Title The effect of controlled atmosphere conditions on the quality decay of shredded unripe papaya

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Abstract

One kind of the popular Thai salad is named "Som-Tam" which has shredded unripe papaya as main ingredient. For selfcooking, the process for making the shreds is complicated. Ready-to-use form of shredded unripe papaya would be necessary for consumer. However, this product will be deteriorated quickly after processing. In this research, the postharvest technique; controlled atmosphere (CA); was applied to study the effect on sensory attributes decay of shredded unripe papaya under normal air (control), 5% O_2, 10% CO_2 and 5% O_2+ 10%CO_2 conditions, respectively, during storage at 4°C. The sensory attributes (color, smell, water soaking, chilling symptom and firmness) of each sample was tested throughout storage time in 5 days intervals. The water soaking and chilling symptom slightly changed in all treatments. The scores of color, smell and firmness decreased with time especially in control, 5% O_2, 10% CO_2 and 5% 0_2+ 10%CO_2 conditions, respectively. The combined low O_2 and high CO_2 condition showed the best treatment to retain the quality change of shredded unripe papaya.