A combined urogynaecological approach for pelvic organ prolapse: results of a rural centre from northern Maharashtra

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Abstract

Introduction: Pelvic organ prolapse (POP) is a benign condition that can turn symptomatically malignant, if not treated on time. A multidisciplinary combined approach is required to tackle this condition.

Aim: Clinical diagnosis of women with POP, with genito-urinary symptoms and the options for their management under one roof and combined care of urologist and gynaecologist.

Materials and Methods: This study was done in patients admitted with signs and symptoms of POP. The details regarding the age at the onset of genito-urinary symptoms, parity status, obstetric information and degree of POP were analysed and recorded.

Results: Majority of the cases were manual labourers and farmers (70.1%). Majority of them 75.4% presented at 46-60 years of age. In adequate birth spacing was noted in 33.33% cases. Deliveries conducted by untrained personnel were noted in 22.8% patients. History of prolonged labour was there in 21%. Most of the cases presented 78.9% as III rd degree U.V. prolapse with cystocele and/or enterocele. 42.1% patients had stress urinary incontinence. Hysterectomy with pelvic floor repair (PFR) was done 78.9% patients, tension free transobturator tape (TOT) repair with or without PFR was done in 15.7% patients. In the remaining 5.26% cases conservative management was advised.

Conclusion: POP is one of the major urogynecologic problems in older rural women. Referral to pelvic floor clinics for multidisciplinary care can help in dealing the complex condition carefully in a simpler way for the benefit of the patients.

Keywords: Pelvic organ prolapse, POP, TOT, TOT with Cystocoele repair, Hysterectomy, Pelvic floor repair, PFR.

Introduction

Urogynaecology problem refers to the problems of women with pelvic floor dysfunction such as urinary incontinence and prolapse of the vagina, bladder and/or the uterus, commonly referred as problems that arise due to pelvic organ prolapse (POP). Prolapse simply means displacement from the normal position. Pelvic organ prolapse is descent of the pelvic organs into the vagina that may be accompanied by urinary, bowel, sexual, or local pelvic symptoms. The incidence of genital prolapse is difficult to determine as many women do not seek medical advice. It has been estimated that a half of parous women lose pelvic floor support resulting in some degree of prolapse. Only 10-20% of these women seek medical care.[1]The chance of a woman having a prolapse increases with age[2] and life expectancy. POP is the third most common indication for hysterectomy. Loss of vaginal or uterine support in women presenting for a routine gynaecologic care is seen in up to 43–76% of patients.[3] Although this condition is non-fatal, it may seriously influence the physical, psychological and social well-being of the affected women, including their working capacity. This article deals with the clinical diagnosis of women with POP, with genito-urinarysymptoms and the options for their management under one roof and combined care of urologist and gynaecologist.

Materials and Methods

This study was done in patients who were admitted in Tambe Hospital from August 2016 to July 2018 with signs and symptoms of POP. The approval from the Institutional Ethics Committee was priorly taken. The details regarding the age at the onset of symptoms, parity status, obstetric information and degree of POP were analysed and recorded.

Results

Majority of the cases were from rural areas as our centre is located in rural area of the Taluka Sangamner in Ahmednagar district, and were manual labourers and farmers (70.1%) (Table 3). Majority of them (43) 75.4% presented at 46-60 years of age (Table 1). Multiparity was noted in 100% of the cases.

In adequate birth spacing was noted in 33.33% cases. 8.7% patients had prolonged second stage of labour. Deliveries conducted by untrained personnel were noted in 22.8% patients. History of prolonged labour was there in 21%. Resumption to normal physical activity and heavy work was noted in 24.56% within 2weeks of postnatal period (Table 2).

History of chronic constipation and chronic cough was noted in 10.5%% patients. 5.26% of the patients were obese. 15.78% patients underwent some form of pelvic surgery (Table 4). Most of the cases presented 45 (78.9%) as III rd degree U.V. prolapse with cystocele

and enterocele. Common complaint was white discharge per vaginum in 82.4% cases, followed by mass per vagina 80.7% cases. 42.1% patients had stress urinary incontinence (Table 5). Most common comorbid condition was hypertension followed by anaemia and diabetes mellitus. Hysterectomy with pelvic floor repair (PFR) was done in 45 cases (78.9%) out of 57 patients tension free transobturator tape (TOT) repair with or without pelvic floor repair was done in 9 patients (15.7%). In the remaining 3 cases (5.26%) conservative management was advised as they were unfit for the surgery (Table 6).

Table1: Showing the age pattern in POP patients

Age (in years)	No of Cases	% (nearest round figure)
35-40	2	3.5
41-45	6	10.5
46-50	12	21
51-55	21	36.9
56-60	10	17.5
61 and above	6	10.5
Total	57	

Table 2: Showing obstetric history and related causes of POP

Obstetric history	Number	Percentage (nearest)
Multipara	57	100
Inadequate spacing	19	33.33
Delivery by untrained person	13	22.8
Prolonged II stage of labour	5	8.7
Early resumption of physical activity	14	24.56

Table 3: Showing occupation

Occupation	Numbers	Percentage (%)
Manual labourers	28	49.12
Farmers	12	21.05
Housewife	7	12.28
Shop owner	3	5.26
Teacher	2	3.50
Vendor	5	8.77

Table 4: Showing other causes of POP

Cause	Number	Percentage (nearest)
COPD	2	3.5
Chronic constipation	4	7
Oestrogen deficiency (post-menopausal)	40	70.17
Obesity	3	5.26
Pelvic surgery	9	15.78

Table 5: Showing presenting symptoms.

Symptom	Number	Percentage (%)
White discharge per vagina	47	82.45
Mass per vagina	46	80.70
Leakage of urine during strenuous activity	24	42.10
Abdominal pain	10	17.54
Constipation	4	7
Difficulty in micturition	12	21.05

Table 6: Showing treatment (medical/surgical) provided to the patients.

Treatment provided	Number	Percentage
Conservative	3	5.26
Hysterectomy + cystocoele repair	16	28
TOT repair	4	7
Hysterectomy + cystocoele repair + enterocoele repair	29	50.87
TOT + cystocoele/enterocoele repair	5	8.77

Discussion

POP is a major problem in parous women that can occur at any age. It is the third most common cause of hysterectomy among these females. While planning the treatment of POP, the pelvic floor should be considered as a single unit and all the three compartments should be taken care of so patients with complex problems should be referred to a specialised clinic, where all three specialists viz. gynaecologist, urologist and colorectal surgeons are available or a pelvic floor specialist surgeon is available for a single examination and consultation. This approach is good in patients where two procedures are combined. Thus, anaesthetic risk is reduced and time of two separate procedures is also reduced.[4]

The age of onset of POP in our study was 35-40 years. In study done by Thapa B et al.[5] the age of onset was 20-29 years. Similarly in studies by Mawajdeh SM et al.[6] and Luber KM et al.[7] the age of onset was 30-39 years and 30-49 years respectively. The mean age of presentation in our study was 52.9 years compared to other studies.[5,7,11] where it ranged from 26.2 to 50 years.

Most of the patients in our study were manual labourers/farmers by occupation, similar to study done by on Owhakpor EA et al.[8] This finding suggests that those patients who were doing strenuous activities were at increased risk of developing POP.

In our study the birth spacing was not ideal in 33.33% of the cases. In study done by Thapa B et al.[5] the birth spacing was not ideal in 59% of the cases. Use of birth control methods, thus, helps in prevention of POP.

In our study patients who delivered vaginally had a higher chance of POP than those who were delivered by caesarean section, similar to studies done by Thapa B et al[5]. Progetto Menopausa Italia Study Group.[9] and Handa VL et al.[10]

22.8% of the patients had delivery by untrained personnel in our study similar to study done by Ravindra STK et al.[11] In our study 8.7% of the patients had prolonged 2nd stage of labour. In a study done by Onowhakpor EA et al.[8] 61.9% of the patients had prolonged labour. Thus institutional deliveries are promoted where patients are under specialist care. This helps in reducing the chances of POP as wrong practices like prolonged bearing down not doing episiotomy etc. are avoided.

24.56% of the patients resumed physical activity very early as compared to 6 weeks advised routinely by the obstetrician. In the studies by Thapa B et al.[5] and Omokanye LO et al.[12] 14.1 to 92 % of the patients resumed their physical activity early in the post natal period. This reduces the time for the pelvic floor tissue resuming to normal and increases their wear and tear.

In our study 70.17% patients were post-menopausal, as compared to study by Thape B et al.[5] show how deficiency of oestrogen leads to weakening of the pelvic floor.

Hysterectomy with pelvic floor repair was the most common surgical procedure done for POP similar to what was done in the studies by Onowhakpor EA et al.[8] and Omokanye LO et al.[12]

5.2% of the patients were managed conservatively due to poor health condition. Omokanye LO et al.[12] also managed 2.5% of the patients conservatively.

TOT with or without pelvic floor repair was done in around 15% of the patients who had stress urinary incontinence with concomitant POP. Studies by Lo TS.[13] and Tirnovanu MC et al.[14] showed that the combination surgery is safe and effective for stress urinary incontinence and pelvic prolapsed.

Conclusion

POP is one of the major urogynecologic problems in older rural women. Adequate rest and regular practice of pelvic floor strengthening exercises in early postnatal period adoption of suitable family planning methods and more of institutional deliveries are needed to prevent prolapse. Referral to pelvic floor clinics for multidisciplinary care can help in dealing the complex condition carefully in a simpler way for the benefit of the patients.

Financial support: Nil

Conflicts of interest: Nil

References

1. Beck RP. Pelvic relaxation prolapse. In: Kase NG, Weingold AB, editors. Principles and practice of clinical gynecology. New york: *john wiley.* 1983;677-85.
2. Olsen AL, Smith VJ, Bergstrom JO, Colling JC, Clark AL. Epidemiology of surgically managed pelvic organ

prolapse and urinary incontinence. *Obstet Gynecol*. 1997;89:501-06.

3. Jelovsek C Maher, Barber Matthew D. Pelvic organ prolapse. *Lancet*. 2007;369:1027–38.
4. Nager CW, Kumar D, Kahn MA, Stanton SL. Management of pelvic floor dysfunction. *Lancet*. 1997;350:1751.
5. Thapa B, Rana G, Gurung S. Contributing factors of utero-vaginal prolapse among women attending in Bharatpur hospital. *Journal of Chitwan Medical College*. 2014;4:38–42.
6. Mawajdeh SM, Al-Qutob RJ, Farag AM. Prevalence and risk factors of genital prolapse. A multicenter study. *Saudi Med J*. 2003;24:161–65.
7. Luber KM, Boero S, Choe JY. The demographics of pelvic floor disorders: current observations and future projections. *Am J Obstet Gynecol*. 2001;184:1496-501. doi: 10.1067/mob.2001.114868.
8. Onowhakpor EA, Omo-Aghoja LO, Akani CI, et al. Prevalence and determinants of utero-vaginal prolase in southern Nigeria. *Niger Med J*. 2009;50:29–32.
9. Risk factors for genital prolapse in non-hysterectomized women around menopause. Results from a large cross-sectional study in menopausal clinics in Italy. Progetto Menopausa Italia Study Group. *Eur J Obstet Gynecol Reprod Biol*. 2000;93:135-40.
10. Handa VL, Blomquist JL, Knoepp LR, et al. Pelvic floor disorders 5–10 years after vaginal or cesarean childbirth. *Obstet Gynecol*. 2011;118:777-84. doi: 10.1097/AOG.0b013e3182267f2f.
11. Ravindra STK, Savitri R, Bhavani A. Women's experiences of utero vaginal prolapse: a qualitative study from Tamil Nadu, India. Available from: http://www.ruwsec.org/wp-content/uploads/2011/11/41.pdf(2007).