

**EFFECTIVENESS OF MEDICATED WATER (NEEM) VS LUKEWARM WATER ON VAGINAL INFECTIONS AMONG MARRIED WOMEN.****Buvanambiga. K**

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**Abstract**

Quasi experimental (Pretest and Post test with two groups comparison without control) design was adopted to compare effectiveness of Medicated water (Neem) Vs Lukewarm water on Vaginal infections in the study. The investigator screened 198 married woman between the age group of 15 to 45 years of which 60 married women were selected by non probability purposive sampling technique. Thirty married woman between the age group of 15 to 45 years from Attavanai, Poolavari community were selected for experimental group I and 30 married woman between the age group of 15 to 45 years from Agraharam Poolavari community were selected for experimental group II. Pretest was conducted for both the groups using checklist. Selected women were given medicated water (Neem) in experimental group I and luke warm water in experimental group II for washing perineum thrice a day for 10 days. Post test was done for both the groups by using same tool. During pre test, in experimental group I, majority (60 %) had mild and 40% had moderate vaginal infections. In experimental group II majority (66.67 %) had moderate and 33.33% had mild vaginal infections. During post test in experimental group I, majority (66.67 %) had no infection and 33.33% had mild vaginal infections. In experimental group II the highest percentage of married woman between the age group of 15 to 45 years (86.67 %) had mild vaginal infections, 10% had moderate vaginal infections, however 3.33 % had no infection. Significant difference was found between the effectiveness of medicated water (Neem) and luke warm water in reducing vaginal infections ( $p < 0.05$ ). The medicated water (neem) has higher effect in reducing the infections.

**Key words:** Medicated water (neem); Lukewarm water; Vaginal infections , married women

**Introduction**

Reproductive tract infections (RTI) are major public health problems among women especially in developing countries. Women tend to suffer more because of the synergistic effects of infection, malnutrition and reproduction. Failure to provide effective treatment for

these infections can lead to continue spread of diseases.<sup>4,12</sup>

Reproductive tract morbidity is high among women in developing countries resulting in consequences on health and social wellbeing of women. Majority of women in India continue to suffer from reproductive tract infections resulting into

pelvic inflammatory diseases, salpingitis, pelvic adhesions, infertility, cervical cancer and chronic pelvic pain. Although early detection and treatment of RTIs can prevent and minimize the severity of long-term sequel many infections go unnoticed. Utilization of specialized services for the management of RTIs is often low because these infections are frequently asymptomatic or produce vague, non-specific symptoms, as 50% chlamydia and gonorrheal infections among women remain asymptomatic. Low female literacy rate and consequent low level of awareness lead to poor understanding of sexual and reproductive health. Further, the socio cultural norms, values and taboos also withhold the women from seeking health care for RTIs.<sup>1,5</sup>

Reproductive tract infections (RTI), including both sexually transmitted infections (STIs) and non-sexually transmitted infections (non-STIs) of the reproductive tract are responsible for major ill-health throughout the world.<sup>2</sup>

In India alone 40 million new cases emerge each year. Majority of women continue to suffer from RTIs leading to complications, such as pelvic inflammatory disease (PID), infertility,

cervical cancer, post abortion, and puerperal sepsis, chronic pelvic pain, and ectopic pregnancy.<sup>7</sup>

RTIs in many cases are asymptomatic among women, making their detection and diagnosis difficult. An effort has been made in this regard to detect RTI cases among the women in the field practice area of Urban Health Training Centre (UHTC), Hubli, and Karnataka.<sup>9</sup>

Vulvovaginal candidiasis is one of the most common causes of vaginal discharge. It is also referred to as yeast, monilia and a fungal infection. It is not considered as STI, because candida is a normal constituent in the vagina and becomes pathologic only when the vaginal environment becomes altered. An estimated 75% of women will have at least one episode of vulvovaginal candidiasis and 40% to 50% will have two or more episodes in their lifetime.

Bacterial vaginitis is associated with having multiple sex partners, douching and lack of vaginal lactobacilli. Researchers suggest that bacterial vaginitis is associated with preterm labor, chorioamnionitis, postpartum

endometritis and pelvic inflammatory disease.<sup>2,8</sup>

Women often seek medical care for vaginal complaints many times; The cause of the complaint is misdiagnosed by the women and or her vaginal infection, bacterial vaginosis, trichomoniasis, and vulvovaginal candidiasis.<sup>13,14</sup>

### Objectives

1. To assess the vaginal infections among married women in experimental group I and II.
2. To compare the effectiveness of medicated water (Neem) and lukewarm water on vaginal infections among married women in experimental group I and II.
3. To associate the pretest scores on vaginal infections with their selected variables among married women in experimental group I and II.

### Hypotheses

H<sub>1</sub> -There will be a significant difference in the vaginal infections between the experimental group I and experimental group II after the administration of medicated water (Neem) and lukewarm water ( $p < 0.05$ )

### Effectiveness of Medicated water Vs Lukewarm water on Vaginal infections

H<sub>2</sub>: There will be a significant association between the pretest scores on vaginal infections among married women and their selected demographic variables in the experimental group I and experimental group II ( $P < 0.05$ )

### Methodology

A quasi experimental study was conducted to evaluate the effectiveness of medicated water (Neem) versus lukewarm water on vaginal infections among married women at selected community, Salem. Experimental approach (Pretest and Post test with two group comparison design) was adopted for this study. The investigator screened and selected 60 married woman between the age group of 15 to 45 years out of 198 married women by using vaginal pH colour fast indicator stick. Non probability purposive sampling technique was used to select the sample. Those who had mild and moderate vaginal infections were selected by using checklist on sign and symptoms of vaginal infections. Those who had severe infections were excluded. Out of 60 married woman between the age group of 15 to 45 years,

30 women from Attavanai, Poolavari community were selected for experimental group I and 30 women of Agraharam Poolavari community were selected for experimental group II. The instruments used are medicated water, lukewarm water. Check list on symptoms of vaginal infections was used as a tool for collection of data. Tool was administered after testing its validity and reliability through test retest method ( $r=0.98$ )

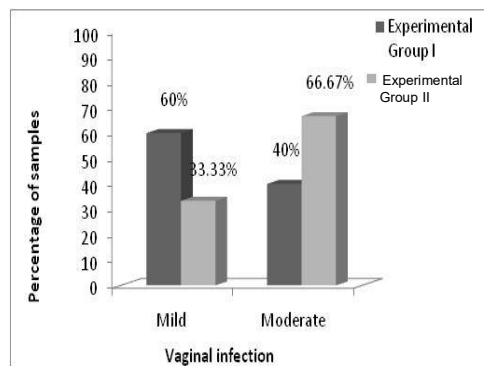
#### Data Collection Procedure

Written permission was obtained from the Panchayat president at selected community, Salem. Informed verbal consent was taken from the married women with vaginal infections who met the inclusion criteria.

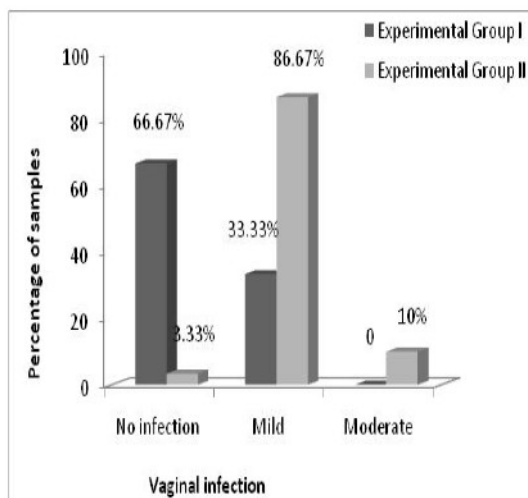
Data was collected over a period of 4 weeks from 30.07.2012 to 25.08.2012. Women were given medicated water in experimental group I and luke warm water in experimental group II for washing perineum thrice a day for 10 days. Then, post test has done for both the groups by using same checklist.

#### Results

Major findings of the study revealed that in experimental group I, majority (60%) had mild vaginal infections and 40% had moderate vaginal infections, whereas in experimental group II majority (66.67%) had moderate and 33.33% had mild vaginal infections during pretest (fig-1). However during posttest in experimental group-I, majority (66.67%) had no infection and 33.33% had mild vaginal infections. Whereas in experimental group II the most of the married women (86.67%) had mild, 10% had moderate and 3.33% had no infection, revealing higher effectiveness of medicated water application. (Fig - 1)



**Fig. 1: Percentage distribution of married woman according to their severity of vaginal infections in experimental group I and II.**



**Fig. 2: percentage distribution of married woman in experimental group I and II according to their severity of vaginal infections during post test**

**Table No.1: Mean, Standard deviation and mean difference of married woman between the age group of 15 to 45 years according to pretest and posttest scores on vaginal infections in experimental group I and II.**

S. No.	Groups	Pretest Posttest				Mean
		Mean	SD	Mean	SD	
1.	Experimental Group I	3.57	0.95	0.34	0.48	2.66
2.	Experimental Group II	3.94	0.81	2.1	0.87	1.84

Experimental group I pretest mean infection score was 3.57, 0.95 and

experimental group II mean score was 3.940,  $\pm$  0.81 whereas during post test experimental group I posttest mean score was 0.34,  $\pm$  0.48, with a difference of 2.66 mean score value. Experimental group II posttest mean score was 2.1,  $\pm$  0.87 with a difference of 1.84 mean score value.

The mean difference shows that the medicated water has higher effectiveness than lukewarm water on vaginal infections among married women (Tab-1).

Further 't' value depicts that there was a significant ( $p < 0.05$ ) difference between post test scores of experimental group I and II showed that medicated water was higher effective in reducing vaginal infections than lukewarm water ( $p < 0.05$ )

## Discussion

- ❖ During pretest in the experimental group I, majority (60%) had mild vaginal infections and 40% had moderate vaginal infections. In experimental group II majority of them (66.67%) had moderate vaginal infections and 33.33% had mild vaginal infections.

The findings are consistent with the study of Gnanalakshmi (2006) reported that in experimental group I, majority of them (65%) had mild vaginal infections and 35% had moderate vaginal infection. In experimental group II 32% had mild vaginal infections and majority of them 68% had moderate vaginal infections. <sup>10</sup>

- ❖ In experimental group I, the posttest mean score was 0.34, 048 and in experimental group II the posttest mean score is 2.1 0.87. The 't' value was 9.61 which showed that medicated water was effective in reducing vaginal infections than lukewarm water among married women which is consistent with the study of Lakshmi who reported that there was a highly significant ( $P <$

0.001) difference between experimental and control groups vaginal infections following the use of Neem water. <sup>11</sup>

- ❖ There was no significant association between the posttest scores on vaginal infections among married women and their selected demographic variables. Whereas in experimental group-II there was a significant association between posttest scores on vaginal infections among married women and their selected variables i.e, the materials used during menstruation. Hence hypothesis  $H_2$  is accepted only to the above mentioned variable in experimental group II ( $p < 0.05$ ). The findings are consistent with the study of Mincy. M.L, (2010) who reported a significant association between posttest scores on mixed vaginal infections and their selected demographic variables like the materials used during menstruation and frequency of changing the cloth ( $p \leq 0.01$ ).

## Conclusion

The result of this study showed that the Medicated water (Neem) was effective in reducing vaginal Infections than luke warm water among married women. It can be implemented in the

community level which is cheap and had higher effectiveness.

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