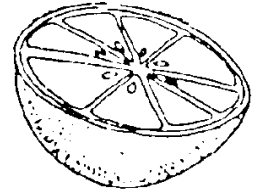




UC
CE

University of California Cooperative Extension • Tulare County



Citrus Notes

November 2002

Citrus Field Day

Thursday, December 12, 2002

10:00 A.M.

Lindcove Research & Extension Center

22963 Carson Avenue

Exeter, CA

Sponsored by

Lindcove Research & Extension Center

UC Cooperative Extension

Citrus Research Board

Continuing education credit requested

CITRUS CLONAL PROTECTION PROGRAM FRUIT DISPLAY AND PRESENTATION

Dr. David Gumpf U.C. Riverside Department of Plant Pathology

SATSUMA MANDARIN RIND BREAKDOWN

Observations of this condition have been made throughout the county beginning early the week of November 11 and it appears to be occurring both here in the valley as well as in other areas of the state. Affected areas on the rind are those facing away from the trunk and generally on fruit on the outside of the tree canopy. The affected areas on the fruit take on a dark- brown to black color with portions of the affected rind collapsing in some cases, with the area generally less firm to the touch. It appears that the condition was not observed prior to the rain of November 7-10. *Alternaria* as well as other fungi have been isolated from affected fruit, so it is not entirely clear as to the cause of the breakdown. *Alternaria* spp. has been isolated from

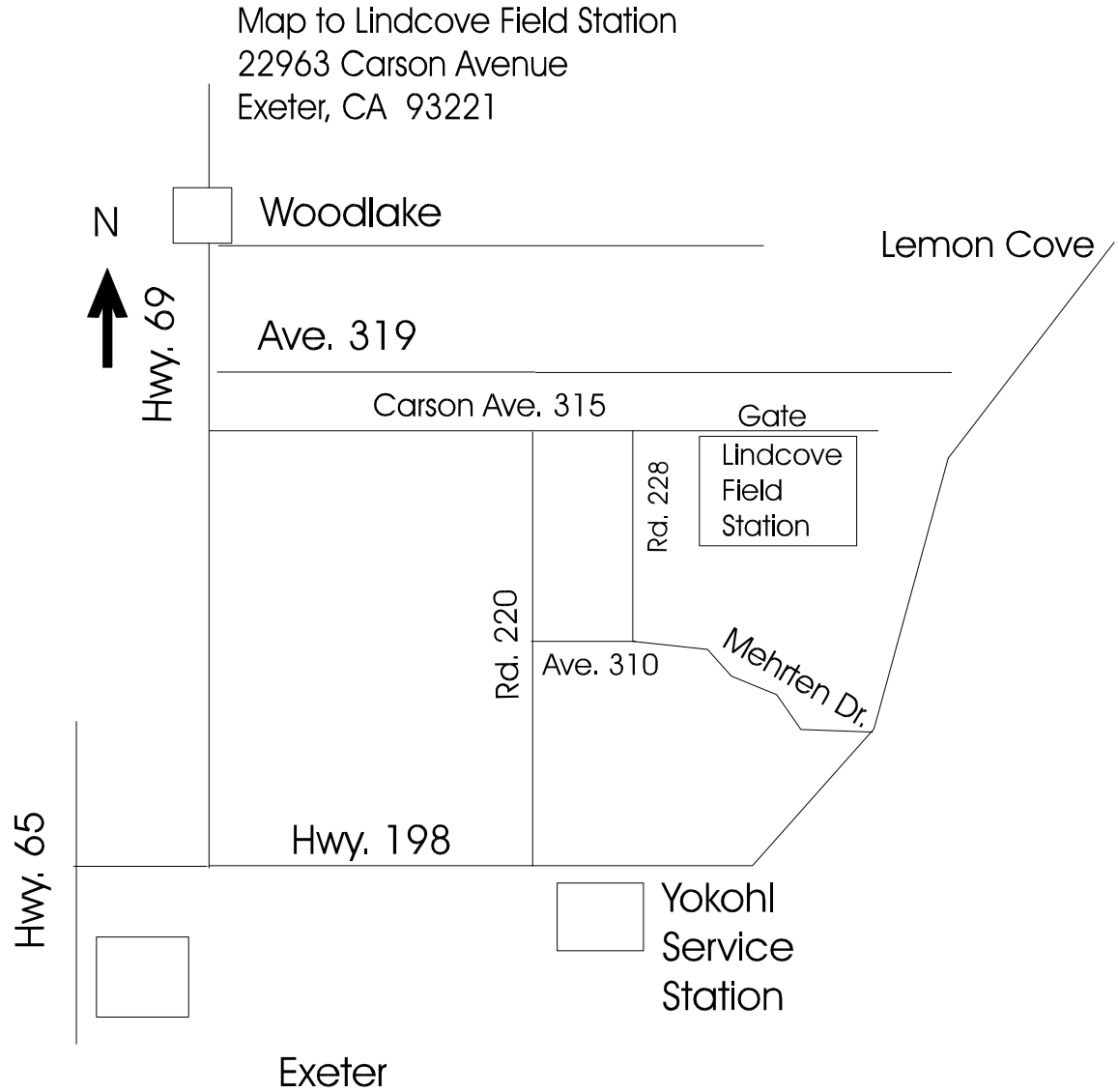
satsuma exhibiting rind problems in recent years. Abound fungicide (Syngenta) has just been registered for use on citrus for *Alternaria*. Prior to their merger with Syngenta, Zenceca had a registration for Abound. Rind breakdown is being seen in tangelos as well; it appears that the condition is similar to the one in satsumas.

NITROGEN MANAGEMENT

Results from recent research by Drs. Lund and Arpaia on the impact of nitrogen application to citrus provide some guidance on fertilizer application for this next crop. Results indicate an increase in yield with an increase in applied nitrogen up to 1-1/2lbs. of N per tree. Leaf N levels increased with increasing levels of nitrogen applied. Treatments included foliar only, soil only

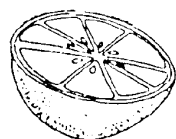
(fertigation using single, split or continuous with each irrigation) and a combination of foliar and soil. Nitrogen moving below the rootzone tended to increase with increasing amounts of applied nitrogen. Lowest leachate was obtained with foliar only treatments, highest leachate with soil only

applications. With soil only application, the highest leachate was obtained when the total nitrogen was applied in a single application. Foliar only applications tended to have lower yields. Analysis of the data is still being conducted, at which time additional interpretations may be possible.



University of California
Cooperative Extension
Tulare County
4437-B South Laspina Street
Tulare, California 93274

Presorted Standard
Postage & Fees Paid
USDA
Permit No. G-00268



Citrus Notes

Citrus Field Day
Thursday, December 12, 2002

Neil O'Connell
Farm Advisor

The University of California prohibits discrimination against or harassment of any person on the basis of race, color, national origin, religion, sex physical or mental disability, medical condition (cancer-related or genetic characteristics), ancestry, marital status, age, sexual orientation, citizenship, or status as a covered veteran (special disabled veteran, Vietnam-era veteran or any other veteran who served on active duty during a war or in a campaign or expedition for which a campaign badge has been authorized). University policy is intended to be consistent with the provisions of applicable state and federal laws. Inquiries regarding the University nondiscrimination policies may be directed to the Affirmative Action Director, University of California, Agriculture and Natural Resources, 300 Lakeside Drive, 6th Floor, Oakland, CA 94612-3560. (510) 987-0096.