

Letters To the Editor

Microscopic haematuria: a practical guide for GPs

DEAR EDITOR: Thank you to Dr Catherine Zheng and Dr Kieran Muir, authors of 'Microscopic haematuria: a practical guide for GPs' published in the December 2025 issue of *Medicine Today*, for their review of the 2025 American Urological Association (AUA) and Society of Urodynamics, Female Pelvic Medicine & Urogenital Reconstruction (SUFU) guidelines on microhaematuria.¹ I would like to draw attention to a few discrepancies between their review and the 2025 AUA/SUFU guidelines.

- The investigation strategy recommends all patients with microscopic haematuria undergo urine cytology without risk stratification, whereas the AUA/SUFU guidelines state: 'While data now exist to support consideration in intermediate-risk populations, use of... cytology in low- and high-risk groups is not supported at this time'.¹
- All low-risk patients are recommended to undergo renal ultrasound. The 2025 guidelines do not recommend imaging in low-risk patients, given a cancer incidence of 0 to 0.4%: 'In low/negligible-risk patients with microhematuria, clinicians should obtain repeat urinalysis within six months rather than perform immediate cystoscopy or imaging [...] Evidence Level: Grade C'.¹⁻⁴ If the repeat urine sample is positive, the patient is reclassified as 'intermediate risk' and investigated accordingly.
- Furthermore, the authors recommend that low-risk patients should undergo repeat urine microscopy within six months (consistent with the AUA/SUFU guidelines) but then they recommend another urine microscopy six months later, which is not a part of the AUA/SUFU guidelines.

I invite comment from the authors regarding the above discrepancies, and would be interested to review the evidence underpinning their recommendation and expert opinion.

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Dr Sahni is a GP in Sydney; and a Lecturer in the Department of Anatomy, School of Biomedical Sciences at UNSW, Sydney, NSW.

References

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COMPETING INTERESTS: None.

REPLY: Thank you to Dr Varun Sahni for reading our article and providing your reply. You are absolutely correct about a discrepancy in the flowchart and communication around urine cytology use, which needs correction.¹

First, our discussion on the investigation strategy was an oversight on our behalf, and we appreciate you bringing it to our attention. The flowchart should have more clearly indicated that urine cytology is recommended for patients who wish to pursue a reduced-intervention pathway after

a discussion of the risks and benefits. In simplifying urine testing into a single process, we have not adequately reflected the guideline details. Urine cytology does not replace cystoscopy in intermediate- or high-risk patients but can be a part of a patient's journey. It should not be performed reflexively for all patients with microscopic haematuria. We will request that the article be updated to clarify this point.

Second, our intention was for renal tract ultrasound to only be considered in low-risk groups. The absolute statement to 'avoid renal tract imaging' in low-risk patients may not adequately capture clinical nuance; therefore, individual patient context and clinician judgement remained central to decision-making. In the flowchart, we deliberately used the wording 'consider renal tract ultrasound' to reflect this flexibility. Similarly, in Step 5 ('Consider imaging'), the statement that 'renal tract ultrasound is radiation-free, can detect most renal masses ≥ 2 cm, and is recommended for low- and intermediate-risk cohorts' was intended to convey that, where imaging is pursued in this cohort, ultrasound is a sufficient initial modality. We acknowledge that patients with a persistently positive repeat urine test at six months are reclassified into the intermediate-risk cohort and should therefore undergo referral with renal imaging. Reclassification was not explored in detail within the article to simplify the process.

Third, your point on the timing of urine microscopy highlights another important consideration. Urine microscopy is inherently error-prone, from the collection process through to laboratory testing. We highlighted this with our statement: 'It is important that urine samples are collected as a clean-catch, midstream, mid-morning sample, and analysed within 90 minutes (or refrigerated immediately by the patient or laboratory, if this is not possible)'. Although the AUA/SUFU guidelines do recommend a single, repeat test at six months with no further testing if this becomes negative, our recommendation was to perform a second, repeat test at 12 months. This approach was intended to reduce the risk of false-negative results due to pre-analytical errors. There is no randomised controlled trial-level evidence to guide surveillance urine microscopy for early disease detection. However, it is recognised that low-risk patients who have persistent microscopic haematuria have higher rates of malignancy, hence justifying further testing. Therefore, our preference and recommendation is that repeat urine testing is performed to confirm microscopic haematuria does not occur on two separate samples with six-month intervals.

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References

1. Zheng C, Muir K. Microscopic haematuria: a practical guide for GPs. *Medicine Today* 2025; 26(12): 20-25.

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