

# Optimal grazing management to achieve high yields and utilisation of dryland lucerne

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New Zealand's specialist land-based university



# Publication details



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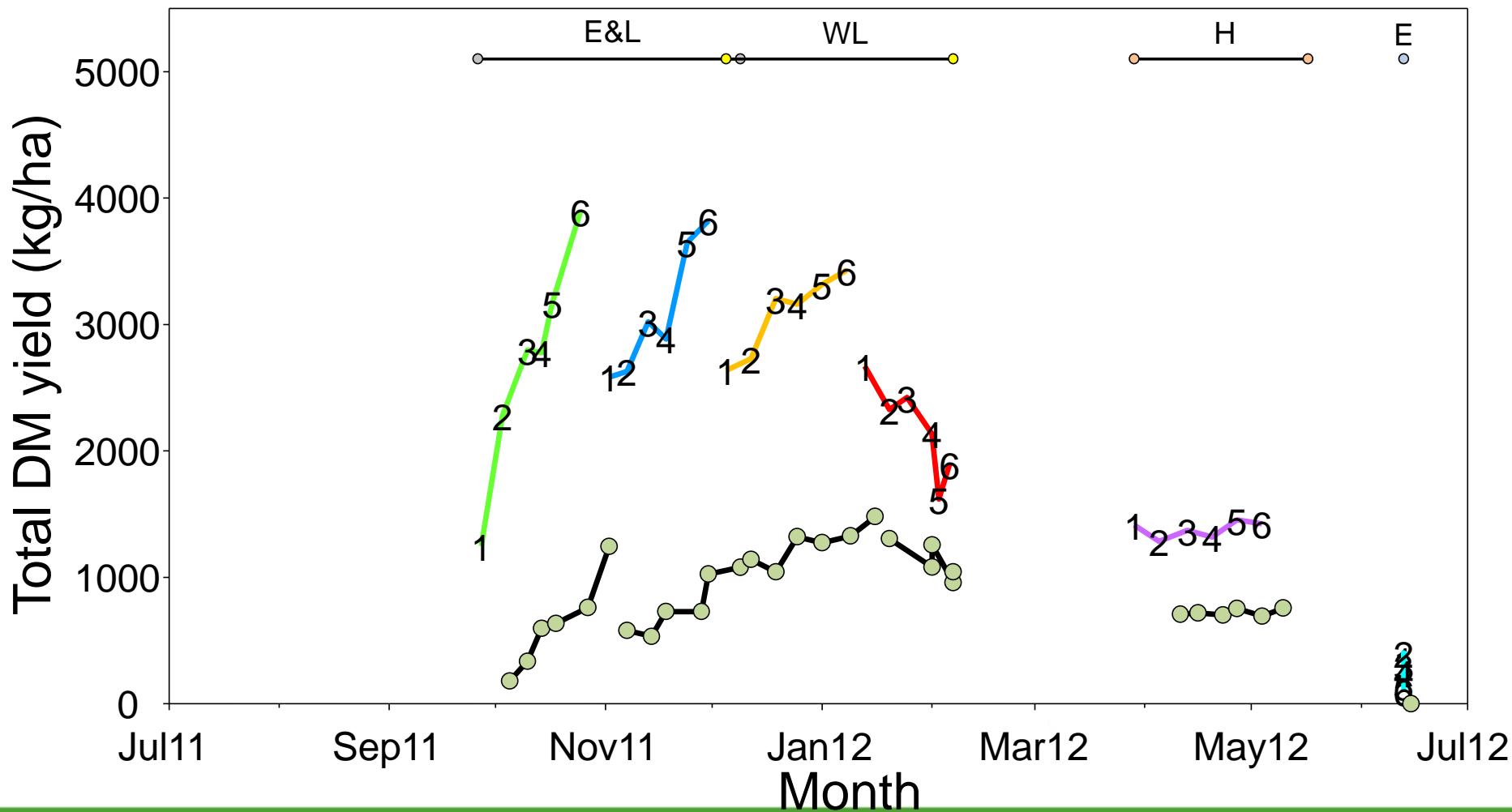
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# Outline

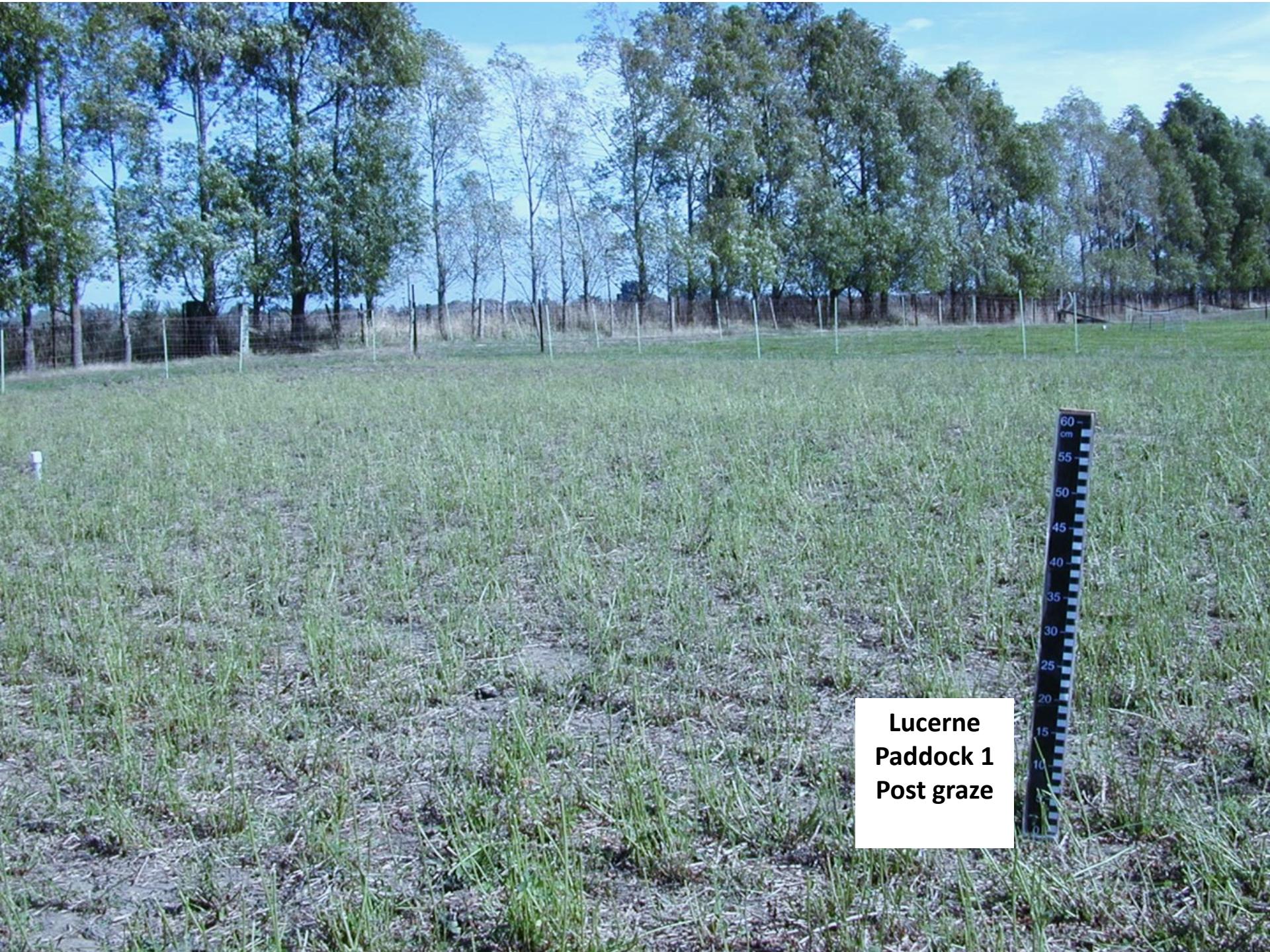
- To quantify the DM production and utilisation by sheep of individual lucerne paddocks within a six paddock rotation
- Focus on the 2011/12 season
- Ewes and lambs, weaned lambs, hoggets and ewes

# 2011/12 DM production





Lucerne  
Paddock 1  
Pre graze



**Lucerne  
Paddock 1  
Post graze**





A wire fence enclosure containing a dense growth of lucerne plants. The plants are green and leafy, filling the frame. In the background, there are more trees and a clear blue sky.

Lucerne  
Paddock 6  
Pre graze





**Lucerne  
Paddock 6  
Post graze**



# Annual dry matter production and consumption of the 2011/12 season

Stock class	Pre-graze DM yield (kg DM/ha)	DM consumed (kg DM/ha)	Utilisation (%)
Ewes & lambs	2897	2195	77
Weaned lambs	2629	1493	54
Hoggets	1378	656	47

# Days to return to each paddock in spring by year

Year	Return interval
2009/10	-
2010/11	35.0 <sup>a</sup>
2011/12	29.7 <sup>b</sup>
2012/13	34.3 <sup>a</sup>
2013/14	35.8 <sup>a</sup>
2014/15	-
Grand Mean	33.7
SEM	1.17
Significance	0.009

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# Summary

- Commence grazing in spring at lucerne height of ~15 cm (1.5 t DM) for rotation 1, ~30 cm (2.5-3.0 t DM) for Rotation 2
- Utilisation differs with stock class – target lower entry DM for weaned lambs
- Grazing interval important to ensure new shoots developing to full potential without limiting stand production

# Acknowledgements



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