RINGKASAN

Daging sapi merupakan komoditas pangan yang sangat mudah mengalami kerusakan selama penyimpanan. Pengawet alami diperlukan untuk memperpanjang masa simpannya. Penanganan postmortem yang dilakukan adalah dengan pelapis (*coating*). Penelitian ini memanfaatkan pengawet alami bagian dalam (empulur) batang dan daun kecombrang dan menformulasikannya dengan CMC dan gliserin. Daging yang telah dilakukan coating disimpan dalam suhu refrigerasi selama 8 hari. Tujuan penelitian ini untuk mengetahui 1) pengaruh jenis awetan, 2) pengaruh bagian tanaman, 3) pengaruh konsentrasi awetan kecombrang dan 4) pengaruh interaksi ketiganya ditinjau dari sifat fisik, kimia dan mikrobiologi daging sapi selama penyimpanan.

Penelitian ini menggunakan metode eskperimental Rancangan Acak kelompok (RAK) yang terdiri atas 13 kombinasi perlakuan dan tiga kali ulangan, Faktor yang diuji meliputi jenis awetan kecombrang berupa bubuk (A1) dan konsentrat (A2); bagian tanaman kecombrang yaitu bagian dalam batang (B1) dan daun (B2); serta konsentrasi awetan kecombrang yaitu 2% (K1), 3% (K2) dan 4% (K3). Sebagai pembanding ditambah satu unit kontrol yaitu *coating* tanpa kecombrang.

Hasil penelitian menunjukkan bahwa bubuk kecombrang lebih efektif mempertahankan kualitas daging sapi dibandingkan konsentrat; batang kecombrang memiliki kemampuan mempertahankan kualitas daging sapi lebih baik dibanding bagian dalam batang kecombrang sedangkan semakin tinggi konsentrasi awetan kecombrang, nilai tekstur, intensitas warna dan total mikroba daging sapi relatif tetap. Kombinasi perlakuan terbaik yaitu *edible coating* bubuk batang kecombrang konsentrasi 2%. *Edible coating* ini mampu mempertahankan daging sapi selama 8 hari dalam refrigerator dengan nilai tekstur 0,76 kg/cm^2, intensitas warna 37,92, pH 5,63, kadar air 76,71%, aktivitas antioksidan 29,17 % dan total mikroba 2,93 x 10^8 CFU/gram.

SUMMARY

Beef is a food commodity that is very easily damaged during storage. Natural preservatives are required to extend the shelf life. Postmortem handling is done with coating. The study observed the extracts of kecombrang i. e. inner stem of kecombrang and its leaf as formula coating along with glycerin and CMC for meat . The coated meat was stored in refrigeration temperature for 8 days. The purpose of this research were 1) to investigate the influence of preservative type , 2) to investigate the influence of plant extract type, 3) to investigate the influence of preservative consentration and 4) to investigate the influence of the interaction among the three factors during storage in terms of physical, chemical and microbiological propertiesof beef meat.

This experiment used the experimental method with The Randomized Block Design (RCBD) consist of 13 combinations treatment and three replications. The experimental factors consisted of three factors, which were preservative type (powder and concentrate), extract of kecombrang (inner steam and leaf) and consentration of preservative (2% , 3% and 4%). As a comparison, it was added with one control unit. It was coating without kecombrang.

The results of the study showed that the powder was more effective in maintaining the quality of beef than concentrates; kecombrang' inner steam had the ability to maintain the quality of beef better than its leaf and the higher concentration of preservative, the value of texture, color intensity and total microbial of beef is constan relatively. The best treatment combination was edible coating with 2% inner stem powder. Edible coating was able to maintain beef for 8 days in refrigerator with texture value of 0.76 kg/ cm^2, color intensity of 37.92, pH of 5.63, water content of 76.71%, antioxidant activity of 29.17% and total microbe of 2.93 x 10^8 log CFU/gram.