

# THE ROLE OF COPING STRATEGIES IN THE RESILIENCE OF HEALTH WORKERS DURING COVID-19 PANDEMIC

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## ABSTRACT

During the COVID-19 pandemic, health workers are at the highest risk of infection so appropriate coping strategies are needed to survive the situation. This study aims to examine the role of coping strategies ((problem focused coping, emotion focused coping, and avoidance coping) on the resilience of health workers in hospitals. Using the Brief COPE questionnaire for coping strategy variables with  $\alpha$  0.888 and the Connor-Davidson Resilience Scale (CD-RISC) for resilience with  $\alpha$  0.89. The sampling technique used proportional random sampling with 86 respondents. Data analysis using multiple regression shows that there is a significant effect between coping strategy variables on resilience with a value of  $p = 0.008$  ( $p < 0.05$ ), there is a significant effect between Problem Focused Coping on resilience with a value of  $p = 0.000$  ( $p < 0.05$ ), there is a significant effect between Emotion Focused Coping on resilience with a value of  $p = 0.012$  ( $p < 0.05$ ), and there is a significant effect between Avoidance Coping on resilience with a value of  $p = 0.037$  ( $p < 0.05$ ). Coping and resilience strategies that are widely used by health workers at the Meuraxa Regional General Hospital, Banda Aceh City during the pandemic are drawing closer to God, praying, believing in God, being proud of achievements, social support, and the ability to adapt. The results of this research can be used as input for related agencies so that they can hopefully form resilient health workers.

**Keyword :** COVID-19, coping strategies, health workers, resilience

## A. INTRODUCTION

COVID-19 is an outbreak of an infectious disease caused by a virus that appeared in 2019 which has caused many victims. Outbreaks of infectious diseases are included in non-natural disasters which refer to Law Number 24 of 2007 concerning Disaster Management. According to the World Health Organization (WHO) 2019, COVID-19 is an infectious

disease caused by a newly discovered coronavirus. COVID-19 virus has been declared by WHO as a global pandemic. Moreover, in Indonesia, it is declared a type of disease that causes public health emergencies and non-natural disasters [1].

Health workers are on the front lines during the pandemic and are at the highest risk of infection. In Indonesia, facilities for health workers are limited, thus driving high levels of anxiety. As of July, more than

1.300 Indonesian health workers have died from COVID-19. The explosion in COVID-19 cases has resulted in more and more COVID-19 patients needing treatment so hospitals are increasingly overwhelmed and causing health workers to experience heavy workload and pressure. There are 227 health workers in Indonesia show that 56% (128) of respondents suffer from anxiety, with 33% (75) of them are high-level anxiety, and 23% are moderate level anxiety [2].

In addition, the psychological impact experienced by health workers is caused by the emergence of fear and anxiety about transmission, increased stress due to many thoughts, many health protocols that must be followed. And also there are many stigma from outside for health workers, lack of clarity on incentives, anxiety about themselves and families, lack of staff readiness/knowledge about the disaster that occurred, limited provision of PPE, lack of vaccines, and absence of crisis counseling. This impact can be characterized by several symptoms such as panic, insomnia, fatigue and sleep disturbances [3] [4].

In several countries, such as India, Turkey, and China, several studies have been carried out on health workers during COVID-19. The results were that out of 5.925 health workers, 1.799 health workers experienced stress [5]. Meanwhile, the incidence of depression was recorded from 14.940 health workers in various parts of the world, as many as 3.729 health workers experienced symptoms of depression [6]. In Indonesia, stress and trauma to health workers also become important issues, stigma and discrimination are experienced in real terms, especially by health workers. Forms of stigma experienced included people around avoiding and closing doors when they saw nurses, being evicted from their homes, being prohibited from taking public transportation, families being ostracized, being prohibited from marrying them, and threats of divorce by husbands or wives. This stigma and discrimination have long-term health risks [7]

In Aceh, one of COVID-19 Referral Hospitals in Aceh is Meuraxa Regional General Hospital in Banda Aceh City, this hospital has treated patients infected with COVID-19. Many patients have been treated at Meuraxa Hospital. From 2021 until August there were around 600 COVID-19 patients who were treated and 100 people had died (medical record staff). In this condition, health workers continue to treat patients who are infected with COVID-19 as they usually treat ordinary patients while still using complete PPE and maintaining health protocols according to regulations.

Until August 2021, the pandemic conditions had not improved even though several health protocols had been issued, so this fluctuating condition also forced health workers to remain alert. There are many health workers experience psychological impacts in a pandemic situation, these causes happened due to significant differences in health services before and during the pandemic. Previously, in serving patients, health workers did not need to wear PPE, masks, and did not need to worry about the transmission of COVID-19. However, during a pandemic, many health protocols had to be maintained so that transmission did not occur and infect others, so this situation had a

psychological impact to health workers. To survive from pandemic situation, health workers implement coping strategies.

Coping strategies are efforts to prevent or reduce threats, harm, and loss as well as those related to adversity. Lazarus and Folkman divided coping strategies into two types, namely Problem-Focused Coping (PFC), Emotion-Focused Coping (EFC), and Avoidance Coping. Coping strategies greatly affect the resilience of an individual. Resilience is an ability needed by individuals because human life is always faced by challenges so individuals are required to be able to solve problems well and have effective coping strategies [8] [9] [10].

Some of the coping strategies used by health workers are providing a psychologically safe space for staff, forming peer and family support, implementing self-care strategies such as work breaks, sleep, healthy lifestyle behaviors, and managing emotions for example, preventing fatigue and psychological trauma. Furthermore, using private vehicles and avoiding public transportation to be freer from the risk of infection and stigma, and avoid social media and news about COVID-19 that do not come from the world of health [11] [12].

Other strategies are carrying out religious worship activities, having sleeping pills or treatment so that sleep patterns can be regular and adapted to changing circumstances [4]. Moreover, changing the work cycle, by providing shorter working hours or providing relaxation at work, forming peer support groups with personal contact interventions or other possible [13] [14]. Accessing psychological materials such as books on mental health, accessing psychological resources available through the media. Doing physical activity/exercise is the most common coping behavior (59%), visiting individual therapists with online self-counseling (33%) [15] [16]

From the several problems described above, it can be concluded that many health workers experience a heavy psychological burden in pandemic situation. There are several ways have been done by health workers to survive in this situation. Health workers are able to survive to rise in difficult situations. Coping strategies for COVID-19 cannot be carried out in the short term, but this needs a long-term period, because the next wave of COVID may arise so it is necessary to conduct research related to coping strategies, so researchers are interested in conducting research on "The Role of Coping Strategies for the Resilience of Health Workers during COVID-19 Pandemic at Meuraxa Regional Hospital, Banda Aceh ", which are the results of this research can be used as input for related agencies so that they can hopefully form resilient health workers not only in the relevant institutions, but also in Indonesia and even in other countries.

## **B. LITERATURE REVIEW**

### **COPING STRATEGIES**

Coping strategies as efforts to prevent or reduce threats, harm, and loss as well as those related to

adversity. Coping is a basic process of a person's adjustment and survival. Coping describes how a person can detect, assess, handle, and learn from various situations and conditions that cannot be controlled and cause stress [8]. According to Folkman, coping refers to a person's cognitive and behavioral efforts to manage (reduce, minimize, control, or tolerate) internal and external demands resulting from a person's interactions with the environment that are considered to burden or exceed the person's resources [17].

Coping is a process by which individuals try to manage the distance that exists between demands and the resources they use in dealing with stressful situations. Successful coping will result in new and permanent adaptations and an improvement from the old situation. Whereas ineffective coping ends with maladaptive, namely responses or reactions that are not by existing norms. Individuals do coping not alone and not only use one strategy but can do it varied and combine various existing strategies, this depends on individual abilities and conditions [18]. Coping strategies are often influenced by cultural background, experience in dealing with problems, environmental factors, personality, self-concept, social factors, and others which greatly influence an individual's ability to solve problems [9].

### Types of coping strategies

Carver compiled the COPE scale which is a development of the conceptualization made by Lazarus and Folkman. In 1997, Carver renewed the measurement tool which was given this COPE Brief with the following aspects:

#### a. Coping that focuses on problems (problem-focused coping)

1. Active behavior (active coping), active coping is the process of taking steps actively to try to eliminate a stressor or to alleviate its impact. Active coping includes making decisions to act directly and making efforts to solve problems gradually.
2. Planning (planning), planning is thinking about how to deal with stressors, such as thinking about a strategy to act, what steps to take, and how best to solve the problem.
3. Seeking instrument support (using instrumental support), instrumental support is seeking advice, suggestions, assistance, or information support that can solve problems.
4. Positive reframing, a positive reassessment of the problem towards the situation at hand is an effort made by individuals to overcome the emotional pressure that arises as a result of the problem compared to tackling the problem itself.

#### b. Coping that focuses on emotions (emotion-focused coping)

1. Expressing feelings (venting), venting is a person's tendency to release the emotions he feels.
2. Using emotional support, the definition of using emotional support is almost the same as social support in problem-focused coping, the difference is that using emotional support focuses only on calming down. Emotional support such as seeking moral support, sympathy, or understanding.
3. Joke (humor), the individual tries to make a joke about the problem at hand
4. Acceptance (acceptance), acceptance is an individual can accept the reality of the situation at hand. The attitude of acceptance has two meanings, namely the individual accepts the reality faced as a reality or it occurs because there are no concrete steps to deal with the stressor.
5. Self-blame (self-blame), self-blame is self-criticism as the person in charge in a situation.
6. Religion (religion), individual attitudes to calm what is felt religiously or try to return the problems faced to religion by asking God for help and worship.

#### c. Coping that focuses on avoidance (avoidance coping)

1. Self-distraction, various activities that function to distract individuals from thinking about the problem at hand, such as daydreaming, sleeping, or watching TV.
2. Denial, denial is an individual's attempt to deny that he is faced with a problem
3. Use of substances (substance use), individual efforts to relieve stress by escaping from consuming alcohol or illegal drugs.
4. Deviant behavior (behavioral disengagement), a form of coping in the form of reduced efforts made by individuals in dealing with stressors. In other words, behavioral disengagement can be said to be an individual's tendency to give up trying to achieve goals that are hampered by stressors. [19]

### RESILIENCE

Resilience is a manifestation of personal qualities that help individuals to develop in overcoming difficulties. Reivich and Shatte said resilience is an individual's ability to overcome life's challenges and maintain good health and energy so that they can continue to live healthy life. Resilience is the ability to survive and adapt when faced with things that go awry. Resilience is the ability possessed by humans to face, overcome, and learn difficulties in life and learn from experiences from unpleasant conditions they have experienced [20] [21].

Resilience is an ability that is needed by individuals because human life is always colored by challenges so individuals are required to be able to solve problems well and have effective coping strategies. Resilience also has meaning as an

individual's ability to overcome difficulties and continue normal development as before. Resilience is described as a tool or skill to change, balance, or control oneself in an unfavorable environment [10] [22].

The positive outcomes associated with resilience are the alleviation of the negative effects of stress, increased adaptability, and the development of effective coping skills to deal with change and adversity. Therefore resilience is defined as the ability of individuals to choose to recover from sad and challenging life events, by increasing knowledge to be adaptive and overcome similar adverse situations in the future [23]

**Resilience Aspect**

In this study, the authors refer to the resilience aspects put forward by Connor and Davidson, namely:

1. Personal competence, high standards, and tenacity (personal ability, high standards, and persistence), is an individual's ability to set goals and willingness to do what is necessary to achieve these standards. This competency describes an individual's attitude that will persist in achieving goals even under stressful conditions.
2. Trust in one's instincts, tolerance of negative affect, and strengthening the effects of stress (self-confidence, tolerance of negative influences, and strength to deal with stress), individuals trust the feelings and instincts they feel. This belief will be followed by resistance to negative emotions so that they can deal with stress well.
3. Positive acceptance of change, and secure relationship (positive acceptance of change and the ability to establish good relationships with others), this aspect describes the ability to respond positively in the face of changes that occur, adapt quickly to change, and the ability to establish good relationships good with others.
4. Control (control), this aspect is related to the ability to manage feelings and regulate behavior when faced with problems and stressful situations.
5. Spiritual influences (spiritual influence), is a person's belief in the existence of God and the ability to draw meaning from the events that occur [20]

**C. RESEARCH DESIGN METHOD**

This study uses a quantitative research approach, by collecting data from respondents using a questionnaire that has been prepared in the form of Google form addressed to health workers at Meuraxa General Hospital, Banda Aceh. Research and data collection for two months. The measuring instrument for this study used two types of measurement tools, namely Brief COPE compiled by Carver, Scheier, and Weintraub for coping strategies which consisted of 28 items, and Connor-Davidson Resilience Scale (CD-RISC) developed by Connor and Davidson for resilience

which consisted of 25 items. The analysis in this study is descriptive statistical analysis, so data processing techniques using multiple linear regression analysis.

**D. Population, and sample**

The population in this study were 108 health workers who worked during pandemic and nursed for COVID-19 patients at Meuraxa Hospital in Banda Aceh. The sampling technique used in this study is proportional random sampling, which is a sampling technique in which all members have the same opportunity to be sampled. The inclusion criteria in this study were all health workers who worked and cared for patients during the COVID-19 pandemic. The exclusion criteria in this study were health workers who did not have the time and were not willing to fill out the questionnaire. The sample in this study follows the determination of the number of samples developed by Slovin, namely:

**Table 1. Number of Samples**

Health Group	Workers Population	Number of Samples
Medical personnel	17	$\frac{17}{108} \times 86 = 14$
Nursing	48	$\frac{48}{108} \times 86 = 38$
Non-Nursing Paramedics	32	$\frac{32}{108} \times 86 = 25$
Midwife	11	$\frac{11}{108} \times 86 = 9$

**E. RESEARCH RESULTS AND DISCUSSION**

**Descriptive Statistical Analysis of Coping Strategies**

There is a coping strategy variable with the highest percentage, namely in the substance use aspect numbers 4 and 11. Statement number 4, shows that as much as 79.1% of health workers have never drunk alcohol or drugs such as sleeping pills, headache medicine, and so on to make feel more comfortable. Then statement number 11, as much as 81.4% of health workers have never taken alcohol or drugs such as sleeping pills, headache medicine, and so on to help get through the problems they are facing.

Then the highest percentage is also in aspects of religion number 22 and 27. Statement number 22, shows that as much as 81.4% of health workers very often draw closer to God, and statement number 27 shows that 76.7% of health workers very often pray as much as help to get through the problems encountered.

The coping strategy that can be carried out by health workers during this pandemic is to increase religiosity. The ability to religiosity can help health workers in dealing with their duties during a pandemic and affect the reduction in stress levels faced by health workers [26]. Then the characteristics of resilience in the perspective of Al-Quran are patience, fortitude, being optimistic, and never giving up [27]. Several indicators of resilience in the Islamic concept include being patient which can be interpreted as the strength of the soul and heart in accepting life's tough problems

and can endanger one's safety both physically and mentally [26].

Religion functions as a guide in life, a helper in trouble, and is able to calm the mind of individuals who experience anxiety. According to Pargament religion can be a central part of coping construction, for example, one can talk about religious events, religious judgments, religious coping activities, and religious goals in coping. As part of the transactional coping process, religion has a two-way role. First, religion can contribute to coping processes and coping activities in dealing with life events. For example, getting closer to God, believing in life events as God's will, intensely carrying out worship, and diligently participating in religious activities will have a positive impact on surviving in the face of life's stresses. Second, religion can be the result of coping [28].

From some of the descriptions above, researchers can conclude that regularity is one of the coping strategies that can be carried out by health workers, with a belief in God, individuals have hope to continue what they are currently facing. Religion can be a guide to calm the mind and anxiety, for example by carrying out worship and participating in positive activities to survive in the face of stress. Then also by being grateful and surrendering to the creator, this makes sincerity increase so that even when carrying out a task there is no anxiety and fear of contagion.

Health workers do not consume alcohol and drugs because the majority of the population in Aceh are Muslims, so they protect and stay away from what is prohibited by religion by not consuming alcohol and drugs.

### **Resilience Descriptive Statistical Analysis**

The highest percent resilience variable, namely 64%, is in statement number 3, this shows that health workers strongly agree that when there is no clear solution to a problem, sometimes trust or belief in God can much help.

Research from Wildani says that religiosity, social support, and spirituality can support increased resilience, where resilience can be a protective factor against mental health decline during COVID-19 pandemic. Nini's research also resulted in 95.2% of respondents stating that they gratefully accept all situations so that mental health is maintained during the pandemic [29]

Religiosity can be powerful source of hope, meaning, peace, comfort, and forgiveness for oneself and other individuals. Religiosity makes it easier for individuals to comply with certain rules so that individuals have good self-control abilities and can still carry out various new rules that arise as a result of COVID-19 properly. Religiosity also makes individuals have faith in God. This can keep individuals having positive emotions even though they are in trouble [30].

Furthermore, as many as 52% of health workers agree that they have at least close and safe relationship that can help them when they are in a state of stress, this needs social support for health workers. Social

support can come from relatives, friends, co-workers, neighbors, and close friends during activities [31].

Social support is a reciprocal relationship from one person to another to assist both moral and material so that people have positive feelings towards themselves and others and have the ability to adapt to the environment, social support is needed in order to minimize the pressure from tiring activities on health workers. The results of the study said that social support had a positive effect on the resilience of health workers during COVID-19 pandemic [32].

In statement number 1, as many as 48.8% of health workers agree that they can adapt when changes occur. Resilience refers to positive adaptation or the ability to maintain or regain mental health when experiencing difficulties [33]. Resilience is the ability to absorb or adapt to disturbances and changes then involves the ability to recognize and adapt to deal with unexpected disturbances [34].

Research from Sulastris says that resilience as a function of healthy adaptation is a form of ability that is most needed to survive in pandemic conditions. Individuals with a high level of resilience are generally able to maintain their physical and psychological health and are able to recover quickly from stressful or difficult situations. The higher the resilience a person has, the higher his confidence in being able to overcome new and difficult things in various aspects of life. Moreover, resilience is one of the assets for individuals to be able to live a good life in a pandemic area [35] [36] [37] [38].

In addition, resilient individuals are those who are able to manipulate and shape their environment, deal well with life's pressures, quickly adapt to new situations, perceive what is happening clearly, be flexible in behavior, more tolerant in dealing with frustration and anxiety, and ask for help when they need it. Likewise, Hetherington and Blechman stated that resilient people show more than adequate adaptability when faced with difficulties [39].

From some of the descriptions above, researchers can conclude that religion is also one of the reasons that make individuals resilient, then social support, with social support they feel accepted and safe, so that when these concerns come, health workers have a place to share and ask for help. suggestions/advice. Furthermore, adaptability is also important because they can adjust life according to situations even in difficult situations.

### **Coping Strategy Analysis of Resilience**

Based on the results of the analysis output in (table 2) it is known that the constant value is 50.113, while the coping strategy value (b/regression coefficient) is 0,356. So, the decision in this regression test is:

- The significance value (sig) of the coping strategy variable is 0.008 which is smaller than  $\alpha$  which is (0.05), therefore the decision to reject  $H_0$  is obtained with the conclusion that the coping strategy variable has a significant effect on increasing the resilience variable.

- An increase in one unit of coping strategy variables can increase the resilience variable by 0,356. So, it can be concluded that the higher the coping strategy, the higher the resilience of health workers.
- Based on the t value, it is known that the tvalue is 2,707 > 1,988, so it can be concluded that the variable has a relationship between variable X and variable Y
- The coping strategy analysis table also shows a standardized coping strategy coefficient of 0.283 indicating that the effect of coping strategies on resilience is 28.3%.

**Table 2. Coping Strategy Analysis**

Coefficients <sup>a</sup>						
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	50.113	10.356		4.839	0.000
	Strategi Coping	0.356	0.131	0.283	2.707	0.008

a. Dependent Variable: Resiliensi

This research is in line with the results of Yusuf's research, but this research looks at the performance variable, which states that the calculated F value is 54.865 > F table 3.90 and sig. of 0.000 < 0.05 that the coping strategy (X1) and resilience (X2) variables have an effect on the performance variable (Y) of 42.1% so that it can be concluded that coping strategies and resilience have a significant effect on the performance of health workers during the pandemic [40]. Other research states that the resilience variable consisting of personal competence, self-acceptance, and life is found to be positively correlated with coping strategies with a p-value of personal competence of 0.02 and self-acceptance and life of 0.00 [41].

Other studies during the 2003 outbreak also found that respondents who worked caring for SARS patients, or had friends or close relatives who contracted SARS, were 2 to 3 times more likely to have high levels of PTS symptoms, compared to those who were not exposed [42]. In this situation, resilience and coping strategies play a protective role to reduce emergency stress levels that lead to the risk of developing secondary trauma. Thus, coping strategies, especially stopping unpleasant thoughts and emotions, and resilience are protective factors and reduce the effects of stress on secondary trauma. In cases where urgent intervention is necessary to activate psychological resilience and guide workers in the use of strategies, resilience training should be developed for health workers.

Findings in other studies show that using inappropriate adaptive stress coping such as avoiding can lead to higher chances of getting mental health diseases for health workers during COVID-19

pandemic, whereas adaptive coping such as humor has a weak relationship with anxiety. Adaptive strategies have a stronger relationship with psychological well-being. Thus, maladaptive strategies are related to perceived stress and are adaptive to life satisfaction [43]

Effective coping strategies will increase individual resilience. A high level of resilience is predicted by adaptive coping strategies. Adaptive coping strategies are essential for managing work-related emergencies and stress. So, high levels of resilience and positive coping strategies can enhance personal growth. This is supported by Leodoro's research, namely health workers use coping strategies to manage stress related to the coronavirus pandemic and coping strategies are carried out to maintain psychological and mental health among health workers during COVID-19 pandemic. And then, nurses need to improve coping strategies in responding to psychological problems to protect mental health especially when treating Covid-19 patients (Marwiati, 2021). [44] [45] [46] [47].

Resilience and coping strategies have a protective role in addressing the mental health problems of health workers. Resilience and good coping strategies are said to determine a person's ability to reduce the risk of fatigue and stress so that they can better cope with the problems they face. It is important to reveal the role of mental resilience and coping strategies needed to deal with COVID-19 pandemic crisis situation. The most common coping strategies carried out by health workers include positive thinking, increasing self-efficacy, being diligent in worship and prayer, exercising regularly, taking time to rest and eating nutritious foods, staying social with the environment, and getting social support from family [48].

Resilience and coping strategies in health workers are also influenced by demographic status such as age, gender, marital status, and length of service. The better a person's health status, the better satisfaction at work, and the longer the working period, the better coping and resilience strategies one has for dealing with stressful conditions that affect mental health during a pandemic [49].

From the discussion above, researchers can conclude that coping strategies affect individual resilience, which is when a person has an adaptive strategy in dealing with adversity, it will form a resilient individual. The better the individual's coping strategy, the better the individual's resilience level.

**Analysis of Problem Focused Coping on Resilience**

Based on the results of the analysis output, it is known that the constant a value is 46.960, while the coping strategy value (b/regression coefficient) is 0.227. So, the decision in this regression test is:

- The significance value (sig) of the problem focused coping variable is 0.000 which is smaller than  $\alpha$ , namely (0.05), therefore a decision is obtained to reject H0 with the conclusion that the problem focused coping variable has a significant effect on increasing the resilience variable.

- An increase in one unit of problem focused coping variables can increase the resilience variable by 0.227. So, it can be concluded that the higher the problem focused coping, the higher the resilience of health workers.
- Based on the t value, it is known that the t value is  $5.811 > 1.989$ , so it can be concluded that the variable has a relationship between variable X and variable Y.
- The analysis table for problem focused coping also shows the coefficient of standardized problem focused coping with the coefficient of standardized coping strategies of 0.520 indicating that the effect of problem focused coping on resilience is 52.0%.

**Analysis of Emotion Focused Coping on Resilience**

Based on the results of the analysis output, it shows that the value of the constant a is 46.960, while the value of the coping strategy (b/regression coefficient) is 0,736. So, the decision in this regression test is:

- The significance value (sig) of the emotion focused coping variable is 0.012 which is smaller than  $\alpha$ , namely (0.05), therefore the decision to reject H0 is obtained with the conclusion that the emotion focused coping variable has a significant influence on increasing the resilience variable.
- An increase in one unit of emotion focused coping variables can increase the resilience variable by 0.736. So, it can be concluded that the higher the emotion focused coping, the higher the resilience of health workers.
- Based on the t value, it is known that the tvalue is  $2.558 > 1.989$ , so it can be concluded that the variable has a relationship between variable X and variable Y.
- The emotion focused coping analysis table also shows a standardized emotion focused coping coefficient with a standardized coefficient of 0.289 indicating that the effect of emotion focused coping on resilience is 28.9%.

**Analysis of Avoidance Coping on Resilience**

Based on the results of the analysis output, it shows that the value of the constant a is 46.960, while the value of the coping strategy (b/regression coefficient) is -0.641. So, the decision in this regression test is:

- The significance value (sig) of the avoidance coping variable is 0.037 which is smaller than  $\alpha$ , namely (0.05), therefore the decision to reject H0 is obtained with the conclusion that the avoidance coping variable has a significant influence on increasing the resilience variable.
- Reducing one unit of the avoidance coping variable can reduce the resilience variable by -0.641. So it can be concluded that the lower the avoidance coping variable, the lower the resilience of health workers.
- Based on the t value, it is known that the tvalue is  $2.116 > 1.989$ , so it can be concluded

that the variable has a relationship between variable X and variable Y.

- The avoidance coping analysis table also shows a standardized avoidance coping coefficient with a standardized coefficient of -0.235 indicating that the effect of emotion focused coping on resilience is 23,5%.

**Table 3. Analysis of Problem Focused Coping, Emotion Focused Coping, and Avoidance Coping**

Coefficients <sup>a</sup>						
		Unstandardized Coefficients		Standardized Coefficients		
Model		B	Std. Error	Beta	T	Sig.
1	(Constant)	46.960	8.113		5.788	0.000
	Problem Focused Coping	0.227	0.039	0.520	5.811	0.000
	Emosi Focused Coping	0.736	0.288	0.289	2.558	0.012
	Avoidance Coping	-0.641	0.303	-0.235	-2.116	0.037

a. Dependent Variable: Resiliensi

In some cases, people will apply these three types of coping to deal with different situations and each will be more effective depending on the problem and context [50]. Good coping can increase resilience. In addition, health workers using problem focused coping had lower levels of perceived threat and higher levels of perceived control in their response to the pandemic. Problem focused coping was negatively associated with anxiety and depression when compared with health workers who used the emotion focused coping style [51].

This is also in line with research conducted by Dean stating that there are two forms of coping those individuals will do when dealing with stress, namely problem focused coping and emotion focused coping. Female workers can take advantage of stress coping strategies, either using problem focused coping or emotionfocused coping. Based on research results, shows that coping stress contributes to resilience by 22.2% with very significant contribution criteria [52].

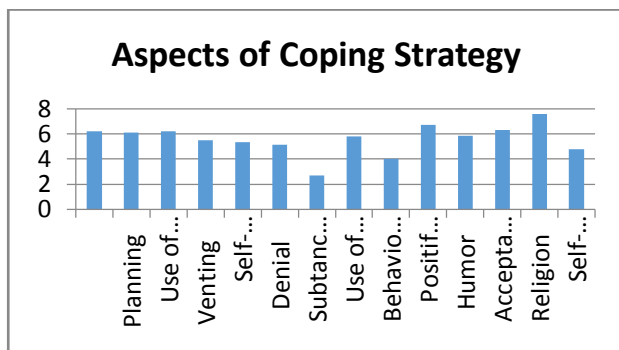
Problem focused coping and emotion focused coping play a supporting role in resilience. This is also in line with the results of Federica's research which states that coping strategies that focus on problems and emotions play a role in resilience as well as a protective factor from psychological stress [53]. Other research also examines coping strategies and resilience with the results that nurses use a lot of problem focused coping, this study also compares coping strategies between male and female nurses with the results of problem focused coping and emotion focused coping

showing an average score that female nurses are higher than male nurses. However, these results are not in line with research conducted by Alharbi which shows that there are no differences in coping strategies between male and female nurses [54].

Nurses working with COVID-19 patients mostly adopt problem focused coping in difficult working conditions. However, both forms of coping strategies significantly affect the resilience subscale of nurses. The assessment of the correlation between resilience and emotion-focused and problem-focused strategies showed a significant positive correlation ( $r = 0.25$ ;  $P < 0.001$  and  $r = 0.33$ ;  $P < 0.001$ ). Therefore, it is recommended that health workers be given special attention to overcome anxiety and resilience and develop problem-solving skills in health workers during the emergence of COVID-19 [54].

Coping skills or coping strategies play an important role in the process of self-adaptation. Each individual is able to choose the appropriate coping strategy and will be able to adapt well and quickly. Good adjustment if the individual or in this case the health worker can achieve satisfaction, and overcome problems, frustration, and also conflict. Good coping strategies are very important in the health worker environment, which means that the individual has a high will and ability to solve an existing problem [55].

**Chart 1. Average Score of the Coping Strategy Scale**



From the graph above, it can be seen that the highest average value is the religion aspect and the lowest average value is the substance use aspect, which indicates that health workers use a lot of religious coping in dealing with the COVID-19 pandemic.

## F. CONCLUSION AND RECOMMENDATION

1. There is a significant effect between coping strategy variables on resilience with a value of  $p = 0.008$  ( $p < 0.05$ )
2. There is a significant effect between Problem Focused Coping on resilience with a value of  $p = 0.000$  ( $p < 0.05$ )
3. There is a significant effect between Emotion Focused Coping on resilience with a value of  $p = 0.012$  ( $p < 0.05$ )
4. There is a significant effect between Avoidance Coping on resilience with a value of  $p = 0.037$  ( $p < 0.05$ ).

In this study, researchers found that several aspects of coping and resilience strategies that were most widely used by health workers at the Meuraxa Regional General Hospital, Banda Aceh city were drawing closer to God, praying, belief in God, pride in achievements, social support, and The ability to adapt is one of the coping mechanisms to make health workers become resilient individuals when facing the COVID-19 pandemic and the religious aspect is the aspect most widely used by health workers.

It is hoped that the government will provide special support for health workers. This includes providing free online training related to strategy and resilience in dealing with changes during the COVID-19 period so that when this situation returns, health workers are ready to deal with it. If necessary, this training is given to all health workers who work in the hospital. This is so that they know how to prepare for their physical and mental health.

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