120

Arunkalaivanan A[1], Baptiste M[2], Sami T[2], Teo H[2]
1. *University of Melbourne,* ***2.*** *City Hospital*

URETHRAL DIVERTICULUM IN WOMEN: PROSPECTIVE CASE SERIES.

Hypothesis / aims of study

We describe various clinical presentations of urethral diverticulum,
which may mimic other pelvic floor disorders and result in diagnostic delay.
Management and outcome results are reported. Urethral Diverticulum in Women is not an uncommon problem. The reported incidence of urethral diverticulum is 1.4-4.7% and they present commonly during the 3rd to 5th decade of life. High Index of suspicion is necessary in women with chronic irritative symptoms, not responding to conventional treatments. It is characterised by varied clinical presentations constituting a management dilemma.

Study design, materials and methods

We reviewed 17 cases of urethral Diverticulum presented to the urogynaecology department between January 2006 and February 2011 prospectively. Patient demographics, History, clinical evaluation, diagnostic modalities and management plans were reviewed. All of them underwent Magnetic Resonance Imaging (MRI) prior to the procedure.

Results

Mean age (range)	45.6±17.3 (34-73)
Recurrent Urinary Tract Infection	10(58.8%)
Dyspareunia	7(42.2%)
Urgency	7(42.2%)
Frequency	7(42.2%)
Cystocele	4(23.5%)
Incidental finding	5(29.4%)

Table 1. Patient characteristics

Mean diverticular size mm (range)	1.2±0.98 (4-33)
Types by MRI	
Simple	9(53%)
Partial Horseshoe	7(41%)
Circumferential horseshoe	1(6%)
Location by Clinical & Cystoscopy	
Proximal	2(11.7%)
Middle	12 (70.6%)
Distal	2 (11.7%)
Undifferentiated	1 (6%)

Table 2. Findings by Magnetic Resonance Imaging, Clinical & Cystoscopy

The mean time from onset of symptoms to diagnosis of a urethral diverticulum was 24 ±5.6 months. Magnetic Resonance Imaging (MRI) identified the urethral diverticulum in all cases while voiding cystourethrography confirmed the diagnosis in 4 (23.5 %). They have been divided into two groups : A). (4-6mm largest axis range) -5(29.41%) B). 6-33mm largest axis range – 12(70.59%). All Group A was symptomatic with recurrent UTI whereas only 8(66.6%) in Group B were symptomatic. Transvaginal diverticulectomy was done in 12 women who were symptomatic (70.5%). Postoperative evaluation revealed complete resolution of symptoms which included recurrent UTI, dysuria and dyspareunia. One patient was unsure of surgery, whilst conservative approach was opted for asymptomatic patients 4(23.5%). The use of preoperative MRI altered the management in 2(11.7%) of women.

Interpretation of results

High Index of suspicion of urethral diverticulum is necessary in women with chronic irritative symptoms, not responding to conventional treatments. In our study, it was noticed that the diagnosis of urethral diverticulum in 5(29.4%) women was made when the patients were referred with the anterior vaginal mass. This shows that the clinical presentation of urethral Diverticula varies considerably from patient to patient and also may vary depending on when during the natural history of the disorder the diagnosis is made. Moreover, none of our patients presented with the all of classical clinical triad of dribbling, dyspareunia and dysuria unlike some other series. However, individually or collectively, these symptoms are neither sensitive or specific for urethral diverticulum. Smaller the diverticulum, the more symptomatic they are in this cohort of women.

Concluding message

This condition should be considered in women with recurrent UTI, dysuria, dyspareunia and irritative voiding symptoms not responding to conservative therapy. Smaller the diverticulum, the more symptomatic they are in this cohort of women. Surgical excision is the treatment of choice for symptomatic patients. Asymptomatic patients are followed conservatively. MRI appears to be the gold standard for diagnosing urethral diverticulum (1)

References

1. Dwarkasing RS, Dinkelaar W, Hop WC, Steensma AB, Dohle GR, Krestin GP. MRI evaluation of urethral diverticula and differential diagnosis in symptomatic women. AJR Am J Roentgenol. 2011 Sep;197(3):676-82.

Disclosures
Funding: None **Clinical Trial:** No **Subjects:** HUMAN **Ethics not Req'd:** it was a clinical series **Helsinki:** Yes **Informed Consent:** Yes