Masked hypertension in kidney disease patients may affect kidney and cardiovascular health
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Many patients with chronic kidney disease (CKD) have hypertension that is not detected in the clinic, and such 'masked' hypertension is linked with increased risks of kidney, heart, and vascular damage. The findings come from a large study appearing in an upcoming issue of the Clinical Journal of the American Society of Nephrology (CJASN).

Many studies have shown that rather than taking traditional blood pressure measurements in the clinic, measuring blood pressure outside the clinic is a better way to assess patients' risks for hypertension-related health problems. Most of these studies were conducted in patients with normal kidney function.

To look at the issue in patients with CKD, Paul Drawz, MD, MHS, MS (University of Minnesota) and his colleagues studied 1492 men and women with CKD who were enrolled in the Chronic Renal Insufficiency Cohort (CRIC) Study.

The team found that nearly 28% of participants had masked hypertension, meaning that their blood pressure was normal in a clinician's office but was elevated outside the clinic. Elevated blood pressure outside the clinic was a risk factor for kidney, heart, and vascular damage regardless of whether the clinic blood pressure was normal or elevated.

"Our findings support the recommendations that patients check their blood pressure outside the usual doctor's office setting, either by 24-hour blood pressure monitoring as done in our study, or by monitoring blood pressure at home," said Dr. Drawz. "Of course, patients should discuss their blood pressure and its treatment with their doctor."

The CRIC Study was established in 2001 by the National Institute of Diabetes, Digestive, and Kidney Diseases to improve the understanding of CKD and related cardiovascular illness. The CRIC Study initially enrolled more than 3939 people with CKD who remain in long-term follow-up. Between July 2013 and August 2015, an additional 1560 people with CKD were invited to join the study with an emphasis on older Americans. Follow-up of study participants continues at 13 CRIC Study Centers.

More information: The article, entitled "Masked Hypertension and Elevated Nighttime Blood Pressure in CKD: Prevalence and Association with Target Organ Damage," will appear online on February 18, 2016. DOI: 10.2215/CJN.08530815

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