****

**FutureBeef key messages**

**Whole of business management**

1. Record your business plan and vision. Include personal goals for everyone in the business.
2. Keep appropriate records for the different facets of the business.
3. Analyse the business to know your cost of production, turnover, overheads and gross margin. Identify the primary drivers impacting profit and see what can be changed.
4. Develop strategies to capitalise on strengths/ opportunities and manage threats/ weaknesses.
5. Understand the implications of attempting to lift stocking rate above the carrying capacity.
6. Focus on what can be done to sustainably lift and/ or maintain carrying capacity.
7. Seek learning opportunities. Continue to develop knowledge and skills.

**Grazing land management**

1. Manage stocking rate around *Long Term Carrying Capacity* (LTCC) to maintain land condition.

2. Stocking rate is the primary driver of land condition and animal performance.

* *Be flexible*. Adjust stocking rates based on seasonal forage supply. Destock early and be slow to re-stock.
* *Consistently* stocking beyond the capacity of your land drives down land condition and animal performance.
* *Consistently* understocking compromises productivity per hectare.

3. Implement wet season spelling strategies to encourage good land condition. Land in ‘A’ condition is twice as productive as land in ‘C’ condition.

* Spell country in the first 6-8 weeks of the growing season to maintain land condition and maximise seed set.
* Implement a full wet season spell to improve land in fair to poor condition.
* Implement wet season spelling in two or more consecutive growing seasons to recover land in poor condition.
* It is likely that the longer country sits in low condition, the more difficult it is to recover (e.g. reduced seedbank of 3P grasses, reduced organic matter/ cover and hard-seeded weeds are favoured).
1. Measure and understand the performance of pastures/ paddocks throughout the year. Use available pasture growth information specific for location, land type, land condition and tree density, and considering infrastructure (particularly water placement and paddock layout), to benchmark, monitor and manage.

 **Breeding**

1. Develop specific and measurable breeding objectives focused on herd performance and marketing requirements.
2. Select for traits that are heritable, measurable and economically important.
3. Place emphasis on selecting bulls rather than breeders for more rapid improvement in herd performance.
4. Use targeted crossbreeding (heterosis) plus genetic selection to accelerate improvements in herd performance.
5. For genetic progress, use BREEDPLAN EBVs to assess bulls for desired genetic traits.
6. Use young bulls that have passed a VBBSE (veterinary bull breeding soundness examination), including a sperm morphology test.
7. Select females on reproductive efficiency, docility and environmental adaptation.
8. Cull less productive breeders (e.g. fertility, temperament, udder conformation, environmental adaptation…).
9. Manage breeders for condition score 3 or higher (on a scale of 1–5) at calving so they resume cycling soon after calving to maintain a 365-day calving cycle. Body condition at mating has the greatest effect on female fertility.
10. If the wet season fails, you can wean calves down to 100 kg or less if breeder survival and condition is at risk.
11. Manage heifers from weaning to joining to maximise the number at critical mating weight (CMW) at joining - allocate heifers to best paddocks and supplement as needed.
12. Mate more heifers than are needed for replacements in the breeding herd to allow culling for non-performance.
13. Select heifers that conceive early in the mating period. They will be more likely to produce a calf each year.
14. Manage heifers separately from breeders to increase re-conception through better use of paddocks, conservative stocking rates, targeted supplementation such as spike feeding prior to calving, and weaning early if required.

****

**Nutrition**

**Pasture management**

1. Manage stocking rates to ensure that there is sufficient pasture at all times to meet intake requirements.
2. Use grazing strategies that preserve and promote good land condition, 3P grasses and legumes. Remember that land in ‘A’ condition is twice as productive as land in ‘C’ condition, arguably the biggest profit driver for the business.

**Herd management**

1. Understand and monitor pasture nutrient supply and stock requirements throughout the year.
2. Identify the primary limiting nutrient(s) throughout the year for different classes of stock in each paddock and consider the cost–benefit of providing supplements.
3. Avoid long feeding programs because they are very expensive, and are stressful on people, stock, pastures, soils, infrastructure, finances and potential future productivity.
4. Manage breeders for condition score 3 or higher at calving so they resume cycling soon after calving.
5. Use seasonal mating to align peak lactation period with likely higher quality pasture feed.
6. If the wet season fails consider weaning calves early (down to 100kg) to preserve breeder body condition. Dry season tropical pastures in northern Australia do not meet the nutrient requirements of lactating cows.
7. Weaning significantly reduces a breeder’s nutrient requirements for lactation equivalent to the energy in about 2kg of grain or 3kg of fortified molasses each day.
8. Feed good quality hay at all times while in yards and educate weaners for ease of handling throughout their lives.
9. To achieve weight gain in calves under 150 kg, feed supplements that are high in protein and energy.
10. Keep heifer calves retained as breeders growing from weaning to mating.
11. Destock weaner paddocks of all stock (including horses) from the start of the growing season until weaning starts.

**Phosphorus management**

1. Determine the phosphorus status of cattle in all paddocks on the property.
2. Feed phosphorus in the wet season to all stock where soil phosphorus levels are deficient (<5 mg/kg).
3. Test breeders for phosphorus status where soil phosphorus levels are marginal (6–8 mg/kg).
4. From faecal NIRS and phosphorus tests, use the ratio of faecal phosphorus to dry matter digestibility (energy) as a guide to the animal’s phosphorus status and likelihood of a response to phosphorus supplementation.
5. Supplement cattle grazing stylo-based pastures with phosphorus early in the dry season.

**Weaner management**

1. Calves are removed from their mothers mainly for the benefit of the cow.

2. Stopping the need to lactate reduces the cow's nutrient requirement (equivalent to the energy in 2 kg of grain or 3 kg of fortified molasses each day) and allows her to regain condition.

3. Lighter stocking in breeder paddocks maximises the opportunity for the cows to maintain good body condition.

4. The cow needs to have a body condition score of 3 or higher at calving to maximise the chance of getting pregnant again while rearing her calf.

5. A cow must get pregnant within 75 days of calving to produce a calf every year.

6. With seasonal mating, calves are normally weaned at four to eight months of age in late autumn.

7. With continuous mating, calves are at a wide range of ages at the first muster in late autumn; weaning all calves over 100 kg allows the cows to recover body condition and survive the dry season.

8. If the wet season fails, all calves can be weaned younger under both seasonal and continuous mating systems.

9. Hay is the main feed for weaners in the yard. Good quality hay must always be available from day one of weaning.

10. Calves weaned under 150 kg should be fed to gain weight with supplements of highly digestible protein and energy.

11. Determine how much weight heifer calves (to be retained as breeders) need to gain each day from weaning to mating.

12. Weaning is the time for educating young animals to set them up for ease of handling throughout their lives.

13. Weaner education includes being worked calmly through the yards and being tailed out from the yards to the weaner paddock and back.

14. Rest weaner paddocks over the year to accumulate a body of good herbage. Don’t use them as a holding paddock for sale or sick stock, or for the working horses.

**Benefits of early weaning**

* better breeder condition, more conceptions
* less mortality, more and heavier female sales
* lower breeder supplement costs
* more concentrated calving
* more maiden heifers heavy enough to mate

**Extra costs**

* more weaner feeding costs
* more labour for tending small weaners
* increased infrastructure for yarding and feeding