PHOSPHONATE TRUNK INJECTIONS AND BARK SPRAYS

F.Giblin¹, K.Pegg¹, G. Thomas², A. Whiley³, J. Anderson¹ and L. Smith¹

¹Horticulture and Forestry Science, Department of Primary Industries and Fisheries, 80 Meiers Rd, Indooroopilly, QLD 4068, Australia. Email: <u>fiona.giblin@dpi.qld.gov.au</u>

²385 Hodgsonvale Road, Hodgsonvale, QLD 4352, Australia. Email: glhort@bigpond.com

³Sunshine Horticultural Services Pty Ltd, 287 Dulong Road, Nambour QLD 4560, Australia. Email: <u>whileys@bigpond.com</u>

Potassium phosphonate is a cost-effective chemical for reducing the impact of *Phytophthora cinnamomi*. It can be applied as a soil drench, foliar spray, trunk spray or pressurized trunk injection. Phosphonate concentrations in roots are maintained at high levels for a longer time when applied as injections. Injections are the best way to rejuvenate severely affected trees. Timing in relation to tree phenology is crucial in obtaining maximum levels and persistence of phosphonate in roots. Current studies have shown that for maintaining tree health, single annual injections made after leaf and root flushing are complete, give a high root concentration of phosphonate that persists for 12 months. As wound damage to trunks from injections is of concern to some growers, experiments are underway where organo-silicate bark penetrants have been added to potassium phosphonate to increase absorption from trunk sprays.