



**Panel on Food Safety and Environmental Hygiene: Taking the ban on trawling  
in Hong Kong's waters forward**

**March 15<sup>th</sup> 2011**

**BLOOM Hong Kong written submission**

BLOOM Hong Kong is pleased to contribute to the LegCo's invitation for views and opinions to the proposed amendment of fishery management, FH CR 1/2876/07: a ban on trawling activities in Hong Kong waters. The below document outlines reasons why **our organization supports the ban on trawling activities in Hong Kong waters, and our recommendations for taking this ban forward.**

**Context**

Modern fishing fleets are such powerful and effective fish catching machines that worldwide fish stocks are declining at an alarming rate. In 2008, the UN Food and Agricultural Organization (FAO) estimated that 53% of global fisheries resources were fished at their maximum sustainable productions and 31% were estimated to be either overexploited or depleted (FAO, 2010). The Hong Kong fishery is not immune to this trend, which has been shown to have shifted from being dominated by large, slow growing, highly commercially valuable species to being comprised of small, fast maturing, relatively less commercially valuable species (Pitcher et al., 1998; Situ & Sadovy, 2004; Buchary et al., 2003). With little regulation on fishing gears (except for a prohibition of dynamite and electrical fishing) or fishing effort, Hong Kong's marine environment has been vastly depleted. Hong Kong used to host a variety of large and small marine fauna, from hammerhead sharks to manta rays and turtles. In the 1990s, the mean weight of trawled fish was about 10 grams (WWF, 2005), which is three times lighter than a sparrow. There is thus a need to reduce fishing effort and restore marine resources by implementing as far as possible sustainable fishing practices and conservation measures.

**A ban on trawling**

BLOOM believes that the proposed ban on trawling activities in Hong Kong's waters would be a crucial step in the long road to recovery of our precious marine resources. The trawling methods used in Hong Kong – pair trawling, stern trawling, shrimp trawling, hang trawling and bottom trawling – are widely known as extremely destructive fishing practices. They have been found to have profound impacts on the sustainability of various fisheries. A number of studies have shown that bottom trawling poses significant risks to the marine ecosystem by:

- i.) Influencing undamaged organisms, potentially resulting in greater impact, e.g. effects on behaviour (Freese et al., 1999);
- ii.) Influencing community structure (Kaiser, 1998), e.g. significant change on the abundance, biomass and diversity of marine fauna and flora;
- iii.) Producing bycatch and discards due to the lack of selectivity of the fishing gear, e.g. tonnes of bycatch might be generated in trawling (Alverson et al., 1994);
- iv.) Influencing trophic networks and ecological functions (McAllister & Spiller, 1994), e.g. removal of large amount of biomass at once could modify the trophic webs and nutrient cycles within the trawl swept area;
- v.) Damaging benthic habitat or decreasing habitat complexity (Watling & Norse, 1998). The seabed is an important habitat or home/shelter for many fish species and so any damage or degradation to the habitat might pose significant impact to the fish stocks, e.g. directly removing the coral from the trawl swept areas (Engel & Kvitek, 1998; Reed et al., 2007)

### **Benefits of a trawling ban to Hong Kong**

It is general believed that a well-managed fishery would not only result in significant economic benefit to fishing community but also societal benefit to a variety of sectors of society. Sumaila et al. (2007) examined and quantified the economic and social consequences of implementing different fishery management strategies in Hong Kong including a territory-wide trawl ban. The management scenario that included a territory-wide trawl ban in Hong Kong, combined with the ban on fishing within all local marine parks was estimated to contribute the highest net financial profit of about HK\$2.8 billion to society (Sumaila et al., 2007). In addition to the net economic benefit, modeling also suggested that a territory-wide trawl ban would be one of the most effective fishery management methods to restore the biomass of various fish groups (reef fishes, non-reef fishes and large pelagic fishes) and invertebrates within Hong Kong waters. Consequently, the long-term recovery of fish stocks brought about by a trawling ban might generate a net profit (as projected, it could increase by around HK\$450 million in 25-year timeframe) to small-scale fishery sector, in terms of catches and economic value. Small-scale fishermen are allowed to continue catching for reef fish, one of the most important catches for the small-scale fishing sectors in Hong Kong (personal observation).

### **Recommendations**

As mentioned before, a territory-wide trawl ban would give the marine environment a chance to restore itself to past levels of biological diversity, but it must be seen as one in a set of tools, without all of which the objective to 'restore Hong Kong's seabed and marine resources' cannot be accomplished. A number of scientific studies of the Hong Kong fishery have been conducted since the 1990s which proposed a series of fisheries management control and restoration measures (Pitcher et al., 1998; Willmott, 2000; Buchary et al., 2003; Cheung & Sadovy, 2004; Sumaila et al., 2007). To maximize the impact of a trawling ban, and thus achieve the objective of restoring Hong Kong's seabed and marine resources, BLOOM recommends that the government also consider the following:

- i.) Set up a fisheries licensing system (non-transferrable) which would allow better collection of fishing industry statistics, to limit and reduce intensive fishing efforts;
- ii.) Limit new entrants into the fishing industry;
- iii.) Regulate and monitor recreational fishing;
- iv.) Regulate fishing gear (both commercial and recreational) and the catch size, e.g. increase in mesh size to decrease the catch of juveniles which are sexually immature;
- v.) Implement daily catch quotas for fishing fleets;
- vi.) Set aside at least 10% of Hong Kong's waters as Marine Protected Areas (MPAs), as suggested by the Convention on Biological Diversity (CBD)
- vii.) Implement sustainable aquaculture practices, primarily reducing the use of fish feed;
- viii.) Reduce pollution (such as waste from shipping industry and discharge from industrial plants), which has taken a toll on marine (and human) life in recent years.

There are approximately 1,000 trawling vessels of an estimated 3,659 fishing vessels in Hong Kong (AFCD, 2011) To compensate trawl fishermen for the potential loss of earnings due to a ban on trawling activities, BLOOM Hong Kong recommends that the government:

- i.) Allocate funds to compensate fishermen with a trawler buy-out scheme;
- ii.) Provide an allowance to affected fishermen to alleviate livelihoods;
- iii.) Provide free training to help affected fishermen to shift to a 'new' livelihood.

The implementation of a territory-wide ban on trawling in Hong Kong's waters would have both short-term and long-term benefits to Hong Kong's fishing community, and the wider community, as depleted marine resources would be given the opportunity to recover.

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## ABOUT BLOOM HONG KONG

BLOOM Hong Kong is a registered charitable organization dedicated to marine conservation. Our mission is to protect vulnerable species and habitats (sharks and the deep sea), promote sustainable fisheries, and maintain small-scale fishermen's livelihoods.

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