

Pasture Growth Rate

Satellite technology is being used to measure the growth rate of pastures.



A collaborative project between CSIRO Livestock Industries, Department of Agriculture, Western Australia and the Department of Land Administration is now providing pasture growth rate measures for individual shires across Western Australia.



© NASDA 2001

The Technology

- To measure pasture growth rate, we use a satellite that passes overhead daily.
- Instruments on board measure the reflectance of light from the earth's surface, including vegetation such as pastures.
- We have developed technology to link the satellite measurement to climatic data, to estimate pasture growth rate.

This information, shire by shire, is now available on the web sites:

<http://www.pgr.csiro.au>

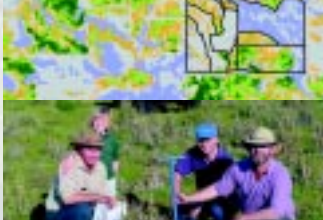
<http://www.agric.wa.gov.au>



- In WA, the technology has been validated against paddock measurements over the past 5 years.
- It is currently being verified across southern Australia.

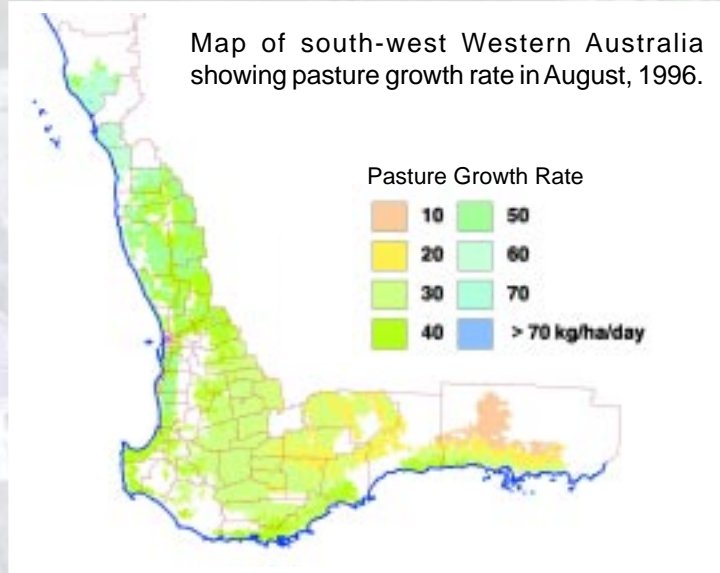


Pastures from Space

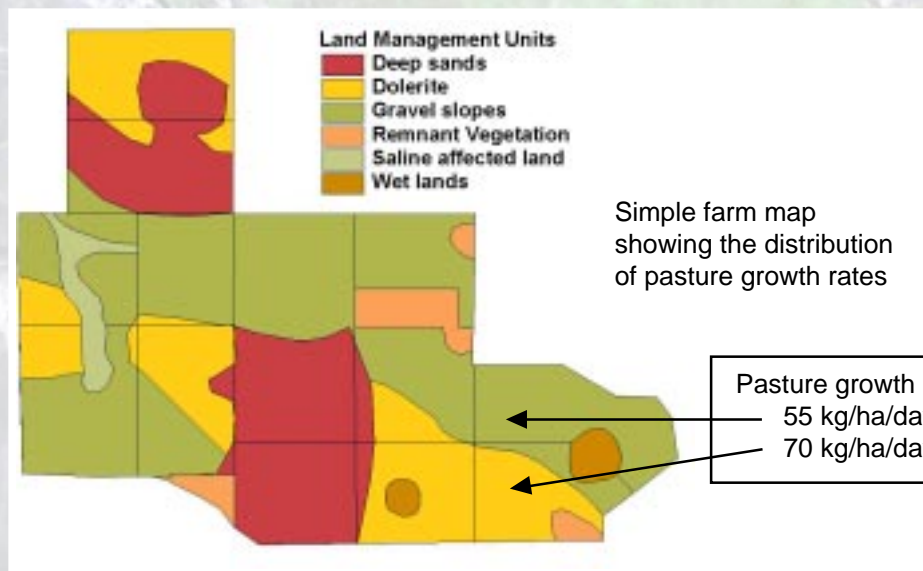


Pasture Growth Rates on Paddocks

Large scale maps can be produced showing different pasture growth rates represented by varying shades of colour.



This can then be scaled down to show variation within regions, districts and even individual farms and paddocks. This farm and paddock level information will be available in 2002.



Example of a simple feed budget using pasture growth rate

	Paddock 1	Paddock 2
Pasture Growth Rate	55 kg/ha/day	70 kg/ha/day
If each animal eats 1.2 kg/day		
Number of animals that could be maintained at current pasture growth rate	45	58

For further information please contact:
 Dr David Henry,
 CSIRO Livestock Industries
 Ph (08) 9333 6000; Fax (08) 9387 8991
 Email: pgr@ccmar.csiro.au

Dr Chris Oldham,
 Department of Agriculture, Western Australia
 Ph (08) 9368 3511; Fax (08) 9367 8078
 Email: coldham@agric.wa.gov.au