High Seas Bottom Trawl Fisheries and their Impact on Deep Sea Environments

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Deep Sea Conservation Coalition

CONSERVATION INTERNATIONAL

WWF

OCEANA

MCBI

GREENPEACE

NRDC
Global catch (t·10^6)

El Niño event

El Niño events

Uncorrected
Corrected
Corrected, no anchoveta

Status of Stocks in 1999

Recovering
Depleted
Over-Exploited
Fully-Exploited
Moderately Exploited
Under-Exploited

Source FAO
Biomass of table fish in 1900 (Christensen et al. 2003) and in 2000....
Deep Ocean Ecosystems Discovered in Past 30 Years
• ~50,000 – 100,000 seamounts, half on the high seas

• < 1% biologically sampled

Seamounts and cold water corals

• Important nursery and feeding grounds

– Host high levels of endemism

– Stepping stones for spreading of species across ocean basins

– Refugia for relict species

• Host vast numbers of benthic animals
  
  • Hard, soft, horny corals, sponges, sea lilies, sea squirts
  
  • Habitat and food for other animals
Trawling gear is extremely robust – doors can be up to 5 tons each.
Bottom Trawl Fishing

Bottom trawling on Seamounts

Untrawled

trawled
Orange roughy

Image from NIWA, New Zealand
Scientists Statement on Protecting World's Deep-sea Coral and Sponge Ecosystems, February 2004

- “the UN General Assembly should adopt a moratorium on deep-sea bottom trawl fishing on the High Seas effective immediately”

Current status of High Seas bottom trawl fishery: (IUCN, NRDC, WWF, CI)

- 170,000 – 215,000 mt
  \(\cong 0.2\%\) of world capture fisheries [UN FAO 2001]
- Value = US$300– US$400 m in 2001
  <0.5\% of total value of world capture fisheries production [UN FAO 2001]
- Negligible contribution to global food security
Current status of High Seas bottom trawl fishery: (IUCN, NRDC, WWF, CI)

- 11 countries responsible for over 95% of reported catch (2001)
  Spain; Portugal; Russia; Lithuania; Latvia; Estonia; Iceland; Norway; Faroe Is (Denmark); New Zealand; Japan
  (most OECD and/or Parties to UNFSA)

- 100-200 vessels - full-time, year round
  3.1 million vessels worldwide [UN FAO 2001]

Gaps in Governance

- Bottom trawling in most areas of the high seas is completely unregulated
- In those high seas areas with RFMOs, few if any have restricted bottom trawling to protect vulnerable habitats
64% Of World’s Oceans Lie Beyond National Jurisdiction

International Agreements

- UNCLOS
- CBD
- UN Fish Stocks Agreement
- FAO Code of Conduct
- RFMO Agreements
- Antarctic Treaty System
- Regional Seas Agreements
• Article 117: duty to take measures necessary to conserve high seas living resources

• Article 118: duty to cooperate in the conservation and management

• Article 192: duty to protect and preserve marine environment

• Article 194.5: duty to protect rare and fragile ecosystems and vulnerable species

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**Convention on Biological Diversity**

• Article 3
  - Parties “to ensure that activities within their jurisdiction or control do not cause damage to the environment of other States or to areas beyond the limits of national jurisdiction.”

• Article 5
  - Parties to cooperate in respect of areas beyond national jurisdiction for the conservation and sustainable use of biodiversity
1995 UN FISH STOCKS AGREEMENT

• Assess and minimize the impact of fishing on non-target and associated or dependent species and their environment [5(d),(f)]
• Protect biodiversity in the marine environment [5(g)]
• Protect habitats of special concern [6.3]
UN General Assembly Resolution A/57/141 (2002):

• “Encourages relevant international organizations, .... to consider urgently ways to integrate and improve, on a scientific basis, the management of risks to marine biodiversity of seamounts and certain other underwater features within the framework of the Convention;”


• Paragraph 51 “......reiterates its call for urgent consideration of ways to integrate and improve, on a scientific basis, the management of risks to the marine biodiversity of seamounts, cold water coral reefs and certain other underwater features...”.
Convention on Biological Diversity, COP 7 - 2004:

- COP 7, Decision VII/5:

30. Agrees that there is an urgent need for international cooperation and action to improve conservation and sustainable use of biodiversity in marine areas beyond the limits of national jurisdiction, ...

61. Calls upon the United Nations General Assembly ... to urgently take the necessary short-term, medium-term and long-term measures to eliminate/avoid destructive practices, consistent with international law, on scientific basis, including the application of precaution, for example, on a case by case basis, interim prohibition of destructive practices adversely impacting the marine biological diversity
Moving from CALLS for urgent action ... to ACTION ...

Immediate Moratorium on High Seas Bottom Trawling

- a ‘time out’ for high seas bottom trawl fishing to initiate a UN Coordinated approach to:
  - assess deep sea biodiversity & ecosystems + vulnerability to fishing;
  - negotiate, adopt and implement legally binding regimes to protect, conserve and sustainably and equitably manage High Seas biological diversity.