



Variation in Lamb Meat Quality on Three Winter Finishing Systems

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Purpose of the trial


Need to:

- **Identify systems of lamb production that deliver consistent eating quality through the year**
- **Address supermarket resistance to buying British lamb after Christmas**




Trial Design

	November slaughter	March slaughter
Grass only	GN	
Grass silage (+ compound)		GM
Ad-lib compound feed	CN	CM
Stubble turnips	TN	TM
UK grass fed	UK control	
New Zealand grass fed		NZ control



Trial Management

- **180 Texel cross Mule lambs**
 - **Groups of 30 lambs per treatment**
 - **First slaughter date 30/11/07**
 - **Second slaughter 6/3/08**
 - **Loin samples from castrate lambs sent to Bristol for taste panel assessments**
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Trial management



Lamb Performance

	Grass	Concs	Turnip	Signif
Start wt (kg)	33.7	34.3	34.6	NS
Sale wt (kg)	41.1 ^b	44.8 ^a	41.7 ^b	***
DLWG (g/day)	146 ^b	230 ^a	148 ^b	***
Carcass wt (kg)	17.1 ^b	19.7 ^a	19.0 ^a	***
KO%	41.6 ^c	44.0 ^b	45.7 ^a	***



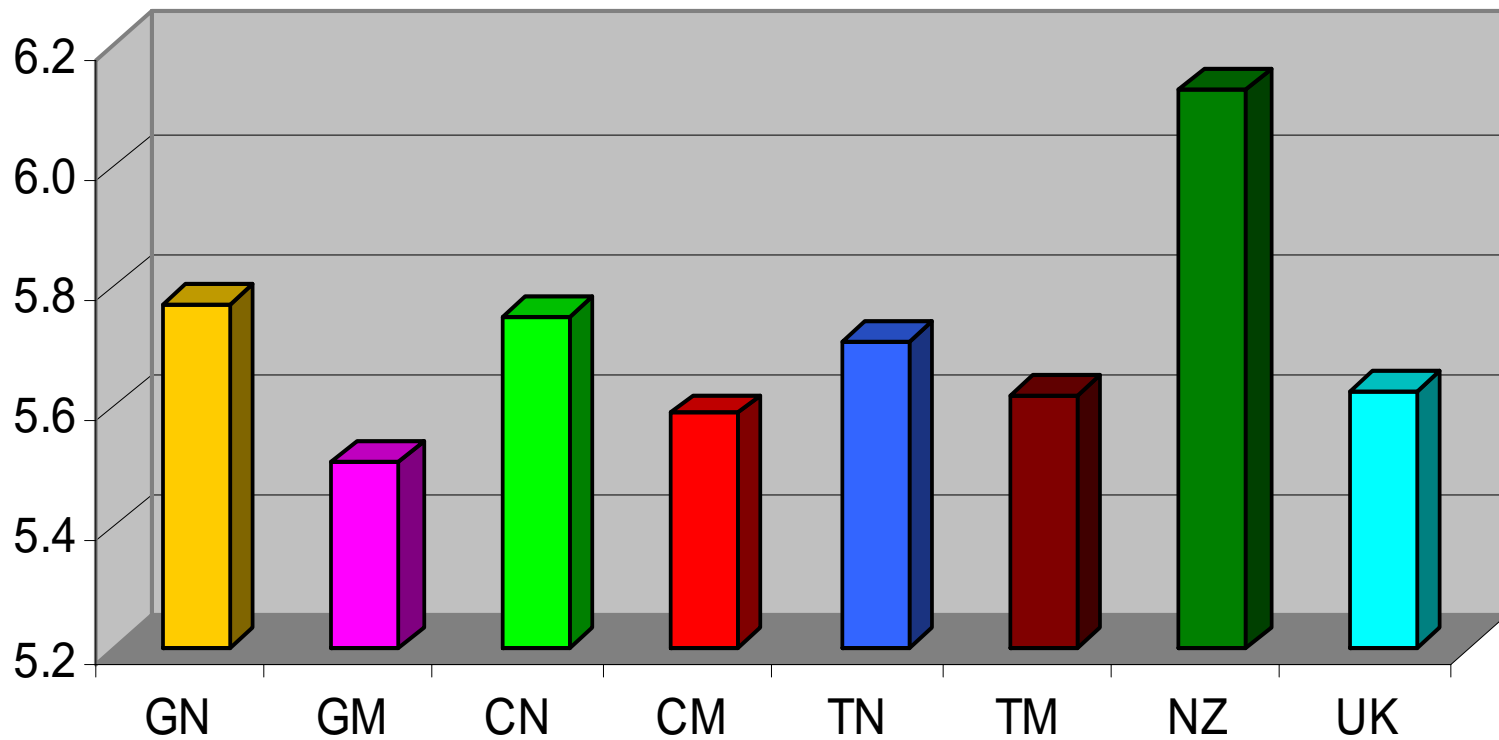
Other performance data

- **Grass/grass silage diets – lambs leanest and poorest conformation**
- **Turnip diet and grass fed most economic per kg LWG**
- **No differences in performance between two slaughter dates**

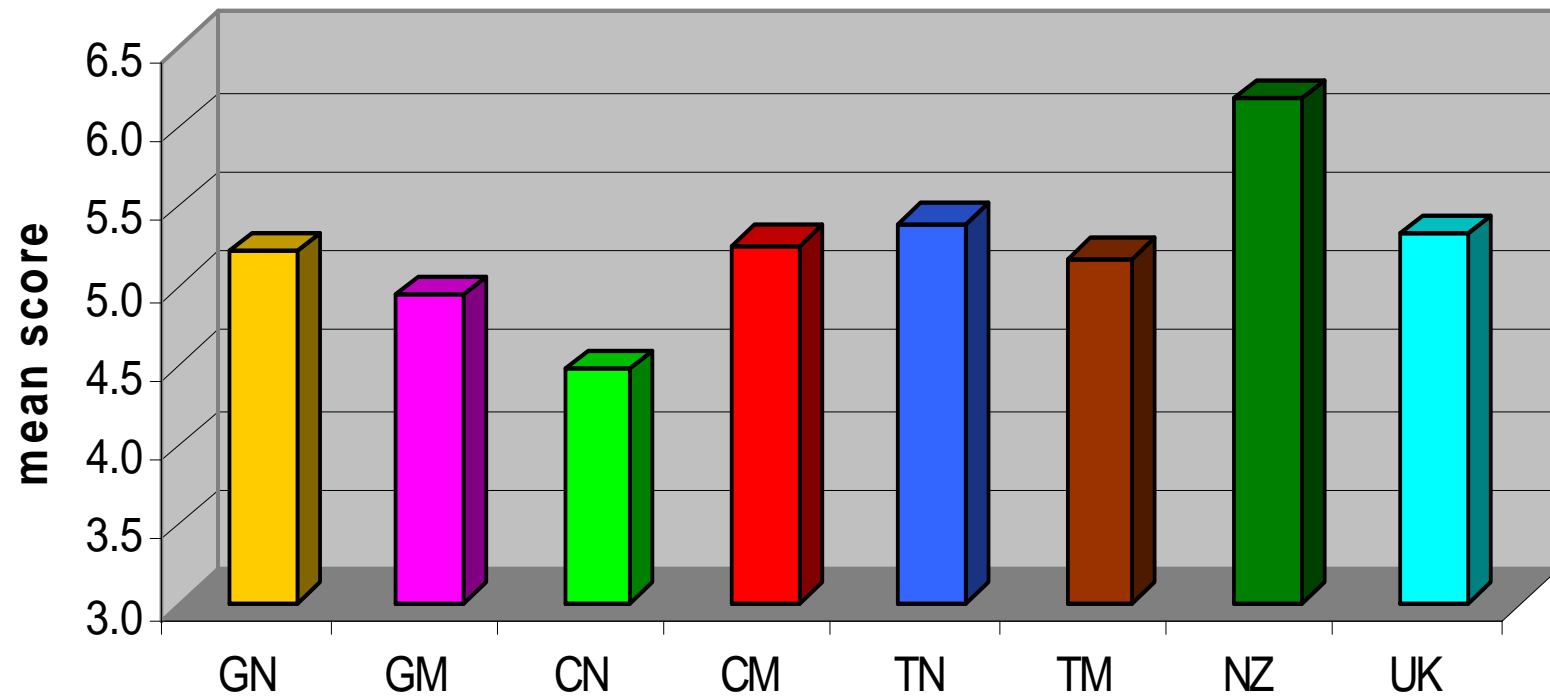


Meat Quality

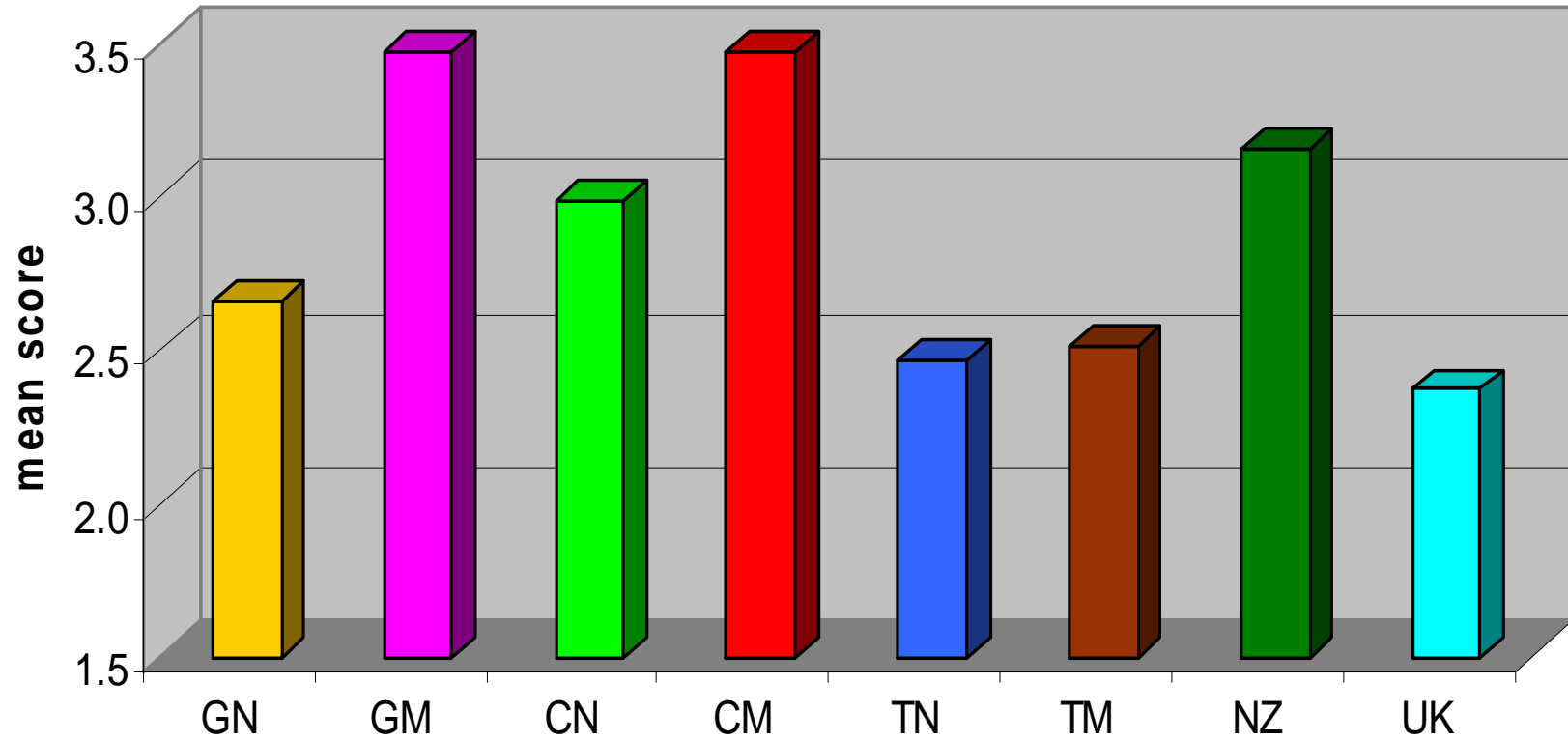
Ultimate pH of loin samples (pre-cooking)



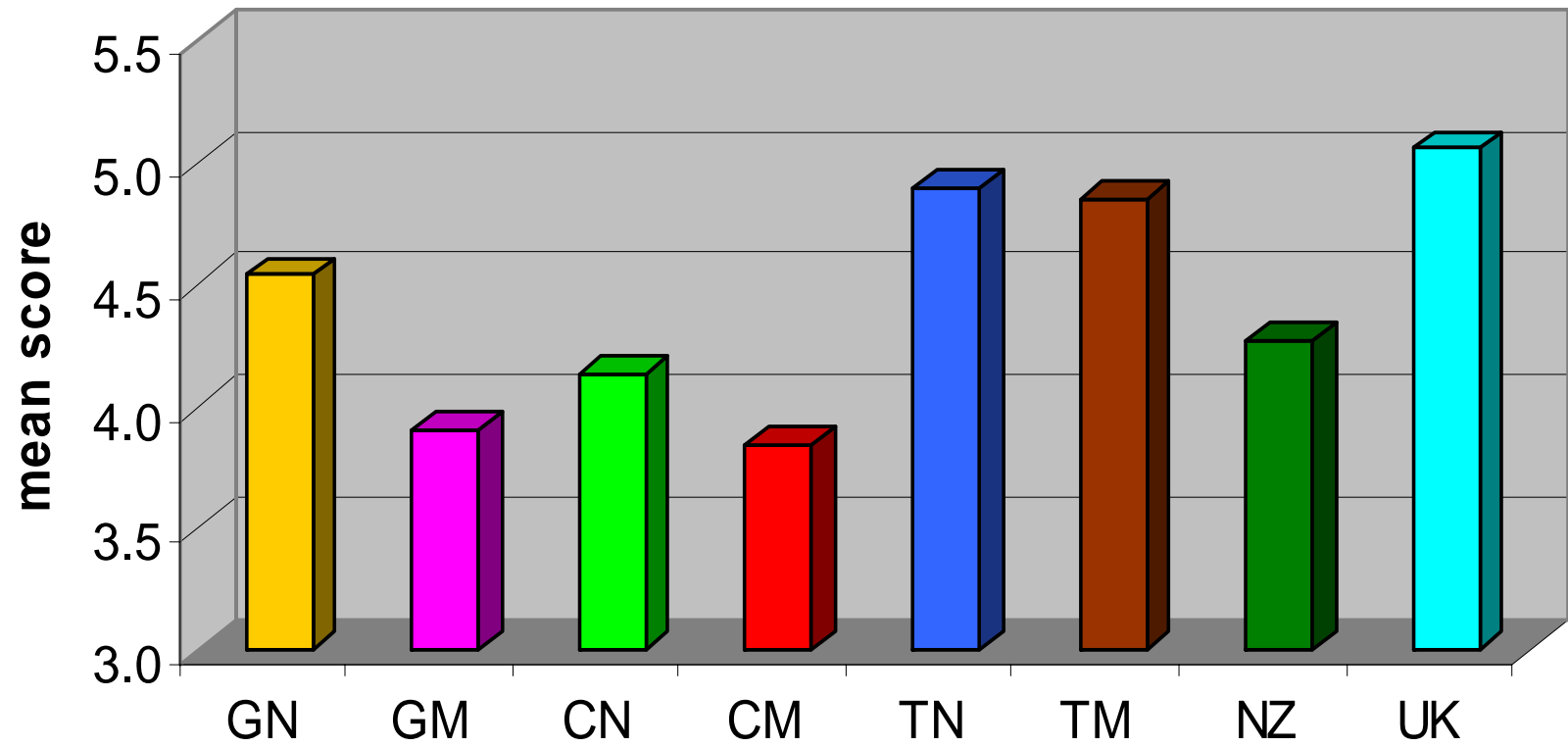
Texture of loin samples




Abnormal flavour of loin samples



Overall liking of loin samples



Conclusions

- **A diet of stubble turnips delivers high eating quality of lamb through the winter**
 - **Later slaughter tends to reduce the overall liking of grass silage and concentrate fed lambs**
 - **UK lamb compared favourably to this sample of NZ lamb**
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