

## Making Quality Lucerne Hay using SI-LAC EXTRA<sup>®</sup>.

Production of quality Lucerne hay is a major industry in irrigation areas across Australia. High quality Lucerne hay and chaff is a significant component of balanced diets for stud cattle, dairy and lot feeding industries, and is also a significant input into feed for life-style farmers with horses and various other breeds. Top quality Lucerne will attract the best prices as consumers are prepared to pay extra for Lucerne with higher feed quality with retention of leaf that gives them the best overall result.

Lucerne growers are looking to produce Lucerne that meets their customer's requirements; however the environment can cause grief to growers when hay making conditions are not ideal.

Showery weather and high humidity can cause difficulty with hay making due to the cut being unable to be dried sufficiently to bale in these conditions. Continued turning for drying purposes may result in loss of leaf and quality. In many cases, hay ends up mouldy and of poor quality when eventually baled with higher than desired moisture. Further problems with potential fires can arise if moist hay is baled and stacked.

In addition to this, Lucerne hay is usually low in water soluble carbohydrates (WSC), which unless treated with a lactic acid producing bacterial inoculant results in low production of lactic acid. This causes slower fermentation and higher temperatures in the bales. The end result is a loss of digestible protein.

Using a bacterial inoculant such as **SI-LAC<sup>®</sup> EXTRA** is the ideal solution to help growers maximise the quality of their cut Lucerne.

**SI-LAC EXTRA** aids in reducing heating and decomposition of high moisture hay by eliminating the aerobic, composting and mould causing bacteria that attack high moisture feed.

**SI-LAC EXTRA** is an Australian developed bacterial inoculant containing three different bacteria that create a stable temperature in the baled hay. *Enterococcus faecium* and *Lactobacillus plantarum* start the process, consuming oxygen and reducing the pH. The third bacterium, *Lactobacillus buchneri* is the key one in reducing the heating and keeping the bales cool, consuming oxygen that moulds, yeasts and the various composting bacteria require to do their damage.

A key advantage is that Si-Lac Extra is applied as a freshly growing culture, thus maximizing the speed of action and effectiveness through its ability to rapidly alter the conditions for bacterial growth.



**SI-LAC EXTRA** offers these benefits for Lucerne hay making:

- Allows hay to be made at moisture levels up to 25%.
  - Aids in the reduction of mould by creating low pH levels, unsuitable for growth of mould bacteria.
  - Reduces heating through lowering the pH.
  - Helps maximise quality by retaining leaf through less turning, resulting in a higher leaf to stem ratio.
  - Increases bale weights through retention of leaf.
  - Enables earlier baling, helping with the weather risk.
  - Enables growers to fit in better with contractor's runs.
  - Helps to make quality hay with a higher feed value through a combination of all these points.
  - Rapid curing and cooling helps to retain "green-ness", an important selling point in some markets.
  - By enabling growers to bale sooner, helps in rapid re-growth situations to avoid loss of re-growth when windrows of cut hay cover the growing crop.
  - Reduces mould growth and heating in bales.
  - Will not foul tanks and nozzles – suitable for use with 50 mesh filters.
  - Long tank mix life – once mixed, lasts for 5-14 days depending on temperature.
  - Increases in strength – up to 10 times – once mixed.
- Does NOT contain additives that can cause feed rejection amongst stock.

**SI-LAC EXTRA** can be used when making small square bales, large squares, or round bales.

Good crop agronomy is important to grow quality Lucerne hay. Ensure fertiliser application and pest and weed control results in a cut with optimum quality. Your local Agronomist can help with advice to suit. Use of an inoculant will NOT turn poor quality hay into good quality hay.

### Important Application Guidelines

1. Always read and heed the label. In particular, we strongly recommend you pre-mix the Si-Lac Extra to get the bacterial culture actively growing in the tank prior 12 – 24 hours to application.
2. For best results, **SI-LAC EXTRA** is applied to hay as it is baled. The inoculant mixture is sprayed from a nozzle mounted above the pickup of the baler over the hay after it has been picked up prior to compaction.
3. Ensure that applicators are properly calibrated to deliver the correct amount of **SI-LAC EXTRA** per bale and per tonne.
4. Ensure that all bales are treated. If untreated hay is baled and stacked with **SI-LAC EXTRA** treated hay, the untreated bales may heat and cause the whole hay-stack to catch fire. Refer to 3 above.

The specially developed "**Air-Tech**" **ULV Applicators** or "**Sila-Tech**" **Applicators** available from Grevillia Ag are ideal for application of the inoculant mixture to the hay.

For more information on getting the best out of high moisture hay, contact Grevillia Ag on our customer service number 1300 669 556, or go to our website [www.grevilliaag.com.au](http://www.grevilliaag.com.au)