

### Abstracts presented at the 6<sup>th</sup> annual conference of Mediterranean Minimally Invasive Surgery in Urology. October 23-25, 2024

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#### **Oral Presentations**

Atypical clinical manifestation, diagnostic challenges, and therapeutic dilemma of an unusual case report of ureteric erosion caused by a migrated intrauterine device

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**Objectives:** Intrauterine devices (IUDs) are a widely used long-term contraceptive method, generally considered safe. However, rare complications such as uterine perforation and device migration can occur. An injury or obstruction of the pelvic ureter and subsequent hydronephrosis is infrequent but a dreaded complication of IUD insertion.

**Methods:** We present the case of a 26-year-old female who presented to the emergency department with intermittent right iliac fossa pain for 3 weeks. Her history was significant for IUD placement before 30 months. A physical exam revealed right lower quadrant tenderness but was otherwise unremarkable. Ultrasound examinations performed at multiple healthcare facilities initially failed to diagnose the displaced intrauterine device. Further investigation with CT urography eventually confirmed the right intra-ureteral location of the migrated IUD, with ureter erosion causing hydronephrosis. The patient underwent cystoscopic evaluation followed by surgical removal of the IUD and repair of the ureteric defect.

**Results:** An injury or obstruction of the pelvic ureter and subsequent hydronephrosis is an infrequent but dreaded complication of IUD insertion. There are Fewer than 3 cases reported after reviewed in the literature Worldwide. We highlight Any case of IUD migration should be dealt with on an urgent basis and it must be removed.

**Conclusion/Discussion:** This case highlights the atypical clinical presentation, diagnostic challenges, and complex management considerations associated with ureteric erosion by a migrated IUD. Clinicians should maintain a high index of suspicion for this rare complication, as delayed diagnosis can lead to significant morbidity. Prompt recognition through comprehensive evaluation and timely intervention is crucial for optimal patient outcomes.

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Role of simulation in urology

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**Objectives:** As all the old school surgeons learned the surgery throughout the method see one does one teach one the new generation should change this prospect to simulate the same surgical scenarios outside the field to avoid mistakes and to save time.

**Methods:** I have traveled to several training centers to see different simulations platforms.

**Results:** To spread the culture of simulation in urological surgery in Egypt.

**Conclusion/Discussion:** Simulation can save time and lives, but it also needs fund and program by seniors.

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#### Semisutureless technique in robotic-assisted partial nephrectomy: preliminary results of a single-institutional study

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Objectives: Use of partial nephrectomy (PN) for treatment of small renal masses is increasing. Despite efforts to conserve renal function, the decline in function following robot-assisted partial nephrectomy (RAPN) remains significant. Over the years, various measures have been introduced to safeguard renal function in both the short and long term after this procedure. One such measure involves executing selective suturing of the renal parenchyma following lesion removal, known as performing single layer inner renorrhaphy while omitting cortical renorrhaphy. While this technique appears to be linked with improved postoperative renal function, there is currently limited scientific evidence regarding its safety and applicability. The objective of the present study is to compare perioperative patient outcomes between semi-sutureless RAPN and standard RAPN in patients undergoing surgery at our institution.

**Methods:** Relying on a single-institutional database we retrospectively analyzed prospectively collected data from patients undergoing RAPN from April 2017 to March 2024. Patient characteristics (age, sex, preoperative eGFR, preoperative hemoglobin, Charlson comorbidity index (CCI)), tumor details (PADUA score, tumor size, T stage), and perioperative outcomes (length of stay, estimated

blood loss, operative time, type of ischemia, acute kidney injury, post-operative complications) were collected and analyzed. We used a multivariable logistic regression model to assess post-operative complications, and power analyses were conducted to evaluate potential limitations. Results: Out of 98 patients, 29 (30%) underwent semisutureless RAPN, while 69 (70%) underwent standard suture after RAPN. The majority, 67 out of 98 (69%), were male. Patients treated with the semi-sutureless technique had a higher frequency of CCI  $\ge 2$  (86% vs. 56%, P = 0.004). No other evidence of differences was observed in age, preoperative eGFR, tumor size, T stage, or PADUA score. Mean operative time, mean estimated blood loss, and mean length of stay were comparable between the two groups. Patients treated with the semi-sutureless technique more frequently underwent clampless or selective clamp RAPN (21% vs. 10% and 28% vs. 4%, respectively). In the semi-sutureless group, 3 out of 29 (10%) patients experienced post-operative acute kidney injury, compared to 8 out of 69 (12%) in the standard suture group. Additionally, 7 out of 29 (24%) patients in the semi-sutureless group experienced post-operative complications, compared to 26 out of 69 (38%) in the standard suture group. In multivariable logistic regression, intermediate-high PADUA score (odds ratio [OR] = 3.58, P = 0.007) and  $CCI \ge 2$  (OR = 3.06, P = 0.03) strongly correlated with post-operative complications. While the semi-sutureless technique showed a protective trend with an OR of 0.37, the *p*-value was not statistically significant at 0.07. Assuming that the presented proportions reflect the reality, power analyses indicated a requirement of at least 257 RAPN-treated patients to achieve statistical significance for the OR of 0.37 with 80% power and a two-sided a = 0.05.

**Conclusion/Discussion:** Although not statistically significant, the choice of using the semi-sutureless technique showed a protective effect for post-operative complications. A larger sample size is needed to confirm these findings, emphasizing the importance of multi-institutional collaborations.

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## The efficacy and safety of sacral neuromodulation: a single-center study

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**Objectives:** Sacral neuromodulation (SNM) has recently been used as an alternative treatment modality in patients with refractory overactive bladder (OAB), interstitial cystitis (IC), non-obstructive chronic urinary retention (NOUR) and fecal incontinence (FI). However, data derived from comparisons of different parameters of patient satisfaction are limited. In this cohort, we aimed to report the effectiveness, quality of life (QoL) changes and patient-reported outcomes (PROs) as well as safety of SNM in different patient groups.

**Methods:** Between March 2015 and December 2020, patients who received SNM were retrospectively reviewed. Patients suffering from intractable urinary voiding dysfunctions were enrolled including OAB and NOUR. All patients had failed conservative and medical treatments. After initial test phase in which success was considered as a minimum of 50% improvement in one of the voiding diary parameters (frequency, voided volume, incontinence episodes, number of catheterization), a permanent pulse generator was implanted health related quality of life (HRQOL) was evaluated by a Short-Form 36 (SF-36) health survey. We assessed subjective satisfaction rate of the patients with the Patient Global Impression of Improvement (PGI-I) questionnaire.

**Results:** A total 23 subjects (17 females and 6 males) with average age of 3804 years old (21–55 years old), were implanted tined lead electrode (Medtronic, Minnetonka, MN). The median test phase was 25 days (10-33 days) and median follow-up period was 17 months (5-34 months). OAB was diagnosed in 12 and NOUR in 11 patients. Sustained benefit was observed in 58.3% (n = 7) patients with OAB and in 54.4% (n = 6) patients with UR. Overall, SNM was successful in 18 patients but failed in 5. Most common adverse effects were the pain in IPG site and wound infection. The overall success rate was 56.5%. The median outcome on the PGI-I scale was 2 "much better", according to patients subjectively responded In the OAB and NOUR group, three mean SF-36 scales (physical function, vitality, and mental health) significantly improved after treatment (P = 0.034, P = 0.045, P = 0.024, respectively).

**Conclusion/Discussion:** Our initial experience regarding sacral neuromodulation therapy showed that this treatment modality can effectively and safely be used in the management of refractory lower urinary tract dysfunctions. Particularly for generic HRQoL as measured by the SF-36, SNM treatment effectively improves SF-36 scores both OAB and NOUR groups.

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#### Giant adrenal myelolipoma with a spontaneous rupture: case report of a rare case and systematic review of the current surgical indications

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**Objectives:** Myelolipomas are benign neoplasms predominantly composed of mature adipose, intermixed myeloid tissue with varied hematopoietic involvement. Rupture and bleeding of myelolipoma is a rare complication that may lead to hematoma formation or spontaneous retroperitoneal hemorrhage and fatal event. A case of a 40-yearold female presenting with 1 day history of sudden onset of severe localized left flank pain and systematic unwell-

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ness been diagnosed with a large actively bleeding left adrenal mass surrounded with retroperitoneal hematoma extending to the pelvis, managed with open exploration resection, evacuation and drainage of the ruptured mass through a subcostal incision.

**Methods:** A retrospective evidence-based search of all case reports and literature reviews was done for reported cases of adrenal myelolipoma was carried out in the Medline (via Ovid) and the Cochrane Library during the period January 2000–October 2023. All the cases with histopathological adrenal myelolipoma diagnosis that underwent rupture were included.

**Results:** Small (< 5 cm), homogeneous, non-functional adrenal myelolipoma (AML) with an attenuation between -50 and -20 Hounsfield units (HU) comprising macroscopic fat on non-contrast CT are considered benign requiring no surgical intervention. Giant AML (> 6) may be symptomatic and consideration for surgery are granted to avoid risks of complications. The treatment target of asymptomatic AMLs in the literature has ranged from 4 cm to 10 cm, with no clear consensus. Open surgical removal is the approach of choice in case of hemodynamic instability whereas in stable giant AMLs most authors preferred transperitoneal to the retroperitoneal approach.

**Conclusion/Discussion:** There is no standardized consensus on surgical intervention in literature. However, based on the available literature searches and retrospective analyses, surgery should be considered in patients with a tumor diameter above 5–6 cm, exhibiting symptoms with mass effect, functional ipsilateral adenoma with adrenal hormone excess, increasing tumor size, signs and symptoms of retroperitoneal bleeding or spontaneous tumor rupture, radiologically confirmed local invasion, concomitant resection for other reasons, and to confirm a questionable diagnosis on imaging. (RECIST 1.1 criteria for progressive disease at 6–12 months follow-up).

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### Are we doing enough stent free ureteroscopies? Analysis of single center practice for stenting after ureteroscopies

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**Objectives:** Stenting is one of the most common exit strategies after ureteroscopies, and can cause co-morbidity and can be costly as well. In our study we have observe different variable's influence on stenting post ureteroscopies to analyze successful procedure without stenting.

**Methods:** We had collected data prospectively and retrospectively analyzed them. The study contained all the patients undergoing ureteroscopies for treating stone with Laser stone fragmentation from March to November 2023 total 7 months and includes 64 patients who met the inclusion criteria of the study. We have collected data from the electronic patient records and analyzed using Microsoft

excel.

**Results:** We had 40.6% cases who had stenting post procedure. The mean HU of the patients underwent stenting was 900 HU and the mean for non-stented were 756 HU. Again, the patient with > 1000 HU stones ended up with a stent in 66% of the time while < 1000 HU stone patients were stented in 54% of the time. Moreover, 89% of the renal pelvis stones, 65% of the upper ureteric stones and 60% of the lower pole stone patients were stented which is above average level. Then, over 2 cm stones needed a stent after the procedure in all the cases. But the rate of stented patients was 57%, 62% and 51% respectively for the stone sizes of 15–20 mm, 10–15 mm and 5–10 mm, respectively. We only had 2 (3%) re-attendances following the procedure in the ED after ureteroscopies of this cohort.

**Conclusion/Discussion:** As stenting is associated with comorbidities and adverse outcomes, we can safely consider stent free Ureteroscopies in the uncomplicated cases in the smaller stone cases with less than 1000 HU densities. Higher levels of stenting rate is seen in the group who had renal pelvic, upper ureteric and lower pole stones.

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# Visualization of the renal vein during last part of PCNL: a case report

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**Objectives:** We present a case of pyelovenous backflow during PCNL. To the best of our knowledge, documented cases of renal vein visualization during PCNL are very rare.

Methods: This is case report.

**Results:** A 52-year-old man presented with symptoms of renal colic due to a 4 cm renal stone. The patient had a branch of renal vein that extended along the extra renal pelvis. A left PCNL was performed using standard access and balloon dilatation. A 26 F access sheath was inserted, and the nephroscope was safely introduced. The stones were removed using an ultrasonic lithotripter. During the injection of a contrast agent into his left caliceal system at the end of the procedure, his left renal vein was visualized. This radiological finding is attributed to the ultrasonic energy, as there was some bleeding before nephrostomy placement. We kept the nephrostomy tube in place for 5 days. Before removal, we performed a CT scan to check the vascular structures. The scan revealed no fistulas or pathological findings. The patient was safely discharged on the fifth day of hospitalization.

**Conclusion/Discussion:** Five types of renal backflow are described in the literature: pyelovenous, pyelolymphatic, pyelotubular, pyelointerstitia and pyelosinus. Among the causes of pyelovenous reflux observed during PCNL are needle access, high-pressure administration of contrast agent, uncontrolled ultrasonic energy used during stone

fragmentation, or tube- or guide-related complications during nephrostomy placement. The renal vein structure should be carefully examined in preoperative imaging, and this consideration should be kept in mind in the event of bleeding during the perioperative period.

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Two-year follow-up comparing rezum therapy versus bipolar transurethral resection of the prostate for treating benign prostatic hyperplasia. A prospective randomized study

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**Objectives:** Comparison of the efficacy and safety of Rezum therapy and bipolar transurethral resection of prostate (B-TURP) for the management of benign prostatic hyperplasia (BPH) of 50–120 g size.

**Methods:** One hundred patients with BPH who met the inclusion criteria were included and split into two equal groups to undergo Rezum therapy or B-TURP. The two groups were compared for efficacy using international prostate symptom score (IPSS), quality of life (QoL), maximum urinary flow rate ( $Q_{max}$ ), operative time, catheter time, hospital stay, post-void residual urine (PVR), prostate-specific antigen (PSA), and residual prostate size and safety using the incidence of complications.

**Results:** Rezum significantly ameliorated IPSS from the baseline score by 55.3%, QoL by 50%,  $Q_{max}$  by 62.5%, International Index of Erectile Function (IIEF) by 7.1%, PVR by 50%, residual prostate size by 28.1% and PSA by 42% at 2 years. Meanwhile, the improvement in B-TURP was significantly higher than Rezum group, Rezum therapy had a significantly shorter duration of operative time and hospital stay. Also, it had fewer complications in comparison with B-TURP.

**Conclusion/Discussion:** Rezum is a minimally invasive procedure that provides significantly improved symptomatic relief of BPH and quality of life with preservation of erectile and ejaculatory functions. However, it is not as effective as B-TURP.

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# An anterior prostatic cyst resulting in acute urinary retention: a case report

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**Introduction:** Prostatic cysts are rare, noticed in 0.5 to 7.9% of patients. Mostly have an embryological origin

but they can also be associated to chronic prostatitis. They may be classified in different categories according to location, shape, size and relation to the urethra or seminal vesicles. Most of the prostatic cysts are asymptomatic and located in the medial portion of the prostate. This article reports an unusual case of a patient with an anterior prostatic cyst presenting with Low Urinary Tract Symptoms (LUTS).

**Methods:** A 30-year-old male patient with no other medical conditions presented with poor intermittent stream and sensation of residual urine of 7 days' duration. Urinary ultrasound showed elevated residual urine with post-urinary volume estimated at 317 mL and pre-urinary volume estimated in 496 mL. Cystoscopy revealed a cystic lesion that projected at the level of the bladder neck region, obstructing the bladder outlet by a ball-valve action; there was no prostatic hypertrophy observed and both ureteral orifices were intact and distant from the cyst. Transurethral resection of the cyst at its base was performed.

**Results:** The histopathological finding was consistent with a retention cyst. Postoperatively, urinary stream reestablished with a  $Q_{max}$  of 18 mL/s and a post-void residual of 45 mL.

**Conclusions:** Anterior prostatic cysts presenting symptoms are rare since the lack of reports that have ever been published and must be include as a differential diagnosis in men with LUTS.

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# Robotic-assisted laparoscopic partial nephrectomy: a single center experience

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**Objectives:** Robot-assisted partial nephrectomy (RPN) is considered the gold standard treatment for small renal tumors which has been increasingly used during the last few years in the field of nephron-sparing surgery due to highdefinition 3D visualization and instruments with a greater range of motion, which allows for more precise dissection and suturing. This leads to more enhanced recovery for the patients, less complications, and more kidney function preservation. The advantages in having better oncological and functional outcome makes it a game changer in RCC treatments. Aim of the study: To summarize our experience in a tertiary referral center for minimally invasive robotic treatment of RCC with RAPN emphasizing on techniques and outcomes

**Methods:** We have been doing RPN since 2016 and we have done 300 cases. A retrospective review of 70 patients was done from the period of 06/2023 to 06/2024. The preoperative workup included a triple phase CT, MDT cancer discussion. The parameters analyzed were patients' demographics, PADUA score, operative details, postoperative outcome, histopathology, and follow-up.

**Results:** We found that the mean age of the studied group

was  $65.56 \pm 5.7$  SD (33–80) years, The mean PADUA score 7.09  $\pm$  1.2 SD (6–12), Mean console time was  $115.80 \pm 11.2$  SD (80–210), mean ischemia time was  $22.37 \pm 3.14$  SD (16–40), Mean estimated blood loss 118.59 mL  $\pm$  9.27 SD (20–1500). In 16 patients (22.8%) intraoperative ultrasound scan was used to help tumor identification and marking of the safety margins. conversion to radical nephrectomy was in 4 cases (5.7%) as all of them were very close and adherent to one of the main kidney vessels, conversion to open was done in in 2 cases (2.8%) in one case due to severe bowl adhesions from previous surgery and a case due to uncertainty of having negative margins due to difficult access to the tumor. Histology showed Renal Cell Carcinoma in 62 patients (88.5%) with clear cell histology was the most malignant type in 54 patients (77.1%) and other histology subtypes of RCC in 8 patients (11.4%), positive margin was seen in 4 cases (5.7%).

**Conclusion/Discussion:** RAPN is the most valid option for the treatment of small RCC. It has good oncological and functional outcomes. More prospective analysis should be considered on large number of patients and more attention should be attributed to performing preoperative renal mass biopsy to reduce the number of operations on benign lesions.

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#### Quantification of SNM lead locations using fluoroscopy and their relationship to surgical motor threshold

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**Objectives:** Sacral neuromodulation (SNM), an approved therapy for OAB, urinary retention without obstruction, and bowel disorders, requires good surgical targeting of the sacral nerve. The targeting uses a combination of fluoroscopy and stimulation testing but relies very heavily on surgeon experience. We conducted a retrospective study to capture and quantify contact depths and implant angles from saved fluoroscopic images to determine whether we can increase reliance upon quantitative fluoroscopic positioning to target the lead. To examine the functional relevance of these measurements, we compared them to motor thresholds obtained during surgery.

**Methods:** EMR were reviewed from 16 patients with implanted Axonics SNM leads (Model 1201). Lead angles and contact depths were measured from lateral fluoroscopic images. Contact depths were measured relative to the posterior sacral plane. Without image magnification, we calculated depths as the percentage of each patient's sacral thickness (%ST). Lead angle was measured in degrees between the ventral aspect of the sacrum and the lead. As a measure of therapy relevance, we compared lead and contact locations to available bellows motor or sensory thresholds (bipolar stim) which are related to SNM efficacy. Student's t-test (Bonferroni adjustment for multiple comparisons), was used for statistical significance (P <

#### 0.05).

Results: Data were collected for a total of 16 patients with unilateral SNM leads. Bellows motor thresholds were available for all 64 contacts from these 16 patients. Sensory thresholds were only available for 16 contacts (4 patients). Contact depths and lead angles could easily be measured for all patients. Mean contact depths ranged from 81%ST (SD = 15) for the shallowest contact (3) to 184 %ST (27) for the deepest (contact 0). Mean contact depths across the contacts (0-3) were all significantly different from one another (P < 0.05; t-test, Bonferonni correction). Mean lead angle was  $80^{\circ}$  (± 11°). Contact depth and angle were also related to bellows threshold, measured during implantation. Bellows threshold was significantly smaller for cathodal stimulation at contact 3 (3-, 0+) relative to stimulation at contact 0 (0-, 3+)  $(0.9 \pm$ 0.1, SEM vs.  $1.2 \pm 0.1$  mA, P < 0.05). We also observed a potential optimal angle for the implanted lead between 75-85°. Within this range, the bellows motor thresholds for contacts were usually significantly smaller (7 of 8 comparisons) across all lead contacts. The leads within this 75-85° angle range also had smaller variations in thresholds across the lead compared to lead angles  $> 85^{\circ}$  and <75°.

**Conclusion/Discussion:** Functionally relevant SNM contact depths and implant angles can be measured from fluoroscopic images captured during SNM implantations. An improved focus on identifying, locating, and stimulating the neural targets of SNM can establish evidence-based design inputs for next generation lead designs and implantation techniques.

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#### A training center analysis of procedural efficiency and enucleation ratio of holmium laser enucleation of prostate considering surgeon and patient factors

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**Objectives:** In this study, we have assessed the influence of operator and patient factors on the efficiency and enucleation ratio of HoLEP in our center over a period of 3 years by looking at surgeon's techniques as well as prostate size variables.

**Methods:** Prospective data was collected on 502 HoLEP patients who were operated on by 5 surgeons between 2020-2023, who used two, three lobe or en-bloc techniques. Collected data include estimated prostate size in cubic centimeters (cc), the specimen weight in grams (g) and duration of operation in minutes (min). To compare performances across techniques and operators, we studied the effect of those parameters on the efficiency (the ratio of the resected tissue weight with the total operation time) and the enucleation ratio (resected tissue weight divided by estimated prostate size). PRISM 9 was used for statistical analysis.

Results: It was observed that 3 lobe techniques had a

mean efficiency and enucleation ratio of 0.33 gm/min & 0.40 gm/cc in comparison to the mean of 0.67 gm/min & 0.56 gm/cc for the en-bloc and 2 lobe technique ( $P \le 0.0001$  for both). No significant difference in efficiency was found in 2 lobe and en-bloc techniques (P = 0.089). HoLEP for larger than 100 cc prostates had superior efficiency than those under 100 cc size group with means of 0.69 and 0.48 gm/min, respectively (P < 0.0001). In the latest 271 cases, 26 cases involved trainees, which resulted in significant (P < 0.001) reduction of efficiency, mean from 0.61 to 0.39 gm/min, respectively, resulting in around 37% less efficiency.

**Conclusion/Discussion:** This study clearly demonstrates that the 3 lobe enucleation techniques have the least efficiency and enucleation ratio. These results can be used in optimizing theatre planned time along with implementing measures to improve HoLEP training.

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### **Video presentations**

#### Robot assisted completion ureterectomy. Use of minimal invasive surgery to operate in both abdomen and pelvis

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**Objectives:** Traditionally nephron-ureterectomy was to be managed with open surgery with large incision or 2 separate incisions as procedure is to be performed in both abdomen and pelvis. With advances of minimally invasive techniques, we currently able to perform using the surgical robot which had advantages of precision and helps the patient with enhanced recovery. Aim To discuss a case of upper tract renal tumor treated initially as renal cell carcinoma but subsequently discovered to be transitional cell carcinoma.

**Methods:** A 67-year-old lady who travelled to Australia where she became unwell and developed a XPN picture on CT. She underwent an urgent nephrectomy in Australia. The pathology showed G3 PT3a TCC of her kidney and after comprehensive clinical assessment and MDT discussion she had robotic completion ureterectomy. This video presentation illustrates challenges in this case and how to overcome them. It also demonstrates the benefits of using the surgical robot in such a challenging case who had previous renal surgery and advanced cancer.

**Results:** The patient had uneventful robotic ureterectomy and went home in post operative day 2 with urethral catheter in situ for 10 days demonstrated Histology of the ureter showed G3 PT1 TCC ureter clear margins. She was referred for adjuvant chemotherapy. This presentation is to give insights on how to identify the ureter robotically, how to deal with surrounding neovascularization, and how to perform effective bladder cuff resection with intracor-

### poreal suturing.

**Conclusion/Discussion:** Caution needs to be exercised when dealing with XPN as this can also be associated with TCC upper tract. Completion ureterectomy is a worthwhile procedure and can be done robotically with good functional and oncological outcomes.

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#### Advancing surgical precision: robotic salvage nephrectomy and adrenalectomy

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**Objectives:** The integration of robotic-assisted surgery in urological procedures has revolutionized the landscape of minimally invasive surgery. This presentation focuses on the application, benefits, and outcomes of robotic salvage nephrectomy and adrenalectomy. Robotic-assisted surgery has emerged as a pivotal technique in managing complex urological and adrenal pathologies. Salvage nephrectomy and adrenalectomy, often indicated in recurrent, benefit significantly from the precision and minimally invasive nature of robotic surgery.

**Methods:** 76 M underwent robotic left partial nephrectomy for lower pole left renal tumor. The initial histology was G4pT3a clear cell RCC, positive parenchymal margins. He is known as CKD eGFR < 60 pre-operatively. After 24 months of close surveillance. He had a CT that showed local recurrence with ipsilateral adrenal metastasis and involvement of renal vein tributary MDT discussion recommended Left salvage nephrectomy and adrenalectomy.

**Results:** Surgical technique: Port placement and robotic setup as standard: four robotic ports are placed under direct vision in a linear fashion at the lateral border of the rectus muscle. These ports are spaced about 6 cm apart. Typically, the second most cephalad port (port #2) is intended for the camera and should be below the level of the renal hilum. - Careful dissection strategies and handling complex anatomy to reduce chances of adjacent organ injuries (bowel and spleen). - Techniques to minimize blood loss and ensure clear margins. Intraoperative challenges and solutions: managing adhesions and scar tissue from previous surgery - Approaches to vascular control and organ mobilization - Tips for dealing with intraoperative complications 4. Postoperative care and outcomes: it was an uneventful procedure, no intraoperative complications. The operative time was 3 hours, with estimated intraoperative blood loss of 50 mL. In our practice, we don't insert urethral catheters, or tube drains as part of enhanced recovery. That encourages patients to mobilize early and reduce the length of Hospital stay. In that case, patient was discharged on Day 2 Final histology was clear cell RCC G3pT3a, with clear resection margins. He is currently under care of oncology for systemic adjuvant treatment. Conclusion/Discussion: Robotic salvage nephrectomy and adrenalectomy offer significant advantages in terms of precision, reduced morbidity, and enhanced recovery. This presentation aims to provide a comprehensive overview of the techniques, challenges, and benefits, underscoring the role of robotic surgery in urology.

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## **Robotic partial nephrectomy: how to utilize robot to achieve the trifecta outcome?**

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**Objectives:** Robotic partial nephrectomy is currently the gold standard for imperative and elective treatment of renal cell carcinoma. Traditionally, it was for small renal masses (T1a) and its horizon is expanding as it gained more acceptance and practicality in larger tumors in selected cases. The Trifecta criteria of reduced intra and post operative complications, reduced WIT, and negative surgical margin is used to standardize the outcome for RAPN. This video of surgical technique aimed to help achieve this trifecta criteria (reduced WIT, avoidance of intra and post op complications, and negative surgical margins).

Methods: A video presentation of RAPN for 2 cm left

lower pole posterior exophytic RCC, starting from the patient position till end of the procedure, all surgical steps are illustrated and will be explained by oral live commentary.

Results: Surgical technique: 1- Explaining the best position to gain an intraperitoneal safe access. 2- Explaining How to gain an access to the renal vessels in timely fashion using the anatomical landmarks. This Includes safe bowl reflection, proper handling, and mobilization of surrounding organs as spleen, tail of pancreas, adrenal if required. 3- Localization of the tumor, use of MAP and RENAL Scores to anticipate the complexity. 4- Safe renal vessels clamping and tumor removal. 5- Haemostasias with renorrhaphy in 3 levels ensuring the collecting system is closed properly to avoid urine leak. 6- Drain insertion and specimen removal. Outcome: The patient went home in Day 2 post operatively and the histology showed T1a clear cell renal cell carcinoma with negative margins and no necrosis. Patient was stratified as low risk according to Leibovich score.

**Conclusion/Discussion:** RAPN is a great step in moving forward for the treatment of RCC being more precise and less invasive, this presentation is to give insight of how to use the prescribed surgical technique to achieve the prefect outcome parameters.

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