

Relationship Between Family Support With Compliance About The Treatment Of Hypertension Patients

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ABSTRACT

Adherence to treatment in hypertensive patients is a major aspect in the healing process. In order for the healing process to be realized, it certainly requires cooperation between hypertension sufferers and their families. Family support is one of the factors that determine the level of patient compliance in carrying out the treatment process, the more obedient the patient is in undergoing treatment, the more complications from the disease will be avoided. This study aims to determine the relationship between family support and compliance with the treatment of hypertension patients. The design used in this study is descriptive correlative with a cross sectional approach. The sample used was 103 people taken by non-probability sampling technique with consecutive sampling approach. Retrieval of data using a questionnaire containing family support and the level of adherence to the theory Morisky Medication Adherence Scale (MMAS-8). Furthermore, the data were analyzed using the Spearman Rho test. Results Most of the hypertensive patients received family support in a good category, namely 59 respondents (57.3%) and most of the adherence to treatment of hypertensive patients was still low, namely 45 respondents (43.7%). The results of bivariate analysis found that there was a significant relationship between family support and medication adherence in hypertension patients with $p < 0.001$ with a value of $r = 0.699$. Family support has a role to increase patient or family member compliance, especially in hypertension, to undergo the treatment process.

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1. INTRODUCTION

Hypertension is a major cause of heart failure, stroke and kidney failure. Hypertension is referred to as the “silent killer” because people with hypertension often show no symptoms and half of people who suffer from hypertension are not aware of their condition. Patients suffering from hypertension should have their blood pressure monitored at regular intervals because hypertension is a lifelong condition (Smeltzer & Bare, 2017).

Based on data from the World Health Organization (WHO) it was reported that in 2015 around 1.13 billion people in the world have hypertension, which means that 1 out of 3 people in the world is diagnosed with hypertension. The number of hypertension continues to increase every year, it is estimated that by 2025 there will be 1.5 billion people affected by hypertension and every year 9.4 million people die from hypertension and its complications. (WHO, 2020). Data in Southeast Asia the incidence of hypertension reaches 36%. Based on Riskesdas 2018 prevalence based on the results of measurements on a population aged 18 years by 34.1%, the highest was in South Kalimantan by 44.1%, and the lowest was in Papua by 22.2%, while the Province of Bali was 29.9% (RISKESDAS, 2018). Based on data from the Bali Provincial Health Office, 555,184 cases of hypertension were reported in Bali in 2021 and 77,998 cases were reported in Gianyar Regency. (Bali Provincial Health Office, 2022). The number of cases of hypertension in the working area of the Ubud Health Center 1 was reported as many as 4,811 cases and patients who routinely carried out control at the Ubud Health Center 1 in the last 3 months (April to June) 2022 were 140 cases.

Treatment of hypertension is a continuous process, therefore the success of treating hypertensive patients is influenced by the patient's medication adherence (PERKI, 2015). Non-

compliance is the cause of therapy failure, this has an impact on worsening the patient's condition because complications and damage to organs will occur. Several studies have shown that lowering blood pressure reduces the risk of coronary heart disease by 20-25% and the risk of stroke by 35-40%. Non-adherence to medication is one of the causes of uncontrolled hypertension (Faselis, Doumas, & Papademetriou, 2016). The results of research conducted in 2019 in China said that adherence to hypertension treatment was 27.46% (Pan et al., 2019), while in Indonesia it is 59% (Tania, Yunivita, & Afiatin, 2019). Compliance with treatment is a major aspect in the healing process. In order for the healing process to be realized, it certainly requires cooperation between hypertension sufferers and their families. Family support is one of the factors that determine the level of patient compliance in carrying out the treatment process (Pamungkas, Rohimah, & Zen, 2020).

The family is the closest person who plays an active role in achieving the level of adherence and successful treatment of hypertension sufferers. If family support is not carried out properly, non-compliance will occur which can cause complications in people with hypertension (Trianni, 2018). In doing therapy, the family can be a very influential factor in blood pressure treatment programs. Continuous extension guidance and encouragement is usually needed so that the patient with hypertension is able to carry out an acceptable plan for surviving with hypertension and comply with the rules of therapy. (Yeni, Husna, & Dachriyanus, 2016). Research conducted by Dewi, Wiyono, & Candrawati, (2018) revealed that there is a relationship between family support and medication adherence in patients with hypertension, supported by research Kuna (2021) revealed that family support is related to adherence to therapy in hypertension sufferers, while different studies were obtained by Fitriyana & Muhlisin (2021) revealed that there was no significant relationship between family support and medication adherence.

2. METHOD

This research is an analytical study with a cross sectional approach on 103 people from a total population of 140 patients with hypertension. The sampling technique in this study used non-probability sampling with the consecutive sampling method. The instrument used was a questionnaire containing question items regarding family support and the level of adherence to the theory Morisky Medication Adherence Scale (MMAS-8). Data analysis technique used Spearman's rho test. The questionnaire used was a development of the questionnaire in previous research and adapted to the conditions of the respondents who were sampled in the research. The questionnaire has been tested for validity and reliability before being given to respondents. This research has received approval from the Bali ITEKES Ethics Commission with number 03.0590/KEPITEKES-BALI/XI/2022 and a research permit from the Gianyar Regency One-Stop Investment and Services Agency (DPMPTSP). with letter number 070/0591/IP DPM PTSP/2022.

3. RESULTS AND DISCUSSION

Results

Univariate analysis

Characteristics of Respondents

Table 1. Distribution of frequency characteristics of respondents at UPTD Puskesmas Ubud 1 (n=103)

Characteristics	Frequency (f)	Percentage (%)
Age		
46-55 years / early elderly	35	34.0
56-65 years / late old age	44	42.7
65 years-up to/old age	24	23.3
Gender		
Man	50	48.5
Woman	53	51.5
Education		

No school	0	0
SD	9	8,7
JUNIOR HIGH SCHOOL	51	49.5
SENIOR HIGH SCHOOL	37	36.0
College	6	5,8

Based on table 1 above shows that out of 103 respondents, the highest age group was 56-65 years old (late elderly) with 44 people (42.7%), most respondents who were female, namely 53 people (51.5%) and educational background. Finally, the most numerous were junior high school graduates, namely 51 people (49.5%).

a) Family support

Table 2. Frequency distribution based on categories of family support in hypertensive patients (n = 103)

Family support	Frequency	Percentage (%)
Not enough	3	2,9
Enough	41	39,8
Good	59	57,3

Based on table 2 above, it shows that most families provide good support to hypertensive patients as many as 59 respondents (57.3%) and families provide sufficient support to patients as many as 41 respondents (39.8%).

b) Medication Compliance Level in Hypertension Patients

Table 3. Frequency distribution by category of adherence about medication in hypertensive patients (n = 103)

Treatment Adherence	Frequency	Percentage (%)
Tall	27	26,2
Currently	31	30,1
Low	45	43,7

Based on table 3 above, it shows that the level of adherence of hypertensive patients undergoing treatment is still low, namely as many as 45 respondents (43.7%), while hypertensive patients who have a high level of adherence are only 27 respondents (26.2%).

Bivariate Analysis

Table 4. Relationship between family support and adherence to treatment of hypertensive patients (n = 103)

	r	p.s
Family support with adherence regarding the treatment of hypertensive patients	0.699	<0.001

Based on table 4 above, the results of the statistical test with Spearman (rho) showed that the p value was 0.001 ($p < 0.05$), then H_a was accepted, that is, there was a significant relationship between family support and adherence to treatment of patients with hypertension. This relationship is shown by the strength of the correlation ($r = 0.699$) which is included in the strong category (0.60 – 0.799) with a positive correlation direction (+), which means that the higher the family support, the higher the level of adherence to treatment of patients with hypertension.

Discussion

Family support

Based on the results of the study, it was found that out of 103 respondents to family support in hypertension patients, there were 3 people (2.9%) in the less category, 41 people (39.8%) in the sufficient category and 59 people (57.3%). This shows that most of the family support in hypertensive patients is in the good category. The results of the study found that family support for hypertension patients was in a good category because the family was very enthusiastic in encouraging their family members who were sick with hypertension and always providing support to their family members who were undergoing treatment programs at the puskesmas.

The family is the closest person who plays an active role in achieving the level of adherence and successful treatment of hypertension sufferers. If family support is not carried out properly, non-

compliance will occur which can cause complications in people with hypertension (Trianni, 2018). Family support is a process of relationship between family and social environment (Friedman, 2018). Family support is a process that occurs throughout life, the nature and type of social support varies at various stages of the life cycle. At all stages of the life cycle, family social support enables the family to function with a variety of intelligence and intelligence. As a result, this improves the health and adaptation of the family (Friedman, 2018). In doing therapy, the family can be a very influential factor in blood pressure treatment programs. Continuous extension guidance and encouragement is usually needed so that the patient with hypertension is able to carry out an acceptable plan for surviving with hypertension and comply with the rules of therapy. (Yeni et al., 2016).

The research results obtained are supported by research conducted by Dewi et al., (2018) which revealed that family support for patients with hypertension at the Dau Health Center in Malang Regency was 22 people (73.33%) in the good category, the results of a study conducted by Kuna (2021) who revealed that family support for Hypertension Sufferers in the Working Area of the Modayang Health Center was 48 people (51.1%) in the good category. Research conducted by Wahyu, Abi Muhlisin, & Kep, (2021) revealed that the family support for hypertension sufferers at the Kedungjajang Health Center in Lumajang Regency was mostly or as many as 52 people (77.6%) in the good category, while slightly different research results were revealed by (Fitriyana & Muhlisin, 2021) which revealed that most of the family support for hypertension patients at the Baki Health Center in Sukoharjo Regency or as many as 65 people (75.6%) were in the less category.

Compliance with treatment of patients with hypertension

Based on the results of the study, it was found that out of 103 people adherence to treatment in hypertension patients, 27 people (26.2%) were in the high category, 31 people (30.1%) were in the moderate category and 45 people (43.7%) were in the high category. low category. This shows that most of the treatment adherence in hypertensive patients is in the low category. The results of the study showed that most of the adherence to medication adherence in hypertension patients was in the low category because the patient felt that he had recovered if the complaints he felt had started to improve so that the patient felt no need to take medication and came to the puskesmas for treatment.

Compliance or obedience is the level of the patient carrying out the method of treatment and behavior suggested by the doctor, family, and even those closest to the patient. Hypertension patients are expected to be able to seek treatment and routine check-ups at the hospital every month and get the support of their family or those closest to them. Regular treatment can reduce complications that cause death and counseling is very important to prevent hypertension (RI Ministry of Health, 2018). Compliance in medication (medication compliance) is taking drugs prescribed by a doctor at the right time and dosage and treatment will only be effective if it complies with the rules for drug use. Treatment of hypertension is a continuous process, therefore the success of treating hypertensive patients is influenced by the patient's medication adherence (PERKI, 2015). Non-compliance is the cause of therapy failure, this has an impact on worsening the patient's condition because complications and damage to organs will occur. Several studies have shown that lowering blood pressure reduces the risk of coronary heart disease by 20-25% and the risk of stroke by 35-40%. Non-adherence to medication is one of the causes of uncontrolled hypertension (Faselis et al., 2016). Compliance with treatment is a major aspect in the healing process. In order for the healing process to be realized, it certainly requires cooperation between hypertension sufferers and their families. Family support is one of the factors that determine the level of patient compliance in carrying out the treatment process (Pamungkas et al., 2020). The results of research conducted in 2019 in China said that adherence to hypertension treatment was 27.46%, while in Indonesia it was 59%. (Tania et al., 2019).

The research results obtained are supported by research conducted by Kuna (2021) which revealed that adherence to therapy in patients with hypertension in the Working Area of the Modayang Health Center, mostly or as many as 53 people (56.4%) were in the non-adherent category and the results of research conducted by Wahyu et al., (2021) which revealed that the adherence to treatment of hypertension sufferers at the Kedungjajang Health Center in Lumajang Regency was mostly or as many as 37 people (55.3%) in the disobedient category, as well as research conducted by Fitriyana & Muhlisin, (2021) which revealed that the adherence to treatment of hypertensive

patients at the Baki Health Center, Sukoharjo Regency, the majority or as many as 59 people (68.6%) were in the non-adherent category. Meanwhile, slightly different research results were disclosed by Dewi et al., (2018) which revealed that the majority of adherence to treatment in patients with hypertension at the Dau Health Center in Malang Regency or as many as 23 people (76.67%) were in the obedient category.

Relationship between family support and adherence to treatment of patients with hypertension

Based on the research results, it was found that the correlation coefficient (correlation strength) was 0.699, the sig value (p value) was <0.001 and the direction of the correlation was positive (+). From these results it can be concluded that the value of $p = 0.000$ ($p < 0.05$) then H_a is accepted, which means that there is a significant relationship between family support and compliance with the treatment of hypertensive patients. This relationship is indicated by a correlation value of 0.699 which is included in the strong category (0.600-0.799), with a positive correlation (+) which means that the better the family support for hypertensive patients, the higher the medication adherence in hypertensive patients.

Family can be a very influential factor in blood pressure treatment programs. Ongoing counseling and encouragement is usually necessary so that hypertensive patients are able to implement an acceptable plan for surviving with hypertension and adhere to the regimen. (Yeni et al., 2016). Family support as a family coping in dealing with the problems of one of the family members, so that the family can increase enthusiasm and motivation to behave healthily. Families who provide good support and show a caring attitude to family members who suffer from hypertension have an important role in medication adherence (Pamungkas et al., 2020).

Research conducted by Dewi et al., (2018) revealed that there is a relationship between family support and adherence to treatment in patients with hypertension at the Dau Health Center in Malang Regency, supported by research Kuna (2021) revealed that family support is related to adherence to therapy in hypertension sufferers in the Working Area of the Modayang Health Center. Research conducted by Pamungkas et al., (2020) which revealed that there was a relationship between family support and medication adherence in hypertension sufferers in the Working Area of the Ciamis Health Center. Research conducted by Wahyu et al., (2021) who revealed that there was a relationship between family support and adherence to treatment for hypertension sufferers at the Kedungjajang Health Center, Lumajang Regency. Research conducted by Radiani (2018) which reveals that there is a relationship between family support and the quality of life of the elderly. Research conducted by Pamungkas et al., (2020) who revealed that there was a relationship between family support and adherence to treatment for elderly hypertension during the Covid-19 pandemic, while different studies were obtained by Fitriyana & Muhlisin, (2021) revealed that there was no significant relationship between family support and medication adherence.

4. CONCLUSION

Based on the results of the research that has been done, the following results are obtained: Most of the family support for hypertension patients was good, namely 59 respondents (57.3%). Compliance with treatment in most hypertensive patients was low, namely 45 respondents (43.7%). There is a significant relationship between family support and compliance with the treatment of hypertension patients at UPTD Puskesmas Ubud 1 ($<p=0.001$)

REFERENCES

- [1] Dewi, AR, Wiyono, J., & Candrawati, E. (2018). Relationship between family support and adherence to treatment in patients with hypertension at the Dau Health Center, Malang Regency. *Nursing News*, 3(1), 459–469.
- [2] Bali Provincial Health Office. (2022). Bali Provincial Health Profic, 1999(December), 1–6.
- [3] Faselis, C., Doumas, M., & Papademetriou, V. (2016). Common secondary causes of resistant hypertension and rationale for treatment. *International Journal of Hypertension*.

- [4] Fitriyana, V., & Muhlisin. (2021). Relationship between family support and patient motivation with adherence to treatment in hypertensive patients at the Baki Health Center, Sukoharjo Regency. *Journal of Nursing*, 1p.
- [5] Friedman, M. (2018). *Textbook of Family Nursing Research, Theory and Practice* (5th Edition). Jakarta: EGC.
- [6] Republic of Indonesia Ministry of Health. (2018). *Riskesdas 2018. Health Research and Development Agency*, 1–22.
- [7] Kun, RM (2021). Relationship between family support and adherence to a low-salt diet in hypertensive patients in the work area of the health center. *SCIENTIFIC JOURNAL OF HEALTH KARYA PUTRA BANGSA*, 3(2), 43–48.
- [8] Pamungkas, RA, Rohimah, S., & Zen, DN (2020). Relationship between family support and adherence to treatment in patients with hypertension in the working area of the Ciamis Health Center in 2019. *Galuh Journal of Nursing*, 2(1). <https://doi.org/10.25157/jkg.v2i1.3577>
- [9] Pan, J., Wu, L., Wang, H., Lei, T., Hu, B., Xue, X., & Li, Q. (2019). Determinants of hypertension treatment adherence among a Chinese population using the therapeutic adherence scale for hypertensive patients. *Medicine (United States)*, 98(27), 1–7.
- [10] PERKI. (2015). *Guidelines for the Management of Hypertension in Cardiovascular Disease*. Jakarta: Association of Indonesian Cardiovascular Specialists.
- [11] Radiani, Z. . (2018). The Relationship between Family Support and Quality of Life for Elderly People with Hypertension in the Work Area of the Mandalle Health Center, Pangkep Regency. *Journal of Linguistics*, 3(2), 139–157. <https://doi.org/10.18041/2382-3240/saber.2010v5n1.2536>
- [12] RISKESDAS. (2018). *Basic Health Research*. Jakarta: Health Research and Development Agency, Ministry of Health of the Republic of Indonesia, (Infectious Diseases), 103. <https://doi.org/10.1007/s13398-014-0173-7.2>
- [13] Smeltzer, SC, & Bare, BG (2017). *Brunner & Suddarth medical surgical nursing*. Jakarta: EGC.
- [14] Tania, T., Yunivita, V., & Afiatin. (2019). Adherence to Antihypertensive Medication in Patients with Hypertension in Indonesia. *International Journal of Integrated Health Sciences*, 7(2), 74–80.
- [15] Trianni, L. (2018). The Relationship between Education Level and Family Support on Medication Compliance in Hypertension Sufferers at the Ngaliyan Health Center in Semarang. *Journal of Nursing and Midwifery*, 1(3).
- [16] Wahyu, VL, Abi Muhlisin, SKM, & Kep, M. (2021). Relationship between Family Support and Adherence to Medication for Hypertension Patients at the Kedungjajang Health Center, Lumajang Regency.
- [17] WHO. (2020). *Health Statistics And Information Systems*.
- [18] Yeni, F., Husna, M., & Dachriyanus. (2016). Family Support Affects Compliance with Hypertension Patients. *Indonesian Journal of Nursing*, 19(3), 137–144.