

The Effects of Distillers Dried Grains with Solubles and Corn Gluten Feed Substitutes in Growth Diets of Boer-Type Goats



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Introduction

- The U.S. goat industry has increased over the course of 15 years, 1.3 to 2.6 million (NASS, 2002 and 2017).
- There has been an increase of demand for economical diets for goat growth performance.
- Few studies conducted on varying ingredients on goat growth performance diets.
- Corn co-products are a relatively cheap and abundant source.

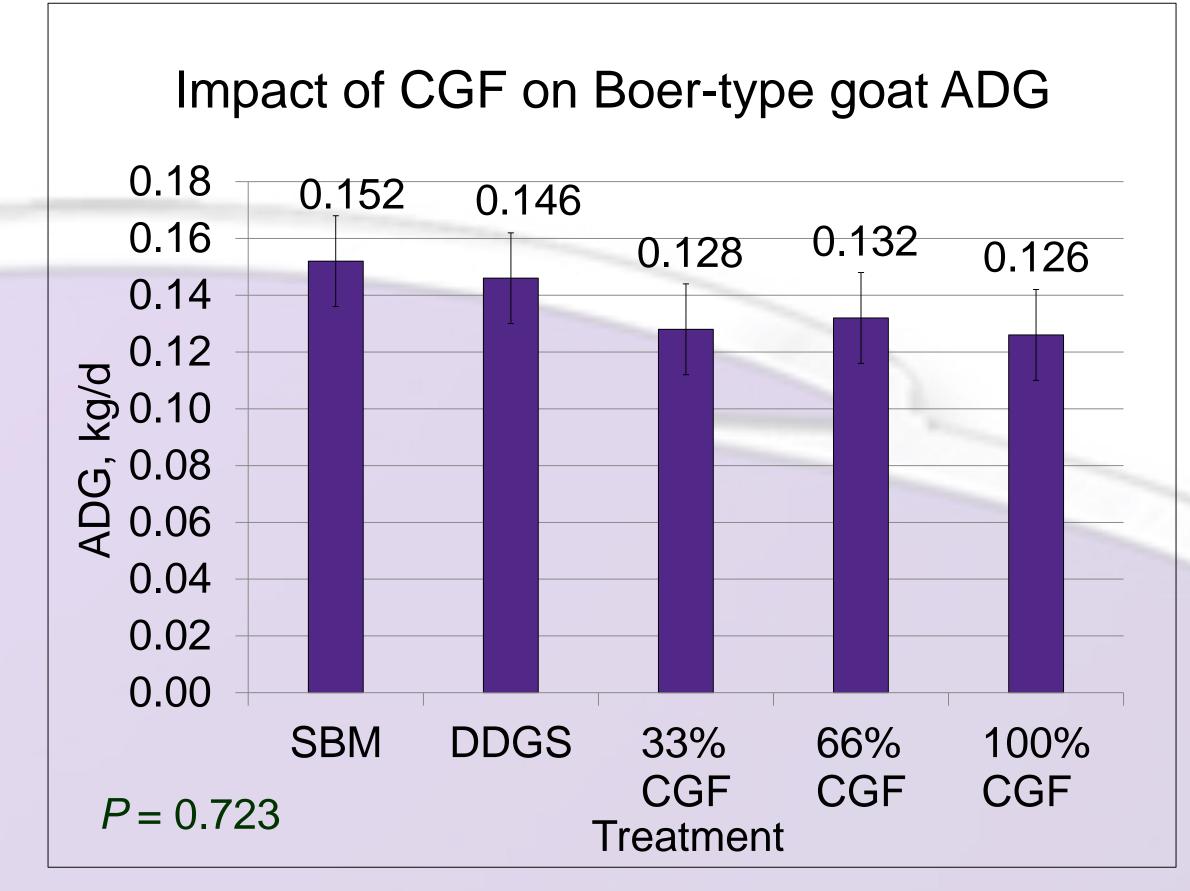
Objective

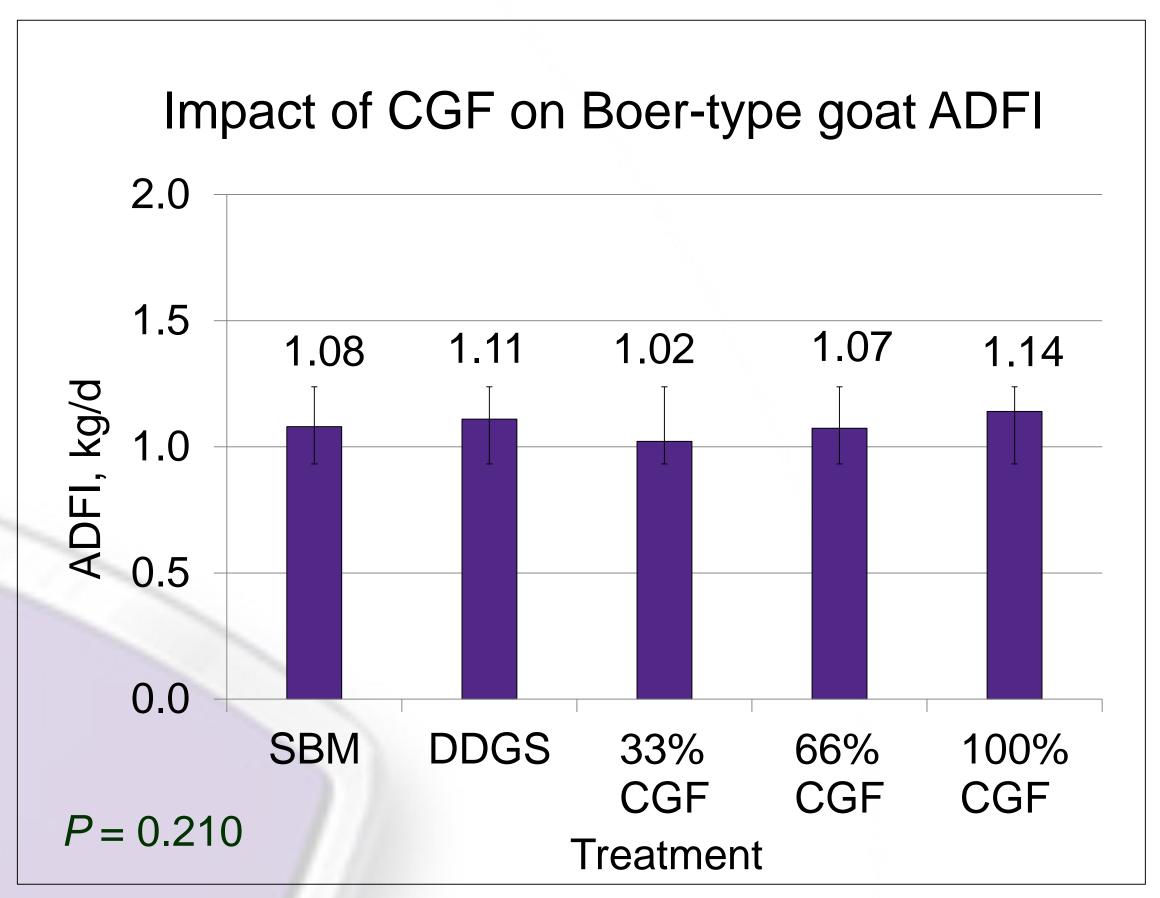
To examine the effects on growth and economic value of growing goat diets when soybean meal (SBM) is replaced with distillers dried grains with solubles (DDGS) or corn gluten feed (CGF).

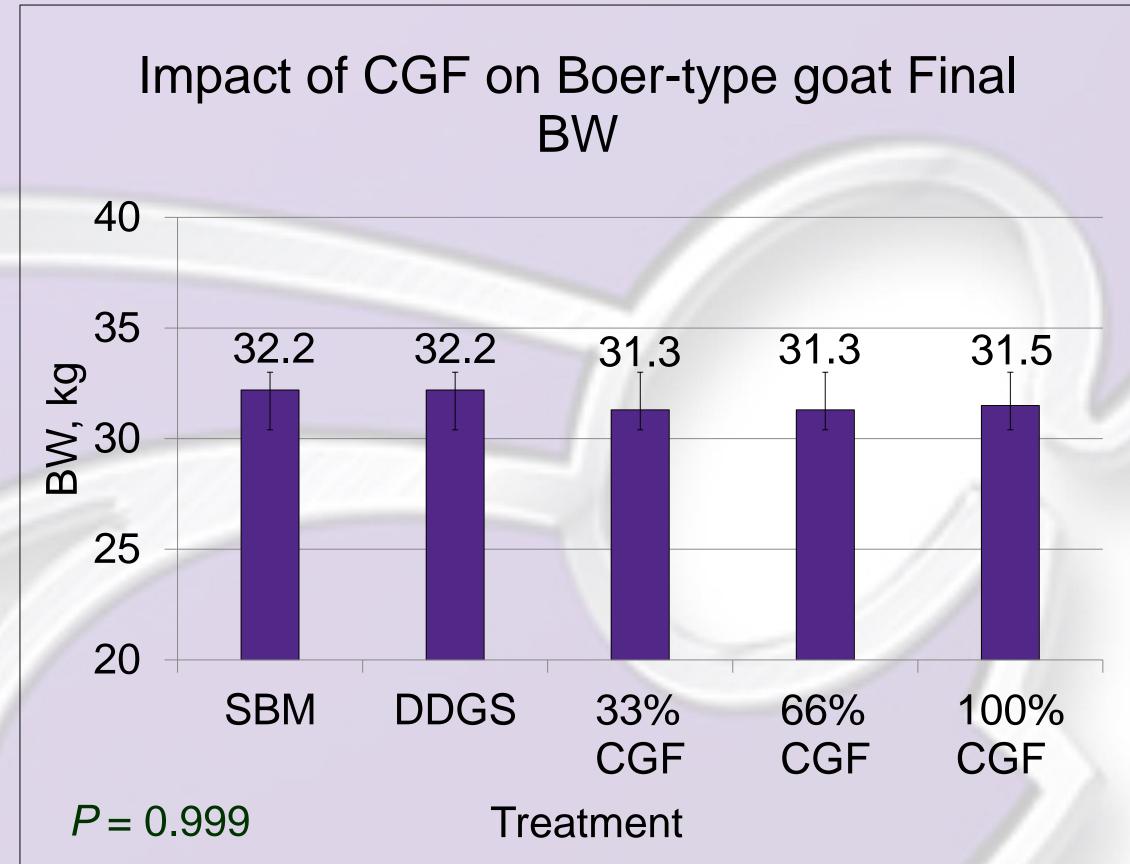
Materials and Methods

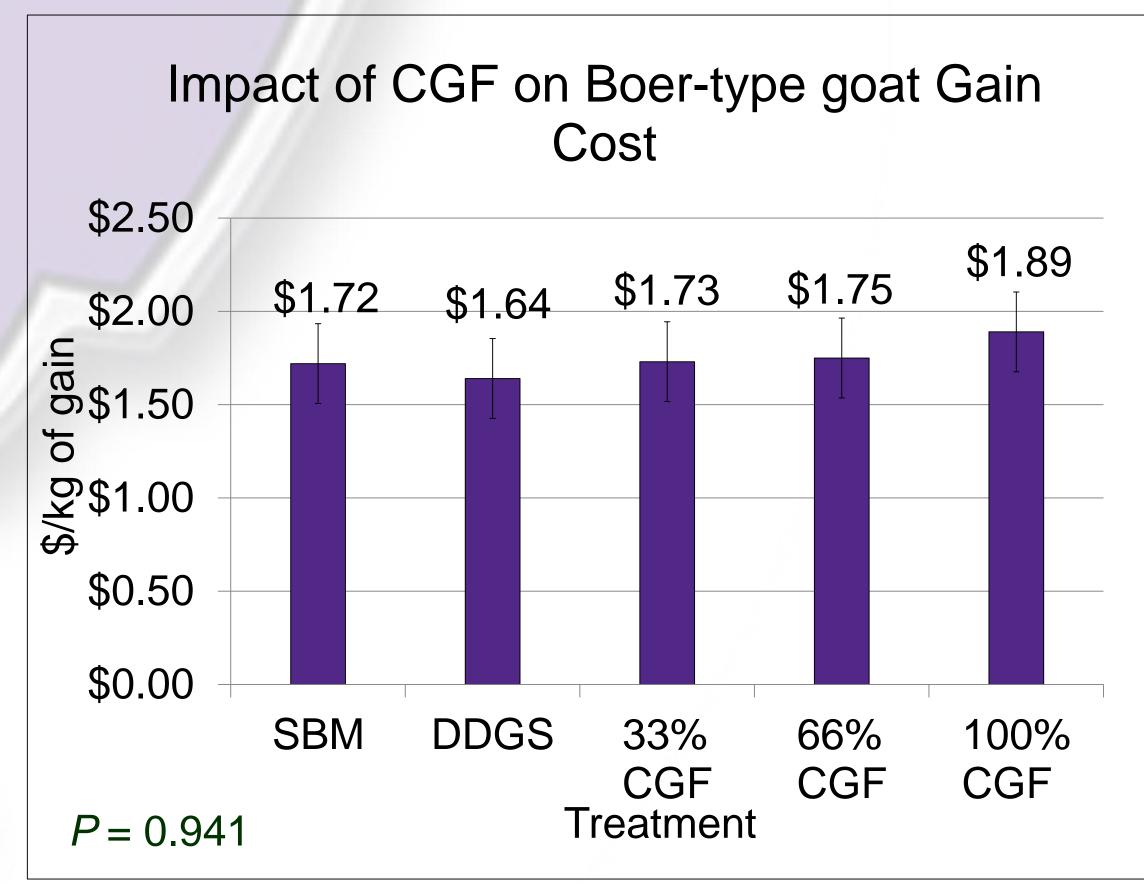
- A 35 d experiment was conducted at the Kansas State University Sheep & Meat Goat Center in Manhattan, Kansas.
- Seventy-five Boer-type goats, approximately 70 d of age, were randomly allotted to one of 5 dietary treatments, 3 goats/pen, and 5 pens/treatment in a completely randomized design with pen as the experimental unit.
- Goats were given access to water and feed every day of the week.
- Feeders and goats were weighed weekly, for 5 wk, to determine ADG, ADFI, & G:F for each wk.
- Dietary treatments were isocaloric and isonitrogenous, but varied in their primary protein source.
- The treatments were:
 - 1) SBM
- 2) 100% DDGS/0% CGF (DDGS)
- 3) 66% DDGS/33% CGF (33% CGF)
- 4) 33% DDGS/66% CGF (66% CGF)
- 5) 0% DDGS/100% CGF (100% CGF)
- All data was analyzed with the GLIMMIX procedure of SAS (v. 9.4, Cary, NC).
- Data was considered significant if P < 0.05.

Results









Conclusions

- As a result of the project, there was no detected significant change in BW, ADG, ADFI, or G:F.
- SBM can be replaced with DDGS or CGF in growth diets of Boer-type goats.
- There was a \$0.04/kg decrease in feed cost when comparing SBM to diets including corn co-products.

Acknowledgements

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