

## INTISARI

### EVALUASI PENYELENGGARAAN MAKANAN SESUAI KAIDAH HAZARD ANALYSIS CRITICAL CONTROL POINT (HACCP) PADA SISTEM PENGOLAHAN LAUK HEWANI TERHADAP UJI MIKROBIOLOGI DAN KEPUASAN ATLET DI PUSAT PENDIDIKAN DAN LATIHAN OLAHRAGA PELAJAR (PPLP) YOGYAKARTA

**Latar belakang:** Kasus keracunan makanan berupa gangguan pencernaan pada atlet telah banyak dilaporkan di berbagai negara. Di Indonesia belum tercatat kasus keracunan yang terjadi secara spesifik pada kelompok atlet, namun sepanjang tahun 2019 telah dilaporkan 6.205 kasus keracunan yang terjadi oleh BPOM Republik Indonesia. Institusi PPLP Yogyakarta memiliki 32 orang atlet dengan fasilitas penyelenggaraan makanan yang dilaksanakan oleh pihak ketiga. PPLP Yogyakarta belum pernah melakukan evaluasi terhadap penyelenggaraan makanan, oleh karena itu, perlu dilakukan penelitian dalam mengevaluasi penyelenggaraan makanan untuk atlet di PPLP Yogyakarta. **Tujuan:** Mengetahui hubungan antara skor CCP dengan uji mikrobiologi pangan serta mengetahui penerapan keamanan pangan terhadap kepuasan konsumen **Metode Penelitian:** Penelitian ini menggunakan design *cross-sectional survei* dengan menggunakan instrumen penelitian kuesioner dan formulir observasi lapangan. Pengujian mikrobiologi dilakukan dengan *sampling* lauk hewani secara acak dalam satu siklus menu kemudian sampel diuji oleh Balai Laboratorium Kalibrasi dan Kesehatan Daerah Yogyakarta. Validasi dan reliabilitas instrumen terkait kuesioner kepuasan konsumen terhadap kebersihan fasilitas makanan dan analisis bahaya pangan dilakukan menggunakan metode validasi ahli materi dan validasi populasi. **Hasil:** Berdasarkan penelitian yang telah dilakukan diperoleh mutu penyelenggaraan makanan PPLP Yogyakarta masih tidak memenuhi standar Permenkes RI nomor 1096 tahun 2011. Hasil observasi HACCP pada pengolahan makanan menunjukkan jumlah CCP setiap menu di antaranya ikan tongkol goreng 7, gepuk daging sapi 8, ayam bakar teflon sebesar 8, dan telur balado 8. Uji mikrobiologi menunjukkan tidak terdapat mikroba *Salmonella sp* pada semua lauk hewani. Analisis statistik menunjukkan tidak terdapat hubungan antara jumlah CCP terhadap kandungan mikroba *Salmonella sp*. Hasil uji angka kuman (ALT) menunjukkan telur balado mengandung angka kuman di atas ambang batas yaitu  $2.8 \times 10^6$  cfu/gr. Berdasarkan analisis *Spearman* diperoleh hubungan variabel jumlah CCP terhadap ALT adalah  $p > 0.05$  ( $p = 0.2254$ ). Kepuasan responden terhadap fasilitas makan sebesar 78.72% (puas). Sedangkan survei terhadap bahaya pangan menunjukkan bahaya fisik dan kimia termasuk pada kategori sangat sering ditemukan oleh konsumen. **Kesimpulan:** Mutu keamanan pangan catering PPLP tidak memenuhi standar Permenkes nomor 1096 tahun 2011. Tidak terdapat hubungan signifikan antara skor CCP pengolahan bahan pangan dengan kandungan mikrobiologi. Analisis responden penelitian menyatakan puas terhadap higiene dan sanitasi fasilitas makan yang disediakan namun masih sering menemukan bahaya fisik (batu/kerikil pada nasi) serta bahaya kimia (residu sabun) pada makanan maupun peralatan makan.

**Kata kunci:** *Keamanan pangan, HACCP, Uji Mikrobiologi, Kepuasan, Atlet*

## ABSTRACT

### EVALUATION OF FOOD PROCESSING ACCORDING TO HAZARD ANALYSIS CRITICAL CONTROL POINT (HACCP) SYSTEM ON ANIMAL SIDE PROCESSING SYSTEM ON MICROBIOLOGICAL TESTS AND ATHLEET SATISFACTION AT THE STUDENT SPORTS EDUCATION AND TRAINING CENTER

**Background:** Cases of food poisoning in the form of digestive disorders in athletes have been reported in many countries. In Indonesia, there have not been recorded cases of poisoning that have occurred specifically in groups of athletes, but throughout 2019 6,205 cases of poisoning have been reported by the BPOM of the Republic of Indonesia. The PPLP Yogyakarta institution has 32 athletes with food service facilities carried out by third parties. PPLP Yogyakarta has never evaluated the provision of food, therefore, it is necessary to conduct research in evaluating the provision of food for athletes at PPLP Yogyakarta. **Objectives:** To determine the relationship between CCP scores and food microbiological tests and to determine the application of food safety to consumer satisfaction. **Research Methods:** This study used a cross-sectional survey design using questionnaire research instruments and field observation formulas. Microbiological testing was carried out by sampling animal side dishes at random in one menu cycle and then the samples were tested by the Yogyakarta Regional Health and Calibration Laboratory. Validation and reliability of the instrument related to the consumer satisfaction questionnaire on the cleanliness of food facilities and food hazard analysis were carried out using material expert validation and population validation methods. **Results:** Based on the research that has been done, it is found that the quality of PPLP Yogyakarta's food service still does not meet the standards of the Minister of Health of the Republic of Indonesia number 1096 of 2011. The results of HACCP observations on food processing show the number of CCPs for each menu including fried tuna 7, beef gepuk 8, Teflon grilled chicken of 8, and Balado eggs 8. Microbiological tests showed that there were no Salmonella sp microbes in all animal dishes. Statistical analysis showed that there was no relationship between the number of CCPs and the microbial content of Salmonella sp. The results of the germ number test (ALT) showed that balado eggs contained germ numbers above the threshold of  $2.8 \times 10^6$  cfu/gr. Based on Spearman's analysis, the relationship between the number of CCP variables and ALT was  $p > 0.05$  ( $p = 0.2254$ ). Respondent satisfaction with dining facilities was 78.72% (satisfied). Meanwhile, a survey of food hazards shows that physical and chemical hazards are included in the category very often found by consumers. **Conclusion:** The food safety quality of PPLP catering does not meet the standards of Permenkes number 1096 of 2011. There is no significant relationship between the CCP score of food processing and microbiological content. Analysis of research respondents stated that they were satisfied with the hygiene and sanitation of the dining facilities provided, but they still often found physical hazards (stones/gravel in rice) and chemical hazards (soap residue) on food and cutlery.

**Keyword:** *Food safety, HACCP, Microbiology, Athletes, Satisfaction*