Weekly Farm Summary 21 February 2024

Farm-system impacts of: Bales vs Beet for winter AND Reducing N loss to water by 30%.

		Std	LI	Std	LI	
		Infrastructure	Baleage	FB	FB	
		Blue	Pink	Green	Yellow	
Farmlet area inclu	uding wintering	52.2	93.6	86.9	60.8	
Peak cow numbers		139	208	233	136	
Milking Area		52.2	93.6	75.3	55.0	
Current Herd size (cows)		139	208	231	135	
Pasture Stocking	rate (current)	2.7	2.2	3.1	2.5	
	Winter Feed	Baleage	Baleage	Beet	Beet	
Milking supplement		In-shed feed 500kg/cow + silage as required				
Average Cover (kgDM/ha)		2514	2496	2540	2443	
Average Growth (kgDM/ha/d)		48	36	59	44	
Target rotation length (d)		27	32	26	29	
Last week actual rotation (d)		26	35	26	28	
Last week supp (kgDM/c)		1.1	0.5	0.8	0.7	
Latest Average BCS		4.6	4.4	4.7	4.7	
% of herd on priority management		22.3%	35.1%	29.4%	29.6%	
% in Milk		100%	100%	100%	100%	
7-day Average Milk yield (L/cow)		17.9	16.8	18.6	18.7	
7-day Average Milk yield (kgMS/c)		1.78	1.67	1.84	1.86	
Nitrogen Cap kgN/ha/yr		180	50	180	50	
% Nitrogen used (kgN/ha) YTD		64% (116kg)	72% (36kg)	67% (120kg)	78% (39kg)	
Effluent N YTD		9	12	13	12	
YTD Pasture growth TDM/ha		10.3	9.3	9.3	8.8	
YTD supp (kg DM/c)		426	372	520	411	
YTD MS/c		358	335	364	368	
YTD MS/milk ha (YTD MS/farm ha)		1062 (1124)	893 (893)	1151 (998)	1034 (935)	
Focus area	Current Status					
Milk Production	Milk Production is generally holding steady, with a few paddock specific variations. We are 5000 MS (4%) ahead of last year, with 39 more cows being milked and feeding on average 5 kg DM/day					
	less supplement, especially in the last six weeks. Milk yrea is in the low 30's, a reflection of more nitrogen in the diet with decreased lower protein inshed feed than normal and more spring type					
	grass.	ditions have the sector	we many assessed to	a opring cross	h a dran in dra	
Pasture & Feed	Recent growing conditions have the pasture more resembling spring grass, with a drop in dry matter to 15-18%. Some paddocks have just been cut for baleage to maintain pre grazing targets					
	and quality. Silage stack was filled last Thursday. In shed feed will increase slightly this week due					
	to cooler temperatures, lower pasture dry matter and quite a few paddocks being slower to come					
	back following conservation. Standard infrastructure and lower impact baleage herds will start					
	getting a bale of silage later in the week.					
Animals	4 new lame cows this week, no clinical mastitis cases found in a whole herd strip. Herd testing is					
	happening today. On veterinarian recommendation we will use a 4-way Lepto vaccination this year. There has recently been an uptick in Human Leptospirosis, which is a concern given how					
	debilitating a disease it can be. The 4-way vaccine requires two shots six weeks apart, so we are					
	working through the logistics of this for the heifers that are currently at grazing.					
Environment	The focus now is minimising nitrogen loading onto soils in autumn to reduce the risk of N leaching					
Environment	through the winter drainage period. Plan to get our last N applications on by mid-April.					
Wintering	N fertiliser applied to fodder beet crops by helicopter last week. Planning continuing for when to					
	shut wintering paddocks as part of developing the autumn feed budgets.					
People	Team has been using the lessons from their recent training to re-organise and improve chemical storage and PPE facilities					
	storage and PPE facilities. Only 2 paddocks to go for botanical composition analysis so results are imminent. Next week we					
Research	have NDDT and DTT visitors with us for two days to identify opportunities for collaboration.					
			,			

Milk production

Principles of Milk Production management this week

Milk production	Herds remain relatively stable mostly due to plenty of good quality pasture available for this time of year. All herds apart from the standard fodder beet herd have had speed wobbles related to specific paddocks- a drop in pasture DM% means the winter formula used when plating the paddocks is probably estimating 100-200kgs DM/ha high. Milk urea concentrations that have hit the 30's coincide with new grasses being grazed and more spring type grass in the diet than is typical for this time of year. A small increase in in-shed feed input planned for next week as we deal with the lag effect of the paddocks conserved for baleage over the last three weeks, and reduced dry matter%.
Key Influences of Milk Production	Despite the current pasture quality being very good, we do still see a change in production when cows graze paddocks where there is a range of sown and non-sown pasture species. Some paddocks on the lower terrace are particularly bad for non-sown grass species in their swards.
Cow Management	No change. TAD milking frequency with continued monitoring cow BCS on the fortnightly basis and adjusting the priority feeding and OAD milking groups as required. With early scan results available, 2024 calving date will now be taken into consideration when identifying cows for priority feeding.





Figure 1. Milksolids per cow/day STD and kgMS/ha STD

Figure 2. Cumulative kg Milksolids & Budget season to date

Feed Management

Principles of Feed management this week

Feed Quality	Maintaining the current desired residuals without underfeeding the cows. Due to different stocking rates the pre-graze targets between the herds range from 2800 to 3000 based on the current rotation length. Overall pastures are denser, lusher and have great amounts of clover and plantain than earlier in the season. Early decision making on paddocks where quality and quantity will allow for an extra feed is being implemented for the farmlets on the fastest rotation.
Growth Rate	Good soil temperatures, soil moisture and some warm days are still leading to growth rates exceeding demand overall, however there has been a slight decrease in temperatures this week and forecast next week. Will remain on the same rotation length as having the fast-growing new grasses coupled with demand being under average growth rate, we don't want to go any slower. Two low FVI paddocks are scheduled to be grazed, sprayed out and regrassed as part of our autumn regrassing program.
Nitrogen Strategy	Standard farmlets have a couple of paddocks to be done to complete their 5 th application of N fertiliser for the season. While we continue to have good soil moisture and temperature, we will continue to apply N. Given the current feed situation on the LI farmlets and the plan for autumn regrassing and aeration the decision was made to start the final round of N application of 12.5 kg N/ha to these farmlets this week.





Figure 3. Soil temperatures 2023-24 vs 2022-23

Figure 4. Season to date rainfall compared with cumulative rainfall 2022-23

Feed Wedges



Standard Fodder Beet



4000 4000 3500 3500 ++ 3000 M 3000 +++ + B NG B 2500 BB М R 2500 М ^B Cows +Cows 2000 2000 1500 1500 1000 1000 500 500 0 0 35 100 14 69 80 9 81 66 98 2 6 59 49 3 96 44 51 17 101 23 54 82 21 89 50 30 37 84 92 5 62 40 10 31 85 22 48 68 70 77 15 52 73 99 58 35 100 14 69 80 9 81 66 98 2 6 59 49 3 95 44 51 17 101 23 54 82 21 89 50 30 37 84 92 5 62 40 10 31 85 22 48 68 70 77 15 52 73 99 58 Days Grazed Z 34 11 17 18 0 10 20 14 12 19 15 22 6 8 12 13 2 12 12 12 8 5 7 3 4 0 1 Days Grazed 4 21 0 13 26 20 18 17 3 26 8 15 23 12 5 2 11 7 12 0 N Z N_4 38 Growth 2 18 132 90 48 0 92 38 56 98 96 70 54 0 77 20 16 0 14 56 34 0 0 0 0 Growth 4 56 0 80 85 52 10 82 0 26 94 26 8 8 0 0 42 0 8 0

Lower Impact Fodder Beet

Figure 5. Plate meter feed wedges as at 20th February 2024 (hatched paddocks have just been cut for conservation)

Standard Infrastructure