

Evaluation of MaxIn and NuRoot Fertility Supplements for Yield Enhancement in Dark Tobacco

2007 – Murray, KY

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MaxIn / NuRoot in Dark Tobacco

Experimental Methods – Murray, KY

- Objective: Evaluate the effect of MaxIn/NuRoot foliar applications on yield and quality of dark fire-cured tobacco.
- Location: MSU West Farm, Murray, KY
- Randomized complete block design with 4 replications
- ‘Narrowleaf Madole LC’ dark tobacco set June 5
 - 40” rows, 32” in-row plant spacing (4900 plants/A)
 - 4-row plots, 40 ft. long, data collected from center 2 rows
- Foliar applications made July 3 and July 27
 - Broadcast at 15 gal/A, all 4 rows treated
- Data collected:
 - Plant vigor/phytotoxicity approximately 7 days after each applic.
 - Fire-cured yield and quality grade index

MaxIn / NuRoot in Dark Tobacco Treatments – Murray, KY

Treatment	Compound	Rate/A	No. of Applications
1	Untreated Control	0	0
2	MaxIn	1.5 pt/A	2
3	NuRoot	2 qt/A	2

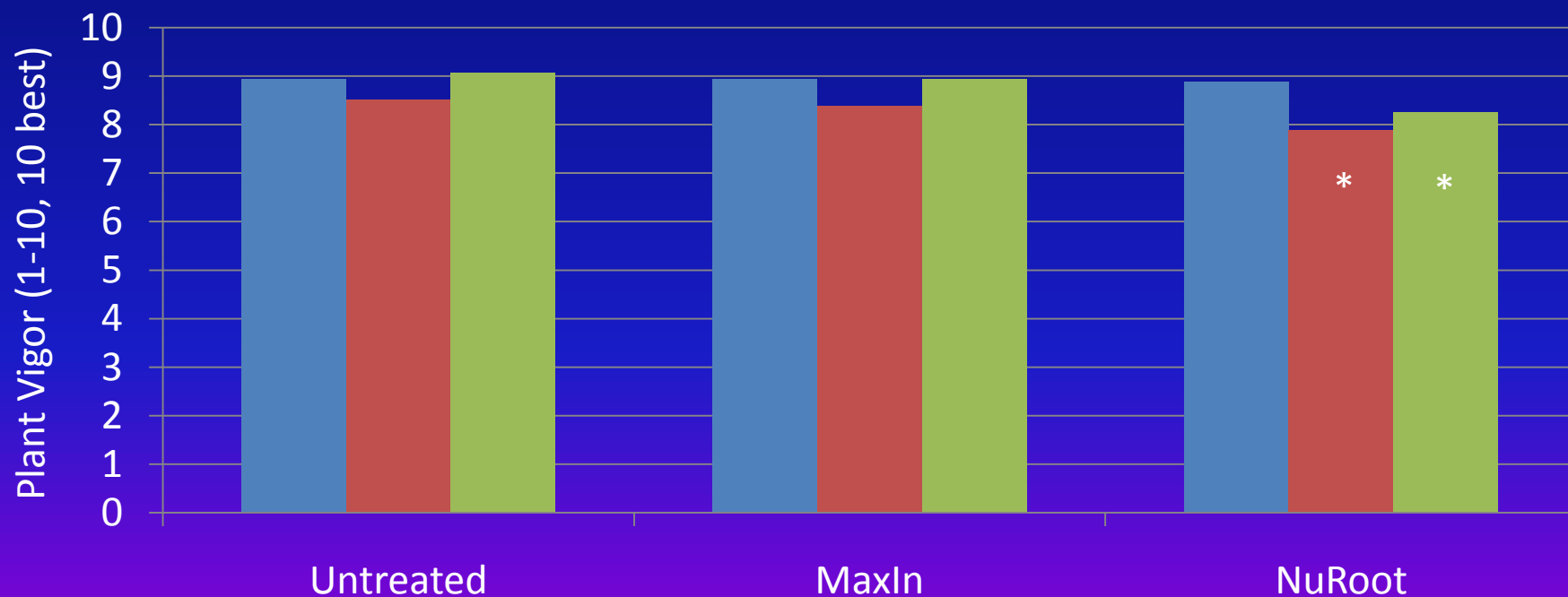
*First application made July 3, second application made July 27.

MaxIn / NuRoot in Dark Tobacco – 2007, Murray, KY

Tobacco Plant Vigor Ratings Through Season

*No obvious phytotoxicity detected at any rating.

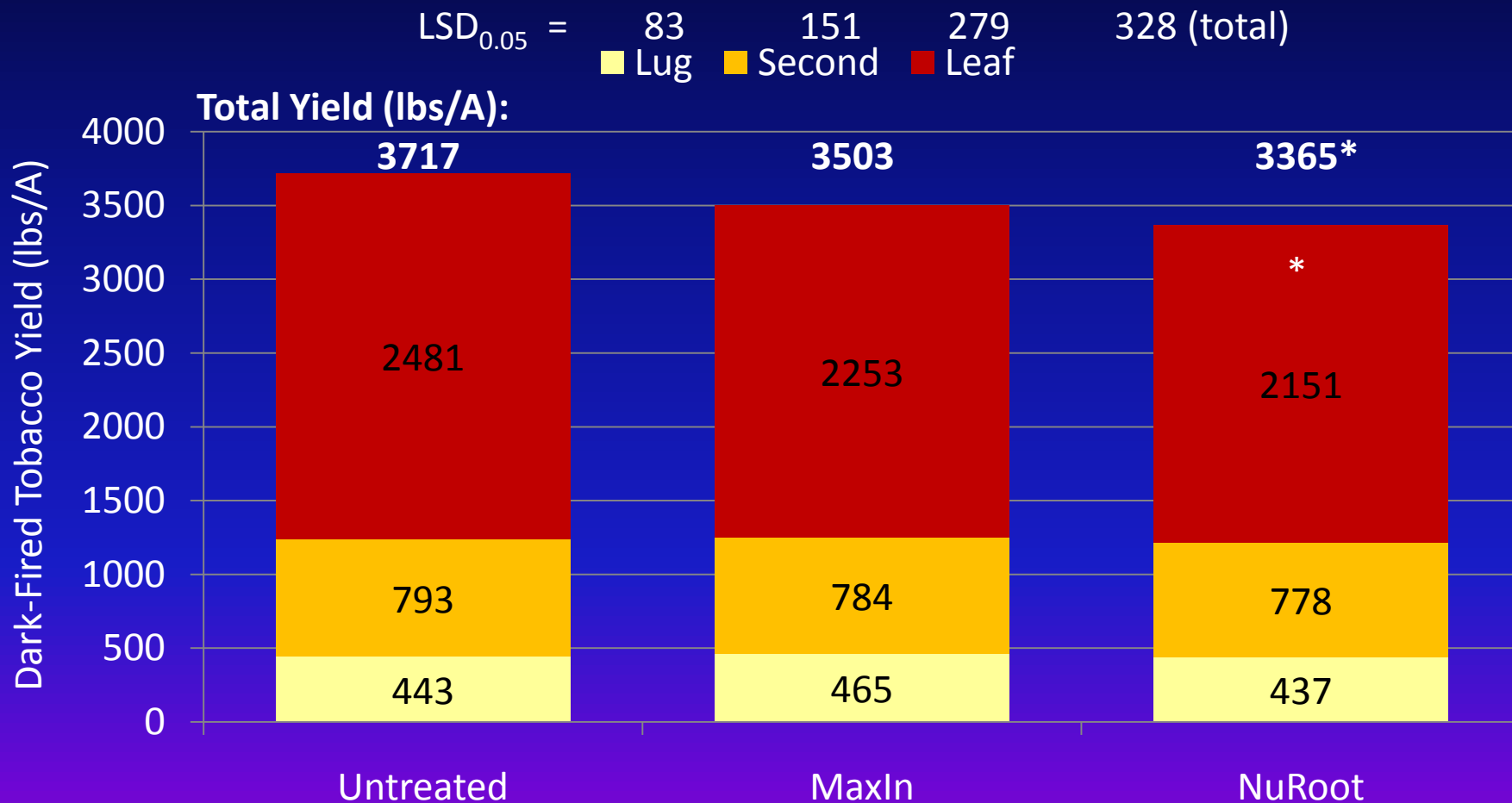
- Plant Vigor 1 (July 18), LSD(0.05)=0.64
- Plant Vigor 2 (August 9), LSD(0.05)=0.56
- Plant Vigor 3 (September 19, preharvest), LSD(0.05)=0.44



*Significant reduction in plant vigor from NuRoot at 2nd and 3rd rating.

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Dark-Fire Cured Tobacco Yield

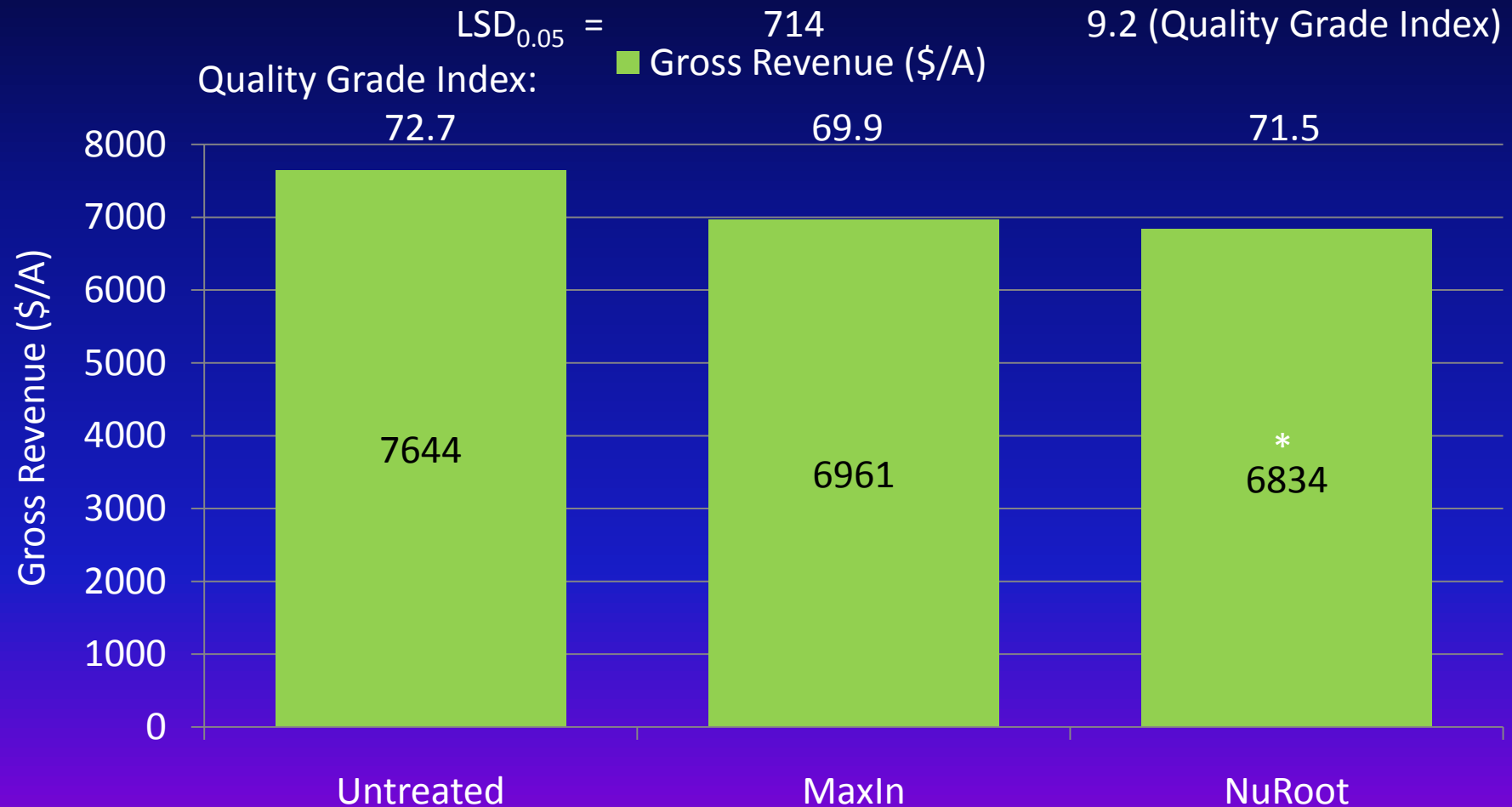


*Significant reduction in leaf yield and total yield from NuRoot

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Quality Grade Index and Gross Revenue/A*

*Grade Index and Gross Revenue based on 2004 USDA Grade and Price Support for Type 23 Western Dark-Fired Tobacco.



*No significant difference in grade index, significant reduction in gross revenue/A from NuRoot.

MaxIn / NuRoot in Dark Tobacco – 2007, Murray, KY

Trial Summary

- Significant reductions in tobacco plant vigor was detected from NuRoot applications at second and third evaluations.
- Leaf yield and total yield was also significantly reduced in tobacco that received NuRoot applications.
- No significant effect on quality grade index, but gross revenue/A was also significantly reduced in tobacco that received NuRoot applications.