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Original Research Article

Clinical analysis of gynecological diseases in postmenopausal women in tertiary care centre

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ABSTRACT

Background: Menopause is a natural step in ageing process represents the period end of menstruation after last menstrual period in previous 12 months. Gynaecological disorder in older women differs from those who are younger. Disorders peculiar to ageing are pelvic organ prolapse, urinary incontinence, genital infections and malignancies. Present study is contemplated with a view to assess the magnitude of postmenopausal gynaecological morbidity. The goal of this study was to assess the age of onset of menopause and the spectrum of different gynaecological diseases, their incidence, diagnosis and treatment modality in postmenopausal females.

Methods: A Prospective observational study of postmenopausal females attending Gynecology OPD or admitted in Sultania Zanana Hospital, Bhopal was carried out between July 2014 to June 2015. Total 401 postmenopausal females were included. Age of menopause and detail of all gynecological problems were recorded using predesigned proforma.

Results: The study population was drawn from both rural (41.4%) and urban (58.8%) areas. Mean age of onset of menopause was 48.01 years in study population. In all, 28.4% had pelvic organ prolapse, 26.6% had genital malignancies, 25.5% had urogenital infections and 17.7% had benign disorder like senile endometritis, fibroid uterus etc.

Conclusions: Menopausal health has been one of the neglected area in our country and needs timely vital attention as they are at risk of developing various genital malignancies. This emphasises the need for a screening programme for Indian women in our scenario.

Keywords: Gynaecological disorders, Genital malignancy, Postmenopausal bleeding, Pelvic organ prolapse

INTRODUCTION

Menopause is not a disease or illness, but it is a natural event in the life of women. Menopause is the permanent cessation of menstruation at the end of reproductive life due to loss of ovarian follicular activity. It is a hypo-estrogenic state. It occurs gradually in women and it indicates the transition from reproductive to post reproductive era of women's life. Population ageing is emerging as a pre-eminent phenomenon throughout the world. Among the aged women deserve special attention

because they outlive men in most society. This longevity also makes them vulnerable to different morbidity of which Gynaecological disorders remain hidden a hitherto neglected because of the 'culture of science' surrounding women lives.

A major challenge for the world in 21st century is the ageing of its population. The older population is growing fastest in India. The number of people aged >60 years has grown from 5.4% in 1981 to 7.5% in 2001 and it projected to become 12.5% in 2025.^{1,2}

Prevalence of gynaecological morbidity varies between 92-95% among women of all age groups combined.^{3,4} They are influenced by socio cultural, demographic and behavioural factor.⁵

Gynaecological disorders in older women differ from those who are younger. Gynaecological disorders peculiar to aging are pelvic organ prolapse, genitourinary infections and malignancies.

Genital tract malignancies contribute 14% of cancers in women. The spectrum of gynaecological disorders in India differs from that in developed countries as there are no screening programs for early detection and hardly any dedicated geriatric units.

Therefore, there is an obvious need for providing geriatric gynaecological services, but a paucity of data regarding gynaecological morbidity in postmenopausal women hampers proper planning. Hence present study is contemplated with a view to assess the magnitude of gynaecological morbidity.

The goal of this study was to assess the age of onset of menopause and the spectrum of different gynaecological diseases, their incidence, diagnosis and treatment modality in postmenopausal females.

METHODS

This study is a hospital based prospective observational study of the postmenopausal females attending gynecological OPD or admitted in department of obstetrics and Gynecology, Gandhi Medical College, Sultania Zanana Hospital, Bhopal from 1st July 2014 to 30th June 2015. Study was conducted after taking approval from ethical committee.

Inclusion criteria

Postmenopausal females presenting with gynaecological complains

Exclusion criteria

- Postmenopausal females presenting with breast disorders/medical/surgical illness
- Refusal for participation in study

All patients were explained in detail about aim, objectives of study and written consent was taken. Patient's socio demographic profile, obstetrics and gynaecological history were recorded; including age and type of menopause, menstrual cycle before menopause and how it was attained was noted.

A thorough general physical examination of patient including height, weight, body mass index, pallor, vital data and examination for goitre followed by through systemic examination was done.

Pelvic examination

Local examination of external genitalia was done for any growth over vulva, urethral orifice and any discharges were noted.

Per speculum examination was done for any growth on cervix, polyp, cervicitis or any bleeding or discharge coming through the os. Thorough inspection of vagina was done for any lesion, varicosity, haemorrhagic spot or atrophic changes. Degree of Cervical descent, cystocoele, rectocoele and enterocoele was noted.

Bimanual examination was done for consistency of cervix, the status of uterus, its size, position, mobility, surface contour, consistency and adenexa for any mass, thickening and tenderness were assessed.

Per rectal examination was done whenever required to find out involvement of the rectal mucosa, any mass in Rectum, involvement of the parametrium or any secondaries in Pouch of Douglas.

Laboratory investigations including complete haemogram, blood biochemistry, urine examination, pap smear, pelvic ultrasonography, electrocardiography, x-ray and computer tomography (in cases of genital malignancies) was done. Resected tissues (in operated cases) were examined histopathologically. Details of all gynaecological problems were recorded using predesigned proforma.

Postmenopausal bleeding was defined as vaginal bleeding 12 months after spontaneous amenorrhoea. Diagnostic dilatation and curettage to obtain endometrial tissue and in unhealthy cervix, cervical tissue were examined histopathologically.

Atrophic vaginitis is defined as thinning of vaginal walls caused by decreased oestrogen levels accompanied by purulent discharge with atrophy of external genitalia and loss of vaginal rugae.

Urinary incontinence was defined as any involuntary leakage of urine. Stress urinary incontinence was associated with increased intra abdominal pressure.

Urinary tract infection, pelvic organ prolapse, degree of cystocoele, urethrocele, rectocoele, enterocele and genital malignancy were also assessed.

The data collected was tabulated in Microsoft excel sheet and were statistically analysed.

RESULTS

During study period total 3966 women attended our OPD for various reasons, out of which 401 i.e. approximately 9.8% were menopausal women. The study population

was drawn from both rural (41.4%) and urban (58.8%) area.

Table 1: Age wise distribution of postmenopausal patients (n-401).

Age (years)	No.	Percentage (%)
40-50	159	39.6
51-60	144	35.9
61-70	91	22.6
>70	7	1.74

Maximum number of women were in age group of 40-50 years (39.6%) followed by 50-60 years (35.9%).

Table 2: Distribution according to duration of menopause.

Duration of menopause (years)	No. of patients (n- 401)	Percentage
1-5 years	158	39.40
6-10 years	121	30.17
11-15 years	45	11.22
16-20 years	60	14.96
21-30 years	17	4.23

In maximum numbers of patients, 158 (39.40%), the duration of menopause was between 1-5 years. Duration of menopause is inversely related to postmenopausal bleeding.

Table 3: Distribution of presenting complaints in postmenopausal patients.

Presenting complaints	No. of patients (N=401)	Percentage
Something coming out from private part	105	26.1
Post menopausal bleeding	94	23.4
lower abdominal pain	80	19.9
Discharge per vagina	75	18.7
Urinary problems	70	17.4
Abdominal distension	22	5.4
Loss of appetite	7	1.7
Itching over private parts	6	1.4
constipation	4	0.9

Maximum number of women having presenting complains of something coming out from private parts (26.1%) followed by postmenopausal bleeding (23.4%) and lower abdominal pain (19.9%).

The most common Gynaecological disorder was uterovaginal prolapse (n-114, 28.4%) followed by malignant disorders of genital tract (n-107, 26.6%), urogenital infections (n-103, 25.5%) and benign disorders of genital tract (17.7%).

Pelvic organ prolapse is an increasing common condition seen in women with the aging of population. Results are statistically highly significant (p<0.01).

Table 4: Distribution of gynaecological disorders in postmenopausal patients.

Disease Profile	No. of patients (n-401)	Percentage	
Uterovaginal prolapse	114	28.4	
Malignant Disorders (n-107, 26.6%)	Carcinoma cervix	82	20.4
	Carcinoma ovary	15	3.74
	Carcinoma endometrium	8	1.99
	Vault carcinoma	2	0.49
Urogenital infection (n-103, 25.6%)	Urinary Tract Infection	43	10.7
	Pyometra	20	4.98
	Chronic cervicitis	16	3.99
	PID	7	1.74
	Senile vaginitis	17	4.23
Benign disorders of genital tract (n-73, 18.2%)	Atrophic endometritis	36	8.97
	Fibroid uterus	18	4.5
	Benign ovarian mass	12	2.99
	Endometrial polyp	5	1.24
	Bartholin cyst	2	0.49
Pre-malignant disorders of genital tract	3	0.74	
Urethral caruncle	1	0.24	

Out of 114 cases of uterovaginal prolapse, maximum number of patients had third degree prolapse uterus (79.8%) followed by procidentia (11.4%), 2 cases (1.7%) had vault prolapse.

Out of 107 cases of genital malignancy, Carcinoma of the cervix was the commonest malignancy in our study (n-82, 20.4%) followed by carcinoma ovary (n-15, 3.74%), carcinoma endometrium (n-8, 1.99%) and vault carcinoma (n-2, 0.49%).

Out of 103 cases of urogenital infection, maximum patients had Urinary tract infection (10.7%) followed by pyometra (4.98%), chronic cervicitis (3.99%), senile vaginitis (4.23%) and PID (1.74%).

Benign disorders of genital tract were 73. Maximum number of women had Atrophic endometritis (8.97%) followed by fibroid uterus (4.5%), benign ovarian mass

(2.99%), endometrial polyp (1.24%) and Bartholin cyst (0.49%).

Most common surgery performed for UV prolapse was vaginal hysterectomy followed by anterior calporrhaphy with posterior calporrhaphy (96.6%).

Table 5: Type of surgery performed for UV Prolapse (n-106).

Type of Surgery	No.	Percentage
Vaginal hysterectomy	2	1.9
Vaginal hysterectomy with anterior calporrhaphy with posterior calporrhaphy	102	96.2
Vault suspension by sacrocolpopexy	2	1.9

The most common surgery performed for gynaecological malignancy was staging laparotomy (TAH with BSO with omentectomy 60.5%) for ovarian malignancy followed by Wertheim's Hysterectomy (29%) for carcinoma cervix.

Table 6: Type of surgery performed for genital malignancies (n-38).

Type of Surgery	No.	Percentage
TAH (CIN)	4	10.5
Staging laparotomy (TAH with BHO with Omentectomy)	23	60.5
Wertheim's Hysterectomy	11	29

DISCUSSION

In present study, age range was 40-50years (39.6%) followed by 50-60 years (35.9%).

Table 7: Comparison of age of presentation with other studies.

Authors	Sample size(n)	Age range (years)	mean age±SD (years)
Lidor A et al ⁶	226	40-81	56
Gredimark T et al ⁷	457	50-80	-
Singh A at al ⁸	100	40-75	-
Opmeer B et al ⁹	540	37-91	62±10
Bharti B et al ¹⁰	25	52-65	55.25±3.84
Present study	401	40-68	56.6

It was observed that maximum number of patients 59 (37.11%) had menopause between 46-50 years. Mean age was 48.10±2.8 years.

The duration of menopause was calculated by taking time interval between onset of menopause and onset of complains (postmenopausal bleeding, prolapse etc).

Table 8: Comparison of mean age of menopause with other studies.

Authors	Mean age at menopause (years)
Opmeer B et al ⁹	50±4.9
Bharani Bharti et al ¹⁰	55.24±3.84
Present study	48.1±2.8

In maximum number of cases, the duration of menopause was between 6 -10 years.

The most common presenting complaint in present study was something coming out from private parts (26.1%) followed by postmenopausal bleeding (23.4%).

Okeke TC et al conducted a retrospective study of vaginal prolapse commonest symptom was something coming down the vagina in 96% of the study subjects.¹¹

Rehana Rahim and Nasreen Ruby et al in 2001 conducted a study on postmenopausal women. Results showed that main gynaecological complain was pressure perineum followed by urinary complains.¹²

70% cases of post menopausal bleeding have an innocent or harmless cause of bleeding but 30% of them are associated with malignancies. Hence post menopausal bleeding requires a thorough evaluation clinically and pathologically to exclude carcinoma as the cause and ensure a benign pathology.

Debnath S et al in their study at JIPMER Hospital, Pondicherry on 500 post menopausal women found neoplasm in 52% of cases and carcinoma cervix accounted for 42% of total cases.¹³

Carlos RC et al reported that postmenopausal bleeding represents approximately 5% of all gynaecological visits.¹⁴

Present study showed that maximum number of women had uterovaginal prolapse (28.4%) followed by genital malignancies (26.6%) followed by urogenital infections (25.5%) and benign disorders of genital tract (17.7%).

Takkar N et al reported most common gynaecological disorder in older women was pelvic organ prolapse in 28%.¹⁵

Okeke TC et al in conduct a retrospective study of utero-vaginal prolapse, 74% of them were post menopausal. Second degree prolapse was the commonest type of presentation (48%) and the definitive treatment modality was vaginal hysterectomy with pelvic floor repair (44%).

In present study, out of total 180 patients with postmenopausal bleeding, 107 were due to benign lesions and 73 cases were due to malignant lesions. Out of total 73 cases of malignancy, Carcinoma cervix was the

commonest malignancy (20.4%)) followed by carcinoma ovary (3.74%). Perhaps the high incidence of malignancy is due to the fact that our hospital is a referral centre and hence cases of malignancy are referred here from nearby area.

Lee WH et al in a study of 163 patients with postmenopausal bleeding found malignant causes in 25.7% cases, of which the most common malignancy was cervical carcinoma (12.9%) followed by endometrial carcinoma (11%).¹⁶ Important benign cause was cervicitis (12.9%), atrophic vaginitis (12.3%), cervical polyp (6.7%), endometrial hyperplasia (3.1%), urethral caruncle (2.5%) and estrogen replacement therapy (1.8%)

Most common surgery performed for gynaecological malignancies was staging laparotomy (TAH with BSO with omentectomy in 60.5%) followed by Wertheim's Hysterectomy (29%).

Six patients of stage I and five patients of stage IIA carcinoma cervix underwent Wertheim Hysterectomy. Rest of cases of cervical carcinoma (n=70) were advanced cancer and treated with radiotherapy and chemotherapy

Somalwar SA et al on postmenopausal women, malignancy was confirmed in 27.5% women.¹⁷ Carcinoma endometrium was found in 9.09 % of total malignancies. All these women underwent surgery. Out of these 60% received chemotherapy postoperatively.

In present study, 73 (18.2%) of women were admitted for benign disorder of genital tract. Maximum number of women having Atrophic endometritis (8.97%) followed by fibroid uterus (4.5%), Benign ovarian mass (2.99%), Endometrial polyp (1.24%) and Bartholin cyst (0.49%)

Moodly M et al in their study of postmenopausal patients found Benign lesions in 35% cases and malignancy in 65% cases.¹⁸ Cervical polyp was the most common benign lesion (43%) followed by atrophic vaginitis (33%).

36 postmenopausal women having atrophic vaginitis managed conservatively. All cases of benign ovarian mass and fibroid uterus (n=30) were managed by total abdominal Hysterectomy. Five women having endometrial polyp underwent polypectomy. Two women having Bartholin cyst underwent marsupilization operation.

CONCLUSION

To conclude, pelvic organ prolapse, postmenopausal bleeding and urogenital infection were the major gynaecological problems in older women. Postmenopausal bleeding is a common feature of underlying gynaecological malignancy in such women. Urgent referral for gynaecological work up is warranted. Carcinoma of the cervix was the commonest cause of

postmenopausal bleeding. The high incidence of cervical cancer observed in our study, emphasises the urgent need for a national screening programme for postmenopausal women.

Type and management of gynaecologic problems in women aged over 65 can be challenging and differ from those for younger women. Thus, caring for these women in their reproductive years as well as in later life should be an aim for all obstetrician-gynaecologists. Therefore, there is an obvious need for providing geriatric gynaecological services, but paucity of data regarding gynaecological morbidity in postmenopausal women hampers proper planning. Hence, present study is contemplated with a view to assess the magnitude of post menopausal Gynaecological morbidity.

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