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SPECTRUM OF CERVICAL LESIONS IN CIMS, BILASPUR: A 5 YEAR RETROSPECTIVE STUDY OF 215 CASES IN A TERTIARY HOSPITAL OF CENTRAL INDIA

Sadhna Bagde[1], Rashmi Gupta[2], Superna Ganguly[3], Amit Bhardwaj[4], Sangeeta Jogi[5]

ABSTRACT: BACKGROUND AND OBJECTIVE: Cancer of the cervix is a leading cause of morbidity and mortality among women World Wide. Therefore to curb the disease there is need of awareness of this disease. This study is aimed to categorize the premalignant and malignant lesions at the earliest, to reduce the mortality and morbidity. It also aimed to know the incidence of malignancies at our set up and to calculate distribution of patient in relation to parity and symptoms. **DESIGN AND SETTING:** Study included 215 patients with complain of white discharge per vagina, per vaginal bleeding and backache attending the gynecology OPD over a period of 05 years. **PATIENT AND METHODS:** Patients were subjected to cervical biopsy and biopsies were sent to pathology department. Detailed clinical history, age, age at marriage, parity and socio-economic status was obtained. **RESULT:** Result were classified histopathologically as inflammatory lesions 70 cases, polypoidal lesion were 30, LSIL accounted for 32 cases and HSIL were 20 cases and 30 were malignant lesions. Under malignant category moderately differentiated squamous cell carcinoma was the commonest. Maximum numbers of patients were subjected to cervical biopsies in 3rd decade of life. Malignancies were common in 3rd & 4th decade of life. Most of the cases were of parity 4. **CONCLUSION:** Tissue biopsy is a valuable diagnostic procedure on which surgeons and radiologists still rely.
KEYWORDS: Cervical Biopsy, Parity, Squamous Cell Carcinoma, HSIL, LSIL.

INTRODUCTION: Cervical cancer is the leading cancer in Indian women and second most common cancer in women world wide next to breast cancer.

Sexually transmitted human papillona virus (HPV) infection is the most important risk factor for intra-epithelial neoplasia and invasive cervical cancer. The world wide incidence of cervical cancer is approximately 5,10,000 new cases anually with approximately 2,88,000 death world wide unlike many other cancers. Cervical cancer occurs early strikes at the productive period of womans life. The incidence rises in 30-34 years of age and peals at 55-65 years ewith median age of 38 years specially those from lower socio ecomonomic status who fails to carry out regular health checkup due to financial inadequacy.

The urban areas cancer of the cerrix account for over 40% of cancer while in rural areas it account for 65% of cancer.[1]

In rural areas it is difficult to commit for voluntary screening and follow up.

The present study is conducted to study the early diagnosis of preneopalstic and neoplastic lesion of uterine cervix and to knew the age incidence, which will help in reducing the

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mortality and morbidity due to cervical cancer. This study also aimed to know the incidence of cervical malignancy at our set up.

MATERIALS AND METHODS: A restrospective study of 215 cases of cervical biopsies was carried out in department of pathology Chhattisgarh Institute of Medical Sciences.
Sources of Data: Patients attending OPD of Department of Obstetrics and Gynecology at CIMS, Bilaspur, Chhattisgarh with chief complaints of per vaginal bleeding, white discharge per vagina and backache.
Duration: 5 years data was collected from January 2010 to December 2014.
Sample Size: 215 patients.

MATERIAL: Total hysterectomy patient were excluded from study. In this study detailed menstrual, obstetrics and contraceptive history was taken. Age of the patient, duaration of marriage, parity and socio econamic status was also noted. Chief complaints of the patient like while discharge per vagina, bachche, abdominal pain and per vaginal bleeding were also considered. Cervial biopsies were carried with help of punch biopsy forceps in operation theatre. Some biopsies were carried out under the guidence of colposcopy. The biopsies were sent to pathology department for histopathological examination. The sections were stained with Haematoxylin and Eosin and then examined. Results were categorized under inflamatory LSIS, (low grade squamons Intraepithelial lesion) HSIS (High grade squamons Intraepithelial lesion) polyps and malignancies. Age incidence, parity and distribution of cases in relation to symptoms was calculated.

RESULTS: Out of 215 cervical biopsies examined 20 biopsies were inadequate for diagnosis and remaining 195 cases were histopathologically classified as inflammatory lesions i.e. chronic Non-Specific cervicitis 70 cases (35.89%), low grade squamous intraepithelial lesions (LSIL) 32 cases (16.14%), High grade squamous intraepithelial lesions (HSIL) 20 cases (10.25%), polyps 30 cases (15.38%) and lastly malignant cases were 30 (15.38%). The youngest patient was of age 20 years and oldest was 75 years old with mean age of 47.5 years.

| Sl. No.	Age Group	No. of Cases
01.	21-30 Years	69 Cases
02.	31-40 Years	82 Cases
03.	41-50 Years	33 Cases
04.	51-60 Years	15 Cases
05.	61-70 Years	12 Cases
06.	71-80 Years	04 Cases
Table 1: Age wise distribution of the Patient of Cervical Biopsy		

Most of the patient who was subjected to cervical biopsy was of group (31-40) years 82 cases. Which were followed by group of 21-30 years 69 cases.

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| Sl. No	No. of Issues	No. of Cases
1	0	0
2	1	2
3	2	42
4	3	96
5	4	56
6	5	16
7	6	2
8	7	1
Table 2: Parity Distribution of Cases		
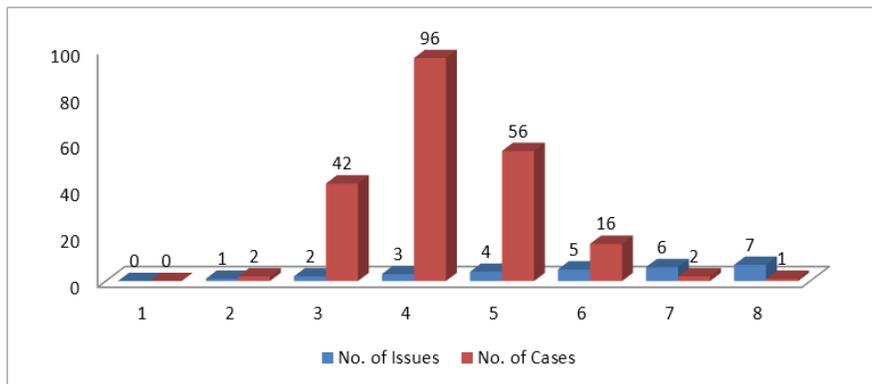
Graph: Parity distribution of cases

180 cases were multiparous and mean parity was 3.2 most of the cases were of parity 3 (96) cases and then followed by parity 4 which were 56 cases.

Sl. No.	Chief complaints	No. of Cases	Percentage
01.	White Discharge Per Vagina	130	60.5 %
02.	Backache Abdominal Pain	50	23.2 %
03.	Per Vaginal Bleeding	35	16.3 %
TOTAL		215	100%
Table 3: Distribution of cases in relation to symptoms			
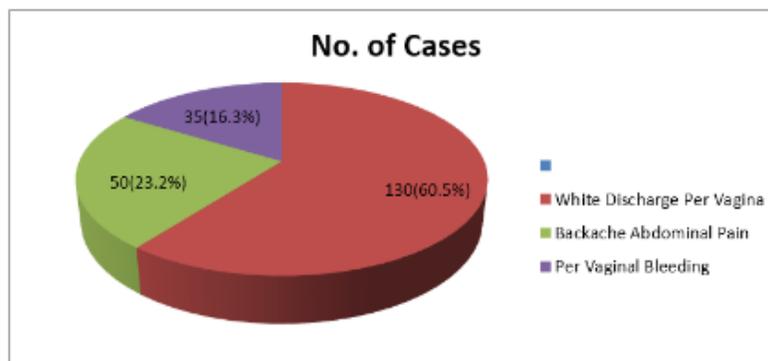
Distribution of cases in relation to symptoms

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Most common symptom was white discharge per vagina 130 cases (60.4%) then followed by abdominal pain and backache and lastly with per vaginal bleeding accounted for 35 cases (16.2%).

Mean age of the patients	47.5 Years
Mean age of marriage	18 Years
Mean parity of the patient	3.2%
Mean age at 1st child birth	20.2%
Use of hormonal contraception	6.8%
Patient with vaginal discharge	60.4%
Low socio economic status	100%
Table 4: Shows the detail about the profile of all 215 patients who were subjected to cervical biopsy	

Sl. No.	Study	Benign Inflammatory	LSIL	HSIL	SIL	Squamous Cell Carcinoma
1	Girish Tamboli Khatod et al (2005)[1]	113(51.36%)	74(33.62%)	27(12.27%)	-	39(17.73%)
2	Saha R. Thapa M et al (2005)[2]	22(55.6%)	8(18.06%)	9(20.93%)	-	3(6.97%)
3	Rachna Jain-Benyan meem jqbal, Atul Jain et al (2004)[3]	71(66.3%)	-	-	6(10.2%)	30(28.03%)
4	Present Study	70(35.89%)	32(16.14%)	20(10.25%)	-	30(15.38%)
Table 5						

The histopathological categories of cervical biopsy of 195 cases studied, Inflammatory were 70 cases (35.89%) Polypoidal lesion 30 cases (15.38%) low grade squamous intraepithelial lesion 20 cases (10.25%). 30 (15.38%) malignant cases were accounted and 3(1.53%) cases were reported as chronic-non-specific cervicitis with koilocytic change. Under malignant spectrum of cervical biopsy 6 cases were well differentiated squamous cell carcinoma 14 cases were of moderately differentiated squamous cell carcinoma and anaplastic/ undifferential were 10 cases.

In our study youngest patient diagnosed as squamous cell carcinoma was of 20 years and oldest was 60 yrs old. Most of the patients diagnosed as malignancies were in 3rd and 4th decade of life.

DISCUSSION: In the present study, age of patients ranged from 20 years to 75 years with a mean age of 47.5 years. This age range was comparable with Girish D Tamboli, L. V. Khatod

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studies.[1] In Saha R et al[2] study the mean age of patient was 40.3 years. This was slightly lower as compared to our study. Robyr R et al[4] study mean age was 43.7 years which was again lower as compared to our study.

In our study most of the patients subjected to cervical biopsies were of group (31 years – 40 years) (82 cases) (38.14 %), followed by group of 21years-30 years (69 cases) (32.1%).

In Girish D Tamboli, L. V. Khatod studies[1] (3 most of the patients were of group 41–50 years (84) (38.18 %) followed by 31-40 years (72) (32.73%). As compared to the above study gynecological complaints of the patients manifested at earlier age in our study.

Most of the cases were of parity 3(96 cases) (44.7%) followed by parity 4(56 cases) (26%) with mean parity of 3.2 which was comparable with other study[1] Saha et al studies was 2.3 which is less as compared to our study, may be because the patients in our study were mainly from rural areas and were of low socio-economic status.

Again in our study maximum patients were multiparous (180 cases) and multiparity is a risk factor for cervical malignancy. All multiparous women should be screened for cervical malignancy.[1]

In the present study commonest symptom was white discharge per vagina (130 cases) (60.4%) followed by abdominal pain and backache (20.2%) and lastly patients with vaginal bleeding (35 cases) (16.2 %).our study was comparable with other studies.[1]

In this study, while taking clinical history, the age of marriage, parity, age at first child birth, use of hormonal contraceptive and socio-economic status of patient were registered under patient profile. The table 3 shows the percentage of patient profile.

Patient profile was compared with study.[2] All parameters +2 were comparable.

Table 4 shows distribution of premalignant and malignant lesions of different studies.

In our study inflammatory lesions were 70 (35.89 %) which was comparable with Rachna Jain Atul Jain et al.[3] Incidence of malignancies in our study was 30 cases (15.38 %) which was more than other studies.[2]

The incidence of malignancy at our setup was high may be due to early age of marriage and multiparity.

CONCLUSION: Tissue biopsy is a valuable dignosatic procedure on which surgeons and radiologist still rely. Aim of this study was to know the spectrum of disease in cervical biopsies over a period of 5 years at our medical college the histopathological examiantion of cervical biopsy while help in the early dignosis of premalignant and malignant lesions of uterine cervix and earliest treatment will be possible

In our study most patient under gone cervical biopsy were in 3rd and 4th decade of life. Most of the cases were of parity 3 followed by parity 4 and the commmonest complain of the patient was white discharge per vagina. Out of 195 cases, majority where inflammtory lesions and in malignant lesions, moderately differrenriated carcinoma was common. The youngest patient sufferring from squamous cell carcinoma was of 20 years.

The incidence of malignancies at our set up was higher, as it is a tertiary level hospital and most of the cases included in this study were reffered from periphery. Women fail to be screened due to insufficient resources lack of knowledge low socio economic status were unable to access

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the health care delivery system individual, psychological and cultural context fear or limited family support and community participation.

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AUTHORS:

1. Sadhna Bagde
2. Rashmi Gupta
3. Superna Ganguly
4. Amit Bhardwaj
5. Sangeeta Jogi

PARTICULARS OF CONTRIBUTORS:

1. Associate Professor, Department of Pathology, CIMS, Bilaspur.
2. Assistant Professor, Department of Pathology, CIMS, Bilaspur.
3. Assistant Professor, Department of Pathology, CIMS, Bilaspur.
4. Demonstrator, Department of Pathology, CIMS, Bilaspur.
5. Associate Professor, Department Obstetrics & Gynecology, CIMS, Bilaspur.

NAME ADDRESS EMAIL ID OF THE CORRESPONDING AUTHOR:

Dr. Rashmi Gupta,
Assistant Professor,
Department of Pathology,
CIMS, Bilaspur.
E-mail: drrashmidsao@rediffmail.com