Weekly Farm Summary 6 September 2023

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

	Std Infrastructure Pink	LI Baleage Blue	Std FB Green	LI FB Yellow
Farmlet area including wintering	79.0	60.9	86.9	60.8
Peak cow numbers	218	141	243	141
Milking Area	73.2	49.3	69.5	52.1
Current Herd size (cows)	215	141	239	137
Pasture Stocking rate (current)	2.8	2.7	3.2	2.5
Winter Feed Milking supplement	Baleage	Baleage	Beet	Beet
Average Cover (kgDM/ha)	2512	2446	2429	2517
Average Growth (kgDM/ha/d)	38	25	33	40
Target rotation length (d)	35	35	35	35
Last week actual rotation (d)	50	49	37	57
Last week supp (kgDM/c)	1.2	1.0	1.1	1.1
Latest Average BCS	5.1	5.2	5.1	5.1
% less than BCS 5	11%	16%	8%	11%
% in Milk	79%	79%	82%	79%
7-day Average Milk yield (L/cow)	21.7	20.9	21.3	21.5
Nitrogen Cap kgN/ha/yr	**180**	**50**	**180**	**50**
% Nitrogen used (kgN/ha) YTD	0%	0%	0%	0%
Effluent N YTD	0	0	1	0
YTD supp (kg DM/c)	22	15	25	18
YTD MS/milk ha (YTD MS/farm ha)	73 (70)	62 (54)	81 (70)	64 (58)

Business Area	Current Status
Milk Production	Production is continuing to increase as more cows move onto TAD milking. Herd test results have be used to identify 13 high SCC cows. Interestingly 9 are from fodder beet herds and have been causing a high bulk SCC. Comparing year to date data with this time last year, all herds are above on a per hectare basis.
Pasture & Feed	We are getting through the high mass paddocks but with growth rates averaging as high as 40 kg/ha per day over the last week we are still struggling to pull APC down. Supplement use (baleage) had been forecast to be used last week to meet any paddock deficits but was not required due to strong growth and high APC in the paddocks in the grazing plan.
Animals	Calving is still slower than predicted meaning we aren't able to put as much feed pressure on to bring down APC. At BCS assessment on Tuesday all herds are averaging above 5. More investigation into the data for the 1st and 2nd calvers is to be done to ensure we minimise BCS loss in them before mating. Preferential in-shed feeding will be used to manage BCS.
Environment	First effluent applications started this week. Fertiliser plans have been completed and the first round of N will be applied within the next fortnight.
Wintering	Surplus fodder beet has been sold and is being lifted this week. It will be temporarily stored on farm before being trucked off.
People	We are currently advertising for a senior farm assistant. Shout out to Billy and his team for all their hard work so far this calving, nearly down to double digits for cows left to calve!!
Research	The research advisory committee met last week to revisit the research priorities and potential future research opportunities. Second interviews will be completed next week for the research technician role.

Milk Production

Principles of Milk Production management this week

Milk production	Production continues to lift as expected, but with cows on a mixture of OAD and TAD milkings it is hard to get a realistic gauge on per cow performance. Milk yields are between 21-22L/cow/day for the past week. Milk has been taken from the vat for the calves due to the low level of colostrum milk, however we will be transitioning to milk powder in the next week to avoid taking more from the vat.
Key Influences of Milk Production	Milk quality has been impacted in the last week with 3 mastitis cows being identified in the FB herds, pushing SCC up but this should come back now they have been treated. Feed quantity is still not an issue but quality is variable.
Cow Management	There has been a slight change in the number of cows getting preferential feed as a result of this weeks BCS assessment. Afternoon cow flow through the shed has improved with the addition of 0.5kg of inshed feed being offered, however this is being reduced to 0.2kg per cow to minimise substitution as we want to maximise pasture consumption to get APC under control

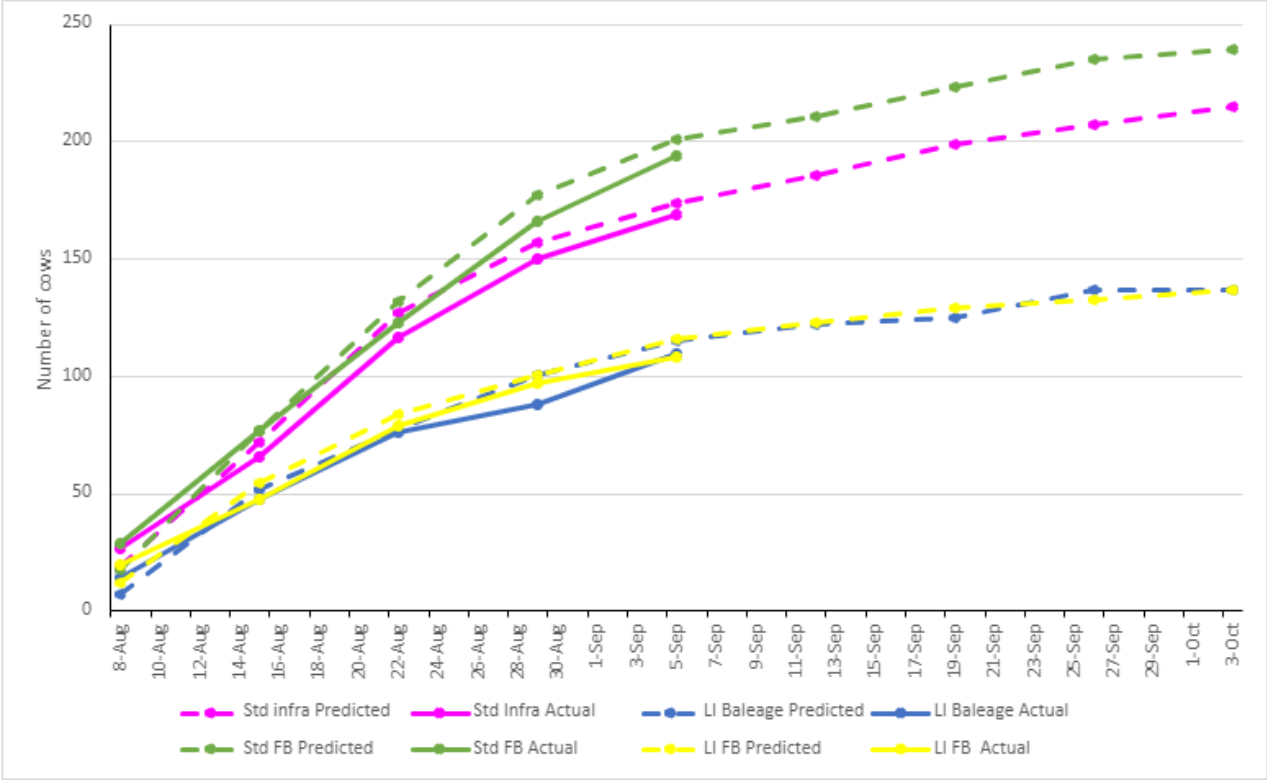

Figure 1. Predicted vs actual cows calved

Feed

Principles of Feed management this week

Feed Quality	Pasture quality for the milkers continues to vary across the farmlets and paddock, and with just under 50% of the farm to still be grazed before the end of the first round, we will see this variable quality coming through for at least another 2-3 weeks. Feed quality going forward will be harder to manage as the number of dry cows reduce and there are less cows to tidy up residuals that haven't been met. To optimize pasture intake pasture allocation has been increased and there is no plan to supplement any of the herds with baleage this week.
Growth Rate	Growth rates continue to soar with the range across the farm being 25-40kgDM/ha/day, this is being helped by the soil temperature now sitting above 10°C. To try and make a dent in the APC with larger milker herd numbers, pasture allocation is to be increased. The graphs below suggest APC is still well above budgeted levels but the content of plantain in the sward may be holding the plate up, therefore showing slightly higher covers than visuals suggest.
Nitrogen Strategy	Effluent applications have started this week with the fantastic weather giving us optimum soil conditions for applications. Paddocks getting effluent currently are paddocks that were grazed last week and are not yet being selected on a LI or Std farmlet basis.

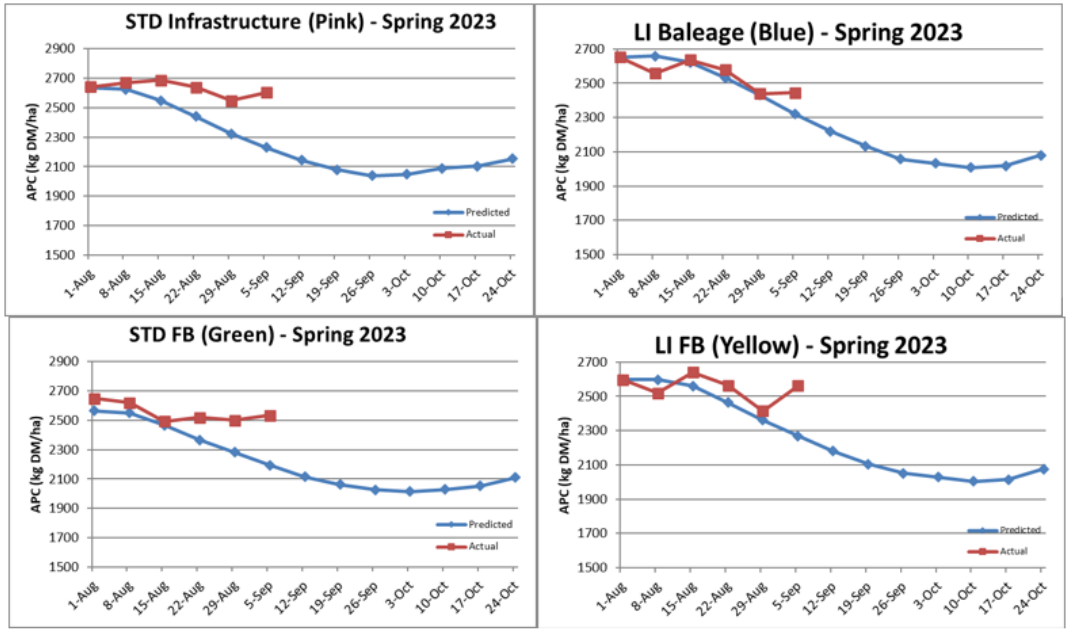

Figure 2. APC tracking in the spring feed budgets

Feed

Figure 3, 4 and 5: We have an abundance of clover across the farm currently. Rather unusual for this time of the year.

Animals

Body Condition Score

BCS assessment was completed on Tuesday 5th across all cows and is sitting where we would expect it to be sitting for this time in the season. There is more of a range in BCS in the standard herds compared to that of the LI herds, however this could be due to the size of the herds. Ideally first and second calvers need to be at 5 BCS at mating so preferential feeding will be used to build condition on any cows that are not tracking well towards target over the next few weeks.

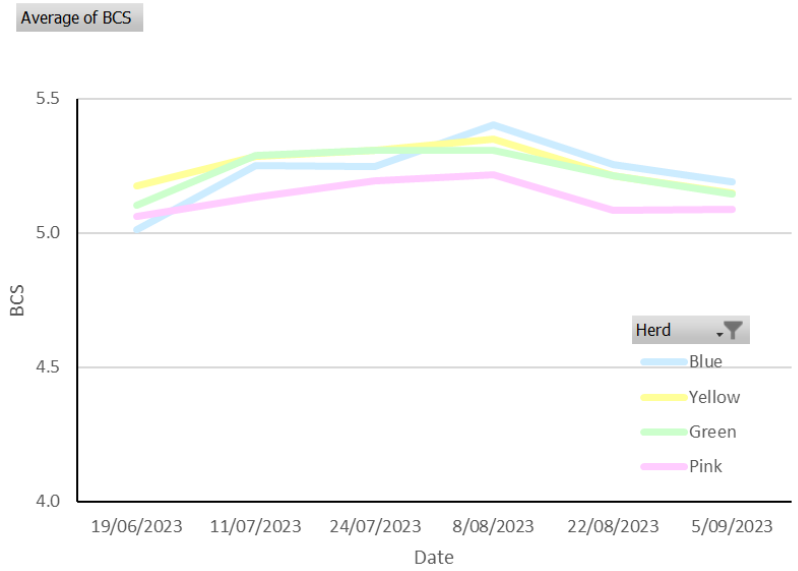

Figure 6: Average herd BCS from the start of the season

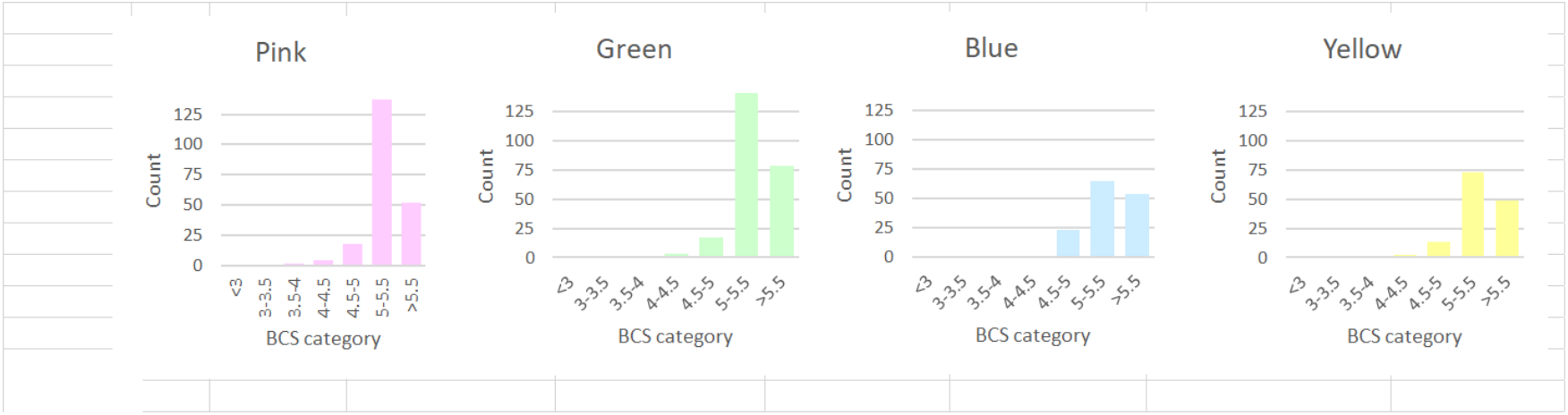

Figure 7: BCS spread across each of the herds at 5th September 2023.