

Weekly Farm Summary 27 September 2023

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

	Blue -Std Infrastructure	Pink- LI Baleage	Green- Std FB	Yellow- LI FB
Farmlet area including wintering	49.3	93.6	86.9	60.8
Peak cow numbers	140	212	237	137
Milking Area	52.2	86.3	75.3	55.0
Current Herd size (cows)	132	200	228	133
Pasture Stocking rate (current)	2.5	2.3	3.0	2.4
Winter Feed Milking supplement	Baleage	Baleage	Beet	Beet
Average Cover (kgDM/ha)	2211	2359	2199	2289
Average Growth (kgDM/ha/d)	30	31	30	28
Target rotation length (d)	24	41	26	29
Last week actual rotation (d)	27	41	37	36
Last week supp (kgDM/c)	2.0	1.8	4.2	2.1
Latest Average BCS	4.9	5.0	5.1	5.0
% less than BCS 5	4%	4%	2%	1%
% in Milk	94%	94%	96%	97%
7-day Average Milk yield (L/cow)	23.7	24.4	24.9	24.6
Nitrogen Cap kgN/ha/yr	180	50	180	50
% Nitrogen used (kgN/ha) YTD	11%	16%	18%	13%
Effluent N YTD	0	0	1	0
YTD supp (kg DM/c)	39	56	99	49
YTD MS/milk ha (YTD MS/farm ha)	233 (261)	89 (87)	185 (169)	144 (138)
Focus area	Current Status			
Milk Production	Milk production was impacted last week with the floods that came through the farm with some last-minute grazing plan changes and pasture utilisation compromised. SCC continues to be higher in the FB vat so further investigation will take place after this week's herd test to understand the cause.			
Pasture & Feed	Residuals have tightened up this week in comparison to 2 weeks ago and this is being reflected in the milk yields. However, we needed to step over some paddocks that were in the grazing plan due to flooding so cows are now going into paddocks that are longer than we would like them. In these paddocks, residuals have been sacrificed to minimise the effect on milk production, so residuals will require resetting with the mower in the second round.			
Animals	BCS was completed at the end of last week and overall condition is holding well, with the LI Baleage herd having the largest range. There are now 34 cows on preferential treatment to bring their BCS back up in time for mating. These cows are on OAD and getting 3.5 kg inshed each day to maximise their energy levels to build condition. Tail painting to take place on Monday to start recording pre-mating heats. The remaining 40 replacement calves had DNA samples taken and were disbudded on Monday. Calves will go to the support block 2 weeks later than planned due to flood damage and silt contamination.			
Environment	Nitrogen applications went on earlier in the week at 12.5kgN/ha for the LI farmlets and 25kgN/ha for the standard farmlets. Unfortunately, there were several paddocks that were missed so plans are in place to get this first round of applications done next week if weather conditions allow.			
Wintering	Plans are in place to get the pasture regrowth in this winter's crop paddocks grazed before the contractors arrive for cultivation. Paddock plans are being drawn up to ensure breakouts zones and transition areas are clearly marked before the contractors start work.			
People	Due to health and safety risks to farm staff, a section of one lane has been closed because of flood wash outs. We had a great team of people from MDS Contracting on the farm this week clearing debris off the fences and tidying up through the paddocks.			
Research	Pasture samples have come back suggesting good quality across the farmlets in the first round, MJME averaging 12.3 and crude protein sitting around 20. New full-time technician will be starting on farm within the next few weeks.			

Milk Production

Principles of Milk Production management this week

Milk production	Weather and changing of grazing plans to avoid flood risk paddocks have compromised milk production for parts of the week, with 4 days of lower than previous pickups. However, by the 27 th these had returned to pre-flooding levels. With only 22 cows left to calve, we are not far away from having peak numbers in the vat. On a per ha basis compared to last year, all herds are up, with the exception of the Std Infra, who also have the lowest 7 day average milk yield.
Key Influences of Milk Production	Pasture utilization was impacted and baleage fed out to drive intake levels through flood periods to mitigate lost milk, however the effects were still seen in the vat. SCC is still higher in the FB vat despite fortnightly herd tests. Further investigations are underway to look at the distribution of SCC in the FB vat compared to the baleage vat, as all cows with high SCC from the last herd test were treated and there has still been no reduction in the FB vat.
Cow Management	34 cows currently on OAD due to low BCS. Pre-mating heats to start next week and options will be investigated if there are indications that non cyclers may be requiring preferential treatments before mating starts.

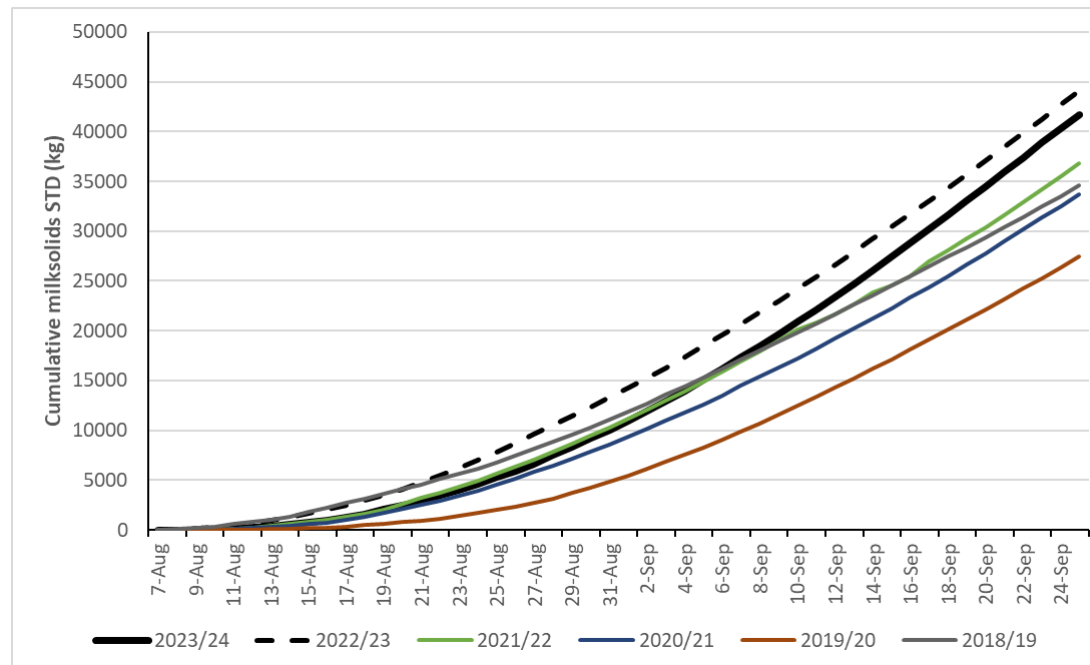


Figure 1. Cumulative milksolids (total kgMS) this year compared to past 4 years.

Feed

Principles of Feed management this week

Feed Quality	Pasture quality has improved overall as we move into second round paddocks, however there is some poor quality feed in the base of those paddocks where we didn't meet residual in the first round. Some longer paddocks have been stepped over to accommodate the flood waters across the farm so cows were going back to these paddocks with longer pre graze covers than initially planned. We are being realistic with the fact residuals won't be tidy in these paddocks so they will be added to the "reset list" in the 2 nd round.
Growth Rate	No surprise after the past weeks weather, growth rates have dropped back into the 30's across all farmlets with the LI FB farmlet at 28kgDM/ha/day. There is only 1 first round paddock left across the farm to be grazed. APC well above where we assumed it would be at the end of the first round but is finally dropping. As a result, we have fed less supplement season to date. N fertilizer applications will continue even with the higher APC as Sulphur is required with the wet conditions and moving towards a 25-day round, we don't want to get into a hole in 2-3 weeks time.
Nitrogen Strategy	Weather conditions meant some of the paddocks that were marked for N did not get them so as soon as ground conditions allow, the remainder of the 1 st round paddocks will get their allocated applications. Effluent will continue to be applied when appropriate, the pond is at 65% so any chance we get to apply this we will.

	Crude protein (% DM)	NDF (% DM)	Ash (%)	ME (MJ/kg DM)	NSC (% DM)	Soluble Sugars (% DM)
With Plantain	19.3	37.5	9.9	12.3	30.1	13.0
No Plantain	21.3	37.9	10.4	12.3	26.9	12.0

Figure 2. Results of the seasons first pasture quality samples taken. These results are all better than the same time last year



Figure 3 and 4. Silt covered grass impacting palatability as a result of the flooding. Not pushing cows in these paddocks to limit the flow on affects in milk production .



Feed

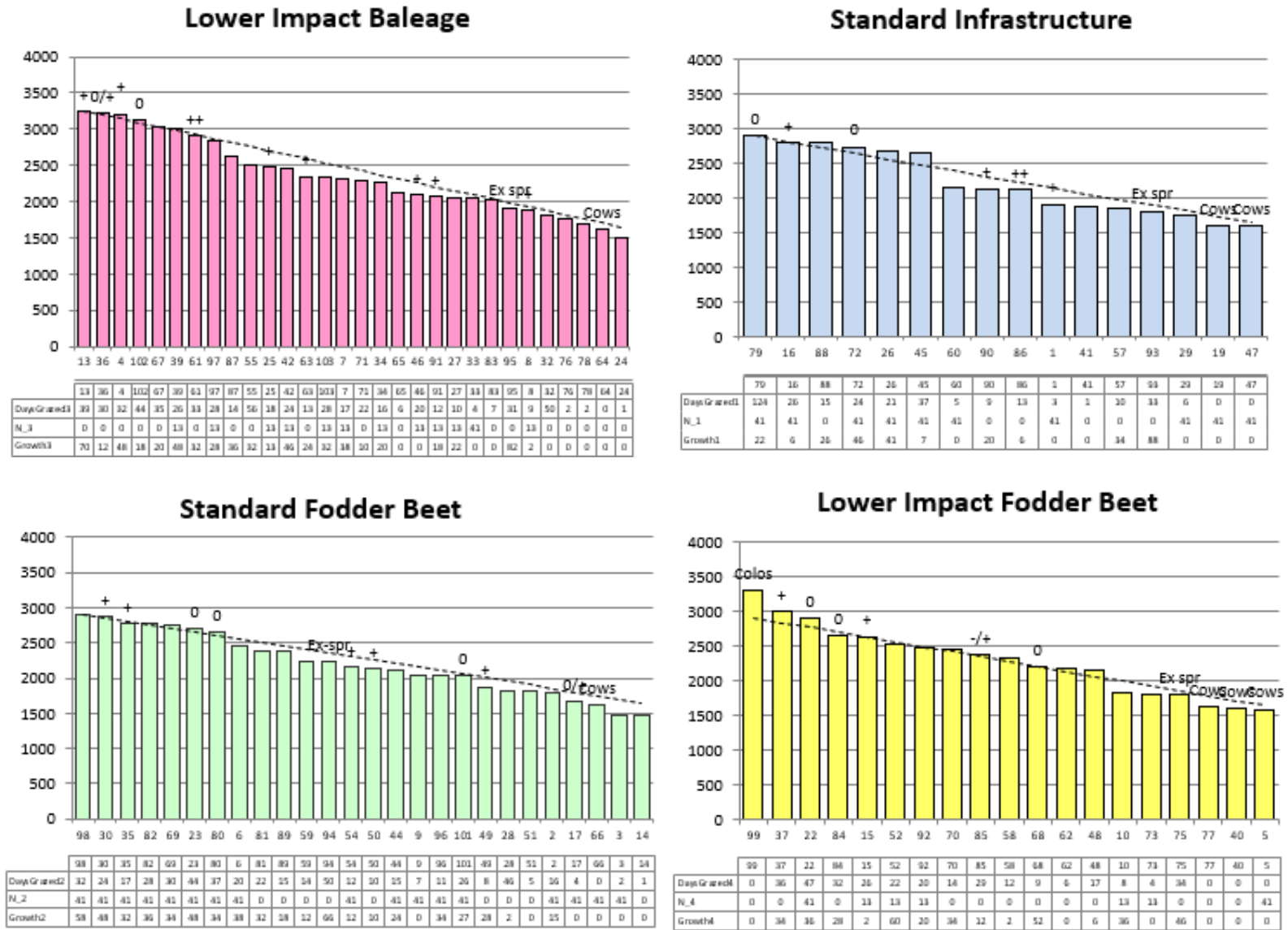


Figure 5. Plate meter feed wedges at 26 September 2023

Animals

Body Condition Score

While we are seeing a slow decline in BCS post calving we are still very pleased with the herd averages. The range is starting to widen but with priority feeding to the low BCS animals we hope this will be kept to a minimum. With only 1-4% of each herd below BCS 4.5 we are in a good place heading into mating. At the same time last year we had between 21 and 34% of cows below BCS 4.5.

We will be looking into our winter feeding management for next winter as the cows wintered on baleage this year did not gain as much BCS as those wintered on fodder beet. Some of this we attribute to the range in quality of baleage offered to these herds.

This season we also tracking the BCS of the 2-year-olds separately from the mixed age cows with the plan to have them 0.5 BCS higher at mating. We appear to have a few freeloaders who are making the most of the inshed feeding but not giving much milk (see photo below!!)

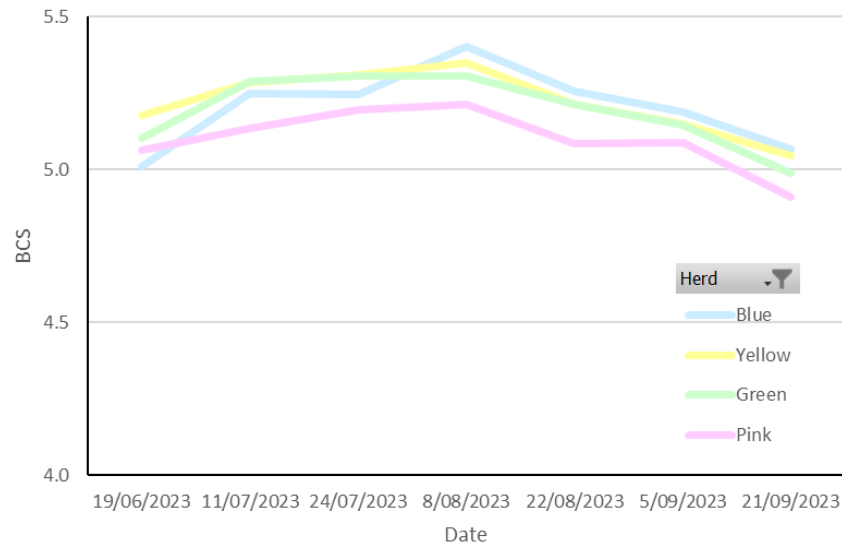
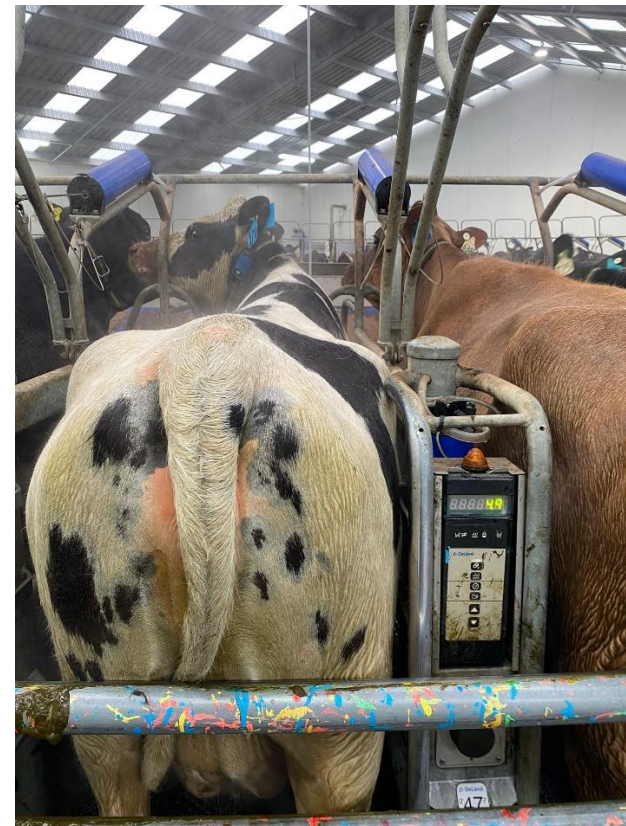


Figure 6: BCS across all herds- season to date



Animals

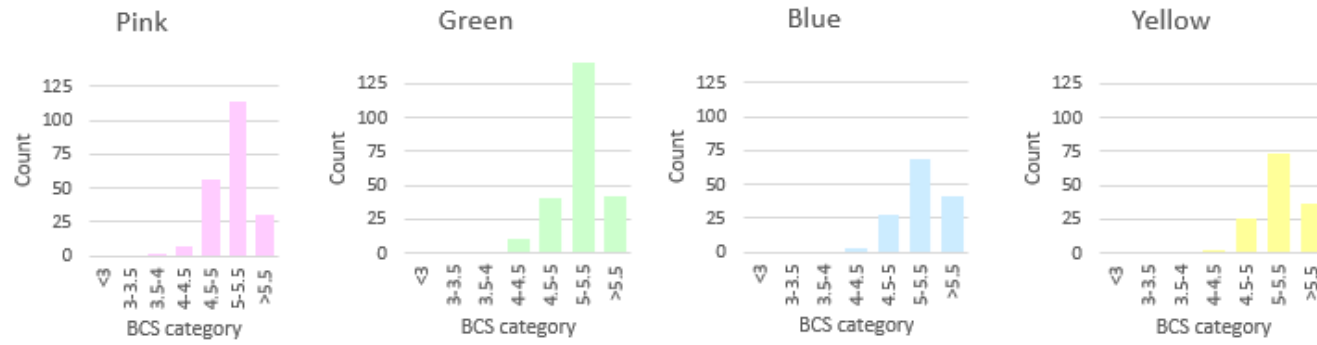


Figure 7: BCS range in all herds as of 22/09/2023