



## STRAWBERRIES

### (Western Oregon--West of Cascades)

Good management is essential if optimum fertilizer responses are to be realized. These management practices include use of recommended varieties and disease-free plants; selection of adapted soils and sites; disease and insect control; weed control; irrigation, etc.

It is of particular importance that the soil be sampled and tested before the establishment of a new planting.

After harvest fertilizer applications are recommended for established strawberry plantings.

With irrigation, apply fertilizer about August 1 and follow with irrigation.

Without irrigation, apply fertilizer about August 1 or within one month after harvest is completed.

Follow recommended soil sampling procedures to insure satisfactory fertilizer recommendation. Your county agent can provide you with instructions on correct soil sampling.

#### NITROGEN (N)

1. Apply 30 to 40 lbs. N/A at planting time. Double this rate of N when a heavy sod crop or straw has just been turned under.
2. Apply another 30 to 40 lbs. N/A in mid-July to mid-August of the planting year. In bearing fields (irrigated), apply 30 to 40 lbs. N/A about August 1.

Without irrigation--10 lbs. N/A applied as a urea spray may aid N utilization. The urea solution should not contain more than 45 lbs. of urea (46% N) per 100 gals. water.

Spring applications of N on bearing fields are recommended only when plants have suffered from winter injury. Apply 15 to 20 lbs. N/A.

#### PHOSPHORUS (P)

Strawberries have shown marked response to P on some soils.

P fertilizer should be banded on both sides of the row. Bands should be 3 to 4 inches from

plants and 4 to 6 inches deep when planting or at the edge of the row when rows are trimmed following harvest.

At planting or in August on established stands:

If OSU soil test for P reads (ppm):	Band this amount (lbs/A) $P_{25} \times 0.44 = P$	
0 to 15	100-120	44-53
15 to 45	60-100	26-35
over 45	40-60	18-26

The P content of fertilizer is expressed as the oxide ( $P_{25}$ ) on fertilizer labels. Multiply  $P_{25}$  by 0.44 to convert to P.

#### POTASSIUM (K)

In new plantings rates of  $K_2O$  up to 60 lbs/A should be banded with N and P after planting. Any  $K_2O$  above the 60 lbs/A rate should either be broadcast or banded or side dressed no later than August. Some growers prefer to broadcast the entire K recommendation prior to planting.

If OSU soil test for K reads (ppm):	Apply this amount (lbs/A) $K_2O \times 0.83 = K$	
Below 75	100-120	83-100
75-175	80-100	66-83
over 175	40-80	33-66

The K content of fertilizer is expressed as the oxide ( $K_2O$ ) on fertilizer labels. Multiply  $K_2O$  by 0.83 to convert to K.

#### SULFUR (S)

The fertilizer program should include an annual application of at least 15 to 20 lbs S/A. S is contained in some of the fertilizer materials used to supply N and P.

#### MAGNESIUM (Mg)

Applications of Mg are recommended when Mg soil test values are below 1.0 me Mg/100g.

Trial applications of Mg are suggested when Mg soil test values are below 1.5 me Mg/100g.

BORON (B)

B should be broadcast and worked into the soil prior to planting.

B or borated fertilizer should never be banded.

If OSU soil test for B reads (ppm):	Apply this amount of B (lbs/A):
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Below 0.5	1 1/2-2
0.5 to 1.0	██████████

With a soil test value below 1 ppm B, an annual maintenance application of 1 lb. actual B/A should be made with B being broadcast or applied as a foliar spray.

LIME

Strawberries are fairly tolerant of soil acidity and have a comparatively low lime requirement.

If the soil pH is below 5.4 and calcium (Ca) is less than 5 me/100g, an application of 1 to 1-1/2 T/A lime or dolomite lime may be desirable.

Lime or dolomite lime should be applied a year or more before planting and worked into the soil. Lime should not be applied directly to existing strawberry fields.

If recent lime or dolomite applications have been made, the K application should be increased by 60 to 90 lbs K<sub>2</sub>O/A.

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P, K, lime, B, and Mg recommendations are based on soil test values from the Soil Testing Laboratory, OSU, Corvallis, Oregon

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