


CLINICAL IMAGE

A unique case of bilateral hydronephrosis caused by a fecalith

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Case Report

We report a case of a rectal fecalith resulting in bilateral hydronephrosis and hydroureter. A 76-year-old woman presented with minimal urine output and generalized weakness. She was diagnosed with septic shock secondary to a urinary source. Laboratory studies were consistent with acute renal failure (4.0 mg/dL on presentation-baseline creatinine 0.7) and uremia (BUN 108 mg/dL). A noncontrast computed tomography (CT) scan of her pelvis showed bilateral hydronephrosis and hydroureter secondary to a large (14 cm) rectal fecalith (Figs. 1 and 2). Manual disimpaction was performed, and an aggressive bowel regimen of fiber laxatives, stool softeners, and enemas were given. Large amounts of stool were fragmented. A polyethylene glycol electrolyte solution at a rate of 100 mL/h for 24 h was administered for fecalith resolution. A repeat CT scan of her abdomen and pelvis on hospital day 2, revealed a decrease in size of the fecalith to approximately 4 cm. Persistent bilateral hydronephrosis and hydroureter were observed; however, slow resolution postdisimpaction was an expected outcome (Figs. 3 and 4). While the patient's creatinine trended down to 1.53 mg/dL by hospital day 9, her hospital course was complicated by aspiration pneumonia, and she was discharged to hospice care.

Key Clinical Message

This is a unique case that signifies the importance to look beyond the genitourinary system for causes of hydronephrosis. In addition, we outline the manner in which a fecalith should be addressed.

Keywords

Constipation, fecalith, hydronephrosis, polyethylene glycol electrolyte solution.

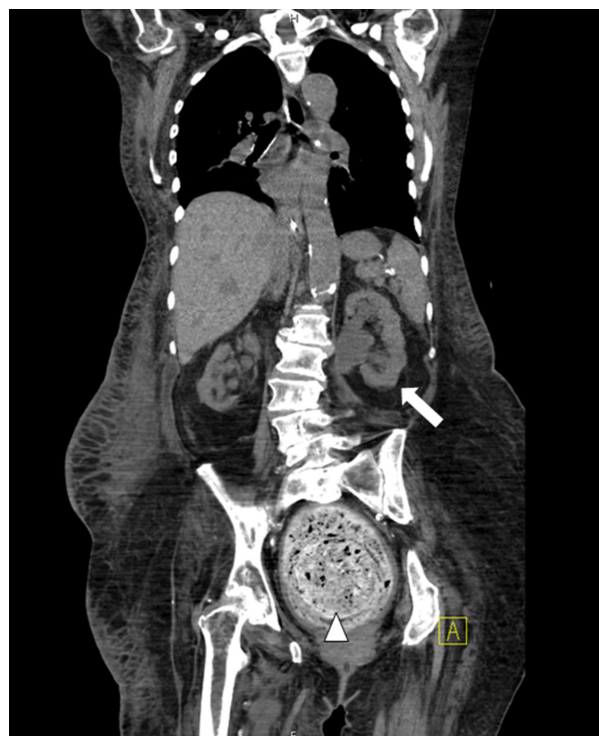


Figure 1. Noncontrast CT abdomen/pelvis, coronal view. Rectal fecalith (14 cm; triangular arrow) with subsequent compression of the ureters and resulting bilateral hydronephrosis and hydroureter (white arrow).

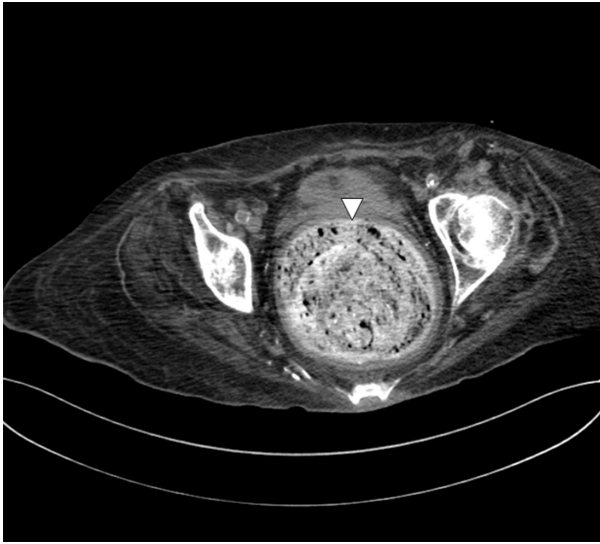


Figure 2. Transverse view of large, rectal fecalith (triangular arrow).

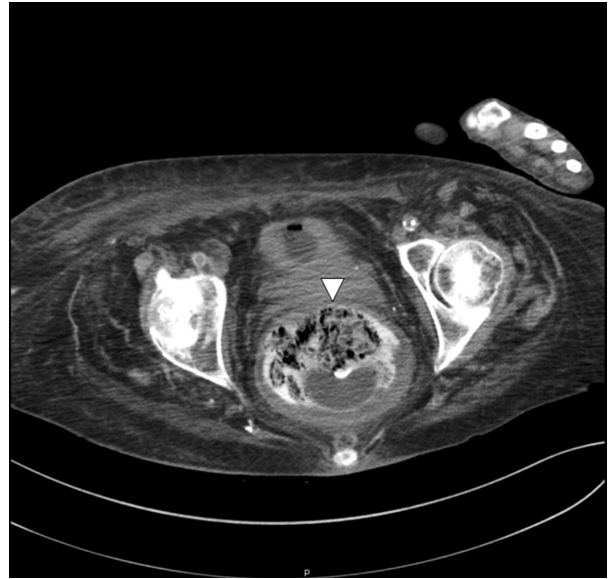


Figure 4. Transverse view of resolving rectal fecalith (triangular arrow).

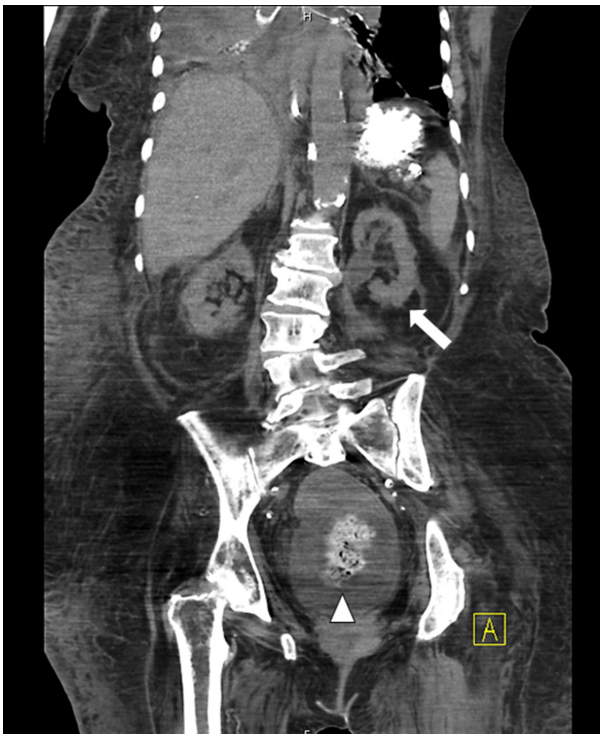


Figure 3. Noncontrast CT abdomen/pelvis, coronal view. Postdisimpaction and aggressive medical management. There is interval decrease in size of the rectal fecalith to 4 cm (white arrow) with persistent hydronephrosis and hydroureter (triangular arrow).

Consent Confirmation

Consent was obtained from the patient for publication of case details.

Conflict of Interest

None declared.

Authorship

AK: Contributed to write the case and identify the images. MK: Contributed to write the case and identify the images. RM: Reviewed and edited the case report and helped in identifying appropriate images. AK: Reviewed and edited the case report and helped in identifying appropriate images.