MICROBIOLOGICAL ANALYSIS OF BROILER CHICKEN PRODUCTION LINE AT HAIRA GROUP OF COMPANY (PVT) LTD, ULAPPANA

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by

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ABSTRACT

In the past few years concern regarding food safety has increased among consumers due to continues reports of food borne outbreaks and food poisoning in many food establishments. Literature reveals that the meat industry is the most critical food sector to ensure the safety of the final products. Hence food safety is the most important factor to ensure consumer health from harmful effects. Present study was aimed to identify the potential biological hazards associated with the process of broiler chicken production in Haira processing plant at Ulappana. Initially the process flow diagram was constructed and all possible production steps were evaluated for microbial contamination. Microbial testing was conducted for the most potential pathogens in raw chicken meat including *E. coli* and Fecal coliform. Obtained data were analyzed using Dunnett comparison test against standard microbial limits using Minitab 16 statistical package at 0.05 significant differences. According to the results scalding, evisceration and freezing processing steps were considered as most critical points in this production line. Critical limits and possible preventive methods were suggested with the consideration of government regulations, company policies and scientific data from several literature sources to achieve safe broiler production.

Key words: - Food borne outbreak, critical limit, biologically critical points