# Jurnal Ekonomi Teknologi & Bisnis (JETBIS)

Volume 2, Number 6 June 2023 p-ISSN 2964-903X; e-ISSN 2962-9330



# THE EFFECT OF ONLINE GAME ADDICTION ON SLEEP QUALITY IN ADOLESCENTS CLASS VIII MTS MA'ARIF KALIWIRO, WONOSOBO

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#### **KEYWORDS: ABSTRACT**

Addiction

Online Games, Sleep Quality, Sleep quality is very beneficial for the human body, but sometimes it is hampered by bad activities such as playing online games that will make you addicted. Addiction to online games will make health disturbed. Teenagers who are addicted to online games have decreased physical strength due to a lack of physical movement and lack of sleep. This study aims to determine the effect of online game addiction on sleep quality in class VIII students of MTS Ma'arif Kaliwiro, Wonosobo. This type of research is a quantitative observational method using a cross-sectional approach and using a total sampling of 38 students of class VIII MTS Ma'arif Kaliwiro, Wonosobo. The results of the Spearman Rank test obtained a p-value of 0.000, which means p-value <0.05, which means that online game addiction influences sleep quality in class VIII adolescents at MTS Ma'arif Kaliwiro, Wonosobo with a correlation coefficient of 0.638. which means the strength of the relationship is strong. It is hoped that the results of this study can increase respondents' understanding of the importance of managing time to play online games so that sleep quality can be maintained properly.

### INTRODUCTION

Sleep is the basic fulfillment of human beings with a physical state of carrying out recovery to keep the physical in shape. Sleep and rest are as important as activities, eating, dressing, and other necessities (Putra et al., 2020). Quality sleep can maintain a healthy body and a quality life. Lack of sleep needs will affect performance, including clear thinking, causing someone to become angry, and one's anxiety will increase. It can cause problems with interpersonal relationships, especially in children and adolescents (Lombogia et al., 2018).

The thing that can affect the quality of sleep for teenagers is a lifestyle. Nowadays, electronic games are growing, and most teenagers use their rest time at night to play online games (Astuti, 2018). Sleep quality is very beneficial for the human body, but it is sometimes constrained by poor activities such as online gaming, which can be addictive. Addiction to online games will make health impaired. Teenagers who are addicted to online games make their physical strength decrease due to a lack of physical movement and lack of sleep hours (Novrialdy, 2019).

Based on previous research on the Relationship between Online Game Addiction with Sleep Quality in Children at SMP Teratai Putih Global Bekasi, the results were obtained: a significant relationship between online game addiction and sleep quality in children at SMP Teratai Putih Global Bekasi. The highest sleep quality was in the poor sleep quality category, with 27 students (52.9%) (Widiyani et al., 2021).

Based on a preliminary study conducted at MTS Ma'arif Kaliwiro, Wonosobo, in class VIII teenagers with 80 students, 38 students who used online games were obtained. The preliminary study was conducted on Friday, November 12, 2021, interviewing six students. It was found that four students said they usually slept at 24:00 and above and often woke up. The other two students said they usually go to bed at 10:00 pm and do not have a sleep disorder. Most students say they play online games almost every day, between the time of day and night. They play online games for hours and sleep until late at night.

#### RESEARCH METHODS

This study uses a type of quantitative observational research in a cross-sectional way. The population consists of 38 students who use class VIII online games. The sample of this study was all students of class VIII MTS Ma'arif Kaliwiro, Wonosobo, as many as 38 students using total sampling. The data taken is from class VIII students actively playing online games. The instruments used are the Internet Addiction Test (IAT) and sleep quality questionnaires. Data analysis using the Spearman-rank test.

#### RESULTS AND DISCUSSION

Table 1 Respondent Gender Frequency Distribution

Respondent Gender Frequency Distribution				
	(	Gender		
	n	Percentage(%)		
Man	22	57,9		
Woman	16	42,1		
Total	38	100		

Based on table 1, male students produced the most compared to female students, with 22 students (57.9%), while female students only had 16 respondents (42.1%).

Table 2
Distribution of Respondents' Age Frequency

Di	JULIDUU	on of Respondents fige Frequency	
Age           n         Percentage(%)           Early adolescence         9         23,7           Associate teenagers         29         26,3           Total         38         100			
	n	Percentage(%)	
Early adolescence	9	23,7	
Associate teenagers	29	26,3	
Total	38	100	

Based on table 2, there were more intermediate adolescent results compared to early adolescents, namely 29 respondents (26.3%), while early adolescents totaled nine respondents (23.7%).

Table 3
Distribution of Online Game Addiction Frequency in Class VIII MTS Teenagers Ma'arif Kaliwiro,
Wanasaba

	VV UHUSUDU	
Online Game Addiction	n	Percentage(%)
Light	9	23,7
Keep	19	50
Heavy	10	26,3
Total	38	100

Table 3 shows 19 respondents with moderate online game addiction (50.0%) were generated, and ten (26.3%) were heavily addicted to online games.

Table 4
Distribution of Sleep Quality Frequencies in Adolescents Class VIII MTS Ma'arif Kaliwiro,

	VV OHOSODO	
Sleep Quality	n	Percentage(%)
Good	3	7,9
Light	1	2,6
Keep	25	65,8
-		

Bad	9	23,7
Total	38	100

From table 4, it was found that some respondents had a light sleep quality of 1 response (2.6%) and moderate sleep quality of 25 respondents (65.8%).

Table 5
Data Normality Test

	Shapiro-Wilk							
Online Ga	me Addiction	Statistic	Sig.	Ket.				
Sleep	Light	0,711	0,002	Tidak normal				
Quality	Keep	0,445	0,000	Tidak normal				
	Heavy	0,640	0,000	Tidak normal				

Based on table 5, the data normality test value of <0.05 is obtained, which means the data is abnormally distributed.

Table 6
The Effect of Online Game Addiction on Sleep Quality in Adolescents class VIII MTS Ma'arif Kaliwiro, Wonosobo

			Kualita	ıs Tidur					=	
Online Game Addiction	(	Good	Light		Keep Bad		Bad	Total		
	n	%	n	%	n	%	n	%	n	%
Light	3	7,9	1	2,6	5	13,2	0	0	9	23,7
Keep	0	0	0	0	16	42,1	3	7,9	19	50
Heavy	0	0	0	0	4	10,5	6	15,8	10	26,3
Total	3	7,9	1	2,6	25	65,8	9	23,7	38	100

(Nilai r: 0,638, *p-value*: 0,000)

Based on the study results obtained using the spearman-rank test, a correlation coefficient of 0.638 was obtained with a significant level (p-value = 0.000) < 0.05. The results showed a significant influence between online game addiction on sleep quality in adolescents of class VIII MTS Ma'arif Kaliwiro, Wonosobo, with the strength of strong relationships and the direction of positive relationships.

# **Overview of Respondent Characteristics**

#### Gender

This research proves that men play more online games than women. The results of other studies conducted by (Pratama et al., 2022) mengatakan hampir semua pemain *game online* berjenis kelamin laki-laki berjumlah (53,3%). According to the researchers' assumption that men play online games because men prefer games that make them feel challenged, such as playing online games.

Allan Reiss, a researcher from Stanford University School of Medicine, discovered the existence of inequality between male brains when using games. The brain responds to passion, and a strong desire makes it more active when playing games than women. This causes men to often play games compared to women. Men feel challenged against the game to be completed(Shodik, 2020).

## Age

The results showed that middle adolescents were found the most compared to early adolescents. Supported by research conducted by (Lestari, 2018) shows almost all 14-year-old students were 17 students (48.6%). Researchers assume that most 14-year-old students in middle teens play online games, where teenagers will think broadly and will maximize their emotions playing online games.

Young age can interfere with adolescent thinking intelligence can decrease, resulting in the body being less than perfect and risk causing obesity (Ibtisamah, 2021).

a. An overview of online game addiction in teenagers class VIII MTS Ma'arif Kaliwiro, Wonosobo The study results found that online game addiction is in the moderate category. Research (Chiesa, 2021) revealed that an addiction to online games amounted to (72.5%).

The researcher's assumption when teenagers become addicted to online games is because they want to find pleasure and eliminate boredom in them as their online play games. Moreover, now there are technological advances, and many teenagers already have gadgets to access online gameplay easily. Many parents lack control and pay attention to their children when using gadgets so that the teenager is freer to play online games for hours, which causes the teenager to become addicted to games.

Addiction to online games results in declining health, such as eye pain. Looking at a computer screen or cellphone for too long when using games certainly causes eye fatigue, minus in the eyes, and damage to the optic nerve (Ibtisamah, 2021).

b. An overview of sleep quality in adolescents class VIII MTS Ma'arif Kaliwiro, Wonosobo This study showed that the sleep quality was in the moderate category of 25 respondents. The research conducted by (Chiesa, 2021) said it has moderate sleep quality (65.8%).

According to the researchers' assumption that the quality of sleep in adolescents of class VIII MTS Ma'arif Kaliwiro, Wonosobo is in the moderate category. Where teenagers prefer to sleep late to complete the missions of online gameplay, getting enough sleep is very beneficial for the health of the body. When the body is healthy, teenagers will be excited about daily activities. On the other hand, if teenagers have less sleep, they will quickly feel angry, offended, and lazy to do anything.

Getting enough high-quality sleep will make the body feel fresh so that it can make you feel tired and make someone able to do their activities (Chiesa, 2021). Quality sleep is needed by everyone in order to maintain health during activities. Sleep quality is a state of sleep to get comfort and fitness when awakened. Quality sleep will determine whether the person becomes stressed (Sanger & Sepang, 2021).

c. The effect of online game addiction on sleep quality in adolescents of class VIII MTS Ma'arif Kaliwiro, Wonosobo

The study's results obtained a correlation coefficient of 0.638 with a significant level (p-value = 0.000) <0.05. The results showed a significant influence between online game addiction and sleep quality in adolescents of class VIII MTS Ma'arif Kaliwiro, Wonosobo. Research from (Putra et al., 2020) regarding the relationship between online game addiction and sleep quality of SMA Negeri 1 Sragen students supported this research, namely obtained a p-value = 0.000, meaning that there is a relationship between Online Game addiction and the quality of sleep of SMA Negeri 1 Sragen students with the value of strong relationship strength and positive relationship direction.

Researchers assume that when teenagers enjoy playing online games, they will have the desire to get a high score in the game. Teenagers have not been able to control themselves in playing online games. As a result, the time that should be used for sleeping or resting is instead used for playing online games. As a result, teenagers have poor sleep quality due to addiction to online games. Another cause of addiction to online games is when teenagers neglect their school work so that their academic results will decrease due to playing online games.

Online games make teenagers addicted to their sleeping hours until they are used only to playing online games so that the quality of sleep will be disturbed. If sleep quality is poor, the impact is depression and stress (Matur et al., 2021).

# **CONCLUSION**

The most widely obtained description of respondents' characteristics based on gender was 22

respondents (57.9%), and the characteristics of respondents based on age obtained results mostly in adolescents, totaling 29 respondents (26.3%). Independent variables of online game addiction in adolescents of class VIII MTS Ma'arif Kaliwiro, Wonosobo are mostly moderate online game addiction, as much as (50%). The dependent variable of sleep quality in adolescents of class VIII MTS Ma'arif Kaliwiro, Wonosobo majority of moderate sleep quality as much as (65.8%). There is an influence of online game addiction on sleep quality in adolescents of class VIII MTS Ma'arif Kaliwiro, Wonosobo. Based on the study results, it is hoped that respondents can reduce the habit of playing online games so that sleep quality is maintained properly.

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