

Lamb Growth Rates From Native Pastures in North East Victoria

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Native pastures have traditionally been grazed with Merino wethers for wool production. However, with declining returns from wool many producers are evaluating alternative uses for this land class. One option being considered by producers is joining Merino ewes to a terminal sire for prime lamb production. However, this land class is a valuable environmental asset and appropriate management of these native pastures also needs to be considered. This study aims to evaluate potential lamb growth rates from native pasture.

This work is being undertaken at the EverGraze native proof site located at Chiltern (S36°12', E146°35') in North-east Victoria. CentrePlus Merino ewes (August 2005 drop and second parturition for 2008 joining) were joined to White Suffolk rams for 2008 and 2009. An 81 ha native pasture was utilised for this study; the main perennial components of the native pasture are weeping grass (*Microlaena stipoides*), wallaby grasses (*Austrodanthonia racemosa*, *A. auriculata*) and spear grasses (*Austrostipa densiflora*, *A. scabra*). From lambing to weaning, the feed on offer across the site ranged from 1150 to 1234 kg DM/ha and 778 to 3821 kg DM/ha for 2008 and 2009, respectively and the ewes were not supplementary feed during this time for 2008. In 2009 due to pasture availability supplementary feeding did not occur from marking to weaning. Ewes were supplementary feed sheep nuts (estimated metabolisable energy (ME) = 12.3 MJ/kg DM; crude protein = 17%) and Lucerne hay (ME = 9.5 MJ/kg DM; crude protein = 21% DM) to ensure nutritional requirements were met from mid-February (both years) till June 27, 2008 and September 8, 2009 due to seasonal conditions. The ewes were joined on the 19th of February for five weeks for both 2008 and 2009. The lambing period was from July 19th to August 16th 2008 and July 17th to August 23rd 2009. Marking occurred on August 25th 2008 and August 26th 2009. Lambs were weaned on October 31st 2008 and November 22nd 2009. The age at weaning was 77 to 104 days for 2008 and 91 to 128 days for 2009.

As this is a native pasture site only; obtaining data to determine if the growth rates achieved for 2008 were good was possible by accessing prime lamb growth data from the DPI Rutherglen Centre (DPI RC) (S36°10', E146°52') improved pastures. In 2009, half of the ewes on the experimental site continued to be supplementary fed with the lambs being creep fed sheep nuts from marking until weaning. Prior to marking these ewes were ran as one flock.

Good lamb growth rates (> 250 g/hd.day) have been achieved for both 2008 and 2009 (Table 1) despite the poor seasonal conditions from native pastures. Prime lamb production growth rate data for 2008 from the DPI Rutherglen Centre (DPI RC) (Table 1) show that from marking to weaning the lambs on native pasture grew at an additional 80 g/hd.day compared to those on improved pasture. In 2009, there was minimal difference in the growth rates between lambs that were finished on native pasture compared to those that were supplementary fed.

Table 1. Average lamb live-weights and growth rates

Year	No. of lambs	Growth rates (g/hd.day ± s.e.)			Live weights (kg ± s.e.)		
		Birth to marking	Marking to weaning		Birth	Marking	Weaning
2008	Native	161	289 ± 7	336 ± 5	5.5 ± 0.09	12.9 ± 0.28	31.8 ± 0.36
	DPI RC	315	320 ± 4	256 ± 3	5.0 ± 0.05	16.2 ± 0.79	33.3 ± 0.33
2009	Native	87	326 ± 5	268 ± 5	5.6 ± 0.08	14.39 ± 0.42	37.40 ± 0.67
				(338 ± 4) [#]			(35.00 ± 0.60) [#]
	Sup. feed	81		278 ± 5		15.76 ± 0.46	39.40 ± 0.75
				(336 ± 5) [#]			(36.40 ± 0.76) [#]

[#]Growth rates for the 2009 lambs were equivalent to 2008 growth rates when matched for age

In conclusion, good lamb growth rates are achievable on native pastures, making it possible to produce a prime lamb in an average season, and, if adequate feed is available there is no need to supplementary feed.

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