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## FAMILY SUPPORT AND LOW-PURINE DIET COMPLIANCE IN PATIENTS WITH GOUT ARTHRITIS

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## **ABSTRACT**

Compliance with a low purine diet in gout arthritis patients is still low, caused by lack of understanding of the patient, difficulty in changing diet, limited access to low purine foods, and lack of family support, so that patients are at risk of experiencing recurrence and complications that can reduce quality of life. The purpose of this study was to identify the relationship between family support and compliance with a low purine diet in gout arthritis patients at the Peterongan Health Center, Jombang Regency. The study design used correlational analytics with a cross-sectional approach. The independent variable was family support, the dependent variable was compliance with a low purine diet. The population of gout arthritis patients with a sample of 48 respondents with a purposive sampling technique. Data collection using a questionnaire. Statistical analysis using the Spearman Rho test. The results of the study showed a relationship between family support and compliance with a low purine diet in gout arthritis patients with ap value of 0.000. The family has an important role in encouraging compliance with a low purine diet in gout arthritis patients, the results of the study showed that aspects of instrumental and emotional support were very necessary.

Keywords: Family Support, dietary compliance, gouty arthritis

### Introduction

Disease No infectious diseases (NCDs) in particular disease degenerative is problem health in Indonesia that requires attention strong Because problem This Keep going increase (Mugi Wahidin, Rozana Ika Agustiya, 2022). One of the disease many degenerative suffered is sour gout arthritis or sour tendon is condition Where happen improvement level sour tendon in blood >7 mg/dl in men and >6 mg/dl in women (Naviri, 2019). Uric acid or gout arthritis is one of the type inflammation of the joints caused by the accumulation of crystal sour tendon so that causing pain that is not unbearable, swelling and burning sensation in the joints (Indonesia, 2018). This is generally caused by non-compliance to pattern eat something that is not balanced (content) food tall purine).

Prevalence The incidence of gout in Indonesia ranges from between 1.6 to 13.6 per 100,000 people or around 11.9% (Riskesdas Team, 2018) . In East Java, the results Health Service research (2018) showed 0.8% of 4,683 respondents suffer sour veins , with The prevalence is 1.7% in women and 0.05% in men . According to the Jombang Health Service (2018) amount visit sufferers sour tendon increase from 1,245 in 2017 to 1,507 in 2018 2018 . That matter show that number incident disease joints in East Java, especially in the Regency Jombang , still Enough high . Based on studies introduction at the Community Health Center Peterongan Regency Jombang In May 2024, the number of gout sufferers or gout arthritis reached 90 sufferers .

Diet management in patients *gouty arthritis* is something not quite enough the answer that must be executed during his life to make level sour tendon within normal limits (Mulia Nasari, Teuku Samsul Bahri, 2022). Compliance against acidic diet tendon is part from primary prevention of something disease, obedient For carry out method the treatment given, reduces intake high food purine so that help control production sour veins by the body (Saputra, 2018).

In case gouty arthritis need get great support from family especially those related to with nutrition , condition psychological , social stigma so that existence support family patient motivated For adhere to a diet. In addition support from family too play a role in increase compliance towards the medical program undertaken by the patient . Support family covers internal support , such as from husband , wife , child , or brother , who plays a role in help guard health family (Andriyanto Dai, Sigit Mulyono, 2020) . Based on background behind on writer want to do study about connection support family with low dietary compliance purine in patients gouty arthritis

## Methods

Research design in study This is quantitative with method cross-sectional. Population in study This is All over People suffering from Gout Arthritis at the Community Health Center Peterongan Regency Jombang with total of 90 patients . Sample in study This is part part from sufferers Gout Arthritis that fills or represent population. Samples were taken with fulfil criteria Inclusion and exclusion. Inclusion criteria from study This is Criteria inclusion from study This is All patient gout arthritis sufferers who are in the work area Community Health Center Peterongan Jombang, patients who are willing become respondents, as well as gout arthritis sufferers who live together family . whereas criteria exclusion from study This is Patients who experience condition emergency, such as a stroke, or who is in condition critical based on medical diagnosis results and Patients who withdrew self become respondents research. Number samples in research This is 45 patients gout arthritis. The sampling technique used in study This is purposive sampling. Variable free from research This is support family. Variable tied to research family is low dietary compliance purine in gout arthritis patients . Data collection techniques in this study This use questionnaire This load drafted statement based on theory support family, including instrumental, informational, reward, and emotional support. In addition, the questionnaire this also includes statement about group food that is not recommended and necessary limited and there is amount prohibited foods that should be limited. Research has ethical test conducted no. 0124090560/KEPK/STIKES-PEMKAB/JBG/IX/2024

### Results

## a. Univariate Analysis

Based on the results of univariate data analysis, the following data were obtained:

Table 1 Distribution Frequency Characteristics general Respondents at the Community Health Center Peterongan Regency Jombang

General Data	f	(%)
Age		
<25 years	0	0
26-40 years	4	8.33
>40 years	44	91.67
Amount	48	100
Gender		
Man	6	12.5
Woman	42	87.5
Amount	211	100
Work		
Farmer	12	25
Housewife	12	25
Doesn't work	23	47.92
Private	1	2.6
Amount	48	100
Education		
No school	6	12.5
Elementary (Elementary, Middle School)	35	72.9
Middle School (SMA)	7	14.6
Amount	48	100

Table 1 Research results show that majority respondents aged over 41 years (91.67%), most of them big various sex women (87.5%), almost half of it No working (47.9%), and some big own education final level school basic (54.17%).

## b. Bivariate Analysis

Based on the results of bivariate data analysis, the following data was obtained:

**Table 2** Distribution Frequency Characteristics Respondents Based on support family at the Community Health Center Peterongan Regency Jombang

Support family	f	0/0
Support Good	30	62.5
Support bad	18	37.5
Total	48	100.0

Table 2 shows that the majority of 30 (62.5%) respondents have good support.

**Table 3** Frequency Distribution of Characteristics Respondents Based on low diet compliance purine at the Community Health Center Peterongan Regency Jombang

Low Purine Diet Compliance	f	9/0		
Obedient	31	64.58		
Not obey	17	35.42		
Total	48	100.0		

Based on Table 3. show that the majority of 31 (64.58%) compliance respondents on a low-calorie diet purine is obedient .

Table 4 Cross Tabulation of Respondents Based on Support Family with Compliance with a Low Purine Diet in Gout Arthritis Patients at a Community Health Center Peterongan Jombang Regency

Support family		Low dietary compliance purine					
	O	Obedient		Not obey		Total	
	f	0/0	f	0/0	f	%	
Support Good	25	83.3	5	16.7	30	100.0	
Support bad	6	33.3	12	66.7	18	100.0	
Total	31	64.6	17	35.4	48	100.0	

Table 4 shows that part big from all over respondents as many as 30 people have low dietary compliance purine and support good family with percentage 64.6%.

#### Discussion

## a. Family Support for Gout Arthritis Sufferers at the Peterongan Community Health Center, Jombang Regency

Based on the data obtained from research in table 2 shows that almost all over respondents with the number of 30 people has support good family with presentation by 62.5%.

Sufferer sour tendon need get great support from family especially those related to with nutrition , condition psychological , stigma in society , so that existence support family patient motivated For adhere to a diet. According to Imanuel Sri Mei Wulandari (2021) Support family is attitudes and actions reception from member family to member family others , which include support informational , assessment , instrumental, and emotional .

According to researchers, support family is aspect important in life a gout arthritis sufferers. Family become party the closest one that is not can separated from sufferers *Gout Arthritis*, especially in situations that require attention and support emotional support This give influence positive on mental and psychological conditions sufferers, as well as capable create comfortable and peaceful atmosphere for they. With existence continued support continuously from family, sufferer *Gout Arthritis* will feel own strength addition For undergo treatment and care pattern Eat his.

# b. Compliance with a Low Purine Diet in Gout Arthritis Patients at the Peterongan Community Health Center, Jombang Regency

Based on the data obtained from research in table 3 shows that almost all over respondents with the number of 31 people has attitude adhere to a low-calorie diet purine with percentage 64.58%. Research results show that patient has adhere to the recommended diet.

In a way theory, one of the method management for sufferers *Gout Arthritis* is with consume drug reducer sour tendon however, things the No can separated from compliance sufferers to a low-calorie diet sour tendon (Indonesia, 2018). According to researchers, compliance to a low-calorie diet purine in patients sour veins are very influential control level sour tendon in body. The right diet can help prevent recurrence and complications more carry on from disease This is at the Community Health Center Peterongan, Regency Jombang, acid diet compliance tendon reflected from experience gout arthritis sufferers who avoid food tall purine For prevent relapse. Family closest give prohibition For No consume food tall purine, and sufferers comply prohibition This based on experience if consume foods that are rich in purines, such as meat, offal and nuts, then what will happen is relapse of acid veins. This is supported by research previously mentioned that sufferers sour tendon fond of consume offal, in the form of heart chicken / beef and chicken intestines and vegetables green (Sabrawi *et al.*, 2022).

## c. The Relationship Between Family Support and Uric Acid Diet Compliance in Gout Arthritis Patients at the Peterongan Community Health Center, District Jombang

Based on the data in Table 4 it is known that that support family in category Good obtained as many as 30 respondents (100%). Most of them respondents show compliance to a low-calorie diet purine , namely as many as 25 respondents (83.3%). Meanwhile that , some small respondents , 5 people (16.7%), no obedient to a low-calorie diet purine . Based on Spearman Rank statistical test results , obtained that study This show results that lead to direction positive with probability value by 0.000 which is far more small from level significance of 0.05 (p <  $\alpha$ ) indicates that H0 is rejected and H1 is accepted . This is indicates existence connection between support family with low dietary compliance purine in patients *Gout Arthritis* at the Community Health Center Peterongan , Regency Jombang .

In accordance existing theories that one of form prevention height level sour tendon is with apply pattern life Healthy that is with control food consumed with a low-fat diet purine (Purwandari, 2022). Compliance against acidic diet tendon is component important in effort primary prevention of disease said, with adhere to the diet that has been determined, individual can follow treatment given and reduction consumption foods that contain purine tall can help control production sour tendon in body (Fitriani *et al.*, 2021). Support family own significant benefits for sufferers sour tendon in on a diet. With support optimal family, sufferers become more conscious and orderly in undergo the required diet.

According to researchers connection between support family with low dietary compliance purine in patients *Gout Arthritis* is very closely related to support . family play a role as the main motivator for sufferers For still discipline operate pattern recommended meals . Of the four factor support family , instrumental and emotional support often becomes the most dominant . This is caused by the role family in give help real , like prepare food according to diet, as well as feeling accepted and understood , which can increase trust self sufferers For adhere to the diet . Findings This can made into base as nurse For always involving family in give education to gout arthritis patients , as results study previously stated that support family and society are also very much needed in efforts to treat gout arthritis (Hariyanto, Nafolion Nur Rahmat, 2023) .

### Conclusion

Support family to Gout Arthritis sufferers at the Community Health Center Peterongan part big good , with 62.5% of respondents accept support good family . Compliance to a low-calorie diet purine is also high , with 64.58% of respondents compliant . Based on statistical tests *Spearman rank* obtained mark significant 0.000 (p < 0.05), so there is significant relationship between support family and low dietary compliance purine in patients *Gout Arthritis* .

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