AJH
eISSN- 0976-724X

THE ASIAN JOURNAL OF HORTICULTURE
Volume **10** | Issue 1 | June, 2015 | 144-148
Visit us -*www.researchjournal.co.in*

RESEARCH PAPER

DOI : 10.15740/HAS/TAJH/10.1/144-148

Article history **:**
Received : 30.04.2015
Revised : 04.05.2015
Accepted : 28.05.2015

Effect of pre-harvest treatments of growth regulators, chemicals and fungicides on storage behaviour of seedless grapes cv. SONAKA

S.B. BIRADARPATIL, LAXMAN KUKNOOR[1] AND A.S. PARMESHWAR[1]

Members of the Research Forum

Associated Authors:
[1]Department of Fruit Science, K.R.C. College of Horticulture, University of Agricultural Sciences, DHARWAD (KARNATAKA) INDIA

Author for correspondence :
S.B. BIRADARPATIL
Department of Fruit Science, K.R.C. College of Horticulture, University of Agricultural Sciences, DHARWAD (KARNATAKA) INDIA

ABSTRACT : The physical parameters were influenced by different pre-harvest sprays of NAA, $CaCl_2$, Ca $(NO_3)_2$, *Trichoderma harzianum*, Carbendazim and Thiophanate methyl were studied. Among the Pre-harvest treatments, 2 per cent calcium nitrate sprayed grape bunches 10 days before harvest was recorded minimum per cent physiological loss in weight (15.02 %) and physical damage (0.47 %) at 35 days of storage (DAS). With respect to berry drop and rotting, minimum per cent berry drop (9.53 %) and rotting (12.93 %) was found in the pre-harvest spray of 200 ppm NAA and 0.2 per cent thiophanate methyl, respectively. Maximum per cent total soluble solids (25.07%), total sugars (24.42%), and reducing sugars (23.00 %) and non-reducing sugars (1.41%) were recorded in treatments imposed with calcium nitrate. It was on par with calcium chloride treatment and 200 ppm NAA with respect to TSS and reducing sugar. Maximum per cent of total soluble solids and acid ratio (67.57) and ascorbic acid content (3.28 mg/ 100 g pulp) were observed in 2 per cent calcium nitrate bunches followed by 2 per cent calcium chloride and 200 ppm NAA. Among the pre-harvest treatments calcium nitrate treated grapes recorded maximum organoleptic scores(Out of 5.00) with respect to general appearance (2.69), taste and flavour (3.46), firmness (2.8) and overall acceptability (3.01) and it was on par with carbendazim and calcium chloride when compared to control, but maximum score was recorded in the thiophanate methyl treated grape bunches 3.01 (out of 5.00) with respect to the absence of defects of the grapes and it was followed by carbendazim.

KEY WORDS : Pre-harvest spray, Growth regulators, Chemicals on grape storage

HOW TO CITE THIS ARTICLE : Biradarpatil, S.B., Kuknoor, Laxman and Parmeshwar, A.S. (2015). Effect of pre-harvest treatments of growth regulators, chemicals and fungicides on storage behaviour of seedless grapes cv. SONAKA. *Asian J. Hort.*, **10**(1) : 144-148.