

COMPARISON OF ICCAT AND FAO TUNA DATA BASES

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It has been pointed out on various occasions in the past that ICCAT statistics are quite different from the tuna data issued by other agencies, such as the data in the FAO catch yearbook. As a matter of fact, there has been up to a 25 percent difference in total tuna catches in the Atlantic Ocean reported in these two series. This has led to some confusion among the users of tuna data because the results are different depending on which series of statistics is used.

ICCAT follows the policy for its data base of using the best scientific estimates, regardless of whether or not they coincide with national official statistics. On the contrary, the Food and Agriculture Organization of the United Nations (FAO) and other regional fisheries agencies in the Atlantic (e.g., NAFO, EUROSTAT, ICES, ICSEAF) have maintained the policy that only official statistics submitted from government statistical offices can be published. In such cases, scientists wanting to make population evaluations are obliged to adopt a set of working statistical files which is different from their official files.

In late 1984, ICCAT was informed by FAO that it was interested in improving its data on tuna catches. It seems that FAO has been trying to bring a little flexibility into its policy. Believing that keeping the two series consistent will increase the credibility of both series, the Secretariat agreed to assist FAO with its new project.

In early 1985, ICCAT created a program to compare the ICCAT data base with the FAO data base concerning catches of Atlantic tunas and tuna-like species. Since the catches in the ICCAT base are by gear and by areas different from FAO areas, we added all the reported catches of tunas in the Atlantic by country and species in each base and compared the two. The comparisons covered years 1970 through 1983 for which we have FAO data.

Almost two-thirds of the records did not match. Taking into account the different nature of the data, the discrepancies were not really surprising.

The ICCAT Assistant Executive Secretary visited FAO Headquarters and discussed the problem with the FAO Senior Statistical Officer, Mr. M. Robinson. They examined the causes for each of the discrepancies and agreed that, in many cases, the data in the ICCAT data base are more accurate since obvious errors made in national statistics offices were corrected by national scientists before being entered to the ICCAT base. Accordingly, FAO agreed to correct the obvious errors in the FAO data base. Since many less corrections will be required if we work on the ICCAT base rather than correcting the FAO base, it was agreed that ICCAT would create a base according to the agreements reached. The new base will become available in October, 1985.

Since many regional agencies (e.g., NAFO, ICES, ICSEAF, etc.) follow FAO's policy, these changes in data on the FAO base will create problems for those agencies. This was one of the major subjects of discussion at the inter-agency consultation meeting of the Coordinating Working Party (CWP), held in London on October 5 and 6, 1985 (text of the draft report is attached as Appendix 1).

Since these agencies record catches in detailed areas and time, the changes in annual total catch should be accompanied by corresponding changes in the detailed data. Since the FAO areas as well as the detailed areas used by each agency are different from ICCAT areas ($1^{\circ} \times 1^{\circ}$), computer processing would be required in breaking down the new totals into their areas if the new figures are adopted. ICCAT offered to make its data base available for the agencies to carry out such processing but could not offer to do this processing for them as it would involve too many man-hours and computer time.

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The conclusion reached by the CWP was that quadrilateral meetings would be required to solve the problem. For example, if FAO changes Portuguese data in an ICES area according to the data base provided by ICCAT, FAO (for the world tuna statistics), EUROSTAT (since Portugal will be the member of EEC) and ICES have to agree on such changes. Therefore, it was found that the program is important but not as simple as initially considered.

In the meantime, the Secretariat decided to correct the obvious errors in the ICCAT base. For example, some FAO's figures in earlier years for minor tuna-producing countries have been changed by FAO since ICCAT copied them. Some of these changes have not yet been picked up by ICCAT.

We do not intend to change any other figures provided by the scientists as best estimates or figures which have been agreed upon by the SCRS, regardless of whether or not the other agencies decide to adopt them.

Report of the ad hoc Inter-Agency Consultation on
Atlantic Fishery Statistics

London, 5 October 1985

1. PROCEDURAL ARRANGEMENTS

The meeting was attended by representatives of FAO, EUROSTAT, ICSEAF, ICES, ICCAT and OECD. A list of participants is attached. Mr. D Cross was elected Chairman, and Mr. M Robinson Secretary of the CWP acted as Rapporteur.

the Draft Agenda was presented and adopted. (See Annex B).

2. REVIEW OF PROGRESS IN IMPLEMENTING RECOMMENDATIONS OF CWP-12

- (i) Amendment of the distribution programme for the ISSCAAP species list (FAO)¹⁾

It was reported that it had not so far been possible to divert resources to this task from the urgent work of preparing the FAO Yearbook of Fishery Statistics for photo-composition. It would however be undertaken before the 13th Session of the CWP in February 1987.

- (ii) Investigations of the inclusion of non-official data in Agency Data Bases.

FAO reported that some progress had been made, but the problems of national susceptibilities and of providing continuity in the case of unofficial estimates made it necessary to proceed with extreme caution. It was noted that there were two types of faulty data - that misreported by error and that deliberately misreported. There was not

¹⁾The full text of this and the recommendation following can be found in the Report of CWP-12, FAO Fisheries Report NO. 316.

much the CWP could do about the latter type.

- (iii) Initiation of an inquiry into conversion factors (FAO). A form and notes for completion, which were ready for dispatch were circulated. The Consultation recommended, however, that a specimen form should be included in the questionnaire to aid national offices in its completion. The notes for completion should also be examined and possibly reformulated.
- (iv) Publication of a paper on log books and related work. It was noted that little work had been done because of doubts concerning the validity of data reported in log books if used also for enforcement purposes. However, FAO was urged to issue the log book paper prepared by Mr. J Pope with the minimum of amendment and as soon as possible. Other work on log books recommended by CWP-12 could form the basis of a separate report.
- (v) Value data. Data from 10 pilot countries were presently being analysed in the light of which a decision on future progress would be made. A constraint was a shortage of resources to permit the compilation of these data. The extraction of information from National Publications was, however, revealing significant differences to that obtained from the STATLANT and N.S. 1 forms.
- (vi) Submission of a paper on Socio-Economic data. The representative of OECD presented a draft paper (AHIC/85/?/) reviewing the need for economic and social data in fisheries management and the problem of their collection. It concluded that economic and social questions were largely national problems and that the data requirements for the study of these problems were often specific to the problem itself. The CWP was not seen as having a major role in this field although it should, where possible, encourage the standardisation of concepts.

- (vii) Review of STATLANT notes. This work was reported as being nearly completed. The new notes were generally regarded as being an improvement and FAO was thanked for having undertaken this task. It was noted, however, that the notes for Area 21 were still awaiting approval from the NAFO Secretariat.
- (viii) Review of STATLANT B data for Areas 27 and 34. Preliminary investigations of catch and effort data for the OCEAF area had shown this to be of value. Due to recent changes in the Secretariat of ICES, no report was yet available for that agency.
- (ix) STATLANT Newsletter. The EUROSTAT representative was requested to circulate to all agencies a list of recipients of the Newsletter so that this could be updated.

3. REVIEW OF PROGRESS ON HANDBOOK

The meeting was reminded that an original draft of the Handbook of Fishery Statistical Concepts and Definitions was being revised by Mr. Cross. The meeting expressed complete satisfaction with the way in which this document was being revised and looked forward to seeing a completed first draft at the time of CWP-13. Attention was drawn to the substantial size of the document in order that preliminary thought could be given to arrangements for its publication. In order to avoid having to reprint this large handbook every time an updating was required, consideration should be given to loose leaf treatment.

4. DISCREPANCIES

The EUROSTAT, ICCAT and FAO representatives reported on work aimed at the elimination of discrepancies between the various CWP agency data bases. It was noted that future work in this field, particularly for tuna catch data, would need quadrilateral consultation as reconciliation of data between FAO and ICCAT had implications for both EUROSTAT and other agencies. In this connection, both

Spain and Portugal were seen as countries for which the data discrepancies between agencies are significant.

At present, much of the work was at the level of major area totals and attention was drawn to the need for subsequent adjustment of the data at sub-area level.

5. REVIEW OF THE STATLANT SYSTEM

There was nothing to report under this item. Agencies were, however, requested to let the Secretary know before mid-November if there were any changes required in the STATLANT questionnaires or notes for completion.

6. AQUACULTURE STATISTICS

Attention was drawn to the existence of two STATLANT forms for the collection of data on aquaculture, namely one, which had been in use for several years for the ICES area, and another introduced for the first time in 1985 for all other areas. It was agreed after discussion that it would not be desirable to continue the two forms and a recommendation to this effect would be made to the ICES Statistics Committee. It was recognised that some slight modification might be required to the FISHSTAT AQ form which asked for other details than the AQ 27 form. In this connection, it was requested that information on the area (location) of production should be asked for. The notes for completion would also need improvement, among other things defining Brackish and Marine Waters, as well as clarifying what was a "pond", "enclosure" etc.

7. PROVISIONAL AGENDA FOR CWP-13

Among subjects which it was felt would require inter-agency consultation by February 1987 were:

1. Discrepancies (EUROSTAT)
2. Integration of value data into data bases (FAO)
3. Report on the Inter-agency Tuna Meeting (FAO)
4. STATLANT B data (area 34 and 27) (FAO and ICES)
5. Presentation of Draft Handbook (EUROSTAT)
6. Report on progress on integration of aquaculture forms (FAO)
7. Parameters on Fleet Statistics (EUROSTAT)
8. Periodicity and format of CWP meetings.

In addition the standard items of

9. Report on progress in implementing recommendations of CWP-12 (concerned Agencies)
10. Reports from agencies should also be included (all Agencies)

The names of agencies responsible for the preparation of documentation is given in brackets against the agenda items.