

# There are three Basic problems with Australian soils!

There are actually **four BASIC** problems with most of Australian soils but three will do for the moment.

The three most pressing imbalances are **soil acidity or low pH, calcium deficiency and depletion of organic carbon**. In a little more detail these are:

## 1. Soil acidity or low pH

Many Australian soils, particularly those along the Eastern States, are now acid to the point where essential nutrients including phosphorus, are locked up and unavailable to most plants except the weeds. Also the essential soil biology required for a healthy productive growing medium has become compromised and inactive. Apart from a few well known species most plants thrive in a soil environment with a pH of 6 to 6.8. Now we know there must be only one perfect soil but you can get your present pH of 4.5 to 5.5 up to 6 + by a simple application of lime.

Unfortunately the nature of the product has prevented many from using lime because the dust generated by conventional spreading means your neighbours got the best of your lime and contract spreaders need large tonnages to come to your property.

“Soil acidity is a major problem in many areas. It is considered Australia's biggest soil problem”.

Don Burke (1)

## 2. Calcium deficiency

Fifty years ago a renowned soil scientist Dr William Albrecht showed how correcting the mineral balance improved the physical structure. Both Calcium and Magnesium are essential nutrients for plant growth but Calcium is taken up far more than Magnesium. After many years of depending on chemical fertilisers which contains almost no Calcium, your soil is no doubt depleted of Calcium and the Ca: Mg ratio which should be up around 6:1 is around 2.5 :1 or worse. That means there is a perfectly logical chemical reason why you have heavy puggy soils. The full benefit of added Calcium is not achieved in soils that also have a Boron deficiency, so that is a very important trace element to include in any lime based product.

“Calcium is the trucker of all minerals and boron is the steering wheel”.

Gary Zimmer (2)

### 3. Depleted Organic Carbon

In a healthy soil, not even the perfect soil, there are 10 tonnes of vibrant biology per Ha down to the limit of root growth. There is now a chronic shortage of organic matter in most Australian soils. The average would be around 1 or 2 % when our best soils started last century at about 36% when the Darling Downs and the Liverpool plains started growing crops for over 50 years continually without added fertiliser. Wise farmers are now realising the loss of organic Carbon has been a significant loss to the productivity of their property and cannot be replaced by chemical inputs.

**So for a landholder to begin the process of building balance back into their soil, it is simply a matter of going “back to The Basics”**

## **THE BASICS** ..... an AUSTRALIAN FIRST.....

is a product that solves all these problems and more:

- ❖ Contains **SUPERFINE LIME** (contains 67% of which is less than 75microns). It is well recognised that the finer the lime, the faster and the better the response to lime, wherever it contacts the soil.
- ❖ Contains a **100% ORGANIC BASE** which encapsulates the lime into a **high Carbon pellet**.
- ❖ **No loss of lime and Calcium** in all weather conditions. Spread it in a gale.
- ❖ Spread with your **own spreader** when you want at the rate you choose and can afford.
- ❖ **Contains Boron** which helps to ensure the Calcium does it's job of making most other nutrients available to all plants.
- ❖ Helps to ensure the **release of locked up Nutrients and Fertilizers** in your soil. To make them available as required for the crop or pasture you are growing.
- ❖ Improves the **Calcium : Magnesium ratio** for better soil structure and biological activity.
- ❖ Can be spread through spinners, Vicon type applicators, planters, droppers, air seeders and bulk spreaders.
- ❖ High integrity 4mm diameter pellets ensure **uniform spreading pattern**
- ❖ Available in **30kg, bulk bags and true bulk**.

#### References:

- (1) "Putting Acid on your land", Queensland Smart Farmer, October/November 2010, p. 12.
- (2) The Biological Farmer, 2000, Acres USA , Publishers

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