

Title Effect of temperature and storage time on the expression of chilling injury in navel orange cv. Lanes Late  
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Citation Australian postharvest horticulture conference, Brisbane, Australia, 1-3 October, 2003; 123-124

### **Abstract**

A study was conducted to examine the effects of low temperature and storage time on fruit moisture loss and the incidence of chilling injury in navel orange cv. Lanes Late. Fruits were placed in one of three controlled temperature rooms maintained at -1, 1 and 3 deg C for 0, 10, 20 or 30 days before being transferred to room temperature (approx equal to 22 deg C) to simulate the marketing period. Temperature and storage time effects on the chilling injury incidence were significant. Generally, chilling injury incidence increased as the storage time increased. High and intermediate levels of chilling injury were recorded at 30 days (28%), followed by 10 and 20 days (both approx equal to 17%), respectively. Chilling injury incidence increased as the storage temperature decreased, recording a 0.65-fold increase from 3 to -1 deg C. Overall, post-storage moisture loss in fruits was strongly and positively correlated with the incidence of chilling injury.