Increasing kikuyu production in winter

Background

ProGibb[®] SG is a naturally occurring plant hormone called Gibberellic Acid that has been in use in many horticultural and cropping situations over the last 40 years to improve yields. It works by stimulating cell expansion resulting in stem and leaf elongation. Its greatest benefit is, that unlike nitrogen based fertilisers, it is not dependent on soil temperature and responses are rapid (within days) and it's a heck of a lot cheaper!

ProGibb[®] SG works by increasing the growth rates of plants during a time when they are normally in a rest phase (i.e. during winter). There is no value in applying the product in spring as during this time the plants naturally produce their own Gibberellic acid.

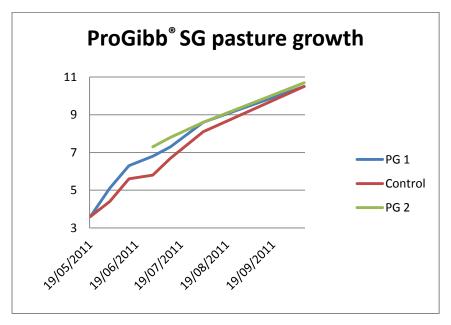
What was done

A replicated trial was set up on Andrew and Tracie Heinrich's property on the 19th May 2011. The pasture was an established kikuyu sub clover mix and at the time the trial was established the pasture base was 30% kike, 50% clover and 20% annual grass.

ProGibb[®] SG was applied with a backpack spray unit at the recommended rate of 20g/ha plus 100 L water/ha. A month later a second application of ProGibb[®] SG was applied to half of each plot. A strip of urea at 100kg/ha was applied across all treatments. The site was monitored for pasture production using a falling plate meter approximately three weekly from May until October 2011.

Results

FIGURE 1: pasture growth rates over time



The results show that the pasture responded rapidly to the applied $ProGibb^{\mbox{\tiny B}}$ SG and maintained the extra growth until October. The second application of $ProGibb^{\mbox{\tiny B}}$ SG initially

resulted in an further increase in growth but by mid August was not producing any more feed than a single application of $\mathsf{ProGibb}^{^{(\!R\!)}}\mathsf{SG}$. There was no recorded response to the additional urea applied. Visually the $\mathsf{ProGibb}^{^{(\!R\!)}}\mathsf{SG}$ treatments had more clover and the clover leaves were larger than the control.

Maximum response occurred a month after application of the ProGibb[®] SG with the treated plots producing an extra 17% more feed, the double application of ProGibb[®] SG produced a staggering 26% more feed.

Take home message

- Gibberellic acid is a safe, cheap and convenient way to increase winter fed growth, but it must be applied early in the season (ideally by late autumn/early winter).
- Applying early in the season will boost winter growth.
- Applying too late can potentially cause a decrease in spring feed production.
- Don't graze the paddock within 3 weeks of application.

For further information contact

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