Meat quality of extensively reared beef cattle in Greece

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Introduction & objective

- Extensive beef cattle farming plays a significant role in Greece's agricultural economy
- To assess meat quality from beef reared extensively in the natural grasslands of Axios River delta in Greece

Materials & methods

- 26 beef cattle
- meat samples from the 9th rib

- 15 samples of plants from natural pastures during the grazing period

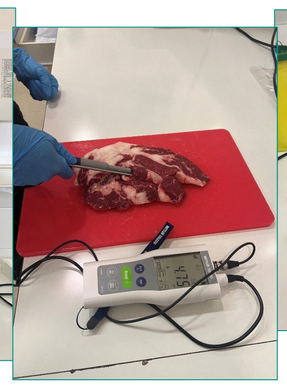
Medicago lupulina & Medicago sativa

Trifolium repens

Trifolium trefoil

Belis silvestris

- Chemical analyses and quality assessment → texture profile analysis, pH measurement, colorimetry, chemical composition and fatty acid profile analysis

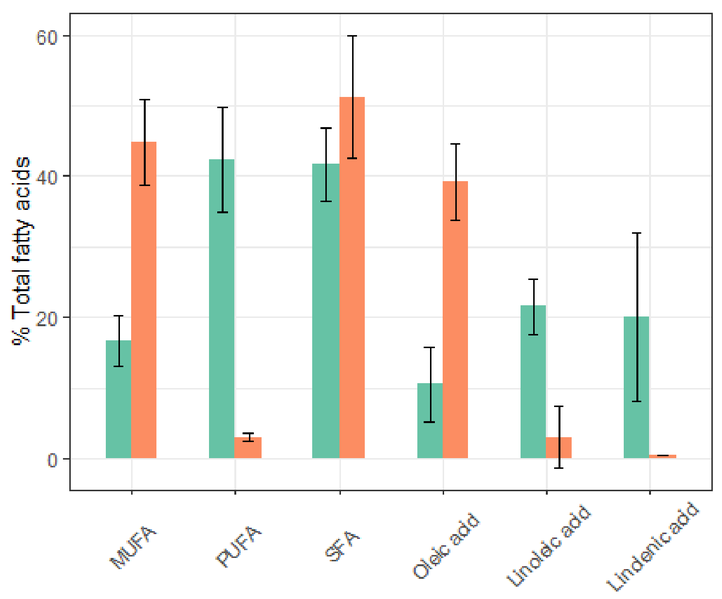


Results

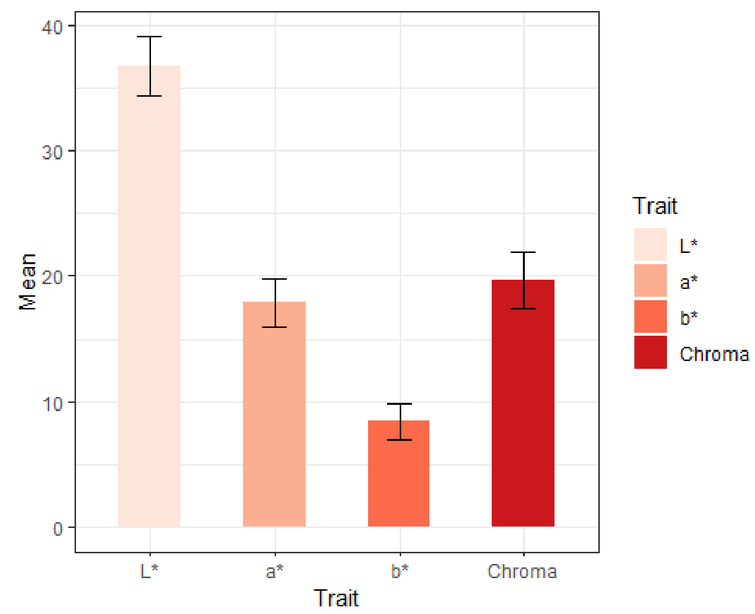
- Descriptives statistics of meat quality traits

Trait	N	Mean	SD
pH	26	5.6	0.35
Hardness1 (g)	26	968.6	392.54
Hardness2 (g)	26	809.3	330.99
Springiness	26	0.7	0.10
Cohensivess	26	0.6	0.09
Chewiness (g)	24	387.7	155.72
Moisture (%)	24	75.8	1.89
Protein (%)	24	22.9	0.97
Fat (%)	24	1.1	0.82

- Fatty acid profile (plants and beef)



- Meat colour parameters



Conclusions

- Findings underscore the benefits of natural grazing in meat quality

Acknowledgments

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