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Background

Bacterial urinary tract infections continue to be a major health problem, responsible for a significant morbidity and mortality. Its prognosis is more severe than non-bacterial forms. The aim of this work was to study the clinical and evolutionary features of bacterial urinary tract infections caused by *Escherichia coli* (*E.coli*).

Methods

We conducted a retrospective study including all patients hospitalized in the infectious diseases department for urinary tract infection (UTI) caused by *E.coli* between 2010 and 2017.

Results

► **Total:** 75 cases (12.2%) of bacterial UTI among 613 cases of UTI caused by *E.coli*.

► **Gender:** 47 females: 62.7%.

► **Mean age:** 59 ±17 years.

→ 33 patients were aged ≥ 65 years: 44%.

► **Previous medical history:**

Diabetes was noted in 50.7% of the cases (Table 1)

► **Clinical presentation:** The most common clinical presentation was acute pyelonephritis: 78.7% (Table 2)

Table 2: Clinical presentation of bacterial urinary tract infections caused by *Escherichia coli*

	Number	Percentage (%)
Acute pyelonephritis	59	78.7
Prostatitis	8	10.6
Renal abscess	5	6.7
Prostatic abscess	3	4

► **There were 36 cases of multidrug-resistant bacteria: 48%.**

► **Community-acquired UTI: 70 cases: 93.3%.**

► **Mean duration of treatment:** 18 ± 6 days.

► **Treatment associated with antibiotics:**

• **Surgery:** 4 cases: 5.3%

• **Radiological drainage:** 2 cases: 2.7%.

► **Disease evolution:** Favourable in 77.3% of the cases (Table 3).

Table 3: Disease evolution of patients with bacterial urinary tract infections caused by *Escherichia coli*

	Number	Percentage (%)
Favourable	58	77.3
Relapse	9	12
Reinfection	6	8
Death	2	2.7

► **Complications were noted in 10 cases (13.3%) represented mainly by acute renal failure in 4 cases: 5.3%.**

Conclusion

Bacterial urinary tract infections caused by *E.coli* were associated with complications such as renal and prostatic abscess, requiring surgery and long duration of treatment.

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Methods

We conducted a retrospective study including all patients hospitalized in infectious diseases department for urinary tract infection (UTI) caused by *E.coli* between 2010 and 2017.

Results

During the study period, we enrolled 613 cases of UTI caused by *E.coli*, among which 75 cases (12.2%) were bacterial. There were 47 females (62.7%). The mean age was 59 ±17 years. Thirty three patients were aged ≥ 65 years (44%). Diabetes was noted in 50.7% of the cases (50.7%). A history of UTI was reported in 13 cases (17.3%). The most common clinical presentation was acute pyelonephritis (59 cases, 78.7%) and followed by prostatitis (8 cases, 10.6%). Renal abscess was noted in 5 cases (6.7%) and prostatic abscess in 3 cases (4%). There were 36 cases of multidrug-resistant bacteria (48%). Community-acquired UTI were noted in 70 cases (93.3%). The mean duration of treatment was 18 ±6 days. Surgery and radiological drainage were indicated in 4 (5.3%) and 2 cases (2.7%), respectively. The outcome was favourable in 58 cases (77.3%). Complications were noted in 10 cases (13.3%) represented mainly by acute renal failure in 4 cases (5.3%). Relapse was noted in 9 cases (12%) and reinfection in 6 cases (8%). Two patients died (2.7%).

Conclusion

Bacterial urinary tract infections were associated to complications such as renal and prostatic abscess, requiring surgery and long duration of treatment.