

<b>Trial #</b>	6
<b>Location</b>	Oamaru
<b>Province</b>	Canterbury
<b>Farm Type</b>	Beef and Sheep
<b>Product Trial</b>	FPF v/s Granular
<b>Date</b>	1994 - 1995

**Introduction:** Six different treatments were **replicated** (4x) and dry matter responses to the different fertiliser treatments/application methods compared. Plot size was 4m x 4m. Fertiliser was applied on 30/11/1994. Dry matter was assessed electronically and measured for 11 months. Pasture mineral levels were assessed in December 1995.

**Treatments:**

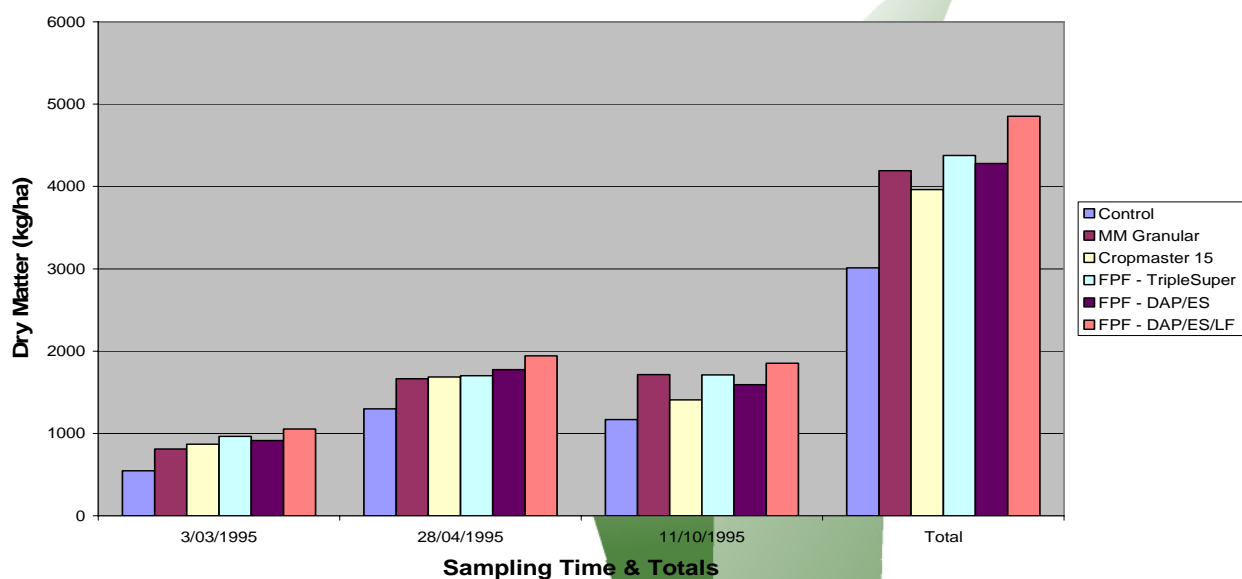
1. Control
2. MM Granular blend (284kg/ha)
3. Cropmaster 15 (125kg/ha)
4. FPF - TripleSuper (50kg/ha)
5. FPF – DAP, Elemental Sulphur + minerals (50kg/ha)
6. FPF – as above + Limeflour (25kg/ha)

**Results:**

Treatments	Dry Matter Production (kg/ha)			Total	Increase (%)
	3/03/1995	28/04/1995	11/10/1995		
Control	545	1299	1169	3013	0
MM Granular	811	1665	1716	4192	39
Cropmaster 15	870	1687	1406	3963	32
FPF - TripleSuper	965	1703	1710	4378	45
FPF - DAP/ES	914	1775	1592	4281	42
FPF - DAP/ES/LF	1054	1943	1855	4852	61

Applying fertiliser in FPF form enhanced the DM response. The FPF blends were applied at significantly lower application rates than the granular blends but produced higher DM responses. Adding LF to the FPF enhanced the response i.e. from 42% to 61%.

### Harrison Trial - Dry Matter Response



**Herbage samples** were collected from Treatments 1,2,3 & 6. Despite the fact that the FPF treatment produced more dry matter, the herbage results from this treatment were equal or slightly better than the other 3 treatments assessed. The exception was sulphur, which was highest in the granular treatments (2 & 3) which both contained significant sulphur levels.

Herbage Analysis					
	Units	Control	MMGran	Crop 15	FPF - ES/LF
<b>N</b>	%	1.8	2.4	2.3	2.5
<b>P</b>	%	0.33	0.4	0.38	0.39
<b>K</b>	%	2.4	3	2.7	2.9
<b>S</b>	%	0.13	0.35	0.17	0.19
<b>Ca</b>	%	0.53	0.65	0.65	0.73
<b>Mg</b>	%	0.15	0.19	0.18	0.19
<b>Na</b>	%	0.06	0.06	0.04	0.07
<b>Fe</b>	mg/kg	54	74	64	83
<b>Mn</b>	mg/kg	86	87	103	90
<b>Zn</b>	mg/kg	18	21	22	22
<b>Cu</b>	mg/kg	9	10	9	9
<b>B</b>	mg/kg	8	9	8	11
<b>Mo</b>	mg/kg	3.43	1.37	3.75	2.71
<b>Co</b>	mg/kg	0.05	0.04	0.08	0.08
<b>Se</b>	mg/kg	0.18	0.09	0.1	0.15
<b>I</b>	mg/kg	0.13	0.19	<0.05	0.18