



Effects of Flaked and Roasted Sorghum Grain on Finishing Swine Performance



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## Summary

The value of feeding flaked or roasted sorghum grain to finishing swine (95 to 210 lbs.) was investigated using 54 barrows and gilts. Rate and efficiency of gain for each treatment group were similar. Data from this station indicate that processing methods like flaking or roasting sorghum grain do not improve the performance of finishing swine enough to offset the increased cost of processing.

## Procedures

Fifty-four barrows and gilts (Hampshire, Yorkshire, and Duroc) averaging 95 lbs. were allotted to three treatments: a) ground sorghum grain (basal ration); b) flaked sorghum grain; c) roasted sorghum grain.

The flaked grain was prepared by steam heating followed by flat rolling and cooling. The roasted grain was prepared by use of a commercial roast-a-tron machine. The complete ration consisted of 1600 lbs. of processed grain plus 400 lbs. of protein supplement (table 1). Each complete ration contained approximately 16% crude protein, 0.63% phosphorous, and 0.78% calcium. The flaked and ground rations contained approximately 14% moisture; the roasted grain, 12%.

Pigs were housed in an open-front barn, with slatted pens, 6' x 15'. Each pen of 9 pigs had access to a two-hole self feeder and an automatic watering cup.

The feeding trial was for 70 days during the summer months.

## Results and Discussion

Performance data are shown in table 5. Finishing pigs (95 to 210 lbs.) gained at a similar rate whether they were fed ground, flaked, or roasted sorghum grain. Feed:gain ratios for the three processes were also similar.

The 1972 results confirm the 1971 results with processed milo for finishing swine (Report of Progress 181, Swine Industry Day, 1971).

Table 5. Performance Data of Finishing Swine Fed Ground, Flaked, or Roasted Sorghum Grain

Ration:	Ground	Flaked	Roasted
Daily gain, lbs.			
Rep. 1 Rep. 2 Average	1.52 1.38 1.45	1.45 1.37 1.41	1.45 1.50 1.47
Feed intake, lbs./day			
Rep. 1 Rep. 2 Average	$\frac{4.92}{4.82}$	4.84 4.62 4.73	4.82 4.94 4.88
Feed/gain			
Rep. 1 Rep. 2 Average	3.24 3.48 3.36	3.34 3.36 3.35	3.32 3.29 3.31