

Weed Control Update in Processing Tomatoes

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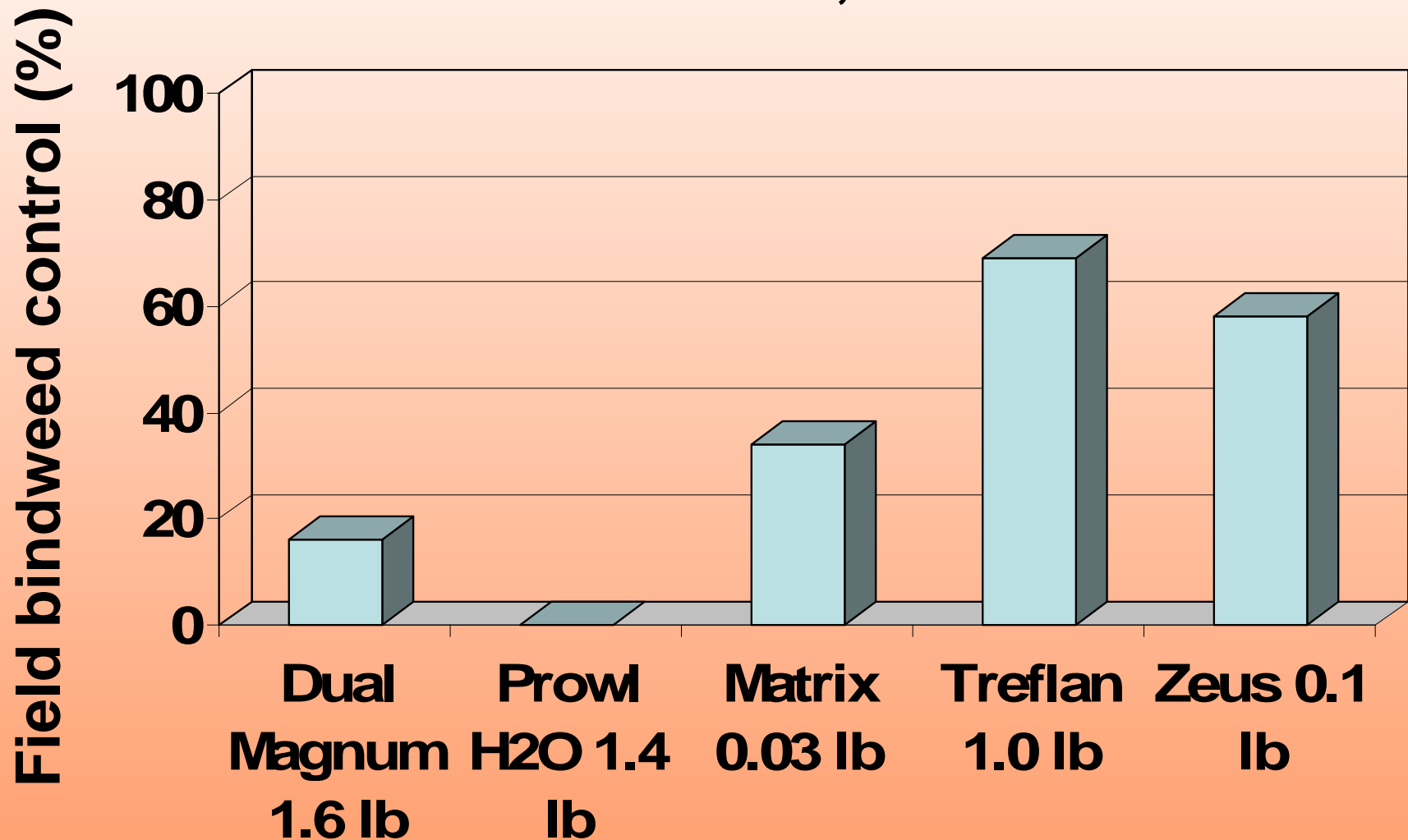
Treatments in 2011

<u>Treatment</u>	<u>Timing</u>	<u>Rate (lbs/ac)</u>
• Dual Magnum	PRE	1.6
• Prowl H ₂ O	PRE	1.4
• Matrix	PRE	0.03
• Treflan	PRE	1.0
• Zeus	PRE	0.1
PRE herbicides+ Matrix	POST	0.03
PRE herbicides + Shark	POST	0.031
• Matrix	POST	0.03
+ Matrix	POST (20 day interval)	0.03
• Shark	POST shielded	0.031
• Shark	POST shielded	0.031
+ Shark	POST shield (20 day interval)	0.031
• Treflan	PRE	2.0
• Untreated		

Background population

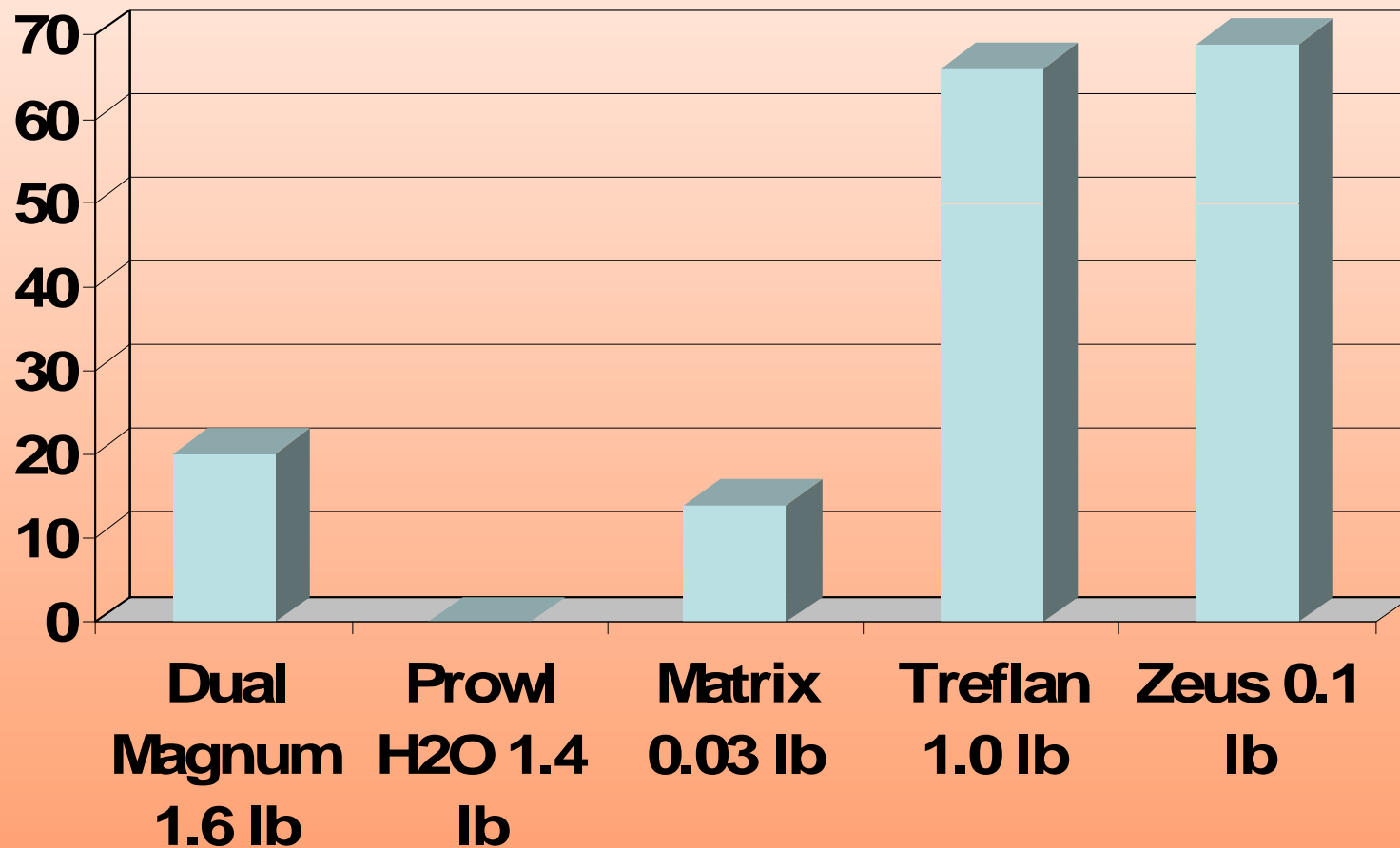


Field Bindweed Control (%) on June 7, 2011

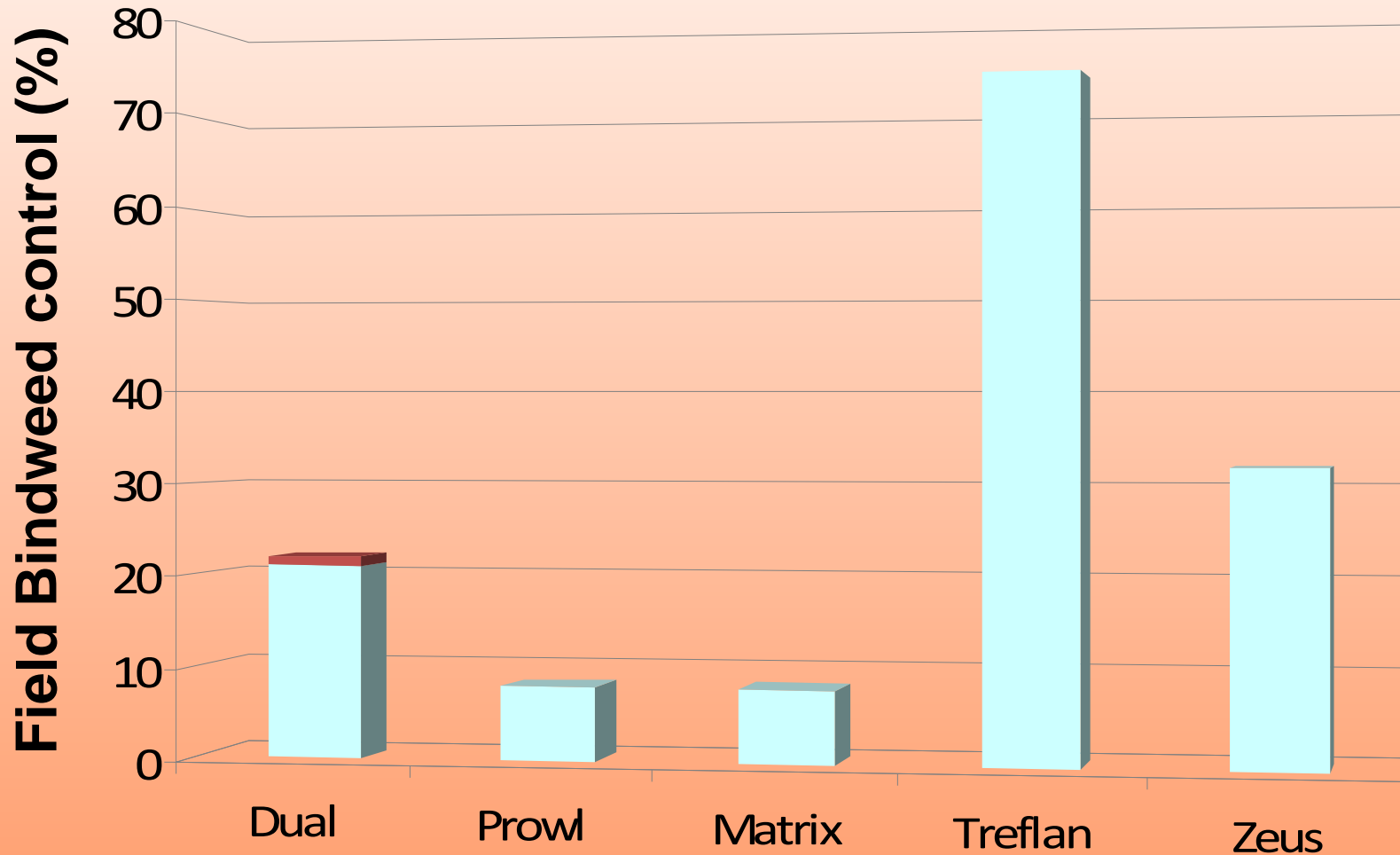


Field Bindweed Control (%) on June 21, 2011

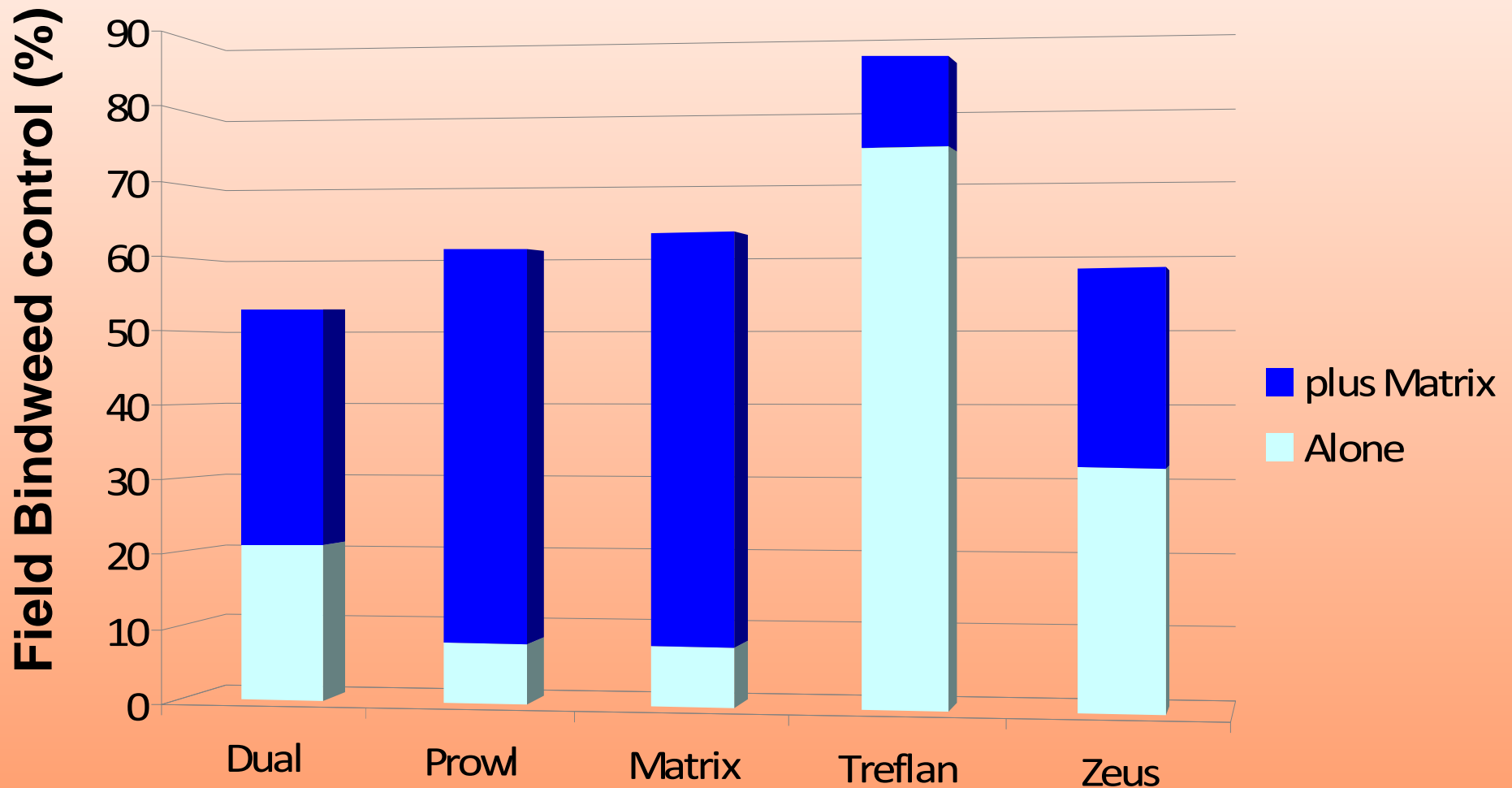
Field bindweed control (%)



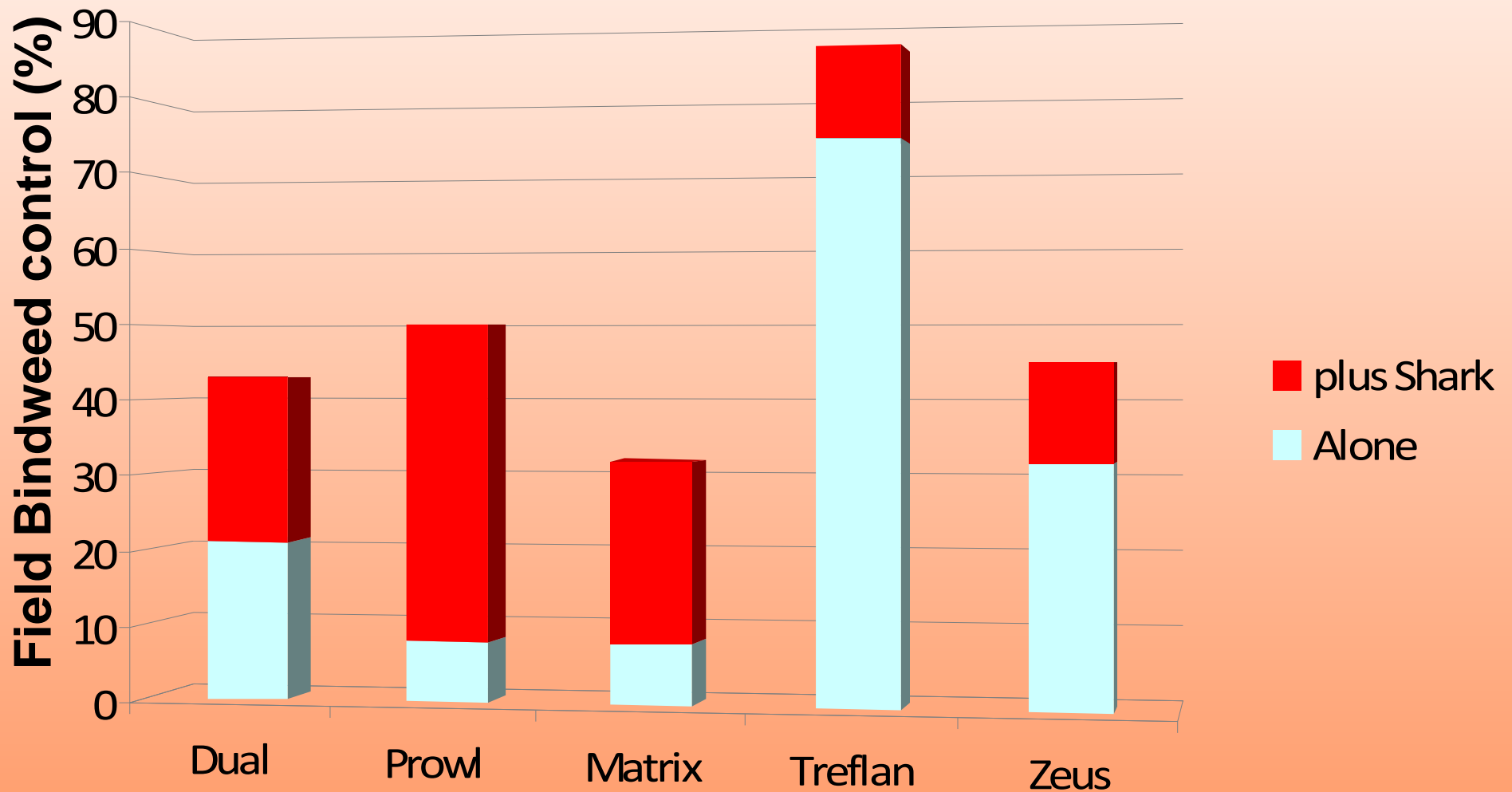
Field Bindweed control (%) on July 13, 2011



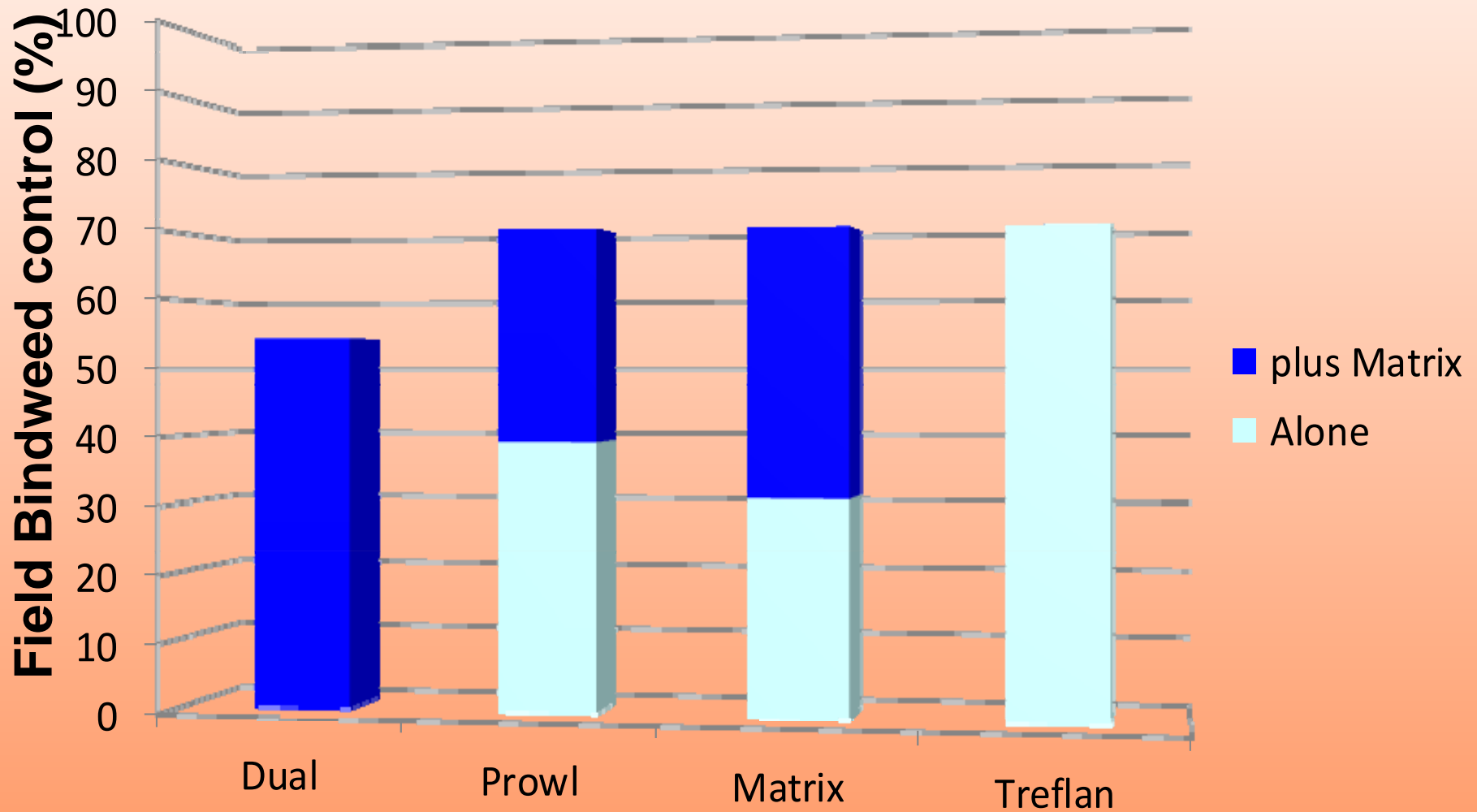
Field Bindweed control (%) on July 13, 2011



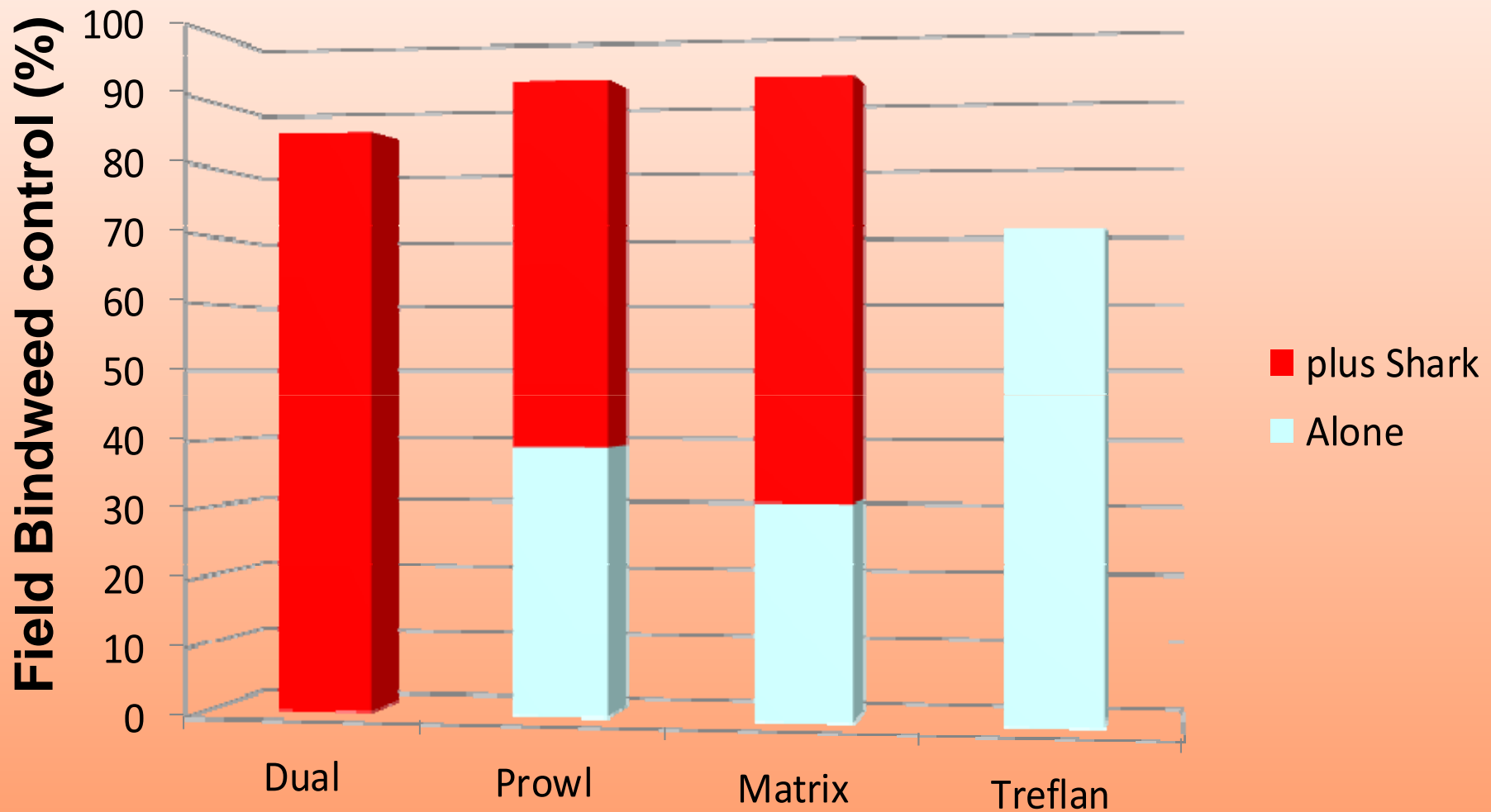
Field Bindweed control (%) on July 13, 2011



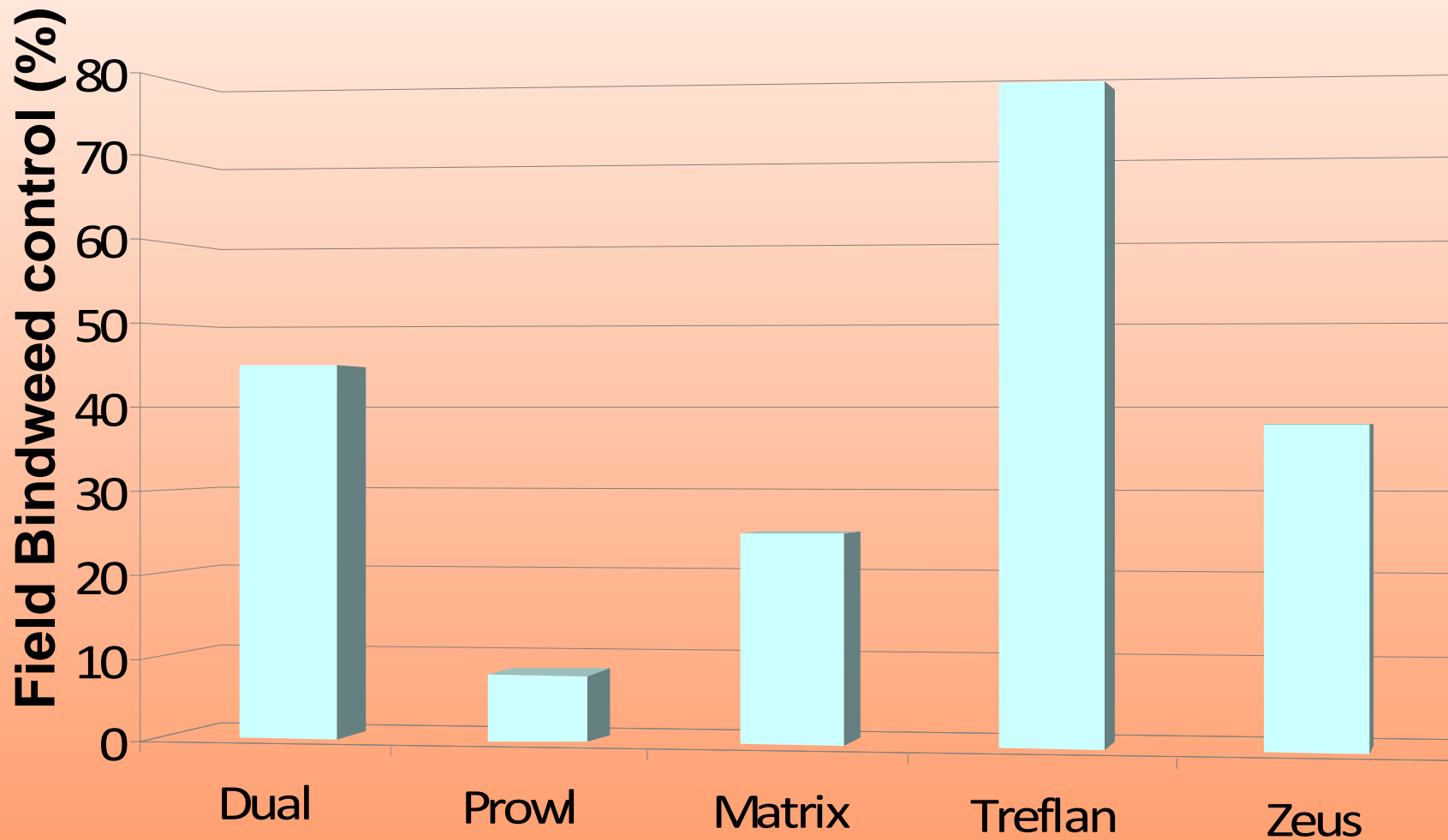
Field Bindweed control (%) on June 23, 2010



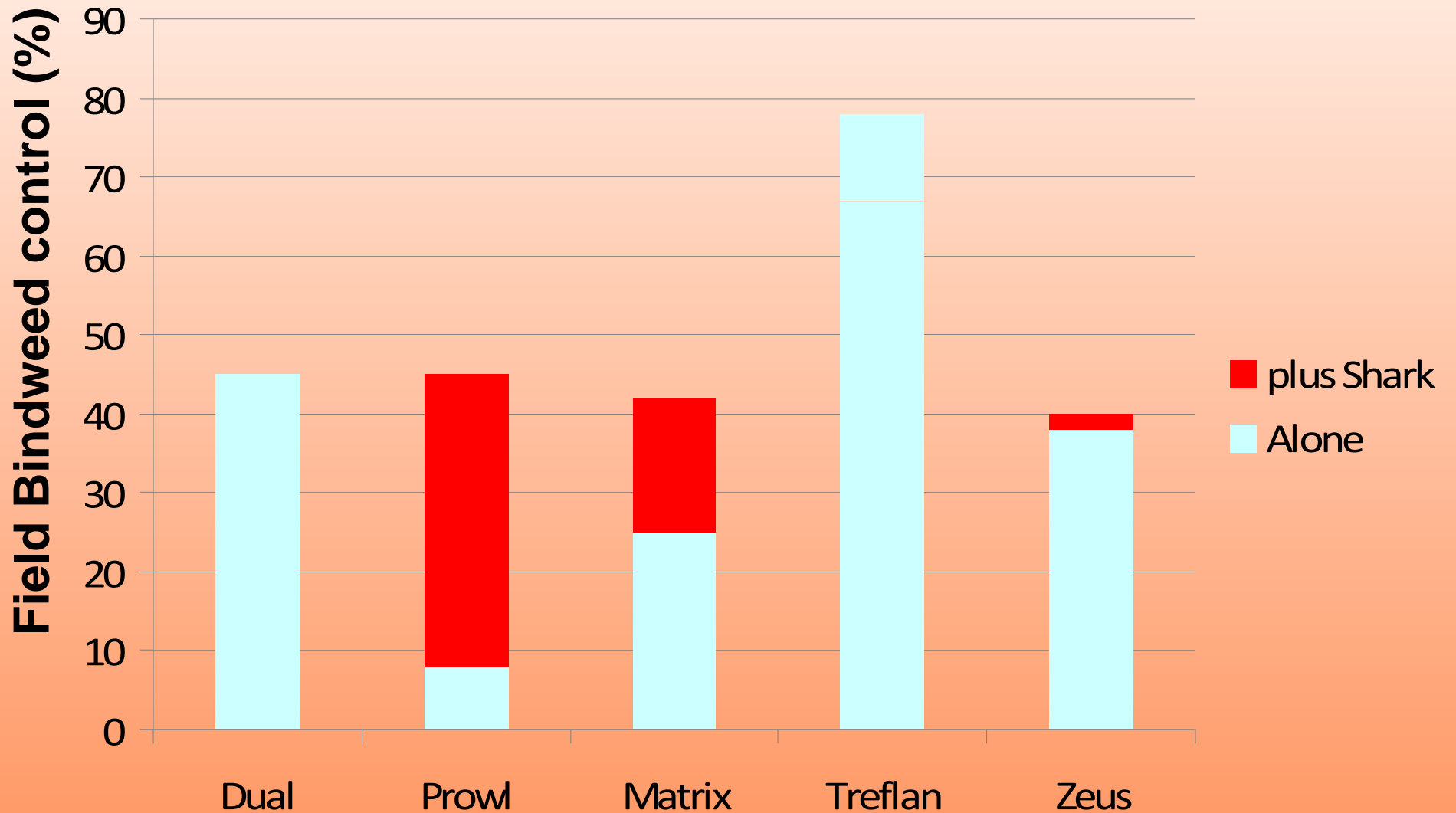
Field Bindweed control (%) on June 23, 2010



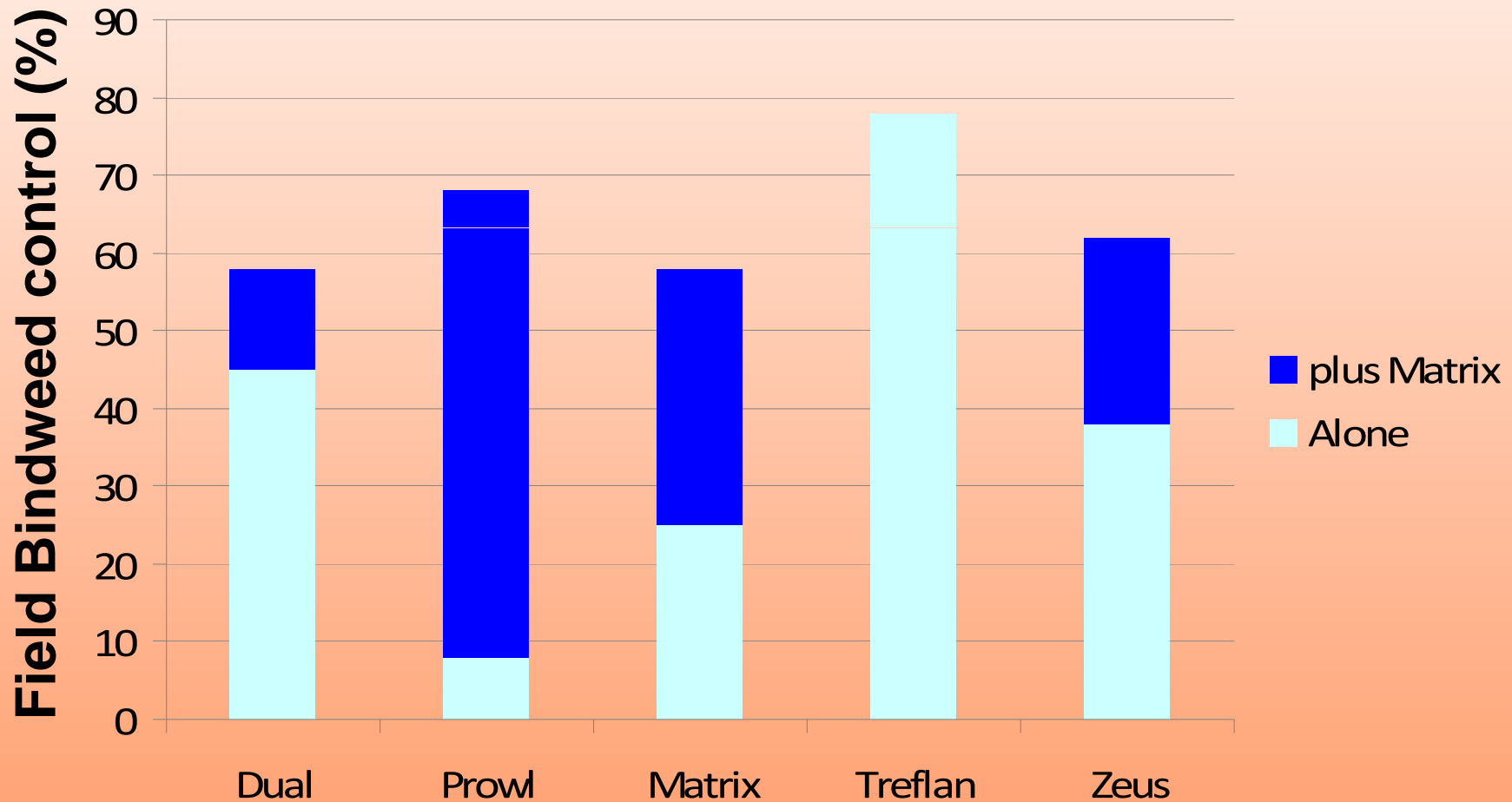
Field Bindweed control (%) on Oct. 12, 2011



Field Bindweed control (%) on Oct. 12, 2011

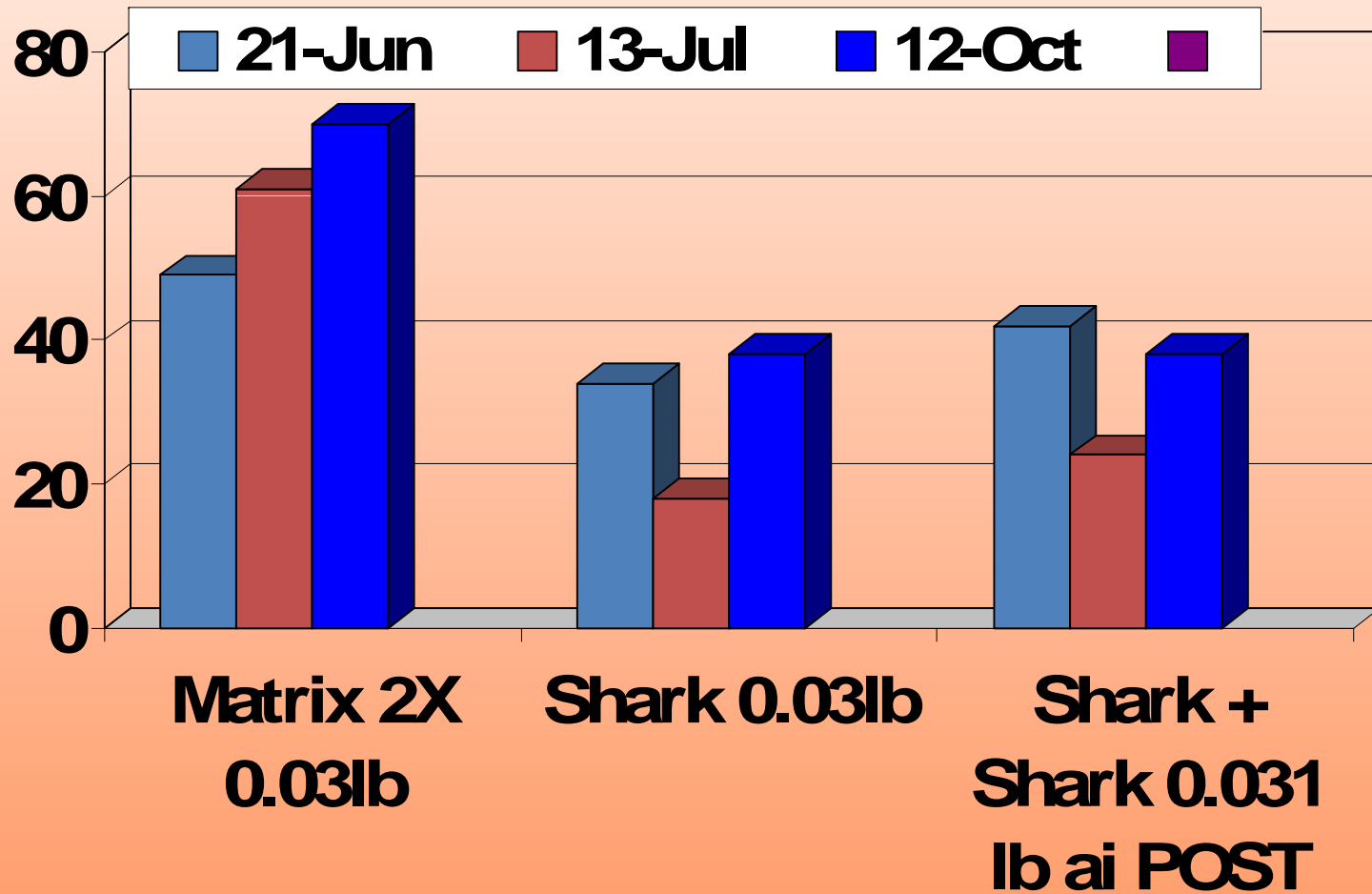


Field Bindweed control (%) on Oct. 12, 2011

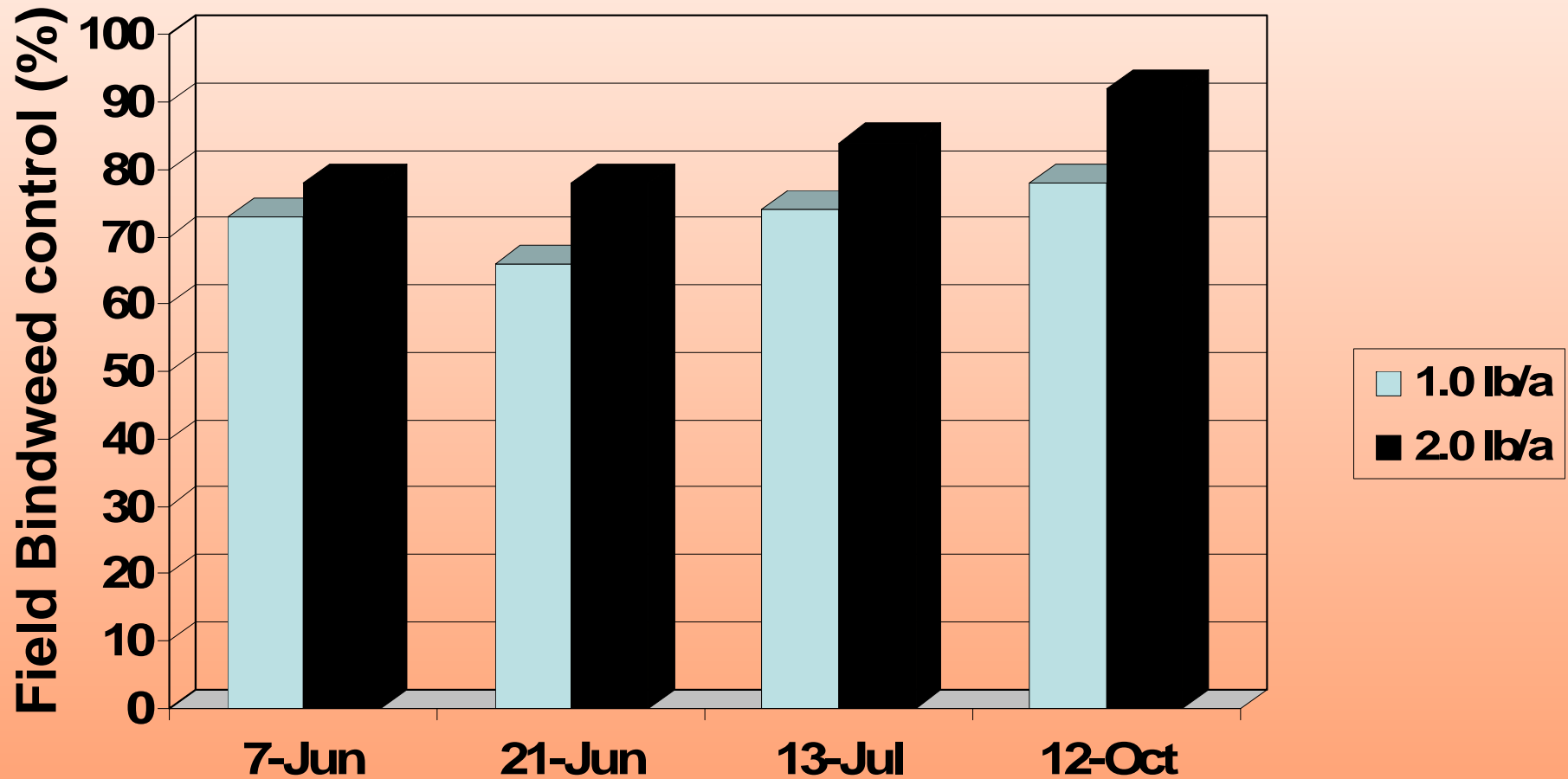


Field Bindweed Control (%) following POST treatments

Field bindweed control (%)



Field Bindweed Control (%) at Two Rates of Treflan





Dual Magnum 1.6 lbs/acre

A photograph of a tomato field. The plants are arranged in rows, with some showing signs of stress or damage. The soil is light brown and heavily cracked, indicating dry conditions. The text 'Prowl H2O 1.4 lbs/acre' is overlaid in the center of the image.


Prowl H₂O 1.4 lbs/acre



Matrix PRE 0.03 lb/acre

A photograph of a field with rows of green tomato plants. The soil is light brown and heavily cracked, indicating dry conditions. A white line, possibly a marker or a small stream, runs across the top of the image. The text "Treflan 1.0 lbs/acre" is overlaid on the left side of the image.

Treflan 1.0 lbs/acre

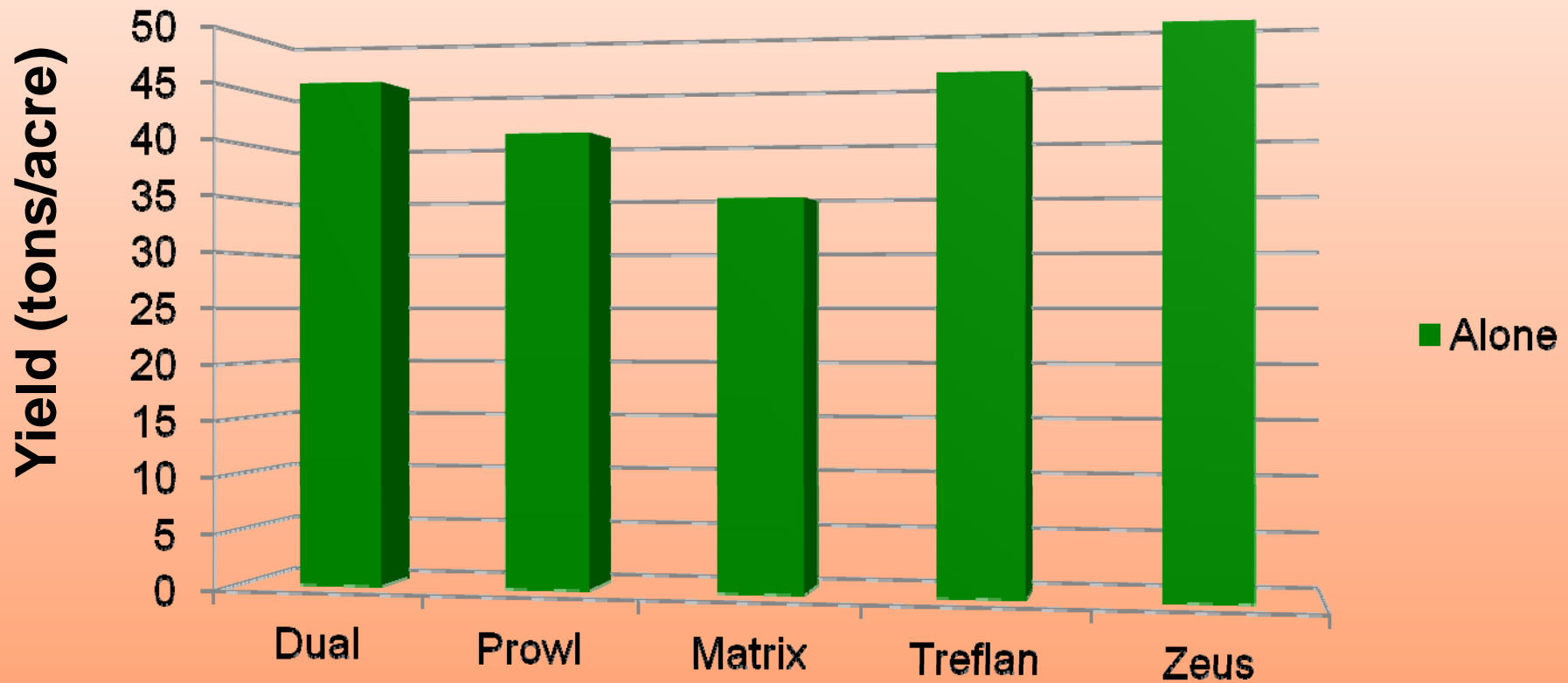
A photograph of a tomato field. The soil is light brown and heavily cracked, indicating dry conditions. Several rows of green tomato plants are visible, spaced out across the field. The plants appear to be in the early stages of growth. The text 'Treflan 2.0 lbs/acre' is overlaid on the left side of the image.

Treflan 2.0 lbs/acre

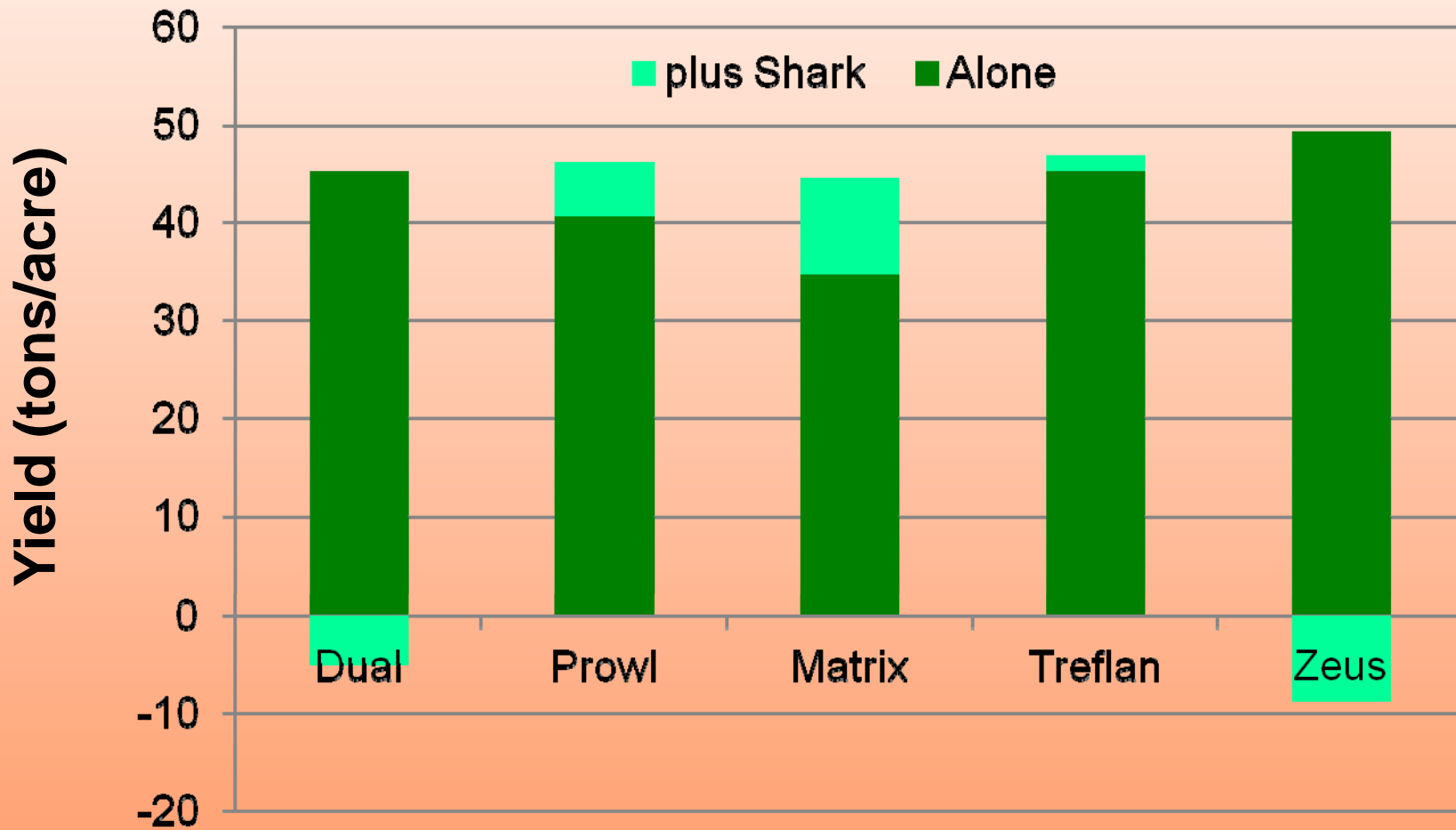


Zeus 0.10 lb/acre

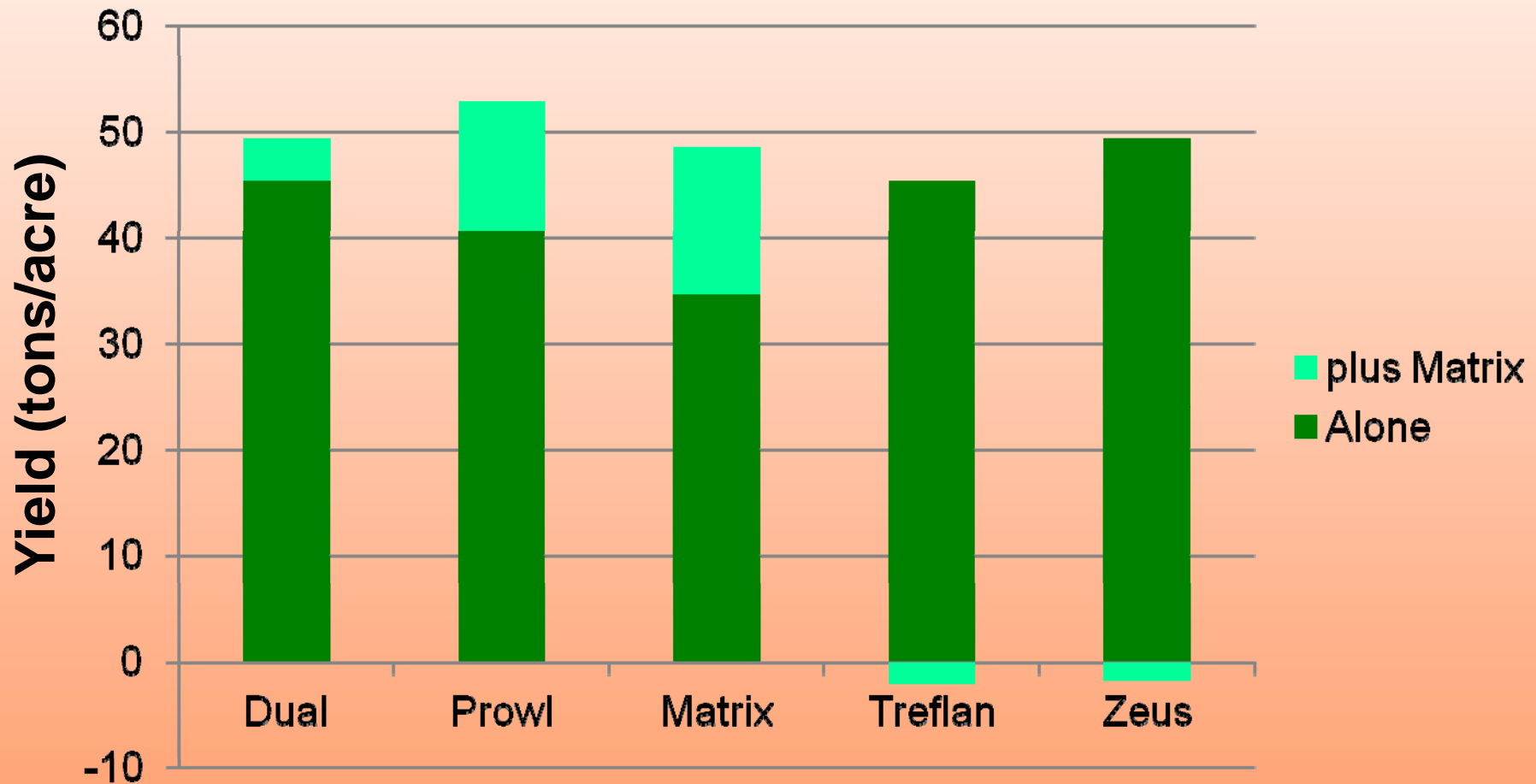
Tomato Yield (tons/acre) on Oct. 12, 2011



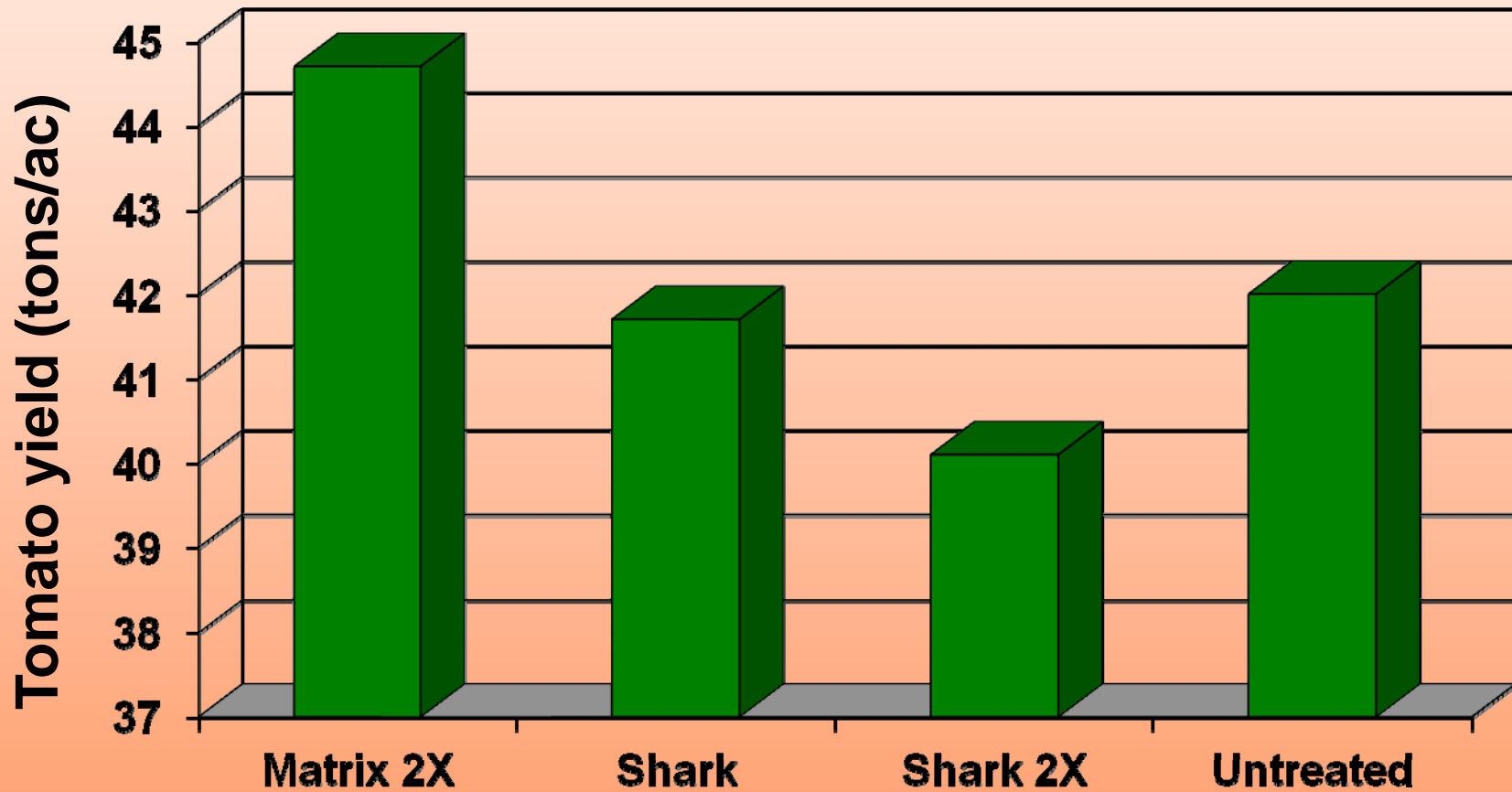
Tomato Yield (tons/acre) on Oct. 12, 2011



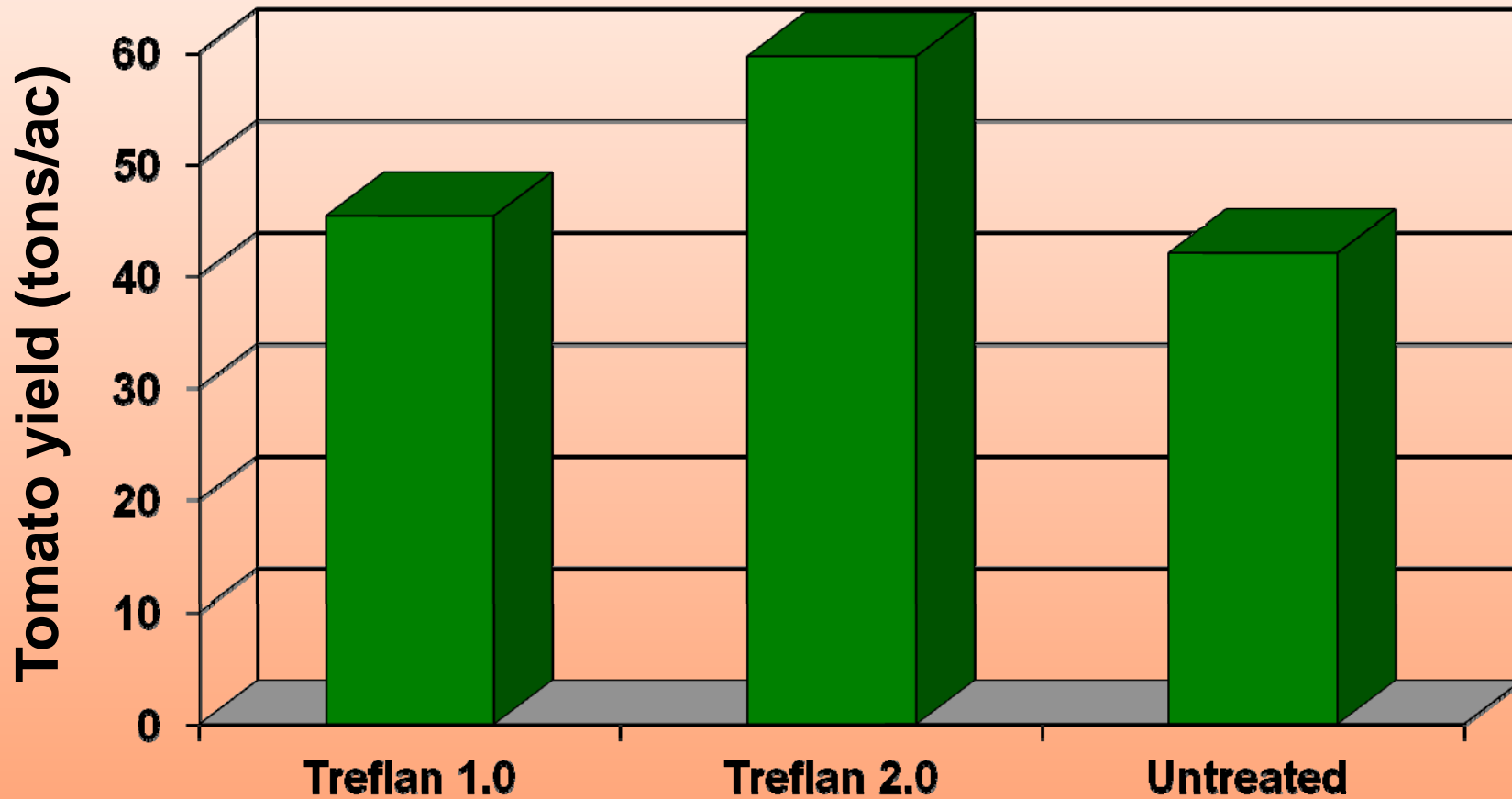
Tomato Yield (tons/acre) on Oct. 12, 2011



Tomato yield (tons/ac) POST treatments



Tomato yield (tons/ac) Treflan treatments



Field bindweed conclusions

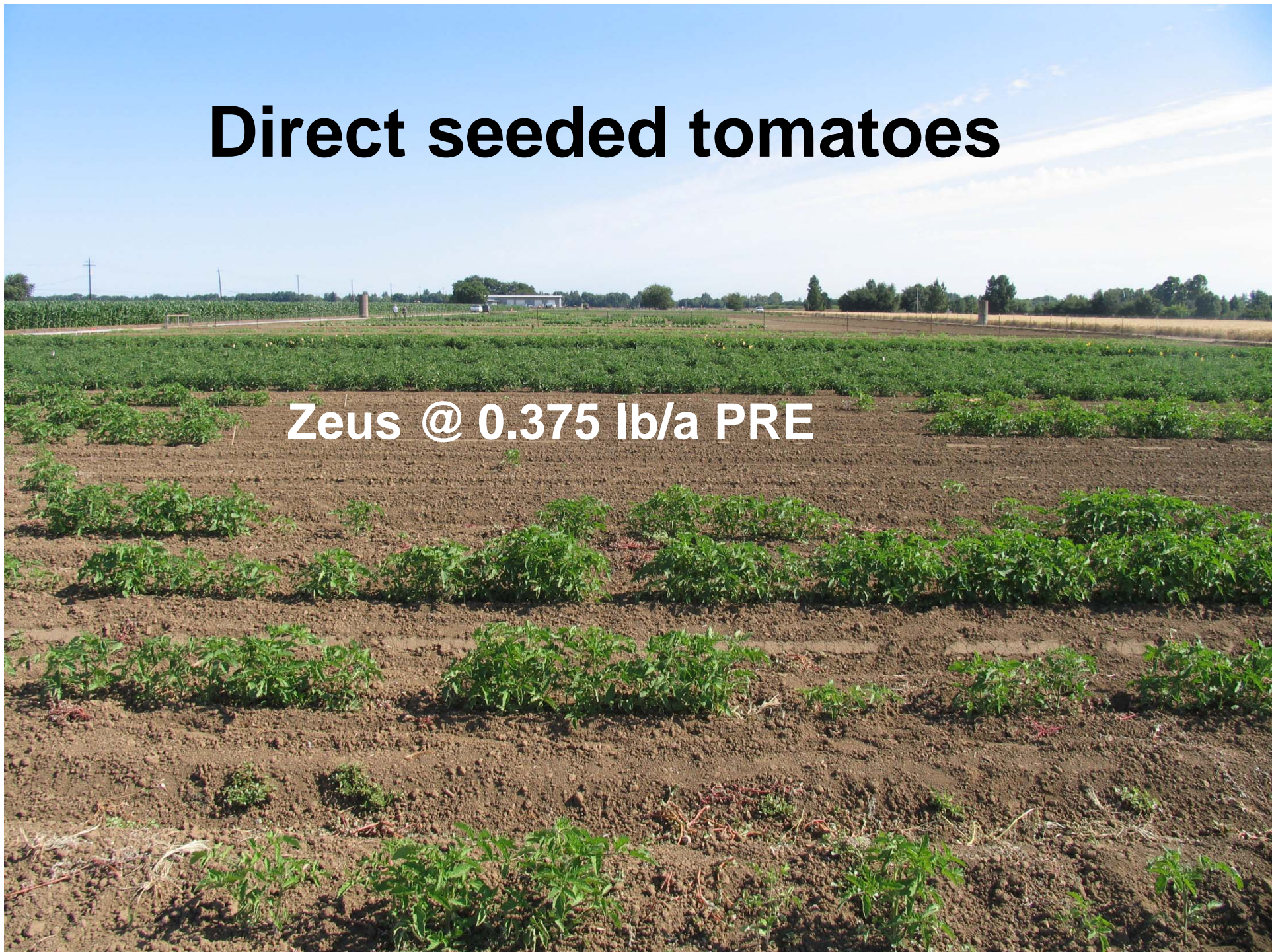
- Treflan was best at suppressing established field bindweed (in both 2010 and 2011)
- POST treatments improved control in most cases
- Dual Magnum, Prowl H₂O, Matrix and Spartan/Zeus good at suppressing seedling bindweed, but less effective against established bindweed

Zeus (Spartan) Update

- Should receive Federal registration for **transplanted tomatoes** soon, with California registration currently in review.
- Maybe available later this year, but should be available in 2013 for use in tomatoes.

Direct seeded tomatoes

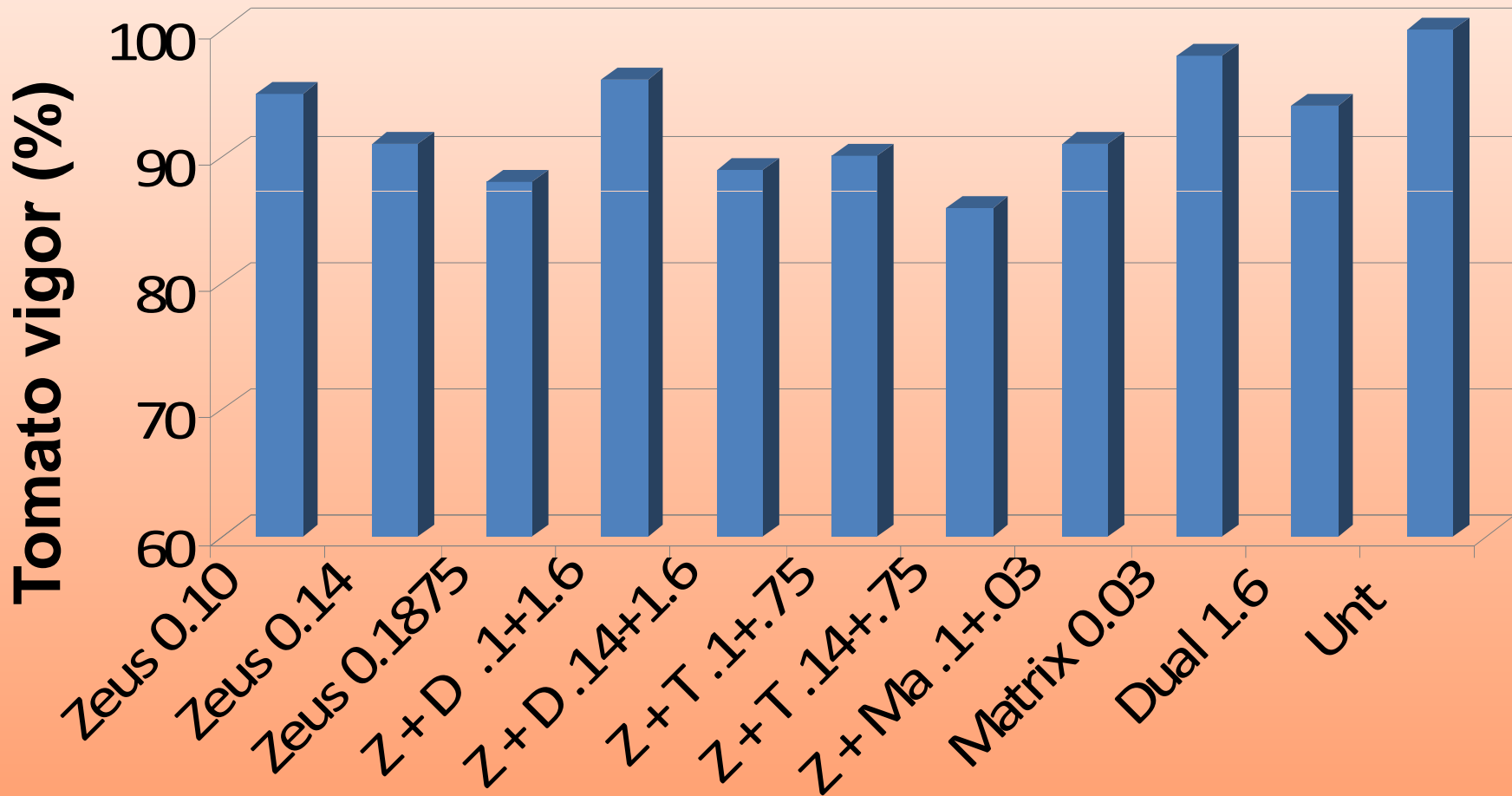
Zeus @ 0.375 lb/a PRE



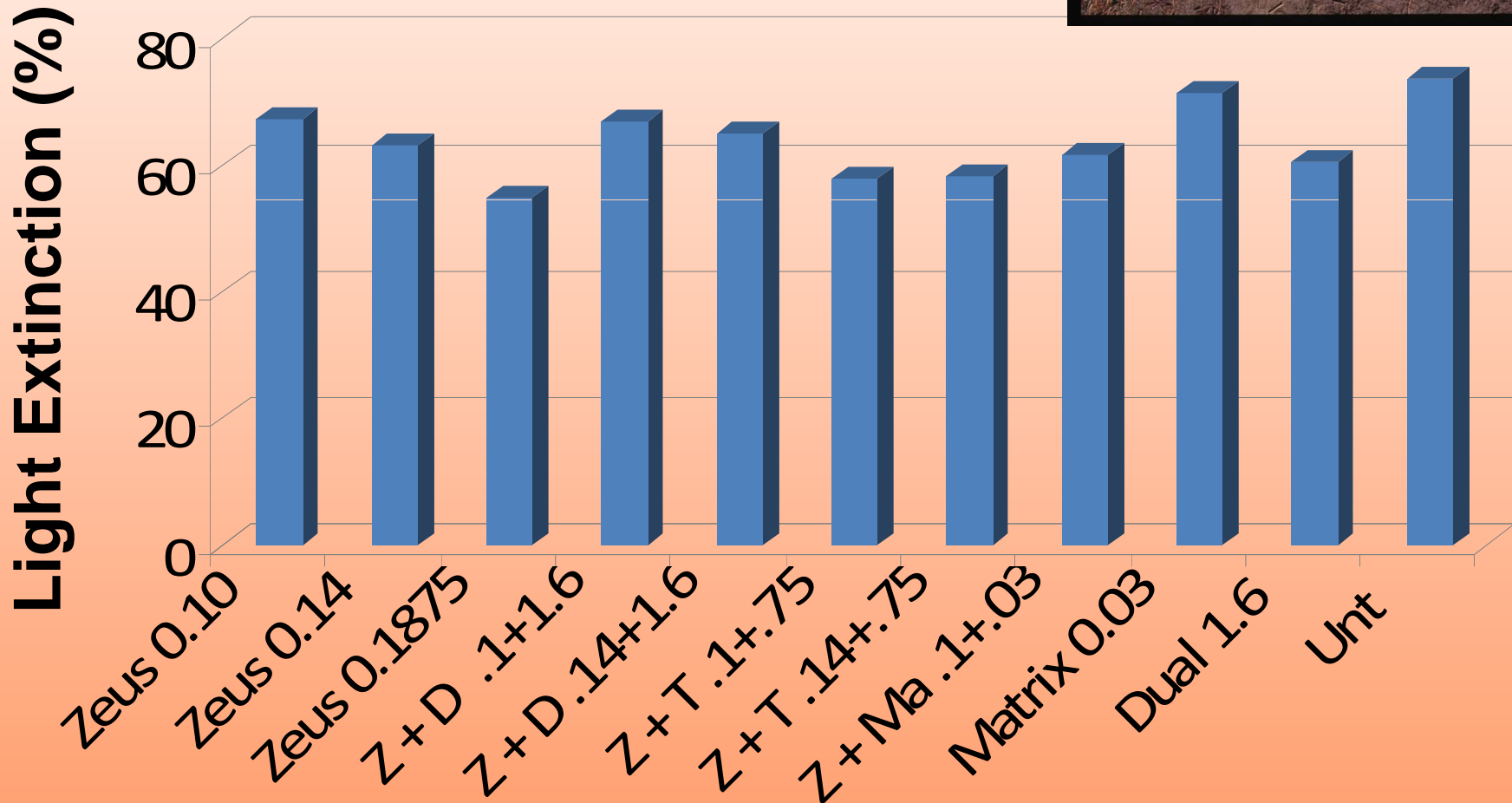
Tomato Stand - 2011

Treatment	Rate (lb ai/a)	Stand (#/15ft)
Zeus	0.10	12.5
Zeus	0.14	11.2
Zeus	0.1875	10.5
Zeus + Dual Mag	0.10 + 1.6	12.8
Zeus + Dual Mag	0.14 + 1.6	11.5
Zeus + Treflan	0.10 + 0.75	11.8
Zeus + Treflan	0.14 + 0.75	10.8
Zeus + Matrix	0.14 + 0.03	12.2
Matrix	0.03	12.5
Dual Magnum	1.6	12.5
Untreated	---	13.0

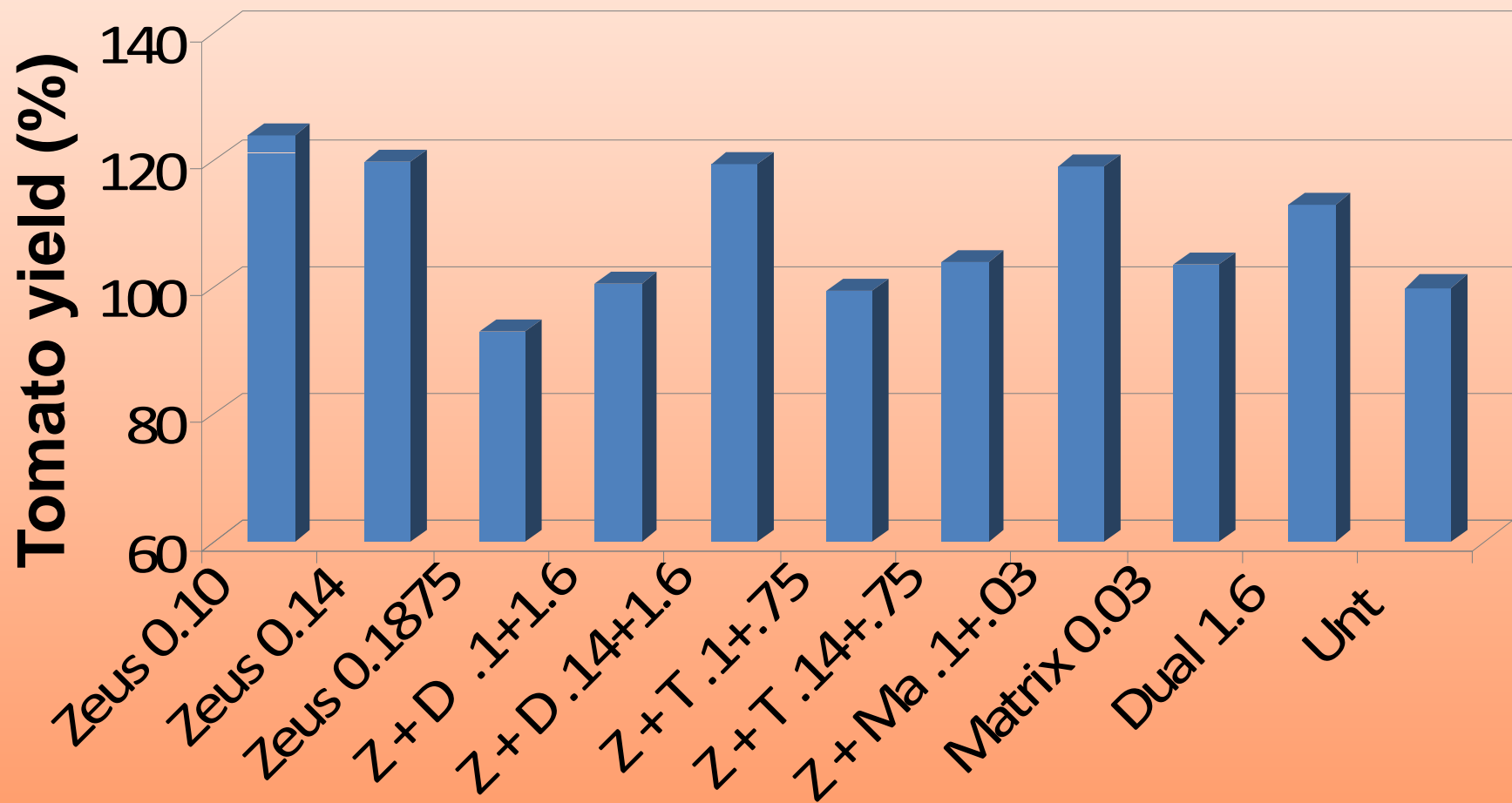
Tomato Vigor (%) 1 month after Transplanting



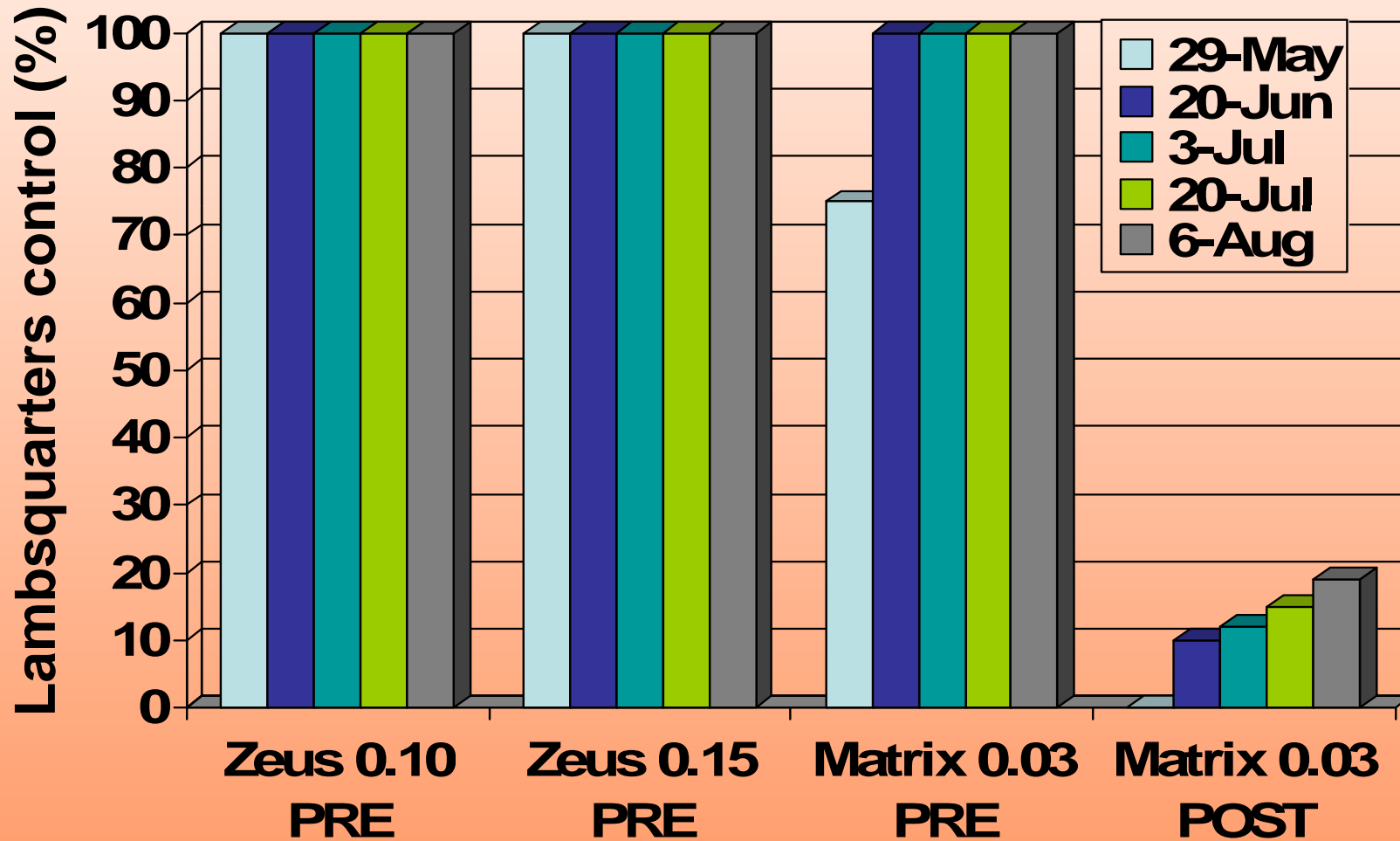
Light Extinction (%) by the Tomato Canopy



Tomato Yield (% of untreated) on Aug. 23, 2011

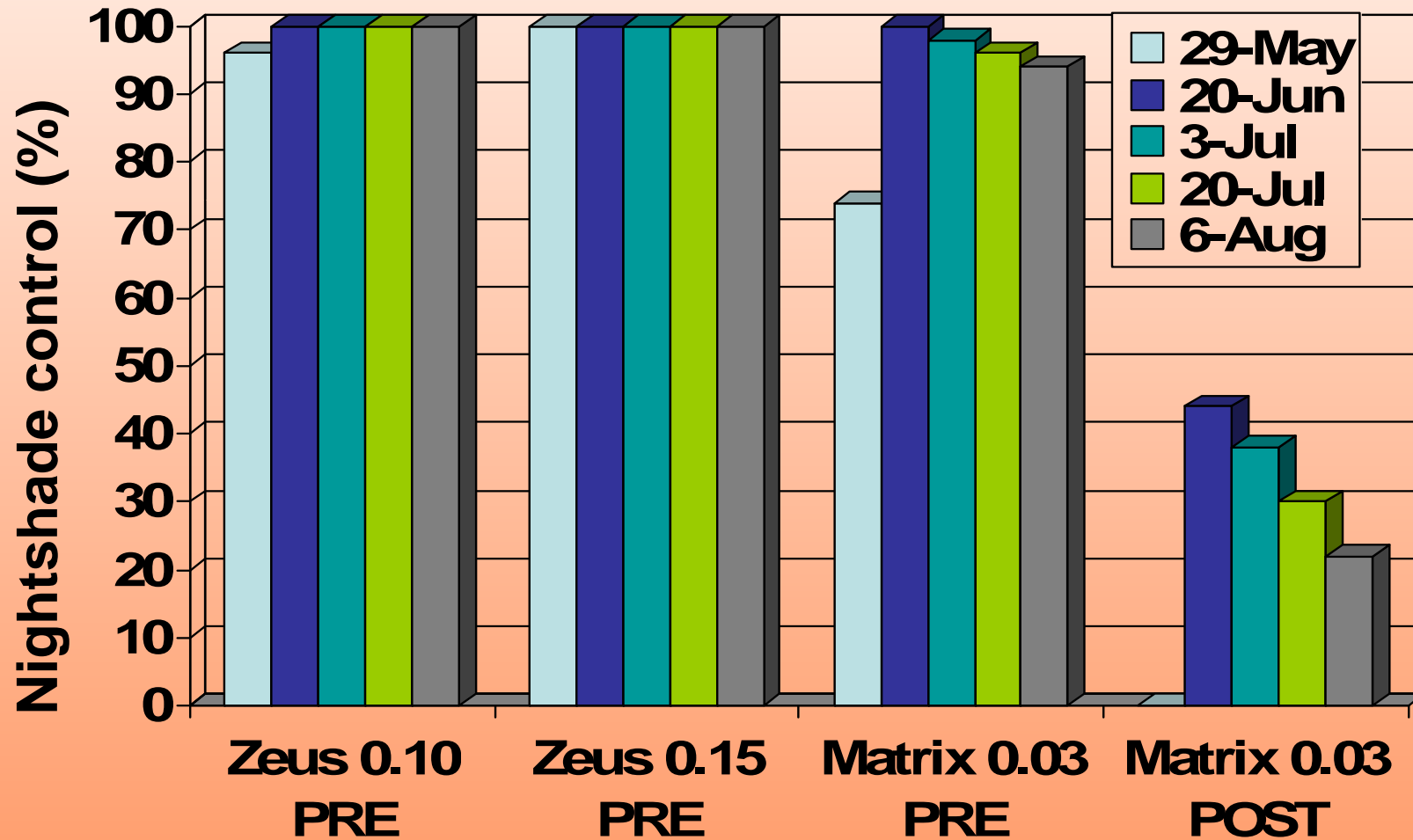


Lambsquarters Control (%) - 2007

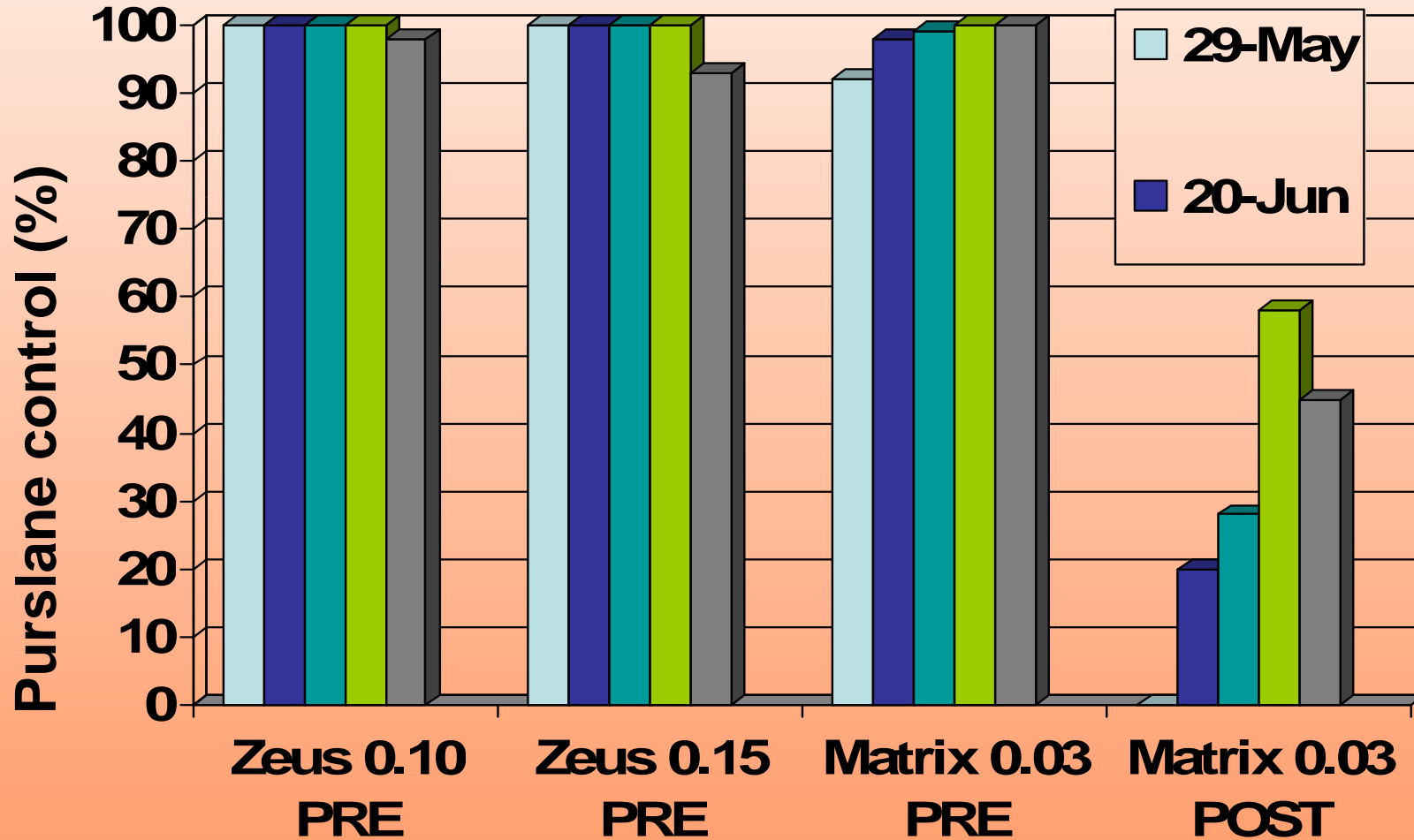


Black Nightshade Control (%)

- 2007



Purslane Control (%) - 2007

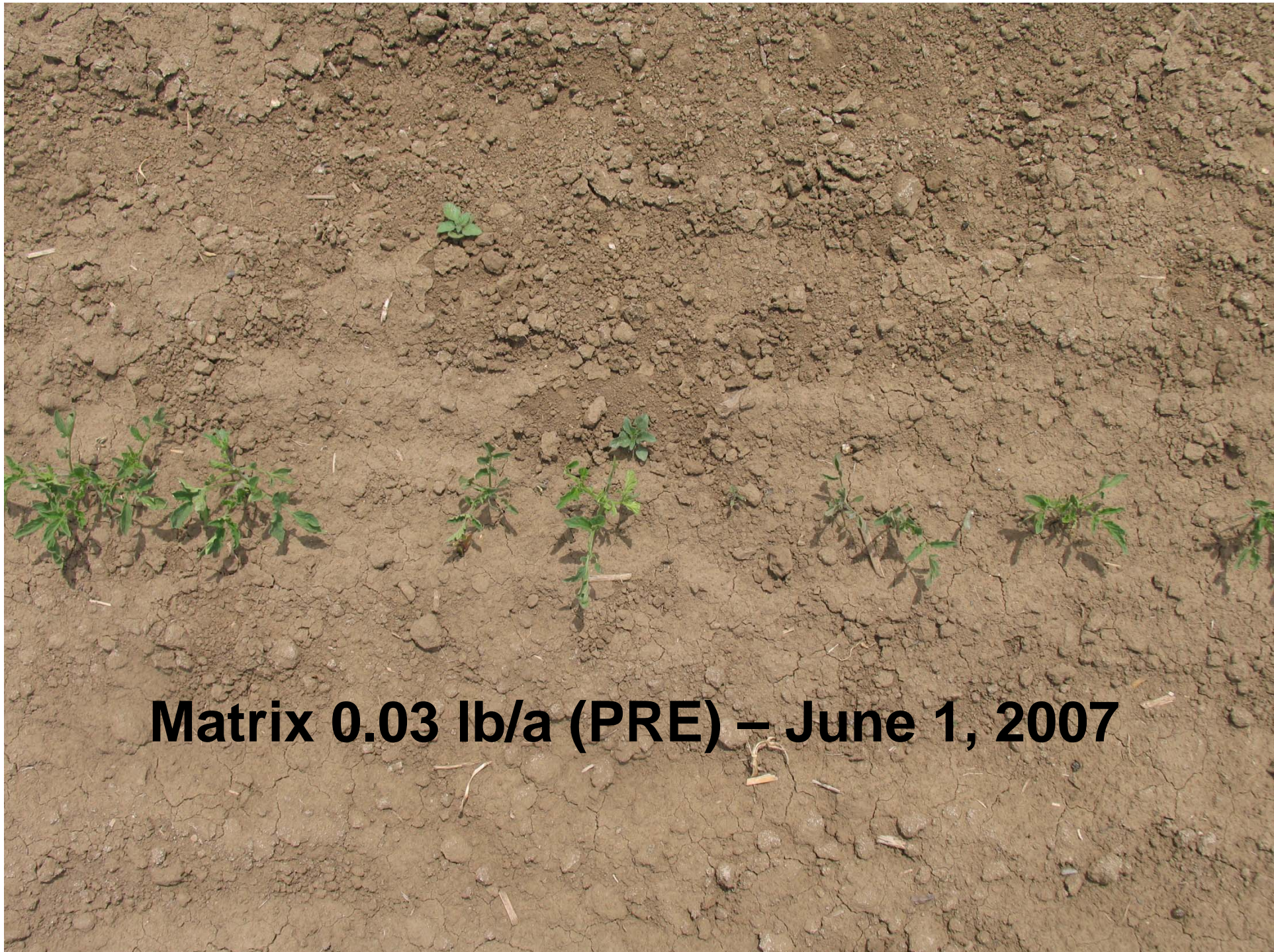




Zeus 0.10 lb/a – June 1, 2007



Zeus 0.15 lb/a – June 1, 2007

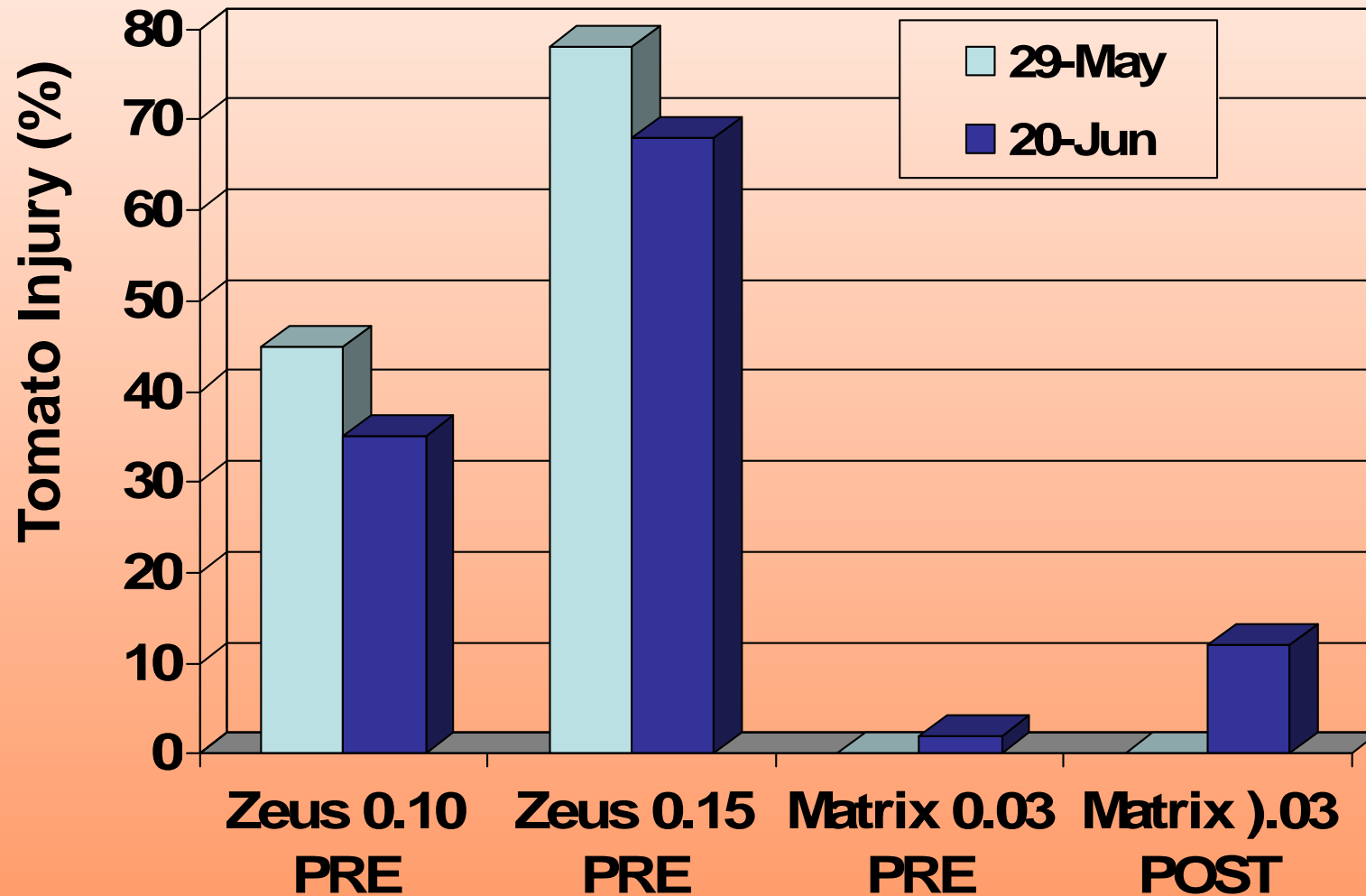


Matrix 0.03 lb/a (PRE) - June 1, 2007



Matrix 0.03 lb/a (POST) – June 1, 2007

Tomato injury (%) - 2007



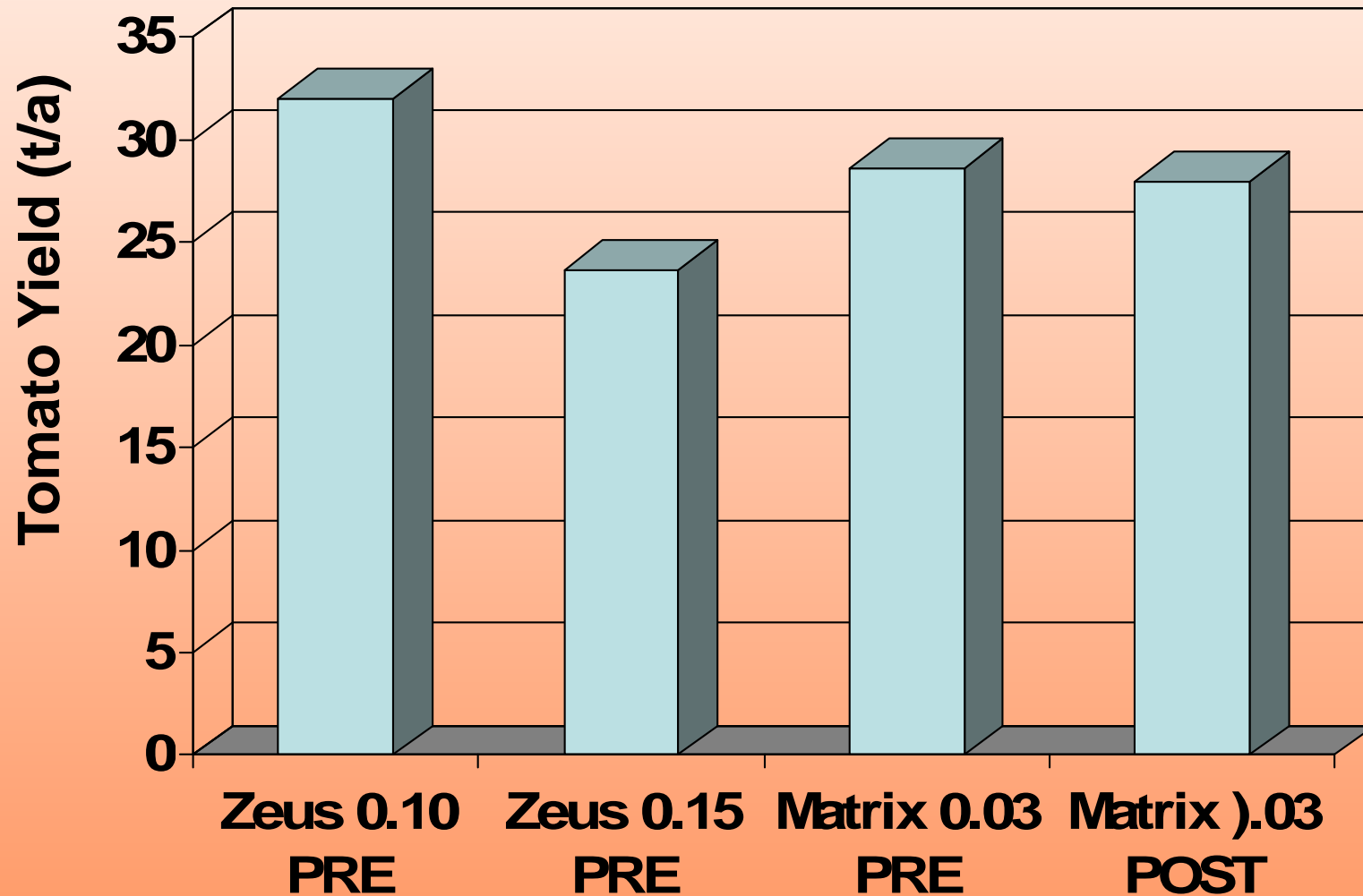


Zeus PRE 0.10 lb/a

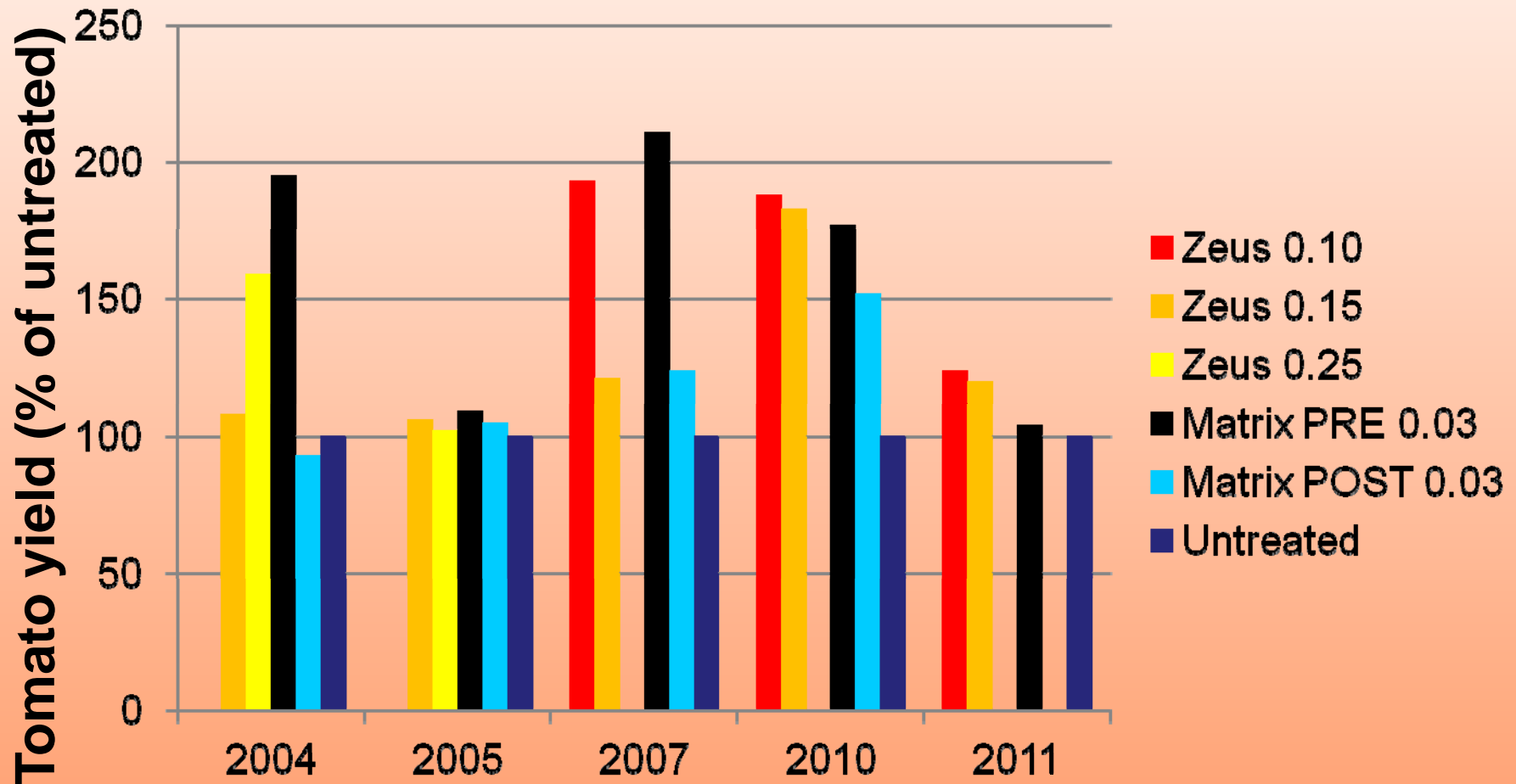


Matrix PRE 0.03 lb/a

Tomato Yield (tons/ac) - 2007



Tomato Yields (% of untreated)



Zeus Summary

- Early reduction in tomato growth seen in all trials
- Excellent broadleaf weed control (lambsquarters, nightshade), but weak on grasses
- Long residual activity
- Excellent tomato yields



Questions?









Shark over the top