febrile UTI with Escherichia Coli occurred two weeks later and was treated successfully with ten-day course of Ciprofloxacin.

Ultrasound examination revealed normal kidneys and bladder, while voiding cystography was evocative for bilateral VUR and post void residual.

Neurologic status improved over a three-month period from almost complete hypotonic palsy to mild hypotonic paraplegia.

**Discussions** Long hospitalization and prolonged urine catheterization increase the risk of CAUTI. High dose Meropenem remains efficient in treating MDR Klebsiella strains. Recurrent UTI should be further investigated for presence of VUR.

Neurological damage, like hypotonic cerebral palsy, can be associated with underactive bladder and detrusor underactivity.

### 359 A NOVEL COL4A4 MUTATION IN THE PROBAND INITIALLY DIAGNOSED AS IGAN WITH AUTOSOMAL RECESSIVE ALPORT SYNDROME

İlayda Altun*, Seha Saygılı, Nur Canpolat, Salim Çalışkan, Lale Sever. İstanbul University-Cerrahpasa, Division of Pediatric Nephrology, İstanbul, Turkey

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**Immunoglobulin** A nephropathy (IgAN) is recognized as the most common form of glomerulonephritis all over the world. The diagnosis of IgAN is generally made according to clinical findings and histologic lesions on renal biopsy. Alport Syndrome is an inherited rare glomerular disorder characterized by hematuria, proteinuria, sensorineural hearing loss and progressive kidney disease. We here present a patient initially diagnosed as IgAN with biopsy findings and then diagnosed as Alport Syndrome by genetic screening.

An eight-year-old boy presented with a history of macroscopic hematuria attacks preceded by upper respiratory tract infections. Renal biopsy was compatible with IgAN showing positive staining of IgA in the mesangium and the basement membrane in immunofluorescence. Furthermore, the thinning and thickened of the glomerular basement membrane and splitting of lamina densa was found in electron microscopic examination. During his follow-up, persistent microscopic hematuria and proteinuria were noticed.

Sensorineural hearing loss was developed at ten years of age. Also the proband had a family history of hematuria with proteinuria. Despite the positive mesangial IgA staining in immunofluorescence, atypical renal phenotypes for IgAN including persistent hematuria and hearing loss, and positive family history and electron microscopic findings of renal biopsy aroused suspicion of Alport Syndrome. Genetic analysis (whole exon sequencing) demonstrated a homozygous mutation in COL4A4 (chr 2:922792261 c.2438delG (p. Gly813Asp5Ter56) in the proband. Heterozygous mutation was identified by Sanger sequencing of gene COL4A4 in the carrier of all member of his family.

Due to this very rare coincidence, we emphasize that atypical clinical findings should warn the clinicians for other possible diagnosis. The diagnosis of this case also highlights the importance of genetic test in diagnosis of inherited kidney disease. Genetic screening has been recommended as the gold standard for the proper clinical diagnosis and understanding the mode of inheritance when Alport syndrome has suspected in a patient.

### 360 UNILATERAL RENAL AGENESIA: A 28-YEAR SINGLE CENTER EXPERIENCE

Dragan Kosic*, Srdjan Danojlic. OB Studenica Kraljevo, Radiology department

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Unilateral renal agenesis (URA) is defined as the one-sided congenital absence of renal tissue resulting from failure of embryonic kidney formation [1] URA is often associated with congenital anomalies of the kidney and urinary tract and extra-renal anomalies, such as cardiac, genital or gastrointestinal malformations. The impaired clinical outcome of those children may be explained by the hyperfiltration hypothesis which implies that children with a solitary functioning kidney are at risk to develop hypertension, proteinuria, and chronic kidney disease. [2] Aim of this paper was to estimate the incidence of URA and associated anomalies in our population.

We reviewed 44 consecutive cases of unilateral renal agenesis diagnosed at our hospital in this 28 years (1991-2019) retrospective study During that period 28776 children were evaluated by 56921 renal ultrasonography (RUS). Patient age at diagnosis ranged from newborn to 18 years. There were 23 (52%) boys and 21 (48%) girls. Our patients were evaluated for urinary tract infection or abdominal pain and during examination for congenital malformations or pathological fetal US. The left kidney was absent in 25 (56%) patients and the right kidney was absent in the remaining 19 (44%). Associated genital anomalies were present in 5 (23%) of 21 girls with URA including agenesis et hypoplosia uteri, agenesio et polycystic ovarii, vaginal duplicity. One boy (4%) had contralateral hydrenephrosis with bladder diverticulum. Ectopic kidney was diagnosed in 15 patients.

In our population the frequency of URA was 1 per 1330 births. The most frequent non urinary malformations were genital anomalies among girls.

Careful screening should be proposed throughout childhood to detect early signs of glomerular hyperfiltration and prevent its progression to more serious complications. Ultrasound has been effective for early detection of renal and urinary tract anomalies.

### 361 PRETREATMENT MORNING URINE OSMOLALITY PREDICTS ORAL DESMOPRESSIN LYOPHILISATE TREATMENT OUTCOME IN PATIENTS WITH PRIMARY MONOSYMPTOMATIC ENURESIS

Iva Hilić, Martin Ćuk, Milan Miklošević, Antonella Geljić, Marijan Saraga, Slaven Abdović*. Department of Pediatric Nephrology, Children’s Hospital Zagreb, Croatia

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To determine the association between urine osmolality in patients with primary monosymptomatic enuresis (PMNE) and their response to desmopressin.

We hypothesized that pretreatment morning urine osmolality is lower in PMNE patients with complete response to desmopressin treatment compared to the cases with partial or no-response.

This was a prospective cohort study that included 419 patients with enuresis seen in our outpatient clinic between October 2017 and October 2019. Patient workup included symptom checklist, bladder diary, kidney and bladder