

EXTRACORPOREAL MAGNETIC INNERVATION THERAPY FOR THE TREATMENT OF STRESS AND URGE INCONTINENCE IN COMMUNITY-DWELLING WOMEN- A PILOT STUDY

Hypothesis / aims of study

The purpose of the study is to determine the effect of ExMI therapy on the treatment of women with SUI

Study design, materials and methods

104 women who were referred from Continence Nurse Clinic of General Out-Patient Clinic (GOPC), Tung Wah Hospital with diagnosis of SUI were enrolled. The range of their PFM contraction grading is from nil to weak. All patients received a course of 16 treatments twice a week for a period of 8 weeks. Each treatment consists of 10 minutes of stimulation at 10Hz, followed by 10 minutes of 50 Hz. They were evaluated at baseline and after completion of treatment by means of a per vaginal examination for PFM contraction grading, a questionnaire for frequency of incontinence episode, amount of urine loss of each leakage, number of pads used, a visual analogue score rating from 0 to 10 for how symptoms are bothering their social life. Besides, a patient satisfaction survey was performed at the end of the course for their acceptance of the therapy

Results

The results are based on data obtained in the study conducted from March to August 2010. A total of 97 patients completed the course of treatment and 7 patients dropped out because of busy schedule. 67 patients (69.07%) had stress incontinence and 14 of them had demonstrable urinary leakage by stress test. 30 patients (30.93%) had mixed incontinence. The mean age was 62.2 (ranging from 39-84). After a mean period of treatment (56.39 days), 73 patients (75.26%) showed improvement in PFM contraction grading, 74 patients (76.29%) reduced in frequency of incontinence episodes, 82 patients (84.54%) experienced less amount of urine loss when leakage, 49 patients (50.12%) used less number of pads and 79 patients (81.44%) had less bothering in their social life. The mean score was reduced from 5.01 to 2.62. No patients complained of adverse effects or deterioration of incontinence status. All 14 patients with genuine stress incontinence were recovered and showed negative stress test after treatment. The result of the patient satisfactory survey shows 81 patients (83.5%) rated "very satisfied" with the treatment while 15 patients (15.46%) rated "satisfied".

Interpretation of results

ExMI is proved to have positive effect in the treatment SUI. The patients demonstrated significant improvement in the PFM contraction grading, reduction in number of episodes of urine loss, and number of pads used. Many of them regained a better social life and felt less bothering.

Concluding message

As most of the patients are reluctant to consider surgical treatment for female SUI, ExMI has become a more attractive and acceptable treatment. Launching of ExMI therapy at GOPC is definitely beneficial to patient's accessibility of treatment. However, a further study should be conducted to evaluate the long-term efficacy and sustainability of the treatment.

<i>Specify source of funding or grant</i>	Tung Wah Board Fund sponsored the ExMI machine
<i>Is this a clinical trial?</i>	Yes
<i>Is this study registered in a public clinical trials registry?</i>	No
<i>Is this a Randomised Controlled Trial (RCT)?</i>	No
<i>What were the subjects in the study?</i>	HUMAN
<i>Was this study approved by an ethics committee?</i>	No
<i>This study did not require ethics committee approval because</i>	A pilot study on clinical service
<i>Was the Declaration of Helsinki followed?</i>	No
<i>This study did not follow the Declaration of Helsinki in the sense that</i>	not applicable
<i>Was informed consent obtained from the patients?</i>	Yes