

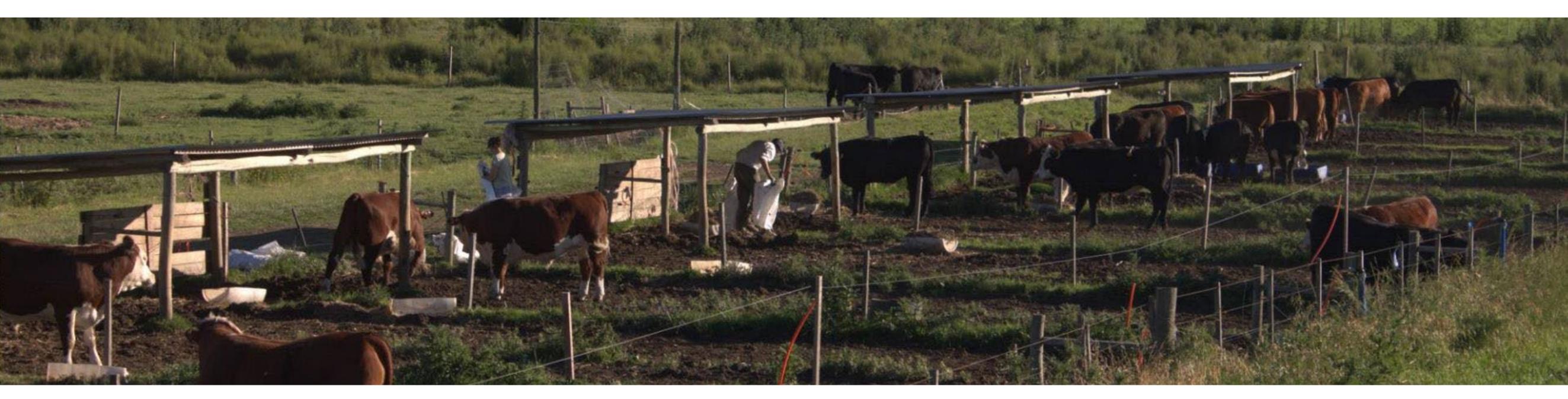




## Effects of Anavrin® on dry matter intake, ruminal environment, and methane emissions of finishing steers

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**ANAVRIN**<sup>®</sup>: blend of essential oils, tannins, and bioflavonoids formulated to improve performance, and ruminal function, and reduce  $CH_{\Delta}$  emissions.

**OBJECTIVES:** We aimed to study CH<sub>4</sub> emissions of finishing steers in feedlot conditions by

including ANAVRIN® in the diet.

METHODOLOGY: 12 finishing steers (16.8 mos, 362 kg BW),

Replicated 2×2 cross-over design (41-d periods)

## **Treatments:**

• **CONTROL:** TMR (13% forage, 12%CP, 18%NDF)

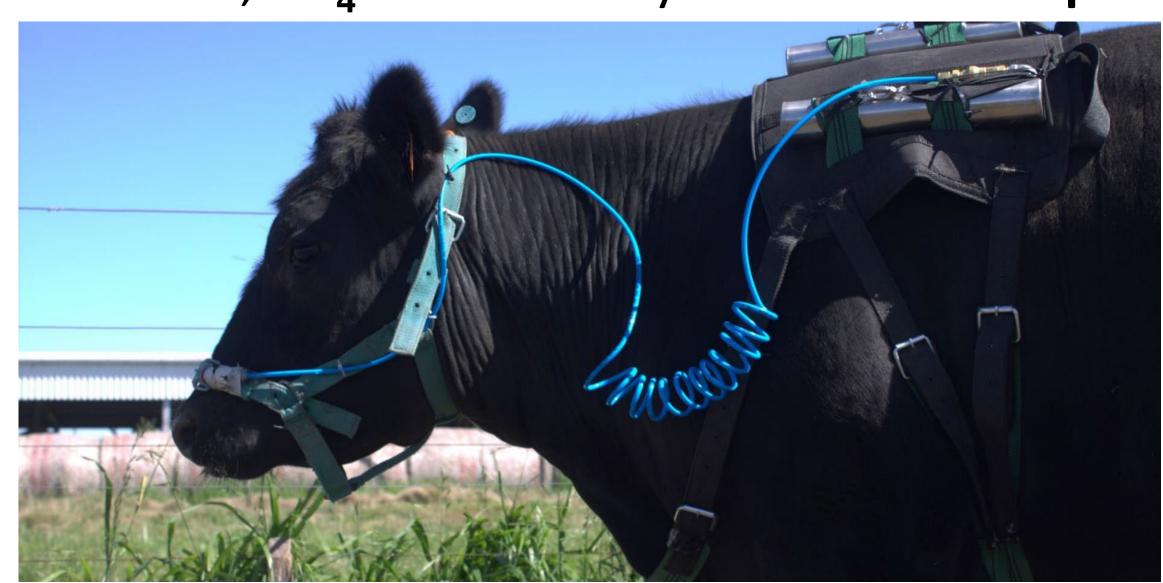
• ANAVRIN: TMR + Anavrin® (0.35 g/100 kg BW)

## **RESULTS:**

No differences were observed in DMI (14 kg/d), pH (5.9), total VFA production (87.6 mM), proportions of acetate (50.5%), propionate (35.6%), and butyrate (13.9%).

ANAVRIN® reduced CH<sub>4</sub> emissions (table).

Measurements: DMI as TMR offered – rejected, rumen environment using rumen catheters, CH₄ emissions by the SF6 technique



	CONTROL	ANAVRIN	P	CH <sub>4</sub> decrease
g CH <sub>4</sub> /d	189	156	0.040	17.5 %
g CH <sub>4</sub> /kg DMI	13.5	11.4	0.043	15.6 %
g CH <sub>4</sub> / kg BW <sup>0.75</sup>	1.77	1.47	0.035	17.0 %

## Conclusions and implications

- Anavrin® reduced CH<sub>4</sub> emissions in terms of total yield per steer, per DMI, and per metabolic weight
- Our results suggest a higher energy use efficiency in animals receiving the additive