

New N-Cal Application for Peanuts

In the past, TETRA recommended applying N-Cal[®] liquid calcium on peanuts through irrigation water from two weeks after emergence until mid bloom. Although this is the most proven application method, we have added a new application method for growers who prefer not to inject N-Cal into their irrigation water. Our new recommendation is to apply N-Cal **pre-emergence** with or without herbicides at planting. Research studies in Texas and field data from Georgia and New Mexico support an early application of N-Cal in peanuts.

Calcium deficiencies in peanuts will result in lower yields and poor nut quality. Uptake of calcium by peanuts is unique; the nut takes up calcium directly from the soil as opposed to by absorption through the roots and shoots. Because of this process, adequate available calcium in the top 4 inches of soil (or pegging zone) is needed for healthy pod development and top yields.

Recently completed research at Stephen F. Austin State University has shown that N-Cal calcium applied pre-emergence will remain in the pegging zone of peanuts throughout pod development and will supply the calcium needs to the pod. In this study, twenty gallons of N-Cal per acre was applied broadcast to the soil surface and irrigated with up to 12 inches of water. Adequate calcium was retained in the top 5 inches of the soil to supply the needs of peanuts during pod development.

In Georgia, where N-Cal has been applied pre-emergence for two years, improved grades and yields have been recorded. Two years of field testing in New Mexico where N-Cal was applied in a band has shown a return of from \$4.60 to \$10.00 for every dollar spent on N-Cal.

Ease of Operation:

- Can use existing equipment,
- Can be tank mixed with herbicides and pesticides, and
- Can be banded, reducing costs.

Other Benefits of Applying N-Cal at Planting:

- Promotes reduced crusting of the soil, improving stands,
- Promotes better water infiltration, and
- Supplies calcium to germinating seedlings at crucial times.

Rates and Timing Options:

- New* • Apply 10 to 12 gallons per acre of N-Cal in a 14- to 16-inch band at planting, or
- New* • Apply 20 gallons per acre as a broadcast spray at planting, or
- Apply 20 gallons per acre through irrigation water from two weeks after planting to early bloom.

Cautions:

- Be sure to start with a clean tank, and
- Do not mix N-Cal with sulfates or phosphates.

