students who were registered online in 5 classes of accounting subjects.

3.2 Identification and Measurement of Variables

This study has three independent variables: communication with lecturers, group work, and independence in learning (*self-directing*). Meanwhile, the dependent variable is the student's confidence in the learning results to be achieved. The measurement of lecturer-student communication, work in group, and self-directed learning was developed from Kassim and Ali (2007) [46]. Meanwhile, student confidence is developed from the instrument by Kassim and Ali (2007) and Horne, Lincoln, and Logan (2017) [47]. All questions were measured using a 5-point Likert scale.

3.3 Goodness of Data and Data Analysis

To gain confidence in the research instrument's appropriateness and the fulfillment of the BLUE (*Best Linear Unbiased Estimates*) criteria, validity, reliability, and classical assumption tests were carried out. The validity test was carried out using the Pearson Correlation, while the Cronbach Alpha test carried out the instrument reliability test. Meanwhile, the classical assumption test includes normality, heteroscedasticity,

autocorrelation, and multi-collinearity. The normality assumption test was carried out by the Kolmogorov-Smirnov test, the multicollinearity test by looking at the Variance Inflation Factor's value, the autocorrelation test with the Durbin-Watson measure. In contrast, the heteroscedasticity test was carried out using the residual variance test between observations. Data were tested using multiple regression.

4. RESULTS AND DISCUSSION

4.1 Overview of Respondents

From the data collection conducted, 106 respondents gave responses from 128 students who were sent a questionnaire. Demographic data of respondents can be described in the following table:

Table 4.1
Repondents Demografic Data

Demographic Basis	Amount	Percentage
College Year		
2016	1	2%
2017	16	15%
2018	37	35%
2019	36	34%
2020	15	14%
Parents' Income (Rp)		
0-1,000,000	10	9%
> 1,000,000 - 3,000,000	27	25%
> 3,000,000 - 5,000,000	37	35%
> 5,000,000 - 10,000,000	17	16%
> 10,000,000 - 20,000,000	7	7%
> 20,000,000	3	3%
Not filling	5	5%
Residence		
Bandung	1	1%
Indragiri Hulu, Riau	1	1%
Agam Regency	8	8%
Dharmasraya Regency	2	2%
Indragiri Hulu Regency	1	1%
Kampar Regency (Riau)	1	1%
Kepahiang District	1	1%
Padang Pariaman Regency	3	3%
Pasaman Regency	3	3%
West Pasaman Regency	1	1%
Pesisir Selatan Regency	3	3%
Sijunjung Regency	1	1%
Solok Regency	1	1%
Tanah Datar Regency	6	6%
Batam city	2	2%
Bukittinggi City	5	5%
Jambi City	1	1%
Padang city	53	50%
Pariaman City	1	1%
Payakumbuh City	1	1%
Pekanbaru City	3	3%
Sawahlunto City	1	1%

Solok City	1	1%
Kuantan Singingi	1	1%
Muara Bungo	1	1%
Riau	2	2%
Does not include the city	1	1%
grade-point average		
2.00-2.50	0	0%
2.51-3.00	4	4%
3.01-3.50	47	44%
3,51-3,75	28	26%
> 3.75	21	20%
Does not include GPA	6	6%

4.2 The Result of Goodness of Fit and Classical Assumptions Test.

The test results show that the research instrument used is valid. All question items show the calculated *r*-value that is greater than the *r*-count. In this study, testing the validity using the *corrected items correlation technique*, namely by correcting the items' score with the total score. Valid and invalid criteria are if the *corrected item-item correlation* > from *r* table with a significance level of 5%, then the data is declared valid. First, you have to look for the *r* table, where the formula for *r* table is $df = N - 2$, so $df = 106 - 2 =$

104. The *r* table of *df* 104 is 0.1909. Based on the data in the table above, all the *corrected item-item correlation* values are obtained, > 0.1909, so it can be concluded that each item of the measuring instrument used has met the validity.

The reliability test is used to show the extent to which a measurement can obtain consistent, stable, and relatively not different results when re-measuring the same object. Reliability testing is done statistically by calculating the amount of Cronbach Alpha. If the resulting alpha coefficient > 0.60, the instrument is said to be reliable. Conversely, if the alpha coefficient is < 0.60, the instrument is concluded to be unreliable.

Based on the results of the reliability test presented in the table above, it can be seen that the Cronbach Alpha value is > 0.60. This means that the indicators of the variables in this study are reliable. Likewise, the test results of classical assumptions test show the fulfillment of all the assumptions referred to.

4.3 Hypothesis Testing Results

The distance learning process is not new in the world of higher education. Even some universities have made this learning model the main learning model. However, implementing online distance learning on campus with face-to-face traditions presents challenges, even difficulties. The previous environment provided space for direct communication and interaction for classroom face-to-face, but now this is only done in a limited manner through learning media. Likewise, the ability to encourage oneself to study independently is becoming

increasingly important. Long (1989) [48] states that independence is one of the main points in the adult learning process (andragogy). Furthermore, Tahar and Enceng (2006) [7] stated that independence greatly determines student learning performance. Roger (1969)

[8] emphasized that self-direction in learning is an important factor responsible for building internal motivational and cognitive aspects in the learning process. This study examines the effect of lecturer- student communication, working in groups, and learning independently (*self-directing*) on student confidence in learning outcomes.

Hypothesis 1 predicts that lecturer-student communication has a significant effect on student confidence in learning outcomes. The hypothesis testing results show that this hypothesis is supported ($t = 2.162$, $p = 0.033$). Meanwhile, hypothesis 2 predicts that work in terms of the effectiveness of working in groups has a significant effect on student confidence in learning outcomes. The test results show that this hypothesis is not supported ($t = 0.365$, $p = 0.716$). Finally, this study predicts that students' ability to learn independently affects their self-confidence in learning outcomes. As shown in the following table 4.2, the value of $t = 5.584$ ($p = 0.000$) is obtained. These results indicate that hypothesis 3 is supported.

4.4 Discussion of Research Results

The distance learning process is an inevitable condition in the current pandemic conditions. Although this distance learning process is commonplace, implementation in an abrupt way and an environment accustomed to face-to-face learning certainly poses its challenges. These challenges are believed to affect students' readiness, self-confidence, and learning performance. Simanullang (2017) [49] states that several factors influence student self-confidence, including communication and the learning methods used. Meanwhile, Haryono (2001) [50] states that learning independence needs to be given to students so that they have the responsibility to organize and discipline themselves in developing the learning abilities of their own accord.

Furthermore, the distance learning process also requires ICT support and adequate learning infrastructure. Besides assisting, technology on other occasions can also cause its difficulties, including limited communication. This study examines the effect of lecturer-student communication, the effectiveness of group learning, and the ability to learn independently on student self-confidence in learning outcomes.

This study found that lecturer-student communication had a significant effect on student self-confidence. These results imply that established communication is indeed the most important feature in the learning process's success. Even though there is no face-to-face communication, respondents believe that communication with lecturers can support their learning outcomes. This perception then forms their confidence that their learning outcomes and learning performance will be

good. This study also found that collaboration between groups did not affect students' confidence. This finding implies students' belief that they have succeeded in building communication and working well in the group. This belief will ultimately affect their confidence in the achievement of learning performance. This discovery provides important implications for the ability of students to develop cooperation within the team. The results of this study are inconsistent with the findings of Afriyenti and Misra (2019) [6]. They found that the ability to work in teams helps develop student leadership skills, including in the learning process of accounting theory.

This study then found that independence had a significant effect on students' self-confidence regarding their learning outcomes. The findings of hypothesis 3 are in line with the results of Tahar and Enceng (2006)

[7] study, which found that independence in learning has a positive effect on learning performance. This finding implies that learning independently (*self-directing*), especially when there is no face-to-face meeting with the lecturer, is crucial for self-directed students. This finding also supports the findings of Kurniawan (2017) [4], which states that independence is one of the important attributes that prospective graduates need to have to excel in the world of work. Roger (1969) [8] stated that self-drive is related to the development of motivation and cognitive abilities. This statement implies that students who can work independently will grow into motivated attitudinally and become cognitively strong.

5. CONCLUSION

The corona pandemic has changed various aspects of human life, including the implementation of the learning process at the University. The online learning process is absolutely necessary. This online learning process is a challenge for campuses with a face-to-face learning tradition. These challenges include communication barriers, the ability to study groups remotely, and the willingness of students to study independently. These challenges will mediate satisfaction, confidence and student learning performance.

This study found that communication with lecturers and the ability and willingness to learn independently (self-directed learning) had a significant effect on students' self-confidence regarding their learning outcomes. Meanwhile, the effectiveness of learning in the group did not have a significant effect.

These findings provide three important implications. First, even though it is done remotely, the communication factor between lecturers and students remains the most determining factor in the success of the learning process. The openness of the lecturer to open communication channels with students that may exceed traditional class learning hours is critical to the achievement of the learning process, which in turn builds student confidence. Second, the ability of students to encourage themselves to study independently has been empirically proven

successful in fostering student self-confidence. There is no direct command and supervision from the lecturer, the hours of study vary between lecturers, and perhaps in various situations, the load of assignments varies from time to time, indeed requires students to be able to direct themselves to study and seek learning sources. Third, the dynamics and perceptions of learning in groups need to be continuously developed. The findings of this study suggest that the lack of confidence in students through the learning process in groups may be due to the ineffectiveness of students in managing their study groups. Lecturers need to intervene in helping students create a supportive and collaborative group learning atmosphere.

There are several limitations in this study. First, this study was conducted on students with a variety of different group assignments. Subsequent studies through a controlled experiments or a more extensive surveys may make the results of similar studies more valid. Second, this study did not consider technical constraints in distance learning such as the availability of internet networks and disruptions to learning media which influence learning outcomes and student confidence. Future studies need to consider these two conditions. Future research can also examine the effect of various features and situations of the online learning process on satisfaction and learning performance, which this study has not done.

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REFERENCES

- [1] Suranto Aw. 2011. *Komunikasi Interpersonal*. Yogyakarta. Graha Ilmu
- [2] Pempek, T. A., Yermolayeva, Y. A., & Calvert, S. L. (2009). College students' social networking experiences on Facebook. *Journal of applied developmental psychology*, 30(3), 227-238.
- [3] Sharpe, K. (1992). Communication, culture, context, confidence: The four Cs of primary modern language teaching. *Language Learning Journal*, 6(1), 13-14.
- [4] Kurniawan, R. (2016). Keterampilan dan Atribut yang dibutuhkan oleh lulusan akuntansi untuk sukses berkarir: Pengujian Senjangan Persepsi Mahasiswa dan Pemberi Kerja.. *Jurnal Riset Akuntansi Terpadu*, 9(2).
- [5] Narti Afriyenti, M., & Misra, F. (2019). Mengintegrasikan Keterampilan Kepemimpinan ke dalam Kurikulum Akuntansi: Persepsi Stakeholders

- dan Pengujian Model Pembelajaran Kooperatif. *Jurnal Riset Akuntansi Terpadu*, 12(2), 297-315.
- [6] Tahar, I. dan Enceng. (2006). Hubungan kemandirian belajar dan hasil belajar pada pendidikan jarak jauh. *Jurnal Pendidikan Terbuka dan Jarak Jauh*, 7(2), 91-101.
- [7] Rogers, C. Freedom to learn. Columbus, Ohio: Charles E. Merrill, 1969.
- [8] Garrison, D. R. (1997). Self-directed learning: Toward a comprehensive model. *Adult education quarterly*, 48(1), 18-33.
- [9] Machmud, K. and Abdulah, R. (2017). Using smartphone-integrated model of teaching to overcome students' speaking anxiety in learning English as a foreign language. *Journal of Arts and Humanities*. 6(9) pp. 1-11
- [10] Baliu, M. I., & Machmud, K. (2017). The Use of Smartphone in Developing Student's reading comprehension from Perspective of gender differences. *English Language Teaching and Research*, 1(1).
- [11] Alzu'bi, M., Akram, M., Sabha, N., and Rushdi, L.(2013). Using mobile-based email for English foreign language learners. *Turkish Online Journal of Educational Technology*, 12(1).
- [12] Williams, E. A., Duray, R., & Reddy, V. (2006). Teamwork orientation, group cohesiveness, and student learning: A study of the use of teams in online distance education. *Journal of Management Education*, 30(4), 592-616.
- [13] Anwar, K. (2016). Working with Group-Tasks and Group Cohesiveness. *International Education Studies*, 9(8), 105-111.
- [14] Loyens, S. M., Magda, J., & Rikers, R. M. (2008). Self-directed learning in problem-based learning and its relationships with self-regulated learning. *Educational Psychology Review*, 20(4), 411- 427.
- [15] Ardiansyah, Ivan. 2013. Eksplorasi Pola Komunikasi dalam Diskusi Menggunakan Moodle pada Perkuliahan Simulasi Pembelajaran Kimia, Universitas Pendidikan Indonesia, Bandung-Indonesia.
- [16] Chandrawati, Sri Rahayu. 2010. Pemanfaatan Elearning dalam Pembelajaran. No 2 Vol. 8. <http://jurnal.untan.ac.id/>
- [17] Kusuma, J.W., & Hamidah. (2020). Perbandingan Hasil Belajar Matematika dengan Penggunaan Platform Whatsapp Group dan Webinar Zoom dalam Pembelajaran Jarak Jauh pada Masa Pandemi Covid 19. *Jurnal Ilmiah Pendidikan Matematika*. No 1. Vol.5.
- [18] Cucus, A. (2016). Pengembangan E-Learning Berbasis Multimedia Untuk Efektivitas Pembelajaran Jarak Jauh. *Jurnal Sistem Informasi dan Telematika*. No.1 Vol. 7. Hal 1-5.
- [19] Slameto. (1995). Belajar dan Faktor-faktor yang Mempengaruhinya. Jakarta: Rineka Cipta.
- [20] Munir.(2009). Pembelajaran Jarak Jauh Berbasis Teknologi Informasi dan Komunikasi. Penerbit Alfabeta
- [21] Setiawan, A. R., & Mufassaroh, A. Z. (2020, May 26). Lembar Kegiatan Siswa untuk Pembelajaran Jarak Jauh Berdasarkan Literasi Sainifik pada Topik Penyakit Coronavirus 2019 (COVID-19). <https://doi.org/10.31237/osf.io/7tngk>
- [22] Moeslichatoen. (2004). Metode Pengajaran di Taman Kanak-Kanak. Jakarta: PT Rineka Cipta.
- [23] Sudjana, S. 2010. Metode dan Teknik Pembelajaran Partisipatif. Bandung: Falah Production
- [24] Cheng, E. C. K. 2011. "The Role of Self-regulated Learning in Enhancing Learning Performance". *The International Journal of Research and Review*. Vol. 6 (1), pp: 1-16.
- [25] Monks, F. J., Knoers, A. M. P., Haditono, S. R. 2004. Psikologi Perkembangan: Pengantar Dalam Berbagai Bagiannya. Yogyakarta : Gadjah Mada University Press.
- [26] Boekaerts, M. (1999). Self-regulated learning: where we are today. *International Journal of Educational Research*, 31, 445-457. doi:10.1016/S0883-0355(99)00014-2.
- [27] Paris, S. G., & Paris, A. H. (2001). Classroom applications of research on self-regulated learning. *Educational Psychologist*, 36, 89-101. doi:10.1207/S15326985EP3602_4.
- [28] Zimmerman, B. J. (1989). A social cognitive view of self-regulated academic learning. *Journal of Educational Psychology*, 81, 329-339. doi:10.1037/0022-0663.81.3.329
- [29] Minnaert, A., & Janssen, P. J. (1999). The additive effect of regulatory activities on top of intelligence in relation to academic performance in higher education. *Learning and Instruction*, 9, 77-91. DOI:10.1016/S0959-4752(98)00019-X.
- [30] Winne, P. H. (1995). Self-regulation is ubiquitous, but its forms vary with knowledge. *Educational Psychologist*, 30, 217-221. doi:10.1207/s15326985ep3004_8.
- [31] Asiyah, N. 2013. Pola Asuh Demokratis, Kepercayaan Diri dan Kemandirian Mahasiswa Baru. *Persona, Jurnal Psikologi Indonesia Mei 2013*, Vol. 2, No. 2, hal 108 - 121

- [32] Goleman, Daniel. 2000. *Working With Emotional Intelligence*. Jakarta: PT Gramedia Pustaka Utama.
- [33] Ariantini, K. N., Sujana, E., Herawati, N.T. 2014. Pengaruh kecerdasan emosional dan Minat Membaca terhadap Tingkat Pemahaman AKuntansi dengan Kepercayaan Diri sebagai Variabel Moderasi. *e-Journal S1 Ak Universitas Pendidikan Ganesha*, Vol 2, No.1.
- [34] Stein, S.J. & Book, H.E. 2002. *Ledakan EQ: 15 Prinsip Dasar Kecerdasan Emosional Meraih sukses (Terjemahan)*. Bandung: Kaifa.
- [35] Kaddoura, M. A. (2010). New graduate nurses' perceptions of the effects of clinical simulation on their critical thinking, learning, and confidence. *The Journal of Continuing Education in Nursing*, 41(11), 506-516.
- [36] Liliweri, A. 2017. *Komunikasi antar personal*. Prenada Media, Jakarta.
- [37] Avtgis, T. A. (2001). Affective learning, teacher clarity, and student motivation as a function of attributional confidence. *Communication Research Reports*, 18(4), 345-353.
- [38] Dolmans, D. H. J. M., & Schmidt, H. G. (2000). What directs self-directed learning in a problem-based curriculum? In D. Evensen, & C. E. Hmelo (Eds.), *Problem-based learning: A research perspective on learning interactions* (pp. 251–262). Mahwah: Erlbaum.
- [39] Juniati, E. (2017). Peningkatan hasil belajar Matematika melalui metode drill dan diskusi kelompok pada siswa. *Jurnal Pendidikan dan Kebudayaan*, Vol 7 No 3.
- [40] Fushino, K. (2010). Causal relationships between communication confidence, beliefs about group work, and willingness to communicate in foreign language group work. *TESOL Quarterly*, 44(4), 700-724.
- [41] Desmita. 2007. *Psikologi Perkembangan Remaja*. Bandung: Rosda Karya.
- [42] Sugilar. (2000). Kesiapan belajar mandiri peserta pendidikan jarak jauh. *Jurnal Pendidikan Terbuka dan Jarak Jauh*, 1(2), hal. 13-23
- [43] Nursa'ban, M. (2013). Peningkatan Sikap Tanggung Jawab dan Kemandirian Belajar Mahasiswa melalui Metode Tutorial di Jurusan Pendidikan Geografi. *Cakrawala Pendidikan*, Th. XXXII, No.3.
- [44] Kassim, H., & Ali, Z. (2007). The Use of ICT in the Implementation of Student-Centered Learning (SCL). *Internet Journal of e-Language Learning & Teaching*, 4(1), 15-31.
- [45] Horne, J. C., Lincoln, N. B., & Logan, P. A. (2017). Measurement of confidence: the development and psychometric evaluation of a stroke-specific, measure of confidence. *Clinical Rehabilitation*, 31(11), 1529-1537.
- [46] Long, H. B. (1989). *Self-Directed Learning: Emerging Theory & Practice*. Oklahoma Research Center for Continuing Professional and Higher Education, McCarter Hall, University of Oklahoma, Norman, OK 73037.
- [47] Simanullang, B. (2017). Mengembangkan Kemandirian Belajar, Kepercayaan Diri, Dan Pengaruhnya Terhadap Kemampuan Pemecahan Masalah Matematika. *Widya Eksakta*, 1 (1): 62-69.
- [48] Haryono, A. (2001). Belajar mandiri konsep dan penerapannya dalam sistem pendidikan dan pelatihan terbuka/jarak jauh. *Jurnal Pendidikan Terbuka dan Jarak Jauh*, 2(2), hal. 137-161.