OUTPATIENT MID URETHRAL TISSUE FIXATION SYSTEM SLING FOR URODYNAMIC STRESS URINARY INCONTINENCE: THREE-YEAR SURGICAL AND QUALITY OF LIFE RESULTS

Hypothesis / aims of study
To evaluate the clinical effectiveness and quality of life (QOL) of outpatient mid urethral tissue fixation system sling (TFS) for urodynamic stress urinary incontinence at three-year follow-up.

Study design, materials and methods
We analysed 50 mid urethral TFS sling operations between 2007 and 2012 at Yokohama Motomachi Women’s Clinic LUNA which met the inclusion criteria.

Inclusion criteria: all patients with urodynamically proven “Genuine Stress Incontinence”, a positive standardized urinary stress test, unobstructed voiding, no OAB (overactive bladder), no previous urogynecological surgery and no pelvic organ prolapse.

Exclusion criteria: co-morbid conditions rendering the patient unsuitable for outpatient surgery.

The primary outcome was success defined as a negative 24-hour pad test, negative cough and valsalva stress test, and no re-treatment for SUI. Secondary outcome was improvement in quality of life which was assessed using Incontinence Questionnaire-Short Form (ICQI-SF) and Incontinence Impact Questionnaire Short Form (IIQ-7).

Results
All operations were done on an outpatient basis with no intraoperative complications. The operations were performed by 2 surgeons using local anesthesia and patients also received 2.5mg midazolam. All operations were done on an outpatient basis. Median operative time was 20 (14 - 55) minutes, median blood loss was 5.0 (0-100) ml. The primary cure rate result at three-year follow-up was 90%. Median total ICIQ-SF score changed from 12.0 (1.00 – 20.0) to 0.00 (0.00-19.0) and median total IIQ-7 score changed from 159 (0.00-350) to 0.00 (0.00-16.7) at three-year follow-up. All domains of the ICIQ-SF and IIQ-7 significantly improved at 3-year follow-up.

Interpretation of results
Results show that the TFS mid urethral sling operation is a simple, safe, effective procedure that may be done without difficulty at freestanding clinic on an outpatient basis and favorably improves subjective QOL of the patient.

Concluding message
Strength of this study is that midurethral TFS can be carried out in an outpatient facility. By using mid urethral TFS technique, we can avoid skin perforation and minimize tissue trauma. Anesthesia should be light and bleeding should be minimal, so we performed the operations successfully at a detached outpatient surgical clinic. The success rate result at three-year follow-up was 90%. It is comparable to TVT.

Disclosures
Funding: none Clinical Trial: Yes Public Registry: No RCT: No Subjects: HUMAN Ethics Committee: The Ethics Committees of the Yokohama Motomachi Women’s Clinic LUNA Helsinki: Yes Informed Consent: Yes