

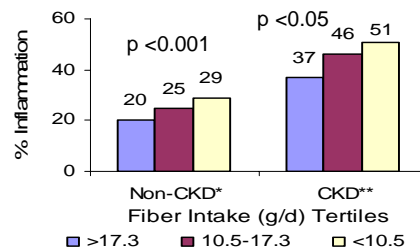
# **HIGH DIETARY FIBER INTAKE IS ASSOCIATED WITH DECREASED INFLAMMATION IN CHRONIC KIDNEY DISEASE (CKD) AND NON-CKD POPULATIONS: NHANES III**

Jennifer Zitterkoph, Bradley Baird, Jill Neilson, Tom Greene, Srinivasan Beddhu, Medicine, Univ of Utah, Salt Lake City, UT.

It is unknown whether high dietary fiber intake is associated with decreased inflammation in the CKD population. Therefore, we examined the associations of dietary fiber intake with inflammation (CRP > 3 mg/L) in CKD (MDRD GFR <60 ml/min/1.73 m<sup>2</sup>) and non-CKD adult participants in the National Health and Nutrition Examination Survey (NHANES) III.

Dietary fiber intake was estimated from a 24-h dietary recall conducted by trained personnel. CRP was measured by latex-enhanced nephelometry (Behring Diagnostics, Inc., Somerville, NJ, USA.) Svy suite of commands in Stata X (Stata Inc, College Station, TX) was used in analyses.

1103 CKD and 14,874 non-CKD participants were included in the analysis. The prevalence of inflammation by dietary fiber tertiles are summarized in the Figure.



Associations of Inflammation with Dietary Fiber Intake in Logistic Regression Models\*

Fiber Intake (g/day)	Non-CKD	CKD
≥17.3	Reference	Reference
10.5-17.3	1.19 (1.06-1.33)	1.59 (0.99-2.56)
<10.5	1.38 (1.17-1.63)	1.96 (1.17-3.29)

\* Odds Ratio (95% CI) adjusted for demographics, diabetes, stroke, congestive heart failure, myocardial infarction, hypertension, exercise level, calories, fat and protein intake.

Increased fiber intake is associated with lower risk of inflammation in the CKD and non-CKD population. Interventional trials are needed to determine whether high dietary fiber intake results in decreased cardiovascular events and mortality in the CKD population.