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MIPS 2025 ABSTRACT COLLECTION

1 - Effects of transcutaneous tibial nerve stimulation on sexual function in women with neurogenic detrusor overactivity, sexual dysfunction, and multiple sclerosis

Athanasios Zachariou⁽¹⁾ - Erriketi Douvli⁽¹⁾ - Vaia Sapouna⁽²⁾ - Ioannis Giannakis⁽¹⁾ - Dimitrios Baltogiannis⁽¹⁾ - Athanasios Paliouras⁽¹⁾ - Grigorios Daligaris⁽¹⁾ - Pavlos Christodoulou⁽¹⁾ - Mai Ba Tien Dung⁽³⁾ - Cam Hoang Nguyen Phuc⁽⁴⁾ - Bou Sopheap⁽⁵⁾ - Atsushi Takenaka⁽⁶⁾ - Nikolaos Sofikitis⁽¹⁾

⁽¹⁾Department of Urology, University of Ioannina, Ioannina, Greece - ⁽²⁾Urology Outpatient Department, Physical Medicine and Rehabilitation Centre KENTAVROS, Volos, Greece - ⁽³⁾Department of Andrology, Binh Dan Hospital, Ho Chi Minh City, Viet Nam - ⁽⁴⁾Department of Urology, Binh Dan Hospital, Ho Chi Minh City, Viet Nam - ⁽⁵⁾Department of Urology, Cambodia-China Friendship Preah Kossamak Hospital, Cambodia, Cambodia - ⁽⁶⁾Department of Urology, Tottori University, Yonago, Japan

INTRODUCTION AND AIM OF THE STUDY

Multiple sclerosis (MS) is a chronic demyelinating disease that often results in significant neurological disability. Among women, MS is frequently associated with neurogenic detrusor overactivity (NDO) and female sexual dysfunction (FSD), both of which can severely impact quality of life. Although neuromodulation techniques such as posterior tibial nerve stimulation (PTNS) have been used to address urinary symptoms, their effect on sexual function remains underexplored—particularly in the form of transcutaneous tibial nerve stimulation (TTNS). This pilot study aimed to assess the impact of TTNS on sexual function in female MS patients concurrently suffering from NDO and FSD.

MATERIALS AND METHODS

A total of 65 female patients with relapsing-remitting MS, NDO, and varying levels of FSD were prospectively enrolled from September 2021 to December 2023. Sexual function was assessed using the Female Sexual Function Index (FSFI) and Female Sexual Distress Scale-Revised (FSDS-R), while bladder symptoms were evaluated via the OAB-v8 questionnaire. All participants underwent a standardized TTNS protocol. Patients were classified into three groups based on FSFI and FSDS-R scores: FSDa (with dysfunction and distress), FSDb (with dysfunction only), and no-FSD. EDSS scores were used to ensure stable MS status. Statistical analysis included non-parametric tests appropriate for small, skewed samples.

RESULTS

Out of 72 enrolled participants, 65 completed the study protocol. Mean age was 43.1 ± 7.3 years. Significant improvements in FSFI scores were observed in both FSDa and FSDb groups post-treatment ($p < 0.05$ across all FSFI domains), with 42.8% of FSDa patients showing no sexual distress at study completion. Overall, 38 patients (58.5%) demonstrated subjective improvement in OAB symptoms. Objective improvements in OAB-v8 scores were also statistically significant across all groups ($p < 0.05$). The EDSS scores remained stable, and no serious adverse events were reported.

INTERPRETATION OF RESULTS

The observed improvements suggest neuromodulatory effects extending beyond bladder control. The findings align with prior research on PTNS in female sexual health, suggesting TTNS may serve as a non-invasive alternative with similar efficacy and better tolerability.

CONCLUSIONS

TTNS offers a promising, minimally invasive approach for the management of sexual dysfunction and NDO in female patients with MS.

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3 - Impact of Pelvic Floor Rehabilitation on Bowel Function

Tuğba Kolomuç Gayretli⁽¹⁾ - Selver Özge Şefik⁽¹⁾ - Gülcan Kocaoğlu⁽¹⁾ - Ramazan Erda Pay⁽¹⁾ - Ayşe Naz Kalem Özgen⁽²⁾ - Gülin Feykan Yeğin⁽³⁾

⁽¹⁾ Etlik City Hospital, Department Of Obstetrics And Gynaecology, Ankara, Hindi - ⁽²⁾ Etlik City Hospital, Department Of Physical Medicine And Rehabilitation, Ankara, Hindi - ⁽³⁾ Ankara University Health Sciences Institute, Urogynecology Phd, Ankara, Hindi

INTRODUCTION AND AIM OF THE STUDY

The pelvic floor coordinates urinary and bowel functions, and pelvic floor rehabilitation (PFR) is expected to improve bowel symptoms. This study assessed the effect of a structured PFR program on bowel function using validated instruments.

MATERIALS AND METHODS

The study included 237 women whose primary complaint was urinary incontinence and participated in a supervised 24-week PFR program. Bowel function was evaluated at baseline, week 12, and week 24 using the Constipation Severity Instrument (CSI: total, obstructed defecation, colonic inertia, pain) and the Colorectal-Anal Distress Inventory (CRADI-8). Data were expressed as mean \pm SD or median (IQR). Longitudinal changes were analyzed with the Friedman test.

RESULTS

CSI total scores decreased from 22 (IQR 23) at baseline to 21 (IQR 22) at week 12, and 19 (IQR 19) at week 24 ($p < 0.001$). Subscores for obstructed defecation, colonic inertia, and pain showed significant improvement. CRADI-8 scores declined from 7 (IQR 9) to 6 (IQR 9) and 5 (IQR 7), respectively ($p < 0.001$).

INTERPRETATION OF RESULTS

Although initiated for urinary incontinence, PFR consistently improved bowel domains, confirming its multidimensional therapeutic effect.

CONCLUSIONS

PFR not only addresses urinary incontinence but also significantly improves bowel function, supporting its role as a comprehensive approach in pelvic floor dysfunction.

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Table 1. Longitudinal Changes in Bowel Function with Pelvic Floor Rehabilitation

	Baseline Mean \pm SD Median(IQR)	Week 12 Mean \pm SD Median(IQR)	Week 24 Mean \pm SD Median(IQR)	p-value *
CSI(Total)	22.6 \pm 15.1 22 (23)	22.1 \pm 14.6 21 (22)	19.7 \pm 12.8 19 (19)	<0.001
CSI-Obstructed Defecation	12.2 \pm 8.0 12 (13)	11.9 \pm 7.5 12 (12)	10.2 \pm 6.4 10 (10)	<0.001
CSI-Colonic Inertia	8.7 \pm 6.3 9 (11)	8.6 \pm 6.5 8 (12)	7.9 \pm 5.9 7 (10)	<0.001
CSI-Pain	1.6 \pm 2.7 0 (2)	1.7 \pm 2.6 0 (3)	1.6 \pm 2.4 0 (3)	<0.001
CRADI-8	8.5 \pm 6.6 7 (9)	7.1 \pm 6.3 6 (9)	6.4 \pm 5.5 5 (7)	<0.001

*Friedman test

CSI = Constipation Severity Instrument; CRADI-8 = Colorectal-Anal Distress Inventory

4 - Pelvic Floor Muscle Activation and Symptom Changes Following Pelvic Floor Rehabilitation in Patients with Post-Void Residual Urine and Mixed Symptom Profiles: A Surface Electromyography Study

Beyzanur Karaçuha⁽¹⁾ - Dilanur Kutlu Özkaraoğlu⁽²⁾ - Bahar Yüksel Özgör⁽¹⁾

⁽¹⁾ Bahar Yüksel Özgör Private Clinic, Bahar Yüksel Özgör Private Clinic, ISTANBUL, Turkey - ⁽²⁾ FACULTY OF HEALTH SCIENCES, İSTANBUL MEDİPOL ÜNİVERSİTESİ, ISTANBUL, Turkey

INTRODUCTION / OBJECTIVE

Post-void residual (PVR) urine and mixed pelvic floor dysfunctions are associated with impaired pelvic floor muscle activation. This study aimed to investigate the effects of pelvic floor rehabilitation on EMG measures and symptom severity in patients with PVR and heterogeneous pelvic floor disorders.

METHODS

A single-group prospective study including 38 patients was conducted. Pelvic floor rehabilitation was applied, and surface EMG recordings (Peak and Low values) and symptom severity scores were assessed pre- and post-intervention. After normality testing, Wilcoxon Signed Rank test was applied for Peak EMG, and paired t-tests were used for Low EMG and symptom scores. Statistical significance was set at $p < 0.05$.

RESULTS

Thirty-eight patients completed the study. No significant change was observed in Peak EMG values (Wilcoxon test, $p = 0.606$). Low EMG values significantly decreased after treatment (paired t-test, $p < 0.001$), indicating improved relaxation capacity. Symptom severity scores also significantly decreased post-treatment (paired t-test, $p < 0.001$).

CONCLUSION

Pelvic floor rehabilitation significantly improved pelvic floor muscle relaxation capacity and reduced symptom severity in patients with post-void residual urine and mixed pelvic floor dysfunctions. While Peak EMG activation did not change, enhanced relaxation appears to play a key role in symptomatic improvement in this patient population.

KEYWORDS

Rehabilitation; Electromyography; Pelvic Floor Dysfunction; Symptom Severity

Pelvic floor rehabilitation; EMG; relaxation capacity; symptom severity; pelvic floor dysfunction

5 - Pelvic Floor Strengthening with EMG Biofeedback in Addition to Stretching Exercises for the Management of Pelvic Dysfunctions in Endometriosis: Preliminary Findings

Çağla Özgören⁽¹⁾ - A. Nur Tunali Van Den Berg⁽²⁾ - Resul Karakuş⁽³⁾

⁽¹⁾Istanbul Medipol University, Institute of Health Sciences Physiotherapy and Rehabilitation Department, Istanbul, Turkey - ⁽²⁾Istanbul Medipol University, Faculty of Health Sciences Physiotherapy and Rehabilitation Department, Istanbul, Turkey - ⁽³⁾University of Health Sciences, Zeynep Kamil Women's and Children's Diseases Training and Research Hospital, Istanbul, Turkey

INTRODUCTION AND AIM OF THE STUDY

Endometriosis is a chronic condition linked to pelvic symptoms such as pain and dysfunction. EMG-biofeedback may improve pelvic floor control, and combined with stretching could enhance symptom management. This study examined EMG-biofeedback-assisted pelvic floor strengthening with stretching exercises on pelvic dysfunction and pain in women with endometriosis.

MATERIALS AND METHODS

14 women with endometriosis (mean age 34.93±4.98 years) participated in an 8-week program consisting of EMG-biofeedback-assisted pelvic floor strengthening (2 sessions/week, 30 minutes) combined with pelvic floor stretching exercises (5 sessions/week, 30 minutes). Pelvic symptoms were assessed pre-post intervention using Pelvic Floor Distress Inventory (POPDI-6, CRADI-8, UDI-6), while dysmenorrhea, dyspareunia, dyschezia, dysuria, and chronic pelvic pain levels were evaluated with Visual Analog Scale (VAS).

RESULTS

Significant pre-post improvements were found. POPDI-6 scores, reflecting prolapse symptoms, decreased significantly ($p=0.009$). CRADI-8 scores, assessing colorectal symptoms, also improved ($p<0.001$). Similarly, UDI-6 scores, reflecting urinary dysfunction, showed a significant reduction ($p<0.001$). VAS scores decreased significantly across all pain parameters ($p<0.05$).

INTERPRETATION OF RESULTS

These findings show that adding EMG-biofeedback-assisted pelvic floor strengthening with stretching exercises improved prolapse, urinary, colorectal symptoms and pain outcomes in endometriosis.

CONCLUSIONS

EMG-biofeedback-assisted pelvic floor strengthening with stretching exercises improved pelvic floor function, symptoms, and pain in endometriosis. In endometriosis, hypertonicity contributes to pelvic floor dysfunction and muscle weakness. Therefore, achieving balanced contractions—by combining relaxation with strengthening—appears to be crucial in controlling symptoms. Despite limited sample size, these preliminary findings highlight EMG-biofeedback as promising adjunct to conventional exercise-based approaches, with notable improvements also observed in pain levels. Larger scale studies are needed to confirm these results.

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6 - The Effects of Tele-Pilates Exercise on Menopausal Symptoms, Quality of Life, Depression, and Anxiety in Postmenopausal Women

Gizem E. Balci Arslan⁽¹⁾ - Manolya Acar⁽²⁾ - Elif Nazlı Cetindag⁽³⁾ - Bengisu Tufekci⁽⁴⁾ - Emel Sahin⁽⁵⁾

⁽¹⁾ Bayındır Hospital, Department of Physical Therapy and Rehabilitation, Ankara, Turkey - ⁽²⁾ Baskent University, Department of Physical Therapy and Rehabilitation, Ankara, Turkey - ⁽³⁾ Lössante Children's and Adult Hospital, Gynecology and Obstetrics, Ankara, Turkey - ⁽⁴⁾ Gaziantep Islamic Science and Technology University, Department of Physiotherapy Program, Gaziantep, Turkey - ⁽⁵⁾ Cyprus Aydın University, Department of Physical Therapy and Rehabilitation, Girne, Cyprus

INTRODUCTION

Although telemedicine is widely used, the effects of tele-pilates on menopausal symptoms, quality of life, depression and anxiety in postmenopausal women remain unclear. This study aimed to evaluate these effects in postmenopausal women.

METHODS

Sample size was determined by power analysis based on the study of Ağıl et al. (1); 40 postmenopausal women were separated into two groups: tele-pilates and control. Pilates exercises were performed twice a week for 6 weeks via online.

Evaluation:

Menopausal Symptoms Assessment Scale,

Menopausal Quality of Life Scale,

Beck Depression Scale,

State and Trait Anxiety Inventory before and after 6 weeks.

Interventions:

The women in the tele-pilates group participated in 60-minute sessions (10-minutes warm-up, 40-minutes main workout, 10-minutes cool-down) twice a week for 6 weeks via Zoom, led by a physical therapist and pilates instructor. The program included core muscle strengthening, balance, stretching, and proper breathing techniques, with the number of repetitions increasing each week; no intervention was applied to the control group.

RESULTS

After tele-pilates, significant improvement was observed in somatic ($p<0.001$), psychological ($p=0.001$) and total ($p<0.001$) subparameters of the menopausal symptom scale, while urogenital symptoms remained unchanged ($p=1.000$). The vasomotor ($p<0.001$), psychosocial ($p=0.002$), physical ($p<0.001$), and total ($p<0.001$) subparameters of the Menopausal Quality of Life Scale showed statistically significant improvement, whereas the sexual subdimension did not change ($p=0.163$). Depression levels significantly improved in the tele-pilates group ($p=0.025$), as did state anxiety ($p<0.001$); however, trait anxiety did not change ($p>0.05$). In the control group, somatic ($p=0.021$) and total ($p=0.015$) menopausal symptoms and physical ($p=0.042$) and total ($p=0.017$) quality of life scores worsened.

CONCLUSIONS

Tele-pilates exercises improved somatic and psychological menopausal symptoms, overall quality of life, depression and state anxiety in postmenopausal women, but had no significant effect on urogenital symptoms or sexual quality of life.

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7 - Postpartum Urinary Incontinence: Can Training Programs Make a Difference?

Cristina Gallego-Gómez⁽¹⁾ - Claudia Quezada-Bascuñán⁽¹⁾ - Ana Isabel Torres-Costoso⁽¹⁾ - Sandra Martínez-Bustelo⁽²⁾ - Asunción Ferri-Morales⁽¹⁾

⁽¹⁾ Universidad De Castilla La Mancha, Nursing, Physiotherapy And Occupational Therapy, Toledo, Spain - ⁽²⁾ Universidad Da Coruña, Department A Coruña, A Coruña, Spain

INTRODUCTION AND AIM

Urinary incontinence (UI) is a common symptom after childbirth. Training interventions are recommended for its management. The aim of our study was to evaluate the effects of abdominal and/or pelvic floor muscle training (PFMT) combined with other conservative tools.

MATERIALS AND METHODS

The MEDLINE, Scopus, Cochrane Library, WoS and PEDro databases were searched from inception to November 6th, 2024. Three reviewers reviewed titles, abstracts and full texts.

Experimental studies on training interventions for postpartum UI severity were included. The Hartung-Knapp-Sidik-Jonkman method calculated pooled standardized mean differences (SMDs) with 95% CI. Subgroup analyses considered population, intervention, and outcome type. (PROSPERO: CRD42023489312).

RESULTS

Nineteen studies were included. There was no difference in UI severity in the analyses comparing training interventions versus controls or education interventions (SMD=-1.08; 95% CI:-2.24 to 0.08). According to the pre-post analyses, PFMT (SMD=-1.45; 95% CI: -2.61 to -0.28), PFMT through electrical stimulation (ES) /biofeedback (BFB)(SMD -2.16; 95% CI:-3.50 to -0.81) and PFMT combined with abdominal muscle training (AMT) (SMD=-1.73; 95% CI:-3.42 to -0.03) modalities showed a significant reduction of UI in postpartum women.

INTERPRETATION OF RESULTS

Combining PFMT with other interventions showed promising trends but no significant effects, likely due to small samples and study variability. However, reanalysis with the DerSimonian and Laird method revealed differences for all interventions except AMT, highlighting the need for further research.

CONCLUSIONS

This meta-analysis provides an overview of the evidence supporting PFMT alone or in combination with ES, BFB or AMT as suitable conservative approaches for the treatment of UI in the postpartum period. Further studies are needed to establish recommendations for abdominal wall training alone in the treatment of UI.

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8 - Is There Enough Evidence to Place Magnetic Stimulation as a Treatment Option for Urinary Incontinence?

David Lukanovic⁽¹⁾ - Kristina Drusany Starič⁽¹⁾ - Miha Matjašič⁽²⁾ - Tina Kunič Pirš⁽¹⁾ - Adolf Lukanovic⁽¹⁾

⁽¹⁾Department of Gynecology, Division of Gynecology and Obstetrics, University Medical Centre Ljubljana, Ljubljana, Slovenia - ⁽²⁾Department of Education Studies, Faculty of Education, University of Ljubljana, Ljubljana, Slovenia

INTRODUCTION AND AIM OF THE STUDY

Magnetic stimulation (MS) is a conservative treatment for urinary incontinence (UI), first approved by the FDA in 1998. Its advantages include being non-invasive and well tolerated, yet evidence for long-term benefit remains weak. Earlier EAU guidelines (2025) advised against offering MS for UI or OAB. The aim of this presentation is to highlight the role of MS in female UI, based on our 10 years of clinical experience, two prospective studies, and two systematic reviews (SRs) evaluating efficacy and safety.

MATERIALS AND METHODS

Over the last decade, we conducted a prospective non-randomized study and a randomized, sham-controlled trial (RCT). In the first study, 75 women with SUI, MUI, or UUI completed a 3-month follow-up. In the RCT, 70 women with UUI were randomized 2:1 to active MS or sham treatment. All participants received 12 sessions over 6 weeks, with follow-up at 6 months. Outcomes were assessed using the ICIQ-UI SF, the only validated Slovenian questionnaire. Additionally, we performed two SRs according to PRISMA, with methodological quality evaluated by AMSTAR2 and NHLBI tools.

RESULTS

In the non-randomized study, ICIQ-UI SF scores improved across all UI types, with the largest reduction observed in women with SUI. In the RCT, the active group showed a significantly greater improvement in ICIQ-UI SF scores compared with sham (mean change -4.05 ± 3.23 vs -1.19 ± 1.72 ; $p < 0.001$). These changes exceeded the minimum clinically important difference, confirming both statistical and clinical significance.

INTERPRETATION OF RESULTS

Our findings demonstrate a positive effect of MS for both SUI and UUI. The mechanism is based on Faraday's law of induction: induced currents stimulate pelvic floor muscles and modulate pudendal nerve pathways, enhancing urethral support and inhibiting detrusor overactivity. Protocols remain heterogeneous, but evidence suggests that 12 sessions over 6 weeks with follow-up at 6 months provide meaningful benefit. SRs further confirmed that adverse events are minimal and transient.

CONCLUSIONS

MS is an effective, safe, and painless treatment for UI, particularly valuable for women who do not respond to or tolerate pharmacological therapy, and for those unsuitable for surgery. Our studies and SRs support its role as a viable option among conservative therapies. Nevertheless, further multicenter RCTs with standardized protocols and longer follow-up are needed to establish MS more firmly in clinical practice.

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9 - A Novel Approach in the Management of Stress Urinary Incontinence: Functional Core-Integrated Pelvic Floor Physiotherapy – A Case Study

Tugba Birben Kurt⁽¹⁾ - *Bengisu Tufekci*⁽²⁾

⁽¹⁾ Recep Teyyip Erdogan University, Guneysu Vocational School Of Physical Therapy And Rehabilitation, Department Of Women's Health In Physiotherapy, Rize, Turkey - ⁽²⁾ Gaziantep Islamic Science And Technology University, Vocational School Of Health Services, Physiotherapy And Rehabilitation Department, Gaziantep, Turkey

INTRODUCTION AND AIM OF THE STUDY

High-impact sports like CrossFit can overload the pelvic floor, increasing the risk of stress urinary incontinence (SUI) in female athletes (1). Despite the proven benefits of pelvic floor muscle training (PFMT), core integration remains limited (2,3). This case reports outcomes of a core-integrated PFMT program in a female CrossFit athlete with SUI.

MATERIALS AND METHODS

A 29-year-old nulliparous CrossFit athlete reported SUI during squats and deadlifts. She showed poor pelvic awareness and weak voluntary control.

Initial scores:

- ICIQ-UI SF: 6/21
- Oxford scale: +2/5
- EMG: low pelvic floor activity

Intervention: A 10-week program of PFMT, EMG biofeedback, diaphragmatic training, and functional exercises. Daily home training and plyometric drills were added after week 4.

RESULTS

After 10 weeks:

- ICIQ-UI SF dropped from 6 to 1
- EMG activity improved from 30% to 65%
- Muscle strength increased to +4/5
- Functional tests showed better pelvic control
- Athlete reported full symptom relief and training confidence
- Subject feedback: complete resolution of symptoms, improved self-confidence, and return to high-intensity training without concern

INTERPRETATION OF RESULTS

Pelvic floor rehab improved symptoms and function. EMG biofeedback enhanced awareness, and task-specific training supported performance. Core-integrated PFMT may address gaps in athlete-focused SUI care.

CONCLUSIONS

Core-integrated PFMT is effective and applicable for managing exercise-induced SUI in female athletes. It supports symptom relief, function, and confidence. Broader trials are needed.

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10 - Impact of Vibration-Assisted Intravaginal Radiofrequency on Sexual Health: A Comparative Clinical Study

Jesus Rodríguez Lastra⁽¹⁾ - Manuel Rozalén Bustín⁽¹⁾ - Ana Tremiño Rodríguez⁽¹⁾

⁽¹⁾Universidad Alfonso X El sabio, Universidad Alfonso X El Sabio, Villanueva de la Cañada, España

INTRODUCTION

The use of high-power intravaginal radiofrequency for GSM disorders using a finger-shaped device has had evident results. On the other hand, the use of a vibrator has been introduced to improve sexual function in women, also reporting good results in the ISFS-19. We added a 100 MHz vibrator to the Capenergy MJS device to find out if these simultaneous effects improve sexual function with GSM.

SUBJECTS AND METHODS

32 patients were studied assigned to each group simple random sampling, 16 with vibrator and 16 without. In both cases, same method was used: frequency with best absorption and energy power with greatest absorption. Device was applied externally and was introduced without using vibrator, and one minute of vibration was applied every 4 minutes. Non-vibration group, 20 minutes were applied equally to the vulva and vagina. Treatment was repeated twice a week for 4 weeks. Participants were asked to answer the VSQ-21, ISFS-19 and VAS scale before and after and two months.

RESULTS

Response VAS scale decreased for both groups in a statistically significant way with vibration 3.63 before 2 after, without vibration 2.81 before 1.75 after. All VSQ-21 values in its 4 domains improved with vibration 9.25 before and 4.68 after, without vibrator 8.91 before 2.58 after. Results were statistically significant $p < 0.05$, with those who used vibrator being better. ISFS-19 also improved the values 22.1 to 25.3 with vibrator and 20.7 to 25.6 if vibration these results are statistically significant $p < 0.05$ achieving better results in improvement sexual activity in the vibrator group. The values remain low at two months.

CONCLUSION

As can be seen in results, although both groups improve their symptoms, simultaneous use of vibration for 5 minutes improves GSM symptoms and sexual activity more and does so more powerfully than when energy is applied alone

11 - Intravesical Exosome Injection for Underactive Bladder and Overflow Incontinence in a Geriatric Patient: A Case Report and Surgical Video Presentation

Ebru Yücel⁽¹⁾ - Bulut Varlı⁽²⁾

⁽¹⁾Department of Obstetrics and Gynecology, Ankara University, ANKARA, Turkey - ⁽²⁾Department of Obstetrics and Gynecology, Ankara University, ANKARA, Turkey

INTRODUCTION

Urinary retention and overflow incontinence in older women often result from underactive bladder (UAB), for which conventional therapies provide limited benefit. Exosomes—nano-sized vesicles secreted by cells—have gained attention in regenerative medicine due to their ability to mediate intercellular communication and stimulate tissue repair. Mesenchymal stem cell (MSC)-derived exosomes, in particular, are believed to replicate the regenerative effects of stem cells in a cell-free manner. Here, we present a geriatric case treated with intravesical MSC-exosome injections and describe the technical approach in detail.

CASE REPORT

A 74-year-old female with chronic urinary retention and overflow incontinence, accompanied by recurrent urinary tract infections and absent voiding sensation, required intermittent catheterization and used four pads daily.

Under general anesthesia, during diagnostic cystoscopy, Wharton's jelly-derived MSC exosomes (ATI-EXO[®], Atigen Cell; 5×10⁹ particles/5 mL) were injected submucosally into eight sites—four on each of two horizontal lines across the posterior bladder wall. A second identical injection was performed three weeks later.

Post-treatment, she reported improved voiding sensation, spontaneous urination, and reduced pad usage (from four to one per day). No further UTIs occurred during the 12-month follow-up. Preoperatively, uroflowmetry was not possible due to complete retention; postoperatively, she declined repeat testing due to subjective resolution.

DISCUSSION AND CONCLUSION

This case suggests that intravesical exosome injection may be a promising, minimally invasive strategy for UAB-related symptoms. The technique is feasible under cystoscopic guidance and may offer durable symptomatic relief. Further studies are needed to confirm its therapeutic value.

12 - Laparoscopic Lateral Suspension for Vaginal Cuff Prolapse in a Complex Post-Hysterectomy Case

Ömer Faruk Öz⁽¹⁾ - Can Dinç⁽¹⁾ - İnanç Mendilcioğlu⁽¹⁾ - Yavuz Yılmaz⁽¹⁾

⁽¹⁾ Akdeniz University, Akdeniz University Hospital, Antalya, Turkey

INTRODUCTION AND AIM OF THE STUDY

Vaginal cuff prolapse following hysterectomy is a significant pelvic floor disorder that negatively impacts the quality of life in elderly women. Laparoscopic lateral suspension has emerged as a minimally invasive surgical technique with high anatomical and functional success rates. This report presents a case of laparoscopic bilateral lateral suspension performed in a patient with a history of hysterectomy and previous pelvic reconstructive surgery.

MATERIALS AND METHODS

A 69-year-old postmenopausal woman (G3P2K1) presented with a palpable vaginal mass. She had a history of total abdominal hysterectomy with bilateral salpingo-oophorectomy (2004) and cystocele, rectocele, and perineoplasty repair (2024). Examination showed grade 2-3 vaginal cuff prolapse and advanced cystocele. Laparoscopic lateral suspension was planned.

RESULTS

The procedure was completed laparoscopically under general anesthesia. Omental adhesions were lysed, and the vaginal cuff was anchored bilaterally to the lateral parietal peritoneum with synthetic mesh, followed by reperitonealization. No intraoperative complications occurred. The patient was stable postoperatively and discharged with a urinary catheter. On day 10, the cuff position was normal and ultrasound was unremarkable.



INTERPRETATION OF RESULTS

Laparoscopic bilateral lateral suspension achieved effective anatomical correction of total vaginal cuff prolapse in a patient with prior pelvic reconstruction. Synthetic mesh fixation to the lateral parietal peritoneum provided stable support without complications. This case demonstrates that the procedure can be safely performed in complex surgical histories with meticulous dissection.

CONCLUSIONS

In cases of total vaginal prolapse following hysterectomy, laparoscopic lateral suspension offers a safe and effective method for anatomical restoration with low complication rates. In patients with prior pelvic reconstructive surgery, careful dissection and individualized surgical planning can yield successful outcomes.

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13 - Recurrent Pelvic Organ Prolapse After Laparoscopic Lateral Suspension: vNOTES Repair of Stage III Enterocele

HANDE DONMEZ KOKSAL⁽¹⁾ - BULUT VARLI⁽¹⁾ - BATUHAN TURGAY⁽¹⁾

⁽¹⁾ ANKARA UNIVERSITY, Obstetrics and Gynecology, ANKARA, Turkey

INTRODUCTION

Pelvic organ prolapse (POP) is common in post-hysterectomy women. Laparoscopic lateral suspension (LLS) provides minimally invasive repair, yet recurrence can occur (1). Vaginal natural orifice transluminal endoscopic surgery (vNOTES) is a novel option for recurrent POP.

CASE DESCRIPTION

A 70-year-old woman presented with vaginal bulge, urinary frequency, and voiding difficulty, worsening on prolonged standing. She had controlled hypertension and a history of vaginal hysterectomy for POP six years earlier. Examination revealed total vaginal vault prolapse. She underwent LLS with bilateral salpingo-oophorectomy. Postoperative recovery was uneventful, and 2-month follow-up showed satisfactory results. At 6 months, however, she developed a stage III enterocele.

SURGICAL MANAGEMENT

Enterocele repair was performed via vNOTES with colporrhaphy and perineoplasty. The procedure was uncomplicated. Written informed consent was obtained from the patient for video recording and publication.

OUTCOMES

Recovery was smooth, with resolution of bulge and urinary complaints. Anatomic support was restored.

CONCLUSIONS

This case illustrates that recurrence may occur after LLS, with enterocele as a manifestation. vNOTES repair provided a safe, minimally invasive solution, demonstrating feasibility and favorable outcomes for complex recurrent POP.

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14 - Robot-Assisted Multiple Myomectomy via Posterior Colpotomy for Symptomatic Uterine Fibroids Presenting With LUTS: A Case Report

Elif Nazli Cetindag⁽¹⁾ - Halis Dogukan Ozkan⁽²⁾

⁽¹⁾ Graduate School of Health Sciences, Urogynecology Doctorate Programme, Ankara University, Ankara, Turkey - ⁽²⁾ Department of Obstetrics and Gynecology, Losante Child and Adults Hospital, Ankara, Turkey

INTRODUCTION AND AIM OF THE STUDY

Uterine fibroids are the most common benign tumours of the reproductive tract (1). Beyond abnormal bleeding and infertility, they are frequently associated with lower urinary tract symptoms (LUTS) such as pollakiuria, urgency, nocturia, and constipation due to mass effect (2). Nearly half of women with myomas experience LUTS, highlighting the importance of recognizing urogynecologic manifestations in fibroid management (3).

CASE PRESENTATION

We report the case of a 31-year-old woman who presented with urinary frequency, constipation, and feeling of pelvic fullness. Pelvic imaging revealed multiple myomas, the largest measuring 9.5 cm. Robot-assisted multiple myomectomy was performed, and all fibroids were removed via posterior colpotomy, eliminating the need for anterior abdominal wall fascial repair or morcellation. The patient mobilized six hours postoperatively and was discharged on the first postoperative day. Symptom scores improved markedly: POPDI-6 decreased from 33.3 to 0, CRADI-8 from 28.1 to 6.25, UDI-6 from 25 to 0, and OAB-V8 from 16 to 4. The postoperative course was uneventful, and at follow-up, she reported significant improvement in urinary frequency and pelvic discomfort, with no recurrence of symptoms.

CONCLUSIONS

This case illustrates the close relationship between uterine fibroids and LUTS, as well as bowel dysfunction. Robot-assisted myomectomy with posterior colpotomy provides effective symptom relief, minimal morbidity, and rapid recovery, making it a valuable uterine-sparing approach for young symptomatic patients.

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15 - APPROACH TO POSTPARTUM PELVIC ORGAN PROLAPSE WITH LAPAROSCOPIC SACROCOLPORECTOPEXY

Ayşe Seyma Kocaman⁽¹⁾ - Ulaş Çoban⁽²⁾ - İsmail Alper Tarım⁽³⁾

⁽¹⁾Sağlık Bakanlığı Üniversitesi İstanbul Kanuni Sultan Süleyman Eğitim Ve Araştırma Hastanesi, Kadın Hastalıkları Ve Doğum Kliniği, İstanbul, Turkey - ⁽²⁾Ondokuz Mayıs Üniversitesi Eğitim Ve Araştırma Hastanesi, Kadın Hastalıkları Ve Doğum Anabilim Dalı, Samsun, Turkey - ⁽³⁾Ondokuz Mayıs Üniversitesi Eğitim Ve Araştırma Hastanesi, Genel Cerrahi Anabilim Dalı, Samsun, Turkey

INTRODUCTION AND AIM OF THE STUDY

Rectal prolapse is the invagination of all rectal wall layers, appearing as internal or external types. In the external type, protrusion occurs spontaneously or during straining, most commonly leading to obstructive defecation. Etiology includes chronic constipation, obesity, connective tissue weakness, and obstetric history. Surgery is the only curative treatment. Aim: To present a surgical video of laparoscopic sacrocolporectopexy for pelvic organ prolapse, predominantly rectocele, after childbirth [1].

MATERIALS AND METHODS

A 33-year-old female with one vaginal and one cesarean delivery presented with incomplete evacuation despite prolonged straining. Examination revealed stage 2 cystocele, stage 2 rectocele, and stage 2 apical prolapse, with 4 cm rectal protrusion during straining. Endoanal ultrasonography showed sphincter defects, and MR defecography demonstrated pelvic floor weakness and intra-anal intussusception. Laparoscopic sacrocolporectopexy was performed [2].

RESULTS

Under general anesthesia, sacrocolporectopexy was carried out laparoscopically. The anterior rectal wall was dissected, and mesh was fixed to the levator ani and promontory before peritoneal closure. The operation was uneventful.

INTERPRETATION OF RESULTS

No postoperative complications occurred. The patient was discharged on day 2. Follow-up showed marked symptom improvement. Literature confirms ventral rectopexy reduces obstructed defecation symptoms and improves continence [2,3].

CONCLUSIONS

Sacrocolporectopexy is a safe and effective treatment for pelvic organ prolapse with predominant rectocele in selected cases, achieving both anatomical and functional improvement [1-3].

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16 - Laparoscopic Repair of Isthmocele: A Case Report

Can Dinç⁽¹⁾ - Ömer Faruk Öz⁽¹⁾

⁽¹⁾ Akdeniz University, Obstetrics And Gynecology, Antalya, Turkey

Objective

Isthmocele, a uterine scar defect that may occur after cesarean section, can lead to menstrual irregularities, intermenstrual bleeding, and sometimes infertility. With the increasing rates of cesarean delivery, its incidence has also risen. Minimally invasive surgical techniques enable effective and safe repair of these lesions. This report presents a case of laparoscopic repair in a patient diagnosed with isthmocele based on clinical and imaging findings after presenting with menstrual irregularities and intermenstrual bleeding.

Method

A 29-year-old G1P1, A Rh (+) woman presented with menstrual irregularities and intermenstrual bleeding. Her medical history included one prior cesarean delivery. Transvaginal ultrasonography revealed a retroverted uterus, an endometrium measuring 6 mm, and a defect at the cesarean scar site consistent with isthmocele; adnexa appeared normal. Pelvic MRI demonstrated an 8×5 mm defect in the uterine isthmus consistent with a cesarean section scar. The preoperative diagnosis was "isthmocele," and laparoscopic repair was planned.

Results

Laparoscopic exploration revealed peritoneal adhesions in the isthmocele area, which were released with adhesiolysis. Both ovaries and the left fallopian tube were normal. The defect, located in the anterior uterine segment close to the cervix, was localized with the aid of hysteroscopic transillumination. The scar tissue was excised, and the defect was closed with a V-Loc suture. Hemostasis was achieved, and the procedure was completed without complications.

Conclusion

Isthmocele is an important pathology that can cause secondary infertility and menstrual irregularities. Laparoscopic repair is a safe and effective option for restoring anatomic integrity and alleviating symptoms. As in this case, favorable outcomes can be achieved in young patients with ongoing fertility desires through appropriate surgical planning.

17 - Step-by-step single incision sling technique for stress urinary incontinence

Berna Haliloglu Peker⁽¹⁾ - Ergul Demircivi⁽²⁾ - Hakan Peker⁽³⁾ - Idil Duran⁽¹⁾

⁽¹⁾ Istanbul Maltepe University, Obstetrics and Gynecology, Istanbul, Turkey - ⁽²⁾ Istanbul Medeniyet University, Obstetrics and Gynecology, Istanbul, Turkey - ⁽³⁾ Nisantasi Vocational School, Obstetrics and Gynecology, Istanbul, Turkey

INTRODUCTION AND AIM OF THE STUDY

In our video, we aimed to summarize the detailed steps of the mini-sling procedure using a single incision technique.

MATERIALS AND METHODS

The mesh material was applied to the patient using a single-incision technique in a total of six steps.

Step1: Hydrodissection

Step2: Vertical incision under the urethra

Step3: Dissection of paraurethral spaces (creation paraurethral spaces)

Step4: Insertion of mesh into the obturator membrane

Step5: Incision closure

Step6: Vaginal sulci check

RESULTS

Incontinence surgery was performed in a short time using a minimally invasive technique.

CONCLUSIONS

Compared to mid-urethral slings in the treatment of stress urinary incontinence, single-incision mini-slings are considered advantageous due to their shorter operative time and reduced incidence of organ injury (1). Furthermore, both techniques have shown similar outcomes in terms of cure rates, quality of life, and postoperative complications (2). Long-term follow-up studies have demonstrated similar cure rates between the groups (3).

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18 - Idiopathic vestibulo-rectal fistula in a 14-year-old patient: A case report

Tony Bazi⁽¹⁾ - Nathalie Chamseddine⁽¹⁾ - Macram Wakim⁽¹⁾ - Tara Nader⁽¹⁾ - Omar Alameddine⁽¹⁾ - Ali Safadi⁽¹⁾ - Salwa AboulJoud⁽¹⁾

⁽¹⁾American University of Beirut Medical Center, Obstetrics and Gynecology, Beirut, Lebanon

Idiopathic vestibulorectal fistulas in young female adolescents are extremely rare. In pediatric population, they are often caused by congenital malformations, however, acquired cases in adolescents can be secondary to trauma, infection, Crohn's disease, or in rarer cases malignancy. We report here the case of a 14-year-old girl, not sexually active, who presented with progressive intermittent foul-smelling brown discharge per vagina over the past year. Over the preceding three months, the episodes had become more frequent, with a foul-smelling discharge but no overt passage of stool or flatus per vagina. On physical exam, a 6–10 mm vestibulorectal fistula with intact anal sphincter tone was noted. A Q-tip inserted through the vestibular opening was palpated in the rectum above the dentate line. Upon further investigation, a biopsy of the fistulous tract done in the operating room was normal, excluding inflammatory bowel disease and neoplasia. Under spinal anesthesia, a wet gauze was wrapped to a probe and inserted into the rectum to protect the posterior rectum during dissection. Gentle dissection with scissors was used to mobilize the fistulous tract circumferentially, separating the mucosal lining from the surrounding muscularis. The fistulous tract was then excised in its entirety. Layered closure was then performed: rectal mucosa, muscularis, and vestibular tissues were approximated separately in three layers to reduce tension and ensure adequate repair.

The patient was discharged home on day 1 post-op with complete recovery. She was maintained on low residual diet for 2 weeks, and was started on Laxatives at 2 weeks post-op. Upon telehealth follow-up 1 month later, the patient reported complete resolution of her symptoms.

23 - Natural Autologous Tissue Repairing (N.A.Tu.Re.) Thecnique: a new vaginal collagenopietic approach to the treatment of pelvic floor prolapse

First preliminary Italian Study

Alessandro D'afiero ⁽¹⁾ - Claudia Rita Mazzarella ⁽¹⁾

⁽¹⁾ Istituzione, Santa Maria Hospital, Bari, Italy

INTRODUCTION

The balance of forces of the pelvic floor connective tissue is essential for normal pelvic function (Integral Theory). In 2024 Integral Theory Paradigm present a radical change in thinking: the control of the bladder and anus-rectum functions are not into the organs, but into the pelvic muscles that contract against the ligaments. **The integrity of the collagen, combined with the dual neuronal control, is essential for the correct function of this system.** The collagen alterations are the key of pathogenesis of the prolapse and the pivot of the surgical approach should be the restoration of the collagen tissue. "Collagenopietic Surgery", which uses a synthetic or biological mesh as a matrix to stimulate neo collagenases, is the new frontier.

MATERIALS AND METHODS

An equilateral triangle patch of vaginal mucosal is prepared, the apex is fixed under the bladder neck, and the basal angles are solidified with the uterosacral stumps and sacrospinous ligaments with auxilium of a device – Richter technique.

RESULTS

40 women underwent the procedure under sponal anesthesia. Mean age: 55.9 years. POP-Q Ba: from 3.6 cm to -3 cm, Vaginal apex (point C): from 2 cm to -7 cm. PFDI-20 Quality of Life Score: POP DI from 2.26 to 0.9 ; CRAD from 1.268 to 0.785; UDI from 2.43 to 1.15 Complications: 1 case of perivesical hematoma, treated conservatively. No other major intraoperative or immediate postoperative complications documented. Comorbidities: 11 Diabetes, 4 Smokers, 20 underwent concomitant vaginal hysterectomy. Mean follow-up: 17.6 months. **INTERPRETATION OF**

RESULTS

N.A.Tu.Re. Technique restores pelvic support system, based on reimplantation of vaginal patch, considered a good matrix and the best tissue to stimulate a new collagenopoiesis.

CONCLUSIONS

Follow-up data suggest that autologous matrix-based collagen-based surgery may represent a new approach to resolving pelvic floor dysfunction. Long-term follow-up is needed to confirm the timing of this approach.

24 - Assessment of the pelvic floor using computed tomography with a 3D slicer in vaginally delivered primiparous women

İrem Şenyuva⁽¹⁾ - Tuğberk Baştürk⁽²⁾ - Hülya Özdemir⁽³⁾ - M.Utkahan Özcan⁽¹⁾

⁽¹⁾ Usak University Medical Faculty, Obstetrics and Gynecology, Usak, Turkey - ⁽²⁾ Usak University Medical Faculty, Radiology, Usak, Turkey - ⁽³⁾ Pamukkale University Medical Faculty, Anatomy, Denizli, Turkey

INTRODUCTION AND AIM OF THE STUDY

During the second stage of labor, maternal-fetal dynamics such as pelvic floor can affect perform an episiotomy (1). The objective of the study was to assess the primiparous women who underwent vaginal delivery (episiotomy or not) compared with pre pregnancy pelvic floor radiological findings about the performance of episiotomy.

MATERIALS AND METHODS

Women's computed tomography (CT) scan were transferred to 3D slicer programme than measured and compared.

RESULTS

The levator hiatus antero-posterior (AP) diameters (mm) were 72.86 ± 9.13 , 68.33 ± 5.86 in groups with or not episiotomy respectively ($p=0.135$). Transverse diameter of levator hiatus (mm) were 37.91 ± 7.43 , 44.86 ± 7.31 in groups with or not episiotomy respectively ($p=0.006$). The high significant correlation between levator hiatus AP and transverse diameters in the no episiotomy group ($r=0.657$, $p<0,05$). There were not significant differences between puborectal muscle volume (cm^3) between the groups (9.51 ± 2.89 , 9.36 ± 2.99 , $p= 0.709$).Figure-1.

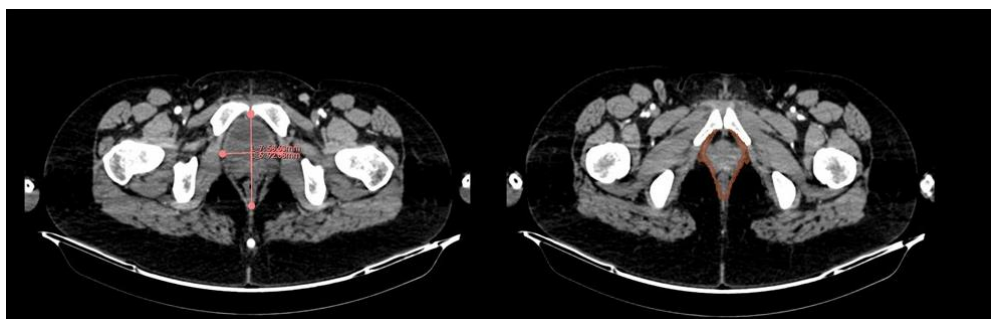
INTERPRETATION OF RESULTS& CONCLUSIONS

The wide transverse diameter of levator hiatus provides advantages for avoiding episiotomy in second stage of labor. The puborectal muscle volume may not be effective on episiotomy in levator plane. In the pre pregnancy stage, evaluation of a CT scan with a 3D slicer can use an alternative technique in prediction of episiotomy .

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Figure-1.The measurement of pelvic floor by computed tomography with 3D slicer.



25 - The influence of modified native tissue posterior repair on voiding dysfunctions in patients with isolated rectocele.

Lippki Krzysztof⁽¹⁾ - Rutkowska Beata⁽¹⁾ - Pietrzykowska Szczubelak Katarzyna⁽¹⁾ - Majkusiak Wojciech⁽¹⁾ - Pomian Andrzej⁽¹⁾ - Barcz ewa⁽¹⁾

⁽¹⁾ Cardinal Stefan Wyszyński University in Warsaw, Department of Gynecology and Obstetrics, Warsaw, Poland

Rectocele usually results from damage to the vaginal-rectal fascia. It typically arises due to childbirth. Rectocele is commonly associated with symptoms from the lower gastrointestinal tract, such as difficulty with defecation, a sensation of incomplete evacuation, and straining to complete bowel movements. In clinical observations, we often suspect that rectocele may contribute to lower urinary tract symptoms (LUTS).

The study aimed to assess whether effective surgery for isolated rectocele affects the occurrence and severity of co-existing LUTS. The study included patients operated on between 2018 and 2023 for an isolated rectocele, with a successfully corrected defect. Pre- and post-operative evaluations included urogynecological examinations and ultrasound. Additionally, quality of life assessment was conducted using LUTS evaluation tests, specifically UDI-6 and POPDI.

Post-operative follow-up was performed between 6 and 9 months after surgery. A total of 59 patients were enrolled in the study. Following the surgery, improvement was observed in the POPDI questionnaire (11.06 ± 4.2 vs 4.2 ± 4.2), $p < 0.001$. Significant results were achieved concerning questions 1-5 (pressure heaviness and in the lower abdomen and pelvis, bulge in the vagina, necessity to push on the vagina or rectum to complete bowel movement, experience of incomplete bladder emptying); however. Regarding LUTS symptoms, statistical significance was demonstrated in the UDI-6 questionnaire (11.22 ± 6.3 vs 5.07 ± 6.16); $p < 0.001$. High statistical significance was found for all symptoms (frequent urination, leakage during exertion, small amount of urine leakage, difficulties in bladder emptying, discomfort in the genital region), except for two (urine leakage with urgency sensation).

Conclusions: Effective surgical treatment of rectocele positively reduces LUTS. Therefore, in patients with rectocele, regardless of symptoms from the lower gastrointestinal tract, there is justification for proposing surgical treatment in cases of frequent urination, difficulties in bladder emptying, and urine leakage, when other causes are excluded.

26 - Is anterior native tissue repair the safest procedure in urogynecology? A retrospective analysis of complicated cases.

Barcz Ewa⁽¹⁾ - Lippki Krzysztof⁽¹⁾ - Rutkowska Beata⁽¹⁾ - Majkusiak Wojciech⁽¹⁾ - Pomian Andrzej⁽¹⁾

⁽¹⁾ Cardinal Stefan Wyszyński University in Warsaw, Department of Gynecology and Obstetrics, Warsaw, Poland

INTRODUCTION AND AIM OF THE STUDY

Native tissue anterior repair is considered the first-line treatment for anterior compartment defects. It is regarded as a safe procedure and is therefore often performed in patients with pelvic floor disorders.

The aim of the study was a retrospective analysis of complications diagnosed in patients after aNTR

of patients admitted to the clinic (between 2022 and 2025) due to complaints resulting from complications arising after anterior native tissue repair. The analysis included patients who underwent this procedure alone (n=35), along with native posterior wall repair (n=32), as well as those who had a vaginal hysterectomy due to pelvic organ prolapse (n=24).

MATERIALS AND METHODS

of patients admitted to the clinic (between 2022 and 2025) due to complaints resulting from complications arising after anterior native tissue repair. The analysis included patients who underwent this procedure alone (n=35), along with native posterior wall repair (n=32), as well as those who had a vaginal hysterectomy due to pelvic organ prolapse (n=24).

RESULTS

The main reasons for hospital admission related to the previous surgery were: recurrent urinary tract infections (60%), stress urinary incontinence (31.5%), urge incontinence (62.1%), overflow incontinence (21%), dyspareunia (21%), and recurrence of prolapse in the posterior compartment (63%). Many patients had more than one clinical issue.

In urogynaecological examination, significant shortening of the anterior vaginal wall was found in 91.8% of patients (average length 4.53 cm vs. 7.56 cm for the posterior wall). Ultrasound examination of patients with urinary tract infections, overflow incontinence, and urge incontinence revealed post-void residuals in 84% of cases, along with a lack or very limited mobility of the bladder neck (frozen urethra). Patients with recurrence in the posterior compartment predominantly presented with enteroceles (91% of patients with recurrence), along with pronounced shortening of the anterior vaginal wall and accompanying dyspareunia

CONCLUSIONS

In conclusion, it should be emphasized that native tissue repair, although a native procedure without the use of synthetic implants, can lead to serious complications that are difficult to rectify, such as the formation of bladder outlet obstruction and restricted mobility of the bladder neck. It seems that the main cause is excessive trimming and shortening of the anterior wall, likely resulting from the placement of circumferential sutures on the cervical fascia.

28 - A Non-Surgical Success Story in Stress Incontinence Developed Due to Traumatic Bladder Neck Dysfunction: A Case Study

Bengisu Tufekci⁽¹⁾ - Tugba Birben Kurt⁽²⁾ - Ahmet Tufekci⁽³⁾ - Emel Sahin⁽⁴⁾

⁽¹⁾Gaziantep Islamic Science and Technology University, Department of Physiotherapy Program, Gaziantep, Hindi - ⁽²⁾Recep Tayyip Erdogan University, Guneysu Vocational School of Physical Therapy and Rehabilitation, Rize, Hindi - ⁽³⁾Sanko University Hospital, Department of Urology, Gaziantep, Hindi - ⁽⁴⁾Cyprus Aydin University, Department of Physiotherapy and Rehabilitation, Girne, Kibris

INTRODUCTION

Stress Urinary incontinence (SUI) is common in women, but incontinence developing after pelvic trauma is rare (1,2). The effectiveness of non-surgical options in the management of these cases is still debated (3). In this report, a remarkable case of a woman who developed SUI after pelvic fracture and became completely continent with biofeedback-based PFMT alone is shared.

METHODS

A 38-year-old female patient, who was previously continent, underwent internal fixation surgery due to a pelvic fracture that developed after a traffic accident. The patient was catheterized for 3 weeks after the surgery, and after the catheter was removed, she began to experience continuous urinary incontinence triggered by coughing and sudden movements.

Evaluation

SUI affecting daily life

Need to use pads

No pelvic organ prolapse

Neurological examination: normal

Urodynamics: No detrusor overactivity, leakage at low pressure during Valsalva maneuver.

Pelvic MRI: Limited mobility and fibrotic appearance at the bladder neck.

Cystoscopy: Minimal scarring at the bladder neck, urinary tract patent.

The patient underwent biofeedback- based PFMT twice a week for 10 weeks under the supervision of a physiotherapist. Bladder diary, pad test, and QOL scores were monitored.

RESULTS

At the end of week 6, a 50% reduction in symptoms according to the bladder diary and pad test.

After 10 weeks: ICIQ-UI SF dropped from 17 to 1 and completely continent.

CONCLUSIONS

This case demonstrates that SUI developing after pelvic trauma does not always require surgery. Even if bladder neck mobility is limited, continence can be regained by re-teaching conscious muscle control with PFMT. In cases of SUI developing after pelvic trauma, PFMT is an effective and safe treatment option that can be used as an alternative to surgery.

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29 - RESULTS OF PELVIC ORGAN PROLAPSE SURGERY PERFORMED IN OUR CLINIC

Norda Uckardes Katarmıyan¹, Ayse Filiz Gokmen Karasu¹, Serdar Aydın², Gurkan Kiran¹, Osman Sevket¹, Caglar Cetin³, Taha Takmaz⁴, Seda Ates¹, Ozge Pasin⁵

¹Bezmialem Vakıf University, ²Koc University, ³Istinye University Liv Hospital, ⁴Memorial Hospital, ⁵Saglik Bilimleri University

Objective: This study aims to compare the surgical outcomes of pelvic organ prolapse procedures performed in our clinic. It seeks to evaluate differences in surgical procedure preferences over the years and to compare the surgical methods preferred in patients "under 65 years" versus those "aged 65 and above."

Materials and Methods: This study includes 298 patients who were operated in Obstetrics and Gynecology Clinic at Bezmialem Vakıf University Faculty of Medicine Hospital, between 2018 and 2024, with diagnoses such as "female genital prolapse", "uterovaginal prolapse", "cystocele", "rectocele", or "vaginal vault prolapse after hysterectomy". Demographic data, presenting complaints, physical examination findings, surgical methods, length of hospital stay, intensive care unit requirements, postoperative follow-ups, blood transfusion needs, complications, and recurrences were recorded and evaluated in conjunction with relevant influencing factors.

Results: It was observed that the most frequently performed pelvic organ prolapse surgery in our clinic is laparoscopic sacrocolpopexy in all age groups. Obliterative surgical procedures were significantly more frequently applied in patients aged 65 and above. Anterior-posterior colporrhaphy and levator suturing was significantly more frequently performed in patients under the age of 65. The average length of hospital stay and the need for intensive care unit were significantly higher in the population aged 65 and above. Bladder injury was observed in 1% of all cases and mesh-related complications in 3.4%.

Conclusion: In patients aged 65 and above, sexual activity and comorbidities must be taken into account when considering surgical options, and they should be evaluated in terms of obliterative versus reconstructive procedures. Whether the surgery involves uterine-sparing techniques, hysterectomy, mesh use, natural tissue repair, or concomitant anti-incontinence procedures, each case should be planned individually in consultation with the patient.

30 - The effectiveness of modified posterior native tissue repair of rectocele.

Rutkowska Beata⁽¹⁾ - Lippki Krzysztof⁽¹⁾ - Pietrzykowska Szczubelak Katarzyna⁽¹⁾ - Horosz Edyta⁽¹⁾ - Pomian Andrzej⁽¹⁾ - Barcz ewa⁽¹⁾

⁽¹⁾ Cardinal Stefan Wyszyński University in Warsaw, Department of Gynecology and Obstetrics, Warsaw, Poland

Rectocele is the protrusion of the rectal wall into the vagina. Surgery includes the posterior native tissue technique (NT), transanal rectal resection, and ventrorectopexy. Research indicates that the NT offers superior outcomes, alleviating symptoms with a lower risk of rectal injury.

This study aimed to evaluate the effectiveness of a modified NT technique. The modification involves the fascia dissection (Fig. 1), followed by doubling the fascia surface (Fig. 2).

Patients with isolated rectocele were assessed with POPQ, and POPDI-6 and CRADI-8 scales before and after the procedure.

9 months post-surgery, a significant improvement was observed in POPDI8 (11.06 ~~222~~ 4.24 vs 4.2 +/- 4.25), $p < 0.001$ in all symptoms (pressure in the lower abdomen, dullness in the pelvis, vaginal bulge, necessity to push on the vagina and the rectum to complete a bowel movement, incomplete bladder emptying), except for the need to push up a bulge to urinate. Similarly, improvement of the anorectal symptoms (11.76 +/- 7.33 vs 3.19 +/- 3.97), $p < 0.001$ (strain for bowel movement, incomplete emptying, loss of stool, pain with passage, urgency for bowel movement, vaginal bulging) was alleviated. The modified posterior NT repair demonstrates high efficacy concerning the sensation of prolapse as well as symptoms from the distal gastrointestinal tract.

31 - Rug Weaving Plication vs Conventional Technique: 2 Year Follow-up Results

Rahime BEDİR FINDIK ⁽¹⁾ - Zuhal YAPICI COSKUN ⁽²⁾ - Melike DOĞANAY ⁽²⁾

⁽¹⁾ Associate Professor, Turkish Ministry of Health An - ⁽²⁾ Turkish Ministry of Health Ankata Bilkent City Hospital Department of Obstetrics and Gynecology

Natural tissue repair techniques in pelvic organ prolapse and cystocele surgery are gaining popularity. Long term follow up results are important performance indicators.

OBJECTIVE

Our aim was to compare the 2-year results of the Rug Weaving plication(RWP) technique, which we have previously presented as a natural tissue repair technique in cystocele, with the conventional technique in terms of both recurrence and patient quality of life satisfaction scales.

METHOD

Our study was conducted as a retrospective study. The 2nd year follow-up results of the patients including the anterior wall S-POP-Q grade, Modified Oxford Scores(MOS), the anterior vaginal wall thickness(mm) in transvaginal USG has been noted. The data of the scales applied to the patients were also recorded and evaluated.

RESULTS

There was no difference between groups in terms of demographical properties. The comparison of the two groups' 2nd year physical examination findings including MOS values are performed(Table 1). The Rug technique has a lower recurrence rate than the classical technique and the satisfaction rate is higher, The data of the scales were comparable except POP distress inventory with significantly better results at RWP group.

CONCLUSIONS

RWP seems to be a more beneficial technique in long term, but further studies are needed.

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Table 1

Variables	Group 1 (Rug wave technique) N=29 Mean±SD Median(Min-Max)	Group 2 (Classical technique) N=31 Mean±SD Median(Min-Max)	P values
6th month postoperative anterior wall S-POP-Q grade	0.58±0.69 0.5(0-2)	1.93±0.96 2(0-3)	0.00
6th month postoperative MOS	1.2±0.8 1(0-3)	1.2±0.7 1(0-3)	0.78
6th month postoperative anterior vaginal wall thickness(mm)	7.2±1.4 7(4-10)	5±0.9 5(3-7)	0.00
2nd year postoperative anterior wall S-POP-Q grade	0.8±0.7 1(0-2)	2.1±0.8 2(0-3)	0.00
2nd year postoperative MOS	2.5±1 3(0-4)	1.87±1.2 2(0-4)	0.041
2nd year postoperative anterior vaginal wall thickness(mm)	8.2±2.2 8(4-13)	5.3±1.2 5(3-8)	0.00
2nd year postoperative Perineal length (cm)	2.81±0.73 3(1.5-4)	2.55±0.88 2.5(1.5-6)	0.095
2nd year postoperative perineal body strength	2.1±0.69 2(1-3)	1.87±0.84 2(1-3)	0.186
Difference between anterior wall S- POP-Q at 6 months and 2 years after surgery	0.24±0.54 0(-0.5-2)	0.64±0.8 0(-0.5-2)	0.70
Difference between MOS at 6 months and 2 years after surgery	1.2±0.8 1(0-3)	0.64±0.8 0.5(-1-2)	0.006
Difference between anterior vaginal wall thickness(mm) at 6 months and 2 years after surgery	1.02±2.5 1(-5-6)	0.2±1.2 0(1-3.6)	0.125

32 - Vaginal Natural Orifice Transluminal Endoscopic Surgery (vNOTES) for Gynecological Procedures in Obese Patients: A Systematic Review

Aristotelis-Marios Koulakmanidis⁽¹⁾ - Dimitrios Zacharakis⁽¹⁾ - Christos Vrysis⁽¹⁾ - Evangelia Kontogeorgi⁽¹⁾ - Anastasia Prodromidou⁽¹⁾ - Filippos Ntalianas⁽¹⁾ - Nikolaos Kathopoulos⁽¹⁾ - Dimos Sioutis⁽²⁾ - Georgios Daskalakis⁽¹⁾ - Stavros Athanasiou⁽¹⁾ - Themis Grigoriadis⁽¹⁾

⁽¹⁾National and Kapodistrian University of Athens, Alexandra Hospital, Athens, Greece - ⁽²⁾National and Kapodistrian University of Athens, Attiko Hospital, Athens, Greece

Objective: This study aimed to evaluate the feasibility, safety, and clinical effectiveness of vaginal natural-orifice transluminal endoscopic surgery (vNOTES) for gynecologic procedures in obese patients.

Methods: A systematic review was conducted using PubMed, Cochrane Library, and Google Scholar up to April 2025, following PRISMA guidelines. Eligible studies focused on vNOTES in obese women undergoing gynecological surgery. Study quality was assessed using the Newcastle–Ottawa Scale.

Results: Fourteen studies met the inclusion criteria, including three retrospective cohorts, one cross-sectional study, and ten case series. Compared to traditional laparoscopy (n = 84), patients undergoing vNOTES (n = 99) experienced significantly shorter operative times, reduced hospital stays, less postoperative pain, fewer complications, and better postoperative quality of life. One study reported longer operative times in obese versus non-obese patients undergoing vNOTES. Conversion rates to laparoscopy or laparotomy remained below 5%, with low intra- and postoperative complication rates across all studies.

Conclusion: vNOTES appears to be a safe and promising minimally invasive approach for obese patients in gynecology. However, the limited number of comparative studies and small sample sizes restrict the generalizability of current findings.

33 - Urodynamic Effects of Early Alfuzosin Therapy in Men with BPH-Related Bladder Outlet Obstruction: A Randomized Controlled Trial

Athanasios Zachariou⁽¹⁾ - Erriketi Douvli⁽¹⁾ - Vaia Sapouna⁽²⁾ - Ioannis Giannakis⁽¹⁾ - Dimitrios Baltogiannis⁽¹⁾ - Athanasios Paliouras⁽¹⁾ - Grigorios Daligaris⁽¹⁾ - Pavlos Christodoulou⁽¹⁾ - Mai Ba Tien Dung⁽³⁾ - Cam Hoang Nguyen Phuc⁽¹⁾ - Bou Sopheap⁽⁴⁾ - Nikolaos Sofikitis⁽¹⁾

⁽¹⁾Department Of Urology, University Of Ioannina, Ioannina, Greece - ⁽²⁾Urology Outpatient Department, Physical Medicine And Rehabilitation Centre Kentavros, Volos, Greece - ⁽³⁾Department Of Andrology, Binh Dan Hospital, Ho Chi Minh City, Viet Nam - ⁽⁴⁾Department Of Urology, Cambodia-China Friendship Preah Kossamak Hospital, Phnom Penh, Cambodia

INTRODUCTION AND AIM OF THE STUDY

BPH is a prevalent condition among aging men, often resulting in bladder outlet obstruction (BOO) and LUTS. While alpha-blockers such as alfuzosin are commonly prescribed, their direct effects on urodynamic parameters remain insufficiently explored. The aim of this study was to evaluate short-term urodynamic changes and symptom improvement following treatment with alfuzosin 10 mg once daily.

MATERIALS AND METHODS

This double-blind, randomized, placebo-controlled trial included 48 men with urodynamically confirmed BOO and LUTS. After a 2-week placebo run-in period, participants were randomized to receive either alfuzosin or placebo for 4 weeks, followed by alfuzosin for an additional 8 weeks. Pressure-flow studies were performed at baseline, Week 4, and Week 12. Urodynamic parameters, including detrusor pressure (Pdet.Qmax, Pdet.onset, Pdet.max), maximum flow rate (Qmax), and average flow rate (Qave), were measured. Symptom severity was assessed using the International Prostate Symptom Score (IPSS).

RESULTS

At Week 4, patients treated with alfuzosin showed significant reductions in detrusor pressure and improved Qmax compared to the placebo group. IPSS scores also decreased more markedly in the alfuzosin group. By Week 12, both groups demonstrated further improvements after receiving alfuzosin; however, patients who initiated therapy earlier exhibited greater and more sustained improvements in bladder function and symptom relief.

INTERPRETATION OF RESULTS

Unlike selective alpha-1A blockers, alfuzosin acts across all alpha-1 adrenergic receptor subtypes in the bladder neck and prostate [1,2]. This broad mechanism of action reduces smooth muscle tone, thereby decreasing urinary outflow resistance and improving both storage and voiding symptoms.

CONCLUSIONS

Alfuzosin 10 mg once daily significantly improves urodynamic parameters and alleviates LUTS in men with BOO secondary to BPH. Early initiation of treatment yields superior outcomes. These results support the use of alfuzosin not only for symptom control but also as a therapeutic option to improve bladder function in BPH patients.

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34 - EVALUATION OF SEXUAL FUNCTION IN WOMEN WITH POLYCYSTIC OVARY SYNDROME: A MULTIDIMENSIONAL APPROACH WITH CLINICAL AND HORMONAL CORRELATES

Simay Fidan-Çalıkoğlu⁽¹⁾ - Esra Çetinkaya⁽²⁾

⁽¹⁾ Ankara Research and Training Hospital, Department of Obstetrics and Gynecology, Ankara, Turkey - ⁽²⁾ Ankara University Medical School, Department of Obstetrics and Gynecology, Ankara, Turkey

INTRODUCTION AND AIM OF THE STUDY

Polycystic ovary syndrome (PCOS) combines hormonal and psychosocial factors that may impair sexuality[1]. While previous studies explored individual contributors, few assessed their combined impact, without evaluating the role of pelvic floor disorders. This study aimed to compare sexual function in women with and without PCOS, and to identify factors affecting sexual function, including psychological well-being, body image, hyperandrogenism and pelvic floor disorders.

MATERIALS AND METHODS

This prospective study included 226 sexually active, heterosexual women aged 18-49 years attending a university clinic between January 2022-February 2023. Demographic data and clinical findings (Ferriman-Gallwey scores, POP-Q, transvaginal ultrasonography) were recorded. PCOS was diagnosed according to 2003 Rotterdam Criteria[2]. Controls were women attending for infertility evaluation, reproductive planning, or routine check-ups. All women completed validated Turkish versions of Female Sexual Function Index(FSFI), Depression Anxiety Stress Scale(DASS-21), Body Esteem Scale(BES) and Pelvic Floor Distress Inventory(PFDI-20). In women with PCOS, blood androgen levels (total/free testosterone, DHEAS, SHBG, 17-OH-progesterone) and free-androgen index were measured. Data were compared, followed by univariate and multivariate linear regression analyses.

RESULTS

Women with PCOS were younger, had higher BMI & Ferriman-Gallwey scores, education and employment levels were lower, were more often married and infertile, and had longer relationships. Sexual dysfunction was more prevalent (58.1% vs. 40.4%, p=0.008) in these women; FSFI total-arousal-pain scores and BES scores were lower, while DASS-21 and PFDI-20 scores were higher (p<0.001). Independent factors for sexual dysfunction were lower education and higher DASS for arousal; longer relationship duration, infertility history, higher PFDI-20 for lubrication; and infertility history and higher PFDI-20 for pain.

INTERPRETATION OF RESULTS

Sexual function is impaired in women with PCOS, and seems to be influenced by anxiety, infertility, longer relationship, and pelvic floor dysfunction.

CONCLUSIONS

Sexual health should be assessed in women with PCOS, and all possible factors including pelvic floor distress should also be considered.

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35 - Misconceptions and Determinants of Sexual Dysfunction and Avoidance in Primigravid Women during Early Pregnancy: A Preliminary Report

Nur Ersan Israfilov⁽¹⁾ - Fulya Dökmeci⁽²⁾

⁽¹⁾ Diyarbakir Bismil Devlet Hastanesi, Department Of Obstetrics And Gynecology, Diyarbakir, Turkey - ⁽²⁾ Ankara University School Of Medicine, Department Of Obstetrics And Gynecology, Ankara, Turkey

INTRODUCTION & AIM OF THE STUDY

Sexual dysfunction is common in pregnancy and shaped by both biological and psychosocial factors(1). Standard measures such as the Female Sexual Function Index(FSFI) identify dysfunction but fail to capture sociocultural influences and misconceptions(2,3). This study aimed to explore determinants of sexual dysfunction and avoidance during early pregnancy.

MATERIALS & METHODS

This cross-sectional study included nulliparous women in their first trimester(n=246), recruited from a university hospital between April 2021 and August 2022. Participants completed the FSFI and a 10-item questionnaire addressing sociocultural beliefs and fears regarding sexuality during pregnancy. Women with an FSFI domain score of(0) were classified as abstinent, others as sexually active. Group comparisons identified reasons for abstinence and dysfunction(SPSS v.25, p<0.05).

RESULTS

Of the participants, 207(84%) were sexually active and 39(16%) abstained. FSFI scores averaged 26.4 ± 4.1 in the active group and 4.1 ± 3.3 in abstinent women. Desire scores were 3.96 ± 1.05 and 3.15 ± 1.21 , respectively ($p<0.05$) (Table 1). According to patient questionnaire responses pain was the leading reason for abstinence(64.1%). In sexually active women, fears of harming the fetus(23.2%), miscarriage(32.4%), preterm birth(33.8%), and concerns about sexual positions(30.9%) were frequently reported.

INTERPRETATION OF RESULTS

Sexual dysfunction in early pregnancy arises from physical discomfort and fear based misconceptions.

CONCLUSION

Correcting such misconceptions through counseling may reduce avoidance & improve sexual well-being in pregnancy.

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Table 1. Demographics and FSFI Scores of Sexual Active and Abstinent Group

Variable	Sexually active (n=207)	Sexually abstinent (n=39)	p-value
Age (years, mean \pm SD)	24.1 ± 4	26.5 ± 4.5	
BMI (kg/m², mean \pm SD)	25.1 ± 1.6	25.3 ± 1.6	
FSFI total (mean \pm SD)	26.4 ± 4.1	$4.1 \pm 3.3^*$	<0.05
Desire (mean \pm SD)	3.96 ± 1.05	3.15 ± 1.21	<0.05

BMI: Body Mass Index, FSFI: Female Sexual Function Index SD: Standart Deviation

Comparisons between groups were made using the Mann-Whitney U test ($p<0.05$ significant).

*: This value was obtained from the total of sexual desire and arousal domains.

36 - Effectiveness of Uromune® autovaccine in the prevention of recurrent urinary tract infections.

Cristóbal Ramírez Sevilla⁽¹⁾ - Esther Gómez Lanza⁽²⁾ - Josep Miquel Puyol Pallàs⁽¹⁾

⁽¹⁾Fundació Hospital Sant Joan De Déu De Martorell, Urology, Barcelona, Spain - ⁽²⁾Hospital De Sant Joan Despi Moisés Broggi, Urology, Barcelona, Spain

INTRODUCTION AND AIM OF THE STUDY

This prospective and descriptive study analyzed the effectiveness of immunoprophylaxis with Uromune® autovaccine in a cohort of 670 patients diagnosed of recurrent urinary tract infections (UTI).

MATERIALS AND METHODS

From January 2018 to March 2024 Uromune® was administered sublingually with two puffs daily for three months. Follow-up included urine cultures at 3, 6, and 12 months

We analyzed age, gender, menopause, months of the year, bacteria, and number of UTI at baseline and along follow-up. Efficacy was defined as 0-2 UTI after prophylaxis.

RESULTS

Mean age was 71 years (16-96), 62.4% were over 70 years old, 89.1% were female, and 91.6% postmenopausal. At baseline, 84.9% had between 3-5 UTI. Escherichia coli represented 60.9% and Klebsiella pneumoniae 22.4%. The month with most UTI was March (12.2%) and the lowest was August (5.2%).

At 3 months 34% had no recurrence, 33% had 1 UTI, and 19% 2 UTI. At 6 months 19% had no recurrence, 30% had 1 episode, and 26% had 2. At 12 months only 8% had no recurrence, and 18% had 1 UTI and 23% had 2.

The efficacy rates were 87.6%, 76%, and 50.6% at 3, 6, and 12 months, respectively.

INTERPRETATION OF RESULTS

Uromune® autovaccine achieved high efficacy in patients with recurrent UTI at 3, 6, and 12 months of follow-up, with good tolerance and no adverse effects.

CONCLUSIONS

Immunoprophylaxis with Uromune® could be an effective and safe option to prevent urinary infections.

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37 - Benefit of Uromune® autovaccine to prevent recurrent urinary tract infections compared to long-term antibiotic therapy.

Cristóbal Ramírez Sevilla⁽¹⁾ - Esther Gómez Lanza⁽²⁾ - Josep Miquel Puyol Pallàs⁽¹⁾

⁽¹⁾Fundació Hospital Sant Joan De Déu De Martorell, Urology, Barcelona, Spain - ⁽²⁾Hospital De Sant Joan Despi Moisés Broggi, Urology, Barcelona, Spain

INTRODUCTION AND AIM OF THE STUDY

This study compared the results in 414 patients diagnosed of recurrent urinary tract infections (UTI) who received Uromune® autovaccine for 3 months or antibiotic prophylaxis along 6 months.

MATERIALS AND METHODS

A prospective, descriptive, and comparative study was conducted between January 2017 and December 2019. In Group A, 211 patients received sublingual autovaccine, and in Group B, 203 received daily antibiotic prophylaxis with cefuroxime 250 mg in 24.1%, nitrofurantoin 50 mg in 17.2%, cotrimoxazole 400 mg in 3.2%, or weekly fosfomycin 3 g in 55.2%.

Follow-up urine cultures were performed at 3, 6, and 12 months.

Variables analyzed: age, gender, bacteria, number of UTI at baseline and along follow-up.

Efficacy was defined as the presence of 0-2 UTI after treatment.

RESULTS

Mean age: 68 (17-96), 55.6% over 70 years, 90.3% female, 84.2% postmenopausal. At baseline, 89.1% had 3-5 UTI. Bacteria: E. coli 60.4% and K. pneumoniae 25.6%.

Efficacy at 3 months: Group A 91.5%, Group B 64.6% ($p<0.05$).

Efficacy at 3 months: Group A 71.1%, Group B 43.3% ($p<0.05$).

Efficacy at 12 months ($n=82.5\%$): Group A 35.6%, Group B 20.5% ($p<0.05$).

INTERPRETATION OF RESULTS

Prophylaxis with Uromune® autovaccine for the prevention of recurrent UTI is highly effective, especially at 3 and 6 months of follow-up, and offers better results than prolonged antibiotic therapy, without adverse effects or increased bacterial resistance.

CONCLUSIONS

Whenever possible, we strongly recommend using Uromune® autovaccine to prevent recurrences of urinary tract infections.

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38 - Influence of sacral neuromodulation on sexual quality of life in women treated for OAB and urinary retention

Andrzej Pomian⁽¹⁾ - Justyna Zarzecka⁽¹⁾ - Aneta Zwierzchowska⁽¹⁾ - Paweł Tomasik⁽¹⁾ - Ewa Barcz⁽¹⁾

⁽¹⁾University of Cardinal Stefan Wyszyński, Department of Gynaecology and Obstetrics, Medical Faculty Collegium Medicum, Warszawa, Poland

INTRODUCTION AND AIM OF THE STUDY

Overactive bladder (OAB) and urinary retention impair women's quality of life in many aspects, including the sexual domain. Evidence on sexual outcomes after sacral neuromodulation (SNM) is limited. We aimed to assess 6-month changes in sexual quality of life after SNM in sexually active women treated for OAB and/or urinary retention.

MATERIALS AND METHODS

Single-center study in Warsaw, 01/2021–08/2025. Sexually active women with OAB and/or urinary retention underwent a trial phase of SNM; permanent stimulator was implanted in responders. Patient-reported outcomes were collected before the procedure and at 6 months, using the Pelvic Organ Prolapse/Urinary Incontinence Sexual Questionnaire IUGA-Revised (PISQ-IR). Primary outcomes were item-level changes related to sexual function. Statistical significance was defined as $p < 0.05$.

RESULTS

Twenty-four women were included (OAB $n=18$, retention $n=9$; overlap $n=3$). Significant post-SNM improvements were observed in PISQ-IR items:

PISQ-IR Item	Domain	Mean \pm SD (Pre)	Mean \pm SD (Post)	p-value
Q10	Orgasm intensity	2.19 \pm 1.08	2.63 \pm 0.97	<0.05
Q17	Sexual desire	3.22 \pm 0.60	3.00 \pm 1.02	<0.05
Q20a	Frustration with sex life	2.61 \pm 0.99	3.23 \pm 0.82	<0.05
Q20c	Embarrassment about sex life	2.74 \pm 1.01	3.38 \pm 0.85	<0.05
Q20d	Anger about sex life due to leakage	2.43 \pm 1.31	3.19 \pm 1.06	<0.05

INTERPRETATION OF RESULTS

SNM was associated with better sexual quality of life domains, including orgasm intensity and desire, and with reductions in frustration, embarrassment, and anger related to sexual life.

CONCLUSIONS

Sacral neuromodulation (SNM) is an established therapy for overactive bladder and urinary retention. In this cohort, improved sexual quality-of-life scores suggest an additional benefit of SNM beyond lower urinary tract symptom control.

39 - FUNCTIONAL ASSOCIATIONS OF INTERCOURSE-RELATED VAGINAL FLATUS IN WOMEN WITH PELVIC FLOOR DISORDERS

Bulut Varlı⁽¹⁾ - Necati Berk Kaplan⁽¹⁾ - Şerife Esra Çetinkaya⁽¹⁾ - Mehmet Murat Seval⁽¹⁾ - Fulya Dökmeci⁽¹⁾

⁽¹⁾ Ankara University, Department of Obstetrics and Gynecology, Ankara, Turkey

INTRODUCTION AND AIM OF THE STUDY

Intercourse-related vaginal flatus (IRVF) is a distressing symptom that may impair sexual function. Although common, its etiopathogenesis remains incompletely understood (1). This study aimed to evaluate clinical characteristics of women with and without IRVF among women with pelvic floor disorders (PFD).

MATERIALS AND METHODS

Records of 1240 sexually active women admitted to a university hospital with PFD were reviewed. Baseline and clinical characteristics (vaginal laxity, POPQ measurements, pelvic floor muscle strength-PFMS, scores of PFDI-20 and PISQ-12) were compared between women with and without IRVF. Statistical analyses included Student's t-test and chi-square tests ($p < 0.05$).

RESULTS

Women with IRVF ($n=470$, 37.9%) were significantly younger, had lower parity, and were less often menopausal ($p < 0.05$). Vaginal laxity was more frequent ($p < 0.01$), and PFMS was higher in these women ($p < 0.01$). Questionnaire scores across all domains indicated significantly greater pelvic floor distress and worse sexual function in this group ($p < 0.01$) (Table 1).

INTERPRETATION OF RESULTS

Our findings suggest that IRVF is related to functional rather than anatomical factors, consistent with previous reports (1,2). Increased pelvic floor muscle activity, together with vaginal laxity, may contribute to air entrapment and expulsion.

CONCLUSIONS

IRVF has a significant negative impact on sexual function and seems to be associated with younger age, vaginal laxity, and stronger pelvic floor musculature in this cohort of women with PFD.

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40 - THE BURDEN OF INTERSTITIAL CYSTITIS ON PELVIC FLOOR FUNCTION, PAIN AND QUALITY OF LIFE

Gulin Feykan Yegin⁽¹⁾ - Mehmet Murat Seval⁽²⁾

⁽¹⁾Ankara University Graduate School of Health Sciences, Ankara University/ Urogynecology phd program, Ankara, Turkey - ⁽²⁾Ankara University, Ankara University Department of Gynecology and Obstetrics, Ankara, Turkey

INTRODUCTION AND AIM

Interstitial cystitis/bladder pain syndrome(IC/BPS) is a chronic disorder associated with pelvic pain, urinary symptoms, and impaired quality of life. This study aimed to evaluate pain, pelvic floor function, and quality of life in IC/BPS using validated questionnaires.

MATERIALS AND METHODS

Women diagnosed with IC/BPS and age-matched healthy volunteers were prospectively enrolled(n=26). Participants completed the Leeds Assessment of Neuropathic Symptoms and Signs(LANSS), McGill Pain Questionnaire, Pelvic Pain Impact Questionnaire(PPIQ), Interstitial Cystitis Symptom Index(ICSI), Interstitial Cystitis Problem Index(ICPI), Genitourinary Pain Index(GUPI), Pelvic Floor Distress Inventory-20(PFDI-20), and Pelvic Floor Impact Questionnaire-7(PFIQ-7). Parametric values were presented as mean \pm standard deviation, whereas non-parametric values were expressed as median (interquartile range).

RESULTS

Patients with IC/BPS had significantly higher scores in all questionnaires ($p<0.001$). Pain-related scales (LANSS, McGill, PPIQ), bladder indices (ICSI, ICPI), and pelvic floor questionnaires (PFDI-20, PFIQ-7) were markedly higher in patients with IC/BPS(Table 1).GUPI scores were also higher (19.5 ± 2.6 vs. 8.5 ± 3.6 , $p<0.001$).

INTERPRETATION OF RESULTS

IC/BPS exerts multidimensional effects, including pain, pelvic floor dysfunction, and reduced quality of life.

CONCLUSIONS

Validated patient-reported outcomes provide a comprehensive assessment of disease burden in IC/BPS and may guide clinical management and future research.

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Table 1. Patient-Reported Outcome Measures

	Control	IC/BPS	p-value
LANS	3.0(3.0)	13.0(2.0)	<0.001*
MCGILL	5.0(4.0)	22.0(4.0)	<0.001*
PPIQ	7.0(2.0)	22.0(4.0)	<0.001*
ICSI	5.0(1.0)	12.0(2.0)	<0.001*
ICPI	4.0(0)	11.0(1.0)	<0.001*
PFIQ1	23.6(18.9)	130(71.9)	<0.001*
PFDI20	31.0(17.4)	112.3(10.2)	<0.001*
GUPI	8.46±3.57	19.46±2.60	<0.001**

*Mann-Whitney U

**Student's t-test

mean±SD for parametric; median(interquartile range)for non-parametric values

41 - A Rare but Serious Complication of TVT: Intraperitoneal Bladder Injury

Sadik Orhun Aktas⁽¹⁾ - elcin islek secen⁽²⁾ - emine celen⁽¹⁾ - ayse filiz yavuz⁽²⁾

⁽¹⁾Ankara Bilkent City Hospital, Gynecology, Ankara, Turkey - ⁽²⁾ankara yildirim beyazit university faculty of medicine, gynecology, ankara, Turkey

Background

Stress urinary incontinence (SUI) is a prevalent health problem among women worldwide, with incidence increasing with age. This condition significantly impairs quality of life and often necessitates intervention. The tension-free vaginal tape (TVT) procedure is a widely adopted minimally invasive surgical technique for SUI management, known for its high efficacy and low complication rates. However, rare but serious complications such as vascular, bowel, or bladder injuries have been reported (1-4). Here, we present a case of intraperitoneal bladder injury following a TVT procedure, which was successfully managed with mesh removal and laparoscopic exploration.

Case Presentation

A 54-year-old multiparous, postmenopausal woman with no prior surgical history presented with stress urinary incontinence. After thorough evaluation, she was deemed a suitable candidate for TVT surgery. The procedure was performed uneventfully, and intraoperative cystoscopy revealed no abnormalities.

On the first postoperative day, approximately one hour after catheter removal, the patient developed acute abdominal pain and vomiting. Examination revealed diffuse abdominal tenderness without suprapubic leakage, while erythema was noted at trocar entry sites. Ultrasonography showed 4 cm of free intraperitoneal fluid. Diagnostic cystoscopy and laparoscopy were undertaken. Cystoscopy showed no obvious perforation or mesh protrusion, although minimal hemorrhagic areas were observed on the bladder wall. After methylene blue instillation, leakage from the trocar exit site was detected. The mesh was removed and laparoscopy performed, revealing approximately 500 cc of methylene blue-containing fluid in the peritoneal cavity. The right arm of the tape was found to traverse intraperitoneally before re-entering the retropubic space. Despite careful exploration, no active leakage site was identified, suggesting spontaneous closure after mesh removal. A pelvic drain was inserted and the procedure completed. The postoperative course was uneventful. The drain was removed after 24 h. The Foley catheter was left in place for 14 days, and the patient was discharged on prophylactic antibiotics.

Conclusion

TVT is considered safe and effective for SUI; however, rare complications such as intraperitoneal bladder injury should always be considered(2,3). Cystoscopy may occasionally fail to detect occult injuries, underscoring the role of laparoscopy in suspicious cases (4,5). Early diagnosis and timely intervention are critical for preventing morbidity. Clinicians should maintain a high index of suspicion when patients develop acute abdominal symptoms after TVT(6).

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42 - THE EFFECT OF MESENCHYMAL STEM CELL TREATMENT ON CENTRAL SENSITIZATION IN LPS/PS INDUCED IC RAT MODEL

Kazibe Koyuncu Demir⁽¹⁾ - Tunç Akkoç⁽²⁾ - Özlem Tugce Çilingir Kaya⁽³⁾ - Ilknur Keskin⁽⁴⁾ - Sabriye Senem Kılıç⁽⁵⁾ - Öykü Ileri Meşe⁽³⁾ - Murat Seval⁽⁶⁾

⁽¹⁾Medicana Hospital, Obstetric And Gynecology, Istanbul, Hindi - ⁽²⁾Marmara University, Immunolog Department, Istanbul, Hindi - ⁽³⁾Marmara University, Histology Department, Istanbul, Hindi - ⁽⁴⁾Medipol University, Histology Department., Istanbul, Hindi - ⁽⁵⁾Marmara University, Immunology Department Bioengineering, Istanbul, Hindi - ⁽⁶⁾Ankara Üniversitesi, Obstetrics And Gynecology, Ankara, Hindi

INTRODUCTION

Interstitial cystitis (IC) is a chronic disorder with urinary urgency, frequency, pelvic pain, and nocturia in the absence of infection. Its pathogenesis involves mast cell activation, neuroinflammation, and bladder wall injury. Persistent nociceptive input promotes glial activation in spinal and supraspinal regions, contributing to central sensitization. Mesenchymal stem cells (MSCs) are promising for tissue repair and immunomodulation, but their effects on IC-associated neuroinflammation remain unclear.

OBJECTIVE

To assess histopathological bladder changes and astrocytic/microglial activation in cortex and dentate gyrus following MSC therapy in an IC rat model.

METHODS

Three groups of Wistar rats (control, IC, IC+MSC; n=8 each) were used. IC was induced by intravesical protamine/lipopolysaccharide for 5 weeks. Human umbilical cord MSCs (1.2×10^6 cells) were injected into bladder wall of the treatment group. One week later, bladders and spinal cords were examined histologically (H&E, toluidine blue) and immunohistochemically (anti-Iba1, anti-TNF α). Statistical analyses used SPSS 25.0.

RESULTS

MSC treatment significantly reduced bladder inflammation and mast cell counts compared with the IC group ($p<0.05$), with values approaching controls. Spinal TNF- α expression was also reduced in MSC-treated rats. In cortex, IC increased GFAP and IBA-1 expression; MSCs partially reduced GFAP and markedly lowered IBA-1 to near-control levels. In dentate gyrus, IC elevated GFAP and IBA-1; MSCs showed only non-significant reductions, suggesting limited hippocampal modulation.

CONCLUSION

IC induces glial activation in both cortex and dentate gyrus, consistent with central sensitization. MSC therapy attenuated microglial activation, especially in cortical regions, but astrocytic responses persisted. Regional variability suggests differential susceptibility of glial populations, with microglia responding earlier to anti-inflammatory effects. Incomplete normalization indicates that optimizing MSC dose, delivery, and duration, possibly with astrocyte-targeted strategies, may enhance therapeutic benefit.

43 - Evaluation of YouTube Videos as a Source of Information about Pelvic Floor Exercises During Pregnancy

Elif Nazli Cetindag⁽¹⁾ - Bengisu Tufekci⁽²⁾ - Emel Sahin⁽¹⁾

⁽¹⁾ Graduate School of Health Sciences, Urogynecology Doctorate Programme, Ankara University, Ankara, Turkey - ⁽²⁾ Vocational School of Health Services, Department of Physiotherapy and Rehabilitation, Gaziantep Islam Science and Technology University, Gaziantep, Turkey

INTRODUCTION

Pelvic floor muscle dysfunction is a common condition during and after pregnancy, often leading to urinary incontinence, pelvic organ prolapse, and reduced quality of life (1). Pelvic floor muscle exercises (PFME) are recommended as preventive measures. Recently, YouTube has become a widely used platform for health information, yet the reliability and quality of its content remain uncertain (2, 3). This study aimed to evaluate these videos' educational value and accuracy.

METHODS

A structured YouTube search was conducted using the keywords derived from Google Trends (pelvic floor exercises pregnancy, pregnancy Kegel exercises, pelvic floor strengthening during pregnancy, pregnancy pelvic exercises, and how to do Kegel exercises when pregnant). Among 500 videos reviewed, 51 fulfilled the inclusion criteria. Videos were assessed by two independent reviewers using the modified DISCERN, Journal of the American Medical Association (JAMA), and Global Quality Scale (GQS). Descriptive parameters such as views, likes, comments, view rate, interaction index, and Video Power Index (VPI) were recorded. Uploaders were categorized as healthcare professionals, trainers, or individual users.

RESULTS

Trainers uploaded the majority of videos, while healthcare professionals produced fewer but significantly higher-quality and more reliable content. Individual users' videos achieved rapid visibility but lacked educational standards.

INTERPRETATION OF RESULTS

These findings show that video popularity does not necessarily reflect reliability. Trainers dominate visibility, yet healthcare professionals provide the most accurate and useful information, underscoring the importance of expert-led online education.

CONCLUSIONS

Most YouTube videos on PFME during pregnancy are of moderate quality, which may limit their educational value and reliability. To enhance both the accuracy and accessibility of digital resources on this subject, it is essential that healthcare professionals take a more active role in the creation and dissemination of such content

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44 - Does Adding Vaginal Hysterectomy to Colpocleisis Influence Surgical Outcomes in POP?A Systematic Review and Meta-Analysis

Anastasia Prodromidou⁽¹⁾ - Dimitrios Zacharakis⁽¹⁾ - Aristotelis-Marios Koulakmanidis⁽¹⁾ - Athanasios Douligeris⁽¹⁾ - Antonia Varthaliti⁽¹⁾ - Xylouri Chrysa⁽¹⁾ - Nikolaos Kathopoulos⁽¹⁾ - Lina Michala⁽¹⁾ - Dimos Sioutis⁽²⁾ - Georgios Daskalakis⁽¹⁾ - Stavros Athanasiou⁽¹⁾ - Themis Grigoriadis⁽¹⁾

⁽¹⁾National and Kapodistrian University of Athens, Alexandra Hospital, Athens, Greece - ⁽²⁾National and Kapodistrian University of Athens, Attiko Hospital, Athens, Greece

INTRODUCTION AND AIM OF THE STUDY

Pelvic organ prolapse (POP) is a prevalent condition among women, with incidence increasing in older age groups. Colpocleisis is an obliterative procedure that could be preferred for frail, elderly women with advanced POP who no longer desire vaginal intercourse, with high success rates and low complications. Vaginal hysterectomy at the time of colpocleisis may prevent future uterine pathology but could also increase operative risks. We aim to compare perioperative outcomes of colpocleisis performed with and without hysterectomy to assess whether the addition of hysterectomy provides benefits that outweigh potential surgical risks.

MATERIALS AND METHODS

A systematic review and meta-analysis was conducted according to PRISMA guidelines. Comparative prospective and retrospective studies reporting outcomes of colpocleisis with or without hysterectomy were identified, until the 31st of May 2025. Extracted outcomes included operative time, estimated blood loss, postoperative complications, blood transfusion rates, and hospital stay duration. Data synthesis was performed using RevMan software, with statistical significance set at $p < 0.05$.

RESULTS

Four retrospective studies involving 1,423 women (370 with hysterectomy versus 1,043 with colpocleisis alone) were included. Compared with colpocleisis alone, procedures including hysterectomy had significantly longer operative times (mean difference -27.79 min, $p = 0.01$) and greater blood loss (mean difference -17.78 ml, $p = 0.001$). However, no significant differences were observed in postoperative complication rates ($p = 0.83$), blood transfusion requirements ($p = 0.65$), or length of hospital stay ($p = 0.55$).

INTERPRETATION OF RESULTS

Concomitant vaginal hysterectomy during colpocleisis modestly increased operative time and blood loss but does not adversely affect short-term safety outcomes.

CONCLUSIONS

Both colpocleisis alone and colpocleisis with hysterectomy are safe and effective options for the management of POP. While the addition of hysterectomy resulted in an increase in surgical duration and blood loss, short-term safety profiles remain comparable. Long-term data and randomized trials are needed to further optimize surgical planning.

45 - Assessment of Preoperative Short-Term Estriol on Vaginal Surgery Outcomes and Tissue Quality: A Single-Blind Case-Control Study

Hatice Tukenmez⁽¹⁾ - Fulya Dokmeci⁽¹⁾

⁽¹⁾ Department of Obstetrics and Gynecology, Ankara University, Ankara, Turkey

INTRODUCTION AND AIM OF THE STUDY

Vaginal prolapse is prevalent among postmenopausal women (PMW) and impairs quality of life(1). Estrogen deficiency-related atrophy may compromise tissue resilience and limit vaginal surgery outcomes. Preoperative short-term estriol may improve vaginal mucosal quality and enhance surgical recovery(2). The aim of this study is to assess the effects of estriol on vaginal tissue, pelvic floor function, and early postoperative recovery in PMW undergoing vaginal prolapse surgery.

MATERIALS AND METHODS

In this prospective, single-blind, case-control study, 41 PMW scheduled for anterior and/or posterior colporaphy were enrolled. Volunteers (n=20) received intravaginal estriol twice weekly for four weeks, while untreated patients (n=21) served as controls. Preoperative and one-month postoperative evaluations included PFDI-20, PFIQ-7, and VAS for genitourinary syndrome of menopause (GSM) & postoperative discomfort, PGI-I for patient satisfaction, VHI for vaginal health. Intraoperative tissue samples underwent histopathological and immunohistochemical analysis.

RESULTS

Demographic and surgical characteristics were comparable between groups. Estriol-treated patients showed significantly higher epithelial cell counts, vascular density, receptor expression (ER, PR, AR), proliferation/immune markers; Ki-67, CD34, S100, CD3, CD4, CD8 compared with controls ($p < 0.05$). Additionally, demonstrated greater improvements in PFDI-20, PFIQ-7, VAS-GSM, PGI-I, and VHI scores ($p < 0.05$).

INTERPRETATION OF RESULTS

Estriol enhanced tissue quality, improved pelvic floor function & patient satisfaction.

CONCLUSIONS

Preoperative short-term intravaginal estriol use seems valuable in optimizing vaginal surgery outcomes.

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Table 1. Baseline characteristics, clinical outcomes, and histological findings in control and estriol groups

Variable	Control	Estriol	p-value
Demographics*			
Age (years)	63.6 ± 8.7	61.8 ± 9.8	0.545
BMI (kg/m ²)	29.2 ± 3.7	29.8 ± 6.7	0.706
Menopause duration (years)	13.3 ± 7.9	15.2 ± 11.9	0.552
Parity	2.7 ± 1.1	2.9 ± 1.0	0.202
Clinical Scores			
PFDI-20 total (postop 1 mo)	50.2 ± 26.9	21.3 ± 23.4	<0.001
PFIQ-7 total (postop 1 mo)	23.2 ± 30.6	17.2 ± 20.8	0.530
POPIQ-7 (postop 1 mo)	4.6 ± 8.9	0.0 ± 0.0	0.003
VAS-genital dryness (postop 1 mo)	2.7 ± 2.0	1.3 ± 0.7	0.022
VHI (preop)	15.0 ± 3.6	21.9 ± 1.3	<0.001
PGI-I (postop 1 mo)	2.48 ± 0.87	1.00 ± 0.00	<0.001
Postop vaginal discomfort VAS	4.19 ± 1.44	1.45 ± 0.83	<0.001
Histology/Immunohistochemistry			
Epithelial cell count	13.1 ± 2.3	15.8 ± 1.9	0.001
Vascular density (CD34)	14.1 ± 7.0	22.6 ± 5.5	0.002
ER, PR, AR expression	+	+++	<0.05
Ki-67	+	++	0.001
Neuronal marker (S100)	2.8 ± 1.1	4.2 ± 1.4	0.001
Immune cells (CD3, CD4, CD8)	+	++	<0.05

*Other demographic and surgical variables (delivery type, prolapse stage, comorbidities, surgical procedures, perioperative hemoglobin values, etc.) were comparable between groups ($p>0.05$).

46 - Early Diagnosis and Management of Obstetric Anal Sphincter Injury: Practical Application of Impedance Spectroscopy

Katarzyna Borycka ⁽¹⁾ - Małgorzata Uchman ⁽²⁾

⁽¹⁾ Lazarski University, Department Of General And Colorectal Surgery, Medicover Hospital, Warszawa, Poland - ⁽²⁾ Madaliński Hospital, Department Of Obstetrics And Gynaecology,, Warszawa, Poland

Introduction and Aim: Obstetric anal sphincter injury (OASI) is a leading cause of postpartum faecal incontinence (FI). Standard diagnosis via digital rectal examination (DRE) is subjective and often inconclusive, whereas immediate post-delivery three-dimensional endoanal ultrasound (3D-EAUS), despite being the gold standard, has demonstrated low sensitivity and limited feasibility in clinical practice. Impedance spectroscopy offers a rapid, objective bedside diagnostic tool that can support decision-making when DRE findings are unclear.

This ongoing prospective cohort study aims to:

- Evaluate the diagnostic performance of impedance spectroscopy in cases with uncertain DRE findings;
- Assess whether its application increases the proportion of definitive primary repairs performed immediately postpartum;
- Evaluate the early functional outcomes of women with detected injuries, regardless of whether primary repair was performed.

Methods: Women after vaginal delivery with OASI risk factors or inconclusive DRE findings underwent impedance spectroscopy immediately postpartum. In cases with positive results, primary repair was offered in accordance with the device's recommendation. Borderline or deferred-repair cases entered structured follow-up. All women with positive impedance findings were monitored at 3 weeks, 6 weeks, and 6 months postpartum using clinical examination, Wexner scoring, and EAUS to assess continence and recovery.

Results: Preliminary observations indicate that impedance spectroscopy significantly improves diagnostic confidence and increases the rate of primary repairs in cases with ambiguous clinical findings. Early repair guided by spectroscopy is associated with better continence outcomes and lower Wexner scores during early follow-up. Women who did not undergo repair reported more frequent early symptoms of faecal incontinence. So far, no adverse events were related to the use of the device.

Conclusion: Given the limitations of immediate post-delivery EAUS—including low sensitivity, operator dependence, and logistical constraints—impedance spectroscopy emerges as a valuable adjunct to DRE for early OASI detection. Its routine use in clinically uncertain cases facilitates timely repairs, improves short-term functional outcomes, and ensures follow-up of at-risk women. We propose a clinical algorithm integrating impedance spectroscopy to enhance postpartum continence care and maternal quality of life.

Keywords: OASI; impedance spectroscopy; faecal incontinence; early repair; postpartum diagnostics

47 - Patient Satisfaction and Sexual Function Following Colpocleisis for Pelvic Organ Prolapse

Aristotelis-Marios Koulakmanidis⁽¹⁾ - Dimitrios Zacharakis⁽¹⁾ - Anastasia Prodromidou⁽¹⁾ - Christos Vrysis⁽¹⁾ - Evangelia Kontogeorgi⁽¹⁾ - Athanasios Douligeris⁽¹⁾ - Anthi-Maria Papahliou⁽¹⁾ - Nikolaos Kathopoulos⁽¹⁾ - Dimos Sioutis⁽²⁾ - Georgios Daskalakis⁽¹⁾ - Stavros Athanasiou⁽¹⁾ - Themis Grogoriadis⁽¹⁾

⁽¹⁾ National and Kapodistrian University of Athens, Alexandra Hospital, Athens, Greece - ⁽²⁾ National and Kapodistrian University of Athens, Attiko Hospital, Athens, Greece

Introduction: Pelvic organ prolapse (POP) can significantly affect the quality of life in elderly women. Colpocleisis, especially the partial Le Fort technique, is an effective, low-complication treatment for non-sexually active patients with advanced POP. However, because the vaginal canal is irreversibly closed, concerns persist about its impact on sexual function and patient satisfaction.

Objective: To assess postoperative satisfaction, regret related to sexual function, and anatomical success in women undergoing partial Le Fort colpocleisis.

Methods: This retrospective cohort study included women who underwent partial Le Fort colpocleisis between December 2017 and July 2023. Follow-up data were collected through telephone interviews using validated instruments, including the Pelvic Organ Prolapse Distress Inventory-6 (POPDI-6) and the Decision Regret Scale (DRS). Outcomes included postoperative symptom distress, sexual function-related regret, and patient-perceived improvement.

Results: Thirty-four patients completed follow-up, with a mean age at surgery of 71.47 years. The majority had advanced POP (stage III-IV). Mean POPDI-6 scores were low, indicating minimal postoperative symptom distress, while DRS scores showed very low regret regarding postoperative sexual function. Sexual activity ceased in most cases, primarily due to partner absence or the obliterative nature of the surgery. Overall improvement was substantial, with 88.23% reporting feeling "very much better" after the operation.

Conclusions: Partial Le Fort colpocleisis offers high anatomical success and symptom relief for advanced POP in non-sexually active elderly women, with minimal impact on postoperative sexual satisfaction. Regret concerning sexual function was rare. Long-term follow-up studies are warranted to confirm the persistence of these positive outcomes.

48 - Laparoscopic Sacropexy: Uterine Preservation vs. Concomitant Supracervical Hysterectomy - A Prospective Comparative Study

Pawel Tomasik ⁽¹⁾ - Wojciech Majkusiak ⁽¹⁾ - Andrzej Pomian ⁽¹⁾ - Aneta Zwierzchowska ⁽¹⁾ - Edyta Horosz ⁽¹⁾ - Urszula Kalata ⁽¹⁾ - Ewa Barcz ⁽¹⁾

⁽¹⁾ Department of Gynaecology and Obstetrics, Faculty of Medicine Collegium Medicum, Cardinal Stefan Wyszyński University in Warsaw, Bursztynowa 2 Str, Cardinal Stefan Wyszyński University in Warsaw, Warsaw, Poland

Introduction:

Pelvic organ prolapse (POP) significantly affects women's quality of life. Among surgical techniques addressing apical compartment defects, laparoscopic sacropexy remains a widely accepted standard. However, the role of concurrent supracervical hysterectomy remains under debate, both regarding its impact on anatomical correction across all pelvic compartments and its effectiveness in alleviating prolapse symptoms.

Aim:

To compare anatomical and subjective outcomes following laparoscopic sacropexy with uterine preservation versus sacropexy combined with concomitant supracervical hysterectomy, using the Pelvic Organ Prolapse Quantification (POP-Q) system and the Pelvic Organ Prolapse Distress Inventory-6 (POPDI-6) questionnaire.

Materials and Methods:

This prospective randomized study included women with symptomatic stage II or higher POP involving the apical compartment, with or without concomitant anterior or posterior defects. Patients were randomized into two groups: Group 1 (n = 161) underwent laparoscopic colposacropexy with supracervical hysterectomy, while Group 2 (n = 68) underwent laparoscopic uterine preserving hysterostacropexy. The primary outcome was anatomical correction measured by POP-Q at 6 months postoperatively. Functional outcomes were assessed using the POPDI-6 scale.

Results:

Both groups achieved significant apical support improvement (POP-Q point C: -4.97 vs -5.39; NS). Group 1 showed better anterior compartment correction (Aa: -0.55 vs -1.31, **p = 0.002**; Ba: -0.448 vs -1.28, **p = 0.003**), while in Group 2 achieved better posterior compartment outcomes (Ap: -2.066 vs -1.57, **p = 0.003**; Bp: -2.05 vs -1.506, **p = 0.003**). No significant differences were observed in functional outcomes measured by POPDI-6 (p = 0.93).

Conclusions:

Both techniques provide effective anatomical correction of apical prolapse. Concomitant supracervical hysterectomy enhances anterior compartment repair, whereas uterine preserving sacropexy may offer better posterior compartment outcomes. Functional improvement assessed by POPDI-6 was comparable between the two approaches. These findings support individualized surgical planning based on the predominant site of prolapse.

49 - Advantages and Pitfalls of Apical Vaginal Prolapse Surgery with Uterosacral Ligament Reinforcement and Douglas Space Obliteration - Vaginal Approach

Daša Krelj⁽¹⁾ - Marijan Lužnik⁽²⁾

⁽¹⁾ UKC Ljubljana, UKC Ljubljana, Ljubljana, Slovenia - ⁽²⁾ SB Slovenj Gradec, Gynecology, Slovenj Gradec, Slovenia

INTRODUCTION AND AIM OF THE STUDY

Management of advanced apical vaginal prolapse requires a durable and anatomically sound approach. This study evaluates the outcomes and limitations of a combined vaginal technique involving bilateral uterosacral ligament (USL) reinforcement, obliteration of the Douglas space, and simultaneous transobturator tape (TOT) placement in all patients to address associated stress urinary incontinence (SUI).

MATERIALS AND METHODS

A retrospective analysis was performed on 82 women with stage II–IV apical prolapse undergoing vaginal repair with USL plication, high closure of the posterior peritoneum, and simultaneous TOT placement. Preoperative evaluation included translabial ultrasound and prolapse-reduced cough stress testing. Surgical outcomes assessed included anatomical success (POP-Q), perioperative complications, postoperative continence, and patient satisfaction at 12 months.

RESULTS

At 12 months, 98% of patients achieved anatomical correction to POP-Q stage 0–I. No ureteral injuries were observed. Minor complications occurred in 5%, including two partial mesh exposures and mild suture site discomfort. De novo overactive bladder symptoms occurred in less than 3% of cases. Continence rates improved in all patients with no cases of postoperative dyspareunia or vaginal shortening reported.

INTERPRETATION OF RESULTS

The technique proved effective for apical and posterior compartment correction via a single vaginal approach. Douglas space obliteration improved midline support but demands careful suture placement to avoid ureteral tension. Preoperative ultrasound facilitates individualized surgical planning and reduces overtreatment risks. The approach offers a uterus-sparing option and minimal morbidity when performed by experienced surgeons.

CONCLUSIONS

USL reinforcement with obliteration of the Douglas space is a valuable technique for apical vaginal prolapse. When combined with preoperative ultrasound and functional testing, it allows for precise individualized management. Future prospective studies are needed to validate long-term functional outcomes and refine patient selection criteria.

50 - Toward Standardization of the Rat Vaginal Distension Model for Stress Urinary Incontinence

Ulas Coban⁽¹⁾ - Fulya Dokmeci⁽²⁾

⁽¹⁾ Ondokuz Mayıs University, Faculty of Medicine, Obstetrics and Gynecology, Samsun, Turkey - ⁽²⁾ Ankara University, Faculty of Medicine, Obstetrics and Gynecology, Ankara, Turkey

INTRODUCTION AND AIM OF THE STUDY

Animal models are essential for investigating childbirth-related pelvic floor injury, with the rat being the most widely used species due to anatomical and neurophysiological comparability(1). Vaginal distension(VD) is the most established model for simulating obstructed labor and stress urinary incontinence(SUI)(2). Nevertheless, methodological heterogeneity, including catheter type, balloon volume, duration, parity status, and timing relative to delivery, limits reproducibility and weakens translational impact.

MATERIALS AND METHODS

We performed a comprehensive literature review from the first VD model description to recent modifications(Table1). Key parameters were systematically extracted. In parallel, observations from our own VD model trials were analyzed to evaluate feasibility, highlight methodological gaps, and propose refinements(3).

INTERPRETATION OF RESULTS

Findings revealed major inconsistencies across studies, with incomplete reporting of essential parameters. Our own experimental experience further demonstrated how parity status, postpartum timing, and methodological choices directly influence cystometric findings and histological changes. These insights informed targeted recommendations.

CONCLUSIONS

This work integrates literature evidence with experimental observations to propose practical guidelines for standardizing rat VD models. Adopting uniform parameters and transparent reporting will improve reproducibility, enable meaningful comparisons, and enhance the translational validity of this widely applied model.

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Table 1: Review of Rat Vaginal Distension (VD) Models with Methodological Heterogeneity and Standardization Parameters

Author(year)	Strain	Parity status	VD timing vs delivery	Catheter type/size	Balloon volume	VD duration	Anesthesia (VD/testing)	Cystometry/LPP timing
Lin et al. (1998) Obstet Gynecol	Rat (likely Sprague–Dawley)	Nulliparous/ Retired breed	Virgin (not postpartum)	Urethral	2-2.5 mL	4 h	NR / NR	Sneeze Test ≈4 weeks
Cannon & Damaser (2002) BJU Int	Sprague–Dawley	Nulliparous	Virgin (not postpartum)	Suprapubic (2 days prior)	NR	0.5–4 h (varied)	NR / urethane	4 days
Damasier et al. (2003) J Urol	Female rats	Nulliparous	Virgin (not postpartum)	Suprapubic (2 days prior)	3 mL	30 min	NR / urethane	4 days
Damasier et al. (2005) J Appl Physiol	Female rats	Nulliparous	Virgin (not postpartum)	NR	3 mL	≈1 h	NR	Peri-VD (blood flow)
Pan et al. (2007) AJP-Regul	Female rats	Nulliparous	Virgin (not postpartum)	NR	NR	1 h vs 4 h	NR / mixed	4 d; 10 d; 6 wk
Wood et al. (2008) J Urol	Sprague–Dawley	Nulliparous	Virgin (not postpartum)	NR	NR	1 h; 4 h; 6 h	NR	Immediate–days (varied)
Woo et al. (2009) NeuroUrol Urodyn	Lewis (inbred)	Nulliparous	Virgin (not postpartum)	10 Fr Foley (trimmed)	3 mL	4 h	Ketamine-xylazine / urethane	4 d; 10 d
Cruz et al. (2011) Cell Transplant	Sprague–Dawley	Nulliparous	Virgin (not postpartum)	10 Fr Foley (modified)	3 mL	4 h	Isoflurane (imaging); no LPP	4 d; 10 d (tissue harvest)
Wang et al. (2011) AJOG	Female rats	Nulliparous	Virgin (not postpartum)	NR	NR	Prolonged VD	NR	NR
Lenis et al. (2013) J Urol	Lewis rats	Virgin vs Postpartum	Immediate postpartum vs virgin	Foley (likely 10 Fr)	NR	4 h	NR	Molecular timepoints
Hong et al. (2013) Investig Clin Urol	Female rats	Nulliparous	Virgin (not postpartum)	NR	NR	NR	NR	NR
Yoshikawa et al. (2017) AJP Renal	Female rats	Nulliparous	Simulated multiple births	NR	NR	Multiple VD events	NR	NR
Kwon et al. (2019) AJP Renal	Female rats	Nulliparous	Simulated birth trauma	NR	NR	NR	NR / dynamic UPP	Real-time storage-phase UPP
Janssen et al. (2019) AJP Renal	Female Sprague–Dawley	Nulliparous	Virgin (not postpartum)	NR	NR	NR	NR	Follow-up after therapy

51 - Lower Urinary Tract Symptoms in Polycystic Ovary Syndrome: A Prospective Cross-Sectional Study Highlighting the Role of Hyperandrogenism

Ezgi Aydin Aytemiz⁽¹⁾ - Fulya Dokmeci⁽¹⁾ - Bulut Varli⁽¹⁾

⁽¹⁾Department of Obstetrics and Gynecology, ankara university, ankara, Turkey

INTRODUCTION AND AIM OF THE STUDY

Polycystic ovary syndrome(PCOS) is primarily known for its reproductive & metabolic effects, existing data regarding its relationship with LUTS is limited and often confounded by obesity and parity(1,2). Also, PCOS to urinary dysfunction involves the poor relaxation of the external urethral sphincter (3). This study aimed to prospectively assess LUTS in nulliparous women with PCOS compared with age & BMI matched controls.

MATERIALS AND METHODS

In this prospective cross-sectional study, nulliparous women were evaluated using the Rotterdam criteria for PCOS. LUTS were assessed by the UDI-6 and the LURN SI-10. Statistical analyses included the Mann-Whitney U and chi-square tests ($p < 0.05$).

RESULTS

Seventy-three women participated, 28(38.4%) with PCOS & 45(61.6%) controls. PCOS patients had significantly higher UDI6 stress($p=0.003$) and obstructive($p=0.018$) scores and elevated LURN SI-10 scores($p=0.033$). Hyperandrogenism was significantly more frequent in the PCOS group.

INTERPRETATION OF RESULTS

PCOS appears to predispose to LUTS, with more stress and obstruction related symptom bother. Hyperandrogenism may impair urethral sphincter control echoing mechanisms proposed in Fowler's syndrome.

CONCLUSIONS

These findings highlight the urinary impact of PCOS beyond metabolic and reproductive features. Further prospective studies are required to clarify mechanisms and clinical implications.

Table 1. Baseline characteristics and lower urinary tract questionnaire scores in women with and without PCOS

	PCOS (-) (n=45)	PCOS (+) (n=28)	p
Baseline characteristics			
Age, years; median (min-max)	24 (17-49)	25 (18-43)	0.637
BMI, kg/m ² ; median (min-max)	21 (15-42)	23.5 (17-39)	0.210
Smoker; n (%)	10 (22.2)	7 (25)	0.785
Oligomenorrhea; n (%)	3 (6.7)	22 (78.6)	<0.001
Hirsutism; n (%)	0	18 (64.3)	<0.001
Polycystic ovarian morphology on US; n (%)	1 (2.2)	27 (96.4)	<0.001
Scores of questionnaires			
UDI-6 scores; median (min-max)	4.2 (0-29.2)	10.4 (0-45.9)	0.137
UDI-6 irritative subscale scores; median (min-max)	12.5 (0-50)	12.5 (0-62.5)	0.376
UDI-6 stress subscale scores; median (min-max)	0 (0-25)	0 (0-50)	0.003
UDI-6 obstructive subscale scores; median (min-max)	0 (0-41.7)	8.3 (0-50)	0.018
LURN SI-10 scores; median (min-max)	3 (0-9)	3 (1-18)	0.033

PCOS; Polycystic ovary syndrome, BMI: Body mass index, US: Ultrasound, UDI-6: Short form of the Urinary Distress Inventory, LURN: The Symptoms of Lower Urinary Tract Dysfunction Research Network.

$p < 0.05$: statistically significant

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52 - Non-Hormonal Relief for Genitourinary Syndrome of Menopause: A Randomised Controlled Trial of Monopolar Radiofrequency to Improve Sexual Function and Vaginal Health

Claudia Quezada-Bascuñán⁽¹⁾ - Cristina Gallego-Gómez⁽¹⁾ - Sandra Martínez-Bustelo⁽²⁾ - Cristina Lirio-Romero⁽¹⁾ - Asunción Ferri-Morales⁽¹⁾

⁽¹⁾University of Castilla La Mancha, Department of Physiotherapy and Nursing, Toledo, España - ⁽²⁾University da Coruña, Department of Physiotherapy, Da Coruña, España

INTRODUCTION AND AIM

Genitourinary syndrome of menopause (GSM) causes chronic, progressive vaginal symptoms that significantly impair sexual function in postmenopausal women. Given the limitations of topical estrogens, this study evaluated the efficacy of non-ablative capacitive-resistive monopolar radiofrequency (CRMRF) as a non-hormonal treatment to improve sexual function and vaginal health.

MATERIALS AND METHODS

Double-blind, randomised, controlled trial included 63 women to receive six weekly sessions of CRMRF (intervention group; IG) or sham treatment (control group, CG).

Outcomes: Female Sexual Function Index (FSFI) and Vaginal Health Index (VHI), vaginal maturation index and maximum tolerated pain during dilator insertion (Numerical Rating Scale, NRS), assessed at baseline (T0), post-treatment (T1), and at 12-week follow-up (T2).

RESULTS

The IG exhibited improvements in FSFI at T1 (4.41, $p < 0.001$) and T2 (3.19, $p = 0.005$), and in VHI at T1 (4.74, $p < 0.001$) and T2 (6.90, $p < 0.001$); no significant changes were observed in the CG. Mixed-effects regression models showed significant group-by-time interactions for both FSFI and VHI scores, confirming that improvements over time differed between groups. At T1, effect sizes were large for FSFI ($d \geq 0.69$) and very large for VHI ($d > 1$) in the IG.

Maximum tolerated pain during dilator insertion decreased in the IG at T1 and T2 (-3.19 and -4.52 points, respectively; $p < 0.001$), with no significant changes noted in the CG.

No significant changes were observed in the vaginal maturation index.

INTERPRETATION OF RESULTS

Improvements appear unrelated to hormonal, suggesting that CRMRF acts via local tissue mechanisms such as neocollagenesis or enhanced mucosal hydration.

CONCLUSIONS

CRMRF is effective non-hormonal treatment for GSM, significantly improving sexual function and vaginal health.

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54 - Patient Education for Urogynecology Quality and Readability Across AI Models and Society Leaflets

Mustafa Onur Kamani⁽¹⁾

⁽¹⁾ Bartın State Hospital, Ankara University, Ankara, Turkey

INTRODUCTION AND AIM OF THE STUDY

The objective of this study was to compare different sources of artificial intelligence (AI)-generated patient education handouts differ in quality of information, understandability, and actionability when used for muscle therapy and bladder training .

MATERIALS AND METHODS

5 platforms were selected based on their total monthly engagement and included ChatGPT 4.0, Gemini 2.5pro, Perplexity, Llama-4, and Claude Sonnet4. IUGA leaflets was included totaling the six sources for the 12 items. All items were stripped down to uniform plain text,blinded and randomized. Three reviewers independently scored all 12 items on completeness, DISCERN and PEMAT-A-U. Fixed-effects ANOVA and a crossed mixed-effects model was used for comparisons.

Word, complex word, sentence, and syllable count were evaluated for descriptive textual analysis. Readability analysis used six validated formulas.

RESULTS

Sources differed significantly for Completeness, DISCERN, and PEMAT-A; PEMAT-U showed a non-significant trend. Across three of four metrics, Llama4 consistently under-performed relative to several other origins and had the shortest leaflet. No single origin dominated universally. Across sources, lexical complexity, text length and density varied widely. Readability indices consistently favored GPT-4 and Gemini 2.5 Pro. IUGA has the longest leaflets and grade levels of ~9-10.

INTERPRETATION OF RESULTS

AI-models can produce usable educational materials compared with society ones. Model sophistication can strongly influence the completeness and reliability of AI-generated educational materials. Behavioral interventions have more standardized, well-articulated guidelines, making them easier for AI to learn and reproduce fully compared with pelvic floor exercises.

CONCLUSIONS

AI-model was a far bigger driver of content quality than the subject matter itself. revisions after the prompt is often needed to achieve optimal readability. By combining high-quality information with accessible presentation, AI tools can produce patient education resources that are trustworthy, understandable and actionable for the broad public.

55 - Genital Reconstruction Following Fournier Gangrene in an Immunocompromised Ovarian Cancer Patient: A Case Report

Ömer Faruk Öz⁽¹⁾ - Can Dinç⁽¹⁾ - Selen Doğan⁽¹⁾ - İnanç Mendilcioğlu⁽¹⁾

⁽¹⁾ Akdeniz University, Akdeniz University Hospital, Antalya, Turkey

Background:

Fournier gangrene is a rapidly progressive necrotizing fasciitis of the perineal region, associated with high morbidity and mortality. Immunosuppression, diabetes, and malignancy increase the risk. Early diagnosis and prompt surgical debridement are critical for survival.

Case Presentation:

A 60-year-old woman with Stage IIIC high-grade serous ovarian carcinoma, BRCA wild-type, had undergone interval debulking surgery followed by multiple lines of chemotherapy (cisplatin-gemcitabine-bevacizumab). She presented with pain and swelling in the perineal region. She had a history of diabetes mellitus and was under chemotherapy-induced immunosuppression. Physical examination and imaging (ultrasound and CT) revealed subcutaneous gas and necrosis consistent with Fournier gangrene. The diagnosis was confirmed radiologically, and emergent surgical debridement was performed within hours of presentation. Broad-spectrum antibiotics (meropenem + daptomycin) were initiated. Postoperatively, the patient recovered hemodynamically and was discharged with wound care instructions.

Discussion:

This case highlights the importance of vigilance for necrotizing soft tissue infections in immunosuppressed oncology patients. The rapid progression of Fournier gangrene necessitates early recognition and immediate surgical intervention. Chemotherapy-related immunosuppression and diabetes are significant risk factors. Mortality can be reduced by a multidisciplinary approach involving gynecologic oncology, general surgery, infectious disease, and intensive care units.

Conclusion:

In oncology patients with perineal pain and swelling, Fournier gangrene should be considered, especially in the context of immunosuppression. Prompt surgical debridement remains the cornerstone of treatment.

Keywords:

Fournier gangrene, ovarian cancer, chemotherapy, immunosuppression, surgical debridement.

56 - Combined Application of Ablative CO₂ Fractional Laser and Platelet-Rich Plasma in the Management of Genitourinary Syndrome of Menopause: A Prospective Study

Antonia Varthaliti⁽¹⁾ - Dimitrios Zacharakis⁽¹⁾ - Anastasia Prodromidou⁽¹⁾ - Nikolaos Kathopoulos⁽¹⁾ - Athanasios Douligeris⁽¹⁾ - Dimos Sioutis⁽²⁾ - Georgios Daskalakis⁽¹⁾ - Stavros Athanasiou⁽¹⁾ - Themis Grigoriadis⁽¹⁾

⁽¹⁾ National and Kapodistrian University of Athens, Urogynecology Unit, 1st Department of Obstetrics and Gynecology, Alexandra Hospital, Athens, Greece - ⁽²⁾ National and Kapodistrian University of Athens, 3rd Department of Obstetrics and Gynecology, University General Hospital, Athens, Greece

INTRODUCTION AND AIM OF THE STUDY

Genitourinary syndrome of menopause (GSM) affects up to 80% of postmenopausal women, causing vulvovaginal and urinary symptoms that impair quality of life. Novel therapies such as CO₂ laser and autologous platelet-rich plasma (PRP) show promise in symptom relief. This study aims to compare the efficacy and safety of fractional CO₂ laser alone versus in combination with PRP for GSM management.

MATERIALS AND METHODS

In this single-center prospective study, 40 postmenopausal women with GSM were enrolled and underwent fractional CO₂ laser alone or combined with PRP injections, administered in three sessions at 4–6 week intervals. Patients with recent hormone therapy, ≥stage II POP, genital infections, or major comorbidities were excluded. The primary outcome was change in vaginal dryness; secondary outcomes included dyspareunia, VHI, vaginal pH/cytology, FSFI, DIVA, and satisfaction, assessed at baseline and 1 month after completing the treatment.

RESULTS

From January 2023 to January 2025, 40 GSM patients were divided to CO₂ laser alone (n=20) or CO₂ laser plus PRP (n=20). Three patients discontinued, leaving 18 and 19 in each group, respectively. Baseline characteristics did not differ significantly between groups. Among the variables analyzed, most showed improvement before and after treatment in both groups, whereas between-group comparison revealed a significant difference in favor of the combination therapy for the VHI. Patient satisfaction was significantly improved after treatment in both groups, with better results in the combined treatment group, without statistical significance.

INTERPRETATION OF RESULTS

Both treatments were effective in improving GSM symptoms. The combination of CO₂ laser and PRP offered additional benefit for VHI, indicating a potential role in enhancing vaginal health parameters.

CONCLUSIONS

Fractional CO₂ laser is an effective treatment for GSM, and the addition of PRP appears safe and feasible, though its additional benefit remains uncertain. Larger randomized trials are needed to confirm these findings and clarify the role of combination therapy in clinical practice.

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57 - The Impact of Pregnancy on the Sexual Life of Couples in Turkey

Fatemeh Negahbankhameneh⁽¹⁾ - Zeynep Asude Kaynak⁽¹⁾ - Ulaş Çoban⁽¹⁾

⁽¹⁾ Kadın Hastalıkları Ve Doğum, Ondokuz Mayıs Üniversitesi, Samsun, Türkiye

INTRODUCTION AND AIM OF THE STUDY

Pregnancy induces profound physiological, hormonal, and psychosocial changes that can affect sexual health [1,2]. Despite its clinical significance, sexual function in couples during pregnancy remains underexplored [1]. This study aimed to evaluate female and male sexual function during pregnancy in Turkey.

MATERIALS AND METHODS

A cross-sectional descriptive study was conducted among 158 pregnant women and their partners attending prenatal care at a hospital between September–December 2024. The Female Sexual Function Index (FSFI) and the International Index of Erectile Function (IIEF) were applied. Demographic and obstetric data were recorded. Statistical analyses included t-test, ANOVA, Mann-Whitney U, Kruskal-Wallis, and correlation tests; significance was set at $p < 0.05$.

RESULTS

The mean FSFI total score in women was 18.6 ± 6.3 , indicating reduced sexual function. Significant associations were found with parity and trimester ($p < 0.05$). In men, the mean IIEF total score was 56.9 ± 18.9 , reflecting preserved erectile and orgasmic function, stable sexual desire and higher satisfaction compared to women. No significant effect was observed for parity, income, or smoking status.

INTERPRETATION OF RESULTS

These findings indicate that pregnancy negatively impacts women's sexual function, while men largely maintain stable sexual performance, highlighting gender differences in sexual adaptation during pregnancy and underscoring the need for counseling to support couples' sexual health [3].

CONCLUSIONS

Sexual health counseling should be integrated into prenatal care to address sexual dysfunction and improve intimate relationships during pregnancy.

TABLE 1. Female Sexual Function Index (FSFI) scores

FSFI domain	Mean \pm SD	Range
Sexual desire	3.68 \pm 1.05	1-6
Sexual arousal	2.83 \pm 1.42	0-6
Lubrication	3.11 \pm 1.44	0-6
Orgasm	3.14 \pm 1.46	0-6
Satisfaction	1.89 \pm 1.21	0-6
Pain/discomfort	3.93 \pm 2.02	0-6
Total score	18.6 \pm 6.31	2.4-36

TABLE 2. International Index of Erectile Function (IIEF) scores

IIEF domain	Mean \pm SD	Range
Erectile function	23.87 \pm 8.53	1-30
Orgasmic function	7.92 \pm 3.56	0-10
Sexual desire	7.39 \pm 1.81	1-10
Sexual satisfaction	9.72 \pm 4.60	0-15
General satisfaction	8.02 \pm 2.46	2-10
Total score	56.92 \pm 18.94	7-75

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59 - HPV-Independent Cervical Carcinoma Associated with Total Uterine Prolapse in an Elderly Patient: A Rare Case Report

Melis Altug Inan⁽¹⁾ - Canan Satir Ozel⁽¹⁾

⁽¹⁾ Goztepe City Hospital, Obstetrics & Gynecology, Istanbul, Turkey

Background: Total uterine prolapse is a frequently encountered condition in gynecology; however, its coexistence with cervical malignancy remains exceedingly rare. Cervical cancer is the fourth most common malignancy among women worldwide, and approximately 5% of cases are considered to be unrelated to human papillomavirus (HPV) infection.

Case Presentation: We report the case of an 85-year-old postmenopausal woman with two years total uterine prolapse who was diagnosed with HPV-negative squamous cell carcinoma of the cervix. The patient had ulcerative lesions on the prolapsed cervix. Histopathological examination revealed a HPV-independent squamous cell carcinoma. The patient's case was evaluated by a multidisciplinary tumor board, and a treatment plan was initiated accordingly.

Conclusion: Chronic mechanical irritation and mucosal trauma may contribute to HPV-independent carcinogenesis in such rare clinical scenarios. This case emphasizes the need for careful evaluation of ulcerative cervical lesions that may arise in the presence of long-standing uterine prolapse in elderly patients and highlights the importance of timely and appropriate management of prolapse to prevent such outcomes.

Keywords: Cervical cancer, HPV-independent, uterine prolapse, chronic irritation, squamous cell carcinoma, case report

Introduction

Cervical cancer is the fourth most common malignancy in women worldwide, with an estimated 604,000 new cases and 342,000 deaths reported in 2020 alone [1]. High-risk human papillomavirus (HPV) infection is recognized as the principal etiological factor, being implicated in over 95% of cases [2]. Nevertheless, a small subset of cervical cancers arises via HPV-independent pathways, often associated with chronic inflammation, mucosal trauma, or rare histological subtypes [3].

Uterine prolapse, is a common condition in elderly and multiparous women, primarily resulting from pelvic floor muscle weakness and connective tissue degeneration [4]. Although it is typically benign in nature, prolonged and untreated prolapse may lead to repeated mechanical irritation, exposure, and secondary infection of the cervical tissue. In rare cases, such chronic exposure has been hypothesized to contribute to malignant transformation, even in the absence of HPV infection [5,6].

In this report, we describe an unusual case of HPV-independent cervical squamous cell carcinoma developing in the context of total uterine prolapse in an elderly woman, aiming to emphasize the importance of vigilance for neoplastic changes in chronically prolapsed pelvic organs.

Case Presentation

An 85-year-old multiparous woman with a medical history of type 2 diabetes mellitus and hypertension presented with vaginal bleeding. She had a history of total uterine prolapse for approximately two years, which had remained untreated. The patient had a single vaginal delivery and with a body mass index of 22.6 kg/m².

On physical examination, an irreducible total prolapsed uterus was observed, with an approximately 4 cm firm, ulcerated lesion located on the cervix. (Figure-1)A punch biopsy was performed at the 12 o'clock position. Histopathological evaluations revealed HPV independent squamous cell carcinoma of the cervix. Immunohistochemical analysis showed p16 negativity, strong diffuse p53 overexpression consistent with a mutant pattern, and Ki-67 positivity in approximately 60% of tumor cells in the most proliferative areas.

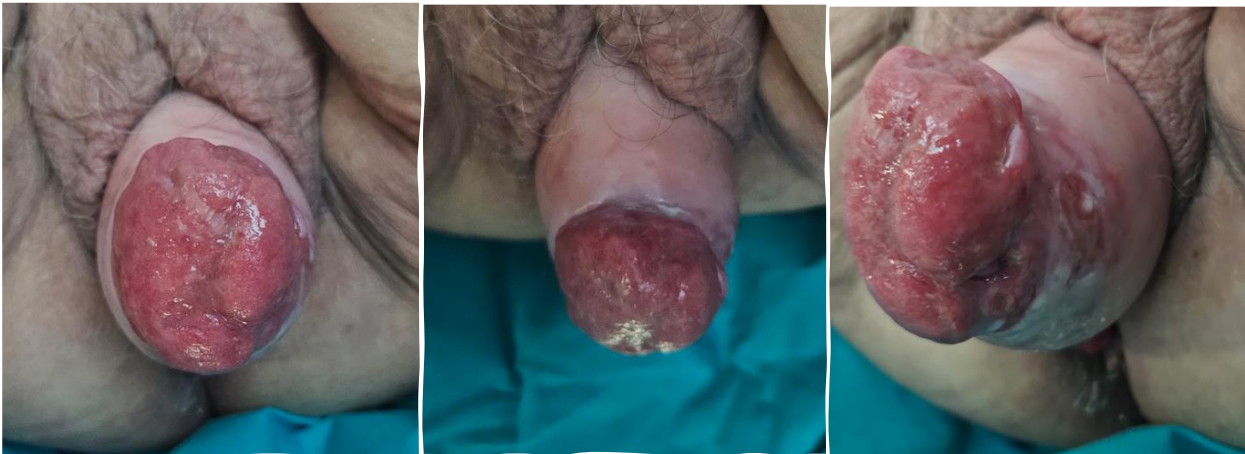


Figure-1: Irreducible uterine prolaps with ulcerated lesion located on the cervix

Positron emission tomography-computed tomography (PET-CT) was performed for staging purposes. The uterus appeared atrophic, and no pathological areas of increased contrast uptake were identified in early or delayed whole-body imaging. However, a hypermetabolic subcutaneous thickening was reported in the posterior aspect of the right hemithorax at the level of the seventh rib (SUVmax: 7.4), which was considered possibly related to an inflammatory process.

The patient was diagnosed with stage IB3 cervical cancer and referred to the medical oncology department. Surgery was planned following radiotherapy; however, before the initiation of radiotherapy, she developed pleural effusion secondary to pneumonia. Diagnostic and therapeutic thoracentesis was performed under interventional radiology guidance. Unfortunately, six months after the diagnosis, the patient's general condition deteriorated, and she died of respiratory arrest while under intensive care monitoring.

Discussion

Cervical cancer is predominantly associated with HPV infection; however, a small proportion of cases arise via HPV-independent pathways. These cancers often demonstrate distinct histopathological and molecular features, such as p16 negativity and aberrant p53 expression, which were both observed in our patient [3,5].

In the present case, the coexistence of long-standing total uterine prolapse and HPV-independent squamous cell carcinoma of the cervix is notable. Although pelvic organ prolapse is a relatively common benign condition in elderly women, its association with malignancy is exceedingly rare. Chronic mechanical irritation, ischemia, repeated trauma, and local inflammation resulting from prolonged prolapse have been proposed as potential cofactors in malignant transformation [6,7].

Recent studies suggest that HPV-independent cervical squamous cell carcinomas may follow a separate carcinogenic pathway, involving TP53 mutations and high proliferative indices, often with an aggressive clinical course [3,5]. The immunohistochemical profile in our case—p16 negativity, diffuse p53 overexpression, and a Ki-67 index of 60%—is consistent with this HPV-independent oncogenic route.

Additionally, the patient's advanced age, and comorbidities (including diabetes and hypertension) may have contributed to delayed diagnosis and limited treatment options. The development of pleural effusion during systemic radiotherapy reflects the complexity of managing cervical cancer in elderly patients, particularly in the presence of functional organ impairment.

This case reinforces the importance of vigilant examination and biopsy of ulcerated cervical lesions in prolapsed uteri, especially in postmenopausal women. While rare, clinicians should remain alert to the potential for neoplastic transformation in cases of neglected prolapse.

Conclusion

This case illustrates a rare but clinically significant association between long-standing total uterine prolapse and HPV-independent cervical cancer in an elderly patient. Although uterine prolapse is generally considered a benign condition, chronic mechanical irritation and mucosal trauma may act as co-factors in malignant transformation, even in the absence of HPV infection. Therefore, in elderly patients, prolapse should be managed in a timely and appropriate manner, taking into account the patient's comorbidities. In cases where ulcerative cervical lesions are observed in conjunction with prolapse, clinicians should maintain a

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high index of suspicion for malignancy and initiate timely diagnosis and treatment through early biopsy and appropriate oncologic evaluation.

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