

# Regional Consultation on Safety at Sea in Chennai, India



Forty-three persons from Bangladesh, India, Maldives, Sri Lanka, FAO, IMO, NIOSH, fisheries institutions, and NGOs, besides a few expert consultants, took part in the Regional Consultation on Safety at Sea for Small-Scale Fisheries, held in Chennai on 7 and 8 July, 2008. It reviewed the progress of the South Asian component of the global project on 'Safety at Sea for Small-Scale Fisheries in Developing Countries - GCP/GLO/200/MUL'.

The consultation was funded by the Swedish International Development Cooperation Agency (SIDA) and organized jointly by the FAO, the International Maritime Organization (IMO), the Alaska Centre of the National Institute of Occupational Safety and Health (NIOSH) and the BOBP-IGO.

Mr M K R Nair, Fisheries Development Commissioner, Government of India chaired the consultation.

Welcoming participants, Dr Y S Yadava, Director of BOBP-IGO, said the consultation would review the progress of the South Asian component of the global project on Safety at Sea, which is being implemented in Bangladesh, India, Maldives and Sri Lanka by the FAO in association with the BOBP-IGO. The Project also includes an IMO component that focuses on the development of safety standards for the design, construction and equipment of fishing boats in India and Sri Lanka – where many boats were damaged by the December 2004 tsunami.

Dr Yadava said that 24 000 deaths from fishing at sea occur every year, based on the statistics from developed countries. The figure for developing countries is not known, but could be much higher. He said

the global Project on Safety at Sea is aimed at improving the safety of small-scale fishers at sea through awareness and training and safer boats. Another component (being implemented with NIOSH funds) seeks to improve the reporting mechanism to facilitate planning interventions. He thanked FAO, SIDA, NIOSH, IMO and the Government of India for facilitating the consultation.

Mr Jeremy Turner, Chief, Fishing Technology Service, FAO, referred to recent global trends in fisheries. He said that the number of fishers as well as fishing capacity had declined everywhere in the world except Asia. This increase did not auger well for the fishery resource. Reducing fishing capacity was an urgent need. Safety at sea was a complex challenge and needed to be addressed from different angles. He hoped the consultation would contribute to the project's success in South Asia.

In his welcome address, Dr Gavin Wall, FAO Representative in India, explained the role of the FAO in agriculture in general and fisheries in particular. He said that some

three billion people live within 60 km of coastline; of these, some 40 million are involved in fishing. He described the FAO as a knowledge manager – it collects, analyzes and disseminates information from a global perspective to help sustainable and responsible management of agriculture and fisheries. FAO also assists technological developments in member-countries, like building value chains from producers to consumers. Community-based fishing models are now the focus of research. The aim is to promote infrastructure, planning and diversification to add to value and improve livelihoods," said Dr Wall.

Expressing his happiness over a programme that concentrated on safety at sea, Mr Nair said that small-scale fishing vessels are ill-equipped and vulnerable to accidents. Most accidents occur due to faulty vessel design, human error and natural calamities. International instruments on safety at sea do not cover small-scale fishing vessels. He urged a holistic approach to



*Dr Gavin Wall, FAO Representative in India delivering the welcome address.*

tackle the problem of safety at sea for small-scale fishers and hoped that the consultation would help progress in this direction.

### Technical presentations

The Technical Session included 12 presentations on activities of the Safety at Sea Project, both global and regional; integration of safety at sea into fisheries management; draft guidelines on safety of fishing vessels below 24 m overall length (OAL); training needs of fishers; community mobilization; the status of legislative support to small-scale fisheries management in the four project countries.

Mr Jeremy Turner made the first presentation on “Safety at Sea as an Integral Component of Fisheries Management”. He said a vicious circle exists, where increasing fishing effort leads to depleted stocks and reduced catch per unit of effort. This forces fishers to increase capacity. In the process, they enter into a debt trap. Fishers are also trying to diversify into new fishing techniques for which they are ill-trained and ill-equipped, and are cutting costs and endangering safety. Fishers in general are overworked and fatigued – these are some of the main causes of accidents at sea. The solution lies in safer boats with regulations, training, enforcement and compliance, said Mr Turner.

There are two kinds of fishers who circumvent or ignore safety regulations, said Mr Turner: the greedy ones, who must be regulated, and those who cut costs for economic reasons, who would otherwise comply with feasible regulations. Explaining who fisheries management can address safety issues, Mr Turner said that 12 years ago Alaska had one of the highest fatality rates in fishing. But with a new fishery management regime, the accident rate fell dramatically.

He stressed the importance of information on the causes of accidents. Such data could be



*Mr Jeremy Turner*



*Mr Per Danielsson*

publicized to educate fishers and raise their awareness. Further, conditions should be created to improve safety. Better management would improve economic viability, which, in turn could enable stronger safety measures, said Mr Turner. He pointed out that regulations were meaningless without enforcement and compliance. Fishers, fisher families and other interest groups should be involved in formulating regulations.

Mr Per Danielsson, coordinator of the global project on Safety at Sea for Small-Scale Fishers, gave an idea of the global context of the Project. He said its immediate objective was fewer accidents at sea. Long-term objective: to improve the livelihoods of coastal populations.

He said the project was being implemented in South Asia (Bangladesh, India, Maldives and Sri Lanka) and West Africa. In South Asia, the project was expected to improve the system of reporting and analysis of accidents at sea; improve rules and regulations for safety of small-scale fishing vessels in line with the FAO/IMO voluntary guidelines; and better the integration of safety at sea and fisheries management.

Mr R Ravikumar, Regional Coordinator of the South Asian component of the Safety at Sea Project, said that the safety guidelines developed by the erstwhile BOBP for Sri Lanka – after boats there started operating multi-day trips in excess of their capabilities, resulting in accidents – were valid even today. The present Project aimed at pilot-scale activities to build awareness and develop some technical guidelines. Experiences gained could help formulate a larger project to promote safety at sea.

Mr Ravikumar said that the weather, the design of vessels, fishing regulations and human behavior were the factors that affected safety at sea. “Lack of a safety culture, willingness of fishermen to accept risks because of open access, forsaking safety for money, and lack of a structural approach for establishing safety norms were some important human factors. Stakeholders concerned with safety at sea are fisher communities, boatbuilders, national agencies and the coast guard.”

He said the immediate requirements were to review baseline data, assess knowledge gaps and prioritize awareness building. Thereafter, a media campaign would be designed and committees set up for monitoring. The awareness materials developed so far related to safety precautions, pre-voyage and post-voyage checklists, internationally accepted distress signals, engine checklists and a video on maintenance of small diesel engines.

A training course curriculum was being developed. It aimed at training fishers to adapt to a rapidly growing modern fleet. The poor quality of fiberglass boat construction in India and Sri Lanka had to be addressed, by training boatbuilders in good FRP practices and ensuring that boatyards adopt working conditions and quality control practices, said Mr Ravikumar.



Expressing his concern about owner-labour relations in marine fisheries, Mr Ravikumar said that owners often fixed targets for the boat crew to meet, without considering safety needs, especially in adverse weather conditions.

Asked how the project would train illiterate fishers, Mr Ravikumar said that fishers couldn't be expected to stop fishing to attend safety classes. The project therefore intended to train a cadre of trainers including some progressive fishers, who would in turn train the fishers.

Dr G Conway, Director, National Institute of Occupational Safety and Health (NIOSH), Alaska Centre, described the "Need for Surveillance and Reporting of Fishing-related Accidents at Sea". He said that in the early '90s, Alaska tied with Iceland in having the most dangerous fishing industry. But the situation improved greatly in a span of 5 to 6 years, and no deaths were reported in 2005. The lessons from Alaska were valid elsewhere. "The first step is to know the problem and address it in the most effective way possible". He presented a model format for surveillance and data collection.

Mr Oyvind Gulbrandsen, naval architect and consultant, presented the proposed "Guidelines on Safety of Fishing Vessels below 24 Meter Length".

He said that maritime safety began with the British Parliament amending the 1871 Merchant Shipping Act to end overloading of cargo in ships. Insurance companies demanded that boats be built to certain standards. But these safety regulations applied only to larger vessels. International standards and regulations on boats less than 24 meters overall length evolved only during the last 30 years, mainly due to the increasing use of FRP for small boats in Europe, the growing number of accidents caused by poor design and construction, and the need for uniform standards all over Europe.



*The Regional Consultation in progress.*

"Poor quality equates to unsafe boats", said Mr Gulbrandsen. He added that many fishing vessels capsized in inclement weather due to shortcomings in their design. Distress communication was poor or non-existent and fishers often did not receive storm warnings.

He pointed out that in most Indian boats, fishers still do not carry a radio. Inflatable life rafts are expensive; rigid life floats acting as buoyant apparatus are ideal substitutes, he said. In the late 90s, a rigid FRP life float was designed as an alternative to the inflatable life raft under a Technical Cooperation Project of the FAO in Andhra Pradesh, India. Some 100 such floats were distributed to trawlers in the State, said Mr Gulbrandsen.

If rules in BOBP-IGO member-countries were not properly enforced, initiatives like the present Project would have little meaning, Mr Gulbrandsen cautioned. An independent authority (the Coast Guard in some countries) was needed to implement and enforce safety regulations. He said that fishermen should not be singled out and targeted for compliance with safety regulations; boat owners and boatbuilders should also be targeted.

In discussions that followed the presentations, a representative of the Indian Coast Guard said that there were no regulations to stipulate carrying of life saving

appliances on board seagoing fishing vessels. Dr Yadava said that such stipulations did exist in the Marine Fishing Regulation Acts of coastal States, but were not effectively enforced.

Mr Turner remarked that the real challenge lay not in preparing rules and regulations but in enforcing them. Involving the community in enforcement may help solve the problem. Realizing this, the state governments in India are handing over management of some of the fishing harbours to stakeholders. But the sheer number of fishing vessels, especially smaller ones, poses a formidable obstacle, said Mr Turner.

#### **Country presentations on the status of legislative support to small-scale fisheries management**

The delegate from Bangladesh said that fisheries legislation in Bangladesh largely aims at resource conservation. The Marine Fisheries Ordinance, 1983 makes a license obligatory for sea fishing. Other important policy documents: the 1998 National Fisheries Policy, the 2000 National Fisheries Strategy, and accompanying sub-strategy and action plan. A committee has been formed to adapt the 1995 FAO Code of Conduct for Responsible Fishing to Bangladesh.

The delegate from India said that that Part XV A of the Merchant Shipping Act, 1958 and amendments to it, enjoined fishing

vessels to carry at least two life buoys, one life jacket per crew, EPIRB, SART, life raft and fire fighting appliances. A draft manual on Convention for Standard of Training, Certification and Watch keeping for Fishing Vessels (STCW-F) has also been finalized. It awaits government approval. He said that enforcement of safety regulations in India is weak.

The delegate from Maldives said that the Coast Guard conducts safety inspections once or twice a year. It works in cooperation with the local Atoll Administration and the Federal Government. Safety regulations were promulgated in 1984 but strict enforcement commenced only in 2000. These have been welcomed by fishers. The Government makes regular weather forecasts available to fishers in association with a US-based agency. It has trained some 200 fishers in downloading and using weather information. Fisheries cooperatives are getting popular in the Maldives.

The Sri Lankan delegate said that life-saving appliances are not yet mandatory in fishing vessels. But multi-day fishing boats get a 24-hour high frequency communication network service, and are equipped with SSB radio, while 22 land stations around the island provide weather forecasts. Sri Lanka has also undertaken a programme to build community awareness on safety at sea.

### **Management and Training Issues**

Dr Y S Yadava made a presentation on "Linking Fisheries Management and Safety at Sea". Analyzing the prevailing fisheries management regimes in BOBP-IGO member-countries, he identified gaps with respect to safety. He said that motorization of traditional crafts in India, had increased risks for fishers. Safety is a micro concept, it isn't properly addressed by macro policies, he said. The way boat owners and crew react to policy measures must be studied. The capacity of the community should be built through the precautionary



approach to management and awareness campaigns, Dr Yadava said.

Mr Roger Kullberg, Fisheries Officer, FAO made a presentation on "Training needs of Small-Scale Fishers in Safety at Sea". He explained the three lines of defense to prevent fatalities at sea. "Prevention is the first defense. It is the most effective and the cheapest. Next is survival and self-rescue. The third, search and rescue (SAR), is the least effective and the most costly. Training must be tailored to the needs of small-scale fishers and should be undertaken by specialized persons. Special attention should be paid to make the teaching material relevant".

Dr Dilip Kumar focused on "Mobilizing Community in Safety at Sea". Drawing lessons from the FAO/ UNDP/ Government of Bangladesh Project on 'Empowerment of Coastal Communities for Livelihood Security', Dr Kumar said village-level organizations should be community-driven, and should be motivated and facilitated to engage in participatory resource management. Over a period of time, they could become problem-solvers.

### **Group Discussions**

On the second day, the consultation divided itself into three groups to discuss (i) guidelines and other outputs of the Project, (ii) enforcement and implementation of rules and regulations, and (iii) integrating safety at sea into fisheries management.

**Guidelines and other outputs of the Project:** Group 1 noted that traditional boats had evolved over years and were generally safe. But modifications such as motorization added to their risks. While member-countries classified boats on the basis of overall length, the proposed draft guidelines classified them on the basis of sea conditions. The Group recommended that member-countries consider parameters such as area of operation and sea conditions in boat classification. Apart from technical guidelines, member-countries should also consider parameters such as crew accommodation and installation of equipment with regard to stowage, etc, which were part of IMO and ILO guidelines.

Analyzing the training manuals developed under the Project, the Group noted that some training programmes on navigation, boatbuilding and boat maintenance were already being conducted in member-countries. But these targeted the requirements of merchant shipping and did not meet the needs of small-scale fishers. The Group suggested training programme for small-scale fishers that were site-based, with a curriculum and timing suited to them.

The Group urged that a critical mass of trainers be built up in each country, who could then train a large number of fishers. Village Information Centers (VICs) could help out with accident-reporting and information on weather conditions. Pilot-scale projects ought to be implemented to gauge the efficacy of VICs in recording and disseminating information.

### **Enforcement and implementation of rules and regulations for safety at sea:**

On the basis of the experiences of member-countries in enforcing rules and regulations concerning safety at sea, Group 2 suggested several measures.

Fishing vessels and personnel must be insured. Life-saving appliances



on each vessel should be mandatory. Low-cost but good-quality LSA appliances should be developed for use by small-scale fishers. All boats should carry navigational aids such as compass, GPS, etc. Navigation lights were important too, even small boats should have some form of light. Solar-powered lights should be promoted, especially for smaller fishing vessels.

Some other measures: All boats, irrespective of their area of operation, should carry adequate ration, drinking water, fuel, signals, etc. Boatbuilding yards, irrespective of their size and capacity, should be registered. Boat designs must be standardized and based on approved specifications. All boats must have a standard communication system, depending on the area of operation of the boat. For smaller vessels fishing in inshore waters, cell phones are useful. Discussions with the cell phone companies to increase the range as also affordability may be considered. Community-based safety training programmes for fishers should be organized. The BOBP-IGO should discuss the issue of fishers who drift into the waters of a neighbouring country and get jailed. Standard procedures for repatriation of fishers and their boats should be worked out.

Group 2 suggested awareness programmes; pooling of resources by the enforcement agencies concerned; capacity building and increasing staffing to carry out the all-important job of compliance with safety regulations.

***Integration of Safety at Sea into Fisheries Management:*** Group 3 said that member-countries ought to strive for sustainable management of marine fisheries resources and secured livelihoods of fishers. But they are hampered by lack of manpower, finance and infrastructure, a poor database and a weak MCS. The Group urged NGOs and the media to raise the profile of safety at sea issues. It suggested the following measures to integrate safety into fisheries management in the region:

They should build awareness on safety at sea and set up community-based organizations. Registration and licensing of fishing boats should be through a single window system and multiple licensing should be avoided. Income generation schemes should compensate fishers for loss of livelihood during closed seasons and areas, while savings schemes should be implemented to build up their assets.

Fishers should take part in planning, implementing, monitoring and

evaluating resource use, and should coordinate with other stakeholders. Boat owners should provide job security for fishers, minimize their stress, and insure boat and crew. The Government should facilitate setting up of market chains; traders should pay fishers fair prices. The Coast Guard should broaden its role and train fishers on various aspects of safety at sea such as communication and use of life-saving appliances. Research organizations in member-countries should determine the maximum sustainable yields in the respective EEZs and provide inputs on harvestable potential.

### **Concluding Session**

Mr Turner said an enormous amount of work was needed to improve the sea safety regime, and a strong political will was imperative. He called for an International Plan of Action for Sea Safety, which could guide national policies. He said the current phase of the Project would end by December 2008, but he hoped that BOBP-IGO in association with FAO would engage countries in further developing the safety regimes.

The chairperson thanked the BOBP-IGO for a successful Consultation in cooperation with the FAO. He said that the integration of sea safety and fisheries management was a new dimension well-received by the participants.

Welcoming the draft guidelines on safety, he said that after finalization, they should be used by member-countries to prepare standards and revise safety laws for fishers. He hoped that the BOBP-IGO would re-align its work programme accordingly. He also suggested a Regional Plan of Action on safety issues to enable a National Plan of Action in the member-countries.

Dr Yadava thanked the FAO, SIDA, IMO and NIOSH for their support and member-countries for their active participation.



*Participants at the Regional Consultation on Safety at Sea.*