

Systematic Review: Management Strategies for Keratinising Desquamative Squamous Metaplasia in the Bladder

BACKGROUND:

- Keratinising Desquamative Squamous Metaplasia (KDSM) of the bladder is a rare benign condition where the normal urothelial lining is replaced by keratinized squamous epithelium [1].
- Mimics bladder cancer clinically and cystoscopically, leading to potential misdiagnosis.
- No standardized treatment guidelines, due to its rarity. Although generally benign, it may recur or, in rare cases, progress to squamous cell carcinoma [2].

AIM:

Systematically review diagnostic and therapeutic strategies for KDSM and evaluate long-term outcomes.

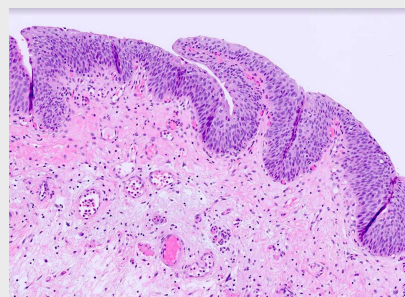


Figure 1: normal bladder epithelium [3]

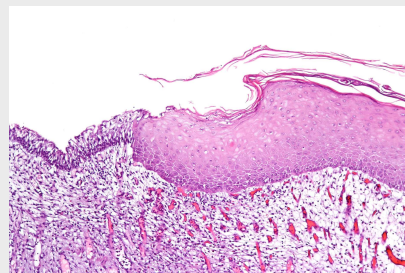


Figure 2: KDSM of the urinary bladder [3]

METHODOLOGY:

- Databases searched: PubMed, Scopus, and Cochrane
- Inclusion criteria: Inclusion criteria: histologically confirmed KDSM, management details, follow-up data
- Data extracted: demographics, symptoms, diagnostics, treatment & recurrence rates.

RESULTS:

- Most common symptoms: haematuria, dysuria, frequency
- Treatment: Conservative management in 75%, Surgical resection for symptomatic/recurrent cases
- Outcomes: Recurrence rates 9-13%

DISCUSSION:

- Management remains variable; no standard protocol
- Conservative management effective in majority. Surgery reserved for persistent/recurrent symptoms
- Need for regular follow-up due to recurrence & rare malignant transformation

RECCOMENDATIONS

Prospective studies required to develop guidelines and better understand clinical course

REFERENCES:

1. Ganeshappa, A., Krambeck, A., Grignon, D. and Lingeman, J., 2009. Endoscopic management of keratinizing desquamative squamous metaplasia of the upper urinary tract: a case report and review of the literature. *Journal of Endourology*, 23(9), pp.1513–1517.
2. Borofsky, M., Shah, R. and Wolf, J.S. Jr., 2009. Nephron-sparing diagnosis and management of renal keratinizing desquamative squamous metaplasia. *Journal of Endourology*, 23(9), pp.1519–1523.
3. Wikimedia Commons contributors (2024) *File: Keratinizing squamous metaplasia of the urinary bladder, intermed. mag.jpg*. Wikimedia Commons. Last updated: 25 December 2024, 19:29 UTC. Available at: https://commons.wikimedia.org/w/index.php?title=File:Keratinizing_squamous_metaplasia_of_the_urinary_bladder,_intermed._mag.jpg&oldid=975568085

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