

Pattern of Reproductive Tract Infection in women of reproductive age group Attending obstetrics and Gynaecology OPD, RIMS, Ranchi

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Abstract- Background: Reproductive Tract Infection is caused by Sexually transmitted disease and other routes and are being increasingly recognized as a serious public health problem. RTIs cause suffering both to men and women, but their consequences are far more devastating and widespread among women. **Aims and Objectives:** 1) To describe socio-demographic factors related to reproductive tract infection in female of reproductive age group attending Obstetrics & gynaecology OPD at RIMS. 2) To find the risk factors associated with reproductive tract infection among female of reproductive age group attending Obstetrics & gynaecology OPD at RIMS. **Material and Methods:** Cross sectional study was conducted at Obstetric & Gynaecology OPD of Rims from 15 February 2014 to 1st April 2015. Data on variables like age, sex, Religion, Marital Status, Occupation was taken and all symptomatic & asymptomatic women were counselled for examination & investigations & given syndromic treatment. Follow-up done to assess impact of syndromic treatment. **Statistical Analysis:** Template generated in MS Excel Sheet and analysis was done on SPSS software. **Result:** Out of 123 women surveyed majority were Married 48(39.0%), Hindu 70(59.6%), Housewife 41(39.8%) and belong to age group between 26-35 yrs of age 59(47.96%). Laboratorial diagnosed RTIs were vaginal candidiasis 32(26.01%), Pelvic inflammatory disease 20(16.26%), Shyphillis 22(17.88%), Chlamydial infection 15(12.19%). After syndromic treatment, prevalence of RTIs has statistically significantly reduced. **Conclusion:** Syndromic Rx & health education can definitely reduce RTIs.

Index Terms- Reproductive Tract Infections, Syndromic Treatment, RTIs.

I. INTRODUCTION

Reproductive tract infections (RTIs) and sexually transmitted diseases (STDs) represent a major public health problem in developing countries. (1) The consequences of RTIs are numerous and potentially devastating. The most common of the curable STIs are gonorrhoea, syphilis, chlamydia, and trichomoniasis. Sexually transmitted infections constitute a significant health burden and increase the risks of transmission of HIV [2]. Reproductive tract infection (RTI) is a global health problem among women, living in South East Asian Region (SEAR) countries.

Studies have found the prevalence of RTI in India, Bangladesh, Egypt, and Kenya is in the range of 52–90 per cent. More than a million women and infants die of the complications of RTI every year [3].

Reproductive tract infections (RTIs) are caused by organisms normally present in the reproductive tract or introduced from the outside during sexual contact or medical procedures. These different but overlapping categories of RTI are called endogenous, sexually transmitted infections (STIs), and iatrogenic, reflecting how they are acquired and spread [4].

The prevalence of self-reported RTI symptoms among Indian women has been found to be 11–18% in nationally representative studies [5, 6] and 40–57% in various other studies [7–9], while the prevalence of laboratory-diagnosed RTIs has ranged from 28% to 38% [10, 11].

In Indian community based studies, the range of self reported morbidity has been reported to vary from 39–84%. (12,13) Most of the Indian studies in the field of reproductive health care are based on clinical examination and a few are based on laboratory tests. (14). The awareness level among females regarding RTIs is relatively low in majority of the districts in northeastern part of India. This study is an attempt our aim is to focus on the occurrence of different type of RTIs associated with different socio economic factors.

Aims and Objectives:

1) To describe socio-demographic factors related to reproductive tract infection in female of reproductive age group attending Obstetrics & gynaecology OPD at RIMS.

2) To find the risk factors associated with reproductive tract infection among female of reproductive age group attending Obstetrics & gynaecology OPD at RIMS.

II. METHODOLOGY

This study was conducted with the objective of assessing the Occurrence of various RTIs among women in the reproductive age group of 15-45 years old attending Obstetrics & Gynaecology OPD of RIMS Ranchi, during from 15 February 2014 to 1st April 2015. The sample size was calculated by taking all the married women between age group of 15-45 yrs of age coming to gynae OPD Rims, Ranchi between 10 a.m - 1 p.m from 15 February 2014 to 1st April 2015. For cultural and social

reasons, the pregnant and puerperal women were not included. Pre-tested, semi-structured questionnaire was used for data collection. Template was generated in MS excel. Statistical analysis was done using SPSS software. The syndromes related to women such as vaginal discharge, genital ulcer disease, lower abdominal pain, and inguinal bubo based on the syndromic approach as recommended by the Government of India, Ministry of Health and Family Welfare for the management of RTIs/STDs were considered. The case definitions of these syndromes as recommended by National AIDS Control Organization were strictly followed for diagnosis and treatment of patients. Each woman was interviewed in private about her socio demographic and reproductive history, current and past symptoms affecting the reproductive tract, and past sexual behaviour, etc. and all symptomatic & asymptomatic women were counselled for

examination & investigations & given syndromic treatment. Follow-up done to assess impact of syndromic treatment.

III. RESULTS

Between 2014-2015, Out of 123 women surveyed majority were Married 48(39.0%), Hindu 70(56.6%), Housewife 41(33.3%), Daily wages earner 27(21.95%) and belong to age group between 26-35 yrs of age 59(47.96%) [Table-1]. Majority of them belong to lower SEC i.e class IV and V of Revised Prasad's classification for 2014 [Table-2]. Laboratorial diagnosed RTIs were vaginal candidiasis 32(26.01%), Pelvic inflammatory disease 20(16.26%), Syphilis 22(17.88%), Chlamydial infection 15(12.19%) [Table-3].

Table-1:- Sociodemographic characteristics of sexually active women in reproductive age group of 15-45yrs of age.

VARIABLE		Number of participants (%)
AGE	15- 25 yrs	20(16.26%)
	26-35 yrs	59(47.96%)
	36-45yrs	44 (35.77%)
RELIGION	HINDU	70(56.91%)
	MUSLIM	21(17.07%)
	CHRISTAIN	14(11.38%)
	OTHERS	18 (14.63%)
ETHNICITY	TRIBAL	43(34.95%)
	NON-TRIBAL	80 (65.04%)
MARITAL STATUS	UNMARRIED	7(5.64%)
	MARRIED	54(43.90%)
	SEPERATED	24(19.51%)
	DIVORCED	21(17.07%)
	WIDOW	17(13.82%)
OCCUPATION	SERVICE	27(21.95%)
	BUSINESS	19(15.44%)
	DAILY WAGE EARNER	27(21.95%)
	HOUSEWIFE	41(33.33%)
	STUDENT	9(7.31%)
	OTHER	0 (0%)

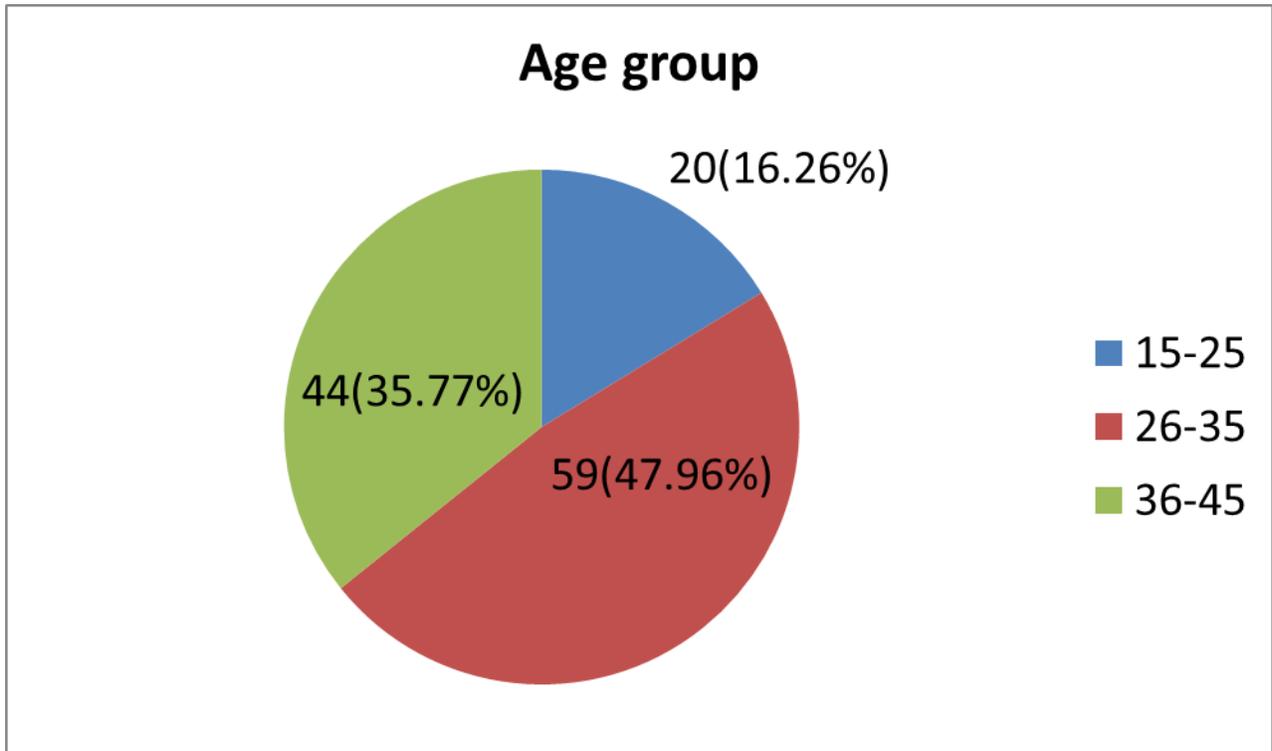


Fig 1 : Pattern of RTI in different age group.

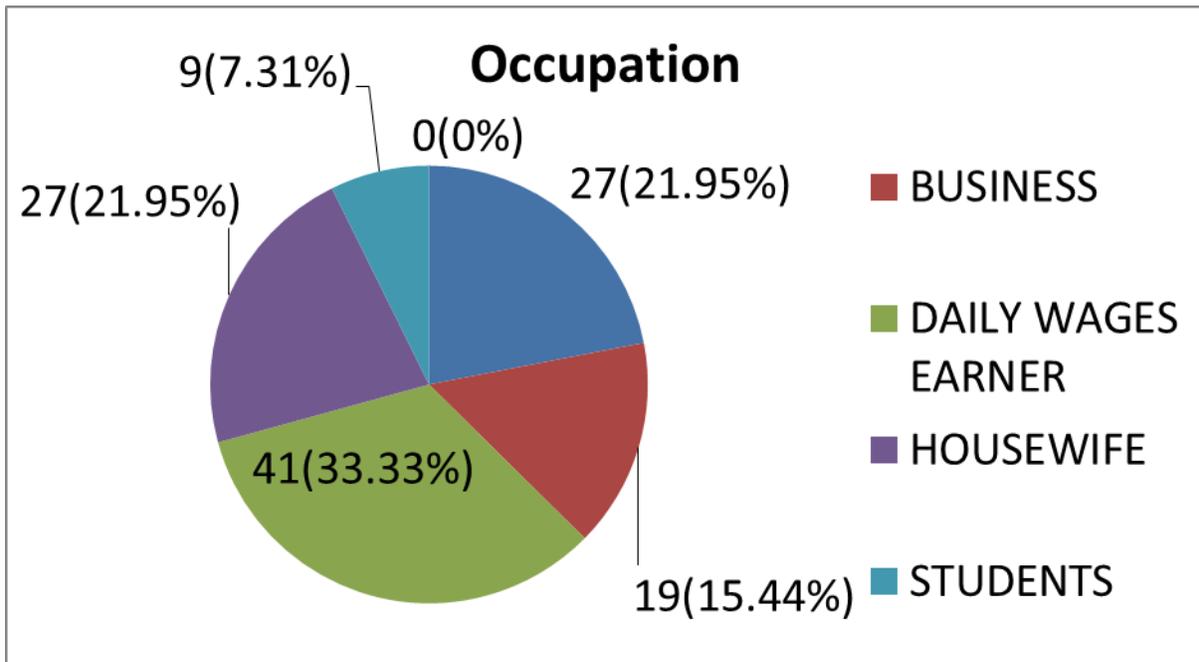


Fig 2 :Pattern of RTI in different occupation.

Table-2:RTIs in different socio-economic class.

SOCIO ECONOMIC CLASS*	NUMBER (%)
I	6 (4.87%)
II	14 (11.38%)
III	20 (16.26%)
IV	44 (35.77%)
V	39 (31.70%)

* Revised Prasad's classification for 2014

Table-3: Types of RTIs

DISEASE DIAGNOSED	Study Population (%)
HIV	10 (8.1%)
CANDIDIASIS	32 (26.01%)
CHLAMYDIA	15 (12.19%)
SYPHILIS	22 (17.88%)
GONORRHOEA	12 (6.75%)
LGV	12 (6.75%)
PELVIC INFLAMATORY DISEASE	20 (16.26%)

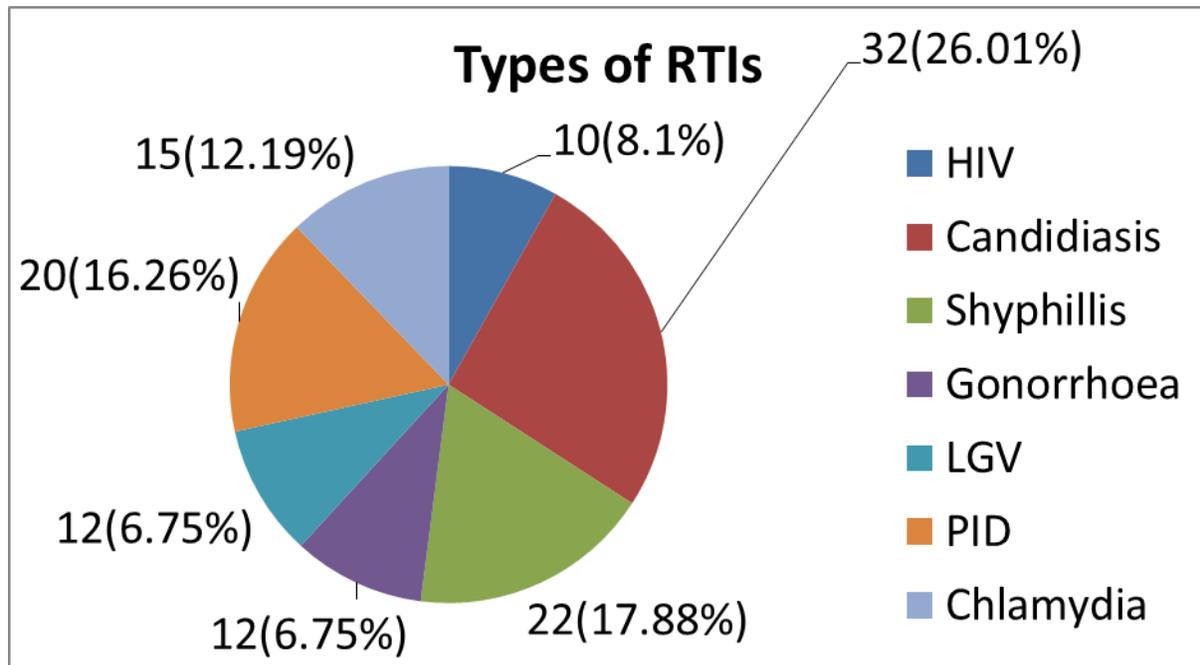


Fig 3:Types of RTIs

IV. DISCUSSIONS

From this study, RTIs was 33.3%, which is high probably due to a lack of awareness and the inaccessibility of health care services in this hilly and far flung area. In a study among rural Indian women,(15) a high prevalence of bacterial vaginosis (62%), candidiasis (34%), trichomoniasis (13.98%), and syphilis (10.5%) was observed. The prevalence of RTIs/STDs was found to be 49% in a rural area of the district of Agra (U.P.) while 70% of the women studied in a rural area of Haryana were found to be suffering from RTIs.(16) Comparatively, low prevalence was observed by studies conducted in slum and rural areas of Chandigarh (21.6%, 17.7%).(17,18) In this study, maximum prevalence was found in the age group of 26–35 years old a period of maximum sexual and reproductive activity. A similar observation was made in this age group in a study conducted in Agra.(16) A study on community level health education intervention(19) reported an improvement in the level of awareness among both men and women regarding RTIs and STDs and also revealed an eightfold increase in their clinic attendance. In this study, the high case load has been found based on the syndromic approach and steps should be taken for appropriate management of these cases in view of the high potential for the spread of HIV/AIDS. There is also a need to conduct further studies to assess various behavioural and sociodemographic factors, predisposing these women to the risk of RTIs and STDs.

V. CONCLUSION

Prevalence of symptomatic, clinical & laboratorial diagnosed RTIs was quite high in the present study. This was significantly

reduced by syndromic treatment of RTIs as per NACO guidelines.

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