

Nadia Areynenta Melati. NPM 220331100036. Agroindustri *Snack Bar* Berbahan Tepung Komposit Jagung Lokal Madura dan Pisang Kepok. Di Bawah Bimbingan Dr. M. Fuad Fauzul Mu'tamar, S.TP., M.Si. dan Dr. Millatul Ulya S.TP., M.T.

ABSTRAK

Malnutrisi pada anak usia 4–6 tahun masih menjadi permasalahan gizi yang dapat menghambat pertumbuhan dan perkembangan. Salah satu upaya yang dapat dilakukan untuk membantu memenuhi kebutuhan gizi anak adalah melalui penyediaan makanan selingan bergizi berbasis pangan lokal. Penelitian ini bertujuan mengembangkan *snack bar* berbahan tepung komposit jagung lokal Madura varietas Tambin dan tepung pisang kepok yang diperkaya tepung kacang tunggak serta kacang merah sebagai alternatif makanan selingan bagi anak usia 4–6 tahun. Penelitian menggunakan Rancangan Acak Lengkap (RAL) *non*-faktorial dengan enam formulasi (F1–F6) dan tiga kali ulangan. Parameter yang diamati meliputi kadar air, kadar protein, tekstur, warna, kadar abu, kadar lemak, kadar serat, dan nilai energi. Data dianalisis menggunakan *Analysis of Variance* (ANOVA) dan *Duncan's Multiple Range Test* (DMRT) pada taraf 5%, sedangkan formulasi terbaik ditentukan menggunakan metode *Comparative Performance Index* (CPI). Hasil penelitian menunjukkan bahwa formulasi terbaik diperoleh pada perlakuan F2 dengan nilai CPI sebesar 10.320,828. Karakteristik mutu formulasi F2 meliputi kadar air 12,37%, *hardness* 809,02 gf, *fracturability* 1.040,47 gf, *cohesiveness* 0,16, *lightness* 35,03, *chroma* 43,39, *hue* 69,20, kadar protein 11%, lemak 29,19%, serat kasar 10,41%, dan energi 489,44 kkal/100 g. Dalam takaran saji 30 g, *snack bar* F2 menyumbang energi 147 kkal (10% AKG), protein 3 g (13% AKG), lemak 9 g (18% AKG), dan karbohidrat 14 g (6% AKG). Harga Pokok Produksi (HPP) produk sebesar Rp6.383 per pcs dengan harga jual Rp8.298 per pcs.

Kata kunci: *Jagung Lokal Madura, Snack Bar, Tepung Komposit*

Nadia Areynenta Melati. NPM 220331100036. Agroindustry Snack Bar Made from Local Madura Corn Flour and Kepok Banana Composite. Under The Guidance of Dr. M. Fuad Fauzul Mu'tamar, S.TP., M.Si. and Dr. Millatul Ulya S.TP., M.T.

ABSTRACT

Malnutrition in children aged 4–6 years remains a nutritional problem that can hinder growth and development. One effort that can be made to help meet children's nutritional needs is through the provision of nutritious snacks based on local foods. This study aims to develop a snack bar made from local Madura corn flour composite Tambin variety and banana flour enriched with cowpea flour and red beans as an alternative snack for children aged 4–6 years. The study used a non-factorial Completely Randomized Design (CRD) with six formulations (F1–F6) and three replications. The parameters observed included water content, protein content, texture, color, ash content, fat content, fiber content, and energy value. Data were analyzed using Analysis of Variance (ANOVA) and Duncan's Multiple Range Test (DMRT) at the 5% level, while the best formulation was determined using the Comparative Performance Index (CPI) method. The results showed that the best formulation was obtained in treatment F2 with a CPI value of 10,320.828. The quality characteristics of F2 formulation include water content of 12.37%, hardness of 809.02 gf, fracturability of 1,040.47 gf, cohesiveness of 0.16, lightness of 35.03, chroma of 43.39, hue of 69.20, protein content of 11%, fat of 29.19%, crude fiber of 10.41%, and energy of 489.44 kcal/100 g. In a serving size of 30 g, F2 snack bar contributes 147 kcal (10% RDA) of energy, 3 g of protein (13% RDA), 9 g of fat (18% RDA), and 14 g of carbohydrates (6% RDA). The product's Cost of Goods Sold (COGS) is Rp6,383 per piece with a selling price of Rp8,298 per piece.

Keywords: Composite Flour, Madura Local Corn, Snack Bar