

Status of the Invasive Lionfish (*Pterois volitans*) in Antigua and Barbuda

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for
INFOPECA / FAO / WECAFC Workshop on Lionfish and
Sea Cucumber
Havana, Cuba
April 29th and 30th, 2014



Background: Fisheries Sector

- ❖ The fisheries sector of Antigua and Barbuda is artisanal to small-scale.
- ❖ In 2011 there were 379 active fishing vessels.
- ❖ Ex-vessel value of capture production was US\$15.6 million (3,192 tonnes live wt.).
- ❖ The sector supported 950 active fishers in 2011 (about 2% of the national labour force).
- ❖ More significantly, the fisheries sector acts as a “**safety-net**” for other economic activities (e.g., tourism and construction).



Fishery Resources of Antigua and Barbuda



Major fishery resources include:

- ❖ Spiny Lobster
- ❖ Queen Conch
- ❖ Shallow Shelf and Reef Fishes
- ❖ Deep Slope Fishes (Snappers & Groupers)
- ❖ Coastal Pelagics
- ❖ Large Pelagics



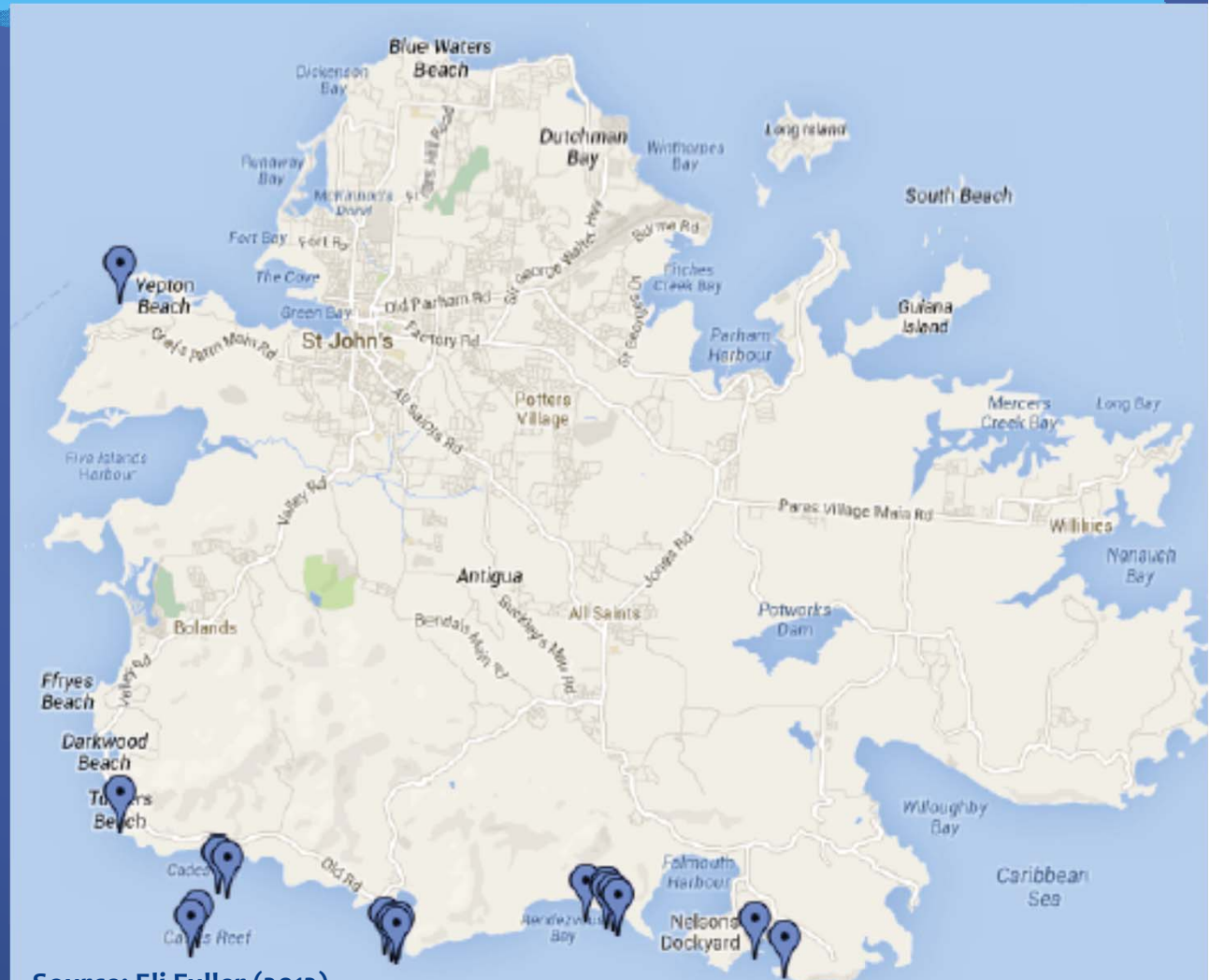
History: Lionfish Invasion

- ❖ First confirmed sighting of the Indo-Pacific Lionfish in Antigua was recorded April 28, 2011.
- ❖ Two months prior, a fisherman had reported spotting a lionfish in his net on the SE coast of Antigua.
- ❖ In October 2011, the lionfish presence in Barbuda (48 km N of Antigua) was confirmed by marine biologist, John Mussington.
- ❖ A no. of the reported sightings prior to April 2011 had turned out to be the native Spotted Scorpionfish (*S. plumieri*).



Antigua Conservation Society (ACS): Reported Lionfish Sightings in 2012

- ❖ Reported sighting by local environmental NGO (ACS) and dive shops was consistent with landings of lionfish by fishers.
- ❖ S coast of Antigua was the original “hot spot”.
- ❖ Since then lionfish is established in all waters of Antigua and Barbuda.
- ❖ Maximum recorded depth for Lionfish to-date was 540 ft.



Source: Eli Fuller (2012)

Actions Taken

- ❖ The utilisation of Lionfish, whether sold as food or used as bait (chum), by fishers is possibly the best strategy to-date.
- ❖ This is complemented by Lionfish hunts organised by the Antigua Conservation Society, Fisheries Division, local dive shops and fishers.
- ❖ Fisheries catch and effort and biological programmes began in 2012 for the Lionfish.
- ❖ A Draft NPOA-Lionfish is being developed with stakeholders.



Way Forward

- ❖ Draft NPOA-Lionfish needs to be finalised.
- ❖ Catch and effort programme needs to be updated to properly account for zero-catch trips; in 2013 Lionfish accounted for about 6% of finfish composition in traps for non-zero catch trips.
- ❖ The ciguatera (CFP) risk assessment in Lionfish from Antigua and Barbuda waters needs to be conducted; Antigua and Barbuda has a relatively high number of CFP cases per annum.
- ❖ Greater marketing of Lionfish hunts as an eco-tourism activity (i.e., greater ecosystem services).
- ❖ Harmonise the national strategies with the regional strategies for control of Lionfish.

