

437

Lenherr S¹, Lavelle J²

1. University of Michigan, 2. Palo Alto VA

FREQUENT UTIS ARE ASSOCIATED WITH BLADDER MANAGEMENT CHANGES IN VETERANS WITH SPINAL CORD INJURY

Hypothesis / aims of study

Urinary tract infections (UTIs) are a serious problem for spinal cord injured (SCI) patients with associated neurogenic bladder dysfunction. UTIs lead to bacterial resistance and potential complications from antibiotics. Our aim was to evaluate the frequency of UTIs and changes in bladder management method.

Study design, materials and methods

Local IRB and VA Office of Research and Development were obtained. A retrospective manually verified cohort of veterans (VISN 21) was identified with traumatic SCI (tSCI). UTI diagnosis was determined by ICD-9 codes (FY2000 to FY2012). A 10% random sample (n=67) was obtained and all UTI encounters were reviewed manually for documentation of UTI and bladder management method at the time of that encounter. UTIs were classified as "frequent" if the veteran had ≥ 10 UTI encounters over the 12 year period.

Results

1104 tSCI veterans were identified, of which 667 had a UTI diagnosis between FY2000 and FY2012. The 10% random sample represented 66 veterans (1 female, 65 male). SCI level was classified as quadriplegic (44%), high paraplegic T1-T6 (23%) and paraplegic T7 or below (33%). The overall cohort had 556 encounters for UTI at 46 different facilities. Twenty (30%) of the veterans were considered to have frequent UTIs (collective 426 UTI encounters). Seventeen veterans (24%) had changes in their bladder management over the course of the study period. Those veterans that had ≥ 10 UTI encounters had 8.1 greater odds of switching bladder management method over the study period (chi-squared test, $p=0.003$) as compared to those with fewer UTI encounters. When switching bladder management method, the large majority switched from a non-indwelling device to an indwelling catheter (SPT or urethral foley).

Interpretation of results

1. Veterans with frequent UTI encounters are more likely to change bladder management method. 2. Bladder management changes lead to the use of indwelling catheters.

Concluding message

Further studies are warranted across the VA to determine patterns of neurogenic bladder and UTI management in traumatic SCI veterans.

Disclosures

Funding: S. Lenherr efforts are funded by NIH/NIDDK T32 DK07782 **Clinical Trial:** No **Subjects:** HUMAN **Ethics Committee:** Palo Alto VHA IRB committee and VA Office of Research and Development **Helsinki:** Yes **Informed Consent:** No