ABSTRACT

Rico Ardiansyah Putra, 2018. NIT: 51145327 T, "Analysis of impeded refrigerant circulation to provision chamber cooling qualities in MV. Pan Daisy". Technical Study Program, Diploma IV Program, Polytechnic of Semarang Sailing Scout, Supervisor I: Mr. Amad Narto, M.Mar.E, M.Pd. and Supervisor II: Mr. Vega Fonsula Andromeda, S.ST., S.Pd., M. Hum.

On each vessel, to support the operational smoothness required the existence of a cooling machine. With a food cooler machine can be stored well in a relatively longer time than if stored in a regular place without any cooling. With room temperature controlled cooling will be able to inhibit the development of bacteria in foodstuffs that can cause the decay. To support, the process of storing and grooming the necessary feedstock from a refrigerating machine is that the refrigerating machine must be in good condition. With the provision to store vegetables and fruits in order to keep fresh room temperature required between 40°C to 100°C and for meat and fish room should be able to provide a temperature between -120°C to -180°C.

To analyze the occurrence of this problem, the researcher uses two methods of data analysis techniques such as Fishbone Analysis, and Fault Tree Analysis. method, method Fishbone Analysis researchers use to analyze factors that can cause tehambatnya refrigerant circulation on the cooling machine system, and Fault Tree Analysis (FTA) method researchers use to determine the root cause of the problem by re-analyzing the factors that cause problems that have been obtained from Fishbone Analysis method.

The main point of a good cooling machine is that the desired cooling room temperature should be achievable. There are many obstacles that cause the cooling room cannot become cold. One of the requirements for a cooling machine to work properly is that the freon circulation can not be disturbed. If the freon circulation is disturbed it will cause the evaporator capacity to evaporate in the evaporator will also decrease causing the cooling chamber to be unable to achieve the desired cooling temperature.

Keywords: Cooling machine, Fishbone Analysis, Fault Tree Analysis.