

## CKD Screening

Continued from cover

radically in the intervening decade with the advent of efficacious new medications, several experts told *Kidney News*.

“We have many more effective tools than we did in 2012,” said Frank “Chip” Brosius, MD, a professor in the Division of Nephrology at the University of Arizona in Tucson. “Back in 2012, essentially all we had was blood pressure control, good blood sugar control in those that have diabetes, and then either an ACE [angiotensin-converting enzyme] inhibitor or angiotensin-receptor blocker in at least some of the CKD patients. Now we have these newer classes of medications that were brought out 15 years ago as diabetes drugs.”

Sodium glucose co-transporter 2 (SGLT2) inhibitors and glucagon-like peptide 1 (GLP-1) receptor agonists were once considered niche drugs, but they gained widespread acceptance when “the cardiovascular outcome studies that included kidney endpoints started coming out about 6 years ago. It became clear that at least these two classes of medications had pretty profound cardiovascular protection for chronic kidney disease patients and also had positive effects on preserving kidney function,” Brosius said.

### Two common tests

The request letter from the coalition also notes that CKD screening is practical because it can be implemented by a pri-

mary care clinician using two readily available tests: estimated glomerular filtration rate based on serum creatinine and urine albumin-creatinine ratio. NKF’s Godwin said a USPSTF recommendation would be significant because many primary care physicians look to it for guidance.

Brosius agreed that if the USPSTF includes CKD screening in its recommendations, then primary care physicians will be more cognizant of its importance and pay more attention to the potential consequences. Serum creatinine is part of the standard testing panel that patients undergo for many primary care visits—including annual physicals—but too often, abnormal results are ignored. “The doctor doesn’t recognize it or doesn’t recognize its importance and doesn’t tell the patient,” Brosius said. Similarly, obtaining “an albumin-creatinine ratio in the urine just doesn’t happen at anywhere near the level that it should,” he said.

A screening recommendation would raise the awareness among primary care physicians to pay more attention to these tests, Brosius said, with the potential benefit of beginning early intervention while the condition is more manageable. “Despite being preventable and treatable, CKD is too often not intensively managed until a patient has progressed to kidney failure,” the coalition letter notes. “An estimated 37 million Americans have CKD, and the vast majority are unaware.”

In the 10 years since the 2012 decision, rates of kidney diseases have continued to grow in tandem with the greatly rising rates of diabetes. CKD has grown to become the ninth leading cause of death in the United States.

### Countering racial inequities

Another aspect of medicine that has changed drastically since 2012 is the recognition of systemic racial inequity and the resolve to take action to combat it, particularly in the kidney community, according to David L. White, regulatory and quality officer at the American Society of Nephrology. Increased screening would help to address inequity, because Americans of Black race are significantly more likely than those who are White to have diabetes—the leading cause of CKD—as well as more likely to experience its downstream consequences, including kidney failure and death.

The agreement by USPSTF to consider screening for CKD is the first step in a well-defined and exhaustive process. “[It is] a highly evidence-based body and really process oriented,” Godwin said. “There are public review periods with opportunities for public comment.” The Coalition for Kidney Health and other organizations will ensure that nephrologists are well represented in the review process, Godwin said.

“The absence of a current CKD screening recommendation exacerbates the lack of attention paid to the growing kidney disease public health crisis and contributes to the low rates of CKD diagnosis in the primary care setting,” the coalition letter notes. It continues, “We believe that the opportunity to improve outcomes for CKD patients warrants a CKD screening recommendation for patients at high risk of CKD.” ■

## ASN President’s Update Close the Gap— Time for a Kidney Health Check

By Susan E. Quaggin



“Doc, I was told I have stage 5 kidney disease. What happened to stages 1 through 4?”

Almost every nephrologist, including myself, has had this heartbreaking and far too common question asked of them by patients receiving their diagnosis of kidney disease for the first time. Even worse: A patient first learns about kidney function coincident with placement of a catheter to initiate urgent dialysis.

Not surprisingly, these diagnoses trigger a mixture of emotions: fear, anxiety, disbelief . . . anger. It is time we do better.

The first diagnosis of kidney disease as kidney failure is truly a failure—of the system. It should come as no surprise that underserved communities with lack of access to health care services and timely intervention are vastly over-represented in this category.

One decade ago, the US Preventive Services Task Force (USPSTF) reviewed the literature and current knowledge available (at that time) to support population-based screening for chronic kidney disease (CKD). In its summary statement, the task force concluded that no data existed to support a recommendation that intervening early in CKD is beneficial (1).

In 2013, the American College of Physicians (ACP) published its guidelines on screening for kidney diseases in the *Annals of Internal Medicine*, advising against testing for proteinuria in adults with or without diabetes who are currently taking an angiotensin-converting enzyme inhibitor (ACEi) or

an angiotensin II receptor blocker (ARB) (2). Bruce A. Molitoris, MD, FASN, ASN president at the time, responded with an article highlighting the potential dangers, weaknesses, and risks inherent in the recommendations by ACP (3).

Ten years later, in February 2022, USPSTF added “Screening for CKD” to the list of preventive services topics under “active consideration” following nomination and wide support from ASN, the National Kidney Foundation (NKF), other members of the kidney community, and members of Congress (4). Although the task force’s decision to re-evaluate its decade-old finding is a hopeful advance for patients and the community, there is no guarantee that CKD screening will be prioritized this year. In its response letter, the task force acknowledged that kidney diseases are a serious public health issue and emphasized that kidney diseases disproportionately affect communities of color but did not indicate a timeline for reconsidering its position.

It is important to recognize that several members of the kidney community have argued against screening of asymptomatic patients, citing studies that identifying CKD does not alter management of patients as long as blood pressure and glucose are controlled (5). Of course, these studies report on those lucky enough—no, *those privileged enough*—to have access to health care when they received their diagnoses of hypertension or diabetes and who were lucky and privileged enough to receive appropriate treatments. As outlined in the KDIGO (Kidney Disease: Improving Global Outcomes) report, which makes the case for CKD screening in at-risk individuals, the authors point out that the burden of CKD falls on the socially disadvantaged and vulnerable (6).

Furthermore, the studies that do not support screening predate the overwhelming and numerous positive clinical trials demonstrating the power of “flosins” (sodium glucose co-transporter 2 inhibitors [SGLT2i]) to prevent mortality, kidney function decline, and cardiovascular disease in people with kidney diseases, regardless of whether the patient has diabetes (see EMPA-REG and CREDENCE trials) (7). In fact, data from the DAPA-CKD trial were so spectacular that the US Food and Drug Administration (FDA) granted breakthrough status for the use of this SGLT2i in patients with CKD, with or without diabetes—the first time ever for a kidney-targeted therapy. Recently, the flosins have been joined by additional classes of medications, including the nonsteroidal mineralocorticoid receptor antagonists and glucagon-like peptide 1 (GLP1) agonists, which have been added to the ever-growing menu of beneficial kidney treatments (see FIDELIO trial) (Figure 1).

Indeed, the ACP guidelines that recommended against screening for proteinuria in patients with diabetes and CKD (i.e., diabetic kidney disease [DKD]) contradict more current guidelines from the American Diabetes Association and KDIGO, which recommend SGLT2i and/or finerenone for patients with proteinuria on therapeutic renin-angiotensin system (RAS) blockade. (Please note that ACP’s guidelines expired after 10 years and are no longer in effect.) The outdated belief that “early identification of CKD is pointless because we have no therapies” no longer applies.

That is not to say screening of the general population—particularly low-risk individuals—is automatically warranted or that the importance of having USPSTF revisit the issue should be discounted. However, it is hard to imagine that screening the one in three Americans at risk of kidney diseases—so-called “case finding”—is not warranted. The use of creatinine in combination with urine albumin (uACR) measurement in patients at risk formed the basis of the request to USPSTF by ASN, NKF, other members of the kidney community, and members of Congress.

In the United States, a majority of “crash starts” for dialysis in hospitals occur in patients from underserved communities, where social and political determinants of health determine who has access to care and to treatments that can protect the kidneys and save lives. The failure to detect kidney diseases in these populations is yet one more example of pervasive racism in the health care system. How can we do better?

In Canada, the Can-SOLVE CKD Network launched a program to promote kidney health in First Nations communities (8). Kidney Check provides point-of-care testing for kidney function (creatinine and urine protein), hypertension, and diabetes. Built on the central symbol of *Meyayawin* (getting better), the project is guided by an Elder, with truth and reconciliation recommendations, a diverse and inclusive team, and shared concepts, such as Two-Eyed Seeing, which recognizes that Indigenous and Western knowledge can exist in parallel (9). A single finger-prick blood sample and urine protein analysis on-site provide real-time results and a kidney health plan, tailored to the patient’s needs (10).

Similar to at-risk communities in the United States, the First Nations communities are at higher risk of kidney diseases and kidney failure than the general population. In both Canada and the United States, one in every 10 people is estimated to have kidney diseases, whereas in Canadian First Nations communities, that number increases to one in three. In the United States, individuals of Black race or African Americans are almost four times more likely to develop kid-

ney failure than Americans of White race, even though their CKD prevalence is not higher overall—an unacceptable statistic (11).

### What concrete steps can we take?

1 We must impel change to current screening recommendations for kidney diseases and kidney health in light of the powerful, new therapies that can dramatically slow progression of kidney diseases and the recognition that we are likely to see increased burden of CKD post-COVID.

Why limit screening to the identification of kidney diseases? Instead, why not pivot the messaging to “screening for kidney health”? International Society of Nephrology Past-President Adeera Levin, MD, points out that knowing you have healthy kidneys can provide peace of mind while expanding the eligible pool of living donors to help address the desperate need for kidneys. Why should knowing the status of your kidney health be any different than knowing your other numbers, such as glucose, lipids, and blood pressure? Isn't it time to take a stand that kidney health matters?

Even though the timeline for this year's USPSTF CKD screening consideration is not clear, we need your voice and your support to request recommendations are revisited and prioritized this year. You can request to be put on the USPSTF mailing list for updates (see <https://www.uspreventiveservicestaskforce.org/uspstf/email-updates>). You can suggest individuals for nomination to serve on the task force (see <https://www.ahrq.gov/cpi/about/otherwebsites/uspstf/nominate.html>). And, as we wait for a national recommendation, you can continue to educate, raise awareness, learn about, and implement the new therapies and spread the concept of kidney health. If you have ideas about how to amplify the message, please email them to me at [president@asn-online](mailto:president@asn-online).

2 We must better serve patients, physicians, and other health professionals by providing transparent, consistent, and up-to-date guidance that will improve kidney health.

Current guidelines and recommendations do not effectively address kidney health today, and updated guidelines are urgently needed for primary care physicians. For more than three decades, overwhelming evidence demonstrates that an ACEi or ARB slows progression of kidney diseases, yet only 25%–40% of patients who should be receiving these therapies are receiving them (12, 13). As recently as 2016–2019, only 10%–40% of patients with diabetes are even checked for albuminuria, an essential element for risk stratification and therapeutic selection (12, 14). In light of these statistics, it should come as no surprise that in the period from 2000 to 2019, the number of end stage kidney disease (ESKD) cases reported in the United States increased 41.8% (15). Effective management of diabetes and hypertension, including kidney disease testing and management as part of diabetes care in at-risk populations, will prevent ESKD.

A strong, overarching, and clear recommendation for kidney disease screening that focuses specifically on the kidneys—that is inclusive of all patients at risk—would send a strong message that kidney health for all matters. This focus would help push primary care organizations and the professionals they represent to revisit their guidelines, which is key to reach those who must intervene early. This step is essential for implementation of new therapies, because we know many patients with kidney diseases have multiple indications, such as heart failure or proteinuria.

Patrick O. Gee, Jr., PhD, a patient advocate and member of the ASN Diabetic Kidney Disease Collaborative, provides a compelling case to explain why kidney health must be elevated and screening at-risk patients prioritized: “I was diagnosed with diabetes and managed by an endocrinologist, receiving a diagnosis of stage 3b CKD 10 years in. Shockingly, in that 10-year period since my diabetes diagnosis, I was never told diabetes is the leading cause of kidney failure. I started peritoneal dialysis later that year.” This unacceptable outcome underscores why the inclusion of kidney screening recommendations that are siloed and placed within recommendations for the management of other diseases is not enough and inadvertently harms patients. Missing an opportunity to in-

tervene early will lead to lives and kidneys lost.

3 We must eliminate health injustice.

We must advocate for health care justice throughout our society and within our institutions. To accomplish this goal, we must apply advanced technologies and pursue partnerships with community leaders to create equitable kidney care and reimagine kidney screening and education. The Canadian-led Kidney Check project is one example that might be adapted in other at-risk communities throughout North America.

In the United States, it is encouraging to note the Indian Health Service (IHS) has bettered the national average by dedicating resources for intervention and implementation. IHS has optimized protective kidney treatments, with an estimated 80% of patients with DKD receiving standard of care with an ACEi or ARB compared with only 25%–40% nationally (16).

As kidney professionals, as a medical specialty society, and as a profession, we must pledge to be accountable and work tirelessly to effect change. We must help everyone understand the increased incidence of kidney diseases, reduce late or missed diagnoses, and improve access to the best treatments for all who can benefit. Our community must act now to reduce preventable deaths, chronic illness, and severe disability.

**We are a specialty that now has the power to prevent kidney failure and premature death. We are a specialty that now has the power to reverse unacceptable disparities in care. It is time to act.**

The kidney revolution has begun. ■

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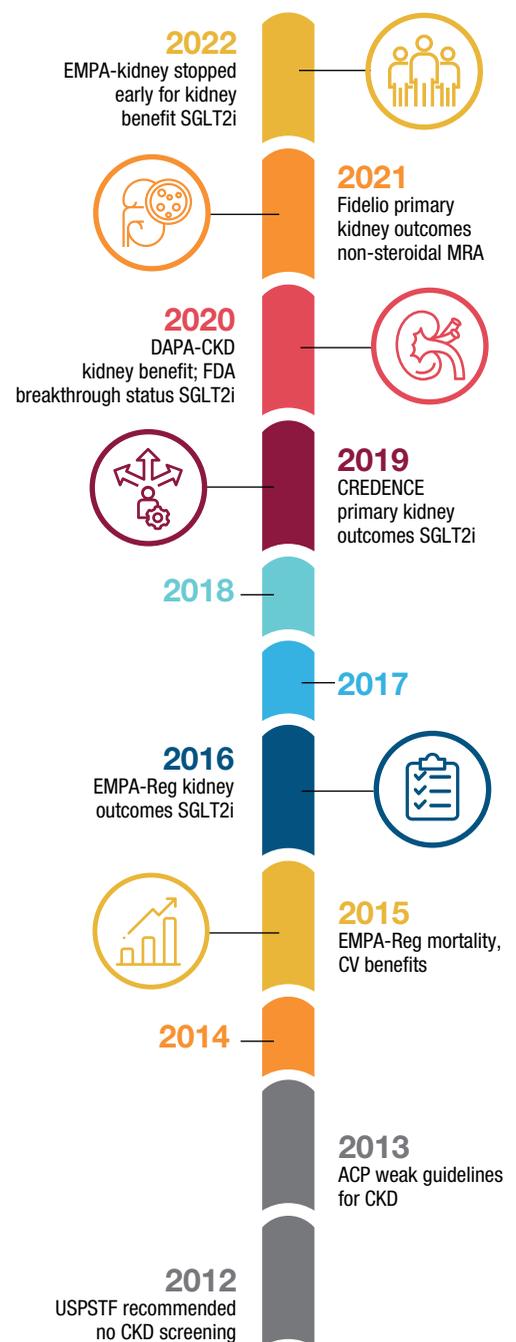
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**Figure 1. Timeline: Options for managing chronic kidney disease**



Positive clinical trials (colors) that impact CKD management since the USPSTF last statement on screening for CKD and ACP guidelines on screening for kidney diseases (gray). CV, cardiovascular; MRA, mineralocorticoid receptor antagonist.