more NDF may be increased with SID Thr:Lys ratios greater than 0.60.

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282 Effects of high neutral detergent fiber diets on the nitrogen balance of pigs fed threonine-limited diets. J. K. Mathai^{1,*}, H. L. Spangler¹, H. H. Stein¹, K. J. Touchette², ¹University of Illinois at Urbana-Champaign, Urbana, ²Ajinomoto Heartland, Inc., Chicago, IL.

An experiment was conducted to test the hypothesis that increased levels of fiber in diets fed to pigs would reduce N balance but be ameliorated with increased Thr. A total of 96 gilts $(28.98 \pm 2.0 \text{ kg initial BW})$ were housed in individual metabolism crates allowing for total and separate collection of feces and urine. Pigs were allotted to 12 diets (0.90% standardized ileal digestible [SID] Lys) with 8 replicate pigs per diet using a randomized complete block design. Diets were prepared in a 3×4 factorial arrangement with 3 levels of fiber (6, 11, or 15% NDF) added as wheat middlings and distiller's dried grains with solubles and 4 SID Thr:Lys concentrations (0.45, 0.50, 0.55, or 0.60). Pigs were fed experimental diets for 14 d, including a 7-d adaptation period and a subsequent 5-d urine and fecal collection period. Apparent total tract digestibility (ATTD), retention, and biological value (BV) of N were greatest (P < 0.05) for pigs fed diets containing 6% NDF. Retention and BV of N were greater (P < 0.05) in pigs fed diets with SID Thr:Lys ratios of 0.50, 0.55, and 0.60 than in pigs fed diets with a SID Thr:Lys ratio of 0.45. Results indicate that the optimal SID Thr:Lys ratio may increase with increased dietary fiber. Nitrogen balance in pigs fed diets containing 11% or