

Table S1. Calculations, formulas, and SAS keywords for analysis*

Metal	Calculations and formulas
Uranium (ng/g creatinine)	$\log((\text{URXUCD}/\text{URXUCR}) * 100000)$
Cadmium(ng/g creatinine)	$\log((\text{URXUPB}/\text{URXUCR}) * 100000)$
Lead(ng/g creatinine)	$\log((\text{URXUUR}/\text{URXUCR}) * 100000)$
	SAS Keyword
Uranium	URXUUR
Cadmium	URXUCD
Lead	URXUPB
	PROC SURVEYREG
	STRATA
	CLUSTER
	WEIGHT
	DOMAIN
	LSMEANS

*For detailed calculations, formulas, and statistical analysis methods, please access the NHANES tutorial at the following website: <https://wwwn.cdc.gov/nchs/nhanes/tutorials/default.aspx> The tutorial provides comprehensive guidance and instructions on various aspects of data analysis using NHANES data, including but not limited to sample design, weighting, variance estimation, reliability of estimates, and software tips.

Table S2. Univariate Association between tobacco consumption (number of cigarettes smoked per day) and concentrations of metals (ng/g creatinine)

Independent Variable	Dependent Variable	p-value
Cigarettes smoked per day	Uranium (ng/g creatinine)	0.2189
Cigarettes smoked per day	Cadmium (ng/g creatinine)	0.0039
Cigarettes smoked per day	Lead (ng/g creatinine)	0.0031