

SECTION III

BUTCHERING, RACKING AND STAGING

GMP 3.1 The time between thawing and the end of butchering must not exceed 2 hours for fish under 5 kg in weight, or 4 hours for fish 5 kg or greater in weight.

Note: Thawing is defined as ending when the thaw water is drained from the thawing tanks. Butchering ends when the fish are placed on the cooking racks.

REASON

In order to maintain the quality of the fish, the time between thawing and the end of butchering should be kept to a minimum and proportional to the sizes of fish under consideration. For fish weighing less than 5 kg, that time must not exceed 2 hours. For fish weighing 5 kg or more that time must not exceed 4 hours.

GMP 3.2 Fish shall be rinsed with safe, sanitary water before butchering.

REASON

In order to remove all extraneous and unwanted material from the fish, they shall be rinsed thoroughly using a sanitary water system.

GMP 3.3 Thawed or fresh fish shall be properly butchered, the belly cavities thereof thoroughly washed with safe, sanitary water, and the fish inspected for defects by well-trained and qualified personnel. All fish of questionable quality shall be examined, using sensory evaluation techniques and, where fish of unacceptable quality are found, all fish of the lot(s) involved shall be examined.

Butchering of fish



Recording temperature and quality of raw material

Segregation of rejected raw material



Any fish which are decomposed or rancid, fail to meet the tuna species requirements, or are too mutilated to process shall be segregated from acceptable tuna and disposed of for other than human food.

REASON

Proper butchering and washing is necessary to prevent bacteriological and enzymatic decomposition of the flesh. The gut of the fish harbours huge populations of spoilage organisms as well as autolytic enzymes and, therefore, it is critical that internal organs and viscera be removed quickly and completely and the belly cavity thoroughly washed with safe, sanitary water to protect sound flesh from contamination and subsequent decomposition. The external surfaces of fish also contain populations of microorganisms, and during butchering these surfaces may become further contaminated. Washing significantly reduces this bacterial load.

GMP 3.4 The butchered, washed and inspected fish shall be placed in an orderly manner, belly-down, in suitable non-corrodible metal racks of sanitary design, for movement into the pre-cooker.

Reasonable consistency in size shall be maintained amongst the fish in any given rack.

The racks shall be kept in a clean and sanitary condition.

REASON

It is necessary to ensure that the fish are pre-cooked at a uniform rate and that the cooking racks do not become a source of contamination to the product. The importance of placing the fish belly down on the cooking racks cannot be overemphasized. This arrangement allows the fish juices, oils, and rancid fat to drain off the fish during the cooking process. If the fish were belly up, these juices would collect in the belly cavities of the fish thereby penetrating and tainting the edible portions of their flesh. Unless the pre-cooking racks are properly sanitized, a build-up of proteinaceous material, juices, oils, fats, and other grime will occur and possibly contaminate and taint the edible portions of the fish flesh.

GMP 3.5 *The time during which fish are kept at the staging step must not exceed two hours for fish less than 5 kg in weight, or four hours for fish 5 kg or more in weight. If the ambient temperature exceeds 22°C, the maximum permitted staging time should be reduced accordingly.*

NOTE: Staging is defined as starting when the fish are placed on the cooking racks and ends when the racks have been placed in the cooker and the steam has been turned on.

REASON

In order to reduce the extent of bacterial spoilage, the staging time between butchering and pre-cooking should be kept to a minimum. The racks shall be kept in clean and sanitary condition.



Staging of gutted fish (5 kg. or less) should not exceed 2 hours