









Standard foliar nutrient ranges

Element	Range	Element	Range
N	2.0 - 2.8	Mn	50 - 200
K	1.5 - 2.5	Fe	60 - 250
P	0.25 - 0.40	Cu	7 - 20
Ca	0.7 - 1.7	B	30 - 90
Mg	0.3 - 0.5	Zn	20 - 50

Worldwide trend towards primocane-fruiting types

These later fruiting types are more prone to SWD infestation



Trellising

 Only a temporary trellis is required for primocanefruiting types











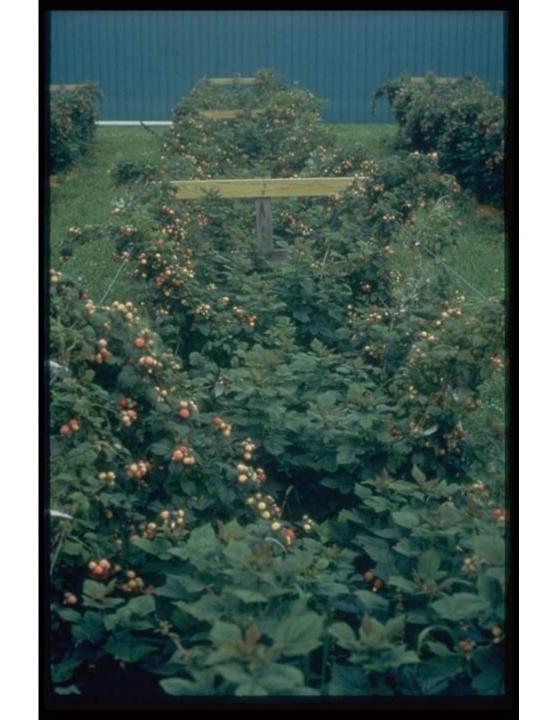




Alternate row mowing



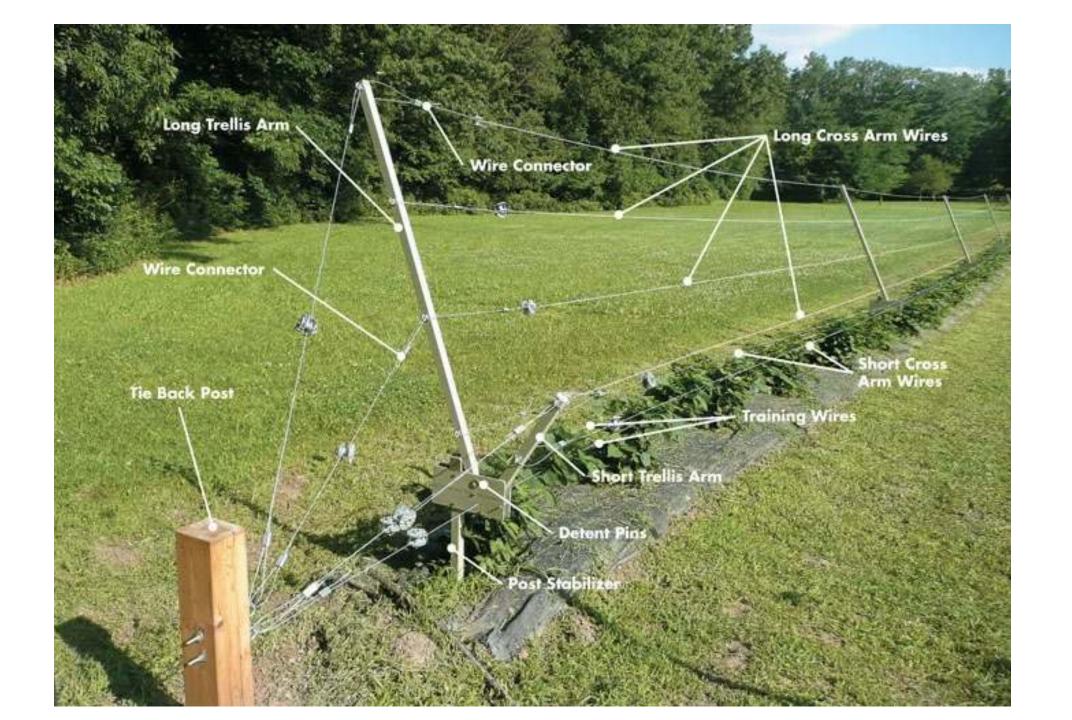










































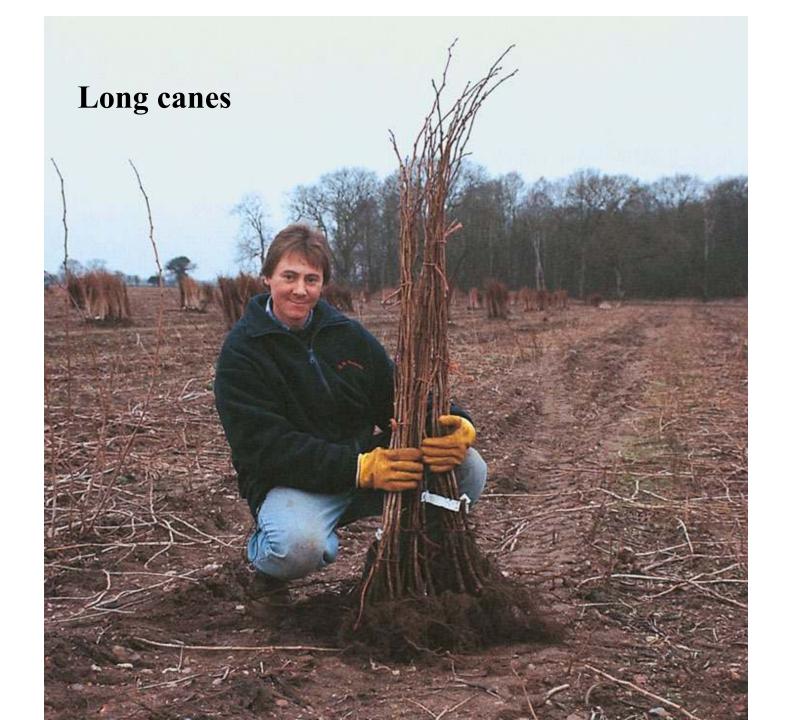














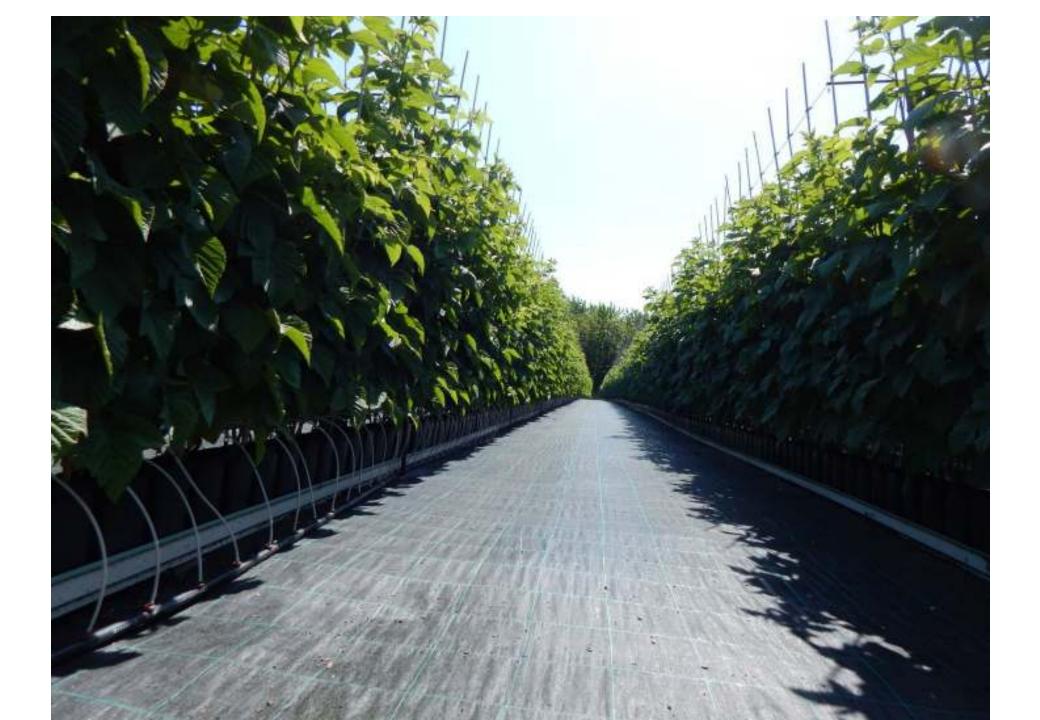
























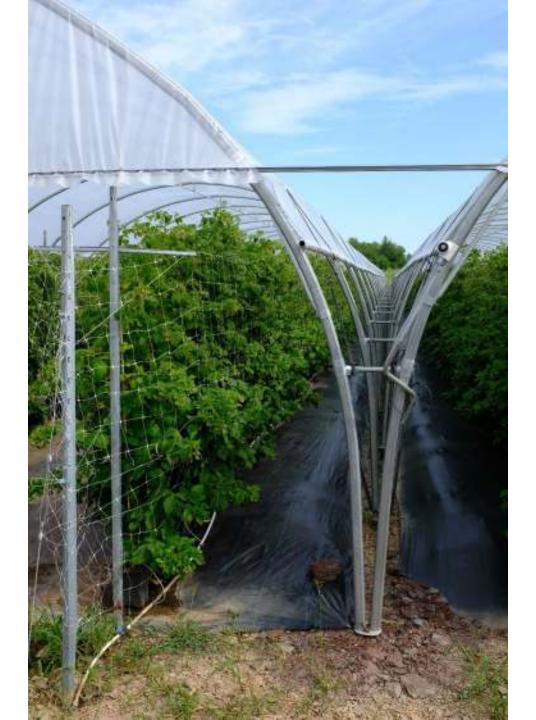




















Winter Fresh Fruit

Fresh raspberries grown during winter — in our Michigan greenhouse



















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Raspberries under netting







Summary of trends

- TC propagules
- Biodegradable mulch is still not ready for wide adoption
- Attention to nutrition
- Any practice to reduce labor even if it's not optimal for production
- Increase worldwide in primocane-fruiting types
- Increase in long cane production
- Figuring out how to save labor with trellising
- Tunneling has increased dramatically for all types of brambles
- Substrate production is catching on
- Insect exclusion is proving to be economical when SWD pressure is high