

Point of Care Patient-Side Kidney Testing

Enabling critical decision making at the point of care



Caring for those with diabetes

Diabetes is a multifaceted disease.¹ Successful management requires patients to create new habits around medication adherence, changing their diets, exercise, and other lifestyle changes. **Only 1 in 4 adults with diagnosed diabetes have been shown to achieve combined diabetes goals.**¹

You are central to their success which requires utilizing creative and collaborative strategies to help them manage their disease.¹

Point-of-care testing (POCT) can help overcome some obstacles.



Caring for their kidneys

Approximately **1 in 3 adults with diabetes has chronic kidney disease (CKD).**²

You already know diabetes is a kidney-buster for patients with diabetes.

Did you know that...

There are two markers for CKD that should be assessed every year in at-risk patients but only **21%** get both recommended tests.³ Estimated glomerular filtration rate (eGFR) uses serum creatinine to measure kidney function.³ Urine albumin-to-creatinine ratio (uACR) tests for albuminuria, indicating kidney damage.

ADA/KDIGO guidelines

Guidelines recommend yearly testing for **both markers** in anyone at-risk.^{4,5} The American Diabetes Association (ADA) and the Kidney Disease: Improving Global Outcomes (KDIGO) organization recommend assessment of uACR and eGFR in patients with type 1 diabetes (T1D) with a duration of **≥ 5 years**, in all patients with type 2 diabetes (T2D), and in all patients with comorbid hypertension at least once a year.^{4,5}

Diagnostic criteria for CKD⁴⁻⁵

Impaired Kidney Function
eGFR: < 60 mL/min/1.73 m²
uACR: ≥ 30 mg/g for > 3 months

Annual Assessment

- Type 1 diabetes with a duration of > 5 years
- All patients with type 2 diabetes
- All patients with comorbid hypertension

eGFR may be normal in stage 1 or 2 kidney disease so both tests should be used to assess kidney function in anyone at risk.⁴⁻⁶ A uACR ≥ 30 mg/g indicates kidney damage, even without an elevated eGFR.⁴⁻⁶

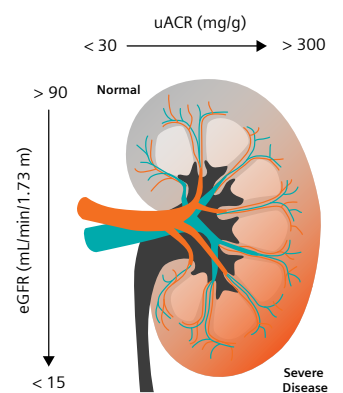
Compliance may be improved by using POCT uACR⁷

Although the 24-hour collection has been the “gold standard” for uACR, spot POCT uACR correlates well with 24-hour collection results in adults.⁶ uACR tests measure albumin and creatinine in a one-time “spot” urine sample. Because daily creatinine production is consistent, this ratio test is an alternative method to a 24-hour urine sample for the measurement of albuminuria.^{6,9}

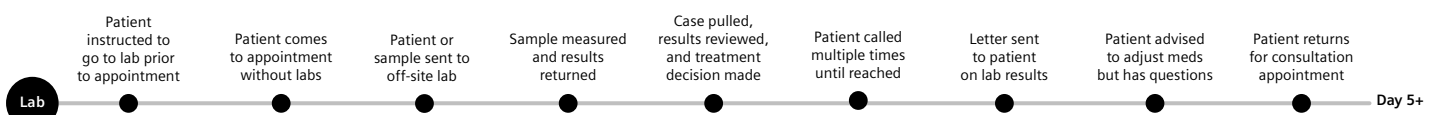
With moderate complexity or CLIA-waived POCT uACR, patients can be tested during the same

appointment. They don’t need a separate lab appointment, they don’t need to collect urine at home, and results are available immediately. uACR is a key indicator of microalbuminuria, the first stage of kidney failure in patients with diabetes.¹⁰

Assessing your patients yearly can catch the early signs of kidney disease before eGFR is elevated, providing a key window for patient education, counseling, and treatment to slow or stop progression of chronic kidney disease.¹¹

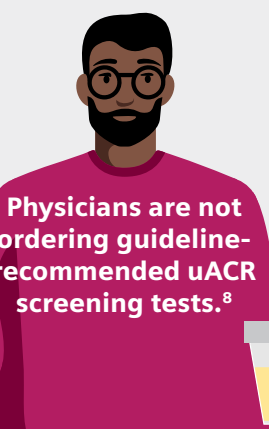


Don't lose patients to follow-up.



*Patients with diabetes require an annual kidney health evaluation that includes a quantitative uACR test and eGFR.⁴ These tests are not CLIA-waived. Patients with all other risk factors for kidney disease can be screened with a CLIA-waived, semi-quantitative kidney function test.

Reasons patients are not getting uACR tests:



Physicians are not ordering guideline-recommended uACR screening tests.⁸

Ordering rates may be low because **uACR isn't part of a standard blood lab panel** like eGFR and serum creatinine.⁷

Outpatient facilities may not have a standard protocol for urine collection.⁷



Patients **don't understand** the reason for the test.⁷



Morning collections are difficult for patients with **afternoon** appointments.⁷

Urine collection is inconvenient for patients at home, particularly **24-hour samples.**⁷

Sources

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POINT OF CARE TESTING UNIVERSITY

Educational support provided by Siemens Healthineers.

All information is for education only and is not intended to be relied upon by the reader for instruction as to the practice of medicine.

Any healthcare practitioner reading this information is reminded that they must use their learning, training, and expertise in dealing with their individual patients.