Title Cultivation management on the farm influences postharvest quality and safety

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Abstract

Postharvest losses have been estimated as being between 2 and 20% in developed countries and between 24 and 40% in developing countries. High levels of waste result in higher prices of fresh produce. The first step that causes a deterioration in quality is an improper harvest handling on the farms. Quality in chain is crucial in terms of food quality and safety and the environmental impact. The use of low-input, efficient cultural practices, postharvest technologies and supply chain management contribute to 'making the difference' in a chain that aims at being standardized, efficient and competitive. For these reasons, innovative technologies have been developed to enhance raw material production, preserve quality, guarantee safety, prolong shelf-life and to diversify the produce. The ultimate potential postharvest quality and the shelf-life of fresh vegetables are determined before harvest. Postharvest handling practices do not improve quality; they can only slow the rate at which deterioration occurs, unless high costs are sustained. A good farming management is important to produce raw material with high extrinsic and inherent quality at harvest, while it is important, in postharvest management, to preserve and maintain the quality as long as possible during processing and distribution. The critical points concerning produce safety and quality that must be controlled by growers, the first link in the fresh-cut chain, are considered in the present paper. An optimal cultivation management on the farm, an efficient and rapid harvesting, handling and storage implementation after the cultivation phase are all key factors that favour the quality of the raw material, thus enhancing process and product quality, leading to increased producer competitiveness on the market.