Supplemental Table 1. Multivariable Cox proportional hazards models for the relationship between non-dipping and progression to kidney failure in the overall CKiD cohort.

	Hazard Ratio (95% CI)	p-value
Non-dipping status (vs. Dipping)	1.08 (0.77, 1.51)	0.65
24-hour mean systolic BP (per 10 mmHg)	0.95 (0.72, 1.24)	0.69
Age (per year)	1.11 (1.06, 1.17)	<0.001
Female	0.65 (0.45, 0.93)	0.02
Black	2.19 (1.36, 3.51)	0.001
Glomerular Disease	1.73 (1.14, 2.62)	0.01
BMI z-score	0.99 (0.86, 1.14)	0.92
ACE inhibitor use	1.05 (0.73, 1.52)	0.78
Baseline Iohexol GFR (per ml/min/1.73 m^2)	0.93 (0.92, 0.94)	<0.001
Baseline UPCR (per mg/mg)	1.29 (1.18, 1.41)	<0.001
24 hour mean systolic BP * Time	1.01 (1.0, 1.02)	0.01

Abbreviations: ESKD, end-stage kidney disease; CI, confidence interval; BP, blood pressure; BMI, body mass index; ACE, angiotensin converting enzyme; GFR, glomerular filtration rate; UPCR, urine protein/creatinine ratio (mg/mg).

Supplemental Table 2. Multivariable Cox proportional hazards models for the relationship between systolic and diastolic dipping (%) and progression to kidney failure.

	Hazard Ratio (95% CI)	p-value
Systolic Dipping (%)	1.01 (0.98, 1.04)	0.63
24-hour mean systolic BP (per 10 mmHg)	0.95 (0.72, 1.26)	0.72
Age (per year)	1.11 (1.06, 1.17)	<0.001
Female	0.66 (0.46, 0.96)	0.03
Black	2.25 (1.39, 3.62)	<0.001
Glomerular Disease	1.74 (1.15, 2.63)	0.01
BMI z-score	0.99 (0.86, 1.14)	0.87
ACE inhibitor use	1.03 (0.72, 1.49)	0.86
Baseline Iohexol GFR (per ml/min/1.73 m^2)	0.93 (0.92, 0.94)	<0.001
Baseline UPCR (per mg/mg)	1.29 (1.18, 1.41)	<0.001
24 hour mean systolic BP * Time	1.01 (1.0, 1.02)	0.01
Diastolic Dipping (%)	1.00 (0.98, 1.02)	0.93
24-hour mean systolic BP (per 10 mmHg)	0.94 (0.72, 1.24)	0.69
Age (per year)	1.11 (1.06, 1.17)	<0.001

Female	0.65 (0.45, 0.94)	0.02
Black	2.20 (1.37, 3.54)	0.001
Glomerular Disease	1.74 (1.15, 2.64)	0.01
BMI z-score	0.99 (0.86, 1.14)	0.92
ACE inhibitor use	1.04 (0.73, 1.50)	0.82
Baseline Iohexol GFR (per ml/min/1.73 m^2)	0.93 (0.92, 0.94)	<0.001
Baseline UPCR (per mg/mg)	1.29 (1.18, 1.41)	<0.001
24 hour mean systolic BP * Time	1.01 (1.0, 1.02)	0.01

Abbreviations: ESKD, end-stage kidney disease; CI, confidence interval; BP, blood pressure; BMI, body mass index; ACE, angiotensin converting enzyme; GFR, glomerular filtration rate; UPCR, urine protein/creatinine ratio (mg/mg).

Supplemental Table 3. Multivariable Cox proportional hazards models for the relationship between serial dipping status and progression to kidney failure in the overall CKiD cohort (N=198).

	Hazard Ratio (95% CI)	p-value
Non-dipper twice vs. never non-dipper	1.15 (0.52, 2.50)	0.73
Non-dipper once vs. never non-dipper	1.30 (0.55, 3.06)	0.56
24-hour mean systolic BP (per 10 mmHg)	1.48 (1.02, 2.14)	0.04
Age (per year)	1.12 (1.01, 1.24)	0.03
Female	0.64 (0.32, 1.27)	0.20
Black	3.08 (1.08, 8.84)	0.04
Glomerular Disease	1.75 (0.71, 4.33)	0.23
BMI z-score	1.11 (0.83, 1.48)	0.50
ACE inhibitor use	1.00 (0.51, 1.95)	0.99
Baseline Iohexol GFR (per ml/min/1.73 m^2)	0.94 (0.91, 0.96)	<0.001
Baseline UPCR (per mg/mg)	2.79 (1.62, 4.81)	<0.001

Abbreviations: ESKD, end-stage kidney disease; CI, confidence interval; BP, blood pressure; BMI, body mass index; ACE, angiotensin converting enzyme; GFR, glomerular filtration rate; UPCR, urine protein/creatinine ratio (mg/mg).

STROBE Statement—Checklist of items that should be included in reports of ***cohort studies***

	Item No	Recommendation	Page No
Title and abstract	1	(*a*) Indicate the study's design with a commonly used term in the title or the abstract	1
		(*b*) Provide in the abstract an informative and balanced summary of what was done and what was found	3
Introduction			
Background/rationale	2	Explain the scientific background and rationale for the investigation being reported	4
Objectives	3	State specific objectives, including any prespecified hypotheses	4
Methods			
Study design	4	Present key elements of study design early in the paper	4-5
Setting	5	Describe the setting, locations, and relevant dates, including periods of recruitment, exposure, follow-up, and data collection	5
Participants	6	(*a*) Give the eligibility criteria, and the sources and methods of selection of participants. Describe methods of follow-up	5
		(*b*) For matched studies, give matching criteria and number of exposed and unexposed	NA
Variables	7	Clearly define all outcomes, exposures, predictors, potential confounders, and effect modifiers. Give diagnostic criteria, if applicable	5-6
Data sources/ measurement	8*	For each variable of interest, give sources of data and details of methods of assessment (measurement). Describe comparability of assessment methods if there is more than one group	5-6
Bias	9	Describe any efforts to address potential sources of bias	
Study size	10	Explain how the study size was arrived at	4 (ancillary study, post hoc)
Quantitative variables	11	Explain how quantitative variables were handled in the analyses. If applicable, describe which groupings were chosen and why	6
Statistical methods	12	(*a*) Describe all statistical methods, including those used to control for confounding	6-8
		(*b*) Describe any methods used to examine subgroups and interactions	7
		(*c*) Explain how missing data were addressed	Each analysis excludes those with missing covariates and as such, each table has (N=***) to reflect.
		(*d*) If applicable, explain how loss to follow-up was addressed	6
		(*e*) Describe any sensitivity analyses	NA
Results			

Participants	13*	(a) Report numbers of individuals at each stage of study—eg numbers potentially eligible, examined for eligibility, confirmed eligible, included in the study, completing follow-up, and analysed	5
		(b) Give reasons for non-participation at each stage	NA
		(c) Consider use of a flow diagram	
Descriptive data	14*	(a) Give characteristics of study participants (eg demographic, clinical, social) and information on exposures and potential confounders	14-15
		(b) Indicate number of participants with missing data for each variable of interest	8
		(c) Summarise follow-up time (eg, average and total amount)	8
Outcome data	15*	Report numbers of outcome events or summary measures over time	8

Main results	16	(*a*) Give unadjusted estimates and, if applicable, confounder-adjusted estimates and their precision (eg, 95% confidence interval). Make clear which confounders were adjusted for and why they were included (*b*) Report category boundaries when continuous variables were categorized (*c*) If relevant, consider translating estimates of relative risk into absolute risk for a meaningful time period	8-9
Other analyses	17	Report other analyses done—eg analyses of subgroups and interactions, and sensitivity analyses	8-9
Discussion			
Key results	18	Summarise key results with reference to study objectives	9-10
Limitations	19	Discuss limitations of the study, taking into account sources of potential bias or imprecision. Discuss both direction and magnitude of any potential bias	11-12
Interpretation	20	Give a cautious overall interpretation of results considering objectives, limitations, multiplicity of analyses, results from similar studies, and other relevant evidence	12
Generalisability	21	Discuss the generalisability (external validity) of the study results	12
Other information			
Funding	22	Give the source of funding and the role of the funders for the present study and, if applicable, for the original study on which the present article is based	12

*Give information separately for exposed and unexposed groups.

Note: An Explanation and Elaboration article discusses each checklist item and gives methodological background and published examples of transparent reporting. The STROBE checklist is best used in conjunction with this article (freely available on the Web sites of PLoS Medicine at http://www.plosmedicine.org/, Annals of Internal Medicine at http://www.annals.org/, and Epidemiology at http://www.epidem.com/). Information on the STROBE Initiative is available at http://www.strobe-statement.org.