

SIGNIFICANCE STATEMENT

Studies in non-CKD populations suggest that interventions targeting caloric excess and reduced physical activity may benefit the nutritional and metabolic profile in obese adults. This study examined the feasibility and efficacy of implementation of caloric restriction and aerobic exercise on the metabolic milieu in patients with moderate to severe CKD. The results showed that a 4-month long administration of caloric restriction and aerobic exercise led to significant improvements in body weight and markers of inflammation and oxidative stress. These healthy lifestyle interventions could potentially mitigate CKD progression and CVD risk in this high-risk patient population. The interventions evaluated in this pilot study should be tested in a larger patient population with longer-term clinical follow-up