

THE RELATIONSHIP OF ZOOM FATIGUE AND ACHIEVEMENT MOTIVATION IN NURSING STUDENTS

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ABSTRAK

Introduction: The impact of the Covid-19 Pandemic has disrupted various aspects, one of which is the education aspect which requires learning to be carried out remotely via video conference causing students to experience zoom tiredness. Besides that, as long as student study from the house via video conferencing, the potential happening decline in skills academic as a result competent students not achieved with good consequences from achievements motivation distracted students. **Objective:** The purpose of study he knew the connection Among Fatigue Zoom Levels with Achievement Motivation in student Faculty Nursing Universitas Padjadjaran in online learning during the Covid-19 Pandemic. **Method:** Population study student active S1 Faculty of Nursing Universitas Padjadjaran. Type study quantitative with design descriptive correlation. Sampling technique will use disproportionate stratified random sampling (n=271). The Instrument of study Zoom Exhaustion & Fatigue Scales for measure zoom tired and achievements motivation Scales for measure achievements motivation. **Results:** The results of data analysis were obtained sig. $0.000 < 0.05$ with score correlation coefficient worth positive 0.289 which means strength relationship enough. Motivation owns a great influence on achieving learning. Although in implementation needed management good activity for avoiding possibility happening zoom tired. **Conclusion:** There is an adequate and positive relationship between zoom fatigue levels with achievement motivation in student Faculty of Nursing Universitas Padjadjaran during online learning in the pandemic period Covid-19.

Keywords: achievements motivation, nursing, students, zoom fatigue

Introduction

Covid-19 or Coronavirus Disease 2019 is a disease new and yet once identified in humans. WHO or World Health Organization first implemented the Covid -19 emergency status on January 30, 2020. There are many impacts consequences of the Covid-19 pandemic, one of them impact on the Education sector. The Covid-19 pandemic caused sector education to experience a decline in quality studies (Cénat et al., 2021).

Decline quality of education happen a consequences of the existence of learning media new to use system learning distance far with using video conferencing media, so the crowd that ensued consequence learning could be avoided and system education permanent walk although its application no maximum (Cénat et al., 2021). Application method learning distance far no without reason, p this conducted as shape anticipation government for prevent the happening spread of Covid-19 and mandatory followed by all institution education start from school base until lectures (Patel et al., 2021).

Learning distance far or online is a method of new learning, however, all parties demand could adapt method learning method alternative used during a pandemic so that the system learning permanently walk as should (Salari et al., 2020). The conveniences offered with method online learning turns out comparable with the impact negative can appear consequence from activity such as online learning, that implementation of learning with the use online method can cause fatigue because too long to do an activity learning using videos. media conference. Fatigue ensues this normally is called zoom fatigue (Solomou & Constantinidou, 2020). Zoom fatigue is feeling tired, and restless that happened a consequence too long to do video conferencing activities as online learning media. Video conferencing alone is something activity carried out by several people in different places that are put together with the use of something application, so could audio and visual communication between one another (Al Naamani et al., 2021).

Students as one students who have many activities compared to student in school naturally undergo activity longer study. One institution implementing education method online learning during the Covid-19 pandemic is Faculty of Nursing Universitas Padjadjaran. Students in undergoes lectures at the Faculty of Nursing Universitas Padjadjaran naturally own more activity many if compared with other faculties incidentally no faculty health. Activity ordinary lectures held at the Faculty of Nursing Universitas Padjadjaran cover activity lectures, practicum wet, practice dry, discussion groups, and so on.

Zoom fatigue is feeling tired, and restless that happened a consequence from too ever carry out activity video conferencing as an online learning medium. own video conferencing is something activities carried out by several people in different places united use something application, so can carry out communication Among one each other audio and visually (Hall, 2020). Besides the risky tall experience of zoom fatigue, online learning also plays a role bother motivation achievement someone. Motivation achievement is motivation possessed by someone who can be made as encouragement in reaching purpose for could achievement and success (McWhirter, 2020). Besides, that's motivation achievement influenced by two factor. Factor first is factor intrinsic drive somebody for have a desire to know the high, increase interested, and is ready to face challenges ti reaching the desired goal achieved (Pustikasari & Fitriyanti, 2021). Whereas factor second is factor extrinsic can form appreciation of achievements that have been achieved and punish consequence negligence in operating activities carried out (Toney et al., 2021).

Some a characteristic individuals who has motivation achievement high, such as; own ambition to Keep going achieve, like competitive rivalry, have desire to be the best, must face existing obstacles, and challenges in a manner realistic and like response success or failure obtained (Riedl, 2022). As for characteristic features someone who has motivation achievement low namely; not enough ambitious to reach achievement, less like competition to reach something, less interested in things new, and inclined no care with other people's responses to results that have been achieved (Bullock et al., 2022).

Based on the exposure background back above, the required study further can explain connection level zoom fatigue with motivation achievement in undergraduate students of the Faculty of Nursing Universitas Padjadjaran active in online learning during the Covid-19 period pandemic.

Method

Design this study is quantitative with design correlation as well as use method analytic with design cross-sectional conducted on students bachelor Faculty Nursing Universitas Padjadjaran. The sampling technique used in the research disproportionate and stratifies random sampling. The sample

in this study was 271 nursing students who took part in online learning. Instruments research use two instruments that is Zoom Exhaustion & Fatigue Scale to measuring zoom fatigue (Fauville et al., 2021) and Achievement Motivation Scale to measuring achievement motivation. Data collection was carried out in the month of March 2022 with the use of google forms online, and respondents could fill in from the place stay each. After the data is collected, it will conduct data analysis with using the Spearman test to know the results hypothesis correlation and gain results end research.

Results

Research results obtained sample as many as 271 respondents. As for data tabulation based on demographic data covers type gender, age, ethnicity nation, generation, origin campus, and duration staring at the laptop every day from the data provided by the respondents could be seen in the table following.

Table 1.

Distribution Demographic Data Frequency (n=271)		
Demographic Variables	F	%
Gender		
Man	35	12.8
Woman	236	87.2
Ethnic group		
Ambon	1	0.3
Batak	6	2.2
Betawi	5	1.9
Java	38	14.0
Manado	1	0.4
Malay	2	0.7
Minang	3	1.0
Nias	2	0.8
Sumatra	23	8.4
Sunda	190	70.2
Class		
2018	83	30.7
2019	57	21
2020	62	22.7
2021	69	25.6
From Campus		
Jatinangor	198	73.1
Pangandaran	73	26.9
Duration stare Laptop/ Computer Screen		
1-2 Hours	17	6.3
3-4 Hours	28	10.3
5-7 Hours	92	33.9
> 7 Hours	134	49.4

Based on Table 1, this study show that the characteristics respondents based on type sex are majority from a woman as many as 236 respondents (87.2%). Next based on age respondents based on the range from the department of health that all respondents including the teenager end with the majority being at the age of 20 as many as 115 respondents (42.4%). Whereas for an ethnic groups

many nations are dominated by tribes Sunda with a total of 190 respondents (70.2%). Based on force students, most respondents fill in originate from a class of 2018 as many as 83 respondents (30.7%). Then based on campus origin most respondents originate from campus Jatinangor with total of 198 respondents (73.1%). Final for duration Staring at the laptop the longest per day was >7 hours which was experienced by 134 respondents (49.4%).

Table 2.
Distribution Fatigue Zoom Level Frequency (n=271)

Category	F	(%)
Risk Low	61	22.5
Risk Currently	190	70.1
High Risk	20	7.4

Based on Table 2, this study show that almost 70% of students experience level fatigue level risk medium. The lowest proportion (less than 7.5%) is a student with a risk experience zoom fatigue levels high.

Table 3.
Distribution Frequency Level of Achievement Motivation (n=271)

Category	F	(%)
Risk Low	50	18.5
Risk Currently	191	70.5
High Risk	30	11.1

Based on Table 3, this study show that part big student's own achievement motivation with category medium. Nearly 20% of college students risk low for increased achievement motivation. Proportion students with risk tall has achievement motivation very small (less than 2%).

Table 4.
Spearman test of Zoom Fatigue Test Results with achievements

Significance Value	Coefficient Correlation
0.000	0.289

Based on Table 4, this study shows that the significance value Among zoom fatigue with achievement motivation is 0.000. So, if the score significance <0.05 relationship between zoom fatigue with achievement motivation correlated. The strength level correlation is positive 0.289. So score of relationship between zoom fatigue with achievement motivation relationship with level score coefficient correlation enough.

Discussion

Study this to determine the zoom fatigue level experienced by students Faculty of Nursing Universitas Padjadjaran that can be seen in Table 2. obtained results that respondent who is student Faculty of Nursing Universitas Padjadjaran tend to experience sufficient zoom fatigue currently lead to high. Height category zoom fatigue experienced by students no regardless of the factors that influence it. It covers physical disturbance starting from pain in the part body certain until fatigue whole body, as well including mental disorders from feeling gloomy, feeling want to myself, feel afraid to do something activity, avoid situation social, until with change emotions are not stable.

One influencing factor is a distracted students when doing online lectures as well as activity inclined lectures longer than student school, causing students more potentially for influence from condition physical and psychological (Oducado et al., 2022; Yosep, Suryani, et al., 2023). Too many receive and process information for a long duration can influence burden cognitive individuals.

Student Faculty of Nursing can say the own busy schedule in one day there is some activity such as lectures, tutorials, and practice no denied that's what it will be resulted in student becomes exhausted. Besides its also quality motivation from every individual will be affected because of excessive use of video conferencing so which will reduce achievement motivation from individual such (Wolters & Brady, 2021). zoom tired can happen consequence of the complex dynamics when carrying out purposeful video conferencing adds a cognitive method to interact with others (Wiederhold, 2020).

There is four cause happening zoom tired (Darr et al., 2021). One of them is contact eyes that are too long with the computer causing happening problem physiological, limited mobility (Oducado et al., 2022), anxiety mirror consequence from do video conferencing is too long ahead camera that can increase influence bad until with happening depression (Cho & Im, 2024), and increasing burden cognitive (Zamora et al., 2020). When something individual own burden is high cognitive so will influence to condition physically and psychologically causing the onset of zoom fatigue, lowering productivity as well as could bother mental health. As for characteristics someone's own burden is high cognitive that is no having a sense of enthusiasm, high laziness, aches, and it happens to change behavior (Smith, 2019). Based on results from an analysis that has been conducted that achievement motivation owned by the respondent who is student Faculty of Nursing Universitas Padjadjaran lead from low to medium. The low achievement motivation possessed by students of course will impact their success (Flinton et al., 2018; Yosep, Mardhiyah, et al., 2023).

Motivation is one factor in reach achievement study of course very urgent existence, because if something individual own motivation high achievers so will add spirit in do something the tasks given and the results obtained will be max, then when faced with obstacles or obstacle in workmanship, someone who has high motivation in himself, of course, permanent attempted finish it with focused on solving from existing obstacles supported with discipline possessed, so obstacles that arise made as interesting challenge for resolved (McArthur et al., 2017). Whereas for individual who has low achievement motivation features appear among them is often postponing settlement work, do fraud in the profession together friends, plagiarism, results study not consistent with skills, discipline time and discipline bad study, no active in the process of the course, often skip class, need a long time for a complete study, even experience separated school or drop-outs (Wimmer et al., 2018). Motivation gives impetus to act in a manner aware with desired direction good in a manner physical or mental, so activity Becomes very part urgent from motivation (Putarek & Pavlin-Bernardić, 2020). Motivation could influence what someone study, comment on somebody about to what's on learned, and when we want to learn (Hikmat et al., 2022).

Based on results testing correlation with the use of the spearman rank that can be seen in Table 4. above, obtained that research conducted on respondents who are _ student Faculty of Nursing University Padjadjaran with a total of 271 students get score significance of 0.000 means score significance <0.05 then H1 is accepted and H0 is rejected it means there is a connection between zoom fatigue level and achievement motivation in students Faculty of Nursing Universitas Padjadjaran in online learning during the Covid-19 Pandemic.

For strong relationship could be seen from the score correlation coefficient worth positive 0.289 which means the strength relationship enough. Zoom fatigue level as variable free said capable influence variable bound which is achievement motivation although in strength the bond enough (Krou et al., 2021). Weak the obtained relationship possibility caused by change method initial learning all shape activity held online now slowly conducted in a manner stare advance limited, so students already

slowly can carry out activity lectures without having to sit and stare screen computer or laptop for free excessive (Debbağ & Yıldız, 2021).

Those results on corresponding with the statement research say that motivation for achievements, incl learning, have an impact significant on performance. Learning will faster and better if they own purpose for achieved. Motivated people tall tend complete professions without postpone, learning hard, or attempted reach their purpose (McBreen & Savage, 2021). This study show that motivation owns a great influence on achievement learn. Although this in implementation needed management good activity to avoiding the possibility of happening zoom tired. Because when something individual experiences zooms tired so will be influential to productivity and mental health (El-Adl & Alkharusi, 2020; Kulakow, 2020). Then to maintain achievement motivation permanent in good condition of course condition, the environment should to support don't until the existing achievement motivation good distracted by conditions less environment supports and causes a decline in owned achievement motivation.

Conclusions

Based on the results analysis existing correlation conducted with the use technique Spearman's rank correlation obtained results that score significance $0.000 < 0.05$. As for strength relationship could be seen from the score coefficient correlation worth positive 0.289 so could be concluded that there is an adequate relationship and nature the positive Among levels of zoom tired with achievement motivation in students Faculty of Nursing Universitas Padjadjaran in online learning during the Covid-19 Pandemic. Recommendations for further research require an analysis of the factors that influence achievement motivation in nursing students during online learning.

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References

- Al Naamani, Z., Gormley, K., Noble, H., Santin, O., & Al Maqbali, M. (2021). Fatigue, anxiety, depression and sleep quality in patients undergoing haemodialysis. *BMC Nephrology*, 22(1), 157. <https://doi.org/10.1186/s12882-021-02349-3>
- Bullock, A. N., Colvin, A. D., & Jackson, M. S. (2022). "All Zoomed Out": Strategies for Addressing Zoom Fatigue in the Age of COVID-19 BT - Innovations in Learning and Technology for the Workplace and Higher Education (D. Guralnick, M. E. Auer, & A. Poce (eds.); pp. 61–68). Springer International Publishing.
- Cénat, J. M., Blais-Rochette, C., Kokou-Kpolou, C. K., Noorishad, P.-. G., Mukunzi, J. N., & McIntee, S.-. E. (2021). Prevalence of symptoms of depression, anxiety, insomnia, posttraumatic stress disorder, and psychological distress among populations affected by the COVID-19 pandemic: A systematic review and meta-analysis. *Psychiatry Res*, 295. <https://doi.org/10.1016/j.psychres.2020.113599>
- Cho, S. Y., & Im, T. (2024). The structural relationships among online class related factors, zoom fatigue, learning engagement, perceived achievement, and class satisfaction in university online classes. *Education and Information Technologies*. <https://doi.org/10.1007/s10639-024-12658-3>
- Darr, A., Regan, J., & Berrocal, Y. (2021). Effect of Video Conferencing on Student Academic Performance: Evidence from Preclinical Summative Assessment Scores. *Medical Science Educator*, 31(6), 1747–1750. <https://doi.org/10.1007/s40670-021-01378-9>
- Debbağ, M., & Yıldız, S. (2021). Effect of the flipped classroom model on academic achievement and motivation in teacher education. *Education and Information Technologies*, 26(3), 3057–3076. <https://doi.org/10.1007/s10639-020-10395-x>
- El-Adl, A., & Alkharusi, H. (2020). Relationships between self-regulated learning strategies, learning motivation and mathematics achievement. *Cypriot Journal of Educational Sciences*, 15.

- <https://doi.org/10.18844/cjes.v15i1.4461>
- Fauville, G., Luo, M., Queiroz, A. C. M., Bailenson, J. N., & Hancock, J. (2021). Zoom exhaustion & fatigue scale. *Computers in Human Behavior Reports*, 4. <https://doi.org/10.1016/j.chbr.2021.100119>
- Flinton, D., Cherry, P., Thorne, R., Mannion, L., O'Sullivan, C., & Khine, R. (2018). Compassion satisfaction and fatigue: An investigation into levels being reported by radiotherapy students. *Journal of Radiotherapy in Practice*, 17. <https://doi.org/10.1017/S1460396918000274>
- Hall, C. L. (2020). From zoom fatigue to belly breaths: Teaching away from the screen. *Teaching Theology & Religion*, 23. <https://doi.org/10.1111/teth.12565>
- Hikmat, R., Hermayanti, Y., Praptiwi, A., & Putri, A. M. (2022). Self-regulated Learning Among Undergraduate College Students with Parental Divorce. *Jendela Nursing Journal*, 6(2), 78–84. <https://doi.org/10.31983/jnj.v6i2.9164>
- Krou, M. R., Fong, C. J., & Hoff, M. A. (2021). Achievement Motivation and Academic Dishonesty: A Meta-Analytic Investigation. *Educational Psychology Review*, 33(2), 427–458. <https://doi.org/10.1007/s10648-020-09557-7>
- Kulakow, S. (2020). Academic self-concept and achievement motivation among adolescent students in different learning environments: Does competence-support matter? *Learning and Motivation*, 70, 101632. <https://doi.org/https://doi.org/10.1016/j.lmot.2020.101632>
- McArthur, M. L., Andrews, J. R., Brand, C., & Hazel, S. J. (2017). The prevalence of compassion fatigue among veterinary students in Australia and the associated psychological factors. *Journal of Veterinary Medical Education*, 4. <https://doi.org/10.3138/jvme.0116-016R3>
- McBreen, M., & Savage, R. (2021). The Impact of Motivational Reading Instruction on the Reading Achievement and Motivation of Students: a Systematic Review and Meta-Analysis. *Educational Psychology Review*, 33(3), 1125–1163. <https://doi.org/10.1007/s10648-020-09584-4>
- McWhirter, J. L. (2020). Are you zoomed out? Dealing with zoom fatigue in the virtual classroom. *Choral J.*, 61.
- Oducado, R. M. F., Dequilla, M. A. C. V., & Villaruz, J. F. (2022). Factors predicting videoconferencing fatigue among higher education faculty. *Education and Information Technologies*, 27(7), 9713–9724. <https://doi.org/10.1007/s10639-022-11017-4>
- Patel, U., Malik, P., Mehta, D., Rajput, P., Shrivastava, M., Naveed, M., Urhoghide, E., Martin, M., Somi, S., Jaiswal, R., Patel, A., Israni, A., Singh, J., Kichloo, A., Shah, S., & Lunagariya, A. (2021). Outcomes of COVID-19 Complications and their Possibilities as Potential Triggers of Stroke. *Journal of Stroke and Cerebrovascular Diseases : The Official Journal of National Stroke Association*, 30(7), 105805. <https://doi.org/10.1016/j.jstrokecerebrovasdis.2021.105805>
- Pustikasari, A., & Fitriyanti, L. (2021). Stress dan Zoom Fatigue pada Mahasiswa Selama Pembelajaran Daring di Masa Pandemi Covid-19. *Jurnal Ilmiah Kesehatan*, 13(1), 25–37. <https://doi.org/10.37012/jik.v13i1.467>
- Putarek, V., & Pavlin-Bernardić, N. (2020). The role of self-efficacy for self-regulated learning, achievement goals, and engagement in academic cheating. *European Journal of Psychology of Education*, 35(3), 647–671. <https://doi.org/10.1007/s10212-019-00443-7>
- Riedl, R. (2022). On the stress potential of videoconferencing: definition and root causes of Zoom fatigue. *Electronic Markets*, 32(1), 153–177. <https://doi.org/10.1007/s12525-021-00501-3>
- Salari, N., Hosseinian-Far, A., Jalali, R., Vaisi-Raygani, A., Rasoulpoor, S., & Mohammadi, M. (2020). Prevalence of stress, anxiety, depression among the general population during the COVID-19 pandemic: a systematic review and meta-analysis. *Glob Health*, 16. <https://doi.org/10.1186/s12992-020-00589-w>
- Smith, A. P. (2019). *Student Workload, Wellbeing and Academic Attainment BT - Human Mental Workload: Models and Applications* (L. Longo & M. C. Leva (eds.); pp. 35–47). Springer

International Publishing.

- Solomou, I., & Constantinidou, F. (2020). Prevalence and predictors of anxiety and depression symptoms during the COVID-19 pandemic and compliance with precautionary measures: Age and sex matter. *International Journal of Environmental Research and Public Health*, *17*. <https://doi.org/10.3390/ijerph17144924>
- Toney, S., Light, J., & Urbaczewski, A. (2021). Fighting Zoom fatigue: Keeping the zombies at Bay. *Communications of the Association for Information Systems*, *48*. <https://doi.org/10.17705/1CAIS.04806>
- Wiederhold, B. K. (2020). Connecting through technology during the coronavirus disease 2019 pandemic: Avoiding “Zoom Fatigue.” *Cyberpsychology, Behaviour, and Social Networking*, *23*. <https://doi.org/10.1089/cyber.2020.29188.bkw>
- Wimmer, S., Lackner, H. K., Papousek, I., & Paechter, M. (2018). Goal orientations and activation of approach versus avoidance motivation while awaiting an achievement situation in the laboratory. *Frontiers in Psychology*, *9*. <https://doi.org/10.3389/fpsyg.2018.01552>
- Wolters, C. A., & Brady, A. C. (2021). College Students’ Time Management: a Self-Regulated Learning Perspective. *Educational Psychology Review*, *33*(4), 1319–1351. <https://doi.org/10.1007/s10648-020-09519-z>
- Yosep, I., Mardiyah, A., & Sriati, A. (2023). Mindfulness Intervention for Improving Psychological Wellbeing Among Students During COVID-19 Pandemic: A Scoping Review. *Journal of Multidisciplinary Healthcare*, *16*, 1425–1437. <https://doi.org/10.2147/JMDH.S411849>
- Yosep, I., Suryani, S., Mediani, H. S., Mardiyah, A., & Maulana, I. (2023). Digital Therapy: Alleviating Anxiety and Depression in Adolescent Students During COVID-19 Online Learning - A Scoping Review. *Journal of Multidisciplinary Healthcare*, *16*, 1705–1719. <https://doi.org/10.2147/JMDH.S416424>
- Zamora, O., Christianson, J. S., & Khvorost, T. (2020). Personalized Learning Against Technological fatigue. *15th International Online Conference DisCo 2020*, *130*.