

Ambon Banana as an Alternative of Postpartum Blood Pressure Problems

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Abstract: ***Introduction:** Maternal death is one of the health problems that must be the concern of the world community. Hypertension or high blood pressure is systolic pressure of more than 140 mmHg and diastolic blood pressure is more than 90 mmHg. To reduce hypertension in postpartum mothers, treatment is needed in accordance with government programs and complementary development. Treatment of hypertension in postpartum mothers aims to prevent the occurrence of complications through pharmacological and non-pharmacological treatment. **Methods:** A Quasy experiment research design with a design with a sample of 20 postpartum mothers who met the inclusion and exclusion criteria in the intervention group given ambon bananas @ 200 grams for 4 days and the control group given POR (Drug Use Rational) with Consecutive sampling technique which is cluster random method. Analysis using independent t-test and different test using paired t test. **Results:** There was a decrease in blood pressure in the intervention group of 27.90 ± 6.95 ($p = 0.000$) and the control group of 21.80 ± 6.94 ($p = 0.000$) as evidenced that Ambon banana can increase potassium levels. The way potassium works can inhibit angiotensin I to become angiotensin II so that the blood vessel muscles experience relaxation. There was a significant increase in potassium levels in the intervention group ($p = 0.000$) and the control group ($p = 0.001$). **Conclusion:** The provision of additional food for ambon banana has the potential as an alternative to lowering blood pressure and increasing postpartum maternal potassium levels so that it can be applied in the provision of Post Natal Care (PNC) midwifery care.*

Keywords: postpartum hypertension, blood pressure, potassium level

1. Introduction

Maternal death is one of the health problems that must be the concern of the world community. The three main causes of maternal death are still dominated by hypertension, bleeding and infection. Hypertension or high blood pressure is systolic pressure of more than 140 mmHg and diastolic blood pressure is more than 90 mmHg. [1] Hypertension is a multifactorial disease that arises because of the interaction of various factors. This, hypertension is one of the most dangerous causes of bleeding and infection.[2]

2. Literature Survey

Postpartum hypertension plays a major role in perinatal morbidity and mortality. Mothers who experience hypertension in postpartum after up to two thirds are diagnosed with preeclampsia and eclampsia.[3] Postpartum hypertension is a rare condition that occurs when a mother has high blood pressure and excess protein in urine immediately after delivery.[4] Hypertension in postpartum mothers is still the subject of many studies to understand its etiology and correct detection of its management.[5]

To reduce morbidity and mortality in postpartum mothers with hypertension, treatment is needed in accordance with government programs and complementary development. Treatment of hypertension in postpartum mothers aims to prevent the occurrence of complications through pharmacological and non-pharmacological treatment.[6]

3. Methods/Approach

This type of research uses a quasi-experimental design. Two groups were divided into treatment and control groups with a total of 20 respondents. Observations were made for 4 days through a series of observations in the pre-test (0 days), Observation of home visits on day 1, second day home visits and posting tests on the third day. Adaptation model as a format for assessing the observation of postpartum hypertension and the potassium level check sheet. Research ethics is informed consent, anonymity, confidentiality and honesty. Ethical approval was obtained from the Ethics Committee for Health Research at the University of Sultas Agung Semarang

4. Result

4.1 The difference in mean systolic blood pressure of postpartum hypertensive mothers before and after treatment in the intervention group was greater than the control group

The results of the analysis of systolic blood pressure of postpartum hypertensive mothers in the intervention group obtained p value of 0.000, meaning that there was a significant change in systolic blood pressure after treatment so that there was an effect of the addition of ambon bananas to changes in systolic blood pressure before and after treatment.

The results of the analysis of systolic blood pressure of postpartum hypertensive mothers in the control group obtained p value of 0.000 means that there was a significant change in systolic blood pressure after treatment so that there

was an influence of anti-hypertensive drugs on changes in systolic blood pressure before and after treatment.

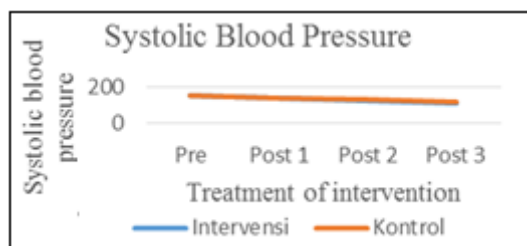


Figure 1: The difference in mean systolic blood pressure

The difference in mean systolic blood pressure in postpartum hypertension mothers in both groups was a significant difference before and after treatment in the intervention and control groups was measured 4 times. The results of the mean measurement of systolic blood pressure was found to be the difference in mean systolic blood pressure in the intervention group was greater than the control group. Ambon Banana is efficacious as anti-inflammatory and lowers high blood pressure. Ambonese bananas are easily available, at affordable prices, and there are no side effects.[7]

4.2 The difference in mean systolic blood pressure of postpartum hypertensive mothers before and after treatment in the intervention group was greater than the control group

The results of the analysis of diastolic blood pressure of postpartum hypertensive mothers in the intervention group obtained p value of 0.000, meaning that there was a significant change in diastolic blood pressure after treatment so that there was an effect of the addition of ambon bananas to changes in diastolic blood pressure before and after treatment.

The results of the analysis of diastolic blood pressure of postpartum hypertension mothers in the control group obtained p value of 0,000 means that there is a significant change in diastolic blood pressure after treatment so that there is an influence of anti-hypertensive drugs on changes in diastolic blood pressure before and after treatment.

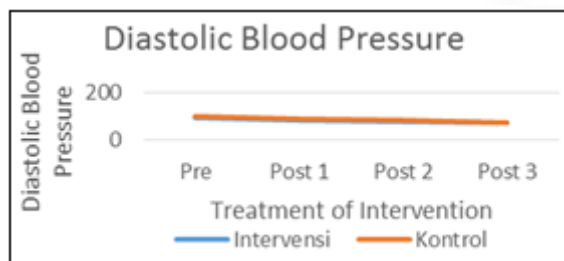


Figure 2: The difference in mean diastolic blood pressure

The difference in mean diastolic blood pressure in postpartum hypertension mothers in both groups was a significant difference before and after treatment in the intervention and control groups was measured 4 times. The results of the mean measurement of diastolic blood pressure was found to be the difference in mean diastolic blood pressure in the intervention group was greater than the control group. Banana fruit is rich in potassium, potassium is

useful for the body to control blood pressure, as a high blood therapy, and cleanse carbon dioxide in the blood.[8]

4.3 The average difference before and after the administration of Ambonese bananas and anti hypertensive drugs in increasing the cal levelium in post partum mothers with hypertension

The average difference in potassium levels in postpartum hypertension mothers in both groups there were significant differences before and after treatment in the intervention group and the control group with p value <0.05. The average results of the measurement of potassium levels found a mean difference in potassium levels in the intervention group was greater than the control group.

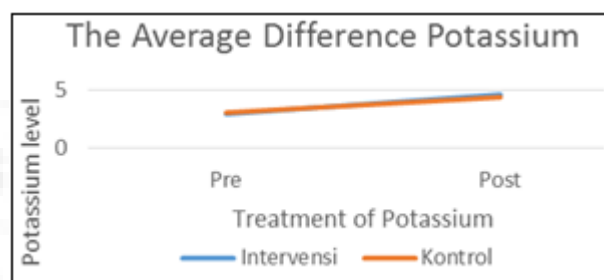


Figure 3: The average difference of potassium

The difference in the value of potassium maternal postpartum hypertension in the intervention group and control group obtained p value 0.622 means that in both groups there was no significant difference p value > 0, 05 so it can be concluded that in both groups the same difference.[9] Ambon banana is good for women who are experiencing postpartum hypertension because it has a high amount of potassium.[10]

5. Conclusion

Supplementary feeding on Ambonese banana has the potential as an alternative to lowering blood pressure and increasing postpartum maternal potassium levels so that it can be applied in the provision of PNC midwifery care

6. Future Scope

One of the factors that influence the increase in blood pressure of postpartum hypertensive mothers is that food is only subjectively controlled by only asking respondents the criteria for maternal abstinence during the study.

7. Other Recommendations

Can do research similar to the number of respondents even worse and intervene giving ambon bananas with a variety of doses so that the dose will be more maximal which is more effective. Further research is expected to be able to control factors that affect blood pressure

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