DETECTION MULTIDRUG RESISTANCE OF Escherichia coli BACTERIA COLLECTED FROM CLOACA SWAB OF BROILER CHICKEN AT PASAR WONOKROMO AND PASAR TAMBAH REJO SURABAYA

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ABSTRACT

This research was aimed to identify multidrug resistance of *Escherichia coli* bacteria collected from cloaca swab of broiler chicken at Wonokromo and Tambah Rejo traditional markets in Surabaya. Bacteria which were resistant to ≥3 types of antibiotics were referred as multidrug resistance (MDR). This research was using 5 types of antibiotics: *streptomycin*, *levofloxacin*, *cefotaxime*, *trimethropin*, *and chloramphenicol*. Seventy of broiler chicken samples were taken from Wonokromo and Tambah Rejo traditional markets with cloaca swab method. The samples isolated and identified with several procedures, Eosin Methylene Blue Agar (EMBA), Sulfide Indol Motility (SIM), and Triple Sugar Iron Agar (TSIA). Seventy samples were taken and seventy of them were identified as positive isolate of *Escherichia coli*. Bacteria sensitivity test was using Kirby-Bauer with Disc Diffusion Method and measured according to Clinical and Laboratory Standards Institute. *Escherichia coli* sensitivity test proved that multidrug resistance at Wonokromo Market was 85,7% and at Tambah Rejo Market was 51,4%.

Keyword: antibiotic, multidrug resistance, *Escherichia coli*, broiler chicken