## **DISCUSSION PAPER NO. 7**

# **Implications of Fishery Sector Subsidies:**A Review of Issues in Light of WTO Negotiations

Debashis Chakraborty
Animesh Kumar



#### **Centre for WTO Studies**

IIFT Bhawan B 21, Qutab Institutional Area New Delhi

# Implications of Fishery Sector Subsidies: A Review of Issues in light of WTO Negotiations

by

#### **Debashis Chakraborty**

Assistant Professor Indian Institute of Foreign Trade New Delhi

and

#### **Animesh Kumar**

Research Fellow Centre for WTO Studies New Delhi

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Published by

Centre for WTO Studies Indian Institute of Foreign Trade IIFT Bhawan Qutab Institutional Area, New Delhi – 110016 Website: http://wtocentre.iift.ac.in

September 2010

Written by

Dr. Debashis Chakraborty Mr. Animesh Kumar

Printed at Apex Printing House, Baba Gang Nath Market, Munirka, New Delhi - 110067

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**Acknowledgement:** We are grateful to Prof. Vijaya Katti, Chairperson (Research), IIFT and Prof. Shashank Priya, Centre for WTO Studies, IIFT for their helpful comments and suggestions on earlier versions of our research. We also thank Mr. Purna Chandra Jena for providing excellent research assistance during this research. We, however, are fully responsible for all remaining errors.

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#### **List of Abbreviations**

ACP	African, Caribbean and Pacific
AD	Anti-Dumping
APEC	Asia-Pacific Economic Cooperation
ASCM	Agreement on Subsidies and Countervailing Measures
DDA	Doha Development Agenda
DFID	Department for International Development
DWF	Distant Water Fleets
EC	European Commission

EEZ	Exclusive Economic Zones
EFH	Essential Fish Habitat
ETB	Economics and Trade Branch
EU	European Union
FAO	Food and Agriculture Organization
FC	Financial Contribution
FERU	Fisheries Economics Research Unit
FPA	Fishery Partnership Agreements
FSM	Federated States of Micronesia
GFT	Government Financial Transfers
HSBT	High Seas Bottom Trawl
ICTSD	International Centre for Trade and Sustainable Development
ILO	International Labour Organisation
IUCN	International Union for Conservation of Nature
IUU	Illegal, Unreported and Unregulated Fishing
LDC	Less Developed Countries
LOS	Law of the Sea
LTFR	Less-Than-Full-Reciprocity
MCS	Monitoring, Control & Surveillance
MRAG	Marine Resources Assessment Group
MSA	Magnuson-Stevens Implementation of Alaska
NEPA	National Environmental Policy Act
NGR	Negotiating Group on Rules
NMFS	National Marine Fisheries Service
NOAA	National Oceanic and Atmospheric Administration
NTB	Non-Tariff Barriers

	OECD	Organisation for Economic Co-operation and Development
	ORF	Operations, Research, and Facilities
	PAC	Procurement, Acquisition, and Construction
	S&DT	Special and Differential Treatment
	SCM	Subsidies and Countervailing Measures
	SDT	Special and Differential Treatment
	SEAMAP	Southeast Area Monitoring & Assessment Program
	UNCLOS	United Nations Convention on the Law of the Sea
	UNEP	United Nations Environment Programme
	VMS	Vessel Monitoring System
	WTC	World Trade Centre
	WTO	World Trade Organisation
	WWF	World Wildlife Fund
ı		

# **Section 1**

# Introduction

#### 1.1 Introduction

Ensuring a vibrant fisheries sector is extremely important for the economy of the developing and less developed countries (LDCs) in general and India in particular. Adoption of effective measures and management practices for this sector is capable of generating significant long term gains in terms of food security (supply of animal protein to the population), income, employment, foreign exchange earnings and social well being.

The importance of the fishery sector in world economy becomes obvious from the fact that it provided direct employment to more than 250 million people for their livelihoods during late nineties (Porter, 1997) and the number has increased considerably since then. In addition, around 40 per cent of global fishery production is exported, and nearly half of international trade in this category is explained by developing country exports (Dommen and Deere, 1999).

It needs to be noted that there exists a difference in the exportable surplus sourcing behaviour of developed and developing countries. Developing countries \LDCs generally export the fish caught by their domestic fleets operating within their own Exclusive Economic Zones (EEZs). However, they might decide to sell their EEZ access rights to foreign fleets for an agreed period of time in return of financial contributions, if domestic capacity is limited. Therefore, several developed countries as well as some select developing countries can secure

their exportable surplus from beyond their physical boundaries. The entry of developed country fleets in developing country \LDC waters however might potentially lead to over-fishing, which the existing access agreements may not completely take care of. As a consequence, a major source of fisheries and fisheries related employment in the developing countries \LDCs might generally be lost to the developed countries.

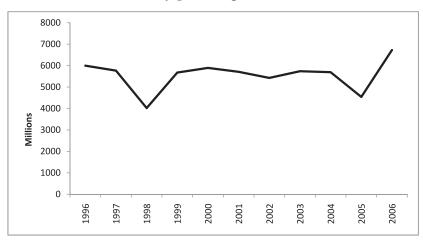
However, a more serious concern area is that several developed countries provide subsidies to their fishing fleet (e.g. fuel subsidy), which on one hand provides unfair cost advantages to them and may further increase the over-fishing pattern on the other. The implications of increased fishery subsidies in the North for developing countries like India is that on one hand the imported fishery products could be subsidized and therefore compete unfavourably with the Indian varieties at the local market. On the other hand, the domestic products of other countries could be subsidized and put Indian exports to their home markets at a disadvantage. For instance, the fishermen in a developed country, aided by access right transfers, fuel subsidies and subsidized fishing gear would always be privileged enough to catch more fish, and market it at a lower price, as compared to their developing country and LDC counterparts.

#### 1.2 Incidence of Subsidies in Fishery Sector

The extent of subsidization in the fishery sector by the major players over the period 1996-2006 could be observed from the data on Government Financial Transfers (GFTs) obtained from OECD Factbook (2009), which is reported in **Annex 1**. It is observed from the table that that major subsidizing countries include the developed and advanced developing

countries in North America (Canada and the US), Europe (Spain, Norway, Italy, UK, France and Denmark), Asia (Japan, Korea and Turkey) and Australia. While in 1996 the total amount of subsidies provided in these countries stood at US \$ 5997.79 million, the figure has increased to US \$ 6726.67 million in 2006. However, as observed from **Figure 1** in the following, the increase in total fishery sector subsidy in the 12 countries has not witnessed a linear growth. The volume of total subsidy had declined to US \$ 4019.90 million in 1998 (due to non-reporting of subsidy data by certain countries), which however increased to US \$ 5676.34 million in the following year. Over 1999-2004, the level of total subsidy reached a plateau, but declined to US \$ 4539.95 million in 2005. However, a decadal peak of US \$ 6726.67 million in the subsidy level has been reported in 2006, which is a matter of grave concern for the developing countries.

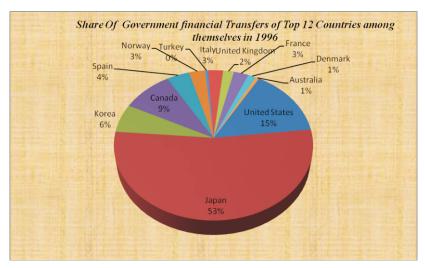
Figure 1: Total Government Financial Transfers trend in 12 Major Subsidy-providing Countries



Source: Data obtained from OECD (2009

It is observed from the data reported in **Annex 1** that the US and Japan have consistently remained the two major subsidy-providing countries over the period. However, the relative importance of the major subsidy providers has undergone a marked transformation over the last decade. **Figure 2** in the following shows the contribution of the 12 countries in the total subsidy basket for the year 1996. It is observed that in 1996 Japan was the highest fisheries subsidy provider in the World. In particular, the subsidy provided by Japan (53 per cent) was greater than the combined volume of subsidies provided by the other eleven countries. The US (15 percent) and Canada (9 percent) were placed at a distant second and third position respectively.

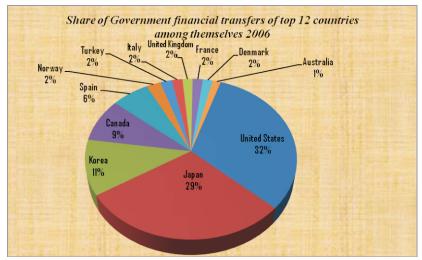
Figure 2: Proportional Contribution of 12 Major Subsidizing Countries in 1996



Source: Data obtained from OECD (2009)

The second pie chart shows the distribution of fishery subsidies provided by the 12 countries for the year 2006. In that year, the US provided maximum amount of subsidy (32 percent), with Japan finishing second close behind (29 percent). Looking at **Annex 1**, it was observed that while the volume of subsidy provided by Japan has gradually reduced, on the contrary the same for the US has increased over this period. Other major countries providing substantial volume of GFTs included Korea (11 percent) and Canada (9 percent). The proportional contribution of countries like Australia (1 percent) and the UK (2 percent) in GFTs remained more or less constant.

Figure 3: Proportional Contribution of 12 Major Subsidizing Countries in 2006



Source: Data obtained from OECD (2009)

#### 1.3 India's Export of Marine Products

The marine exports hold a special position in India's export basket. Annex 2 shows India's marine export to major trade partners over 1995-2008. The ranking of export destinations in the table has been done on the basis of value of marine export in the year 2008. It is evident from the table that Indian marine exports have been highest to Japan for all years except 2002-2006 during which export to the US was the highest. India's marine product export to Japan has declined over the years, which could partially be explained by the weaker domestic demand and stringent SPS-TBT requirements. Moreover, a declining trend is noticed with respect to the US market since 2003 as well. It may not be a coincidence altogether that these two countries are the major subsidizers in the fisheries sector. Other countries like Canada, Singapore and the UK have also shown increase in import volume from India, barring minor annual fluctuations at various points. Marine export to China and Spain is however increasing continuously over the years. On the other hand, export to United Arab Emirates is falling continuously and its rank in India's marine export destination declined from 2 in 1995 to 10 in 2008.

The observations made from the above table could be reinterpreted through a different angle for better understanding, i.e., through the prism of fishery sector subsidies. In **Annex 3**, Indian export of fishery products to the countries providing high quantum of subsidies to their domestic fishery sector is reported. Here again the country ranking is done on the basis of the value of Indian export in the year 2008. In this case a number of new countries are included in the table.

It is observed from **Annex 3** that the US and Japan remains as the top two export destinations. It is observed that Indian export to this set of countries barring the exception of Korea is not

increasing over the period. The findings adds credence to the possibility that the provision of fishery subsidy in these countries is leading to excess supply of fishery products in these markets, providing unfair price and cost advantages to the local players and restricting entry of developing country exporters like India. The detailed break-up of fishery subsidies given by these countries will be shown in Section 3 of this report.

#### 1.4 Fishery Subsidies and their effect on Trade

#### 1.4.1 Increased fishing capacity

A major proportion of the fisheries subsidies lead to overcapacity of the global fishing fleet, through subsidization of vessels, equipment and labour in one way or the other. The encouragement to creation of overcapacity could be provided either through subsidization of capital costs / variable costs or by ensuring price supports. It has been reported at times that the current size of the global fishing fleet is much larger than the sustainable limit (WWF, undated).

#### 1.4.2 Overexploitation of fishery resources

Creation of over-capacity in a country often leads to overexploitation of the fish stocks owing to increased fishing intensity, both in own country as well as in the developing countries through access rights route. More importantly the economic signals of overcapacity and overexploitation (e.g. reduced productivity, lower catches) often go unnoticed because of huge government support, which aggravate the problems further. In addition, the provision of subsidies through price support may increase the number of operators, and add to the consequent environmental risks. WTO (1999) noted that, "The aquatic environment and its productivity are on the decline. Some 58 per cent of the world's coral reefs and 34 per

cent of all fish species are currently at risk from human activities. Most oceans are already overfished with declining yields" (p. 2). Sharp and Sumaila (2009) also noted that US fishery subsidies may potentially increase overcapacity.

#### 1.4.3 Unfair competition

Subsidies provided by several developed countries distort competition by lowering production costs for their fishery sector, thereby giving them an artificial competitive advantage. In particular, these producers may undersell other producers (from the developing countries / LDCs) by charging a relatively lower price, i.e., may gain market share at the expense of unsubsidized competitors.

#### 1.5 Recent WTO Negotiation on Fishery Sector

Since fishery subsidy and consequent overfishing are global trade and environmental problems, the debate at the multilateral forum has focussed on how to create a responsible and sound utilization of marine resources. Keeping in view the livelihood issues and food security concerns of developing countries and LDCs, the Doha Development Agenda (DDA) (WTO, 2001) emphasized the need to incorporate their interests by ensuring a fair deal within the WTO framework. The DDA (2001) stated that the participants shall clarify and improve WTO disciplines on fisheries subsidies taking into account the importance of this sector to developing countries.

The World Summit on Sustainable Development in Johannesburg (2002) also supported the need to eliminate subsidies that contribute to illegal, unreported and unregulated fishing (IUU) and also to creation of over-capacity. Echoing the same spirit the Ministerial Declaration of the sixth WTO Ministerial Conference at Hong Kong (WTO, 2005) recalled the

commitment to enhance mutual cooperation and collaboration on trade and environment, and advocated the need to reach a broad agreement in the fisheries sector, including the prohibition of certain forms of fisheries subsidies that contribute to overcapacity and over-fishing. The declaration also noted the need for appropriate and effective Special and Differential Treatment (SDT) for developing countries and LDCs taking into account the importance of this sector to their development priorities, poverty reduction, and livelihood and food security concerns.

Currently at the WTO, the negotiations on fisheries subsidies fall within the activities of the Negotiating Group on Rules (NGR). A broad agreement has been reached on the need to regulate fisheries subsidies and till date several countries have made submissions on this front. The current negotiations revolve to a great extent around identifying subsidies that are considered harmful for the interest of Member countries, especially developing countries and LDCs.

The negotiating positions of the WTO Members could be classified under two broad headings. First, a 'Top-down approach' is advocated by the 'Friends of Fish' group, who argue that all fisheries subsidies should be prohibited apart from certain exemptions. The members of this group include Australia, Chile, Ecuador, Iceland, New Zealand, Peru, Philippines and the US. Second, a 'Bottom-up approach' is advocated by another group of countries which argues that all subsidies should be allowed, apart from those that is specifically prohibited. Members of this group include Japan, Korea and Taiwan. The position of the EU is located in between (OECD, 2006b). Despite the differences in the negotiating approach within the two groups, there is a general agreement that subsidies that support capital costs should be prohibited (e.g. the acquisition, modification or construction of fishing vessels).

However, it is also important to restrict subsidies provided to operating costs such as fuel, labour etc.

There is a need to take into account the special development compulsion of the developing countries and LDCs through the use of appropriate and effective SDT. To further this goal, China, India and Indonesia have called for exemptions for developing country small-scale fishermen from subsidies disciplines in terms of infrastructure, capital and operating costs. Interestingly, some developed countries have also requested exemptions for their small-scale fisheries (DFID, undated b). However, implementation of SDT requires the following issues to be resolved first: the criteria to be used in identifying eligible fisheries for SDT; territorial limits on the use of SDT; the need for effective management of subsidised fisheries; how access rights for foreign fleets should be treated etc. (DFID, undated b).

The WTO has also included the fish and fish products under its sectoral initiative under NAMA, along with several other product categories. However, the Hong Kong Ministerial (2005) and subsequently the December 2008 NAMA Text (WTO, 2008) have made the sectoral initiative non-mandatory. It is a longstanding argument of the developing countries at the negotiating forum that the reduction of the tariff barriers to zero in both developed and developing countries constitute a violation of the 'Less-Than-Full-Reciprocity' (LTFR) principle promised in the DDA. Moreover, until and unless the ill-effects of subsidization and other forms of Non-Tariff barriers (NTBs) are phased out, the mere reduction of tariff barriers are not likely to enhance the market access level for the non-agricultural sectors in developing countries. For instance, the fishery sector is marked with several standard related provisions, which hamper market access for developing countries (ICTSD, 2006). Reduction in fisheries subsidy holds a critical role in that perspective as well.

#### 1.6 Research Questions

In order to understand the extent of subsidization in developed countries in general and the same for the prohibited subsidies in particular, and the access of the developing country EEZs by the developed countries, the current analysis raises the following three questions.

First, NGR Chair's text of 30 November 2007 (TN/RL/W/213) identifies a list of subsidies provided by various countries (Article-1), which are most trade-distorting. The list of these proposed prohibited subsidies is provided in **Annex 4**. The current study intends to gauze the presence of Article 1 subsidies in major subsidizing countries, so as to understand the possible extent of trade distortion.

Second, NGR Chair's text of 30 November 2007 also identifies a list of proposed exceptions (Article-2), which might be allowed. The details of the proposed exceptions are mentioned in **Annex** 5. As a complement to the earlier exercise, the importance of Article-2 subsidies in the countries listed in Annex 3 is explored in the current context.

Over the years, the incidence of fisheries access right transfers from developing countries and LDCs to developed countries have increased and the actual benefits received by the former group is a debated research question. The current analysis attempts to understand the scenario through a secondary survey of the terms and conditions under which such access rights have been granted and what quantum of benefit has been obtained by developing country Members through transfer of such access rights.

#### 1.7 Structure of the Study

The study is organized in the following manner. First, the methodology used in the current context for analyzing the data is discussed in the second section. The third section provides a cross-country country analysis on fishery sector subsidies. The problems associated with fuel subsidies and tax exemptions are discussed next in the fourth section. The fifth section analyzes the concerns pertaining to access rights transfers. Finally on the basis of the findings, the observations and policy implications are summarized.

## **Section 2**

# Classification of Subsidies and the Methodology

#### 2.1 Classification of Subsidies

# 2.1.1 WTO Agreement on Subsidies and Countervailing Measures

According to the WTO Agreement on Subsidies and Countervailing Measures (SCM), subsidy provided by a government or any public body is measured through direct transfer of funds (e.g. grants, loans, and equity infusion), potential direct transfers of funds or liabilities (e.g. loan guarantees); foregone government revenue (e.g., fiscal incentives such as tax credits); provision of goods or services other than general infrastructure, receipt of government payments through any form of income or price etc. The SCM agreement classifies the subsidies under three broad categories, namely: (1) Prohibited subsidies, (2) Actionable subsidies and (3) Non-actionable subsidies (WTC, 1994).

The prohibited subsidies are used to stimulate the consumption of domestic products at the expense of its imported equivalent, or given to the production of exported goods which will cause unfavourable competition in the international markets. Countervailing measures can be imposed on these type of subsidies. The actionable subsidies also provide unfair advantage to the domestic producers and hence attract

corrective measures. The non-actionable subsidies on the other hand cover non-specific areas like assistance to research activities, assistance to disadvantaged regions, assistance to promote adaptation of existing facilities etc. These subsidies do not attract countervailing measures.

#### 2.1.2 Subsidies on the Fishery Sector

With reference to the subsidies in the fisheries sector, the modalities have been arrived at by following the WTO SCM agreement. The prohibited / actionable subsidies, as reported in the Article 1 of Annex VIII of the WTO Document TN/RL/W/213 (WTO, 2007), are reported in Annex 4 of the present study. It is observed from the document that the subsidies directly distorting production and trade as well as resource-depleting ones are placed in this category. Subsidies under this head include: subsidies aimed at acquisition, construction, repair, renewal, renovation, modernization, or any other modification of fishing or service vessels; subsidies on operating costs of fishing or service vessels (including licence fees or similar charges, fuel, ice, bait, personnel, social charges, insurance, gear, and at-sea support) or subsidies to cover operating losses; subsidies to develop port infrastructure or other port facilities exclusively or predominantly related to marine wild capture fishing (for example, fish landing facilities, fish storage facilities, and in- or near-port fish processing facilities); income support for associated natural or legal persons; price support for products of marine wild capture fishing etc.

The general exceptions, as reported in Article 2 of WTO (2007) are reported in **Annex 5** of the current study. The idea here is to allow the least-distorting subsidies, which bear minimum impacts on production and trade. These permitted subsidies

include: subsidies for improving fishing or service vessel and crew safety; subsidies for adoption of gear for selective fishing techniques and other techniques aimed at reducing the environmental impact of marine wild capture fishing; subsidies for compliance with fisheries management regimes aimed at sustainable use and conservation; subsidies exclusively for reeducation, retraining or redeployment of fishworkers into occupations unrelated to marine wild capture fishing or directly associated activities; subsidies exclusively for early retirement or permanent cessation of employment of fishworkers; subsidies for vessel decommissioning or capacity reduction programmes etc.

DFID (undated b) has noted that the focus of the WTO negotiation is to ensure that prohibited subsidies must be listed, and for a specific subsidy not to be prohibited there will have to be an explanation of why it does not contribute to overcapacity and overfishing. However, for taking an action against a member, the exact WTO-incompatibilities need to be identified. One way of ensuring that would be to put in place notification mechanisms for Members to regularly report the quantum and type of subsidies they are currently providing. The current analysis intends to check whether such a reporting mechanism is in place or not.

#### 2.2 Methodology

#### 2.2.1 Transparency and enforcement

The major problem experienced during the current research has been lack of data availability from country sources. There is considerable scope of enhancing the transparency of the present fisheries subsidies reporting by the WTO Members (which never classifies data in terms of Article 1 and Article 2 subsidies). There are currently no legal consequences if a government fails to

provide notification of subsidies. This particularly calls for adoption of new rules to cover issues of transparency and enforcement. Unresolved questions like: how to deal with subsidies that are not being notified; to what extent notifications should include information about the management conditions of subsidised fisheries; and how rules on notification can be enforced (DFID, undated b), also needs to be addressed.

#### 2.2.2 Data sources

The present study is based on secondary data, collected from various sources that include online databases as well as reports published by multilateral bodies. The individual country budget documents as well as academic research reports as published by international institutes and journals are also consulted. However, given the inter-governmental nature of WTO negotiations, the report has tried to rely on Government and multilateral sources, wherever feasible.

The lack of required data points from the individual country sources could be explained with the help of **Annexes 6, 7.1** and **7.2** respectively. As explained earlier, the entire focus of the current WTO negotiations is to limit the provision of subsidies coming under Article 1 (i.e., actionable subsidies). **Annex 6** reports the fishery sector support requests / enactments in the US as obtained from National Marine Fisheries Service over 2006-08. However, as evident from the table, it may not be easy to segregate the Article 1 and Article 2 subsidies as reported in the table. Moreover, the status of several subsidy categories remains ambiguous. For instance, it is not clear whether subsidies coming under 'Federal Ship Financing Fund' are meant for construction or de-commissioning of vessels. Similar problem is faced with respect to categories like 'other projects'.

A similar picture emerges, if the provisions of EU fishery subsidies, as reflected from the Common Fisheries Policy Documents are consulted. The country-wise provision of fishery subsidies in the EU is reported in **Annexes 7.1** and **7.2**. It is observed from the tables that though a few Article 1 (construction of new vessels, modernisation of existing vessels, fishery port facilities, processing and marketing) and Article 2 subsidies (scrapping, socio-economic measures) are clearly recognizable from the list, many subsidies mentioned in Article 1 remains unaccounted for. Similarly, the provision of fishery subsidies in countries like Japan has also not been reported in very detailed manner.

Therefore, due to paucity of data availability from individual countries, the current study considers the fishery sector subsidy data reported by OECD (2006a, 2009) for obtaining a homogeneous and comparable data series for different type of subsidies for all major subsidizing countries. The problem however is that OECD database (2006a) does not report the subsidy data for the covered countries in terms of Article 1 and Article 2 subsidies. The reporting on fishery subsidy is rather done under some broader categories like 'direct payments', 'cost reducing transfers', 'general services' and 'cost recovery charges'. The constituents of the four categories, as explained by OECD, are reported in **Annex 8** and **Annex 9**. The first three of these four categories are considered in the current context. Detailed breakups of subsidy data is however not available even for the OECD countries in the most recent reported source (OECD, 2009), which provides data over 1996-2006. Moreover even for the OECD countries the detailed break-up data are available only for the period of 1996 to 2003 (OECD, 2006a).

Research reports like Khan et al (2006) and Sumaila et al (2006) have also attempted to bridge the existing gap by trying to arrive at a classification of subsidies of their own, namely: 'good' (non-

actionable subsidies), 'bad' (actionable / prohibited subsidies) and 'ugly' (ambiguous subsidies) subsidies. The classifications, constructed for the year 2000, are reported in **Annex 11**. The table shows that in terms of ugly subsidies Canada is located at the third position, next to Japan and the United States. However, since no consistent data series is generated by these types of reports, they cannot be taken as the basis for multilateral negotiation.

# 2.2.3 Classification of the OECD data on Subsidies in the WTO-prescribed format

In order to solve the data availability problem, a concordance between the WTO classification of subsidies (Article 1 and Article 2) and the OECD classification of subsidies (direct payments, cost reducing transfers and general services) is attempted by the current study on the basis of the definitions. The generated concordance has been reported in **Annex 10**.

Though the concordance provides a clearer perspective on the classification of the actionable / non-actionable subsidies, the data problem still remains owing to overlap of reported subsidies between the categories. For instance, 'direct payments' under the OECD classification includes both 'price support payments to fishers' and 'disaster relief payments'. While the former is an Article 1 type subsidy, the latter falls under Article 2 category.

Similarly under 'cost reducing transfers', 'fuel tax exemptions' and 'government funded training of fish processing workers' could be classified under Article 1 and Article 2 subsidies respectively.

Finally, looking at the 'general services' category, it is observed that while entries like 'support to build port facilities for commercial fishers' distort production and trade and hence comes under Article 1, other categories such as 'grants to local authorities for retraining of fishers into other activities' create the opposite effect and are placed under Article 2.

Though arriving at a definitive conclusion on Article 1 / Article 2 subsidies prevailing in developed countries is not possible due to the reported overlap; judging by the concentration of subsidy categories under various heads, it could be noted that Article 1 subsidies are broadly falling under 'direct payments' and 'cost reducing transfers'. However, it is to be noted that several Article 2 subsidies are also included in these two categories. On the other hand, the exemptions (Article 2) are mostly concentrated under 'general services' category, despite having some Article 1 subsidies included within that group.

#### 2.2.4 Fuel subsidy

For estimating fuel subsidy, various online available resources for the major subsidy providing countries are consulted. Then following the methodology adopted by Tyedmers et al (2005), a country's total fuel subsidies is obtained, based on fleet fuel consumption and per unit subsidies provided by it for the year 2000. In order to harmonize and compare the generated fuel subsidies, in case of some countries (e.g. - Norway and Japan); the subsidy estimate in their local currencies has been converted into US dollar by using the historic exchange rate of the respective years on December 31.

#### 2.2.5 Data discrepancies

Since the individual countries are not always providing detailed data on fishery subsidies, the current study had to rely on the OECD database for the same. However, two different databases in OECD (OECD, 2006a and OECD, 2009) had to be consulted for

fulfilling the terms of reference of the current report. While OECD (2006a) provided a detailed break-up of different subsidy categories over 1996-2003, OECD (2009) provided the figures on total fishery subsidies over 1996-2006. However, there exist wide discrepancies between the data provided by OECD (2006a) and OECD (2009)¹. Moreover, if the data is compared with estimations provided by academic reports, the extent of this divergence is increased. The extent of difference in the reported volume of fishery subsidy data for the major subsidy providing countries among all three sources is shown with the help of **Table 1** in the following, for the year 2000.

It is interesting to note that the amount of subsidies reported in OECD (2009) has been consistently higher as compared to the same provided in OECD (2006a), barring the exception of Denmark. On the other hand in the last column the amount of fishery subsidy for the same set of countries during 2000, as obtained from the FERU sources is reported. The discrepancy between the FERU database (which reports estimated figures) and the data reported in OECD (2009) is clearly visible.

Norway is the only country for which the value of fishery subsidies remained the same in both OECD (2006a) and OECD (2009). However, the divergences for some other countries like Denmark, Spain and the US are found to be very large. The above analysis here considers only one year (2000). The data

An attempt was made to seek clarification on this front from OECD. OECD reply stated that countries often provide revised data for previous years, which might be responsible for the divergence. It also might reflect a methodological difference. For instance, in case of Australia, OECD (2006a) reported figures are OECD estimates; while OECD (2009) data is based on the country submission.

Table 1: Government Financial Transfer to Fisheries for different countries in 2000 – Divergence in Reported Sources

(US \$ million)

	Source				
	OECD 2006a	OECD 2009	FERU Online Database		
Australia	68.997	82.272	431.340		
Canada	478.158	564.497	866.873		
Denmark	45.600	16.316	884.018		
France	156.239	166.147	343.443		
Italy	150.232	217.679	247.311		
Japan	2863.558	2913.149	5314.522		
Korea	311.781	320.449	693.059		
Norway	104.564	104.564	270.540		
Spain	285.688	364.096	574.460		
Turkey	25.572	26.372	65.931		
United Kingdom	69.394	81.394	208.555		
United States	805.130	1037.71	1484.023		

Source: Constructed from FERU Online database and OECD (2006a, 2009)

divergence problem persists even if other years and other sources (i.e., other academic reports like FERU) are considered.

The data discrepancy problem for the fishery subsidy is however not new. The potential underreporting of fishery subsidy at strategically important forums has always been a major bone of contention, as even the country reporting to various international / intergovernmental / multilateral bodies show wide variation. For instance, WWF (2001) noted that the data provided by twelve major subsidy-providing countries to OECD and APEC and the same provided to the WTO do not always match. The differences, as reported in the literature, is shown with the help of **Table 2**.

Table 2: Some discrepancies in fisheries subsidies reported from 1996 to 1997

(US \$ billion)

Country / States	Officially reported government subsidies to the OECD and APEC		Amount of government subsidies reported to the WTO	
	1996	1997	1996	1997
Japan	8.2	3	5	0
EU	0.9-1.0	0.8-1.0	0.6	0.7
Canada	0.8	0.7-0.8	0.6	0.7
Korea	0.4	0.3-0.4	0.04	0.05
Taiwan	0.1	0.2	NA	NA
Norway	0.2	0.2	0.01	0.02
Spain	0.1	0.2	0.07	0.07
Italy	0.08	0.07	0	0
China	0.06	0.05	NA	NA

WWF (2001) and Sumaila and Pauly (2006)

Several studies have attempted to find the underlying logic behind the widespread discrepancies and measure the source of under-reporting of the data in case of major subsidy-providing countries. For instance, WWF (2001) mentioned that the US provided subsidies under the capital construction fund, with known costs of administration, but the actual subsidy figures provided to the fishing industry was not reported. Similarly, Japan in 1996 reported to the WTO that it has provided US \$ 5 billion as subsidies for tax preference programs under fisheries, but the same was not included in either of its reported data to the OECD or APEC. Milazzo (1998) reported that while China was annually providing around US\$700-800 million to this sector, it officially reported only US \$ 50 million subsidy in its reported statistics to APEC. The OECD (2006a) study, for the US on the other hand neither reported the federal subsidy program on fishing access payments nor did attempt to calculate state subsidies. A similar underreporting in case of fuel subsidies is also widely reported in the literature (Khan et al, 2006; Sumaila et al, 2008).

All these observations stress the need to enhance transparency in fishery subsidy data reporting by the Members at the WTO in no uncertain terms. In the current context, the study has taken recourse to both OECD sources for the analysis: OECD (2009) for the trend in overall subsidies, and OECD (2006a) for the composition of the same.

## **Section 3**

# **Country Studies**

#### 3.1 Introduction

As mentioned in Section 2 earlier, the detailed break-up of the subsidies provided by the major countries are reported from OECD (2006a). The detailed data series are reported in the Annexes. Since the detailed break-up is available for only three categories, in order to understand the overall picture, the discussions in the current section reports the country-wise average annual subsidy distribution. For doing so, in line with data availability, the annual average of the overall subsidy level, as well as the same for the three components, namely: (1) direct payments, (2) cost reducing transfers and (3) general services, is taken over the period of 1996-2003. Then the contribution of the three components in the overall subsidy level over this period is reported in the following charts. The discussion on the major subsidy providing countries here has been provided in the alphabetical order of their names.

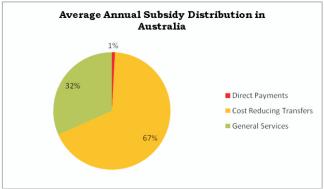
#### 3.2 Fishery Subsidies in Australia

Australia is one of the major fishery subsidy providers in the world, though it's ranking has declined over the period. It is observed from **Annex 1** that in 2006 it was ranked twelfth in terms of subsidies provided to the fishery sector. On the other hand, in 2004 it entered among the top 10 countries and the quantum of subsidies provided by it exceeded the same done by the United Kingdom and Turkey.

It is observed from **Annex 1** that according to OECD (2009) the extent of subsidies provided by Australia has witnessed considerable fluctuations over time. It is observed that the subsidy given by Australia declined from US \$82.27 million dollars in 2000 to US \$78.03 million dollars in 2002, but increased to around US \$95.55 million dollars during 2003 and 2004. Though the level of subsidy declined in 2005 to US \$46.29 million, again in 2006 it has increased to US \$89.99 million.

The detailed break-up of the subsidies provided by Australia are witnessed from **Annex 12**. **Figure 4** in the following summarizes the distribution of the subsidies over 1996-2003. It is observed from the figure that general services constitute a major proportion of overall subsidies (32 percent), which contains several Article 1 subsidies. Cost reducing transfers however accounts for the maximum proportion of subsidies (67 percent) offered during this period. On the other hand, incidence of subsidies coming under direct payments has not been very significant (1 percent).

Figure 4: Average Annual Subsidy Distribution in Australia (1996-2003)



Source: Constructed on the basis of OECD (2006a) data

#### 3.3 Fishery Subsidies in Belgium

The data on fishery subsidies in Belgium is reported in **Annex 13**. It is observed from the table that OECD (2006a) does not report the data on cost reducing transfers for the country during 1998-2002. It is observed from the table that the volume of subsidies has not increased considerably over the period. While the level of subsidies remained around US \$ 4.3 - 4.9 million during 1996-99, it increased to US \$ 7.47 million in 2000, but declined in the subsequent period. In 2003, the subsidy level stood at US \$ 4.12 million.

**Figure 5** shows the distribution of various types of fishery subsidies in Belgium. Given the fact that cost reducing transfers were not used for a considerable period during the period of observation, they constitute the lowest proportion (19 percent). The general services subsidies explain 37 percent of the subsidies provided during this period. However, subsidies coming under direct payments explain a significant proportion (44 percent), signifying possibility of trade diversion on that count.

Average Annual Subsidy Distribution in Belgium

Direct Payments

Cost Reducing Transfers
General Services

Figure 5: Average Annual Subsidy Distribution in Belgium (1996-2003)

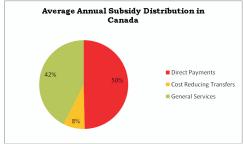
#### 3.4 Fishery Subsidies in Canada

Canada consistently remained among the top 5 subsidy providing countries in the world since 1996, though the monetary value of the subsidies over the period has witnessed limited fluctuations. As observed from **Annex 1**, in 1996, Canada was providing a subsidy of US \$ 545.30 million, which declined to US \$ 433.30 million in 1997, but increased to US \$ 606.44 million in 1999. Since then a fluctuating trend has been witnessed, and for the years 2005 and 2006, the subsidy level stabilized at US \$ 591 million.

The detailed break-up of fishery subsidies in Canada over 1996-2003 is reported in **Annex 14** and the distribution of subsidies is shown with the help of **Figure 6**. In contrast to Australia, Canada is providing most part of its subsidies as direct payment, which contributed to almost half of the total subsidies given. However, it needs to be noted that absolute values of subsidies under direct payments has decreased over 1996-2003 (**Annex 14**). Subsidies coming under cost reducing transfers increased from their 1996 level to 2001, but declined during 2002 and 2003. It accounted for 8 percent of the total subsidies. On the other hand subsidies under general services increased considerably over this period, and explained 42 percent of the total subsidies.

Figure 6: Average Annual Subsidy Distribution in Canada (1996-2003)

Average Annual Subsidy Distribution in



#### 3.5 Fishery Subsidies in France

Among the developed countries, France is another consistent provider of subsidies; always retaining a position among the top 10 players in the world. However like other countries, the amount of the fisheries subsidies has showed wide fluctuations over time (Annex 1). It was providing a subsidy of US \$ 158.20 million in 1996, which declined to US \$ 71.66 million in 1999, but increased to US \$ 166.14 million in the following year. The subsidization of the fishery sector reached an all time peak in 2004 with an overall subsidization of US \$ 236.81 million, but has subsequently declined to US \$ 113.77 million in 2006.

The category-wise break-up of fishery subsidies in France over the period under consideration is reported in **Annex 15** and the distribution of subsidies is shown with the help of **Figure 7** in the following. It is observed that general services category has been the most significant constituent of France's subsidization pattern (76 percent), while the direct payments (17 percent) and cost reducing transfers (7 percent) account for the remaining proportion.

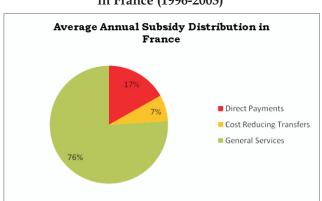


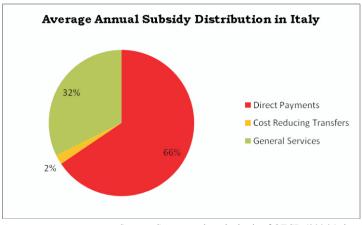
Figure 7: Average Annual Subsidy Distribution in France (1996-2003)

#### 3.6 Fishery Subsidies in Italy

From **Annex 1** it is observed that the total fishery sector subsidization in Italy has fluctuated over the period. In 1996, the subsidy provided by Italy stood at US \$ 162.62 million, but it increased to US \$ 231.68 million in 2001, after reaching a low of US \$ 91.81 million in 1997. The fishery subsidies provided by Italy have stabilized at around US \$ 119.23 million over the last two reported years (i.e., 2005-06).

The detailed break-up of fishery subsidies in Italy over 1996-2003 is reported in **Annex 16.1** and the distribution of subsidies is explained with the help of **Figure 8**. It is observed from **Annex 16.1** that while cost reducing transfers are not reported for a major period, subsidies coming under general services are declining over time. As a result, Italy provided majority of its subsidies as direct payments (66 percent) during the period of observation. On the other hand, general services accounts for only around one third of the total subsidy (32 percent). Cost reducing transfers has however been relatively less in volume (2 percent).

Figure 8: Average Annual Subsidy Distribution in Italy (1996-2003)



A further detailed break-up of the fishery subsidies in Italy can also be obtained from OECD (2006a) for 2004, which is reported in **Annex 16.2**. It is observed from the table that the transfers include both Article 1 (fishery infrastructure expenditure, investment and modernisation schemes, income support etc.) and Article 2 (payments for vessel decommissioning, management, research and enforcement etc.) subsidies. However, data on payments for access rights transfers was not reported.

#### 3.7 Fishery Subsidies in Japan

Japan has retained the top position in the World in terms of fishery subsidy for most of the period in the past. It is seen from **Annex 1** that the amount of subsidy provided by Japan has continuously fallen over the period 1996 to 2006, barring the exception of 1999, 2000 and 2004. While the level of subsidies in Japan in 1996 stood at US \$ 3186.36 million, the same has declined to US \$ 1985.07 million in 2006.

The detailed break-up of fishery subsidies in Japan over 1996-2003 is reported in **Annex 17.1** and the distribution of subsidies is shown with the help of **Figure 9**. Interestingly, according to OECD (2006a), on an average most of the subsidies (around 98 percent) in Japan had been given towards General Services. Direct payments (1 percent) and cost reducing transfers (1 percent) consist of very small part in total subsidy. This is conflicting with the findings under **Annex 11**, where it was observed that for the year 2000 Japan was the highest subsidy provider for all three categories of subsidy, namely, beneficial (good), harmful (bad) and ambiguous (ugly). This in a way corroborates the views expressed by WWF (2001) on underreporting and differential reporting by countries to different agencies.

Average Annual Subsidy Distribution in Japan

1% 1%

Direct Payments

Cost Reducing Transfers

General Services

Figure 9: Average Annual Subsidy Distribution in Japan (1996-2003)

Source: Constructed on the basis of OECD (2006a) data

Annex 17.2 reports a relatively detailed break-up of fishery subsidies in Japan over 2001-03, as obtained from OECD (2006a). It is observed from the table that more than half of the reported expenditure is undertaken for infrastructure development, which may include development of port infrastructure for marine wild capture fishing (i.e., Article 1 subsidies). The other Article 1 subsidy reported in the table is interest subsidy. On the other hand, categories like management, research and enforcement payments and vessel decommissioning expenditure falls under Article 2 category.

#### 3.8 Fishery Subsidies in Korea

Korea has been the third highest subsidy provider country in the list of twelve countries during 2006, and ranked next to the United States and Japan (**Annex 1**). It was always ranked among the top 5 countries during the period of 1996-2006, and the subsidy level is on the rise ever since 2003. It has increased its subsidy level from US \$ 367.79 million in 1996 to US \$ 752.15 million in 2006.

The detailed break-up of fishery subsidies in Korea over 1996-2003 is reported in **Annex 18** and the distribution of subsidies is explained with the help of **Figure 10**. Looking at the components, it is observed that cost reducing transfers and direct payments remained more or less constant over this period, while the subsidies coming under general services showed an increasing trend. A significant proportion of the subsidies are provided under general services category (66 percent), while the remaining proportion is explained by direct payments (19 percent) and cost reducing transfers (15 percent).

Average Annual Subsidy Distribution in Korea

19%

Direct Payments

Cost Reducing Transfers

General Services

Figure 10: Average Annual Subsidy Distribution in Korea (1996-2003)

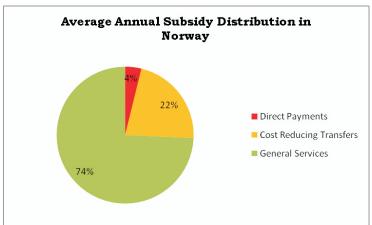
Source: Constructed on the basis of OECD (2006a) data

#### 3.9 Fishery Subsidies in Norway

Norway has reduced the amount of fisheries subsidy over time. While in 1996, the level of the subsidy was US \$ 172.69 million, it was reduced to US \$ 99.46 million in 2001 (**Annex 1**). The amount of subsidy however increased to US \$ 159.51 million in 2006.

The detailed break-up of fishery subsidies in Norway over 1996-2003 is reported in **Annex 19.1** and the distribution of subsidies is explained with the help of **Figure 11**. It is observed from the table that while subsidies under general services have increased in recent years after suffering from a decline in 2000 and 2001; the cost-reducing transfers have declined considerably over this period. The direct transfers have remained more or less constant. The general services explain a major proportion of the total transfers by Norway (74 percent). Direct payments on the other hand constituted a relatively insignificant proportion of overall subsidy (4 percent). Average cost reducing transfers remained significant (22 percent), but the historical figures (cost reducing transfers during 1996-99) played a key role there.

Figure 11: Average Annual Subsidy Distribution in Norway (1996-2003)



Source: Constructed on the basis of OECD (2006a) data

Annex 19.2 reports a relatively detailed break-up of fishery subsidies in Norway over 2001-03, as obtained from OECD (2006a). It is observed from the table that several Article 1 subsidies (fishery infrastructure expenditure, cost reducing

transfers, income support etc.) are reported there, though Article 2 subsidies (management, research and enforcement payments, vessel decommissioning payment) can also be spotted.

#### 3.10 Fishery Subsidies in Spain

It is observed from **Annex 1** that the fishery subsidies given by Spain have increased considerably during the period 1996-2006. While the level of subsidies in 1996 was US \$ 246.47 million, the same increased somewhat consistently in the subsequent period. The subsidy level in 2006 stood at US \$ 425.36 million.

The detailed break-up of fishery subsidies in Spain over 1996-2003 is reported in **Annex 20** and the distribution of subsidies is shown with the help of **Figure 12**. It is observed from the table that the volume of direct payments has declined from the 1996 level to 2002, but increased by more than five times in 2003 from the 2002 level. Subsidies classified under cost reducing transfers and general services also displayed increasing trend over the study period. During the period of 1996-2003, on an average 42 percent the subsidies was given to the fishery sector as direct payments. Subsidy under cost reducing transfer (36 percent) and general services (22 percent) also had significant presence during this period.

Average Annual Subsidy Distribution in Spain

22%

42%

Direct Payments

Cost Reducing Transfers

General Services

Figure 12: Average Annual Subsidy Distribution in Spain (1996-2003)

Source: Constructed on the basis of OECD (2006a) data

#### 3.11 Fishery Subsidies in Turkey

Turkey has entered the league of the top 10 subsidy provider countries only during the recent years. In fact, only in 2005 and 2006 Turkey was among the top 10 subsidy provider countries in the world (**Annex 1**). It is observed that the amount of subsidy provided by Turkey decreased from the 1996 level to 2003 with minor fluctuations, but has increased ever since. While the subsidy level in 2003 was US \$ 16.30 million, the same reached the level of US \$ 133.88 million in 2006.

The detailed break-up of fishery subsidies in Turkey over 1996-2003 is reported in **Annex 21** and the distribution of subsidies is explained with the help of **Figure 13**. It is observed from the table that almost all the subsidy is being provided under general services (99 percent). No subsidy was provided as direct payments during 1996-2003. Moreover, no subsidy was

provided under the cost reducing transfer category since 1997. However, since the data does not provide detailed break up of Turkey's recent subsidization, no conclusion on the current constituents can be drawn.

Average Annual Subsidy Distribution in Turkey

O%7/1%

Direct Payments

Cost Reducing Transfers

General Services

Figure 13: Average Annual Subsidy Distribution in Turkey (1996-2003)

Source: Constructed on the basis of OECD (2006a) data

#### 3.12 Fishery Subsidies in United Kingdom

It is observed from **Annex 1** that the subsidy level in UK resembled a U-shaped contour. The subsidy level declined from US \$ 115.35 million in 1996 to US \$ 73.73 million in 2001, but showed an increasing trend since then. In 2006 the level of subsidy was at US \$ 114.65 million, which is slightly lower than the corresponding 1996 level.

The detailed break-up of fishery subsidies in UK over 1996-2003 is reported in **Annex 22** and the distribution of subsidies is shown with the help of **Figure 14**. It is observed from the table

that the direct payments have reduced considerably since 1998, while the cost reducing transfers have also come down over the period. The support under general services has also been reduced. As a result of these changes, on an average a major proportion of the subsidy is provided on general services category (90 percent), followed by direct payments (6 percent) and cost reducing transfers (4 percent).

Average Annual Subsidy Distribution in United Kingdom

4%

© Direct Payments
© Cost Reducing Transfers
© General Services

Figure 14: Average Annual Subsidy Distribution in United Kingdom (1996-2003)

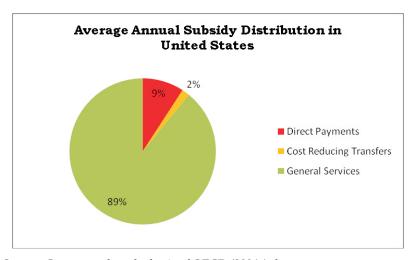
Source: Constructed on the basis of OECD (2006a) data

#### 3.13 Fishery Subsidies in United States

United States has been the highest subsidy provider in the world during 2006, by displacing Japan. This was possible because on one hand Japan reduced its subsidy level from US \$ 2165.19 million in 2005 to US \$ 1985.07 million in 2006 and on the other hand the United States increased its subsidy level from US \$ 1222.50 million to US \$ 2128.81 million over the same period. On the whole the fishery sector subsidy provided by the US increased considerably over 1996-2006.

The detailed break-up of fishery subsidies in US over 1996-2003 is reported in **Annex 23.1** and the distribution of subsidies is explained with the help of **Figure 15**. During the period of 1996-2003, most part of the fishery subsidies was provided as General Services. Cost reducing transfers had marginal significance, barring the exception of the year 2001. Subsidies coming under direct payments fluctuated over the period, but have shown an increasing trend over 2005-06. It is observed from the data that on the average, major proportion of the subsidies are coming under general services (89 percent), followed by direct payments (9 percent) and cost reducing transfers (2 percent).

Figure 15: Average Annual Subsidy Distribution in United States (1996-2003)



Source: Constructed on the basis of OECD (2006a) data

The extent of data problems as reported in Section 2 for the US can be explained with the help of Annex 23.2 as well. In the table, the distribution of the subsidies in the US over 1996-2004, as reported by Sharp and Sumaila (2009), is presented. However,

the volume of total subsidies in the reported years does not match with the data provided by OECD (2006a). The table indicates presence of various Article 1 subsidies in the US support schedule, namely: Fuel Subsidies, State sales tax exemptions, Surplus fish purchases etc.

#### 3.14 Fishery Subsidies in the EU

Though the individual fishery subsidy data on several EU countries have already been reported, the EU level support figures are reported in Annexes 24 and 25. The data is obtained from the Common Fishery Policy documents of the Community. Annex 24 shows the overall level of fishery subsidies provided by the EU member countries over 2000-06. It is observed from the table that a total of Euro 6084 million has been provided during this period. From the classification provided for these subsidies, it is observed that Article 1 subsidies are present in terms of activities like constructions of new vessels, aquaculture, modernisation of existing vessels, fishing port facilities, subsidies on processing and marketing activities etc. On the other hand, activities like scrapping, socio-economic measures are likely to be included under Article 2 subsidies. The effect of the category 'other' is however ambiguous.

The subsidization trend in the EU during nineties can be understood by looking at the data provided in Annex 25, where the category-wise subsidization data for 1994-99 is provided. Though some of the sub-categories match with the same provided under Annex 24, the two annexes are not strictly comparable owing to the existing difference. It is observed that over this period, the EU has provided a total subsidy of US \$ 3181.50 million to the members. It could be noted that Article 1 subsidies here include adjustment of fishing effort, fleet renewal and modernization, aquaculture, port facilities, subsidies on processing and marketing activities etc. On the other hand, product promotion is likely to be included under Article 2

subsidies. The effect of the category 'other' case is however ambiguous.

By comparing the common heads in Annexes 24 and 25, it is observed that the subsidies on fleet renewal and modernization (Article 1 subsidies) have declined during 2000-06 as compared to the 1994-99 figures. On the other hand, several subsidies provided under Article 1 have increased over this period, namely: support to aquaculture, port facilities, processing and marketing etc. This may bear harmful consequences for the fishery sector in the developing countries. Interestingly, the volume of subsidies provided under 'other' has increased considerably. This category may hide the presence of certain types of Article 1 subsidies.

### **Section 4**

# Fuel Subsidy and Tax Exemptions

#### 4.1 Fuel Subsidy

It has been mentioned in the introductory section earlier that how provision of fuel subsidy to the fishery sector reduces the operating cost of the fishermen and encourages them to overfish. In addition, the lower operating cost provides the fishery segment in the subsidy-receiving countries to outsell their developing country counterparts, who are not receiving this kind of support.

One major problem of understanding WTO compliance here is that the developed countries do not always report the exact amount spent on fuel subsidies; it is often clubbed with other sub-categories under a general heading. Moreover, most of the time, even if the data is provided, it is done for a specific period of time. Since a detailed time-series data is not always available, cross-period comparison becomes difficult. Moreover, different countries make a submission to WTO at different points, and comparison between them again becomes a difficult exercise.

In the current WTO negotiating forum, fuel subsidy is rightly placed in Article 1 category (i.e., actionable subsidies). However, country data is often not available in that format and the current analysis use the OECD classification to identify the segment where fuel subsidy might be included. It is observed that the fuel subsidies are generally placed within cost reducing transfers, which are shown in Annexes 12-23. The Figures 4-15 indicates the importance of this category within the fishery subsidy pattern of the major countries.

In case of the US, explicit data on fuel subsidies is obtained from Sharp and Sumaila (2009), which is reported in Annex 23.2. It is observed from the table that the fuel subsidy in the US is stable within a range over 1996-2004. Though the fuel subsidy level in 2004 (US \$ 319.8 million) has been lower than the same during 1996 (US \$ 325.0 million); it was considerably higher than the 2003 level (US \$ 303.9 million). The increase is an area of concern for the developing countries.

The analysis on the types of subsidies undertaken by Khan et al. (2006) and Sumaila et al (2006) for the year 2000 had earlier been summarized in Annex 11. It is observed from the table that the major fuel subsidy providing countries include Japan, South Korea, the US, Spain, Norway, Canada and France.

In Annexes 26 and 27, the quantum of fuel subsidies, as estimated by Tyedmers et al (2005) for the year 2000 is reported. It is observed from Annex 26 that the study notes the per unit (i.e. per liter) fuel subsidies, consumption of fuel, and from these figures derives the total fuel support outlay. It is observed from the table that the total subsidy cost is highest for Japan (US \$ 1115 million), which is followed by South Korea (US \$ 331 million) and the US (US \$ 184 million).

It has been noted earlier that the fisheries subsidies provided at the State-level in the US is quite significant. Annex 28 reports the quantum of total fuel subsidy provided by the US States over 1996-2004. It is observed from the table that all States as a whole has provided US \$ 743611 million subsidy in terms of fuel subsidy. The topper in this category has been Louisiana (US \$ 171032 million), followed by Alaska (US \$ 99946 million), California (US \$ 83370 million) and Washington (US \$ 64483 million).

A more detailed analysis has been attempted by the Fishery Centre Research Report (2006), which has tried to link the fuel subsidy outlay provided to high seas bottom trawl (HSBT) fleets with their quantum of fish catch. Following the Tyedmers et al (2005) methodology, the analysis try to figure out the per unit subsidy and total fuel use, which yields the quantum of subsidy. It is observed from the table that Japan (US \$ 34.92 million), Russia (US \$ 30.06 million), South Korea (US \$ 27.12 million) and Spain (US \$ 19.68 million) are the top four subsidy providing countries. Interestingly, the volume of HSBT non-fuel subsidies is also quite high in these countries: Japan (US \$ 9.48 million), Russia (US \$ 13.69 million), South Korea (US \$ 9.74 million) and Spain (US \$ 12.70 million). Consequently, it is observed that the HSBT catches are also highest for these four countries. The possibility of overfishing may not be ruled out in this case.

#### 4.2 Fiscal Measures: Tax Exemptions and Interest Subsidies

Like the case of fuel subsidy, fiscal measures also help the fishery sector by reducing their cost of capital (both fixed and variable). According to the current WTO negotiations, the fiscal measures (tax exemptions / interest subsidies) are rightly placed in Article 1 category. However, detailed country data is not always available in that format, and like the earlier case, the OECD classification is used here to identify the segment where fiscal measures might be included. It is observed that they are generally placed within cost reducing transfers, like the case of fuel subsidies. However for a select set of countries, data on fiscal measures can be obtained.

From Annex 17.2, the interest subsidy provided by Japan for the years 2001-03 can be observed. It is noticed that in 2001, the figure stood at US \$ 30.2 million, while it increased to US \$ 32.4 million in 2002. In 2003 the level of subsidy on this front however declined to US \$ 27.9 million.

Annex 23.2 reports the volume of State sales tax exemptions in the US over 1996-2004. It is observed from the table that the volume of this subsidy is gradually coming down over the period. While the volume of the subsidy was US \$ 43.3 million in 1996, the same came down to US \$ 31.9 million during 2003 and 2004.

As noted from Annex 23.2, tax exemptions offered by various States of the US is quite significant. Annex 28 reports the quantum of total tax exemption provided by them over 1996-2004. It is observed from the table that all States as a whole has provided US\$338.41 million subsidy in terms of tax exemptions. The topper in this category has been Louisiana (US\$83.881 million), followed by California (US\$47.559 million), Virginia (US\$31.304 million) and New Jersey (US\$31.048 million).

The analysis on the types of subsidies undertaken by Khan et al. (2006) and Sumaila et al (2006) for the year 2000 had earlier been summarized in Annex 11. It is observed from the table that the major countries providing tax exemptions include Japan (US \$ 153.67 million) and the US (US \$ 29.43 million). The tax exemptions provided by Norway, France and South Korea was not that high.

In case of some countries, the data on fuel subsidies and fiscal measures could perhaps be provided in an aggregated form along with other variables in 'other cost reducing transfers'. From Annex 16.2 it is observed that, the 'other cost reducing transfers' for Italy during the year 2004 has been reported (Euro 1125 thousand). However, since the data is provided for only one year, no comparative analysis could be arrived at.

Annex 19.2 provides data on other cost reducing transfers for Norway during 2001-04. It is observed from the table that the expenses on this front had increased from US \$ 5.31 million in 2001 to US \$ 8.57 million in 2003 but finally reduced to US \$ 4.79 million in 2004. Since several other cost reducing transfers may also be included here (both Article 1 and Article 2 categories), exact movement in terms of fuel subsidies and fiscal measures may not be inferred.

An indirect way of looking at the supports on the fuel subsidy and tax exemption front would be to focus on the cross-country cost reducing transfers trends (1996-2003), as reported from the Annexes 12-23. It is observed that the level of subsidies under this category has increased over the period for Canada and Spain, while the same decreased for Belgium, Norway, the UK and the US in the recent period. Italy and Turkey have not provided this particular type of subsidy in the recent period. In case of other countries, the value of subsidies fluctuated within a range during this period. Looking at the percentage composition of the data, it is observed that the average contribution of this segment in total subsidies has been quite significant in case of Australia (67 percent), Spain (36 percent), Norway (22 percent), Korea (15 percent), Canada (8 percent) and France (7 percent).

### **Section 5**

# Assessing the Access Right Transfers

#### 5.1 Introduction

It has been noted in the introduction that fishing access subsidies lead to transfer of fishing capacity from Northern to Southern waters (which is often helped further by fuel subsidies and fiscal measures), and thereby may potentially violate the economic and conservation interests of coastal developing countries. The quantum of catches through the access route is quite significant. DFID (undated a) noted that during 1970-99 the Distant Water Fleets (DWFs), operating outside own EEZs, caught between 5-15 percent of worldwide fisheries catches annually. It is noted from the literature that developed countries like the EU, US, Japan, Norway etc. are among the major players accessing this route. On the other hand, for small coastal / island economies, access rights transfer is an important means for generating budgetary resources. For instance, DFID (undated a) noted that EU's access agreement with Mauritania (€ 86 million per year) provides 25 percent of its budgetary receipts.

The DFID (undated a) report also noted that if the caught fish are landed in the host country, they become instrumental in creating employment opportunities for local population on fishing vessels, ports, processing industries or any other service. The study quoted the positive experience of the tuna canning factories in Côte d'Ivoire, Mauritius and Seychelles as a result of their agreements with the EU.

#### Box 1: Access Agreements worldwide

The main DWF nations are the EU, Asian countries such as Japan, Republic of Korea and China (Taiwan), the Russian Federation and USA. Until the dissolution of the USSR, the ex-Soviet block countries also had significant distant-water fleets, targeting low-value high volume pelagic fish, such as sardines and (horse) mackerel.

The **EU** has access agreements in West Africa (Eastern Central Atlantic), Indian Ocean, and more recently, Pacific Ocean. These mainly target tuna and tuna-like species (e.g. swordfish, albacore), although some agreements in West Africa include a significant component for demersal and pelagic fish, shrimp, squid and octopus. The agreements are between the European Commission and host country governments.

The **USA** has a regional treaty with Pacific countries, through the Forum Fisheries Agency, for access to tuna resources.

**Japan, Republic of Korea** and **China** have agreements in the Atlantic, Indian and Pacific Oceans and mainly target high-value tuna species for *sashimi* and *sushi*, as well as white fish and squid. The agreements are often between fishing associations and host governments.

Source: DFID (undated a)

It is argued that though fishing access agreements would confer economic benefits to the South if effective enforcement and compliance mechanisms are introduced (Atta-Mills et al, 2004), evidence during nineties did not always provide empirical support to this contention (Milazzo, 1998). In particular, it has been reported that several of the EU fisheries agreements with West African States during this period were potentially harmful for them, as catch quotas for EU vessels were not specified, which potentially leads to resource overexploitation (Kaczynski and Fluharty, 2002). Similar overexploitation was observed in case of some other countries as well (Mwikya, 2006).

Apart from the direct access right transfer route, the countries can also enter the developing country waters by forming variants of joint ventures, where a country is setting up a deal or merges with a national fishing company, and thereby changes flag in order to access their fishing grounds. Like the case of access right transfer, here also the developing country may face overexploitation of resource on one hand, and livelihood insecurity for the local population depending exclusively on marine catch on the other. Case studies undertaken in this regard have shown that in Senegal and Argentina, environmental overexploitation from access right transfers led to injuries to local fisheries in their own waters (UNEP, 2003).

#### 5.2 Access Arrangements and WTO Negotiations

The access agreements are in conformity with the United Nations Convention on the Law of the Sea (UNCLOS), which clarifies that when a coastal State is not having the ability to capture the entire allowable catch in its EEZ, it can through access agreements allow other countries to catch the 'surplus' fish stock (i.e., the agreement should not threaten the regular livelihood scenario of the fishermen). The conferring of this right would involve a financial contribution or in-kind benefits (DFID, undated a).

Apart from the LOS framework, the Code of Conduct for Responsible Fisheries as created by Food and Agriculture Organization (FAO) also includes provisions relating to access arrangements. Importantly, the Code stresses the need to develop the need to augment the ability of coastal States and attempts to ensure that access to markets do not become conditional on access to resources. Broadly the purpose of the Code is to ensure responsible fishing in developing country waters, without jeopardising the livelihood concerns of the local players.

Orellana (2008) notes that the treatment of fisheries subsidies is a sensitive area under WTO negotiations. In particular, the distorting effects of the subsidies on the ecosystems and the markets, as well as the lack of transparency with several access rights agreements are often reported. At present according to WTO (2007), 'Government-to-government payments for access to marine fisheries shall not be deemed to be subsidies within the meaning of this Agreement'. Porter (1997) rationalizes this decision by arguing that since access payments are government-to-government transfer rather than government-to-industry transfer, they constitute indirect subsidies, and hence non-actionable. However, the discrepancies created by subsidies and the benefits to the industries are often unmistakable.

For instance, UNEP (2004) has noted that during early nineties, the US fleet was paying a low access charge (US \$ 72000 per vessel) in the Pacific island states, as compared to other vessels (US \$ 250000 per vessel). The remainder cost of access was paid for by the US Government through a US \$ 15 million grant to the host countries. The point is stressed by Schorr (2004) as well, who argued that access payments are "tantamount to the provision of foreign fishing licenses to domestic industry, in a context in which the only alternative for the industry would be to purchase the licenses themselves." In other words, access payments confer a direct benefit to the industry. The report noted that there can be a potentially negative resource impact of these subsidies as well. Unfortunately this question has not yet been answered through any case law at the WTO dispute settlement body (Orellana, 2008). Hence no generalization on the extent of benefits for the developed countries / threats for the developing countries / LDCs is possible and that becomes an agreement-specific issue.

According to Orellana (2008), the access right is generally conferred to a third country after the following considerations. First, the developing country / LDC determine the allowable

catch, which is to be followed by both sides. Second, it is expected that while granting access, preferences to developing land-locked and geographically disadvantaged States should be provided. However, the weak negotiating ability of the developing countries / LDCs to effectively bargain with their developed counterparts is seriously questioned. In many occasions the weak bargaining position may lead to an agreement with a lower access fee. The lack of transparency in the agreements in some cases is another problem in analyzing their effects. Last but not the least, it is argued that enforcement scenario for monitoring foreign vessels is limited in developing countries and LDCs, which may potentially lead to illegal fishing and misreporting of catches (DFID, undated a).

Orellana (2008) has summarized various country positions at WTO negotiations on access payments, which is reported in Annex 29. The proposals focused either on total exemption of access agreements from new disciplines or putting some condition on exemption based on environment / transparency related criteria. The submissions broadly focused on issues pertaining to access payments, arrangements leading to access transfer, establishment of conditions for the exemption of access-related subsidies of a potential prohibition etc. The Indian submission, along with Indonesia and China quoted the need to ensure the right of the developing countries to access the waters of other developing countries.

#### 5.3 Payment Scenario

As mentioned earlier, in case of access rights transfer, the flow of funds is generally from the developed countries to the developing countries / LDCs. In particular, the small island countries with limited resources and domestic capacity are more prone to go for access rights transfer. Getting a time series data for the access right transfer is difficult, as the agreements are generally entered into for a longer period (say, around five to

seven years). Annex 30 reports the access rights transfer payments received by several developing countries. It is observed that the major countries receiving access fees from their developed counterparts include Kiribati (US \$ 20.60 million), Tuvalu (US \$ 5.90 million), Papua New Guinea (US \$ 5.84 million), Marshall Island (US \$ 4.98 million), Nausea (US \$ 3.40 million) etc. It is observed from the table that the payment explains a significant proportion of the GDP of several small economies: Kiribati (42.81 percent), Tuvalu (42.60 percent) etc.

The other side of the coin is the fishery access subsidies being paid by the developed countries. The amount of access subsidy payments made by 19 major fishing nations is shown with the help of Annex 31. It is observed from the table that Japan (US \$ 200 million), China (US \$ 193.41 million), Spain (US \$ 117.79 million), France (US \$ 107.20 million) and Russia (US \$ 70.87 million) are among the major fishing access subsidy providing countries. The other major players include several EU countries like UK (US \$ 56.45 million), Portugal (US \$ 45.00 million), South Korea (US \$ 43.60 million) and the US (US \$ 21 million). In the following, the key features of reported fishing access agreements of the EU are discussed to understand their development effects.

#### 5.4 The EU case

#### 5.4.1 Shift in Attitude

As noted earlier, the EU is one of the major developed players, which historically has utilized the opportunity to fish in other countries EEZ through the access route. However, the actual benefits received by the developing countries / LDCs from these arrangements has often been questioned (Kaczynski and Fluharty, 2002). As a response to these criticisms, the EU in 2004 moved away from the Fisheries Agreements for obtaining access rights to Fisheries Partnership Agreements (FPAs), with the latter having a distinctive focus on development of the partner

LDC. According to DFID (undated a), "FPAs specify that the Community must contribute towards strategies for the sustainable management of fisheries, as defined by the coastal state, in order to contribute to its development". The difference between the two programmes is shown with the help of Annex 32. All existing fisheries agreements would finally be converted to FPAs over time.

DFID (undated a) reported that the newly formed FPAs introduce a number of checks and balances on real development of the fishery sector in the host country. First, the host country needs to reveal the actual outcomes of the financial compensation provided. Second, introduction of a Vessel Monitoring System (VMS) Protocol is advocated for improving monitoring and compliance. However, while on one hand many LDCs do not yet have the technical capabilities for introducing the protocols, some countries even with a VMS in place still rely on vessels to report their catches owing to lack of expertise on the other. Third, since EPAs involve diversified fishing rather than tuna fishing, it might be of better environmental consequence as compared to the earlier regime.

#### 5.4.2 Assessing the Agreements

The DFID (undated a) has noted that the EU is undertaking impact assessments of the FPAs, though they are limited in nature and not released to the public. In the absence of any authentic data, the impact of the agreements could at best be understood from the provisions included in the agreements. Annex 33 shows a summary of the EU FPAs with 16 developing countries / LDCs, as reported in the Common Fishery Policy resources. It is observed from the table that the duration of the agreements varies from 3 years to 6 years and they are renewable in nature. The fee for the ship-owners generally vary between  $25 \, \epsilon$  / ton and  $35 \, \epsilon$  / ton, though a higher fee might be charged at occasions. There exists a wide cross-country

variation in the reference tonnage, presumably explained by the difference in fishing stock in the countries.

It is argued that the developing countries can benefit from the FPAs effectively, only if they develop their port and processing infrastructure as well as the human resource base properly from the compensation amount and develop the local fisheries through management and governance. In Annex 34 the compensation provisions provided by the EU to various countries is summarized, from which a conclusion on the potential benefit could be drawn.

It is observed from Annex 34 that the provisions of the FPAs signed between EU and the smaller economies that the agreements try to ensure certain benefits and leverages to the host economies. For instance, the agreements generally retain the provision for reducing fishing opportunities granted to EU vessels by mutual agreement, if such a step is found to be necessary for the conservation and sustainable exploitation of resources. If there are instances of over-fishing, the agreements note the rate at which additional compensation needs to be paid (generally EUR 65 per additional tonne) to the host governments. For instance, the level of fishing permitted in the agreement with Greenland is included in Annex 35.

Second, the supremacy of the national law has been accepted in the agreements, and the EU vessels operating in partner country waters are governed by the local legal code.

Third, the host countries in most of the cases retain the right to review the allocation of the fishing opportunities among different categories of vessels by the EU, which is a key step in ensuring environmental sustainability by preventing overfishing. In addition, the agreements pledge to prevent illegal, undeclared and unregulated fishing, through regular exchange of information and close administrative cooperation.

Fourth, the escape clause has been incorporated in all the agreements as they include provisions for suspension of the initiative in the event of serious disagreement between parties on the implementation of the agreement. In particular, several FPAs include the provision for termination of the agreement by either party in the events like degradation of the stocks concerned, the discovery of a reduced level of exploitation of the fishing opportunities granted to EU fleet, or failure to comply with undertakings made by the parties with regard to control illegal, unreported and unregulated fishing.

Fifth, generally a Joint Committee is set up by the EU and the host country to regularly monitor the working of the agreement and also would settle the disputes, if any.

Sixth, if the EU vessels in future get interested in fishing of certain specimens / activities, which has not earlier been included in the agreement, they need to seek permission from appropriate authorities. If there is need, the two sides agree on this issue only after joint exploratory fishing expeditions in the local country waters. For instance, the agreement with Greenland incorporates the promise of allocating 50 percent of the fishing opportunities on the new species to the EU vessels.

Seventh, it is observed from the agreements that a proportion of the total amount of the financial contribution is generally allocated each year to the support the fishery initiatives undertaken by the host governments. However, the proportion of the contribution varies widely from 80 percent in case of Cape Verde to 18 percent in case of Micronesia. On the other hand, the countries like Greenland retains full discretion regarding the right use the financial contribution barring certain institution-specific and training-related grants.

Finally, the employment-related provisions play a crucial role in most of the agreements. It is observed that the agreements either try to define the statutory requirement of employing a minimum number of local seamen per vessel, or does that in accordance with the proportion of the total number of crew per vessel, or make that conditional on the capacity of the vessel. It is also defined explicitly that the International Labour Organisation (ILO) Declaration on Fundamental Principles and Rights at work would be applicable on the EU vessels and the wages offered to them would under no circumstances be below the corresponding ILO standards. In case of some small countries, instead of local employment, regional (e.g. ACP) employment criteria are also mentioned.

The findings indicate that the agreements try to ensure economic benefits for the LDCs and minimize adverse environmental consequences. However, the continuation of fuel and fiscal subsidies to the developed country fleets may still potentially pose the threat of overfishing in developing country waters.

## **Section 6**

# Findings and Policy Implications

Various estimates note that fishery sector provided direct employment to more than 250 million people for their livelihoods during late nineties and the number has increased considerably since then. Moreover around 40 per cent of global fishery production is said to be exported, and nearly half of the international trade is explained by developing country exports. This underlines the importance of this sector for the developing countries.

One major barrier on developing country exports is that several of their developed counterparts provide huge volume of subsidies to their fishing fleet, which on one hand provides unfair cost advantages to them and may further fuel the overfishing pattern on the other. In this light, there is a need to restrict the proliferation of trade-distorting subsidies.

The WTO agreement of Subsidies and Countervailing Measures (SCM) classifies the subsidies under three broad categories, namely: (1) Prohibited subsidies, (2) Actionable subsidies and (3) Non - actionable subsidies. On a similar note, the Negotiating Group of Rules (NGR) have classified the fishery subsidies in two categories, namely Article 1 and Article 2 subsidies.

Subsidies covered under Article 1 include subsidies that distort trade and production. These subsidies are directed towards acquisition, construction, repair, renewal, renovation,

modernization, or any other modification of fishing or service vessels; subsidies on operating costs of fishing or service vessels (including licence fees or similar charges, fuel, ice, bait, personnel, social charges, insurance, gear, and at-sea support) or subsidies to cover operating losses; subsidies to develop port infrastructure or other port facilities exclusively or predominantly related to marine wild capture fishing (for example, fish landing facilities, fish storage facilities, and in- or near-port fish processing facilities); income support for associated natural or legal persons; price support for products of marine wild capture fishing etc.

The subsidies qualified for general exceptions are reported in Article 2. The idea here is to exempt the least-distorting subsidies, which bear lesser impacts on production and trade. These permitted subsidies include: subsidies for improving fishing or service vessel and crew safety; subsidies for adoption of gear for selective fishing techniques and other techniques aimed at reducing the environmental impact of marine wild capture fishing; subsidies for compliance with fisheries management regimes aimed at sustainable use and conservation; subsidies exclusively for re-education, retraining or redeployment of fishworkers into occupations unrelated to marine wild capture fishing or directly associated activities; subsidies exclusively for early retirement or permanent cessation of employment of fishworkers; subsidies for vessel decommissioning or capacity reduction programmes etc.

One major problem towards identifying the subsidization behaviour of the countries is lack of data availability at the disaggregated level / lack of concordance between the reported data series. It is observed from the literature that currently there is no legal consequence if a government fails to provide notification of subsidies to the WTO. As a result, the reported data on fishery subsidies as provided by developed countries to APEC, OECD and WTO generally do not match, since some

subsidy components reported to one forum might be dropped while reporting the same to another.

Due to paucity of data availability from individual countries, the current study obtained the fishery sector subsidy data from OECD for obtaining a homogeneous and comparable data series for different type of subsidies for all major countries. However there exist significant difference between the subsidy figures reported in OECD (2006a) and OECD (2009), which fuels the apprehension about improper reporting mechanism of behalf of the countries. This underlines the need to ensure transparency in subsidy reporting mechanism for all WTO Member countries.

Moreover, while OECD (2009) provides the gross subsidy data for 1996-2006, the OECD (2006a) provides the detailed break-up data only for the period of 1996-2003. Hence both databases had to be consulted in the current framework, despite the divergence between them reported earlier.

One additional problem is that the OECD database (2006a) does not report the subsidy figures for selected countries in terms of Article 1 and Article 2 subsidies, but under broader categories like: 'direct payments', 'cost reducing transfers', 'general services' and 'cost recovery charges'. To sort out the problem, the current study undertakes a concordance analysis between the two systems. However it is observed that the Article 1 and Article 2 subsidies overlap across all three OECD reported categories.

For instance, 'direct payments' under the OECD classification includes both 'price support payments to fishers' and 'disaster relief payments'. While the former is an Article 1 subsidy, the latter falls under Article 2 category. Similarly under 'cost reducing transfers', 'fuel tax exemptions' and 'government funded training of fish processing workers' could be classified under Article 1 and Article 2 subsidies respectively. Finally,

looking at the 'general services' category, it is observed that while entries like 'support to build port facilities for commercial fishers' distort production and trade and hence comes under Article 1, other categories such as 'grants to local authorities for retraining of fishers into other activities' create the opposite effect and are placed under Article 2.

Though arriving at a definitive conclusion on Article 1 and Article 2 subsidies from the OECD data is very difficult owing to the reported overlap; judging by the concentration of subsidy categories under various heads, it could be noted that a major section of the Article 1 subsidies are broadly falling under 'direct payments' and 'cost reducing transfers'. However, it is to be noted that several Article 2 subsidies are also included in these categories. On the other hand, a major section of the general exemptions (Article 2 subsidies) are concentrated under 'general services' category, despite having some Article 1 subsidies included in that group.

Apart from the OECD figures, several research reports have also attempted to bridge the existing gap by trying to arrive at a classification of subsidies of their own, namely: 'good' (non-actionable subsidies), 'bad' (actionable / prohibited subsidies) and 'ugly' (ambiguous subsidies). However, since these classifications are not available for the entire period under consideration, they are quoted only as supporting evidence.

Interestingly, the global volume of fishery subsidies offered by 12 major countries is not showing a decline over 1996-2006 (OECD, 2009). While in 1996, the total amount of subsidies provided in these countries stood at US \$ 5997.79 million, the figure has increased to US \$ 6726.67 million in 2006. The composition of the major subsidizers also changed over the period: while in 1996 Japan (53 per cent), the US (15 percent) and Canada (9 percent) were the major contributors; in 2006 US occupied the top spot (32 percent), followed by Japan (29 percent), Korea (11 percent) and Canada (9 percent).

Among the major fishery subsidy providing countries, Japan has retained the top position for most part of the period under consideration (1996-2006). However, while the level of subsidies in Japan in 1996 stood at US \$ 3186.36 million, the same has declined to US \$ 1985.07 million in 2006. United States on the other hand has increased its subsidy level from US \$ 1222.50 million to US \$ 2128.81 million over 1996 to 2006, and displaced Japan at the top spot recently.

Among other developed counties, Norway has reduced its fishery subsidy volume over 1996 (US \$ 172.69 million) to 2006 (US \$ 159.51 million). A similar declining trend is noticed for Italy as well (US \$ 162.62 million in 1996 to US \$ 119.23 million in 2006. Though France has reduced the level of fishery subsidies from US \$ 158.20 million in 1996 to US \$ 113.77 million in 2006, in the interim period, a subsidy peak of US \$ 236.81 million in 2004 has been noticed.

Fishery subsidy in Canada on the other hand has increased from US \$ 545.30 million in 1996 to US \$ 591 million in 2006. Similarly, overall subsidization in Spain has increased from a level of US \$ 246.47 million in 1996 to US \$ 425.36 million in 2006. Even in case of Australia, the level of overall transfers in the fishery sector has increased from US \$ 37.4 million in 1996 to US \$ 90.0 million in 2006.

The entry of certain developing countries among the major subsidy providers is a new area of concern. For instance, Turkey entered the top 10 subsidy provider group in 2005 and 2006. While the subsidy level was US \$ 28.7 million in 1996, the same has increased to US \$ 133.88 million in 2006. Korea has been the third highest subsidy provider country during 2006, and ranked next to United States and Japan. It was always ranked among the top 5 countries during the period of 1996-2006, and the subsidy level is on the rise ever since 2003. It has increased its subsidy level from US \$ 367.79 million in 1996 to US \$ 752.15 million in 2006.

As mentioned earlier, a major segment of the Article 1 subsidies (i.e., actionable subsidies) are likely to be classified within direct payments and cost reducing transfer category. On the other hand, a major proportion of the general exceptions are placed within Article 2 category. From the analysis of the OECD (2006a) data it is observed that the proportion of the direct payment subsidies in total subsidies has increased from 12.12 percent in 1996 to 16.44 percent in 1999 and marginally declines to 15.87 percent in 2003. On the other hand, the proportion of cost reducing transfers has increased from 4.30 percent in 1996 to 7.14 percent in 1999, but declined subsequently to 4.49 percent in 2003. The third category, i.e., general services has decreased from 83.58 percent in 1996 to 76.42 percent in 1999, but declined subsequently to 79.64 percent in 2003. However, the exact quantum of the Article 1 subsidies in these select countries is ambiguous, as several subsidies under this head are placed within general services category.

It is observed that the level of subsidies under direct payments is showing varying level of importance for various countries over 1996-2003. While Japan on the average has provided only 1 percent of its total fishery subsidy as direct payments, in case of Italy 66 percent of its total subsidy was falling under this category. The other major countries accessing this route are Canada (50 percent), Belgium (44 percent) and Spain (42 percent) and Korea (19 percent). Allocations under direct payments have increased over the period for countries like Italy, Spain and United states. Marginal decline is noted for Canada and Norway between the two terminal years (1996 and 2003). The subsidy fluctuation under this category has been maximum in case of Korea. Turkey and the Britain have not provided subsidy under this category for a considerable number of years. The fishery subsidy under this category for the selected countries has been US \$ 666.48 million during 1996, which has increased to US\$ 908.25 million in 2003 (OECD, 2006a).

It is observed that the level of subsidies under cost reducing transfers has increased over the period for Canada and Spain, while the same decreased for Belgium, Norway, the UK and the US in the recent period. Italy and Turkey have not provided this particular type of subsidy in the recent period. In case of other countries, the value of subsidies fluctuated within a range during this period. Looking at the percentage composition of the data, it is observed that the average contribution of this segment in total subsidies has been quite significant in case of Australia (67 percent), Spain (36 percent), Norway (22 percent), Korea (15 percent), Canada (8 percent) and France (7 percent). The fishery subsidy under this category for the selected countries has been US \$ 236.28 million during 1996, which has increased to US \$ 257.20 million in 2003 (OECD, 2006a).

For most of the countries however, the highest part of the subsidy has been provided under general services category. Turkey has topped the list in this category (99 percent), followed by Japan (98 percent), United Kingdom (90 percent), United States (89 percent), France (76 percent), Norway (74 percent), Korea (66 percent) etc. On the contrary, the country providing lowest share of the subsidies as general services has been Spain (22 percent), followed by Australia (32 percent) and Italy (32 percent). For countries like United States, Spain, Korea and Canada the amount spent as General services has increased considerably over 1996-2003. The fishery subsidy under this category for the selected countries has been US \$ 4595.91 million during 1996, which has decreased to US \$ 4558.42 million in 2003 (OECD, 2006a).

Looking into the fuel subsidy trends in the developed countries next, it is observed that the major fuel subsidy (Article 1 subsidy) providing countries include Japan, South Korea, the US, Spain, Norway, Canada and France. The total subsidy cost in this category highest for Japan (US \$ 1115 million), followed by South Korea (US \$ 331 million) and the US (US \$ 184 million). It is

also observed that the state-level fuel subsidies offered by the US States are quite significant, who over 1996-2004 provided a total of US \$743611 million subsidy in this category.

Interestingly, it is observed that Japan (US \$ 34.92 million), Russia (US \$ 30.06 million), South Korea (US \$ 27.12 million) and Spain (US \$ 19.68 million) are major countries providing fuel subsidies to high seas bottom trawl (HSBT) fleets. It is observed that the HSBT catches are also highest for these four countries. The possibility of overfishing may not be ruled out in this case.

Looking into the tax exemption scenario across the countries, it is observed that this measure is extensively used by Japan, United States etc. Norway, France and South Korea however are not among the major implementers of this provision. However, looking into the budgetary allocation of several countries it is argued that the data on fuel subsidies and fiscal measures could be provided in an aggregated form along with other variables in 'other cost reducing transfers' reported there. For several countries, the budgetary allocation under 'other cost reducing transfers' has increased over time.

Finally, in case of access rights transfer, the flow of funds in generally moves from the developed countries to the developing countries / LDCs. It is observed that the major countries receiving access fees from their developed counterparts include Kiribati (US \$ 20.60 million), Tuvalu (US \$ 5.90 million), Papua New Guinea (US \$ 5.84 million), Marshall Island (US \$ 4.98 million), Nauru (US \$ 3.40 million) etc. It is also observed that Japan (US \$ 200 million), China (US \$ 193.41 million), Spain (US \$ 117.79 million), France (US \$ 107.20 million) and Russia (US \$ 70.87 million) are among the major fishing access payment providing countries. The other major players in this category include several EU countries like UK (US \$ 56.45 million), Portugal (US \$ 45.00 million) etc., South Korea (US \$ 43.60 million) and the US (US \$ 21 million).

To understand the benefits emanating from the access rights transfers, a number of EU Fishery Partnership Agreements (FPAs) are reviewed in the current context. In order to ensure effective benefits for the host countries, the end use of a proportion of the devolution of Access Rights payments towards benefit of the local fishery sector is generally defined in these agreements. The contribution level is found to be highest in case of Cape Verde (80 percent), followed by Gabon (60 percent), Comoros (60 percent), Guinea-Bissau (35 percent), Kiribati (30 percent in the first year, 40 percent in the second year and 60 percent in the year thereafter) etc. The other welfare-augmenting activities through devolution of funds included in the FPAs consist of conduct of scientific and technical programmes to promote better understanding and management of fisheries and living resources, developing the capacity of the host country in terms of monitoring, control and surveillance, including the Vessel Monitoring System (VMS) etc.

Among other measures the countries are provided the right to exit from the agreements / reduce the access quota catch of the developed country in case of any environmental degradation resulting from the activities of the EU fleets. They also try to secure employment creation at home by incorporating statutory requirement of employing a minimum number of local seamen per vessel, or do that in accordance with the proportion of the total number of crew per vessel, or make that conditional on the capacity of the vessel. It is also defined explicitly that the International Labour Organisation (ILO) Declaration on Fundamental Principles and Rights at work would be applicable on the EU vessels and the wages offered to them would under no circumstances be below the corresponding ILO standards. In case of some small countries, instead of local employment, regional (e.g. ACP) employment criteria are also mentioned.

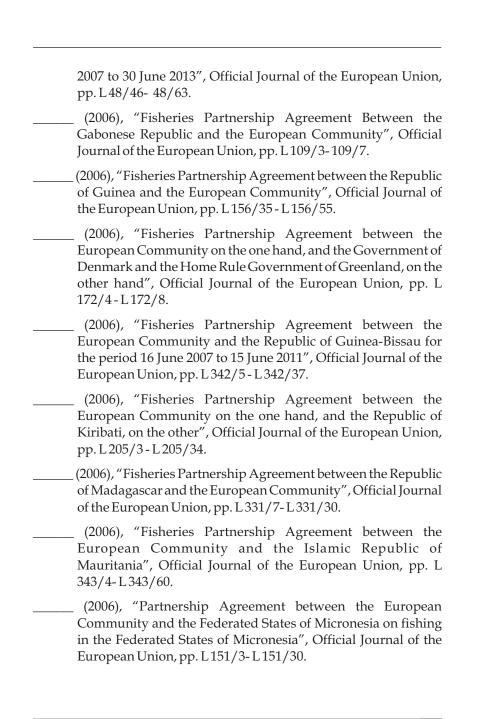
One practical problem as noted in the literature is that the developing countries / LDCs, owing to their low logistic and

technical base are dependent on the developed country fleets in terms of monitoring the catch amount etc. Keeping this limitation in mind, it is argued that the developing countries can benefit from the FPAs effectively, only if they develop their port and processing infrastructure as well as the human resource base properly from the compensation amount and develop the local fisheries through management and governance.

It is obvious from the discussions undertaken here that fisheries subsidy in the developed countries can pose a serious problem in ensuring multilateral discipline in the area of subsidies. As observed from the Agreement on Agriculture, even the straight-jacketed classification of subsides in amber, blue and green boxes could not entirely tackle the continuation of harmful subsidization of primary products in developed countries after ten years since inception of WTO. Cotton is a classic case in point here. In that comparison, the potential problems associated with the current non-transparency in the fisheries subsidy-reporting mechanism, leading to overlapping of Article 1 and Article 2 subsidies within the OECD reported categories, poses a serious threat to multilateral trade regime. In this light the negotiating standpoint of the developing countries at the forthcoming WTO forums should focus primarily on ensuring greater transparency and harmonization in fisheries subsidy data reporting. The negotiations should also ensure that disciplines emerging from such negotiations are able to reign in the high levels of subsidies prevailing in the developed countries, but do not curtail the flexibility of developing countries to extend subsidy in order to improve the lot of the resource poor fishermen community whose livelihood sustenance depends upon fishing activity.

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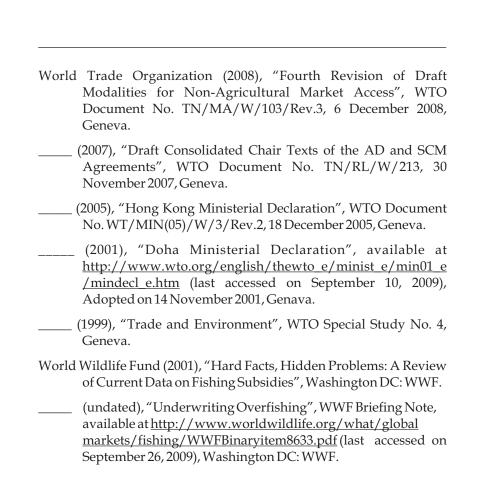
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Annex 1: Government Financial Transfers to Fishing (ranked on the basis of 2006)  $(US \ \$ \ \mathrm{million})$ 

											_	٠
S. No	Country/ Year	1996	1997	1998	1999	2000	2001	2002	2003	2004	2002	2006
1	United States	891.2	1002.6	1041.0	1103.1	1037.7	1169.6	1130.8	1290.4	1064.4	1222.5	2128.8
2	Japan	3186.4	2945.8	2135.9	2537.5	2913.1	2574.1	2323.6	2310.7	2437.9	2165.2	1985.1
8	Korea	367.8	379.0	211.9	471.6	320.4	428.3	538.7	495.3	495.3	649.4	752.2
4	Canada	545.3	433.3		606.4	564.5	521.4	497.8	590.0	618.8	591.0	591.0
rv	Spain	246.5	344.6	296.6	399.6	364.1	376.6	301.9	353.3	256.6	433.8	425.4
9	Norway	172.7	163.4	153.0	181.0	104.6	99.5	156.3	139.2	142.3	149.5	159.5
7	Turkey	28.7	15.1		1.3	26.4	17.7	16.2	16.3	59.5	98.1	133.9
80	Italy	162.6	91.8		200.5	217.7	231.7	159.6	149.3	170.1	119.2	119.2
6	United Kingdom	115.4	128.1	8.06	76.0	81.4	73.7		82.7	87.5	103.2	114.7
10	France	158.2	140.8		71.7	166.1	141.8	155.3	179.7	236.8	126.2	113.8
11	Denmark	82.8	82.0	6.06	27.8	16.3		8.89	37.7	28.5	58.1	113.2
12	Australia	37.4	41.2			82.3	75.9	78.0	92.6	9.56	46.3	0.06

Source: OECD (2009)

Annex 2: India's Marine Export to top 15 Countries (1995 – 2008)

(US \$ million)

S. S.	Country							Year							
j Z		1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008
1	Japan	415.19	477.65	559.25	488.08	492.35	517.65	381.52	322.08	239.97	226.68	256.89	279.38	266.67	244.64
7	United States	98.13	109.12	138.49	148.46	181.58	242.80	245.52	369.34	396.58	351.23	354.48	286.11	247.55	199.73
8	Spain	47.09	30.55	22.19	32.60	40.42	40.91	62.43	73.02	74.18	79.70	116.99	125.72	151.63	123.74
4	Belgium					14.38	19.64	13.85	40.96	70.40	70.31	102.95	129.21	125.30	112.75
rc	China	13.69	73.98	114.93	51.48	88.18	111.81	91.27	107.83	98.27	72.62	151.05	113.75	152.54	109.15
9	Italy	53.61	31.63	16.55	20.38	23.39	25.73	34.38	26.84	36.90	30.73	48.25	86.38	76.97	70.02
^	United Kingdom	54.32	50.94	21.77	32.63	46.03	61.86	53.56	67.80	69.46	65.73	79.14	91.10	87.15	68.10
∞	Hong Kong, China	19.33	38.71	19.99	10.85	13.19	18.16	12.75	18.07	23.77	25.26	39.70	41.89	59.23	63.35
6	France	13.24	12.83	6.29	11.10	13.74	17.37	18.60	15.84	22.34	19.06	35.78	26'99	65.07	66.09
10	United Arab Emirates	100.61	82'96	141.11	93.96	63.56	66.61	58.74	33.80	30.48	39.27	55.82	61.24	90.69	58.75
11	Thailand	15.52	15.18	19.64	24.51	23.02	27.46	28.84	39.83	33.25	15.98	25.72	29.42	33.06	44.04
12	Germany	7.10	10.53	5.14	6.01	12.57	11.62	11.56	13.63	17.54	18.36	28.34	30.09	34.85	38.59
13	Netherlands	25.45	23.70	7.39	12.10	24.75	18.98	20.83	19.59	10.76	5.99	9.72	13.98	21.39	33.97
14	Canada	2.35	5.34	6.85	8.39	14.58	18.93	13.52	18.59	27.53	32.10	38.64	50.01	48.84	31.54
15	Singapore	27.24	21.90	19.56	13.71	18.61	19.88	15.47	18.67	15.48	21.36	20.03	26.52	30.21	28.40

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Annex 3: India's Marine Export to top 13 Fishery Sector Subsidising Countries (1995-2008)

(US \$ million)

S.	Country							Year							
No.		1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008
1	Japan	415.19	477.65	559.25	488.08	492.35	517.65	381.52	322.08	239.97	226.68	256.89	279.38	266.67	244.64
7	United States	98.13	109.12	138.49	148.46	181.58	242.80	245.52	369.34	396.58	351.23	354.48	286.11	247.55	199.73
3	Spain	47.09	30.55	22.19	32.60	40.42	40.91	62.43	73.02	74.18	79.70	116.99	125.72	151.63	123.74
4	Italy	53.61	31.63	16.55	20.38	23.39	25.73	34.38	26.84	36.90	30.73	48.25	86.38	76.97	70.02
rv	United Kingdom	54.32	50.94	21.77	32.63	46.03	61.86	53.56	08.79	69.46	65.73	79.14	91.10	87.15	68.10
9	France	13.24	12.83	6.29	11.10	13.74	17.37	18.60	15.84	22.34	19.06	35.78	56.95	65.07	60.93
7	Canada	2.35	5.34	6.85	8.39	14.58	18.93	13.52	18.59	27.53	32.10	38.64	50.01	48.84	31.54
8	Greece	15.82	12.94	11.53	11.27	7.02	10.66	13.74	14.91	20.00	10.43	19.62	26.21	25.86	25.25
6	Korea, Rep.	4.13	6.44	4.29	2.34	5.02	6.47	9.35	13.82	13.03	16.19	14.12	22.57	19.53	16.57
10	Australia	2.63	2.45	4.65	8.54	7.44	9.81	21.90	19.92	21.94	22.13	19.08	22.04	16.69	3.55
11	Norway	1.54	0.44	0.10	0.42	0.18	0.53	0.37	0.35	0.02	0.15	0.54	08.0	98.0	08.0
12	Mexico	0.01	0.13	0.17	0.21	0.37	0.46	0.29	0.83	0.49	0.34	0.80	1.57	0.51	0.28
13	Korea, Dem. Rep.	0.64	0.47	0.92	0.29	1.85	6.25	7.68	3.42	1.78	0.47	1.75	0.03	0.00	0.00

Source: WITS database

## Annex 4: Prohibition of Certain Fisheries Subsidies (Article 1 Subsidies)

- I.1 Except as provided for in Articles II and III, or in the exceptional case of natural disaster relief<sup>2</sup>, the following subsidies within the meaning of paragraph 1 of Article 1, to the extent they are specific within the meaning of paragraph 2 of Article 1, shall be prohibited:
  - (a) Subsidies the benefits of which are conferred on the acquisition, construction, repair, renewal, renovation, modernization, or any other modification of fishing vessels<sup>3</sup> or service vessels<sup>4</sup>, including subsidies to boat building or shipbuilding facilities for these purposes.
  - (b) Subsidies the benefits of which are conferred on transfer of fishing or service vessels to third countries, including through the creation of joint enterprises with third country partners.
  - (c) Subsidies the benefits of which are conferred on operating costs of fishing or service vessels (including licence fees or similar charges, fuel, ice, bait, personnel, social charges, insurance, gear, and at-sea support); or of landing, handling

Subsidies referred to in this provision shall not be prohibited when limited to the relief of a particular natural disaster, provided that the subsidies are directly related to the effects of that disaster, are limited to the affected geographic area, are time-limited, and in the case of reconstruction subsidies, only restore the affected area, the affected fishery, and/or the affected fleet to its pre-disaster state, up to a sustainable level of fishing capacity as established through a science-based assessment of the post-disaster status of the fishery. Any such subsidies are subject to the provisions of Article VI.

<sup>&</sup>lt;sup>3</sup> For the purposes of this Agreement, the term "fishing vessels" refers to vessels used for marine wild capture fishing and/or on-board processing of the products thereof.

For the purposes of this Agreement, the term "service vessels" refers to vessels used to tranship the products of marine wild capture fishing from fishing vessels to on-shore facilities; and vessels used for at-sea refuelling, provisioning and other servicing of fishing vessels.

- or in- or near-port processing activities for products of marine wild capture fishing; or subsidies to cover operating losses of such vessels or activities.
- (d) Subsidies in respect of, or in the form of, port infrastructure or other physical port facilities exclusively or predominantly for activities related to marine wild capture fishing (for example, fish landing facilities, fish storage facilities, and inor near-port fish processing facilities).
- (e) Income support for natural or legal persons engaged in marine wild capture fishing.
- (f) Price support for products of marine wild capture fishing.
- (g) Subsidies arising from the further transfer, by a payer Member government, of access rights that it has acquired from another Member government to fisheries within the jurisdiction of such other Member.<sup>5</sup>
- (h) Subsidies the benefits of which are conferred on any vessel engaged in illegal, unreported or unregulated fishing.<sup>6</sup>
- I.2 In addition to the prohibitions listed in paragraph 1, any subsidy referred to in paragraphs 1 and 2 of Article 1 the benefits of which are conferred on any fishing vessel or fishing activity affecting fish stocks that are in an unequivocally overfished condition shall be prohibited.

Source: WTO (2007)

<sup>&</sup>lt;sup>5</sup> Government-to-government payments for access to marine fisheries shall not be deemed to be subsidies within the meaning of this Agreement

The terms "illegal fishing", "unreported fishing" and "unregulated fishing" shall have the same meaning as in paragraph 3 of the International Plan of Action to Prevent, Deter and Eliminate Illegal Unreported and Unregulated Fishing of the United Nations Food and Agricultural Organization.

### Annex 5: General Exceptions (Article 2 Subsidies)

Notwithstanding the provisions of Article I, and subject to the provision of Article V:

- (a) For the purposes of Article I.1(a), subsidies exclusively for improving fishing or service vessel and crew safety shall not be prohibited, provided that:
  - (1) such subsidies do not involve new vessel construction or vessel acquisition;
  - (2) such subsidies do not give rise to any increase in marine wild capture fishing capacity of any fishing or service vessel, on the basis of gross tonnage, volume of fish hold, engine power, or on any other basis, and do not have the effect of maintaining in operation any such vessel that otherwise would be withdrawn; and
  - (3) the improvements are undertaken to comply with safety standards.
- (b) For the purposes of Articles I.1(a) and I.1(c) the following subsidies shall not be prohibited:
  - subsidies exclusively for: (1) the adoption of gear for selective fishing techniques; (2) the adoption of other techniques aimed at reducing the environmental impact of marine wild capture fishing; (3) compliance with fisheries management regimes aimed at sustainable use and conservation (e.g., devices for Vessel Monitoring Systems); provided that the subsidies do not give rise to any increase in the marine wild capture fishing capacity of any fishing or service vessel, on the basis of gross tonnage, volume of fish hold, engine power, or on any other basis, and do not have the effect of maintaining in operation any such vessel that otherwise would be withdrawn.
- (c) For the purposes of Article I.1©, subsidies to cover personnel costs shall not be interpreted as including:
  - (1) subsidies exclusively for re-education, retraining or

redeployment of fishworkers<sup>7</sup> into occupations unrelated to marine wild capture fishing or directly associated activities; and

- (2) subsidies exclusively for early retirement or permanent cessation of employment of fishworkers as a result of government policies to reduce marine wild capture fishing capacity or effort.
- (d) Nothing in Article I shall prevent subsidies for vessel decommissioning or capacity reduction programmes, provided that:
  - (1) the vessels subject to such programmes are scrapped or otherwise permanently and effectively prevented from being used for fishing anywhere in the world;
  - (2) the fish harvesting rights associated with such vessels, whether they are permits, licences, fish quotas or any other form of harvesting rights, are permanently revoked and may not be reassigned;
  - (3) the owners of such vessels, and the holders of such fish harvesting rights, are required to relinquish any claim associated with such vessels and harvesting rights that could qualify such owners and holders for any present or future harvesting rights in such fisheries; and
  - (4) the fisheries management system in place includes management control measures and enforcement mechanisms designed to prevent overfishing in the targeted fishery. Such fishery-specific measures may include limited entry systems, catch quotas, limits on fishing effort or allocation of exclusive quotas to vessels, individuals and/or groups, such as individual transferable quotas.
- (e) Nothing in Article I shall prevent governments from making userspecific allocations to individuals and groups under limited access privileges and other exclusive quota programmes.

Source: WTO (2007)

<sup>&</sup>lt;sup>7</sup> For the purpose of this Agreement, the term "fishworker" shall refer to an individual employed in marine wild capture fishing and/or directly associated activities.

Annex 6: National Marine Fisheries Service - President's Budget Request Draft (FY 2008) (US \$ million)

Particulars	FY 2006	FY 2007	FY 2007	FY 2008	FY 2008	FY 2008	FY 2008
	Enacted Amount	President's Amount	Enacted Amount	Total ATBs Amounts	Base Amounts	Program Amounts	Request Amounts
Protected Resources Research and Management Programs	25.74	31.82	26.62	9.53	32.40	1.85	34.25
Marine Mammals	40.21	23.11	32.80	22.39	37.22	2.00	39.22
Marine Turtles	13.44	9.65	13.54	2.91	62.6	1	62.6
Other Protected Species (Marine Fish, Plants, and Invertebrates)	4.93	8.09	4.99	3.83	8.17	1	8.17
Atlantic Salmon	4.38	5.85	5.85	2.84	5.93	1	5.93
Pacific Salmon:	56.34	66.42	57.23	11.74	67.74	1	67.74
For Salmon Management Activities, See Fish	1	ı	1	1	ı	1	0.00
Subtotal, Protected Species (Marine Mammals, Marine Turtles, and Other Protected Species)	145.04	144.92	141.02	53.25	161.25	3.85	165.10

Particulars	FY 2006 Enacted Amount	FY 2007 President's Amount	FY 2007 Enacted Amount	FY 2008 Total ATBs Amounts	FY 2008 Base Amounts	FY 2008 Program Amounts	FY 2008 Request Amounts
Fisheries Research and Management	0.00	0.00	0.00	0.00	00:00	0.00	00.00
Fisheries Research and Management Programs	123.35	131.62	145.14	1.89	133.51	17.50	151.01
Expand Annual Stock Assessments - Improve Data Collection	24.46	32.10	25.72	7.41	32.41	1	32.41
Economics & Social Sciences Research	4.04	10.53	6.23	7.21	10.59	1	10.59
Salmon Management Activities	24.14	24.21	24.18	-1.72	24.28	1	24.28
Regional Councils and Fisheries Commissions	25.05	26.31	25.07	1.33	26.33	1	26.33
Fisheries Statistics	12.60	12.80	12.86	0.38	13.18	1	13.18
Fish Information Networks	21.25	22.18	22.46	2.21	22.21	1	22.21
Survey and Monitoring Projects	14.58	15.22	16.21	13.59	23.59	1.65	25.24
Fisheries Oceanography	0.49	66.0	0.49	66.0	66.0	1	0.99
American Fisheries Act	1	1	1	5.22	5.22	1	5.22

Particulars	FY 2006 Enacted Amount	FY 2007 President's Amount	FY 2007 Enacted Amount	FY 2008 Total ATBs Amounts	FY 2008 Base Amounts	FY 2008 Program Amounts	FY 2008 Request Amounts
Interjurisdictional Fisheries Grants	2.55	2.57	2.56	2.57	2.57	1	2.57
National Standard 8	0.99	1.00	1.00	1.02	1.02	ı	1.02
Reduce Fishing Impacts on Essential Fish Habitat (EFH)	0.49	0.50	0.50	0.51	0.51	1	0.51
Reducing Bycatch	2.76	2.78	2.78	2.81	2.81	ı	2.81
Anadromous Grants	1.97	2.08	1.97	2.08	2.08	-2.08	0.00
Product Quality and Safety	6.63	6.77	6.78	86.9	86.9	00.00	86.9
Hurricane Supplemental- Disaster Assistance	0.00	0.00	0.00	00:00	0.00	0.00	0.00
Other fisheries-related projects	17.06	0.00	7.64	-3.01	00:00	00.00	0.00
Subtotal, Fisheries Research and Management	282.41	291.66	301.58	51.47	308.27	17.07	325.34
Enforcement & Observers	0.00	0.00	0.00	0.00	00:00	ı	0.00
Enforcement	49.50	53.90	51.84	4.68	54.68	1	54.68
Observers/Training	23.18	26.80	26.29	5.80	29.30	3.00	32.30

Particulars	FY 2006 Enacted Amount	FY 2007 President's Amount	FY 2007 Enacted Amount	FY 2008 Total ATBs Amounts	FY 2008 Base Amounts	FY 2008 Program Amounts	FY 2008 Request Amounts
Subtotal, Enforcement and Observers/Training	72.68	80.70	78.13	10.47	83.97	3.00	86.97
Habitat Conservation & Restoration	0.00	0.00	0.00	0.00	0.00	1	0.00
Sustainable Habitat Management	21.80	18.76	19.83	1.14	19.14	1	19.14
Fisheries Habitat Restoration	24.83	21.14	23.72	-0.73	21.27	10.00	31.27
Hurricane Supplemental - Oyster Reefs	0.00	0.00	0.00	0.00	0.00	1	0.00
Hurricane Supplemental - Oyster/Shrimp/Co-Op	0.00	0.00	0.00	0.00	0.00	1	0.00
Subtotal, Habitat Conservation & Restoration	46.63	39.90	43.54	0.42	40.42	10.00	50.42
Other Activities Supporting Fisheries	00:00	0.00	0.00	0.00	0.00	1	0.00
Antarctic Research	1.45	1.47	1.47	0.01	1.51	09.0	2.11
Chesapeake Bay Studies	3.45	1.91	3.49	-1.03	1.97	1	1.97

Particulars	FY 2006	FY 2007	FY 2007	FY 2008	FY 2008	FY 2008	FY 2008
	Enacted Amount	President's Amount	Enacted Amount	Total ATBs Amounts	Base Amounts	Program Amounts	Request Amounts
Climate Regimes & Ecosystem Productivity	1.48	1.98	1.49	2.02	2.02	ı	2.02
Aquaculture	0.00	0.00	0.00	1.05	1.05	3.00	4.05
Computer Hardware and Software	1.97	3.36	1.99	3.38	3.38	1	3.38
Cooperative Research:	19.23	10.42	12.40	1.52	10.52	-0.20	10.32
Information Analyses & Dissemination	17.46	18.38	17.86	1.43	18.93	1	18.93
Magnuson-Stevens (MSA) Implementation off Alaska	0.00	00'0	0.00	7.92	7.92	0.00	7.92
Marine Resources Monitoring, Assessment & Prediction Prgm (MarMap)	0.84	0.84	0.84	0.84	0.84	1	0.84
National Environmental Policy Act (NEPA)	7.89	7.96	7.98	0.18	8.08	1	8.08
NMFS Facilities Operations and Maintenance	3.95	3.96	9.42	0.10	4.00	2.05	6.05
La Jolla Temporary Relocation	0.00	0.00	0.00	0.00	0.00	1.00	1.00

Particulars	FY 2006	FY 2007	FY 2007	FY 2008	FY 2008	FY 2008	FY 2008
	Enacted Amount	President's Amount	Enacted Amount	Total ATBs Amounts	Base Amounts	Program Amounts	Request Amounts
Southeast Area Monitoring &	1.37	5.09	4.37	5.10	5.10	1	5.10
Other projects	11.10	0.00	7.17	0.00	0.00	5.00	5.00
Subtotal, Other Activities Supporting Fisheries	70.18	55.36	68.47	22.51	65.31	11.45	76.76
AK Composite Research and Development Program	50.30	36.45	50.73	-20.00	0.00	0.00	0.00
Total, NMFS - ORF ONLY	667.23	648.99	683.46	118.11	659.21	45.37	704.58
Procurement, Acquisition, and Construction (PAC)	0.00	1	0.00	0.00	0.00	1	1
Systems Acquisition/ Construction	0.00	1	0.00	0.00	0.00	1	1
Systems Acq. Computer Hardware & Software (transferred from ORF)	0.00	1	1.50	1	1	ı	ī
Aquatic Resources	4.44	1	1	1	1	1	1
Center for Ecosystem-Based Fisheries Management	4.93	1	1	1	ı	1	1

Particulars	FY 2006	FY 2007	FY 2007	FY 2008	FY 2008	FY 2008	FY 2008
	Enacted Amount	President's Amount	Enacted Amount	Total ATBs Amounts	Base Amounts	Program Amounts	Request Amounts
Honolulu Fisheries Lab (NOAA Pacific Regional Center/HI)	ı	ı	ı	1	ı	1	
Barrow Artic Research Center	5.92	1		1	ı	ı	1
Other Facilities - Infrastructure	0.00	1	7.72	1	ı	ı	1
Pascagoula Laboratory	15.16	ı	1.97	ı	ı	ı	1
Hurricane Supplemental Pascagoula Lab	0.00	1		1	1	1	1
Phase III - Galveston Laboratory Renovation - NMFS	ı		1	1	1	1	
Subtotal, Systems Acquisition/ Construction	30.44	1	11.19	1	1	1	1
Fleet Replacement	1	1	1	1	ı	ı	1
Fisheries Research Vessel	1	1	ı	1	ı	ı	1
Replacement (Funded in Program							
Support except for FY 2004)							
Subtotal, NMFS Fleet Replacement	ı	ı	ı	1	ı	1	1

Particulars	FY 2006 Enacted Amount	FY 2007 President's Amount	FY 2007 Enacted Amount	FY 2008 Total ATBs Amounts	FY 2008 Base Amounts	FY 2008 Program Amounts	FY 2008 Request Amounts
Total, NMFS - PAC Other Discretionary Accounts	30.44	0.00	11.19	1 1	1 1	1 1	1 1
Fishermen's Contingency Fund	00.00	0.44	0.00	1	1	ı	1
Foreign Fishing Observer Fund	00.00	0.00	0.00	1	1	1	1
Fisheries Financing Program	2.26	0.00	0.28	ı	1	1	1
Promote and Develop Fisheries	-67.00	-77.00	-79.00	0.00	-77.00	1	-77.00
Marine Mammal Unusual Mortality Event Fund Obligations <sup>3</sup>	0.00	-0.80	1	1	1	1	0.00
Pacific Coastal Salmon Recovery Fund	2999	66.83	66.57	46.83	66.83	ı	66.83
Washington	24.66	1	1	1	1	1	1
Oregon	6.41	1	1	1	1	1	1
Idaho	2.22	1	1	1	1	1	1
California	6.41	1	1	ı	1	1	1
Alaska	21.70	1	1	1	1	1	ı
Pacific Coastal Tribes	3.95	1	1	1	1	ı	ı

Particulars	FY 2006 Enacted Amount	FY 2007 President's Amount	FY 2007 Enacted Amount	FY 2008 Total ATBs Amounts	FY 2008 Base Amounts	FY 2008 Program Amounts	FY 2008 Request Amounts
Columbia River Tribes	1.23					ı	
Klamath River Basin	0.00	1	1	1	ı	1	0.00
Disaster Assistance							
Subtotal, Other Discretionary Accounts	1.83	-10.53	-12.15	46.83	-10.18	ı	-10.18
Other Mandatory Accounts	0.00	0.00	0.00	1	1	1	0.00
Promote and Develop Fisheries	79.28	79.28	82.82	ı	82.82	-	82.82
SK Grants	0.28	2.28	3.82	ı	5.82	ı	5.82
Alaska Seafood Marketing Program	7.00	1	1	1	ı	ı	0.00
Wild American Shrimp Initiative	5.00	1	1	1	1	ı	0.00
Gulf Oyster Industry Education Program	0.00	1	1	1	1	ı	0.00
Fisheries Financing Program Obligations	6.32	1	1	-4.66	1	1	0.00
Federal Ship Financing Fund	3.00	3.00	1	0.00	1.00	1	1.00
Environmental Improvement and Restoration Fund	8.28	8.72	6.64	0.04	10.29	1	10.29

Particulars	FY 2006	FY 2007	FY 2007	FY 2008	FY 2008	FY 2008	FY 2008
	Enacted Amount	President's Amount	Enacted Amount	Total ATBs Amounts	Base Amounts	Program Amounts	Request Amounts
Limited Access System	7.44	7.44	3.63	0.00	7.44	1	7.44
Administration Fund							
Subtotal, Other Mandatory Accounts	104.32	98.45	93.09	4.62	101.55	1	101.55
Total, NMFS - Other Accounts	106.15	87.91	80.94	42.21	91.38	ı	91.38
Other National Marine Fisheries Service Accounts	0.00	0.00	0.00	0.00	0.00	1	0.00
Total, National Marine Fisheries Service - ORF	667.23	648.99	683.46	118.11	659.21	45.37	704.58
Total, National Marine	30.44	0.00	11.19	0.00	00.00	1	ı
Total, National Marine Fisheries Service - FY 2006 Hurricane Supplemental Supplemental	1	1	1	1	1	1	1
Total, National Marine Fisheries Service - Other Discretionary	1.83	-10.53	-12.15	46.83	-10.18	1	-10.18
Total, National Marine Fisheries Service - Total All Discretionary	699.50	638.45	682.50	164.94	649.04	45.37	694.40

Particulars	FY 2006 Enacted Amount	FY 2007 President's Amount	FY 2007 Enacted Amount	FY 2007 FY 2007 FY 2008  President's Enacted Total ATBs  Amount Amounts	FY 2008 Base Amounts	FY 2008 Program Amounts	FY 2008 Request Amounts
Total, National Marine Fisheries 104.32	104.32	98.45	93.09	-4.62	101.55		101.55
Service - Other Mandatory							
Grand Total National Marine Fisheries Service	803.82	736.90	775.59	160.32	750.59	45.37	795.95

Source: National Marine Fisheries Service Web-page

\*Subtotals may not sum due to rounding.

<sup>1</sup> Fisherman's Contingency Fund amount has FY 2007 PB amount of \$441 K to match Bluebook. FY 06 Transferred AK Community from ORF to Fisheries Financing Program in Other Accounts <sup>3</sup> Marine Mammal Unusual Event Fund has FY 2007 PB amount of -\$800K added to match Bluebook

Annex 7.1: National Aid to fishery sector - Distribution by EU Member State (2000-2006)

(EURO million)\*

								,	,
Country		Total p	Total public aid	Scra	Scrapping	Constr new V	Construction of new Vessels**	Moder	Modernisation of existing Vessels
	Total	EU	National	EU	National	EU	National	EU	National
Belgium	47.43	24.697	22.733	986.9	986.9	'	•	1.95	1.95
Czech Republic	10.331	7.252	3.08	ı	ı	1	ı	1	1
Denmark	327.945	189.183	138.762	39.1	39.1	8	2.667	18.033	6.011
Germany	234.494	169.937	64.556	3.844	3.833	1.166	0.723	9.425	1.892
Estonia	18.752	12.469	6.282	1	ı	1	1	ı	1
Ireland	82.404	65.5	16.904	6.58	2.38			15.58	3.28
Greece	287.248	223.612	63.637	81.19	18.898	7.831	1.119	8.343	1.192
Spain	2438.271	1787.525	650.746	124.474	42.918	361.15	100.221	67.205	24.811
France	560.281	277.642	282.639	37.51	37.442	31.131	51.77	28.855	35.979
Italy	803.991	411.127	392.864	109.387	109.387	18.27	8.156	38.509	15.194
Cyprus	7.743	3.419	4.324	0.953	0.953	1	1	0.102	0.17
Latvia	33.355	24.335	9.02	ı	1	1	ı	ı	1
Lithuania	17.188	12.117	5.071	1	1	1	1	1	ı
Hungary	5.731	4.39	1.341	1	1	1	ı	ı	1

Country		Total p	Fotal public aid	Scra	Scrapping	Constr new V	Construction of new Vessels**	Moder existing	Modernisation of existing Vessels
	Total	EU	National	EU	National	EU	National	EU	National
Malta	3.618	2.838	0.781	ı	ı	1	ı	1	ı
Netherlands	82.618	39.78	42.838	1.872	1.872			2.591	2.591
Austria	11.274	4.758	6.516	ı	1	1	1	1	1
Poland	281.945	201.832	80.113	80.121	26.707	4.747	0.678	16.276	2.374
Portugal	306.036	237.836	68.2	20.028	6.673	47.486	8.297	7.076	1.358
Slovania	2.375	1.781	0.594	ı	1	1	1	1	1
Slovenkia	2.613	1.829	0.784	ı	ı	1	1	1	1
Finland	93.548	42.384	51.164	2.066	2.066	0.805	1.708	1.435	2.222
Sweden	110.656	66.4	44.256	7.081	7.081	0.903	0.298	4.003	1.337
United Kingdom	313.821	209.732	104.089	32.434	31.901			7.626	8.932
PEACE II	4609.628	3457.172	1152.456	1	1	1	1	1	ı
EU-25	6083.667	4022.375	2061.292	553.627	338.196	481.49	175.636 227.009	227.009	109.292

Source: Common Fishery Policy Documents (2008)

\*FIFG aid available if re-programmed. \*\* Up to 2004; for fleets in the outermost regions: up to 2006.

Annex 7.2: National Aid to Fishery Sector - Distribution by EU Member State (2000-2006)
(EURO Million)

			ļ		\$	,		•		
Country	Aqu	Aquaculture	Fisher	Fishery Port facilities	Proces	Processing & marketing	Socio	Socio-economic measures		Others
	EU	National	EU	National	EU	National	EU	National	ΩΞ	National
Belgium	0.64	0.72	0.55	0.55	3.35	1.33	0.10	0.10	11.13	11.10
Czech Republic	ı	ı	1	1	1	1	1	ı	7.25	3.08
Denmark	5.10	1.70	38.20	35.87	37.10	12.37			43.65	41.05
Germany	17.19	5.53	45.88	13.61	54.42	15.84	0.32	0.35	37.70	22.79
Estonia	ı	ı	ı	1	1	1	ı	ı	12.47	6.28
Ireland	25.68	5.35	ı	1	1	1	ı	ı	17.66	5.89
Greece	31.52	9.01	14.53	3.43	42.31	18.08	11.05	3.68	26.84	8.23
Spain	186.70	70.27	129.21	46.69	376.43	182.57	10.18	3.64	532.18	179.63
France	20.81	13.78	39.12	37.27	29.20	23.38	5.92	5.92	85.11	77.11
Italy	9.59	16.55	7.75	10.04	12.40	20.66	0.20	0.20	215.02	212.69
Cyprus	0.75	1.24	89.0	89.0	0.51	98.0			0.43	0.43
Latvia	1	ı	1	1	ı	1	1	1	24.34	9.02
Lithuania	-	ı	1	1	-	1	1	•	12.12	5.07
Luxembourg	ı	1	ı	1	-	1	1	1	4.39	1.34
1										

Country	Aqua	Aquaculture	Fisher faci	Fishery Port facilities	Proces mark	Processing & marketing	Socio-e	Socio-economic measures	Ot	Others
	EU	National	EU	National	EU	National	EU	National	EU	National
Malta	ı	ı	ı	ı	1	ı	ı	1	2.84	0.78
Netherlands	0.97	1.62					0.85	0.85	33.49	35.90
Austria	2.44	3.20			2.18	3.11	1	1	0.14	0.20
Poland	10.74	5.65	17.96	10.77	17.07	2.49	19.44	19.44	35.49	12.01
Portugal	21.32	3.71	22.71	6.55	26.64	6.72	5:35	1.78	87.23	33.12
Slovenia	ı	1	1	ı	1	1	ı	1	1.78	0.59
Slovakia	1.06	0.46			0.77	0.33	ı	1	ı	ι
Finland	1.27	2.09	6.44	7.70	7.95	11.90	0.08	0.08	22.34	23.39
Sweden	1.11	26.0	5.32	4.68	12.29	4.15	0.11	0.11	35.59	26.24
United Kingdom	14.52	5.62	17.91	8.44	39.39	11.73	0.05	0.09	97.80	37.38
PEACE II	ı	1	1	1	1	1	1	1	3457.17	1152.46
EU-25	315.39	146.88	346.25	186.25	662.00	315.49	53.65	36.24	1346.97	753.31

Source: Common Fishery Policy Documents (2009)

# Annex 8: Composition of Different Categories of Transfers to Marine Capture Fisheries Sector in OECD Countries

#### **Direct payments**

Price support payments to fishers, grants for new vessels, grants for modernisation, vessel decommissioning payments, buyouts of licences and permits, buyouts of quota and catch history, income support, unemployment insurance, retirement grants for fisheries, compensation for closed or reduced seasons, compensation for damage from predators on fish stocks, disaster relief payments, grants to purchase second hand vessels, grants for temporary withdrawal of fishing vessels, grants to small fisheries, direct aid to participants in particular fisheries, income guarantee compensation, vacation support payments, grants to set up temporary joint ventures in other countries, payments to set up permanent joint ventures in other countries, temporary grants to fishers and vessel owners, price support payments direct to fishers

#### Cost-reducing transfers

Fuel tax exemptions, subsidised loans for vessel construction, subsidised loans for vessel modernisation, payments to reduce accounting costs, provision of bait services, loan guarantees, underwriting of insurance costs, contributions to match private sector investments, low cost loans to young fishers, interest rebates, transport subsidies, low cost insurance, government payment of access to other countries' waters, low cost loans to specific fisheries, income tax deduction for fishers, government funded training of fish processing workers, government funding of the introduction of new gear and technology, support for crew insurance, tax exemptions for deep-sea vessels, support for development of deep-sea fisheries, interest subsidies for the purchase of machines and equipment for fishing vessels, interest subsidy for the purchase of second-hand vessels, support to improve economic efficiency, reduced charges by government agencies, support to build facilities for commercial fishers at ports.

#### General services

Research expenditure, management expenditure, enforcement expenditure, market intervention schemes, regional development grants, support to build port facilities for commercial fishers, protection of marine areas, grants to local authorities to for retraining of fishers into other activities, payments to producer organisations, expenditure on the protection of marine areas, payments to support community based management, fisheries enhancement expenditure, support to enhance the fisheries community environment, expenditure on research and development, expenditure on research of deep-sea fisheries, expenditure to promote international fisheries co-operation, support to improve the management of co-operatives, support to improve fishing villages, expenditure on fisheries policy advice, expenditure on prosecution of fisheries offences, support for artificial reefs, expenditure on exploratory fishing, support to establish producers' organisations, aid for restocking of fish resources, funding of information dissemination, funding for the promotion and development of fisheries, expenditure for information collection and analysis, expenditure on conservation and management.

Source: Cox and Schmidt (2002)

# **Annex 9: Composition of Cost Recovery Charges to Marine Capture Fisheries Sector in OECD Countries**

### Costrecovery

An additional component of the OECD classification framework is cost recovery. Under this item, countries are able to report on the extent to which the governmental costs of managing fisheries are recovered from the fishing sector. For some countries, cost recovery is a significant feature of their management regimes. New Zealand, Iceland and Australia, for example, recover around 50%, 37% and 24% of the public costs of fisheries research, management and enforcement from the industry.

Source: Cox and Schmidt (2002)

Annex 10: Concordance between Article 1 and Article 2 Subsidies and the OECD data reporting system

Subsidy	Direct payments	Cost-reducing transfers	General services
Article 1	ishers Grants for new vessels Grants for new vessels Grants for modernisation Buyouts of quota and permits Buyouts of quota and catch history Income support Compensation for closed or reduced seasons Compensation for damage from predators on fish stocks Grants to purchase second hand vessels Grants to small fisheries Grants to small fisheries Direct aid to participants in particular fisheries	<ul> <li>Fuel tax exemptions</li> <li>Subsidised loans for vessel construction</li> <li>Subsidised loans for vessel modernisation</li> <li>Payments to reduce accounting costs</li> <li>Provision of bait services</li> <li>Loan guarantees</li> <li>Underwriting of insurance costs</li> <li>Contributions to match private sector investments</li> <li>Low cost loans to young fishers</li> <li>Interest rebates</li> <li>Transport subsidies</li> <li>Low cost insurance</li> <li>Tow cost insurance</li> <li>Low cost loans to specific fisheries</li> </ul>	Market intervention schemes     Support to build port facilities for commercial fishers     Payments to producer organisations     Fisheries enhancement expenditure     Expenditure on exploratory fishing

Subsidy	Direct payments	Cost-reducing transfers	General services
	Grants to set up temporary joint ventures in other countries Payments to set up permanent joint ventures in other countries Temporary grants to fishers and vessel owners Price support payments direct to fishers	ishers Covernment funding of the introduction of new gear and technology Support for crew insurance Tax exemptions for deep-sea vessels Support for development of deep-sea fisheries Interest subsidies for the purchase of machines and equipment for fishing vessels Interest subsidy for the purchase of second-hand vessels Support to improve economic efficiency Reduced charges by government agencies Support to build facilities for commercial fishers at ports	

Subsidy	Direct payments	Cost-reducing transfers	General services
Article 2	Vessel decommissioning     payments     Retirement grants for fisheries     Vacation support payments     Grants for temporary     withdrawal of fishing vessels     Unemployment insurance     Disaster relief payments	O Government payment of access to other countries' waters Government funded training of fish processing workers	Research expenditure  Management expenditure  Enforcement expenditure  Regional development grants  Protection of marine areas  Grants to local authorities to for retraining of fishers into other activities  Expenditure on the protection of marine areas  Payments to support community based management  Support to enhance the fisheries community  Support to enhance the fisheries community  Expenditure on research and development  Expenditure on research of deep-sea fisheries

Subsidy	Direct payments	Cost-reducing transfers	General services
			· Expenditure to promote international fisheries co-
			operation
			· Support to improve the
			management of co-operatives
			<ul> <li>Support to improve fishing villages</li> </ul>
			· Expenditure on fisheries policy
			advice
			· Expenditure on prosecution of
			fisheries offences
			<ul> <li>Support for artificial reefs</li> </ul>
			· Support to establish
			producers' organisations
			· Aid for restocking of fish
			resources
			· Funding of information
			dissemination
			· Funding for the promotion
			and development of fisheries
			· Expenditure for information
			collection and analysis
			· Expenditure on conservation
			and management

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Source: Constructed on the basis of Cox and Schmidt (2002) classifications and WTO (2007)

Implications of Fishery Sector Subsidies

Annex 11: Fisheries Subsidies in Major Fishery Subsidy providing Countries (2000)

Particulars\ Country	Australia	Canada	France	Denmark	Italy	Japan
Beneficial (good)						
Fisheries Management and services	24.23	153.29	10.86	195.60	50.58	2807.06
Fishery research and development	18.62	49.26	44.93	15.13	0.00	0.00
Maintenance of MPAs	111.89	141.28	8.62	21.10	19.26	33.05
Sub-total	154.74	343.83	64.40	231.83	69.83	2840.10
Harmful(bad)						
Boat construction, renewal and modernization	52.57	69.19	8.99	278.02	7.11	37.49
Fishery development and support services	00.00	00.00	35.19	0.00	0.00	202.97
Fishing port construction and renovation	00.00	90.69	1.66	0.00	0.00	0.00
Marketing support and storage infrastructure	00.00	34.30	26.04	283.64	53.41	43.01
Tax exemption	00.00	00.00	7.90	0.00	0.00	153.67
Foreign access agreements	00:00	00:00	88.88	33.10	24.41	200.00
Fuel subsidies	38.27	93.00	85.24	0.00	0.00	1115.00
Sub total	90.84	255.55	263.91	594.76	84.93	1752.14

Particulars\ Country	Australia	Canada	France	France Denmark Italy	Italy	Japan
Ambiguous(ugly)						
Fisher assistance	46.67	194.70	06.6	33.28	92.55	703.27
Vessel buyback	139.09	72.80	5.24	24.15	0.00	19.01
Rural fisheries community development	00.00	00.00	0.00	00:00	0.00	0.00
Sub-total	185.76	267.50	15.14	57.43	92.55	722.28
Grand-Total	431.34	866.87	343.44	884.02 247.31	247.31	5314.52

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Particulars\ Country	Korea (South)	Norway	Spain	Turkey	United Kingdom	United States
Beneficial (good)						
Fisheries Management and services	48.56	58.91	23.39	1.75	38.47	749.03
Fishery research and development	4.95	21.29	6.93	1.19	19.24	225.37
Maintenance of MPAs	2.25	6.20	13.78	3.26	70.69	119.16
Sub-total	55.76	86.40	44.10	6.19	128.39	1093.56
Harmful(bad)						
Boat construction, renewal and modernization	63.68	5.40	66.11	00.00	0.33	7.57
Fishery development and support services	0.00	3.56	65.68	24.33	0.00	20.30
Fishing port construction and renovation	160.98	00.00	12.14	00.00	1.39	0.00
Marketing support and storage infrastructure	4.42	00.00	61.39	18.27	4.24	28.29
Tax exemption	4.16	8.10	0.00	00.00	0.00	29.43
Foreign access agreements	43.61	00.00	113.98	0.00	34.01	13.44
Fuel subsidies	331.00	110.23	119.92	17.00	0.00	242.69
Sub total	607.85	127.29	439.21	59.59	39.97	341.71

#### United States 1484.02 37.23 11.52 0.00 48.75 United Kingdom 40.19 208.56 1.97 38.23 0.00 Turkey 0.14 65.93 0.00 0.00 0.14 0.00 91.15 574.46 0.26 68.06 Spain Norway 10.85 56.85 46.00 0.00 270.54 Korea (South) 0.00 29.45 0.00 29.45 693.06 Rural fisheries community development Ambiguous(ugly) Fisher assistance Vessel buyback Particulars\ Country Grand-Total Sub-total

Source: FERU Online database

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Annex 12: Composition of Fishery Subsidy in Australia

Particulars/Years	1996e	1997e	1998e	1999e	2000e	2001e	2002e	2003e
Direct Payments		4.96				1.10		
Cost Reducing Transfers	68.75	29.99	57.86	61.29	56.32	50.52	55.15	63.64
General Services	29.61	28.89	25.79	27.68	25.95	24.28	30.92	31.92
Cost Recovery Charges	-21.48	-17.70	-14.47	-14.84	-13.30	-11.86	-11.96	-14.29
Total	76.88	82.82	69.18	74.13	86.89	64.05	74.11	81.27

Source: OECD (2006a)

e Includes OECD estimates for data

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Annex 13: Composition of Fishery Subsidy in Belgium

Particulars/Years	1996	1997	1998e	1999	2000	2001	2002	2003
Direct Payments			2.81	2.55	5.91	2.83	1.39	1.20
Cost Reducing Transfers	3.01	3.00						1.01
General Services	1.96	1.95	1.91	1.81	1.56	1.52	1.60	1.91
Cost Recovery Charges								
Total	4.97	4.95	4.72	4.36	7.47	4.35	3.00	4.12

Source: OECD (2006a)

e Includes OECD estimates for data

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Implications of Fishery Sector Subsidies

Annex 14: Composition of Fishery Subsidy in Canada

Particulars/Years	1996	1997e	1998e	1999	2000	2001	2002	2003
Direct Payments	304.29	247.27	213.68	310.94	211.81	213.42	204.59	259.00
Cost Reducing Transfers	17.04	17.70	21.32	25.84	69.20	72.84	52.10	34.00
General Services	187.96	168.35	174.36	189.33	229.40	228.90	238.60	266.29
Cost Recovery Charges	-35.10	-35.61	-31.55	-29.46	-32.25	-31.68	-31.02	-35.71
Total	510.20	397.70	377.80	496.65	478.16	483.48	464.27	523.57

e Includes OECD estimates for data

Annex 15: Composition of Fishery Subsidy in France

Particulars/Years	1996	1997	1998e	1999	2000	2001	2002	2003
Direct Payments	25.06	22.50	11.94	1.55	49.82	23.75	20.94	25.96
Cost Reducing Transfers	15.25	13.69			8.72	14.02	14.15	11.91
General Services	117.89	104.63	88.75	70.11	97.71	69.06	108.87	140.90
Cost Recovery Charges								
Total	158.19	140.81	100.69	71.67	156.24	128.39	143.96	178.76

e Includes OECD estimates for data

Source: OECD (2006a)

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Implications of Fishery Sector Subsidies

	Annex 16	o.I: Compe	Annex 16.1: Composition of Fishery Subsidy in Italy	ishery Suk	osidy in It	taly	(ב	(US \$ million)
Particulars/Years	1996	1997	1998e	1999	2000	2001	2002	2003e
Direct Payments	101.602	23.594	46.022		60.671 92.549	170.237	93.436	93.436 126.793
Cost Reducing Transfers	4.838	4.578	6.615		7.107			
General Services	56.158	63.64	69.018	14.798	50.576	61.444	15.31	21.665
Cost Recovery Charges								
Total	162.60	91.81	121.66	75.47	150.23	231.68	108.75	148.46

e Includes OECD estimates for data

Source: OECD (2006a)

### Annex 16.2: Break-up of Fishery Subsidy for Italy (2004)

(EURO million)

Types of transfers	Subsidy
Management, research and enforcement	52.697
Fishery infrastructure expenditure	72.857
Payments for access to other countrys' water	
Payments for vessel decommissioning and license retirement	36.562
Investment and modernisation schemes	10.475
Other cost reducing transfers	1.125
Income support and unemployment insurance	16.250
Other transfers not elsewhere classified	0.547
Total transfers	190.613

Annex 17.1: Composition of Fishery Subsidy in Japan

Particulars/Years	1996	1997	1998	1999	2000	2001	2002	2003
Direct Payments	27.57	24.79		26.34	19.01	16.88	27.09	18.12
Cost Reducing Transfers	27.02	21.82		35.12	37.49	32.18	30.39	25.56
General Services	3131.78	2899.17	2135.95	2476.07 2807.06	2807.06	2483.15	2266.12	2267.98
Cost Recovery Charges								
Total	3186.36	2945.79	2135.95	2537.54 2863.56	2863.56	2532.20	2323.60 2311.66	2311.66

(US \$ million) Annex 17.2: Summary of Financial Transfer to Japanese Fishery Sectors (2001-03)

Financial Transfer to Japanese Fishery Sectors		Year	
Types of transfers	2001	2002	2003
Fishery restructuring programme(vessel decommissioning)	15.6	28.6	19.6
Interest subsidy	30.2	32.4	27.9
Infrastructure expenditure	1861.8	1797.0	1897.6
Management, research and enforcement	478.7	627.5	584.0
Total	2386.3	2485.5	2529.1

Annex 18: Composition of Fishery Subsidy in Korea®

Particulars/Years	1996	1997	1998	1999	2000	2001	2002	2003
Direct Payments	20.20	29.91	22.06	199.63	29.45	197.22	79.06	17.51
Cost Reducing Transfers	64.52	63.41	30.20	51.91	67.84	46.73	68.37	60.50
General Services	283.07	285.68	159.66	197.10	214.49	168.16	334.01	417.28
Cost Recovery Charges								
Total	367.70	378.99	211.93	448.64	311.78	412.12	481.44	495.29

<sup>8</sup> The total support for South Korea as reported in OECD (2006) is US \$ 367.70 million. However, actual summation of the three reported heads yields US \$ 367.79 million.

Annex 19.1: Composition of Fishery Subsidy in Norway<sup>a</sup>

Particulars/Years	1996	1997	1998	1999	2000	2001	2002b	2003b
Direct Payments	5.87	3.21	6.49	11.80	1.59	9.27	2.48	4.44
CostReducingTransfers	59.41	62.08	34.70	52.95	17.96	7.80	7.96	12.61
General Services	107.42	98.15	111.85	116.22	85.02	82.22	144.82	125.18
Cost Recovery Charges								
Total	172.69	163.44	153.05	180.96	104.56	99.46	155.25	142.22

Source: OECD (2006a)

a. The table shows the main transfers, and is not comprehensive. b. Data for 2002 and 2003 are provisional

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Implications of Fishery Sector Subsidies

Annex 19.2: Summary of Financial Transfer to Norwegian Fishery Sectors

Summary of Financial Transfer to Norwegian Fishery Sectors		Year	ıı	
Types of transfers	2001	2002	2003	2004
Management, research and enforcement	4.28	5.10	3.75	3.45
Fishery infrastructure expenditure	0.33	0.43	0.45	0.08
Payments for access to other countrys' water				
Payments for vessel decommissioning and license retirement	1.55	1.69	2.01	5.76
Investment and modernisation schemes				
Other cost reducing transfers	5.31	5.72	8.57	4.79
Income support and unemployment insurace	0.88	1.17	1.49	1.81
Other transfers	1.67	2.16	2.49	1.48
Schemes for various types of transfer(General Agreement-Reserve Fund)	2.62	3.14	4.64	2.14
Total transfers	16.64	19.42	23.39	19.51
Estimated administrative costs	0.46	0.49	0.48	0.39
Grand total	17.10	19.91	23.87	19.90

Annex 20: Composition of Fishery Subsidy in Spain

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Particulars/Years	1996	1997	1998	1999	2000	2001	2002	2003
Direct Payments	165.99	104.54	104.42	71.46	108.48	90.56	53.46	279.63
Cost Reducing Transfers	38.25	80.36	127.70	166.40	131.00	113.88	65.56	107.91
General Services	42.24	59.68	64.53	58.61	46.21	64.70	67.76	116.27
Cost Recovery Charges								
Total	246.48	244.58	296.64	296.47	285.69	269.15	186.78	503.81

Annex 21: Composition of Fishery Subsidy in Turkey\*

Particulars/Years	1996	1997	1998e	1999e	2000	2001	2002	2003
Direct Payments								
Cost Reducing Transfers	0.392	1.096						
General Services	28.272	14.018	4.145	2.709	25.572	17.07	15.01	19.304
Cost Recovery Charges								
Total	28.655	15.114	4.145	2.709	25.572	17.07	15.01	19.304

a. Data refer to the budget of the Ministry of Agriculture and Rural Affairs. e Includes OECD estimates for some data.

The total support for Turkey as reported in OECD (2006) is US \$ 28.655 million. However, actual summation of the three reported heads yields US \$ 28.664 million.

Annex 22: Composition of Fishery Subsidy in United Kingdom a

Particulars/Years	1996	1997	1998	1999	2000	2001	2002e	2003e
Direct Payments	15.9	23.0						
Cost Reducing Transfers	6.3	3.6	7.8	5.5	3.0	2.4	0.3	0.2
General Services	93.2	101.5	83.0	70.5	66.4	63.3	64.3	70.3
Cost Recovery Charges								
Total	115.4	128.1	8.06	76.0	69.4	65.8	64.6	70.5

Source: OECD (2006a)

This table shows the main elements of support (combining the EU and UK contributions), and is not necessarily comprehensive. Includes OECD estimates for some data. a.

Annex 23.1: Composition of Fishery Subsidy in United States <sup>a</sup>

Particulars/Years	1996	1997	1998	1999	2000	2001	2002	2003
Direct Payments		59.7	54.8	120.7	8.99	49.9	81.28	175.6
Cost Reducing Transfers	0.25	19	13	12.3	12.25	51.8	3.5	3.5
General Services	545.96	548.28	296	548.1	726.08	774.24	1046.03	1111.34
Cost Recovery Charges								
Total	546.21	626.98	8.699	1084.4	805.13	875.94	1130.81 1290.44	1290.44

Source: OECD (2006a)

The United States changed the budget structure in FY 2002. This results in a break in the details of the categories between the period prior to and post 2002 В

Annex 23.2: US fisheries subsidies by Programme and Year

Subsidy Program	1996	1997	1998	1999	2000	2001	2002	2003	2004
Fuel Subsidies	325.0	336.3	308.1	316.3	303.5	308.8	303.2	303.9	319.8
Fisheries research	281.8	281.8	281.8	281.8	281.8	281.8	281.8	281.8	281.8
State sales tax exemptions	43.3	45.2	37.7	41.1	36.8	36.1	34.6	31.9	31.9
Disaster aid	0	0	6.6	53.8	45.5	47.3	10.9	6.68	0
Fishing access payments	18.4	18.0	17.8	17.4	16.8	16.3	16.1	18.2	19.7
Surplus fish purchases	14.4	1.7	15.1	11.7	32.3	6.1	12.3	9.5	13.7
Capital Construction Fund	8.6	8.3	7.7	10.9	7.0	0.9	6.9	5.9	2.6
Seafood marketing	4.3	4.8	4.1	3.8	3.1	2.9	3.2	15.2	19.1
Vessel and permit buybacks	0	6.0	19.0	0	14.4	0.0	13.3	0	2.7
Fisheries Finance Program	0.2	0.4	0.5	0.2	0.2	0.3	0.1	0.3	0.2
Fishermen's Contingency Fund	0.3	0.1	0	0	0.1	0.3	6.0	0.1	0.2
Total	697.3	702.5	701.5	736.9	741.4	705.9	682.7	756.6	691.6

Source: Sharp and Sumaila (2009)

Annex 24: EC allocations under Financial Instrument for Fisheries Guidance Scheme (2000-2006)

(EURO million)

Subsidy measures		Amount	
	EU	National	Total
Scrapping	554	338	892
Constructions of new vessels	481	176	657
Modernisation of existing vessels	227	109	336
Aquaculture	351	147	498
Fishing port facilities	346	186	533
Processing and marketing	662	315	977
Socio-economic measures	54	36	90
Others	1347	753	2100
Total	4022	2061	6084

Source: EU (2008)

Annex 25: EC funding for Fisheries Sector Restructuring By Major Activities (1994-99)

(US \$ million)

Amount
837.1
747.7
329.2
36.9
223.9
705.4
101.7
149.9
3181.5

Source: US Government Documents (1996)

Annex 26: Fuel Subsidy in Major Countries (2000)

Country	Subsidies (US \$ per Liter)	Fuel consumption (million liter)	Total subsidy cost (US \$ million)
Australia	0.20	205	41
France	0.14	673	94
Japan	0.25	4,459	1,115
Spain	0.10	1,259	122
Turkey	0.09	190	17
USA	0.06	3,010	184
Argentina	0.18	640	115
Canada	0.18	519	93
Norway	0.18	786	116
South Korea	0.18	1,841	331

Source: (constructed from) Sumaila and Pauly (2006)

Annex 27: Summary of data on Fisheries Subsidies to High Seas Bottom Trawl (HSBT) Fleets

Country	HSBT fuel used (m liters) a		Subsidy HSBT fuel per liter subsidy (US\$)b (US\$)c	HSBT non-fuel subsidy (USm\$)d	HSBT total Total catch subsidy all species (USm\$)e ('000t)f	Total catch all species ('000t)f	HSBT catch ('000t)g	Total real catch value all species (USm\$)h	HSBT real value (USm\$)i
Japan	101.76	0.25	25.44	9.48	34.92	4,895	92	13,463	125
South Korea	96.57	0.18	17.38	9.74	27.12	1,805	88	3,348	92
Russia	90.93	0.18	16.37	13.69	30.06	3668	99	2,753	126
Spain	2.69	0.10	6.97	12.7	19.68	1132	99	1,414	103
Australia	5.17	0.20	1.03	8.92	9.95	183	9	1,673	6
Ukraine	24.4	0.15	3.66	3.2	98.9	393	27	235	20
Faeroe Isl. j	19.01	0.15	2.85	12.49	15.34	454	18	844	45
Estonia	8.37	0.15	1.26	3.68	4.94	109	14	69	27
Iceland	88.6	0.18	1.78	0.16	1.94	1,981	11	852	33
Lithuania	3.04	0.15	0.46	0	0.46	77	5	55	10

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Country	HSBT fuel Subsidy H used per liter (m liters) a (US\$)b	Subsidy per liter (US\$)b	HSBT fuel subsidy (US \$)c	HSBT non-fuel subsidy (USm\$)d	HSBT total subsidy (USm\$)e	HSBT fuel HSBT HSBT total Total catch subsidy non-fuel subsidy all species (US \$)c subsidy (USm\$)e ('000t)f	HSBT catch ('000t)g	Total real HSBT catch real value all value species (USm\$)i	HSBT real value (USm\$)i
Latvia	1.94	0.15	0.29	0	0.29	135	3	56	7
France	2.66	0.14	0.37	0.24	0.61	621	2	1,287	5
Total	433	ı	2/8	74	152	15,453	400	25,972	601

Adapted from Tyedmers et al. (2005.);

based on Sumaila et al. (this volume);

this is the product of high seas bottom trawl fuel consumption, and subsidy per liter; calculated using data in Khan et al. (this volume);

this is the sum of (c) and (d);

and g) are calculated using data in Watson et al. (2004); 

and (i) are obtained from Sumaila et al. (2006); and Data for Denmark reported in Sumaila et al. (this volume) is used to make the calculation here. We assumed that Estonia, Lithuania and Latvia give fuel subsidies to their fishing fleets.

# Annex 28: State Sales Tax Exemptions and Fuel Subsidy representing Subsidies to US Commercial Fishers (1996–2004)

(US \$ million)

State	Sale tax Subsidy value	Fuel Subsidy value
Alabama	0.966	3446
Alaska	0.000	99946
California	47.559	83370
Connecticut	2.333	3186
Delaware	0.000	0
Florida	10.351	22806
Georgia	0.041	657
Hawaii	0.000	3980
Louisiana	83.881	171032
Maine	26.008	32827
Maryland	2.456	9764
Massachusetts	29.332	34927
Mississippi	6.702	25768
New Hampshire	0.000	2176
New Jersey	31.048	16075
New York	4.612	8108
North Carolina	21.202	25321
Oregon	0.000	40280
Rhode Island	15.549	24051
South Carolina	0.275	1686
Texas	5.093	13122
Virginia	31.304	56600
Washington	19.698	64483
Total	338.410	743611

Source: Sharp and Sumaila (2009)

## Annex 29: Key Elements of Country Submissions at WTO on Access Rights

WTO member(s)	Key elements of position towards access agreements	Conditionsfor exemption
Small &Vulnerable Economies <sup>10</sup>	Propose to exclude access fees in fisheries access agreements from subsidies disciplines on account of special and differential treatment. However, are generally willing to examine possible disciplines which seek to minimize environmental and ecological damage so long as they are mutually supportive of the developmental priorities of SVE and other similarly situated developing countries.	None.
New Zealand <sup>11</sup>	Proposes to allow access payments but subject them to strict transparency provisions.	Transparency provisions.
Brazil <sup>12</sup>	Considers that a fishery subsidy shall be deemed to exist if a benefit is conferred in the onward transfer of access rights from the paying government, and proposes to prohibit such fishery subsidy. In addition, Brazil subjects access payments and transfer of access rights to strict transparency requirements.	Access agreements do not include subsidy element; Transparency provisions.
Japan, Korea and Taiwan <sup>13</sup>	Propose to include access payments in a green box (non-actionable), provided that they comply with transparency and environmental criteria.	Transparency and environmental criteria.

WTO Document No. TN/RL/W/136 (Submission in 2003); WTO Document No. TN/RL/GEN/57/Rev.2 (Submission in 2005); WTO Document No. TN/RL/W/210/Rev.2 (Submission in 2007).

<sup>&</sup>lt;sup>11</sup> WTO Document No. TN/RL/GEN/100 (Submission in 2006); WTO Document No. TN/RL/GEN/141 (Submission in 2006).

WTO Document No. TN/RL/GEN/79/Rev.4 (Submission in 2007).

WTO Document No. TN/RL/GEN/114 (Submission in 2006); WTO Document No. TN/RL/GEN/114 Rev.2 (Submission in 2007).

WTO member(s)	Key elements of position towards access agreements	Conditionsfor exemption
Norway <sup>14</sup>	Is not proposing to include access fees in the discipline; however Norway is willing to consider suggestions that make it necessary for the fishing industry of developed members to reimburse their governments for the financing of such access agreements.	Potentially: DWFN government is reimbursed by its fishing industry for financing of access agreements (= no subsidy element).
Argentina <sup>15</sup>	Distinguishes between payments pursuant to government-to-government agreements (outside of the scope of the ASCM) and the transfer of access rights by a government to specific enterprises if not done in exchange for a fair trade price (covered by the ASCM).	Transfer of access rights by a government to specific enterprises is done in exchange for a fair trade price (= no subsidies element).
The ACPGroup <sup>16</sup>	Notes the general agreement amongst the WTO membership that government-to-government payments are not subsidies. The Group also argues that any secondary transfer of rights should be non-prohibited and non-actionable, on account of the difficulties in identifying a workable "market" benchmark against which the existence of a "benefit" could be determined	None.

 $<sup>^{\</sup>mbox{\tiny 14}}\mbox{\ WTO Document No.\,TN/RL/GEN/144}$  (Submission in 2007).

 $<sup>^{\</sup>scriptscriptstyle 15}~$  WTO Document No. TN/RL/GEN/138/Rev.1 (Submission in 2007).

 $<sup>^{16}\ \</sup> WTO$  Document No. TN/RL/W/209 (Submission in 2007).

WTO member(s)	Key elements of position towards access agreements	Conditionsfor exemption
UnitedStates <sup>17</sup>	Proposes to include the onward transfer of access rights to a member's fleet within the definition of subsidies, but to exclude such transfer from the prohibition if in compliance with substantive economic, transparency, and environmental requirements.	Fleet pays compensation to its government to the cost it would otherwise have to pay for access to the fisheries resources (= no subsidies element); Transparency and environmental requirements.
Indonesia <sup>18</sup>	Proposes to include the onward transfer of access rights to a member's fleet within the disciplines, but to exclude such transfer from the prohibition provided that a benefit is not conferred by the onward transfer of such rights to the member's fishing fleet and that agreements are in compliance with environmental and notification requirements.	Member's fleet pays c o m p e n s a t i o n comparable to the value of the access of the resource (= no subsidies element); Environmental and n o t i f i c a t i o n requirements.
Chair's text <sup>19</sup>	Proposes to(i) prohibit subsidies arising from the further transfer of access rights and clarifies that government-to-government payments for access "shall not be deemed to be subsidies within the meaning of this Agreement" (Art I g), (ii) exempt access-related subsidies from prohibition for LDCs (Art III.1) and, under certain conditions, where the fishery in question is within the EEZ of adeveloping country member (Art III.3),(iii) Require publishing of access agreements and notifying the committee of publication references	Exemptions under S&DT conditioned upon agreements(a) being made public,(b) containing provisions to prevent overfishing based on internationally recognized best practices for fisheries management and conservation,

To Document No. TN/RL/GEN/145 (Submission in 2007).

 $<sup>^{\</sup>scriptscriptstyle{18}}~WTO$  Document No. TN/RL/GEN/150 (Submission in 2007)

 $<sup>^{\</sup>scriptscriptstyle 19}~$  WTO Document No. TN/RL/W/213 (Submission in 2007).

WTO member(s)	Key elements of position towards access agreements	Conditionsfor exemption
	and of the terms on which access rights are transferred (Art IV.2 and 3); in case of a dispute, the payer member has to bear the burden of proof in case of nonnotification (Art VIII.3).	including requirements & support for previous & regular science based stock assessment, for management and control measures, for vessel registries, for reporting of effort, catches & discards and other measures as appropriate.
India,Indonesia andChina <sup>20</sup>	Agree with Chair's text on access- related provisions. Suggest mentioning explicitly that developing countries have the right to access the waters of other developing countries.	As chair's text, with stock assessment being subject to peer review in the SCM Committee.

Source: quoted from Orellana (2008)

 $<sup>^{\</sup>mbox{\tiny 20}}$  WTO Document No. TN/RL/GEN/155/Rev.1 (Submission in 2008).

### Annex 30: Access Fee received by Countries (1999)

(US \$ million / %)

Country	Access Fees (US \$ million)	Access Fees (% of catch)	Access fees (% of GDP)
Fiji	0.21	0.053	0.01
Federated States of Micronesia	1.54	8.6	6.70
Kiribati	20.60	14.8	42.81
Marshall Island	4.98	9.96	5.12
Nauru	3.40	9.20	6.59
Papua New Guinea	5.84	4.10	0.17
Solomon Island	0.27	0.30	0.10
Tuvalu	5.90	15.8	42.60

Source: Grynberg (2003)

Annex 31: Fishing Access Payments by Major Countries

(US \$ million / %)

Country	Access subsidies amounts
Japan	200.000 (20)
China	193.418 (19)
Spain	117.791 (12)
France	107.209 (11)
Russia	70.878 (7)
UK	56.452 (6)
Portugal	45.000 (5)
Korea	43.606 (4)
Denmark	37.747 (4)
Italy	22.693 (2)
Taiwan	21.098 (2)
US	21.000 (2)
Netherlands	17.989 (2)
Ireland	12.789 (1)
Germany	9.517 (1)
Greece	9.335 (1)
Sweden	7.578 (1)
Finland	3.566 (~0)
Finland	2.323 (~0)
Total (US \$ million)	1,000(100)

Source: Sumaila and Pauly (2006)

Annex 32: EU Fisheries Partnership Agreements: The Main Changes

Aspect	Fisheries agreements	Fisheries PartnershipAgreements
Fishery types	Tuna and mixed (demersal) fisheries	Mainly tuna-only; some mixed agreements remain
Financial contribution (FC)	Based on fishing opportunities (species/quantities/number of vessels)	Based on fishing opportunities +/- an extra payment to support policy
Actions in the fisheries sector	Proportion of FC put towards specific 'targeted actions'; EU monitored spend	Proportion of FC put towards 'developing and implementing a sectoral fisheries policy'; EU monitors outputs
Employment for coastal state nationals	Sometimes required local crew to be employed on vessels	Require local or ACP* crew to be employed on vessels; labour conditions to meet ILO** standards
Investment	No provision	Joint ventures and investments encouraged
Review and scientific cooperation	Little scope for scientific cooperation. Joint Committee only met when necessary	Joint Committee and scientific committee or working group meet annually, increasing scope for cooperation
Monitoring, Control & Surveillance (MCS)	Only included in some agreements	Vessel Monitoring System (VMS) Protocol must be included; not always implemented
Impact evaluations	Included since 2003	Requirement for ex-ante and ex-post evaluations

Source: DFID (undated a)

<sup>\*</sup>ACP = African, Caribbean & Pacific states; this has effectively increased flexibility for EU vessels as they do not have to employ nationals from the particular coastal State of the agreement, but rather from any ACP state.

 $<sup>\</sup>hbox{***ILO=} \quad International \, Labour \, Organization.$ 

Annex 33: Access Right Details of the EU Agreements with Host Countries

SI. No	Country	Duration of the Agreement	Duration of the Protocol	Date of Initialisation	Fee for ship owners	Reference tonnage	Financial contribution
1	Cape Verde	5 years renewable (30.3.2007-29.3.2012)	4 years and 5 months (30.3.2007-31.8.2011)	16 December 2005	35 €/ton(seiners and longliners)25 € per tonne caught (pole and liners).	5 000 t. /year	385 000 €
2	Comoros Islands	7 years renewable (1.1.2005 - 31.12.2011)	6 years (1.1.2005 - 31.12.2010)	24 November 2004 35 € per tonne caught	35 € per tonne caught	6000 t./year	390 000 €
3	Côte d'Ivoire	6 years renewable (1.7.2007 – 30.6.2013)	6 years (1.7.2007—30.6.2013)	5 April 2007	35 € per tonne caught.	7 000 t./year	595 000 €
4	Gabon	6 years (3.12.2005-2.12.2011)	6 years (3.12.2005- 2.12.2011)	28 October 2005	35 € per tonne caught	11,000 t./year	860.000€
5	Greenland	6 years renewable (1.1.2007 – 31.12.2012) 31.12.2012)	6 years (1.1.2007 – 31.12.2012)	2 June 2006			15 847 244 €
9	Guinea	4 years renewable	4 years (1st January 2009 – 31st December 2012).	December 2008	tuna seiners: 35 € per tonne caught; pole and line vessels: 25€ per tonne caught	Tuna seiners: 4025 € per year (ref catches: 115 t- Pool and line vessels: 500 € (ref catches:	450 000 €

Reference Financial connage contribution	110t/Year 7 000 000 €	6 400 t./year 478 400 €	13 300 t./year	Unspecified
Fee for ship Reference owners tonnage	Pole and line: 25 € per tonne caught Seiners and longliners: 35 € par tonne caught Shrimps: 307 €/t/year (increase if biannual or quarterly licences) Fish & cephalopods: 229 €/t/year (increase if biannual or quarterly licences)	35 € per tonne   6 400 caught.	35 € per tonne 13 30 caught.	Seiners and Unsp longliners: 35 € per
Date of Initialisation	23 May 2007	19 July 2006	21 June 2006	21 July 2006
Duration of the Protocol	4 years (16.6.2007-15.6.2011)	6 years (16.9.2006 – 15.9.2012)	6 years (1.1.2007 – 31.12.2012)	4 years (1st August 2008 -31 July 2012)
Duration of the Agreement	4 years renewable (16.6.2007-15.6.2011)	6 years renewable (16.9.2006 – 15.9.2012)	6 years renewable (1.1.2007– 31.12.2012)	6 years renewable (1st August 2006 -31
Country	Guinea-Bissau	Kiribati	Madagascar	Mauritania
SI.	^	8	6	10

Financial contribution	259 000 €	36100000 E/year	€ 000 000
Reference tonnage	8 600 t./year	Tuna fishing: 3610000 5000 € per year €/year	10 000 t./year
Fee for ship owners	35€ per tonne caught	Tuna: 25 € per tonne caught Small scale fishing/north, pelagic species: 67 €/GT/trims Small scale fishing/north, long-liners: 60 €/GT/trims for pelagic species: 20 €/th Demersal fishing: 53 €/GT/trims Small scale fishing scale fishing scale	35 € per tonne caught.
Date of Initialisation	13 May 2004	29 July 2005	21 December 2006 35 € per tonne caught.
Duration of the Protocol	3 years (26.2.2007 - 25.2.2010)	4 years (28.2.2007-27.2.2011)	5 years (1.1.2007 – 31.12.2011)
Duration of the Agreement	9 years renewable for a period of 3 years (26.2.2007 – 25.2.2016)	4 years renewable (28.2.2007-27.2.2011)	5 years renewable (1.1.2007 – 31.12.2011).
Country	Micronesia	Могоссо	Mozambique
SI. No	11	12	13

SI. No	Sl. Country No	Duration of the Agreement	Duration of the Protocol	Date of Initialisation	Fee for ship owners	Reference tonnage	Financial contribution
14	São Tomé and Principe	14 São Tomé and 4 years renewable 4 years (1. Principe (1.6.2006 – 31.5.2010) 31.5.2010)	4 years (1.6.2006 – 31.5.2010)	25 May 2006	35 € per tonne caught	8 500 t./year	€63 000 €
15	15 Seychelles	6 years renewable (18 January 2005 – 17 January 2011)	6 years renewable (18 6 years (18 January 2011) revised in March January 2011) 2005 – 17 January 2011) 2007, during the Joint committee	March 2005 – 1)revised in March 2007, during the Joint committee	35 € per tonne caught	63.000 t./year	5 355 000 €
16	16 Solomon Islands	3 years renewable (9.10.2006–8.10.2009) (9.10.2006–8.10.2009)	3 years (9.10.2006–8.10.2009)	28 January 2004	35 € per tonne caught.	6 000 t./year	400 000 €

Source: Constructed from EU (2006)

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Annex 34: Nature of Devolution of Access Rights Payments in the EU Partnership Agreements

Country	Nature of devolution
Cape Verde	<ul> <li>"If the overall quantity of catches by Community vessels in Cape Verde waters exceeds 5 000 tonnes per year, the amount of the financial contribution (EUR 325 000) shall be increased by EUR 65 for each additional tonne caught. However, the total annual amount paid by the Community shall not be more than twice the amount indicated in paragraph 1 (EUR 650 000). Where the quantities caught by Community vessels exceed the quantities corresponding to twice the total annual amount, the amount due for the quantity exceeding that limit shall be paid the following year".</li> <li>"Eighty percent (80 %) of the total amount of the financial contribution fixed in Article 2 shall be allocated each year to the support and implementation of initiatives taken in the context of the sectoral fisheries policy drawn up by the Government of Cape Verde".</li> </ul>
Comoros	<ul> <li>"If the total quantity of catches by Community vessels in Comorian waters exceeds 6 000 tonnes per year, the total amount of the annual financial contribution shall be increased by EUR 65 for each additional tonne caught. However, the total annual amount paid by the Community shall not be more than twice the amount indicated in paragraph 3 (EUR 780 000). Where the quantities caught by Community vessels exceed the quantities corresponding to twice the total annual amount, the amount due for the quantity exceeding that limit shall be paid the following year."</li> <li>"A share of 60 % of the financial contribution referred to in Article 2(1) of this Protocol shall be put towards defining and implementing a sectoral fisheries policy in the Comoros with a view to introducing responsible fishing in its waters".</li> </ul>
Côte d'Ivoire	<ul> <li>"If the overall quantity of catches by Community vessels in Côte d'Ivoire's fishing zones exceeds the reference tonnage, the amount of the annual financial contribution shall be increased by EUR 65 for each additional tonne caught. However, the total annual</li> </ul>

Country	Nature of devolution
	amount paid by the Community shall not be more than twice the amount indicated in paragraph 3 (EUR 1 190 000). Where the quantities caught by Community vessels exceed the quantities corresponding to twice the total annual amount, the amount due for the quantity exceeding that limit shall be paid the following year".
Gabon	<ul> <li>"If the overall quantity of catches by Community vessels in Gabonese waters exceeds 11 000 tonnes per year, the amount of the annual financial contribution (EUR 715 000) shall be increased by EUR 65 for each additional tonne caught. However, the total annual amount paid by the Community shall not be more than twice the amount indicated in paragraph 3 (EUR 1 430 000). Where the quantities caught by Community vessels exceed the quantities corresponding to twice the total annual amount, the amount due for the quantity exceeding that limit shall be paid the following year".</li> <li>"Sixty percent (60 %) of the total amount of the financial contribution fixed in Article 2 shall be allocated each year to the support and implementation of initiatives taken in the context of the sectoral fisheries policy drawn up by the Gabonese Government".</li> </ul>
Greenland	<ul> <li>"As regards cod and capelin every year Greenland shall notify the Community authorities of any quantities of cod and capelin made available for catching beyond the amounts set out in Chapter I of the Annex hereto. The Community shall pay for those additional amounts 17,5 % of the first landing value at the rate of EUR 1 800 per ton for cod and EUR 100 per ton for capelin, minus the fees paid by ship owners, up to a maximum of EUR 1 540 000 per year, to cover both species."</li> <li>"Greenland authorities shall have full discretion regarding the use to which this financial contribution and financial reserve are put, except for annual amounts of EUR 500 000 and EUR 100 000 which shall be applied respectively for the operation of the Greenland Institute of Natural Resources and for training of fisheries officials, and in 2007 an amount of EUR 186 022 to be used for cod management plan studies".</li> </ul>

Country	Nature of devolution
Republic of Guinea	<ul> <li>"If the overall quantity of catches by Community vessels in Guinea's fishing zones exceeds the reference tonnage, the amount of the annual financial contribution shall be increased by EUR 65 for each additional tonne caught. However, the total annual amount paid by the Community may not be more than twice the amount indicated in paragraph 3 (i.e. EUR 1 050 000 for the first year and, where appropriate, EUR 1 150 000 for the second year and EUR 1 050 000 for the following years). Where the quantities caught by Community vessels exceed the quantities corresponding to twice the total annual amount, the amount due for the quantity exceeding that limit shall be paid the following year".</li> <li>"The entire amount of the financial contribution and specific contribution set in Article 2(1) of this Protocol shall be allocated each year to the support and implementation of initiatives taken in the context of the sectoral fisheries policy drawn up by the Government of Guinea and approved by the two Parties".</li> <li>"Shipowners shall undertake to employ, for the tunafishing season in Guinea's fishing zone, at least 20 % of seamen of ACP origin, giving priority to Guinean seamen. Where those provisions are not complied with, the shipowners concerned may be considered by Guinea not to be eligible for a fishing authorisation under Section 1 of Chapter 1 of this Annex".</li> </ul>
Guinea-Bissau	<ul> <li>" if the use of the fishing opportunities provided for in Article 1(1)(a) and (b) of this Protocol by Community vessels improves, the Community shall grant an additional amount to Guinea-Bissau proportionate to the increase in the use of the fishing opportunities, within the limits of the fishing opportunities set by this Protocol and up to a maximum EUR 1 million per year".</li> <li>"A share of 35 % of the financial contribution referred to in Article 2(1) of this Protocol (i.e. EUR 2 450 000) shall be put towards defining and implementing a sectoral fisheries policy in Guinea-Bissau with a view to introducing sustainable and responsible fishing in its waters".</li> <li>"In addition to the amount referred to in paragraph 1, a specific contribution from the Community of EUR 500</li> </ul>

Country	Nature of devolution
	<ul> <li>000 per year shall be dedicated to the introduction of a health and plant health system for fishery products. However the two Parties may, where necessary, decide to allocate part of this specific contribution to strengthening monitoring, control and surveillance in Guinea-Bissau fishing zones".</li> <li>"Shipowners who have been issued fishing licences under the Agreement shall contribute to the practical vocational training of Guinea-Bissau nationals and to an improvement of the labour market, subject to the conditions and limits".</li> </ul>
Kiribati	<ul> <li>"The financial contribution referred to in Article 7 of the Agreement shall comprise, for the period referred to in Article 1, an annual amount of EUR 416 000 equivalent to a reference tonnage of 6 400 tonnes per year and a specific amount of EUR 62 400 per year for the support and implementation of initiatives taken in the context of the Kiribati sectoral fisheries policy".</li> <li>"If the overall quantity of catches by Community vessels in Kiribati waters exceeds 6 400 tonnes per year as provided in the Article 2.1 of the Protocol, the amount of the financial contribution, as provided in the Article 2.1 of the Protocol, (EUR 416 000) shall be increased by EUR 65 for each additional tonne caught. However, the total annual amount paid by the Community shall not be more than twice the amount indicated in paragraph 3 (EUR 956 800). Where the quantities caught by Community vessels exceed the quantities corresponding to twice the total annual amount, the amount due for the quantity exceeding that limit shall be paid the following year".</li> <li>"30 % of the total amount of the financial contribution fixed in Article 2 shall be allocated the first year to the support and implementation of initiatives taken in the context of the sectoral fisheries policy drawn up by the Government of Kiribati. This percentage is fixed at 40 % the second year and at 60 % the year thereafter".</li> <li>"Owners of tuna vessels and surface longliners shall employ ACP nationals, including Kiribati nationals, subject to following conditions and limits"</li> </ul>

Country	Nature of devolution
Madagascar	<ul> <li>"The financial contribution referred to in Article 7 of the Agreement shall comprise, for the period referred to in Article 1, an annual amount of EUR 864 500 equivalent to a reference tonnage of 13 300 tonnes per year and a specific amount of EUR 332 500 per year for the support and implementation of Madagascar's sectoral fisheries policy".</li> <li>"If the overall quantity of catches by Community vessels in Malagasy waters exceeds the reference tonnage, the amount of the annual financial contribution shall be increased by EUR 65 for each additional tonne caught. However, the total annual amount paid by the Community shall not be more than twice the amount indicated in paragraph 3 (EUR 2 394 000). Where the quantities caught by Community vessels exceed the quantities corresponding to twice the total annual amount, the amount due for the quantity exceeding that limit shall be paid the following year".</li> <li>"Owners of tuna vessels and surface longliners shall employ ACP nationals, including Kiribati nationals, subject to following conditions and limits"</li> </ul>
Mauritania	<ul> <li>"Apart from tuna seiners (which shall endeavour to sign on at least one Mauritanian seaman per vessel), pole- and-line tuna vessels (which must sign on three Mauritanian seamen per vessel), and pelagic vessels in category 11 (for which transitional provisions are laid down in point 6 of Chapter XV of this Annex), each Community vessel shall sign on Mauritanian seamen for the duration of the voyage".</li> </ul>
Mauritius	"This compensation shall cover a catch weight in waters of Mauritius of 6 500 tonnes of catches per year. If the annual amount of catches by Community vessels in the waters of Mauritius exceeds this quantity, the above mentioned compensation shall be increased proportionately at the rate of EUR 75 per additional tonne caught. However, the total amount of the financial compensation to be paid by the Community for tuna and tuna-like species cannot exceed the double of the amount referred to in paragraph 1".

Country	Nature of devolution
	<ul> <li>"EUR 150 000 for scientific and technical programmes to promote better understanding and management of fisheries and living resources in Mauritius' fishing zone".</li> <li>"EUR 30 000 for study grants and practical training courses in the various scientific, technical and economic fields linked to fishing and participation to international meetings relating to fisheries".</li> <li>"EUR 15 000 for monitoring, control and surveillance, including the Vessel Monitoring System (VMS)".</li> <li>"10 Mauritian seamen shall embark on the EC fleet".</li> </ul>
Micronesia	<ul> <li>"If the total quantity of tuna catches per year by Community vessels in the FSM EEZ exceeds 8 600 tons, the total annual financial contribution shall be increased by EUR 65 per additional ton of tuna caught. However, the total annual amount to be paid by the Community cannot exceed the triple of the amount of the financial contribution referred to in paragraph 1".</li> <li>"A share of 18 % of the single financial contribution referred to in Article 2(1) of this Protocol shall be put towards these objectives. This contribution shall be managed in the light of objectives identified by mutual agreement between the two parties, and the annual and multiannual programming to attain them".</li> <li>"Each Community vessel fishing under the Agreement shall undertake to employ at least one FSM national as a crew member. Condition of service for FSM nationals should be as standard for the industry in the FSM".</li> </ul>
Morocco	<ul> <li>"Vessels authorised to fish in Moroccan fishing zones under the Agreement shall take on board observers appointed by Morocco".</li> <li>"Shipowners with fishing licences under this Agreement shall take on board, for the entire period of their presence in Moroccan waters, Moroccan seamen However, if these vessels operate for less than one month per year in the Moroccan fishing zone, they shall be exempted from the obligation to embark Moroccan seamen."</li> </ul>

Country	Nature of devolution
Mozambique	<ul> <li>"The financial contribution referred to in Article7 of the Agreement shall comprise, for the period referred to in Article 1, an annual amount of EUR 650000 equivalent to a reference tonnage of 10000 tonnes per year and a specific amount of EUR 250000 per year for the support and implementation of Mozambique's sectoral fisheries policy".</li> <li>"If the overall quantity of catches by Community vessels in Mozambican waters exceeds the reference tonnage, the amount of the annual financial contribution shall be increased by EUR 65 for each additional tone caught. However, the total annual amount paid by the Community shall not be more than twice the amount equivalent to the reference tonnage (EUR 1300000). Where the quantities caught by Community vessels exceed the quantities corresponding to twice the total annual amount, the amount due for the quantity exceeding that limit shall be paid the following year".</li> <li>"Shipowners undertake to employ, for the tuna-fishing season in Mozambique's fishing zone, at least 20% of seamen of ACP origin, of which, if possible, at least 40% are Mozambican".</li> </ul>
Sao Tome	<ul> <li>"The financial contribution referred to in Article7 of the Agreement shall comprise, for the period referred to in Article1, anannual amount of EUR 552500 equivalent to a reference tonnage of 8500 tonnes per year and a specific amount of EUR 1105000 per year for the support and implementation of São Tomé and Príncipe's sectoral fisheries policy".</li> <li>"If the overall quantity of catches by Community vessels in São Toméan waters exceeds 8500 tonnes per year, the amount of the financial contribution (EUR 552500) shall be increased by EUR 65 for each additional tone caught. However, the total annual amount paid by the Community shall not be more than twice the amount equivalent to the reference tonnage (i.e. EUR 1105000). Where the quantities caught by Community vessels exceed the quantities corresponding to twice the total annual amount (17000tonnes), the amount due for the quantity exceeding that limit shall be paid the following year".</li> </ul>

Country	Nature of devolution
	"Owners of tuna seiners and surface longliners shall employ ACP nationals, subject to the conditions and limits"
Seychelles	" the employment of Seychelles seamen on board of Community vessels shall be governed by the International Labour Organisation (ILO) Declaration on Fundamental Principles and Rights at Work"
Solomon Islands	<ul> <li>"The part of the financial contribution referred to in point (b) of paragraph 1 shall be determined and managed in the light of objectives identified by common accord between the Parties in accordance with the Protocol, to be achieved in the context of the sectoral fisheries policy in Solomon Islands and in accordance with an annual and multiannual programme for its implementation".</li> <li>"If the total quantity of tuna catches per year by Community vessels in the Solomon Islands fishing zone exceeds 6000 tonnes, the total annual financial contribution shall be increased by EUR 65 per additional tone of tuna caught. However, the total annual amount to be paid by the Community cannot exceed the triple of the amount of the financial contribution referred to in paragraph1".</li> <li>"For each additional purse seine licence granted by Solomon Islands pursuant to Article 1(3), the Community shall increase the financial contribution referred to in Article2(1) of this Protocol by EUR 65000 per year".</li> <li>"Each European Community vessel fishing under the Agreement shall undertake to employ at least one Solomon Islands national as a crew-member. Condition of service for Solomon Islands nationals should be as standard for the industry in Solomon Islands national as a crew-member, ship-owners shall be obliged to pay a lump sum equivalent to the wages of two crew-members for the duration of the fishing season in the Solomon Islands fishing zone".</li> </ul>

Source: Constructed from Country Agreements in EU (2006)

Annex 35: Level of Fishing Opportunities authorised by Greenland

Species	2002	2008	2009	2010	2011	2012
Cod (NAFO 0/1) (1)	1 000	3 500	3 500	3 500	3 500	3 500
Pelagic redfish (ICES XIV/V) (2)	10 838	8 000	8 000	8 000	8 000	8 000
Greenland Halibut (NAFO 0/1) south of 68°	I	2 500	2 500	2 500	2 500	2 500
Greenland Halibut (ICES XIV/V) (3)	7 500	7 500	7 500	7 500	7 500	7 500
Shrimp (NAFO 0/1)	4 000	4 000	4 000	4 000	4 000	4 000
Shrimp (ICES XIV/V)	7 000	7 000	7 000	7 000	7 000	7 000
Atlantic Halibut (NAFO 0/1)	200	200	200	200	200	200
Atlantic Halibut (ICES XIV/V) (4)	1 200	1 200	1 200	1 200	1 200	1 200
Capelin (ICES XIV/V)	55 000 (5)	55 000 (5)	55 000 (5)	55 000 (5)	55 000 (5)	55 000 (5)
Snowcrab (NAFO 0/1)	200	200	200	200	200	200
By-catches (NAFO 0/1) (6)	2 600	2 300	2 300	2 300	2 300	2 300
-						

Source: EU (2006)

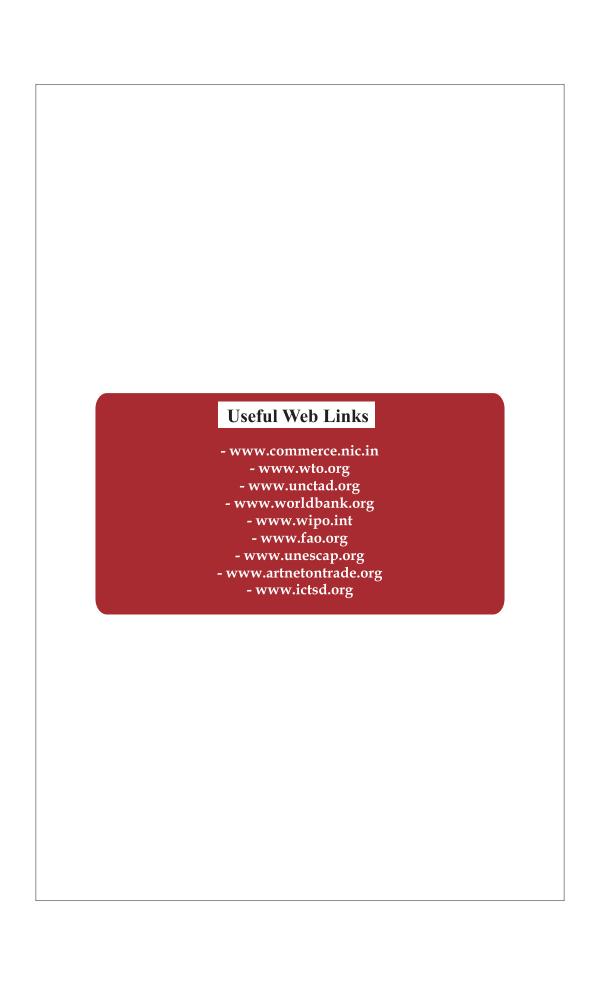
In the event of stock recovery, the Community may fish up to pm tonnes, with a corresponding increase in the part of the financial compensation referred to in Article 2(1) of the Protocol. The quota for 2007 can only be fished as from 1 June. May be fished East or West.

May be fished East or West. To be fished by pelagic trawl. (1)

(7)

This figure may be revised in the light of the agreement for the allocation of catch possibilities between coastal countries. The fishery	shall be managed through a limitation on the number of vessels fishing at the same time.
(3) This f	sha
1	46

- 1000 tonnes to be fished by no more than 6 Community demersal longliners catching Atlantic halibut and associated species. The conditions for the fishery of the demersal longliners shall be agreed upon in the framework of the Joint Committee. (4)
- When catchable, the Community may fish up to 7,7% of the capelin TAC for the season going from 20 June to 30 April the following year with a corresponding increase in the part of the financial compensation referred to in Article 2(1) of the Protocol. (2)
- By-catches are defined as any catches of species not covered by the vessel's target species indicated on the licence. The composition of the by-catches shall be reviewed annually in the framework of the Joint Committee. May be fished East or West. 9



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## **ABOUT THE AUTHOR**



Dr. Debashis Chakraborty is currently an Assistant Professor of Economics at the Indian Institute of Foreign Trade (IIFT), New Delhi Campus. He has obtained Ph.D. in Economics from the Centre for International Trade and Development, Jawaharlal Nehru University (JNU). His research focus includes International Trade Policy and WTO

Negotiations, Environmental Sustainability and Indian Economic Development.

Dr. Chakraborty has presented and published his research at various academic and policy forums in India and abroad. He has co-authored the book entitled "The WTO Deadlocked: Understanding the dynamics of International trade" from Sage in 2008, on the progress of multilateral trade negotiations. He has also co-edited several volumes on WTO issues pertaining to India's interest. He is also a reviewer for several academic journals, published from India and abroad.

Before joining IIFT, Dr. Chakraborty has worked at the Rajiv Gandhi Institute for Contemporary Studies (RGICS), New Delhi as a Research Associate, focusing on multilateral trade negotiations and Indian economic development.

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## **Centre for WTO Studies**

Indian Institute of Foreign Trade
IIFT Bhawan, B-21, Qutab Institutional Area, New Delhi-110016
Tel: 011-26564409
E-mail: editor\_wtocentre@iift.ac.in