

EVALUATION OF THE BEHAVIOUR OF HASS PLANTS GRAFTED IN DIFFERENT ROOTSTOCKS UNDER CULTURE CONDITIONS IN COPIAPÓ VALLEY

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There is an important increase in the number of avocado orchards in Chile. Due to this scenario and the incorporation of new adaphoclimatic areas far from their origin zone, a study of behaviour of different rootstocks in saline condition of culture, in Copiapó Valley, in northern Chile was performed.

This investigation was performed for 3 seasons in a block of varieties in lower Copiapó Valley. Irrigation water characteristics are the following: EC 2093 $\mu\text{S cm}^{-1}$, 17.02 meq L^{-1} sulphates, 5.44 meq L^{-1} bicarbonates; 4,1 meq L^{-1} chlorides; 14 meq L^{-1} calcium; 6,3 meq L^{-1} magnesium 7.22 meq L^{-1} sodium; and also a concentration of 1.72 mg L^{-1} of boron, which is known to be a phytotoxic for fruit trees culture. Soil characteristics are 8% clay, 10% slime and 82% sand.

The rootstocks used corresponded to Nabal, Mexicola, Thomas, Duke 7, Benix, D9, and Borchard varieties.

For 3 seasons, foliar levels were measured in plants grafted with Hass and in rootstocks without the grafted variety. In addition, foliar levels were measured in plants inoculated in nursery with mycorrhizas. It was observed that foliar level is different for each rootstock as well as for rootstocks inoculated with mycorrhizas.