



The Resilience of Athletes in Facing of The Covid-19 Pandemic: A Descriptive Study of Young Elite Athletes in Central Java

Martia Yosi Nurfa Indah¹, Hermahayu^{1*}, Rayinda Faizah¹

¹*Faculty of Psychology and Humanities, Universitas Muhammadiyah Magelang, Indonesia*
Corresponding author's email: hermahayu@ummgl.ac.id

ABSTRACT

The pandemic of Covid-19 has caused limited social access, including activities in the world of sports. This difficult condition is classified as a new adaptation that must be faced by all people and sectors as well as the world of sports that involves athletes. So that the endurance of athletes is tested in the face of a pandemic situation related to all sports activities. The purpose of this study was to determine the resilience of athletes in the face of the COVID-19 pandemic in a descriptive manner, especially athletes aged 14-18 years in Central Java. The method used in this research is quantitatively descriptive. The study included 40 male and female athletes, 26 male and 14 female athletes. The results of the research revealed that there was no significant difference between the resilience levels of male athletes and female athletes. The resilience of young athletes in Central Java is at a moderate level. It is necessary to increase resilience by adapting to unpleasant situations and having good stress coping related to disappointment due to canceled sports competitions.

Keywords: Resilience; Athletes; Athletes Resilience; Pandemic; Covid-19

1. INTRODUCTION

In 2019, the Chinese state precisely in Wuhan, the corona virus was detected attacking the immune system of the local community. Corona virus or Covid-19 causes many victims to fall until activities in the region experience paralysis. Not stopping in China alone, the Covid-19 virus is so quickly transmitted that it spreads to every country in the world, including Indonesia. Coronavirus was confirmed to enter Indonesia in early 2020 by President Joko Widodo. The steps taken by the government to break the chain of spread of the deadly virus by enacting PSBB (large-scale social restrictions) policies that apply in every region of Indonesia [1]. Until now about 1 year since the enactment of PSBB, the Indonesian government has updated the policy, namely PPKM (Restriction of Community Activities). Through this policy, many access activities are constrained so that it is forced to vacuum in an undetermined time span. One of the activities that are the majority of vacuum during the enactment of PPKM and PSBB is sports activities that directly involve the fate of athletes.

The closure of sports facilities, limited training activities, and training activities in athletes are also

enable are some of the impacts caused by PSBB policies to prevent the chain of transmission of Covid-19. The closure is not without a reason because the risk of transmission of the virus is very high if sharing facilities and sports equipment [2]. As a result, the Covid-19 pandemic also caused negative perceptions for most athletes [3]. The impact also resulted in all sports competitions being postponed and even some had to be cancelled. The situation causes the athlete's training pattern to be disrupted. Athletes cannot do training as before because of limited infrastructure facilities and training equipment, and there are no coaches who monitor directly. On the other hand, athletes have demands for achievement targets that are met. The postponed or diverted championships cause disappointment for athletes especially if the event is the last event for them. This happens a lot nowadays, especially in teenage athletes. Considering that from 2020 to July 2021 all youth and student sports events were cancelled. This is certainly very influential on the psychological aspects of athletes, especially adolescent athletes.

Based on research related to the motivation of athletes who are carried out by Divina et.,al. The existence of a

new adaptation that is about coaching carried out online in this pandemic period causes athletes to feel saturated and confused, thus affecting the level of motivation of athletes' achievements [4]. So that the higher the saturation felt then the lower the motivation of achievement. As for the research conducted by [5] "Athletes experience a sense of loss as a recurring part of the difficulties faced by athletes during the Covid-19 lockdown policy. This feeling of loss of normal routine is associated with the loss of their usual sports activities, namely, involvement in sports, exercise, and competition [5].

Characteristics of psychological development of teenage athletes have their own characteristics. According to the theory of adolescent development written by Laura A. King in his book he wrote that psychologically, there is a development of the adolescent brain in the amygdala related to emotions and the prefrontal cortex related to reasoning and decision making. This causes adolescent emotions to be very strong and difficult to control. Still in the same literature, the characteristics of adolescent cognitive development are at a more selfish stage of egocentric thinking. So, with the emotions of a strong teenage athlete and thoughts that are still egocentric can affect his mental resilience in the face of pandemic conditions that limit all sports activities.

While according to the theory of psychosocial development of adolescents listed in the [7]. According to Erikson humans experience eight stages of psychic crisis that stand out every period during his life. One of these psychosocial stages is in teenagers. In adolescents aged 12-18 years they will experience the identity vs. Confusion (identity vs confusion). At this age, teenagers often experience upheaval. This stage has an essential role in the development of feelings to form self-identity that will affect behaviour and future life development. During this time, adolescent athletes will explore independence and develop feelings for themselves, the motivation and reinforcement they get through self-exploration will give rise to feelings of self, independence and strong control. Conversely, those who do not have certainty of their self-confidence and desires will certainly experience insecurity and confusion in themselves and their future. Thus, the failures, disappointments, and pressures experienced by teenage athletes due to the elimination of sports and training competitions have an impact on their self-concept regarding who they really are and how they are. In addition, the mental toughness of the teenage athletes is also at stake. Therefore, athletes need toughness in the face of these unexpected and unpleasant situations. The ability to survive in these difficult conditions is referred to as resilience.

From all exposure above mental resilience or resilience has an important role in facing adaptation in the era of the Covid-19 pandemic. Keye & Pidgeon said

that resilience is the power that individuals have in enforcing psychological equilibrium when under pressure or stress [8]. According to Rojas (2015) Resilience is the ability to face challenges [9]. Increasing resilience is considered important because it can provide experience for humans to face the challenges and difficulties of life, especially in the current Covid-19 period [10]. Further resilience can be seen when individuals face difficult experiences, but he understands how to overcome them [9]. While according to Southwick et al. (2017) resilience in general defines the meaning of a healthy adaptation function when individuals experience difficult conditions or threatening situations [11]. The positive impact of resilience is the management of negative impacts of stress, increased adaptability, and the development of effective coping skills in changes and difficulties [10]. Resilience is related to the mental resilience of athletes to stay afloat even with situations that limit their career and training. There are three factors that affect resilience, the first is personality, the second is biological factors, and the third is environmental factors [12]. Thus, athletes who have high resilience then he will be more adaptable to unusual training conditions, and have the ability to cope with stress related to the cancellation or diverting of sports competitions. It was reinforced that mental toughness is associated with the realization of positive adaptations to stress [13]. But if the athlete has low resilience, then he cannot adapt to difficult conditions and does not have a good stress coping.

Based on the explanation above, it is felt necessary to know the level of resilience in adolescent athletes in the face of unexpected situations such as during the Covid-19 pandemic. So, this study aims to find out the resilience of athletes in dealing with the covid 19 pandemic descriptively, especially athletes aged 14-18 years in Central Java. The practical benefits expected from the results of this study are that it can contribute to the development of clinical psychology, and can play a role in the development of athlete resilience during the Covid-19 pandemic, especially in the world of sports.

2. METHOD

The method used in this research is quantitatively descriptive. The participating subjects were young elite athletes in Central Java, namely athletes who had participated in the championship at the national level with an age range of 14 years to 18 years. The study included 40 male and female athletes, 26 male and 14 female athletes. The 40 athletes consist of 9 sports that include athletics 4 people, 7 people bicycle racing, 9 people handball, 1 person race, 5 people handball, hockey 3 people, pencak silat 4 people, 2-person degree tennis, and 5-person court tennis.

Research instruments using the resilience scale of Smith, Dalen, Wiggins, Tooley, Christopher, & Bernard

(2008). This scale assesses resilience, personal characteristics, coping styles, social relationships, and outcomes related to individual health [14]. This scale consists of 6 items. This scale uses a type of Likert scale consisting of six-point answer options, consisting of 1 (strongly disagree) to 6 (strongly agree).

The research began by applying for permission from the local sports department and committee. Furthermore, data collection is done online. The instrument that has been prepared is arranged in google form format and sent to the subject through the WhatsApp application. Data collection is carried out from February to April 2021. The collected data was further analysed descriptively using the help of IBM SPSS Statistics 24.

3. RESULT AND DISCUSSION

Before testing each aspect of resilience in athletes and the comparison between the resilience of male and

Table 1 Normality Test Results with Significant Level $\alpha = 0.05$

		Unstandardized Residual
N		6
Normal Parameters ^{a,b}	Mean	0.0000000
	Std. Deviation	0.27540186
Most Extreme Differences	Absolute	0.238
	Positive	0.152
	Negative	-0.238
Test Statistic		0.238
Asymp. Sig. (2-tailed)		0.200 ^{c,d}

a. Test distribution is Normal.

b. Calculated from data.

Table 2 Homogeneity Test Results with Significant $\alpha = 0.05$

Test of Homogeneity of Variances			
Levene Statistic	df1	df2	Sig.
0.838	1	38	0.366

Table 2 above shows the results of the data homogeneity test of each item has a greater value than $\alpha 0.05$. This indicates the value of 0.838. Thus, the data is homogeneous, so the data passes the next test to find out whether there are differences or not related to the resilience of male and female athletes.

Table 3 Independent Sample T Test Results

Group	N	Mean	Std. Deviation	Sig. (2-tailed)
Male athlete	26	3.88	.598	.441
Female athlete	14	3.71	.764	.477

Looking at the results of the independent sample t test above it can be known that from two groups of male and female athletes sampled 26 people for the male and 14 women athletes. Each of the mean scores obtained for male athletes was 3.88 and the female mean was 3.71. As for the standard deviation obtained a score of 0.598 in

female athletes in the Covid-19 outbreak period, here are the results of pre-requisites of the normality and homogeneity test data.

3.1. Normality Test

The results of the normality test aim to provide information that whether the data has a normal or abnormal distribution listed in Table 1. Judging from the table above, it is known that the results of the normality test using Kolmogorov-Smirnov Z showed significant results, namely the value of Asymp. Sig. (2-tailed) of 0.2 is greater than $\alpha 0.05$.

3.2. Homogeneity Test

The results of the homogeneity test aim to find out whether or not the research data is homogeneous can be seen in table 2.

3.3. Independent Sample T Test

The independent sample t test aims to uncover an average difference in two groups of unpaired samples. The results of the independent sample t test in this study are listed in Table 3.

male athletes and 0.764 in female athletes. Sig's score. (2-tailed) which determines whether or not there is a difference in the two sample groups, 0.441 for male athletes and 0.477 for female athletes. As the basis for independent sample t test results score more than $\alpha 0.05$, it can be known that there is no significant difference on

average between male and female athletes. So it can be said that between male athletes and female athletes have an average equality of resilience rate.

3.4. Descriptive Test of Each Aspect

This descriptive test aims to determine the level of resilience of athletes in terms of aspects, namely resilience, personal characteristics, coping styles, social relationships, and results related to individual health. Here are the results of descriptive tests of whole aspect presented in the table 4.

In the average accumulation table of each aspect of resilience tested above, it can be known that for the endurance aspect tested to 40 adolescent athletes in Central Java obtained an average of 4.8 with a standard deviation of 1.07 which means the level of resilience of

athletes affected by the endurance aspect is at a fairly high level. The second aspect obtained an average result of 3.4 which means that the personal characteristics that affect the athlete's resilient are at a fairly low level. Furthermore, the third aspect is that coping style is obtained an average of 4.3 which means that the resilience of athletes is influenced by a high enough coping style. Then the fourth aspect or low enough social relationships affected the athlete's resilience rate by an average of 3.1. In the fifth aspect or the last aspect, the average results of item 3.7 and 3.4 respectively, which means that the individual's health is low enough to affect the resilience of athletes. As well as on the overall accumulation of the 6 aspects tested obtained an average result of 3.8 from a maximum value of 6.0. So, it can be concluded that the resilience of adolescent athletes in Central Java in the face of the conditions of the Covid-19 pandemic is in the moderate category.

Table 4 Average Descriptive Test Results of Each Aspect

	N	Min.	Max.	Mean	Std. Deviation
Resistance	40	3.00	6.00	4.8500	1.07537
Personal Characteristics	40	1.00	6.00	3.4250	1.44803
Coping Style	40	1.00	6.00	4.3500	1.29199
Social Relationships	40	1.00	6.00	3.1250	1.55559
Individual Health 1	40	1.00	6.00	3.7250	1.19802
Individual Health 2	40	1.00	6.00	3.4750	1.26060
Valid N (listwise)	40			3.8250	

3.5. Discussion

3.5.1. Distribution of Resilience of Each Aspect

Based on the Figure 1, it can be seen that each distribution of aspects that make up the resilience or mental resilience of adolescent athletes in Central Java on average each aspect contributes at a moderate level. This is evidenced by the graph item 1 which represents the aspect of resilience is in the high category, item 2 or aspects of personal characteristics are in the moderate

category, item 3 or aspects of coping style are in the high category, item 4 or aspects of social relations are in the moderate category, as well as in the aspect of individual health represented by item 5 and 6 are also in the moderate category. The purpose of this study is to find out the resilience of athletes in dealing with the covid 19 pandemic descriptively, especially athletes aged 14-18 years in Central Java. The series of results presented above has answered the purpose of research on athlete resilience during the Covid-19 pandemic comprehensively.

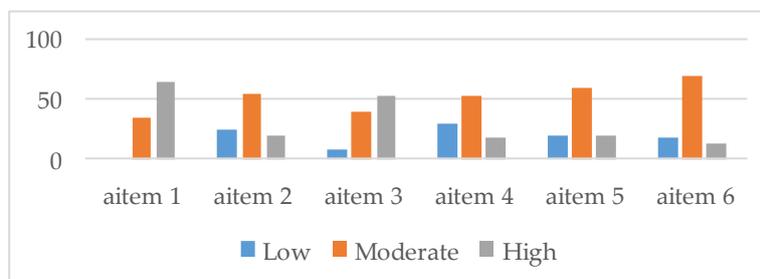


Figure 1 Distribution of Each Aspect

Research conducted by Fletcher & Sarkar (2012) with 12 Olympic winners, the results showed a link between psychological resilience and optimal sports performance [15]. In research the resilience of athletes in the pandemic period in Central Java is also the same. Therefore, optimal sports performance must be balanced with high

resilience. However, the level of resilience of athletes in Central Java, especially those aged 14-18 years in the face of the Covid-19 pandemic situation is in the moderate category. So as to improve optimal performance, high resilience is needed to various situations including the Covid-19 pandemic.

According to Hosseini and Besharat in [16] Resilience is one of the main factors for athletes in achieving the highest achievements, especially for their sports careers, and resilience also correlates significantly with athlete achievement. The results of research conducted by Hermahayu. Hermahayu also revealed similarities that resilience has a positive correlation with mental toughness or resilience [17]. But this pandemic period has not made it possible to exercise optimally by athletes in the face of sports competitions in the future. Thus, to prepare for maximum performance of the sport further is to focus on increasing the resilience of athletes. It is undeniable that the resilience rate of teenage athletes in Central Java is at a moderate level. There are several steps to increase resilience so that the performance of athletes remains excellent. In the article written by [18] Advice given from officials and experts during the Covid 19 pandemic to maintain health by exercising at home using methods that are safe, simple, and easy to do. As well as suitable exercises to avoid contact with many people. Examples of exercises in question include strengthening exercises for balance and control and stretching exercises [18].

In addition to staying adapting to new conditions or utilizing anything that can be done such as exercising at home, there are other research results that can be applied to increase resilience. According to research conducted by Sulastri and Jufri it was found that in this pandemic period individual resilience can be affected by self-efficacy and individual perceptions related to the threat of Covid-19 [19]. Confidence in solving problems or self-efficacy positively affects resilience [19]. The research is in line with Bandura's statement in [20] Self-efficacy is an individual's belief in his or her ability to perform tasks, solve problems, and overcome stressors in their life, greatly affects resilience. So, it can be stated that the higher the self-efficacy of athletes, the higher the ability of resilience of athletes in the face of difficult situations such as the Covid-19 pandemic. Therefore, in the future it is expected that adolescent athletes in Central Java can further increase their resilience through several ways both by still utilizing whatever is available for training activities, as well as by practicing self-efficacy and adaptation to change.

4. CONCLUSION

From all the exposure obtained above, it can be drawn the outline that between male and female athletes have equality at the level of resilience that has been measured. It can be seen from the independent test table until the test obtained a score that exceeds the coefficient of α . In addition, it is known that the resilience of athletes in Central Java with an age range of 14-18 years is at a moderate level. Thus, in the future it is expected that athletes are better able to adapt to difficult situations

including limited activities caused by the Covid-19 pandemic.

REFERENCES

- [1] D. Tuwu, "Kebijakan Pemerintah Dalam Penanganan Pandemi Covid-19," *Journal Publicuho*, vol. 3, no. 2, p. 267, 2020, doi: 10.35817/jpu.v3i2.12535.
- [2] F. Kedokteran, U. Udayana, and J. P. B. Sudirman, "Prosiding Seminar Nasional Pendidikan Kepelatihan Olahraga Menjaga kesehatan psikologi atlet selama masa pandemi covid-19 Maintaining the psychological health of the athlete during the covid- 19 pandemic Yuliana PENDAHULUAN Kondisi pandemi covid-19 telah ," vol. 1, no. 1, pp. 77–85, 2021.
- [3] T. Sugihartono, Y. E. Nopiyanto, S. Raibowo, and B. R. Ilahi, "The relationship between athletes' perceptions of Covid-19 and communication with the psychological skills," *Journal Sport Area*, vol. 6, no. 2, pp. 183–192, 2021, doi: 10.25299/sportarea.2021.vol6(2).6337.
- [4] A. Divina, M. S. Tondok, A. Radini, and F. Julia, "Pendampingan Komunitas Atlet Bola Voli Melalui Pelatihan Virtual Goal Setting untuk Meningkatkan Motivasi Berprestasi pada Masa Pandemi Covid-19," *Jurnal Pengabdian kepada Masyarakat*, vol. 04, no. 02, pp. 476–492, 2020.
- [5] S. Gupta and P. J. Mccarthy, "Sporting Resilience During COVID-19: What Is the Nature of This Adversity and How Are Competitive Elite Athletes Adapting?," *Frontiers in Psychology*, vol. 12, no. March, pp. 1–14, 2021, doi: 10.3389/fpsyg.2021.611261.
- [6] L. A. King, *Psikologi Umum-Sebuah Pandangan Apresiatif*, 3rd ed. Jakarta: Salemba Humanika, 2016.
- [7] O. Yahyu Herliany Yusuf, L. Ode Abdul Salam Al Amin, and S. YPIQ Baubau, "Teori Perkembangan Sosial/Psikososial Erik Homberger Erikson," *Idrus Qaimuddin*, vol. 2, no. 1, pp. 58–64, 2020.
- [8] M. D. Keye and A. M. Pidgeon, "An Investigation of the Relationship between Resilience , Mindfulness , and Academic Self-Efficacy," *Open Journal of Social Sciences*, vol. 1, no. 6, pp. 1–4, 2013, doi: <http://dx.doi.org/10.4236/jss.2013.16001> An.
- [9] L. F. Rojas, "Factors Affecting Academic Resilience in Middle School Students: A Case Study 1," *GIST Education And Learning Research Journal*, vol. 11, no. 11, pp. 63–78, 2015.
- [10] C. T. Utami and A. F. Helmi, "Self-Efficacy dan Resiliensi :," *Buletin Psikologi*, vol. 25, no. 1, pp. 54–65, 2017, doi:

- 10.22146/buletinpsikologi.18419.
- [11] S. M. Southwick *et al.*, “interdisciplinary perspectives,” *European Journal of Psychotraumatology*, vol. 5, no. 1, pp. 1–14, 2017, doi: 10.3402/ejpt.v5.25338.
- [12] H. Herrman, D. E. Stewart, N. Diaz-granados, E. L. B. Dphil, B. Jackson, and T. Yuen, “What Is Resilience?,” *The Canadian Journal of Psychiatry*, vol. 56, no. 5, pp. 258–265, 2011, doi: 10.1177/070674371105600504.
- [13] D. F. Gucciardi, S. Gordon, and J. A. Dimmock, “Development and preliminary validation of a mental toughness inventory for Australian football,” *Psychology of Sport and Exercise*, vol. 10, no. 1, pp. 201–209, 2009, doi: 10.1016/j.psychsport.2008.07.011.
- [14] B. W. Smith, J. Dalen, K. Wiggins, E. Tooley, P. Christopher, and J. Bernard, “The Brief Resilience Scale: Assessing the Ability to Bounce Back,” *International Journal of Behavioral Medicine*, vol. 15, pp. 194–200, 2008, doi: 10.1080/10705500802222972.
- [15] D. Fletcher and M. Sarkar, “A grounded theory of psychological resilience in Olympic champions,” *Psychology of Sport & Exercise*, vol. 13, no. 5, pp. 669–678, 2012, doi: 10.1016/j.psychsport.2012.04.007.
- [16] Khoirunnisa and M. Jannah, “RESILIENSI PADA ATLET RENANG Khoirunnisa ’ Miftakhul Jannah,” *Character: Jurnal Penelitian Psikologi*, vol. 03, pp. 1–7, 2014.
- [17] Hermahayu, “Peran Ketangguhan Mental dan Motivasi Intrinsik Terhadap Resiliensi Atlet Selama Pandemi Covid-19,” *Urecol Journal. Part H: Social, Art, and Humanities*, vol. 1, no. 1, pp. 47–56, 2021.
- [18] N. Susanto, “Pengaruh Virus Covid 19 Terhadap Bidang Olahraga Di Indonesia,” *Jurnal Stamina*, vol. 3, pp. 145–153, 2020.
- [19] T. Sulastri and M. Jufri, “Resiliensi di Masa Pandemi: Peran Efikasi Diri dan Persepsi Ancaman Covid-19,” *Jurnal Penelitian Psikologi*, vol. 12, no. 1, pp. 25–32, 2021, doi: <http://doi.org/10.29080/jpp.v12i1.531>.
- [20] R. Schwarzer and L. M. Warner, “Perceived Self-Efficacy and its Relationship to Resilience,” *The Springer Series on Human Exceptionality*, pp. 139–150, 2013, doi: 10.1007/978-1-4614-4939-3.

Open Access This chapter is licensed under the terms of the Creative Commons Attribution-NonCommercial 4.0 International License (<http://creativecommons.org/licenses/by-nc/4.0/>), which permits any noncommercial use, sharing, adaptation, distribution and reproduction in any medium or format, as long as you give appropriate credit to the original author(s) and the source, provide a link to the Creative Commons license and indicate if changes were made.

The images or other third party material in this chapter are included in the chapter’s Creative Commons license, unless indicated otherwise in a credit line to the material. If material is not included in the chapter’s Creative Commons license and your intended use is not permitted by statutory regulation or exceeds the permitted use, you will need to obtain permission directly from the copyright holder.

