

The Effect of Age, Sex, Education, Income and Family Relations on Family Stress Coping with Patients Being Treated in a Hospital Isolation Room

Weni Widiyasari
Master of Public Health Science,
Postgraduate, Universitas Jember
Jember, Indonesia

Ristya Widi Endah Yani
Master of Public Health Science,
Universitas Jember
Jember, Indonesia

Erwin Nur Rif'ah
Master of Public Health Science,
Universitas Jember
Jember, Indonesia

Abstract:- The Covid-19 pandemic has become a frightening disease due to its easy and fast transmission. One way to deal with the spread of Covid 19 is by applying isolation to the sufferer according to the symptoms that appear. Isolation in hospitals can have physical and psychological impacts on both sufferers and their families. The aims of study were to analyze the factors of age, gender, education level, income and family with coping with stress. Family of patients treated in hospital isolation rooms. **Methods:** This type of research uses analytic observational with cross sectional design, using total sampling. Data collection uses a questionnaire ways of coping. The statistical test used is cross tabulation test and ordinal regression, the sample in this study was 124 respondents from families of patients who were treated at the hospital. isolation room in a regional hospital in Jember. **Results:** The results showed that the respondents had a fairly good coping response to the stress they experienced. There was an effect of age ($0.025 < 0.05$), education ($0.00 < 0.05$) and income ($0.021 < 0.05$) while gender and the relationship with the patient have no effect with a value of $= 0.05$. **Conclusion:** There was an effect between factors of age, education and income, on coping with family stress of patients who are treated in the isolation room of the Regional Hospital.

Keywords:- Coping, Covid-19, Isolation

I. INTRODUCTION

The spread of COVID-19 can negatively impact a person's psychological and mental health, Information about news about the increasing number of Covid-19 sufferers from day to day can have a serious impact in the form of feelings of depression, stress and anxiety among the public. The very fast spread and the absence of antivirals can add to the feeling of stress, especially for COVID-19 positive patients who are being treated in isolation rooms (Wang, 2020). The culture of

waiting for a sick family is also very strong in Indonesia. The existence of this pandemic culture cannot be applied. This causes patients in the isolation room to feel lonely and feel neglected in appropriate or confusing, psychologically can trigger stress which can affect stress hormones, this will cause the human immune system to decrease and ultimately be vulnerable to contracting Covid-19. One way to anticipate the psychological impact caused by the Covid-19 pandemic requires an adaptive coping strategy, namely how to deal with problems adaptively, both for sufferers and the wider community (Lazarus & Folkman, 1989). The aims of study were to analyze the effect of Age, Gender, Education Level, Income, and Relationship with Patients Factors to Coping Stress The family of a patient who is being treated in an isolation room at a hospital in Jember.

II. METHODS

The design of research was an analytic observational research with a cross sectional approach that uses a total sampling of 124 respondents. The measuring instrument used in this research was the ways of coping questionnaire. The time of the study was from June to August 2021. The independent variables of this study were age, gender, education level, and the dependent variable was the family's coping of patients who were treated in the isolation room of the Regional Hospital in Jember Regency. Data were analyzed using cross tabulation and ordinal regression.

III. RESULTS AND DISCUSSION

A. Results of Identification of Respondents Characteristics

The results of the identification of 124 respondents who were taken from the families of patients who were treated in the isolation room of a hospital in Jember district who had met the criteria for the research sample. Characteristics of respondents consisting of factors: age, gender, education, relationship with patients, income.

Variable	Category	Number of Respondents	Percentage
Age	Adult 18-40th	57	46%
	Middle 41-59 yrs	56	45%
	Elderly 60 years old	11	9%
Gender	Man	66	53%
	Woman	58	47%
Education	No school	7	6%
	SD	6	5%
	junior high school	15	12%
	senior High School	35	28%
	College	61	49%
Relationship with Patient	Couple	60	48%
	Parent	20	16%
	Child	13	10%
	Brother and sister	20	16%
	Another brother	8	6%
	Nanny	3	2%
Income	< UMR	48	49%
	UMR	76	61%

Table 1. Description of Respondents Characteristics

Table 1 shows that the dominant age of respondents is in the adult age group, namely 18-40 years as many as 57 people (46%) while the gender of the most respondents is male as many as 66 people (53.2%) Respondents with the latest college education are 61 people (49.2%) . The relationship status of the respondent with the patient is mostly a partner as many as 60 people (48.4%).

B. Cross Tabulation Test Results between Dependent and Independent Variables

➤ Age

Age is defined as the number of lifetimes of the respondent from the time of birth to birthday. The measurement of age in years is explained as follows:

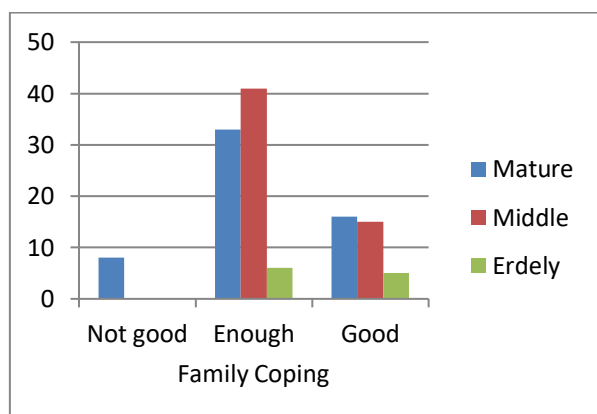


Fig 1. Diagram of the Effect of Age on Stress Coping

Based on diagram 1 shows that the dominant age of respondents is in the adult age group, namely 18-40 years as many as 57 people (46%) tend to have adequate family coping as well as 33 people (26.6%). This group belongs to the category of adulthood which is characterized by physical and psychological maturity.

➤ Gender

Gender in this study is defined as the difference in the physical characteristics of the respondents' vital organs which are categorized into male and female which are explained as follows:

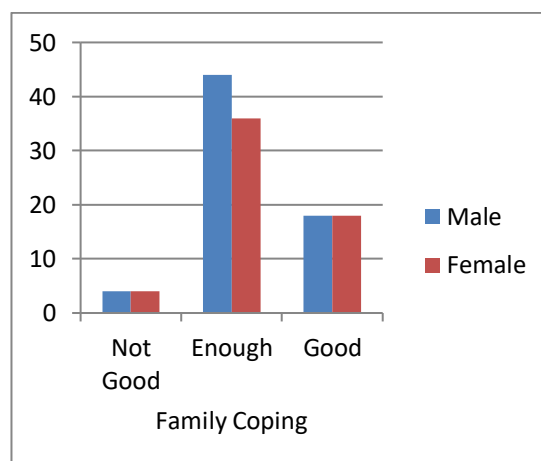


Fig 2. Diagram of the Effect of Respondent's Gender on Stress Coping

Diagram 2 shows that the dominant sex of the respondents is male as many as 66 people (53.2%) and tends to have adequate coping categories as many as 44 people (35.5%).

➤ Education

Education is a tiered or formal information transfer process marked by the issuance of a diploma.

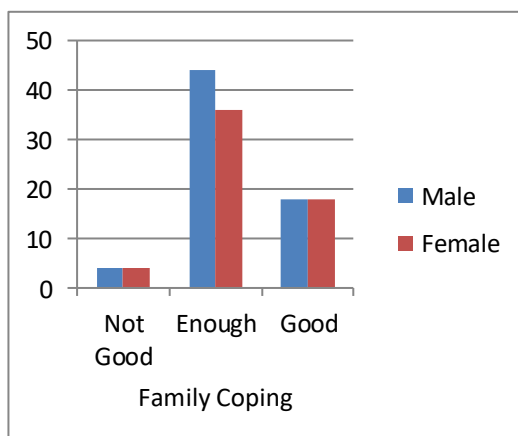


Fig 3. Diagram of the Effect of Respondents' Education on Stress Coping

Diagram 3 shows that 61 respondents (49.2%) have college education and tend to have good and adequate coping categories, each with 30 (24.2%) education.

➤ Relationship with Patient

The relationship between the patient and the family in the family is a status in the family system

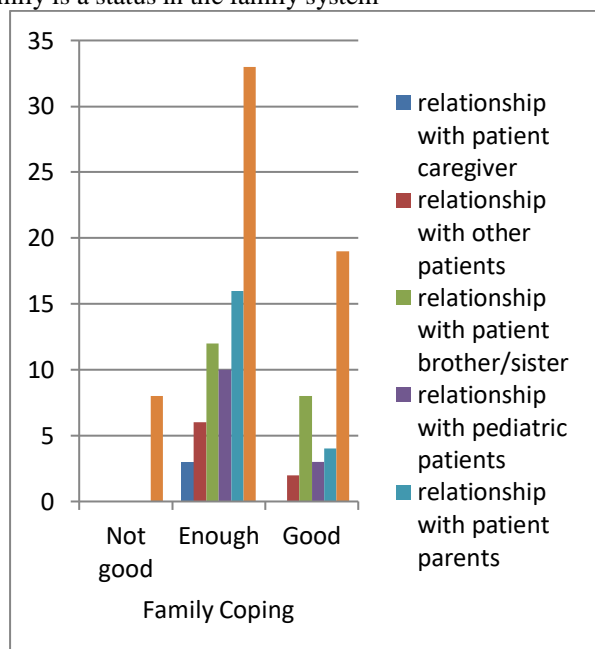


Fig 4. Diagram of the Effect of Relationships with Patients on Coping

Figure 4 shows that the relationship status of the respondent with the patient is mostly a couple as many as 60 people (48.4%) and has a tendency for family coping to be in the sufficient category as many as 33 people (26.6%).

➤ Income

The amount of monthly income received by the respondent in each month measured in rupiah with the Regional Minimum Wage (UMR) indicator. The following describes the income of the respondents:

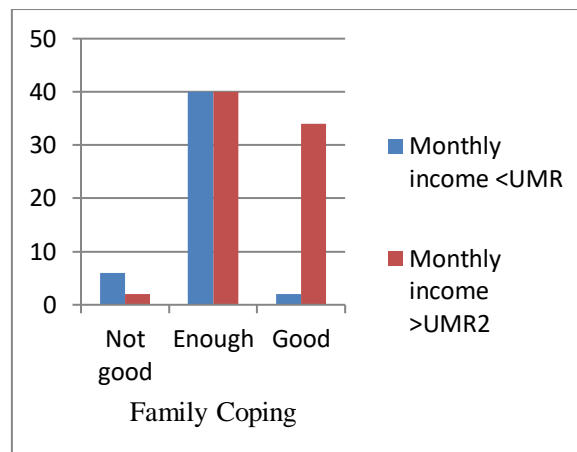


Fig 5. Diagram of the Effect of Respondents' Income on coping with stress

The diagram shows that most of the respondents' income is greater than the UMR of Jember Regency (Rp 2,355,662,91) as many as 78 people (61.3%) tend to have adequate family coping categories as many as 40 people (32.3%).

Variable	Wald	Sig	odds
Age	5.025	0.025 *	0.40
Sex	0.839	0.360	0.66
Education	14,851	0.000 *	0.25
Kinship	.639	0.424	0.87
Income	5.298	0.021 *	0.19

Table 2 Test Results of the Effect of Independent Variables on the Bound Variable

Information :

*: Significance or effect

➤ Effect of Age on Family Coping of Patients Treated in Hospital Isolation Room

Choi, Tessler and Kao (2020) which state that coping strategies are related to the maturity of a person's thinking and how that person makes decisions. Generally, people who are more mature have the ability to think more maturely than their younger ages. This situation will also determine coping in overcoming the problems encountered. The mindset and maturity in thinking will be a reference or basis in every behavior or attitude towards a problem.

Dewaele's research (2007) found a significant negative relationship between the age variable and anxiety scores in adults, indicating that older people have lower anxiety levels. The level of anxiety during the Covid-19 pandemic in the UK shows that adults are more high when compared to adolescents (Mark Shevli et al,2020) . Age shows maturity in thinking and experience in life. Logically, people who are older will have more life experience than younger people. This life experience will later become literacy for someone in every life in the future, including in dealing with problems. Generally, people who have a lot of life experience will find it easier to solve or face problems, in other words, the more mature a person is, the better the coping mechanisms they have. Furthermore, age is also related to a person's maturity in thinking. Generally, people who are more mature have the ability to think more

maturely than their younger ages. This situation will also determine coping in overcoming the problems encountered. The mindset and maturity in thinking will be a reference or basis in every behavior or attitude towards a problem. This means that older adults tend to have better coping skills compared to younger ages.

➤ *The Effect of Gender on Family Coping of Patients Treated in Hospital Isolation Rooms*

In the research of Huang and Zhao (2020) showed that the significant difference in the level of depression due to the Covid-19 pandemic for women was higher than for men. Depressive disorder is the presence of a sad, empty or irritable mood that is accompanied by certain cognitive and somatic symptoms.

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The results of this study indicate that there is no difference in coping in this family based on gender due to covid-19 until now there is still no effective drug and cures patients, covid 19 can also attack anyone, regardless of gender or age, either with symptoms or without symptoms. Men and women have the same way in terms of family coping where one or more family members are treated in the isolation room of the hospital. This situation proves that the gender of the respondent has no effect on family coping in patients treated in the R isolation room regional hospital. Covid-19 can attack anyone regardless of age and gender, this creates a dilemmatic condition for the patient's family who cannot do much in dealing with family members and has the potential to be infected.

➤ *The Effect of Education on Family Coping of Patients Treated in Hospital Isolation Rooms*

According to Siswanto (2007) the higher a person's level of education, tolerance and control of stressors are usually better. Education can effect a person, including a person's behavior regarding lifestyle, especially in motivating attitudes to participate in health development. The higher a person's education level, the easier it is to receive information so that the more knowledge they have. Rahmah (2021) argues that a high level of education is followed by high knowledge and experience, because in the educational process a person will gain a lot of knowledge and experience. This study is in line with the results of research which revealed that there is a significant relationship between knowledge and the coping mechanisms used by a person. This study explains knowledge about the handling and prevention of Covid-19 and how treatment in isolation rooms will carry out more adaptive coping mechanisms. A person's level of education affects emotional intelligence.

The higher the level of education taken, the more information you will have. This information is then managed into a set of knowledge for someone as a basis for acting,

including in family coping. PHigh education will make a person have the ability both intellectually and emotionally. This ability will then determine the quality of the family's coping in dealing with any problems.

Wang's research (2020) in China shows that there is a significant difference between highly educated people compared to those with low education regarding the Covid-19 pandemic. The existence of a high education will make a person capable of both intellectually and emotionally. This ability will then determine the quality of the family's coping in dealing with any problems. In general, higher education will be easier to receive a number of information including in absorbing the information conveyed by the informant compared to low education. The ability to receive this information makes it easier for someone to face and solve the problems they face. Likewise with family coping, the family will have good coping if it is supported by high education.

➤ *The Effect of Relationships with Patients on Family Coping of Patients Treated in Hospital Isolation Rooms*

According to Potter & Perry (2010) things that cause ineffective coping are family members who do not understand, do not know, or do not have the skills to support the patient's stress reaction to cancer. According to Friedman et al., (2018) certain families when experiencing stress cope with problems by becoming more dependent on the source of their own problems. Uniting is one of the most important processes in the storms of family life.

Proximity to the patient does not affect the family's coping. This situation is due to the patient's condition and the condition of the covid-19 pandemic which can attack anyone and at any time and the potential for infection and death is getting higher. Families of patients who are being treated in isolation rooms have their own concerns for fear of being infected with other family members. The family's emotional and biological relationship with the patient being treated will increasingly keep their distance and limit themselves from visiting for fear of being infected. The presence of the closest person besides the respondent makes the respondent worried about the transmission of this virus. This is further exacerbated by the stress experienced by respondents.

➤ *Effect of Income on Family Coping with Patients Treated in Hospital Isolation Rooms*

According to Haruna and Argo (2014) coping resources at the individual level are income or income. K Families who have economic assets will find it easy to overcome the problems they are facing. Income and income are the level of a person's ability to meet their needs for consumption. This research is supported by the opinion Hossain M et al (2020) states that the theory of coping strategies explains that a household will respond either proactively or reactively to conditions that are detrimental or harmful to the family from economic, social, or climatic aspects. K Families who have economic assets will find it easy to overcome the problems they are facing. Assets will act as a means to meet needs, therefore families have many assets that tend to be more prosperous when compared to families who have limited assets, Faize and Husain, (2020). This support includes

resources, each resource has a more specific use and has its own characteristics, some are useful for life in the region itself and some are useful for other areas. Resources in this case in the form of money, goods or services are usually available.

According to the results of the study showing a relationship between income and coping with family stress of Covid-19 patients, income has a vital role in family or household life. If there are problems in meeting household needs, it is possible that the continuity of the family will also be disrupted. If the family is the first line of defense in dealing with the Covid-19 pandemic. One of the family members has a health problem, the level of spending will also increase. If this situation is not balanced with a good income, the function of fulfilling family needs will be disrupted. During the pandemic, some incomes have decreased. Meanwhile the magnitude of the need continues to increase even though income decreases.

The need during the pandemic has increased a lot, especially in the food and health sectors such as the purchase of masks, treatment and other checks. This situation will also have an impact on the fulfillment of other needs, meaning that if income tends to decrease and consumption of other goods continues to increase, then there are a number of other needs that must be reduced in fulfillment. This situation makes the family must survive and be healthy by managing income by exploring other sources of income. In addition, the family should try to solve the problem by changing behavior, environment and emotional control. . This means that if income tends to decrease and consumption of other goods continues to increase, then there are a number of other needs that must be reduced in fulfillment. This situation makes the family must survive and be healthy by managing income by exploring other sources of income. In addition, the family should try to solve the problem by changing behavior, environment and emotional control. . This means that if income tends to decrease and consumption of other goods continues to increase, then there are a number of other needs that must be reduced in fulfillment. This situation makes the family must survive and be healthy by managing income by exploring other sources of income. In addition, the family should try to solve the problem by changing behavior, environment and emotional control. .

IV. CONCLUSIONS AND RECOMENDATIONS

The results of the effect test Age, education, income factors affect coping with family stress of patients treated in the isolation room of the Regional Hospital in Jember Regency, while kinship with patients does not affect coping with family stress of patients treated in the isolation room of RSD dr. Soebandi Jember.

Suggestions that can be put forward are that efforts to improve community coping strategies need to be increased so that the perceived stress can be reduced. Further research is needed to more closely investigate the relationship between mental health problems and COVID-19-related factors and to translate this information into better health.

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