Jurnal Sinektik
Volume 6, Number 2 Tahun 2023, pp. 128-135
P-ISSN: 2620-6560 E-ISSN : 2620-746X
Open Access: http://ejurnal.unisri.ac.id/index.php/sin (link artikel)

OPEN ACCESS
DOI: https://doi.org/10.33061/js.v6i2.8219

THE DANGEROUS EFFECT OF ONLINE GAME FOR STUDENTS OF UNIVERSITY

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INFO ARTIKEL
Sejarah artikel:
Diterima : Agustus 2023
Direvisi : Oktober 2023
Disetujui : November 2023
Terbit : Desember 2023

Kata Kunci:
game online, pendidikan, GPA, kecanduan game

Keywords:
online game, education, GPA, Students, Addicted game

ABSTRACT

This study aims to describe in general to the public about the potential dangers contained in playing online games. Playing games is very fun but with the same level of addiction as drugs. The method used in this research is descriptive method. This descriptive study aims to create an accurate, factual, and systematic descriptive description of the nature and facts and the relationship between the phenomena studied using observational data collection techniques, questionnaires, and document studies. The number of respondents are fifty students as active PUBG online game players at the Information Technology Study Program, FKIP, UNISRI. The conclusion of this study is that the number of students whose value index is affected by playing this online game is 82%. Meanwhile, students whose score index was not affected by playing this online game were 17%.

ABSTRAK

Penelitian ini secara umum bertujuan untuk mendeskripsikan kepada masyarakat tentang potensi bahaya yang terkandung dalam bermain game online. Bermain game memang sangat menyenangkan tetapi dengan tingkat kecanduan yang sama dengan narkoba.
Metode yang digunakan dalam penelitian ini adalah metode deskriptif. Tujuannya untuk membuat deskripsi yang akurat, factual, dan sistematis tentang sifat dan fakta serta hubungan antara fenomena yang diteliti dengan menggunakan teknik pengumpulan data observasional, angket, dan studi dokumen. Jumlah responden adalah lima puluh mahasiswa sebagai pemain aktif game online di program studi Teknologi FKIP Unisri. Kesimpulan dari penelitian ini adalah jumlah siswa yang indeks nilainya dipengaruhi oleh bermain game online ini adalah 82%. Sementara itu, siswa yang indeks skornya tidak terpengaruh dengan bermain game online ini adalah 17%.

INTRODUCTION

An undergraduate student is obliged to study and do the assignments on campus given by his lecturer. On average, they have to complete as many as 140 credits achieved over a period of four years divided into eight semesters. Where every semester, students average 20 credits that must be achieved and completed.

During the span of approximately four years, sometimes boredom arises in studying and doing assignments on campus. And must be filled with other activities that are entertaining or entertaining. Entertaining activities into the realm of hobbies. There can be various shapes and types. There are sports, arts, caring for both plants and animals, and what is currently trending is playing online games using smartphones, laptops, or PCs (Kowert & Oldmeadow, 2015; Tammy Lin et al., 2019).

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Online games are games that are played over the Internet or other available computer networks. Online games are ubiquitous on modern gaming platforms, including PC, console, and mobile devices, and span many genres, including first-person shooters, strategy games, and massively multiplayer online role-playing games (MMORPGs). The design of online game ranges from simple text-based environments to incorporating complex graphics and virtual worlds. The presence of an online component in a game can range from a minor feature, such as an online leaderboard, to becoming part of the core gameplay, such as playing live against other players (Spada & Caselli, 2017).

Many online games create their own online communities, while other games, especially social games, integrate real-life communities of existing players. Online gaming culture has sometimes faced criticism for an environment that might encourage cyber bullying, violence, and xenophobia (Huang et al., 2019). Some also worry about gaming addiction or social stigma. Online games have attracted players of all ages, nationalities and occupations. Online game content can also be studied in the scientific field, especially the interaction of gamers in virtual society with respect to behavior and social phenomena of daily life (Gong et al., 2019; Kowert & Oldmeadow, 2015).

The most popular online game is PUBG, an online game that is very popular among teenagers and even adults. Player Unknown's Battlegrounds (PUBG) is an online multiplayer battle royale game created in 2017. This game was created and developed by PUBG Corporation, a subsidiary of the South Korean video game Bluehole. This game is inspired by the movie '2000 Battle of Japan'. Microsoft Windows through the beta access program was the one who started this game, to be precise in early March 2017, then started its full release on December 20, 2017.

This game often makes the players forget the time. They are even willing to voluntarily sacrifice their sleep. The players of this game even forget their hunger and thirst. It's as if they won't stop until they finish the game (Balakrishnan & Griffiths, 2018; Gong et al., 2019; Hyun et al., 2015) (Spada & Caselli, 2017).

The same thing happen to the students of the PTI FKIP Unisri Surakarta Study Program from all classes. Starting from first semesters seventh, especially the boys, do really like this game. They also forget about time. Not only their sleep time, hunger and thirst, but they also often forget their main task as students, namely going to college and doing their assignments and learning to seek and increase knowledge related to science in the courses they take. This is where a new problem arises. In the past, playing games was an option for other activities to relieve fatigue from the burden of their daily routine as students, instead they took up their main task as students (Drachen et al., 2016; Kusuma et al., 2021; Lassila, 2022; Liao et al., 2022).

If the activity of playing this game becomes more intense than the implementation of their college activities. Perhaps their learning achievement listed in their Grade Point Average could go down from before. Of course this could jeopardize their future survival. Given that if their value decreases, the cumulative value index will also decrease. As a result, it can set them back from the schedule they should graduate. The delay in the schedule also resulted in increased costs

ranging from school fees, lodging, meals, and other necessities, also affecting their learning motivation. And this last one is the most significant. How can it not be that when one of his classmates has graduated and passed, then someone becomes withdrawn just because he is addicted to playing online games which is only for a moment, is that not demotivating? (Afrough et al., 2014; Falout et al., 2009; Liao et al., 2022; Song & Kim, 2017; Yadav & BaniAta, 2013a, 2013b)

It should be noted that the achievement index, commonly abbreviated as GPA, is a measure of achievement in the academic/educational field. Despite the name "index", GPA isn't really an index in the truest sense, but rather a kind of weighted average (Coyle et al., 2015; Fajnzylber et al., 2019; Heady et al., 2018). The use of GPA in Indonesia has differences for primary-secondary level and higher education level. This system replaces the average system that was used until the 1875 Curriculum. Since the 1984 Curriculum was in effect, GPA was used to evaluate the achievement of students or students.

At the higher education level, the GPA is calculated as the average value norm obtained by a student in the course after being weighted with "Credit Points". Value norms ranged from 4 (A, best) to 0 (E, failed). Credit Score is determined by the amount (usually 1 to 4 Semester Credit Units / SKS) based on the weight of each course. This weight is determined based on the importance of these courses in shaping graduate competencies. GPA is calculated for each semester (Hassan & Al-Razgan, 2016). Thus, the Grade Point Average is the calculation of GPA by combining all courses that have been taken up to a certain semester. Semester Achievement Index is the calculation of GPA with all courses that have been taken for each particular semester (Vahidnia et al., 2021). Furthermore, from this phenomenon, allegations emerged related to the tendency of the students of the PTI FKIP Unisri Surakarta Study Program in playing PUBG towards teaching and learning activities on campus. Researchers find out how long it takes to study and do their coursework before and after the students get to know this PUBG Game. And also researchers will also examine whether they are already in the level of addiction in playing this game. The third and last, whether the activity of playing this game really consumes their energy, time, and mind so that their GPA value drops. Based on the background that has been described, the research formulation is as follows: Does the PUBG game affect the GPA students of PTI FKIP Unisri? How much influence do students playing PUBG have on their GPA?

RESEARCH METHODS

This study aims to determine the relationship between the influence of the PUBG online game played by PTI FKIP Unisri Surakarta students on the student's cumulative score index. Based on these objectives, the method used in this study is a descriptive method (Lestringant et al., 2019; Martin et al., 2022; O'Sullivan, 2020; Thuillier et al., 2015). Therefore, this study intends to find out the relationship between PTI FKIP Unisri Surakarta students who are passionate about playing the PUBG 2018-2019 online game on their academic scores or achievement index. The

information found by the researcher will be described as it is, according to the data found in the field.

Data are all facts in the form of numbers that can be categorized to compile information. The data will be obtained in the form of respondents' answers to a written questionnaire that asks the attitude of PTI FKIP UNISRI Surakarta students towards the answer choices in the form of "yes" or "no" statements.

The data sources from this study were all students of PTI FKIP UNISRI in the 2018/2019 academic year with details contained in the table below:

Table 1. PTI FKIP UNISRI Students Academic Year 2018/2019

NO	Students year 18/19	Sum
1	1st Semester	20
2	3rd Semester	10
3	5th Semester	10
4	7th Semester	10
	TOTAL	50

The population in this study were all 50 students of PTI FKIP UNISRI who actively played the online game PUBG in the 2018/2019 school year. In this study, the sample will be taken as a whole.

Data collection is the process of procuring data for research purposes. The questionnaire was used in the context of collecting data in the form of a list of questions with only two answer choices, namely "yes" or "no".

RESULT AND DISCUSSION

As the researcher said above, the instrument development that the researcher used a questionnaire technique by making a number of questions in the questionnaire. The question consists of eleven items where each question is accompanied by only two answer choices, namely a. Yes and b. no.

The questions in the questionnaire varied, however, the core of the question regarding the state of the student's GPA was related to activities playing the PUBG online game intensely which even tended to be excessive. Respondents were asked to determine the answer choices honestly, to the problems asked.

The data is processed and analyzed after the data is obtained through a questionnaire, with the following steps, the calculation of the data using the tall technique. In this step, The data is calculated one by one when it is still in the form of an answer sheet from the respondent. Each answer choice is marked with a straight line (perpendicular line or marker) and then entered into the table. This is done every time you find one answer then make one straight according to the group. The second step is calculation of the frequency of answers for each answer choice. At the end of this step, all the straights are added up and the frequency of each answer choice will be found, after all the answers are checked and marked with a straight line. The third step is data processing by looking for the percentage of answers. Researchers get raw data from the questionnaire until the second step above is completed. So that the raw data can be interpreted, it must be processed further using a formula to find the percentage of each answer that appears.

The formula used is as follows:

$$X = \frac{F}{N}.100\%$$

Information:
X: Percentage
F: Frequency of answers appearing
N: Total number of respondents

The number of questions asked to the 50 students was 11 items. The eleven questions asked students' attitudes, responses, and information about online games and their consequences for lecture results. So, the answers to the eleven questions, when combined into one, the question becomes, how are your results or GPA scores in lectures since becoming an active game player with massive game duration. And the answers to these questions are as shown in the following table.

Table 2. Student feedback on online games

NO	Responses	Frequency	Percentage
1	Ya	456	82%
2	No	94	17%
	TOTAL	550	100%

The figures in the table above are obtained by:
1. The frequency of YES answers is the sum of all YES answers to the eleven questions asked.
2. The frequency of NO answers is the sum of all NO answers to the eleven questions asked.
3. The percentage with the total number of respondents is multiplied by eleven questions, which is 550.

CONCLUSION

1. Students who are active players in the PUBG online game at the Information Technology Study Program, FKIP Unisri for the 2018/2019 academic year, whose score index is affected by playing this online game is 82%. So that the number of students who play games and their value index is affected is 50 x 82% = 45 students.

   Meanwhile, students who are active players in the online game PUBG in the Information Technology Study Program, FKIP Unisri for the 2018/2019 academic year, whose score index is not affected because they play this online game is 17%. So that the number of students who play games and their value index is affected is 50 x 17% = 5 students.

   With the percentage of the calculation results above. Researchers can state that the number of students whose value index is affected by playing this online game is 82%. Meanwhile, students whose score index was not affected by playing this online game were 17%.
2. Considered to the percentage of the calculation results above. The researcher can state that the number of active PUBG online game students in the Information Technology Study Program FKIP Unisri for the 2018/2019 academic year whose

value index is affected by playing this online game is 82%. Meanwhile, students who are active players in the online game PUBG in the Information Technology Study Program of FKIP Unisri for the 2018/2019 academic year whose score index is not affected because they play this online game is 17%.

REFERENCES

Afrough, T., Rahimi, A., & Zarafshan, M. (2014). Foreign Language Learning Demotivation: A Construct Validation Study. *Procedia - Social and Behavioral Sciences*, *136*, 49–53. https://doi.org/10.1016/J.SBSPRO.2014.05.286

Anh, P. Q. (2021). Media governance: managing online games seen from the perspective of the state in Vietnam. *Heliyon*, *7*(1). https://doi.org/10.1016/J.HELIYON.2021.E06045

Aristoteles, Rini, P. S., & Poddar, S. (2020). The correlation between frequency of playing online games and teen communication on nursing students in STIKes Muhammadiyah Palembang. *Enfermeria Clinica*, *30*, 1–5. https://doi.org/10.1016/J.ENFCLI.2019.11.014

Balakrishnan, J., & Griffiths, M. D. (2018). Loyalty towards online games, gaming addiction, and purchase intention towards online mobile in-game features. *Computers in Human Behavior*, *87*, 238–246. https://doi.org/10.1016/J.CHB.2018.06.002

Coyle, T. R., Snyder, A. C., Richmond, M. C., & Little, M. (2015). SAT non-g residuals predict course specific GPAs: Support for investment theory. *Intelligence*, *51*, 57–66. https://doi.org/10.1016/J.INTELL.2015.05.003

Dahabiyeh, L., Najjar, M. S., & Agrawal, D. (2021). When ignorance is bliss: The role of curiosity in online games adoption. *Entertainment Computing*, *37*. https://doi.org/10.1016/J.ENTCOM.2020.100398

Ding, J., Shan, R., Chenmeng, M., Tu, M., Yu, Q., Kong, F., & Zhao, Q. (2021). Are online games a blessing or evil? The moderating role of self-worth. *Thinking Skills and Creativity*, *41*. https://doi.org/10.1016/J.TSC.2021.100915

Drachen, A., Lundquist, E. T., Kung, Y., Rao, P. S., Klabjan, D., Sifa, R., & Runge, J. (2016). *Rapid Prediction of Player Retention in Free-to-Play Mobile Games*. http://arxiv.org/abs/1607.03202

Entwistle, G. J. M., Blaszczynski, A., & Gainsbury, S. M. (2020). Are video games intrinsically addictive? An international online survey. *Computers in Human Behavior*, *112*. https://doi.org/10.1016/J.CHB.2020.106464

Esteves, J., Valogianni, K., & Greenhill, A. (2021). Online social games: The effect of social comparison elements on continuance behaviour. *Information and Management*, *58*(4). https://doi.org/10.1016/J.IM.2021.103452

Fajnzylber, E., Lara, B., & León, T. (2019). Increased learning or GPA inflation? Evidence from GPA-based university admission in Chile. *Economics of Education Review*, *72*, 147–165. https://doi.org/10.1016/J.ECONEDUREV.2019.05.009

Falout, J., Elwood, J., & Hood, M. (2009). Demotivation: Affective states and learning outcomes. *System*, *37*(3), 403–417. https://doi.org/10.1016/J.SYSTEM.2009.03.004

Garena Free Fire Gameplay, Modes, Esports: 2022 Updated. (n.d.). Retrieved June 18, 2022, from https://trendblog.net/garena-free-fire/

Gong, X., Zhang, K. Z. K., Cheung, C. M. K., Chen, C., & Lee, M. K. O. (2019). Alone or together? Exploring the role of desire for online group gaming in players'

social game addiction. *Information & Management*, *56*(6), 103139. https://doi.org/10.1016/J.IM.2019.01.001

Hassan, S. M., & Al-Razgan, M. S. (2016). Pre-University Exams Effect on Students GPA: A Case Study in IT Department. *Procedia Computer Science*, *82*, 127–131. https://doi.org/10.1016/J.PROCS.2016.04.018

Heady, C., Morrison, M. M., & Vossler, J. (2018). Ecological Study of Graduation Rates and GPA in a Library Credit Course. *The Journal of Academic Librarianship*, *44*(5), 642–649. https://doi.org/10.1016/J.ACALIB.2018.07.010

Huang, C. L., Yang, S. C., & Hsieh, L. S. (2019). The cyberbullying behavior of Taiwanese adolescents in an online gaming environment. *Children and Youth Services Review*, *106*, 104461. https://doi.org/10.1016/J.CHILDYOUTH.2019.104461

Hyun, G. J., Han, D. H., Lee, Y. S., Kang, K. D., Yoo, S. K., Chung, U. S., & Renshaw, P. F. (2015). Risk factors associated with online game addiction: A hierarchical model. *Computers in Human Behavior*, *48*, 706–713. https://doi.org/10.1016/J.CHB.2015.02.008

Kocak Alan, A., Tumer Kabadayi, E., & Cavdar Aksoy, N. (2022). Replaying online games for flow experience and outcome expectations: An exploratory study for the moderating role of external locus of control based on Turkish gamers' evaluations. *Entertainment Computing*, *40*. https://doi.org/10.1016/J.ENTCOM.2021.100460

Kowert, R., & Oldmeadow, J. A. (2015). Playing for social comfort: Online video game play as a social accommodator for the insecurely attached. *Computers in Human Behavior*, *53*, 556–566. https://doi.org/10.1016/J.CHB.2014.05.004

Kusuma, G. P., Putera Suryapranata, L. K., Wigati, E. K., & Utomo, Y. (2021). Enhancing Historical Learning Using Role-Playing Game on Mobile Platform. *Procedia Computer Science*, *179*, 886–893. https://doi.org/10.1016/J.PROCS.2021.01.078

Lassila, E. M. (2022). "Free"-to-play game: Governing the everyday life of digital popular culture. *Critical Perspectives on Accounting*, 102434. https://doi.org/10.1016/J.CPA.2022.102434

Lestringant, P., Delarue, J., & Heymann, H. (2019). 2010–2015: How have conventional descriptive analysis methods really been used? A systematic review of publications. *Food Quality and Preference*, *71*, 1–7. https://doi.org/10.1016/J.FOODQUAL.2018.05.011

Liao, G. Y., Pham, T. T. L., Huang, H. Y., Cheng, T. C. E., & Teng, C. I. (2022). Real-world demotivation as a predictor of continued video game playing: A study on escapism, anxiety and lack of intrinsic motivation. *Electronic Commerce Research and Applications*, *53*, 101147. https://doi.org/10.1016/J.ELERAP.2022.101147

Martin, D. M., Jacobs, A. D., McLean, C., Canick, M. R., & Boomer, K. (2022). Comparing normative and descriptive methods for multi-criteria decision analysis: A case study evaluating wetland restoration opportunities in the Chesapeake Bay watershed, USA. *Environmental Science and Policy*, *132*, 142–152. https://doi.org/10.1016/J.ENVSCI.2022.02.022

O'Sullivan, M. G. (2020). Descriptive methods for reformulation. *Salt, Fat and Sugar Reduction*, 147–165. https://doi.org/10.1016/B978-0-12-819741-7.00006-7

Sharma, S., Singh, G., & Sharma, R. (2021). For it is in giving that we receive: Investigating gamers' gifting behaviour in online games. *International Journal of*

Information Management, *60*. https://doi.org/10.1016/J.IJINFOMGT.2021.102363

Shin, S. J., Jeong, D., & Park, E. (2021). Effects of conflicts on outcomes: The case of multiplayer online games. *Entertainment Computing*, *38*. https://doi.org/10.1016/J.ENTCOM.2021.100407

Song, B., & Kim, T. Y. (2017). The dynamics of demotivation and remotivation among Korean high school EFL students. *System*, *65*, 90–103. https://doi.org/10.1016/J.SYSTEM.2016.12.010

Spada, M. M., & Caselli, G. (2017). The Metacognitions about Online Gaming Scale: Development and psychometric properties. *Addictive Behaviors*, *64*, 281–286. https://doi.org/10.1016/J.ADDBEH.2015.07.007

Tammy Lin, J. H., Bowman, N., Lin, S. F., & Chen, Y. S. (2019). Setting the digital stage: Defining game streaming as an entertainment experience. *Entertainment Computing*, *31*, 100309. https://doi.org/10.1016/J.ENTCOM.2019.100309

Tan, W. K., & Chen, L. M. (2022). That's not my fault: Excuses given by players exhibiting in-game intra-team aggressive behavior in online games. *Computers in Human Behavior*, *127*. https://doi.org/10.1016/J.CHB.2021.107045

Thuillier, B., Valentin, D., Marchal, R., & Dacremont, C. (2015). Pivot© profile: A new descriptive method based on free description. *Food Quality and Preference*, *42*, 66–77. https://doi.org/10.1016/J.FOODQUAL.2015.01.012

Vahidnia, F., Ghonsooly, B., & Shahriari, H. (2021). Development and validation of students' attitudes towards teacher's pet phenomenon scale in the higher education setting: Differences by levels of study and Grade-Point-Average. *Studies in Educational Evaluation*, *70*. https://doi.org/10.1016/J.STUEDUC.2021.101000

Yadav, M., & BaniAta, H. (2013a). Factorizing Demotivation, Finding Motivation: A Constructive Approach to Quality Enhancement. *Procedia - Social and Behavioral Sciences*, *70*, 120–130. https://doi.org/https://doi.org/10.1016/j.sbspro.2013.01.047

Yadav, M., & BaniAta, H. (2013b). Factorizing Demotivation, Finding Motivation: A Constructive Approach to Quality Enhancement. *Procedia - Social and Behavioral Sciences*, *70*, 120–130. https://doi.org/10.1016/J.SBSPRO.2013.01.047