

The Effectiveness Of Soursop Leaf Decoction On Decreasing Uric Acid Levels At AdowHealth Centre

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ABSTRACT

The Excessive of uric acid levels can cause the sedimentation process of uric acid crystals it can cause the gout. The antioxidant in soursop leaves is effective to slowdown and also prevent the gout. The purpose of this study is to find out the effect of soursop leaf decoction on reducing uric acid levels in the work area at UPTD Adow Health Centre. The research method use the Quasy Experiment, with a one group pre-post test method . The samples in this study taken 15 respondents by the total sampling techniques. The research instruments use an uric acid level checking and observation sheets. Then the data collected processed by Friedman's Statistical Test. Findings , the friedman statistical test results obtained a p value = 0.001 with a significance of < 0.05. The conclusion is giving soursop leaf decoction is effective on reducing uric acid levels in the working area at UPTD Adow Health Centre. It is hoped the decoction of soursop leaf can be useful as alternative medicine to lower the uric acid levels.

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1. INTRODUCTION

Sour tendon is results from metabolism purine, If rate sour tendon in the blood is high then it will happen buildup crystal sour tendon And can attacked disease sour tendon (Ervi, 2017) . Sour Tendon happen Because exists precipitate monosodium tendon or sour tendon Which piled up in in joints as consequence excess rate sour tendon in in blood/hyperuricemia (Sangging et al., 2017).

Rate sour tendon in limit normal in women ranges from 2.4-5.7 mg/dl, in men males range from 3.4-7.0 mg/dl, and in children child 2.8-4.0 mg/dl (WHO, 2017).

According to data from World Health Organization (WHO, 2017) , prevalence of acid urate worldwide as much as 34.2%. sour tendon more often happen in country proceed like America.

Prevalence of gout in America as big 26.3% from total resident. Enhancement incident Sour Tendon No only happens in developed countries just. However, enhancement Also happen in country develop, Wrong only one in Country Indonesia (Kumar & Lenert, 2016). The prevalence of uric acid in Indonesia is increasing experience enhancement. On year 2017 incident Sour Tendon as big 11.9% (Ministry of Health RI, 2017).

Based on Research Health Base (Riskesdas) 2018 state that prevalence Which suffer disease sour tendon in Indonesia the highest that is Bali Which reach 19.3%. In Sulawesi North is also one of the prevalence the highest uric acid sufferers reached 10.3%. Prevalence of gout in East Java as big 17%, prevalence sour tendon in Surabaya 56%. It is known that in 516 sufferer, 60% experience attack sour tendon I First about thumb foot, knee And elbow 4-13%. kindly non pharmacological that is with therapy complementary or use alternative therapy for gout treatment using soursop leaf water decoction. Leaf Soursop in the form of plants is easy to get as well own utility start from the roots until on the fruit, leaf soursop can kill poisons in the body that nature capable slow down or prevent process oxidation molecule other, as well as contain solution flavonoids inside including Also solution phenolic natural Which potential for antioxidants and have bioactivity as lowering rate sour tendon Which excessive. content antioxidants possessed by soursop leaves can eliminate the formation of uric acid through obstacle product enzyme xanthin oxidase .

It is known that there is an effect of giving decoction leaf soursop to decrease a rate sour region vein Work UPTD Adow Health Center

2. METHOD

In study This use *quasy-Experiment*. With design *One Group Pre-Post test design*, sample amount 47 respondents with *total sampling technique sampling* Which fulfil criteria inclusion 15 respondents, this research was conducted on date 10-19 June 2022 with use Tool inspection rate sour tendon And sheet observation, before done intervention shared *informed consent* especially formerly to respondent For explain Meaning and research objectives, then letters were distributed agreement respondent Which Approved And signed by respondent, furthermore check the respondent's uric acid level before intervene later after it is done intervention and inspect return rate sour tendon respondent fill in data patient sheet observation using a code number or initials just for guard secrecy respondents should truly guaranteed safe by researcher, And after intervention for 7 days of data the processed use test statistics *freadman*.

3. RESULTS AND DISCUSSION

Table 1. Distribution frequency respondent Based on age, education And work in the region Work UPTD health center ouch (n=15).

Characteristics	_Number of Respondents	
	<i>Frequency (n)</i>	<i>Percent (%)</i>
Age		
45-54 Year	11	73.3
55-65 Year	4	26.7
Total	15	100.0
Education Final		
SD	8	53.3
JUNIOR HIGH SCHOOL	6	40.0
SENIOR HIGH SCHOOL	1	6.7
Total	15	100.0
Work		
Farmer	11	73.3
Private	4	26.7
Total	15	100.0

Table 2. Distribution Frequency Based on Decline Rate Sour Tendon Before And After Given Stew Leaf Soursop In Region Work UPTD Puskesmas Ouch (n=15).

Variable	TIME MEASUREMENT						
	H1			H4		H7	
	n	mean	min-max	mean	min-max	mean	min-max
before	1	12.	10.7-	11.0	9.3-	9,473	8.4-
	5	380	14.0	53	12.7		10.7
after	1	12.	10.4-	10.8	9.1-	8,373	7.5-
	5	133	13.8	20	12.4		10.4

Table 3. Results Analysis Influence Giving Stew Leaf Soursop To Decline Rate Sour Tendon In Region Work UPTD Public health center Ouch (n=15).

Variable	TIME MEASUREMENT						
	H1			H4		H7	
	Mean±S	D	Mean±SD	Mean±SD	P Value	n	χ ² d f

before	12.380 ± 1.0949	11053 ± 1.0169	9,473 ± 0.001 0.8075	1 5	
					75.0
after	12.133 ± 1.1280	10,820 ± 0.9951	8,373 ± 0.7314 0.001	1 5	5

Based on Table 1. Distribution frequency respondent based on age Which the most namely 45-54 years with 11 respondents (73.3%). While the least is the age of 55-65 year with 4 respondent (26.7%).

Distribution frequency respondent based on education last Which the most is education SD with 8 respondent (53.3%), The second most recent education is junior high school with 6 respondent (40.0%) And education Which most A little is SENIOR HIGH SCHOOL with 1 respondent (6.7%).

Distribution frequency respondent based on most jobs are working as farmers with 11 respondents (73.3%) and dayng at least work as a private sector with 4 respondent (26.7%).

Based on Table 2. From 15 respondent Rate sour tendon on day First before given soursop leaf decoction was on average average 12.380 with a minimum value of 10.7 and value maximal 14.0 whereas after given stew leaf soursop rate sour tendon average 12.133 with mark minimum 10,4 And mark maximal 13,8, Rate sour tendon on day to four before given stew leaf soursop average 11,053 with value at least 9.3 And the maximum value is 12.7 while after being given stew leaf soursop rate sour tendon average 10,820 with mark minimum 9,1 And mark maximal 12.4, and on the seventh day before given stew leaf soursop average 9,473 with a minimum value of 8.4 and a maximum value of 10.7 whereas after given stew leaf soursop rate gout average 8.373 with mark minimum 7,5 And mark maximal 10,4.

Based on Table 3. From 15 respondent rate sour tendon on day First before given soursop leaf decoction obtained value mean 12,380 with standard deviation 1.0949 whereas after given stew leaf soursop rate sour tendon obtained mark mean 12.133 with standard deviation 1.1280, rate uric acid on the fourth day before administration stew leaf soursop obtained mark mean 11.053 with a standard deviation of 1.0169 meanwhile after given stew leaf soursop rate uric acid obtained a mean value of 10.820 with standard deviation of 0.9915 and uric acid levels at day to seven before given stew leaf soursop obtained mark mean 9,473 with standard deviation 0.8075 whereas after given soursop leaf decoction uric acid levels obtained mark mean 8.373 with standard deviation 0.7314. Rate gout before And after being given a decoction of soursop leaves is given the value of $P = 0.001$ is smaller than $\alpha = 0.05$ where means the hypothesis H_a : accepted or exist influence in giving soursop leaf decoction to a decrease in uric acid levels in the region Work UPTD Puskesmas Ouch.

DISCUSSION

Based on the frequency distribution data obtained that, things Which can affecting uric acid is the age factor basically part big respondent Which experience sour tendon that is 45-54 year. Matter the like Which disclosed by Agromedia (2015), that naturally men man aged 30 year to the top very easy attacked by gout due to levels uric acid in men is quite high. From data- data the can explained that age including factors risk the cause disease sour tendon. The more increase age somebody can experience change Which happen in in body Wrong only one change physique, height rate sour tendon caused by kidney function due to kidney is no longer able to remove purines with Good so that happening accumulation purine continuously.

Besides factor age as for factor education Which affect enhancement uric acid levels, basically most of it respondent sufferer sour tendon that is with last education Elementary School (SD), level education can influence knowledge somebody, education is process change attitude And knowledge somebody or bunch person in business human maturity through training efforts And teaching, low level education so will followed by decline degrees health somebody because knowledge Which Enough somebody do prevention against disease sour tendon (Natimin, 2016).

Factor Which final that is Work, Where work can influential on increase rate sour tendon, on basically part respondent sufferer sour tendon that is with work as a farmer, crystallization sour

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tendon caused by burden Work And time Which Enough long as well as exposure hot sun moment Work, If compared to with workers who are not exposed to heat, then the risk happening uric acid crystals in workers Which Work in temperature hot.

This is supported by the theory of Ilyas 2017, Which mention that enhancement rate uric acid in the blood caused by activity physique because production lactic acid during activity especially activity physique Which heavy. After done intervention during 7 day from 15 respondent obtained There is 14 response Which rate sour the vein decrease in a manner drastic on day to 7, Then There is 1 respondent on day to 7 experience decline rate sour Which Still low respondent the aged 60 year, according to researcher matter the influenced by system Work body Which the more decrease, in line with study Which done by Linda k. Romadhani, Endang Yuswatiningsih, Augustine Maunaturrohmah (2022), with title "Influence Giving Water Stew Leaf Soursop To Rate Sour Tendon On elderly", revealed that factors that influence enhancement rate sour tendon on every person different.

Age related with improvement rate sour tendon, elderly will experience change physique that is decline function kidney Which resulted increasing rate sour tendon Because kidney No capable remove purines properly so it happens deposition Keep going continuously. Matter This supported by theory Suiraka (2015), that process aging will result disturbance on enzyme urikinasase so happen obstruction expenditure sour tendon, so that sour tendon in blood will go on (Suiraka, 2015). with drink stew leaf soursop can lower rate uric acid because soursop leaf own content acetogenin And compound phenolic which is responsible as antioxidants. Compound phenolic Which own High antioxidant activity are flavonoids. Characteristic antioxidants on leaf soursop Can slow down And prevent process happening sour tendon with process hinder Work enzyme xhatine oxidase Which role For change hypoxhatine become xhatine And Then sour tendon (wijaya 2016) .

Matter This strengthened by researcher Moh. Nur, Anggeria O. Denta, and Kuzzairi (2019), with research title "Effective Soursop Leaf Decoction Reducing Uric Acid Levels in Sufferers gout Arthritis In the village Lawang Power Regency Pamekasan". Design study This is pre-experimental with "one group pre test designs", in study This that administration of soursop leaf decoction is proven effective in reducing uric acid levels in sufferer gout arthritis .

Based on research Which done by Isti Komariah, Bahrul Ilmi, and Akhmad Rizani (2018), with title study "Influence Stew Leaf Soursop To Decline Uric Acid Levels in the Blood in Takisung Village Subdistrict Takisung Regency Land sea". The researcher revealed that there is decrease in uric acid levels before and after Giving soursop leaf decoction is caused by active substance in soursop leaves ie alkaloids and flafonoid Which can lower rate sour tendon. As for journal other from Journals of Chemical and Pharmaceuticals Researcha (2017), state that leaf soursop Also can be used as an anti-uric acid with method made tea black. Then American Journal of Bioscience and Bioengineering (2018), say that it turns out fruit soursop own content Which The same like leaf Soursop like flavonoids which can reduce rate sour tendon. Matter This in line with study Which done by Ikafah (2017). show that gift stew leaf soursop as much 10 sheet And size Which 10-11 cm long and 4-5 cm wide lower acid level tendon.

4. CONCLUSION

There is influence decline giftstew leaf soursop in region Work UPTD Public health center Ouch.

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