

The effect of soaking with *Cinnamomum osmophloeum* Kanehira extracts on quality change of fresh pork loin chops ⁽¹⁾

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Abstract

The purpose of this study was to investigate the antioxidant properties of *Cinnamomum osmophloeum* Kanehira and its effects on the quality of fresh pork loin chop. The fresh pork loin chops were soaked in the solution containing different concentrations of total phenols from *Cinnamomum osmophloeum* Kanehira. The experiment was conducted with six groups: control (CT group); positive control (PC group); soaked in 250 mg (CE250 group), 500 mg (CE500 group), 750 mg (CE750 group) and 1,000 mg (CE1000 group) total phenolic/mL extracts. The pork loin chops were stored at 7°C for 7 days and sampled at day 0, 1, 3, 5, 7 to analyze the change of quality. The results showed that (1) drip loss: all groups increased as refrigeration storage period increased; (2) color (a-value): there was no significant difference among all groups; (3) total plate count: all groups increased as refrigeration storage period increased. At day 7, CT group and PC group were higher than other groups ($P < 0.05$); (4) 2-thiobarbituric acid reactive substances (TBARS): all groups increased significantly as refrigeration storage period increased excepted CE1000 group; (5) sensory evaluation: the juiciness, flavor and the overall acceptability of cooked pork loin did not change with the increasing storage times and there was no significant difference among all groups.

Key words: *Cinnamomum osmophloeum* Kanehira, Pork loin chop, Quality.

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