

## KARAKTERISTIK KIMIA DAN SENSORIS SOSIS DAGING AYAM BROILER DENGAN PENAMBAHAN SPIRULINA (*Arthrospira platensis*)

Addi Jaler Mukhshon  
14/366678/PT/06779

### INTISARI

Penelitian ini bertujuan untuk mengetahui pengaruh penambahan spirulina (*Arthrospira platensis*) terhadap karakteristik kimia dan sensoris sosis daging ayam broiler. Spirulina merupakan alga berwarna biru-hijau yang digolongkan ke dalam *cyanobacteria*, bersel satu dan berbentuk spiral. spirulina mengandung 5 zat gizi utama, yaitu karbohidrat, protein, lemak, vitamin dan mineral sehingga dapat digunakan sebagai suplemen yang sering ditambahkan pada bahan makanan. Perlakuan pada penelitian ini dibagi menjadi lima yaitu penambahan konsentrasi spirulina 0, 250, 500, 750, dan 1000 ppm dari total adonan sosis. Bahan utama pembuatan sosis dalam penelitian ini adalah daging ayam broiler, *filler*, *binder*, angkak, spirulina dalam bentuk tepung dan bumbu-bumbu. Variabel yang diamati meliputi karakteristik kimia yang terdiri dari kadar air, protein, lemak dan abu, serta karakteristik sensoris yang terdiri dari warna, rasa, aroma, tekstur, kekenyalan dan daya terima. Data karakteristik kimia dianalisis dengan analisis variansi Rancangan Acak Lengkap (RAL) pola searah dengan pengulangan sebanyak lima kali, apabila hasilnya berbeda nyata maka dilanjutkan dengan uji *Duncan's New Multiple Ranges Test* (DMRT). Data sensoris sosis ayam broiler dilihat dengan hasil kuisisioner. Hasil analisis statistik menunjukkan bahwa penambahan spirulina dengan level berbeda pada sosis daging ayam broiler memberikan pengaruh nyata ( $P < 0,05$ ) terhadap karakteristik kimia kadar air, protein, lemak, serta abu, dan berpengaruh nyata terhadap karakteristik sensoris rasa, tekstur, kekenyalan, dan daya terima, namun tidak berpengaruh nyata terhadap karakteristik sensoris warna dan aroma. Kesimpulan dari penelitian ini adalah penambahan spirulina pada level 750 ppm menghasilkan karakteristik kimia terbaik.

**Kata kunci:** Sosis daging ayam broiler, Spirulina, Karakteristik kimia, Karakteristik sensoris

## CHEMICAL AND SENSORY CHARACTERISTICS OF BROILER CHICKEN SAUSAGE WITH ADDITION OF SPIRULINA (*Arthrospira platensis*)

Addi Jaler Mukhshon  
14/366678/PT/06779

### ABSTRACT

This research aims to determine the effect of addition of spirulina (*Arthrospira platensis*) on the chemical and sensory characteristics of broiler chicken sausage. Spirulina is a blue-green algae classified into cyanobacteria, single-celled and spiral-shaped. Spirulina contains 5 main nutrients, namely carbohydrates, proteins, fats, vitamins and minerals so that they can be used as supplements that are often added to food ingredients. The treatment in this study was divided into five, namely the addition of spirulina 0 (control), 250, 500, 750, and 1000 ppm. The main ingredients for making sausages in this research were broiler chicken meat, filler, binder, angkak, spirulina in powder form and spices. Variables observed included chemical characteristics consisting of moisture, protein, fat and ash, and sensory characteristics consisting of color, taste, aroma, texture, elasticity and acceptability. Chemical characteristics data were analyzed by analysis of variance in the Completely Randomized Design (CRD) pattern with replication five times, if the results were significantly different then continued with the Duncan's New Multiple Ranges Test (DMRT) test. Sensory data of broiler chicken sausage seen with the results of the questionnaire. The results of statistical analysis showed that the addition of spirulina with different levels of broiler chicken sausage had a significant effect ( $P < 0.05$ ) on the chemical characteristics of moisture, protein, fat, and ash content, and significantly affected the sensory characteristics of taste, texture, elasticity, and acceptability, but had no effect real to the sensory characteristics of color and aroma. The conclusion of this study is the addition of spirulina at a level of 750 ppm produces the best chemical characteristics.

**Keywords:** Chicken broiler sausage, Spirulina, Chemical characteristics, Sensory characteristics