

Using silage as a pasture management tool

Silage Note No.2

Silage can play a key role in all grazing systems, conserving pasture from periods of surplus, so it is available to livestock when paddock feed is short.

Silage is a valuable pasture management tool, helping to maintain pasture quality and improve utilisation during periods of peak growth.

Be clear about your objectives

Making silage offers considerable potential to increase productivity. However, it is critical to plan how silage will fit into the overall grazing management program.

Your key objectives when integrating silage cuts with grazing management should be to:

- Improve pasture utilisation by strategically timing silage cuts to remove surplus pasture
- Maximise total forage production (grazing and silage) during the period of peak pasture growth
- Maximise the quality of both the silage and grazed pasture – the target ME (metabolisable energy) level for temperate pasture should be at least 10 megajoules per kg of dry matter (MJ/kg MD)
- Only cut what is surplus to grazing requirements

Timing the cut

In deciding when to cut silage, your aim should be to optimise the yield and quality of both the silage and the grazed pasture.

One of the most important principles in producing high quality silage is to cut pastures early, when they are at a late vegetative to early reproductive stage of growth.

Although delaying cutting often produces a higher silage yield, silage quality from early cutting is usually higher. Pasture regrowth is also usually greater, which means that total production from the pasture (as both silage and regrowth) is also higher (see table overleaf).

Maturity varies between cultivars and species. This must be taken into account when determining paddock closures and cutting dates.

Removing paddocks from the grazing rotation early involves some risks. For example, there may be a temporary shortage of pasture for grazing if an unexpected weather change slows regrowth. Paddocks closed very early will be ready for cutting early in the silage season when there is a greater risk of unfavourable weather affecting the wilting process.

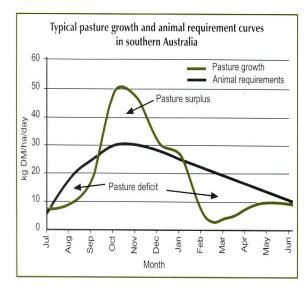
Goals for Successful Silage

- Improve pasture utilisation by timing silage cuts to remove surplus pasture.
- Maximise total forage production during the period of peak pasture growth.
- Maximise the quality of both the silage and grazed pasture.

Potential short-term pasture benefits

Incorporating silage production into your pasture management program has the potential to create a range of short-term benefits:

- Silage cuts reduce the need to slash or mulch surplus and rank pasture during periods of peak pasture growth
- There is anecdotal evidence that early-cut silage, compared to late-cut silage or hay, encourages desirable species such as clover and perennial grasses when the pasture regenerates
- Cutting irrigated pastures for silage, rather than hay, allows watering to recommence sooner. A shorter wilting period for silage means the pasture is less likely to become moisture stressed.
- Cutting lucerne early for silage helps control weeds. The risk of weather damage to the first cut is also reduced when it is cut for silage rather than hay

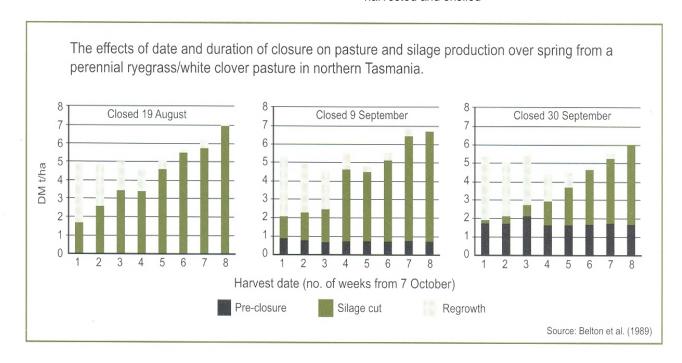




- Regrowth following a silage cut can provide a highquality pasture for grazing animals, free of internal parasites and grass weeds
- When combined with effective grazing management silage production can increase the quality of forage available for grazing on areas of the farm not set aside for producing silage. This is because higher grazing pressure on the balance of the farm maintains the pastures in a productive, or vegetative, phase for longer

Potential long-term pasture benefits

- Silage cuts can influence longer-term changes in the composition of pastures by reducing the competition between species. For example, grasses tend to dominate legumes during periods of rapid growth
- Silage cuts may also influence the seed set of annual species in pastures
- There is clear evidence that silage cuts can reduce the content of some broadleaf weed species in pastures. It is generally assumed that silage making controls these weeds by reducing or preventing seed set, and by sterilising any weed seeds that are harvested and ensiled



The information in this Silage Note is taken from the Successful Silage manual

Disclaimer: The information contained in this publication is based on knowledge and understanding at the time of writing (May 2008). However, because of advances in knowledge, users are reminded of the need to ensure that information upon which they rely is up to date and to check currency of the information with the appropriate officer of New South Wales Department of Primary Industries or the user's independent adviser.

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