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Factors Influencing Personal Protective Equipment Use Among Vanguard Officers During the COVID-19 Pandemic

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ABSTRACT

Cessation of drug use and the process of recovering from drug addiction is complicated and requires a long time, so it is not uncommon for a drug user who has undergone rehabilitation to experience a relapse or relapse. One of the efforts that can be made to foster resilience in drug users is providing Supportive Group Therapy. This study aimed to determine the effect of supportive group therapy on the resilience of drug users after rehabilitation. The research design used was one group pretest and posttest. The population in this study were all post-rehabilitation drug users at Pondok Loka Jaya Taha Mulia Bhakti Foundation, Blitar Regency, totaling ten people, and the entire population was used as the sample. The independent variable in this study is supportive group therapy, and the dependent variable is resilience. This research was conducted on June 10-22, 2019, at Pondok Loka Jaya Yayasan Tahta Mulia Bhakti Nusantara in Blitar Regency. Based on the Wilcoxon signed rank test, the value of $p = 0.005$ with $\alpha = 0.05$ means that there is an effect of supportive group therapy on the resilience of drug users after rehabilitation.

Keywords*:* Behavior; Personal Protective Equipment, vanguard, COVID-19..

Background

The Coronavirus Disease - 19 (COVID-19) outbreak was first identified in December 2019 in Wuhan, China, caused by SARS-Cov-2. The spread was so fast and deadly that the world health organization (WHO) declared the outbreak a pandemic on March 11, 2020 The increase in the number of cases occurred quite quickly, and spread to various countries in a short time. As of 9 July 2020, WHO reported 11,84,226 confirmed cases with 545,481 deaths world wide (Case Fatality Rate/CFR 4.6%). Indonesia reported its first case on March 2, 2020. Cases are increasing and spreading rapidly throughout Indonesia. As of July 9 2020, the Ministry of Health reported 70,736 confirmed cases of COVID-19 with 3,417 deaths (CFR 4.8%) (1). Based on current epidemiological and virological studies, it is proven that COVID-19 is mainly transmitted from symptomatic people to other people who are at close range via droplets. In hospitals, transmission of the COVID-19 virus can occur through direct contact with infected people and indirect contact with surfaces or objects used on infected people (for example, stethoscopes or thermometers)(1). Hospital staff who are at the forefront of handling COVID-19 have a high risk of infection, because they are the first point of contact in the care of sufferers of COVID-19 and have the most intense contact with patients every day (2). Based on data as of April 8 2020, WHO reports that more than 22,000 medical workers spread across 52 countries and regions have been declared

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infected with COVID-19 (3). As of August 2020, according to data from the Ministry of Health, 87 health workers had died due to COVID-19 (4).

Many efforts and strategies have been implemented by the government, especially to minimize the risk of exposure to the SARS-CoV-2 virus to health and non-health workers, patients and visitors in health care facilities. The government implemented new regulations and health protocols to break the chain of transmission of COVID-19. In principle, the prevention and control of COVID-19 risk factors in health facilities is to apply isolation precautions for all patients, administrative controls and conduct education and training (1). One of the applications of isolation precautions in hospitals is the proper and rational use of Personal Protective Equipment (PPE) based on the risk of exposure and the dynamics of transmission of pathogens (2). PPE recommendations for medical personnel in handling COVID-19 are based on the level of protection, including levels 1 and 2 in general practice places, examining patients with symptoms of respiratory infections and activities that do not generate aerosols, while level 3 is used in actions that generate aerosols (1)

An editorial in the journal Hospital Infection and WHO states that the high risk rate for health workers is due, among other things, to the length of exposure and the amount of exposure to the virus. This factor is exacerbated by the scarcity of PPE, lack of knowledge regarding the use of PPE and the many cases of patients who are dishonest when seeking treatment due to fear of stigma(5). The use of PPE is the lowest level of control because it is difficult to obtain when it is used massively, it is often not the right choice and method of use, it is inconvenient so it requires supervision of compliance and accuracy of use, and in some cases it can affect work processes (1)

In accordance with same research, regarding factors related to the use of PPE in nurses at the Inpatient Installation of the Mamuju Regency Hospital, it shows that there is a significant relationship between knowledge, attitudes, availability of PPE and PPE use policies and the use of PPE in nurses(6). Concerning factors related to nurse adherence to using PPE at Faizal Islamic Hospital Makassar, showed that there was no relationship between education and years of service with nurse compliance in using PPE but there was a relationship between knowledge and nurse compliance to use PPE (7).

Methods

The design of this research is descriptive quantitative with cross sectional approach. In this study, the independent variables were individual factors (knowledge, age, years of service, availability of PPE facilities, hospital policies related to PPE) that influenced the behavior of PPE use for frontline officers at the Hospital and the dependent variable was the behavior of PPE use for frontline workers.The population in this study were hospital frontline officers who in carrying out their duties had to have direct contact with patients. Hospital staff who are at the forefront include doctors, nurses, laboratory staff and radiology officers totaling 47 officers. The sample in this study was to take the entire population to become a sample of 47 people. There were 20 people from the emergency room, 6 people from the Radiology Installation, 7 people from the Laboratory Installation and 14 people from the Outpatient Installation. The sampling technique used in this research is total sampling. The research instruments in this study are questionnaire and checklist to observation the behavior of using PPE, which is carried out every 3 hours for 1 week and the availability of PPE facilities.

Results

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The following will present the results of related research which includes respondents' Knowledge about COVID-19 and hospital policies regarding the use of Personal Protective Equipment (PPE) as well as the behavior of using PPE and the availability of PPE for emergency room workers, outpatient installations, laboratory installations, radiology installations in hospitals.

The relationship between knowledge about COVID-19 and the behavior of using Personal Protective Equipment (PPE) for frontline workers in the COVID-19 pandemic era in hospitals

Table 5 The relationship between knowledge about COVID-19 and the behavior of using PPE officers in the ED, Outpatient Installations, Radiology Installations, Laboratory Installations in Hospitals

No	Value of Knowledge about COVID-19	Behavior of Using PPE				Total	
		Using all PPE		Using not all PPE		N	%
		N	%	N	%		
1.	Score 20	1	2,1	0	0	1	2,1
2.	Score 18	1	2,1	1	2,1	2	4,3
3.	Score 17	0	0	5	10,6	5	10,6
4.	Score 16	0	0	4	8,5	4	8,5
5.	Score 15	1	2,1	12	25,5	13	27,7
6.	Score 14	0	0	4	8,5	4	8,5
7.	Score 13	6	12,8	7	14,8	13	27,7
8.	Score 12	0	0	1	2,1	1	2,1
9.	Score 10	1	2,1	3	6,3	4	8,5
	Total	10	21,3	37	78,7	47	100
	The average Score			14,4			
	Highest Score			20			
	Lowest Score			10			
Person Product Moment Correlation Test				P = 0,000 or P < 0,05			

The behavior of using PPE for frontline workers according to the knowledge of officers about COVID-19 is from 1 (2.1%) respondents with the highest score or correctly answering 20 questions about the knowledge of COVID-19 having the behavior of wearing all PPE surgical masks, long-sleeved gowns, face shield, headgear, shoes and gloves when in contact with patients. Whereas of the 4 (8.5%) respondents who had the lowest answer value, 1 (2.1%) respondents had the behavior of wearing all PPE and 3 (6.3%) of respondents had the behavior of not wearing all of the complete PPE.

According to the grouping of the respondents' knowledge values about COVID-19 related to the behavior of using PPE on frontline officers, they are: the value of good knowledge, out of 12 (25.5%) respondents there is 1 (8.3%) respondent wearing all PPE and 11 (91, 7%) of respondents did not use all PPE. In the moderate value group, there were 31 (65%) respondents with the behavior of using PPE, there were 7 (22.6%) respondents wearing all PPE and 24 (77.4) respondents not wearing all PPE. Whereas in the less value group where out of 4 (8.5%)

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respondents there was 1 (25%) respondent had the behavior of wearing all PPE and 3 (75%) respondents wearing not all PPE.

The results of the Person product moment correlation statistical test with a significance value of P = 0.000 or P < 0.05. Thus, it can be concluded that the knowledge of officers about COVID-19 has a correlation with the behavior of using PPE among frontline workers in the era of the COVID-19 pandemic.

The relationship between age and the behavior of using Personal Protective Equipment (PPE) for frontier workers in the era of the COVID-10 pandemic in hospitals

Table 6 The relationship between age and PPE usage behavior of officers in the emergency room, outpatient installation, radiology installation, laboratory installation at the hospital

No	Age (years)	Behavior of using PPE				Total		Correlation Test
		Using all PPE		Using not all PPE		N	%	
		N	%	N	%			
1.	23 -28	2	22,2	6	15,7	8	17	
2.	29 – 34	2	22,2	17	44,7	19	40	P=0,208
3.	35 – 40	1	11,1	2	5,3	3	6	or
4.	41 – 46	2	22,2	5	13,2	7	15	P>0,05
5.	47 - 52	1	11,1	6	15,7	7	15	
6.	53 - 58	1	11,1	0	0	1	2	
7.	59 - 64	0	0	2	5,3	2	4	
Total		**9**	**100**	**38**	**100**	**47**	**100**	

Based on the results of the research conducted, data were obtained for the youngest age group 23-28 years from 8 (17%) respondents, 2 (22.2%) respondents had the behavior of wearing all PPE surgical masks, long-sleeved gowns, face shields, headgear, shoes, gloves and 6 (15.7%) respondents wore PPE but did not fit level 2 PPE. Meanwhile, in the 59-64 year age group, 2 (5.3%) respondents did not wear all PPE. The results of the Person product moment correlation statistical test with a significance value of P = 0.208 or P > 0.05. Thus, it can be concluded that the age of officers has no correlation with the behavior of using PPE among frontline officers during the COVID-19 pandemic.

The relationship between tenure and the behavior of using Personal Protective Equipment (PPE) for frontline workers during the COVID-19 pandemic era in Hospitals

Table 7 The relationship between years of service and PPE usage behavior of officers in the emergency room, outpatient installation, radiology installation, laboratory installation at the hospital on 30 November - 11 December 2020

No	Work period (months)	Behavior of using PPE						Total	Correlation Test
		Using all PPE		Using not all PPE		N	%		
		N	%	N	%				
1.	8 -56	3	33,3	6	15,8	9	21,3		
2.	57 – 105	1	11,1	6	15,8	7	14,9	P=0,387	
3.	106 - 154	1	11,1	4	10,5	11	23,4	or	
4.	155 - 203	0	0	3	6,4	3	6,4	P>0,05	

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5.	204 – 252	1	11,1	5	13,2	6	12,8
6.	253 - 301	1	11,1	7	14,8	8	17
7.	302 - 350	2	22,2	1	2,6	3	4,3
Total		**100**	**38**	**100**	**47**	**100**	

The behavior of using PPE according to the length of service carried out on frontline officers when in contact with patients, it was found that out of 9 (21.3%) respondents with at least years of service, 6 (15.8%) respondents wore not all PPE , and 3 (33.3%) respondents wore all PPE. Respondents with the longest working period out of 3 (4.3%) respondents, 2 (22.2%) respondents had the behavior of wearing all PPE surgical masks, long sleeve gowns, face shields, headgear, shoes and gloves while 1 (2, 6%) of respondents did not use all types of PPE, person product moment correlation statistical test with a significance value of P = 0.387 or P > 0.05. Thus, it can be concluded that staff tenure has no correlation with the behavior of using PPE among frontline officers during the COVID-19 pandemic.

The relationship between the availability of PPE and the behavior of using Personal Protective Equipment (PPE) in frontline workers in the COVID-19 pandemic era in hospitals

Table 8. The relationship between the availability of PPE and the behavior of using PPE for officers in the emergency room, outpatient installation, radiology installation, laboratory installation at the hospital

No	Value of PPE availability	PPE usage behavior					
	Total						
		Using all PPE		**Using not all PPE**		**N**	**%**
		N	**%**	**N**	**%**		
1.	Score 42	1	2,1	24	51,2	25	53,2
2.	Score 39	0	0	1	2,1	1	2,1
3.	Score 35	9	19,2	12	25,4	21	44,7
	Total 10	**21,3**	**37**	**78,7**	**47**	**100**	
	Average score of	38					
	Lowest score 35						
	Highest score 42						
	Person Product Moment Correlation Test					P = 0,000 or P = < 0,05	

According to the results of the study, the availability of PPE for frontline hospital workers was according to 25 (53.2%) respondents, the availability of PPE for officers with the highest scores or all types of PPE is available. Of these, 1 (2.1%) of respondents had the behavior of using all PPE or being disciplined in using PPE and 24 (51.2%) of respondents wore not all PPE. And of the 21 (44.7%) respondents who reported the availability of PPE with the lowest score, 9 (19.2%) of respondents wore all types of PPE and 12 (25.4%) of respondents wore not all PPE. All types of PPE that are available are always used by officers, the type of PPE that is rarely used by officers is gloves, on average officers wear gloves 13 times in 3 observations for 1 week but officers have diligently performed hand hygiene, both washing hands with soap antiseptic or hand sanitizer after patient contact, person product moment correlation statistical test with a significance value of P = 0.000 or P = < 0.05. Thus, it can be concluded that the availability of PPE has a correlation with the behavior of using PPE among frontline workers in the era of the COVID-19 pandemic.

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The relationship between knowledge about hospital policies regarding PPE for frontline officers and the behavior of using Personal Protective Equipment (PPE) for frontline workers in the COVID-19 pandemic era in hospitals

Table 9. The relationship between knowledge about hospital policies related to PPE and the behavior of PPE workers in the emergency room, outpatient installation, radiology installation, laboratory installation at the hospital

No	Value of knowledge of hospital policies related to PPE	PPE Usage Behavior				Total	
		Using all PPE		Using not all PPE		N	%
		N	%	N	%		
1.	Score 8	1	2,1	1	2,1	2	4,3
2.	Score 7	0	0	3	6,4	3	6,4
3.	Score 6	8	17	23	48,9	31	65,9
4.	Score 5	1	2,1	8	17	9	19,1
5.	Score 4	0	0	2	4,3	2	4,3
	Total 10	**21,3**	**37**		**78,7**	**47**	**100**
Average score of		5,9					
Highest score		8					
Lowest score		4					
Person Product Moment Correlation Test		P = 0,000 or P < 0,05					

The behavior of using PPE for frontline officers is in accordance with the knowledge of officers about hospital policies related to PPE from 2 (4.3%) respondents who had the highest correct answer value 1 (2.1%) respondents had the behavior of wearing all PPE masks, long sleeve dresses, face masks shield, headgear, shoes and gloves. Respondents with the lowest scores in the questionnaire about hospital policies related to PPE 2 (4.3%) of respondents had the behavior of not wearing all PPE completely. Grouping of respondents' knowledge values about hospital policies related to PPE related to the behavior of using PPE on frontline officers, they are: the value of good knowledge from 5 (10.6%) respondents, 1 (20%) respondent uses all PPE and 4 (80%) respondents wear not all PPE. In the sufficient value group, there were 40 (85.1%) respondents with the behavior of using PPE, there were 8 (20%) respondents wearing all PPE and 32 (80%) respondents not wearing all PPE. Whereas in the less value group where out of 2 (4.3%) respondents all had the behavior of not wearing all PPE. Person product moment correlation statistical test with a significance value of P = 0.000 or P < 0.05. Thus, it can be concluded that the knowledge of officers about hospital policies related to PPE has a correlation with the behavior of using PPE among frontline workers in the era of the COVID-19 pandemic.

Discussion

The relationship between knowledge about COVID-19 and the behavior of using Personal Protective Equipment (PPE) among hospital frontliners during the COVID-19 pandemic

In this study, according to the results of the correlation test between knowledge about COVID-19 and the behavior of using PPE, a significance value of P = 0.000 or P < 0.05 can be concluded, which can be concluded that there is a relationship between the knowledge of frontline workers about COVID-19 and the behavior of using PPE. This study shows that officers with the highest number of correct answers in answering the questionnaire about COVID-19 1 (2.1%)

have the behavior of wearing all PPE, namely surgical masks, headgear, face shields, long-sleeved gowns, shoes and gloves when in contact. with patients. Meanwhile, the officer with the lowest answer, 4 (8.5%), had the behavior of not wearing all types of PPE. It is appropriate that the factors that influence the formation of behavior are divided into 2, namely internal and external factors. Internal factors include knowledge, intelligence, perception, emotion, motivation which functions to process external stimuli (8). The higher a nurse's knowledge about PPE, the higher the level of compliance with using PPE (7).

Knowledge is the result of 'knowing' and this occurs after people perceive a particular object. Knowledge or cognitive is a very important domain for the formation of one's actions (ovent behavior). From experience and research it turns out that behavior based on knowledge will be more lasting than behavior that is not based on knowledge. One of the internal factors that influence knowledge is education (8). Likewise, frontline officers who have the most recent education are D3, namely 17 (36.2%) of respondents. It is very easy to get information about COVID-19, especially now that technological progress is very fast. Education can affect a person, including one's behavior towards lifestyle, especially in motivating attitudes to participate in development (9). In general, the higher a person's education, the easier it is to receive information (8). knowledge about COVID-19 very important because the Corona virus is transmitted. Based on current epidemiological and virological studies, it is proven that COVID-19 is mainly transmitted from symptomatic people to other people who are at close range via droplets. Droplets are water-filled particles with a diameter >5-10 µm. Droplet transmission occurs when a person is at close range (within 1 meter) to someone who has respiratory symptoms (for example, coughing or sneezing) so that the droplets are at risk of hitting the mucosa (mouth and nose) or conjunctiva (eyes) (10). By understanding how it is transmitted, it is hoped that frontline officers will understand what PPE should be used when in contact with patients. In addition, knowledge and skills regarding the use and especially of removing PPE are also important for frontline officers to understand. Improper use of PPE, such as wearing gloves can be detrimental to yourself and others because it can be a means of transferring disease germs to other patients or even to fellow staff. Likewise, improper release of PPE has a big risk of becoming a means of transmission of COVID-19. Even though they have good knowledge about COVID-19, socialization and training on using and disposing of PPE for the prevention and control of COVID-19 are still being provided because COVID-19 is a new disease whose management is always developing so it is hoped that frontline workers will be able to carry out prevention and tackling COVID-19 by preventing contracting and transmitting COVID-19 to himself and others l

The relationship between age and the behavior of using Personal Protective Equipment (PPE) in hospital frontline workers in the era of the COVID-19 pandemic

According to the results of the correlation test between age and the behavior of using PPE, a significance value of P = 0.208 or P > 0.05 can be concluded that there is no relationship between the age of frontline officers and the behavior of using PPE. In this study, all respondents had the behavior of wearing PPE with a score of 114 (90.4%) when in contact with patients. The more mature, the level of maturity and strength of a person will be more mature in thinking and working. Whereas before adopting a new behavior within a person a sequential process occurs, namely: awareness, interest, evaluation, trial and adaptation(8).The adoption of behavior that is in accordance with the process and is based on knowledge, positive awareness, the behavior will be lasting, and vice versa (9).

According to respondents, they realized that tackling the COVID-19 pandemic was a shared responsibility, so they had awareness and really prepared themselves to become frontline officers who were brave, tough and not easily discouraged. The frightening pandemic situation

affects human behavior, including frontline hospital staff in preparing themselves for handling COVID-19. It is appropriate that behavior is what the organism does, whether it can be observed directly or indirectly. Behavior and behavioral symptoms that appear in the activities of these organisms are influenced by genetic and environmental factors. The environment is a condition or a land for the development of this behavior (8). The ongoing COVID-19 pandemic demands adjustments and adaptations in all respects from all people in the world, including health workers, especially those who have to deal with patients infected with COVID-19. Officers must adapt to wearing PPE even though it makes them uncomfortable in their activities, some respondents said they felt hot and hot. For staff at the forefront of the Hospital, due to limited manpower it is impossible for the Hospital to place only officers with a young age to be at the forefront, even though the separation of officers with comorbid illnesses has been carried out to be placed in parts far from the risk of transmission of COVID-19. Hospitals have done many things to provide protection for frontline workers in the face of the COVID-19 pandemic, in addition to carrying out good supervision of the behavior of officers in using PPE, they also always remind them to be disciplined in implementing other health protocols wherever they are, including diligently washing hands and keeping their distance, remembering that officers must make direct contact with patients who are not yet known whether they have symptoms of COVID-19 or not which makes the risk of contracting COVID-19 higher.

The relationship between tenure and the behavior of using Personal Protective Equipment (PPE) for frontline hospital staff in the era of the COVID-19 pandemic

The results of the correlation test between years of service and PPE usage behavior, a significance value of P = 0.387 or P > 0.05 can be concluded, which can be concluded that there is no relationship between tenure of vanguard officers and PPE use behavior. This can be seen by officers with a working period of 8 – 56 months or 302 – 350 months having the same behavior in using PPE where some wear it incomplete and some wear it completely including surgical masks, long sleeve gowns, headgear, face shields, shoes , gloves. Even though all frontline officers in providing services when in contact with patients must use standard PPE as an effort to prevent and control COVID-19. This is not in line with research which suggests that a long working period can affect the work motivation of nurses in using PPE(7). Nurse's tenure will affect her adherence to using PPE (6). Work period is the time calculated to start working after a 3-month contract period can be calculated in months or years. Work period greatly affects a person's experience of work and the environment. This experience will be able to make someone to work even better. Coronavirus Disease 2019 (COVID-19) is an infectious disease caused by Severe Acute Respiratory Syndrome Coronavirus 2 (SARS-CoV-2). SARS-CoV-2 is a new type of coronavirus that has never been previously identified in humans (2). So it is certain that all health workers have no experience working in the midst of this deadly pandemic. Not a few health workers experience fear and confusion because they have to get used to new behavior, especially in using PPE which is expected to protect workers from COVID-19 infection.

Dissemination of prevention and control of COVID-19 is needed according to the latest developments as well as the correct and safe way to use and remove PPE for frontline officers to support the adoption of new behaviors in officers. Moreover, during the COVID-19 pandemic it was often known that patients were dishonest with their health information, patients covered up to answer by lying to officers' questions causing the risk of infection with COVID-19 for officers to be higher.

The relationship between the availability of PPE and the behavior of using Personal Protective Equipment (PPE) for frontline hospital workers in the era of the COVID-19 pandemic

Research results of the correlation test between the availability of PPE and the behavior of using PPE, a significance value of P = 0.000 or P < 0.05 can be concluded, which can be concluded that there is a relationship between the availability of PPE and the behavior of using PPE on officers. The results of the study show that the availability of PPE for frontline officers is all available. COVID-19 is a disease with a fairly high transmission rate, so it is necessary to carry out comprehensive public health protection efforts. WHO 2020 guidelines, strategies to optimize the availability of PPE in hospitals can be carried out by minimizing the need for PPE, using PPE rationally and appropriately and coordinating PPE supply chain management mechanisms. In accordance with WHO recommendations, 2020 as an effort to consider actions when supplies of PPE are limited such as extended use of PPE, reprocessing and reuse after decontamination / sterilization and consideration of using alternative tools recommended by WHO standards (1). Although the use of PPE is the most visible control measure in preventing the spread of infection, the use of PPE is only one measure of IPC and cannot be relied upon as a primary prevention strategy. Without effective administrative and mechanical controls, the benefits of PPE are limited (6).

Likewise with the availability of PPE in hospitals, hospitals always try to provide the best possible PPE, especially for officers who in their duties have to be in contact with COVID-19 patients. As a private hospital, all the availability of facilities and infrastructure is self-sufficient, so a gradual completion process is needed. The hospital mobilized all human resources in dealing with the COVID-19 pandemic storm, including sewing room staff to design and manufacture work clothes, long-sleeved gowns and headgear that can be distributed quickly to officers, especially those on the front lines. Due to the scarcity of PPE, the COVID-19 pandemic has truly had an extraordinary impact on various fronts, not only on health issues but also on the economy. Reprocessing and reuse of PPE such as long-sleeved gowns, headgear, face shields, protective shoes and particulate or N95 masks used in PPE level 3 are also carried out in hospitals. In addition to fulfilling PPE as needed, the hospital also carries out administrative and mechanical controls such as installing barriers on officers' desks, placing distancing signs on waiting chairs, prohibiting visiting hours, organizing PPE logistics so supplies are used properly and making policies regarding health and protection of officers.

The role of the PPI Committee in infection prevention and control in hospitals is very important, especially when the world is faced with this extraordinary COVID-19 pandemic. Supervision must be carried out not only in the use of PPE but also with the availability of PPE in each work unit according to the infection zoning by utilizing the PPI Committee network, namely IPCLN as a form of coordination for the PPE supply chain management mechanism. In addition, the preparation of procedures for providing facilities and infrastructure related to PPI is needed as a form of administrative control that can support and enhance hospital efforts in carrying out efforts to prevent and control COVID-19. Tough and great health workers are one of the hospital's extraordinary assets so that the protection of frontline health workers and other health workers who treat COVID-19 patients must be prioritized, hopefully this COVID-19 pandemic will end quickly.

The relationship between knowledge about hospital policies regarding PPE for frontline officers and the behavior of using Personal Protective Equipment (PPE) for Hospital frontline workers in the era of the COVID-19 pandemic

This research results of the correlation test between knowledge of hospital policies related to PPE and the behavior of using PPE, a significance value of P = 0.000 or P < 0.05 can be concluded, which can be concluded that there is a relationship between the knowledge of frontline officers about hospital policies related to PPE and the behavior of using PPE in officer. The policy

in this study is a written statement made by the leadership/management of the Hospital regarding the use of PPE by officers when providing services. This policy through the Hospital Infection Prevention and Control Committee and the COVID-19 Health Service Team is socialized to all staff at the Hospital to be known and understood so that it is expected to increase the behavior of using PPE among officers. In this study as many as 2 (4.3%) respondents who understood and understood hospital policies and regulations by answering all 8 questions correctly had the behavior of wearing all types of PPE, while 2 (4.3%) respondents with the lowest number of correct answers were 4 about having the behavior of wearing not all PPE completely. Before someone is able to apply the material being studied in actual conditions, that person knows and understands the object that is known correctly (9). This is in accordance with research conducted on nurses at the District Hospital.

Even though frontline officers understand and understand hospital policies and regulations, supervision and supervision of the behavior of officers in using PPE must still be carried out. Policy is a driving or reinforcing factor for the occurrence of a behavior. The existence of a policy can be a factor for someone to comply and be disciplined in using PPE while on duty. COVID-19 is a new disease which in its prevention and control is always progressing so that new policies from the government often emerge, including guidelines for handling COVID-19 which are frequently revised. For this reason, it is necessary to review existing hospital policies or even revise them according to the development of the situation and conditions.

Conclusions and Recommendations

There is a relationship between the knowledge of officers about COVID-19, the availability of PPE and the knowledge of officers about hospital policies regarding PPE with the behavior of using PPE for frontline workers in the era of the COVID-19 pandemic in hospitals. Meanwhile, the age and tenure of officers had no relationship with the behavior of PPE use for frontline officers during the COVID-19 pandemic era in hospitals.

Recommendations for hospital to supervise and monitor the use and availability of PPE in each installation according to the infection zone, with good supervision it can improve the behavior of using PPE and increase enthusiasm in providing health services, carry out continuous socialization about the COVID-19 pandemic according to the latest developments in order to increase the understanding of officers, in the prevention and control of COVID-19, formulate hospital policies regarding the provision of facilities, infrastructure for officers for COVID-19 service activities.

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