

EFFECTS OF "CRYTEC" LIQUID ICE TECHNOLOGY TREATMENTS ON THE SHELF LIFE OF FRESH FISH

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Abstract

Microbiological load in food and especially in chilled food is important in assessing the safety and shelf-life of foods, the adherence to established Good Manufacturing Practice (GMP) and the suitability of food for a particular purpose. Following harvest, fish are immediately chilled ("Chill Kill" treatment) to reduce the risk of development of bacterial contamination. Comparison between the standard crystal ice and water mix combination (50% ice and 50% water) treatment with "Crytec" liquid ice treatment were conducted. Samples of fish muscle tissues were tested for total bacterial count and different pathogenic bacteria count. Fish were refrigerated at 2-4 °C for 14 days. Samples fish muscle tissues were taken periodically from both treatments and evaluated for bacterial load. The total bacterial count and different pathogenic bacteria counts in chilled fish are presented in the study.