Prune Production Ideas for the 2005 Season

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Anticipating a good fruit set and a large crop.

Warm, dry conditions at bloom apparently responsible for poor crop in 2004.

Sprinkler irrigation at bloom?

Optimize Tree Health

- Crop Control
- Nutrition
- Disease
- Insect
- Irrigation

Crop Control – Optimize Tree Health

- Regulate crop through pruning
- Mechanically thin fruit (fruit number)
- Harvest sizing (last resort)

Nutrition – Optimize Tree Health

- Nitrogen – above 2.3
- Potassium – above 1.3
- Zinc – above 18 ppm

Potassium Use by Prune Trees

	Lbs. Potassium Used/Acre/Year
Fruit	66
Growth	11
Prunings	6
Total	83
	83/.54=153 lbs. K_2SO_4

*Based on 3 Dry Ton/Acre

Potassium Deficiency

Zinc Deficiency

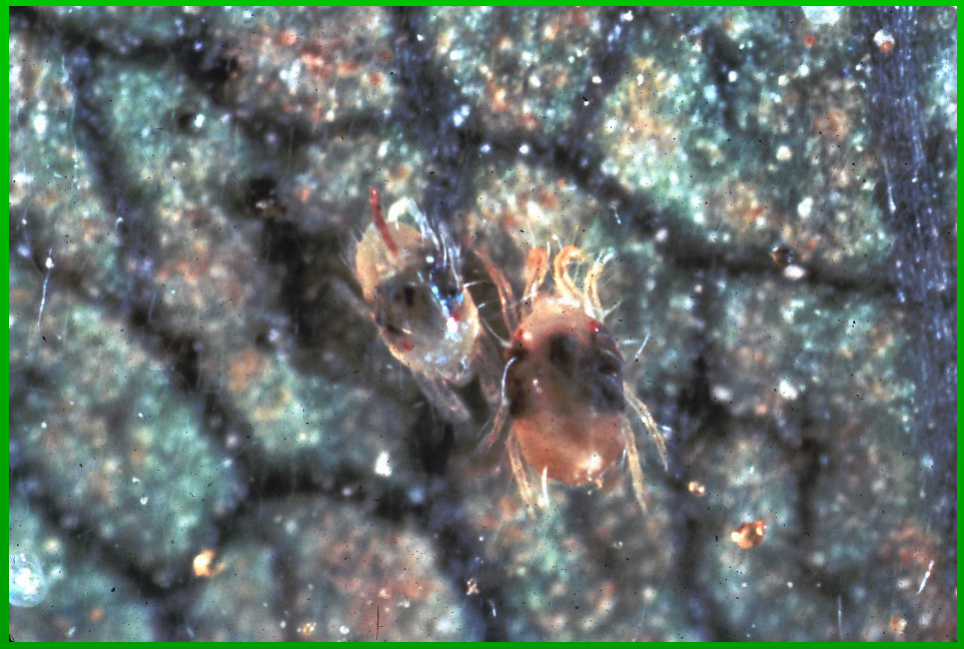
Percent of Orchards Deficient in:				
Year	**N**	**K**	**Zn**	**B**
2004	67	0	72	0
2003	35	0	84	0
2002	20	0	26	0
2001	48	0	24	0
2000	5	5	47	0
1999	20	0	13	0

Disease Management – Optimize Tree Health

- Rust
- Brown Rot
- Scab

Insect Management – Optimize Tree Health

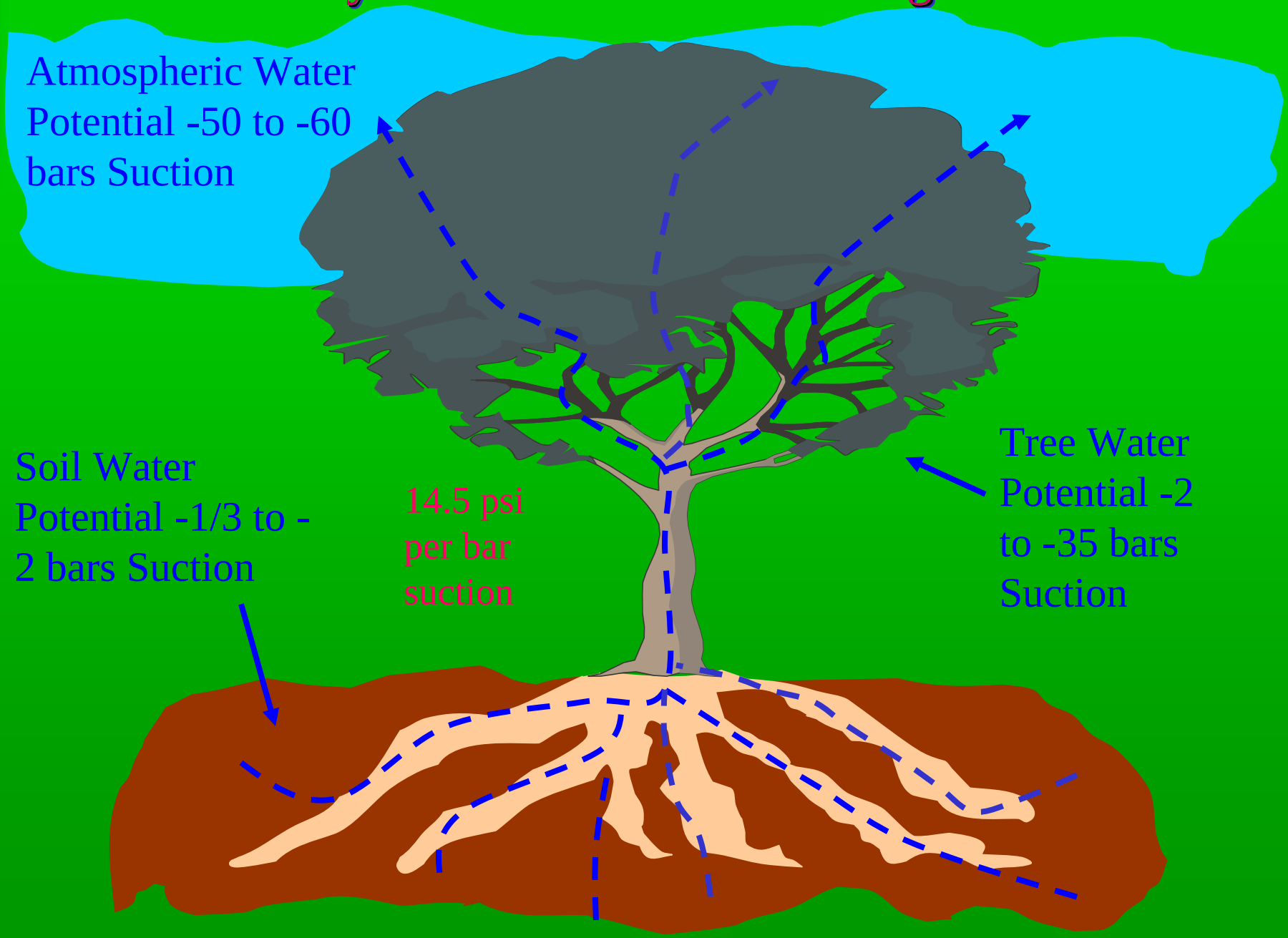
- Spider Mites
- Aphids



Irrigation Management – Optimize Tree Health

- Visual Soil Moisture
- Soil Moisture Sensors
- Water Budget and ET
- Plant Based (Pressure Bomb)

Theory of water movement through a tree



Orchard Monitoring Calendar

Pest:	January	February	March	April	May	June	July	August	September	October	November	December
San Jose Scale	■	■										■
European Fruit Lecanium	■	■										■
Aphid Eggs	■	■										■
PTB Traps			■	■	■							
PTB Fruit Sampling				■	■							
OBLR Traps				■	■							
OBLR Fruit Sampling					■	■						
Leaf Curl Plum Aphid			■	■	■							
Mealy Plum Aphid			■	■	■	■	■					
Rust					■	■	■					
Spider Mites						■	■					
Leaf Tissue Analysis							■					
Irrigation Scheduling				■	■	■	■	■	■			
Well Water N Analysis						■	■					

*Darkened areas are when activity occurs. Refer to the decision guide for specific monitoring dates.

In Summary –
Control crop load and optimize tree health and vigor

- Limb breakage / props
- Sunburn / cytospora canker
- Nutrient deficiency
- Alternate bearing
- Small fruit / low sugar