



Stabilizing UAN

(Liquid Nitrogen, Nitrogen Solution, N Sol)

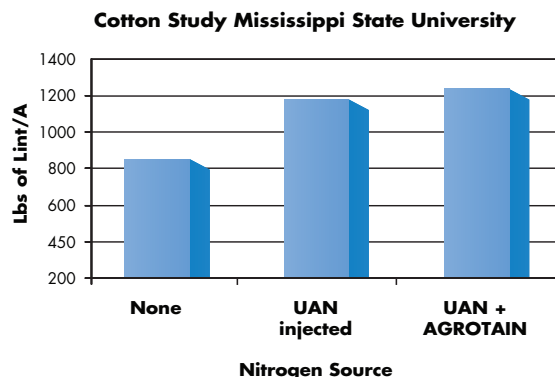
UAN is urea-ammonium nitrate solution. It can be injected, coultered, dribbled, or spray-applied to the soil. Contrary to popular belief, UAN is subject to volatilization loss. The urea portion of the fertilizer is already in the liquid state and can start volatilizing once applied to the soil. AGROTAIN controls ammonia volatilization of UAN for up to two weeks.

An N-15 field study evaluating UAN placement and AGROTAIN effects on cotton nitrogen use efficiency was conducted by Dr. Jac Varco at Mississippi State University in 2005. Data was collected to compare UAN subsurface injected, UAN surface dribbled and UAN surface dribbled with AGROTAIN. The AGROTAIN treatment showed:

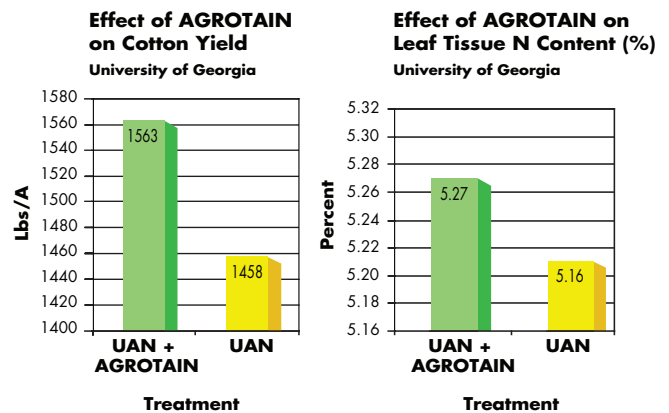
- the greatest total N uptake;
- the greatest N-15 recovery; and
- the greatest percent N derived from fertilizer.

AGROTAIN's ability to control ammonia volatilization and produce results similar or better than UAN injected offers farmers new options. Applying AGROTAIN treated UAN on the surface can save farmers time, fuel and equipment wear.

The following graph shows cotton yields comparing AGROTAIN treated UAN, UAN injected, and no nitrogen. AGROTAIN treated UAN was significantly greater than no nitrogen at the .05 level. There was no significant difference between dribbled AGROTAIN treated UAN and UAN injected.



The following graphs show results of a cotton study conducted by Dr. Glenn Harris, University of Georgia.



AGROTAIN treated UAN percent leaf tissue nitrogen content and yield were greater than UAN. Both of these charts again indicate that AGROTAIN improved nitrogen use efficiency. The data suggest that surface applying AGROTAIN treated UAN is a valuable side dress nitrogen option, can be faster, and may be an economical choice.

The above cotton studies and other university studies show that AGROTAIN is effective in reducing nitrogen loss by ammonia volatilization. This is supported by farmers' successful use of AGROTAIN with urea and UAN to improve their nitrogen efficiency. AGROTAIN is easy to use and is cost effective. AGROTAIN will cost approximately 3 to 4 cents per pound of N, or less than \$2.45 per acre for 60 units of N.

Protect your nitrogen investment with a proven product – AGROTAIN.

Jimmy D. Johnson
AGROTAIN International
P.O. Box 1888
Collierville, TN 38017
Phone 901-853-3506
jjohnson@AGROTAIN.com

Joe Duck
AGROTAIN International
801 Manassas Court
Brentwood, TN 37027
Phone 615-661-0998
jduck@AGROTAIN.com

One Angelica Street
St. Louis, Missouri 63147
Phone: (314) 241-9531
Fax: (314) 241-1819
Toll free: 1-888-425-8732
www.agrotain.com

