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TECHNICAL ADVISORY COMMITTEE (TAC)

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FISHERIES DATA AND INFORMATION ADVICE

INTRODUCTION

1. This document aims to provide basic background information to TAC in its effort to generate scientific and technical advice on improvement of collection, analysis, processing, dissemination of fisheries data and information at regional level.
2. Collection and use of accurate, up-to-date and reliable fisheries data are essential for sustainable management of fisheries. Therefore, the use of such data and fishery statistics have become a key component of modern fisheries management regime in which scientists have key roles in the generation of scientific advice for fisheries policy development and decision making based on the best available information and data.
3. Two types of data are collected in fisheries to support sustainable management of fisheries resources based on sound scientific advice: Fishery dependent and fishery independent data. The first usually include data on commercial fish landings, fishing effort and catch composition, as well as sea and port samplings. Such data are collected directly from fisheries and fishers are the principal providers of these data. Surveys and on-board observations, on the other hand, provide useful information, among others, on bycatch, discards and prohibited species. Fishery-independent data are collected through scientific researches, surveys and direct observations. Fisheries data that can be used by countries to support fisheries management are generally lacking in artisanal fisheries and recreational fisheries when compared to industrial fisheries. Furthermore, despite their high importance for fisheries management, relatively rare data are collected on socio-economics of fisheries. It should be noted that development of frameworks for systematic collection, process, analysis and dissemination of fisheries data in a scientific manner are generally costly and time consuming and requires concerted strategic planning.
4. Reported fish production in Central Asia (Azerbaijan, Kazakhstan, Kyrgyzstan, Tajikistan, Turkmenistan and Uzbekistan) has decreased dramatically after the collapse of the Soviet Union. A combination of institutional, economic, social and technical factors resulted in a serious decrease of reported fish production in the six countries. Several weaknesses in the fisheries sector of the region have been reported. One of these weaknesses is the collecting and analysis of fisheries data in a scientific and systematic manner. In terms of collection of reliable data collection and its subsequent analysis for fisheries management, the Central Asian and Caucasus regions have critical problems that pose considerable obstacles. These include:(1) Limited qualified personnel and institutional capacity of the respective governmental agencies;(2) inadequate statistical methods, tools and techniques;(3)

insufficient financial resources for data collection;(4) lack coordination mechanisms between respective agencies;(5) lack of policies or frameworks that assist the sector in its development in a sustainable manner; and;(6) the lack of technical and financial capacity of research institutes to conduct research on assessing fish resources.

5. Use of accurate, up-to-date and reliable fisheries data and information in supporting sustainable exploration of fisheries resources has become a primary principle of the international fisheries instruments. For example, FAO's Code of Conduct for Responsible Fisheries (CCRF), adopted in 1995, urges a fisheries governance based on timely, reliable and complete fisheries data and bilateral and regional scientific cooperation. In this regards, the CRRF includes a number of provisions on the fisheries data collection. CCRF 6.4 reads that "States should assign priority to undertake research and data collection in order to improve scientific and technical knowledge of fisheries including their interaction with the ecosystem. In recognizing the transboundary nature of many aquatic ecosystems, States should encourage bilateral and multilateral cooperation in research, as appropriate." The CCRF gives some roles to regional fisheries management organizations: "Subregional or regional fisheries management organizations or arrangements should compile data and make them available, in a manner consistent with any applicable confidentiality requirements, in a timely manner and in an agreed format to all members of these organizations and other interested parties in accordance with agreed procedures." (CCRF 7.4.7).

6. The findings of the Regional Workshop on Fishery and Aquaculture Statistics, Information and Trends: Improving Data Collection, Analysis and Dissemination (Antalya, Turkey, 12-14 April 2011) indicate that the region lacks fisheries data and information particularly for fisheries resource management and socio economics. The findings of the Workshop reveals that the region lacks fisheries socio-economic data and information. Besides, the workshop underlined that mechanisms for data collection and reporting requires substantial improvement at national and regional level. In the region, there is an imaging need to collect, process, analyze and disseminate accurate and reliable fisheries data on the fish landings, fishing effort, fisheries socio-economics, status of fish stocks, biology and spatial distribution of fish species, and fisheries ecosystems and habitats. A regional progressive improvement should be structured around clear, realistic and achievable mandates and objectives in order to make fisheries data more useable, compatible, standardized, efficient, reliable and complete in the context of fisheries management.

7. The following are the recommendations produced by the Workshop for consideration of the Commission:

a. Technically assist the member countries to develop and adopt effective and pragmatic standards and procedures for data collection, which should be compatible with FAO procedures. Activities could encompass:

- Capacity building fisheries data collection and fisheries statistics, including the use of appropriate approaches to improve the sampling frame.
- Establish and agree upon the major regional indicators for the fisheries and aquaculture.
- Support the development of appropriate national data bases/fisheries information systems

b. Promote collaboration between national fisheries and statistical authorities of the CACFish members, through the development of protocols of exchange of information and the development of a Central Asian and Caucasus Fisheries and Aquaculture Information System (CACFIS).

- CACFIS should facilitate networking and sharing of fisheries and aquaculture information, should be coherent and compatible with national systems and should respond to the specific information needs for sustainable development of fisheries and aquaculture in the Central Asian and Caucasus region.

- CACFIS should address the increasing needs for fisheries and aquaculture information in the region, facilitate the exchange of information, enable both public and private sectors to access essential information for their decision making, and contribute to increasing the visibility of the sector among the public.

8. Although the above-said recommendations were enforced by CACFish at its Inaugural Meeting (Istanbul, Turkey; 19-21 December 2011), more actions are required to make gradual progress towards the targeted structuring which requires specific technical and scientific advice. In this context, TAC would develop methodologies and set minimum criteria for regional databases, for instance, on key shared fish species, priority species, fishing effort, fish stocks, fishing vessels and aquaculture. These sorts of databases are thought to be useful for TAC during its scientific/technical advice producing process based on best available scientific data and information.

SUGGESTED ACTIONS FOR THE TAC

9. Against the above background, the Committee is invited to discuss and generate scientific/technical advice, for consideration of CACFish, on how to improve fisheries/aquaculture data/statistics frameworks for collection and use of more compatible, standardized, complete, accurate, up-to-date and reliable and complete fisheries data/information in supporting successful fisheries management in the competence area of the Commission.