ABSTRACT (LITERATURE REVIEW)

THE EFFECT OF USING CHITOSAN AS EDIBLE COATING FILM ON THE STORAGE OF STRAWBERRY FRUIT WITH FRUIT WEIGHT LOSS INDICATOR

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Strawberries are fruit commodities that have high water content, are easily damaged, so they have a relatively short shelf life. Damage that often occurs in strawberries include blisters, peeling, dryness, wilting, bruising and rotting caused by enzyme activity and/or micro-organisms. In the post-harvest and storage stages, the ripening process of strawberries will continue, because the tissues and cells in the fruit are still alive and carry out respiration and evaporation of water in the fruit. Loss of water causes metabolic changes in enzyme activation leading to accelerated aging, reduced taste and aroma, decreased nutritional value, and increased susceptibility to cold damage and pathogen invasion. This will cause a decrease in the quality and shelf life of strawberries. To maintain the quality and quality of strawberries, chitosan is used to coat the surface of strawberries which is expected to inhibit the release of gas, water vapor due to direct contact with air, so that the shelf life of strawberries can be extended. The design of this study is a literature review. Researchers searched for manuscripts through official databases and library sources relevant to the research topic. The database used is Google Scholar. The number of articles that were resumed was 5 articles consisting of three national articles and two international articles. Based on the results of the review of the five articles, chitosan was able to reduce the weight loss of strawberries compared to strawberries that were not coated with chitosan, so that the freshness and quality of strawberries could be maintained longer, while at the same time prolonging the shelf life of the fruit.

Key words: Strawberry, Chitosan, Fruit weight loss, Shelf life