**IS2-04 Undifferentiated sarcoma developing 14 years after colocystoplasty**

Juntendo University School of Medicine, Department of Pediatric General and Urogenital Surgery
Yutaka Hayashi, Yoshifumi Kato, Tadaharu Okazaki, Geoffrey J Lane, Atsuyuki Yamataka

**Case report:** We have performed 110 colocystoplasties (CP) over the past 25 years with mean follow-up of 13.7 years (range: 1-25). One boy with myelomeningocele who had CP and ureteric reimplantation when 2 years old and normal annual cystoscopies, developed hematuria and abdominal pain with liver dysfunction 14 years postoperatively. Computed tomography, showed a tumor of the left side of the augmented bladder, a large lymph node, and large multiple probable metastases in the liver. Cystoscopy 3 months earlier had been normal, but when repeated showed tumor originating from the augmented sigmoid colon. Biopsy showed undifferentiated sarcoma. Despite chemotherapy, he died 3 months later. Autopsy diagnosis was undifferentiated sarcoma originating from the sigmoid colon.

**Literature review:** There are 55 cases (24 male) of post bladder augmentation (BA) malignancy reported in the literature. Most are adult; mean operative age: 31 years (range: 5-59); diagnosis was made after a mean of 19.3 years (range: 0.25-38); underlying pathology was urinary tuberculosis (n = 17; 31%), neurogenic bladder (n = 15; 27%), schistosomiasis (n = 2; 4%), post bladder surgery (n = 1; 2%), and unknown (n = 20; 36%). BA involved small bowel (n = 30; 55%), colon (n = 13; 24%), stomach (n = 8; 15%), and ileo-cecum (n = 4; 7%). Malignancies were adenocarcinoma (n = 36; 65%), transitional cell carcinoma (n = 11; 20%), signet ring cell carcinoma (n = 4; 7%), squamous cell carcinoma (n = 2; 4%), oat cell carcinoma (n = 1; 2%), and leiomyosarcoma after ileocystoplasty (n = 1; 2%) involving the anastomosis (n = 27; 49%), intestinal cap (n = 10; 18%), native bladder (n = 9; 16%), and unknown (n = 9; 16%).

**Conclusions:** This is the first report of sarcoma developing after CP but the etiology is unclear.