Review article

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PERCUTANEOUS NEPHROSTOMY IN OBSTRUCTIVE UROPATHY: COMPLICATIONS AND FEASIBILITY ANALYSIS OF OUTPATIENT SURGERY UNDER LOCAL ANESTHESIA

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This study aimed to examine the efficacy, feasibility, frequency of complications, and outcome of emergency or elective renal unblocking in patients with benign or malignant pathology within the outpatient surgical procedure manner.

A prospective study included 158 patients, of which 94 (59.49%) women and 64 (40.50%) men, who underwent PCN at the Urology Department of General Hospital "Aleksa Savić" in Prokuplje from January 2020 to January 2024. All the patients were admitted in an outpatient manner. The cohort included patients with both benign and malignant obstruction.

The operation success rate was 97.47%. More than 40% of percutaneous nephrostomy (PCN) placements were performed for calculosis. The frequency of issues in our study aligns with results from previous investigations. Regarding the hydronephrosis grade, there was a clear statistical significance in the complication rates among the groups with mild, moderate, and severe hydronephrosis. Every problem was categorized using the five modified C-D (Clavien-Dindo Classification System) grades. Most of the problems were low-grade C-D complications.

Percutaneous nephrostomy primarily gives us time in treatment planning, and in a certain number of patients, it represents the final urine derivation when there is no definitive surgical procedure. In addition to overcoming the learning curve, it is a sovereign method in prompt intervention on developed obstruction. Performing percutaneous nephrostomy in an outpatient manner represents a safe and feasible procedure.

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Key words: kidney, hydronephrosis, nephrostomy, percutaneous