HOW DO DIARIES OF WOMEN WITH OAB DIFFER FROM ASYMPTOMATIC CONTROLS?

Aims of Study
To quantify clinically important differences in common diary variables between asymptomatic controls and women with OAB.

Methods
The 24-hr urinary diaries of 43 women presenting with symptoms of overactive bladder were analyzed and compared to the diaries of age- and race-matched asymptomatic controls chosen from among the diaries collected contemporaneously from 300 asymptomatic women (previously reported). Diary variables included daytime and nighttime urinary frequency, total urinary frequency, total intake and voided volumes, maximum voided volumes and mean voided volumes. Control subjects were matched for age (within 5 yrs) and race. Control subjects did not undergo physical examination.

Results
The 43 patients had a median age of 51 years (range 20-85) with median BMI 25 (17-46) and median parity 2 (0-5). Twenty (46%) were premenopausal. Twenty-six (60%) had concurrent symptoms of stress urinary incontinence and 14 (33) had concurrent pelvic organ prolapse symptoms. Physical examination confirmed support defects to the hymen or beyond in 19 (45%) OAB patients. The median number of voids was significantly greater in OAB women [11 (4-25)] than controls [8 (4-12)] –[Z=3.8, p<0.001]. The median value for mean voided volume was significantly lower in OAB women [171 mL (66-382)] than asymptomatic controls [238 (81-418)] –[Z=2, p=0.045]. There was no difference in maximum voided volume, total voided volume, voids per liter intake or total fluid intake.
Conclusions
The urinary diary is an excellent clinical and research tool in women with OAB. Although certain diary variables are known to be different in OAB sufferers, the magnitude of this difference is still poorly understood. This preliminary study suggests that a median reduction of three voids/24 hours and an increase of 70 mL in mean voided volume may be clinically important outcome goals. Further research is needed to study the relationship between quality of life improvement and global impression of bladder health with these quantitative diary improvements. Such research will need to stratify for concomitant disorders and incontinence severity.