Food and Agriculture Organization of the United Nations

Elaboration of a table of nitrogen factors for quick frozen fish sticks, fish portions and fish fillets including procedure for determining nitrogen factors.

CALL FOR DATA

Background: The Codex Standard for quick frozen fish sticks (fish fingers), fish portions and fish fillets – breaded or in batter (CODEX STAN 166-1989) requires that the proportion of fish content be declared on the label. As specified in the standard, fish content can be estimated by the nitrogen factor end product method. A table of interim nitrogen factors was included in the standard at the 26th Session of Codex Committee on Fish and Fishery Products (CCFFP) and additional fish species were added in subsequent sessions (31st and 32nd Sessions). However, the Codex procedure for accepting new species in the table is time consuming, because studies pertaining to the concerned species are presented to CCFFP and discussions may go on for one or more sessions. If a uniform method is used for obtaining data, discussion could be briefer, but often this is not the case.

The natural levels of protein (and therefore, nitrogen) in fish flesh could vary depending on factors such as location of catch, season, size, spawning cycle and nutrition. In the case of farmed fish, culture conditions could affect nitrogen content. Currently, a +/-10% allowance for natural variation has been provided in the Codex Standard. However, it has been felt by many member countries that the allowance does not cover all natural variance observed and it has been suggested that the allowance should be statistically based and should cover 2 standard errors about the mean (approximately 95% of the distribution).

When fish are handled under good manufacturing practice (GMP), they are exposed to water and this may affect the nitrogen content. There are different views on whether nitrogen content should be based on fish that has not been exposed to water or ice or on fish handled under GMP conditions. Thus the data generated on on nitrogen factor should consider these variables.

The 34th Session of CCFFP confirmed the decision of 33rd Session to remove the table of nitrogen factors from the standard and to make it available for use by members through FAO website. The 34th Session requested FAO to develop a table of nitrogen factors that would include the data that was part of CODEX STAN 166-1989 and other statistical information from available data. The Committee desired that the Table should be a living document that can be updated as data becomes available from peer reviewed publications.

Call for data

In this context, FAO is requesting member country organizations responsible for fish safety and quality, and researchers on fish handling and processing to provide data

on nitrogen factors in fish species of interest to them. The data could be from peer reviewed publications or from accredited laboratories performing analysis of fish and fisheries products. The data should include information on:

- Fish species studied;
- Farmed or caught;
- In case of farmed fish, farming conditions;
- Harvest areas and dates (using FAO areas and subareas if possible: http://www.fao.org/fishery/area/search/en);
- Type of fish product analysed to derive nitrogen factor (eg dry fillet, minced block);
- Sample type (eg one fillet, 250gm of block);
- Number of samples, standard deviation;
- Method of analysis.

You are kindly requested to submit this information with the table in the annex, for easier data compilation.

Confidential and/or unpublished data

FAO recognize that some of the information and relevant data which is now required may be unpublished or of a confidential nature. With regard to unpublished information and data, this remains the property of the author for subsequent publication by the owner as original material. Unpublished confidential studies that are submitted will be safeguarded in so far as it is possible to do so without compromising the work of FAO. Specific issues relating to confidentiality should be discussed directly between the information and data owners and FAO. For these and other issues please contact FAO at the contacts provided.

Deadline

Please submit any relevant information via e-mail (if not too large) or contact us to provide you with a secure FTP site. The information can be submitted in any official United Nations language (English, French, Spanish, Arabic, Chinese, Russian), if possible, to the addresses below, by **31 May 2016**.

Data submissions in response to the call for data should be sent to:

Iddya Karunasagar and Esther Garrido Gamarro

Iddya Karunasagar International Consultant Fisheries and Aquaculture Department Food and Agriculture Organization of the United Nations Email: Iddya.Karunasagar@fao.org	Esther Garrido Gamarro Food Safety and Quality Officer Fisheries and Aquaculture Department Food and Agriculture Organization of the United Nations esther.garridogamarro@fao.org Tel.: +39 06 570 56712

Annex 1

Name of the institution/company/laboratory providing the data	
Fish species studied[1]	
Farmed or caught	
In case of farmed fish, specify farming conditions	
Harvesting areas[2]	
Harvesting dates	
Type of fish product analysed to derive nitrogen factor[3]	
Sample type (e.g. one fillet, 250gm of block)	
Number of samples	
Nitrogen Factor and Standard deviation	
Method of analysis	

1.Fish species studied, please use the scientific name from the ASFIS List (attached in the email).
2.Harvest areas and dates (using FAO areas and subareas if possible: http://www.fao.org/fishery/area/search/en);
3.Type of fish product analysed to derive nitrogen factor (e.g. dry fillet, minced block);