The objective of this project is to provide two types of input required for a stock assessment of blue marlin *Makaira nigricans* in the Hawaii-based pelagic longline fishery. These inputs are a corrected catch history and catch-per-unit-effort (i.e., CPUE=catch per 1000 hooks) standardizations to be used as indices of relative abundance. The reason for pursuing this objective is that standardized CPUE generally yields a more accurate understanding of population status than nominal catch rates.
Additional “duties as assigned” included two sets of tasks. The first resulted from being selected to serve as a member of the ISC SHARKWG (Sharks Working Group). This necessitated attendance at data preparation meetings held in advance of stock assessments and submission of working papers (see below). The other set of tasks entailed preparation of draft web pages for blue marlin and several other species of interest to the ISC Billfish and Shark Working Groups (BILLWG: swordfish *Xiphias gladius*, blue marlin *Makaira nigricans*, and striped marlin *Kajikia audax*; SHARKWG: blue shark *Prionace glauca* and shortfin mako *Isurus oxyrinchus*). The web pages were prepared in the form of working papers; the billfishes abstracts are included at the end of this report.

The principal departures from planned activities during FY2012 consisted of the web page development work described above and a series of CPUE standardizations for oceanic whitetip shark *Carcharhinus longimanus* conducted in collaboration with Jon K.T. Brodziak, Ph.D., of the Pacific Islands Fisheries Science Center. These analyses represent continuations and enhancements of work begun in April 2011 in New Caledonia at the Secretariat of the Pacific Community, Oceanic Fisheries Programme.

**PLANS FOR THE NEXT FISCAL YEAR** *(One paragraph)*:

The blue marlin work is likely to be completed within about 1–2 months of this writing. This schedule should allow adequate time for review and revision of the WP should the BILLWG Chairman (JKTB) or NOAA sponsor (GTD) so desire.

**LIST OF PAPERS PUBLISHED IN REFERRED JOURNALS DURING FY 2012 OTHER PAPERS, TECHNICAL REPORTS, ETC.**

**PUBLICATION COUNT**

*complete excel attachment (*JIMAR publications request*)


GRADUATES:
Names of students graduating with MS or PhD degrees during FY 2012; Titles of their Thesis or Dissertation

None

AWARDS:
Name of JIMAR employees or project receiving award during the period, and Name of award

None

PERSONNEL (on Subcontracts):
For projects that awarded subcontracts in the fiscal year, please provide the number of supported postdocs and students from each subgrantee.

None

IMAGES AND CAPTIONS:
We will also be including images for the annual report. Please send two of your best high-resolution, color images (photo, graphic, schematic) as a JPEG or TIFF (300 dpi) with a caption for each image. If you do not have an electronic version of the image, a hardcopy version may be dropped off at the JIMAR office located in the Marine Sciences Building, Room 312

- Caption 1: Figure 1. Blue shark indices of relative abundance in the deep- and shallow-set sectors of the Hawaii-based longline fishery as estimated from generalized linear model (GLM) analyses.

- Caption 2: Figure 2. Blue marlin catches and CPUE in the Hawaii- (red) and American Samoa-based (blue) longline fisheries in 2001–2010.
ACRONYMS:
*Please provide the complete descriptions for any acronyms used in any areas of the report. For example: UH (University of Hawaii)*

ISC: International Scientific Committee for Tunas and Tuna-like Species in the North Pacific Ocean

BILLWG: ISC Billfish Working Group (responsible for swordfish and marlins)

SHARKWG: ISC Shark Working Group

NOAA: National Oceanic and Atmospheric Administration
Draft Web Page for the ISC Billfish Working Group

1William Walsh and 2Jon Brodziak

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2NOAA Fisheries
Pacific Islands Fisheries Science Center
Honolulu, HI 96822, USA

Abstract
This working paper describes the proposed structure for the web page being developed for the Billfish Working Group of the International Scientific Committee on Tuna and Tuna-Like Species in the North Pacific. The species of interest for this working paper is swordfish, with emphasis on the two North Pacific swordfish stocks. Similar sets of information are being developed for the North Pacific striped marlin and blue marlin stocks.
Draft Web Page for the ISC Billfish Working Group

William Walsh\(^1\) and Jon Brodziak\(^2\)

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Abstract

This working paper describes the proposed structure for the web page being developed for the Billfish Working Group of the International Scientific Committee on Tuna and Tuna-Like Species in the North Pacific. The species of interest for this working paper is blue marlin, which is believed to comprise a single stock in the Pacific Ocean. Similar sets of information are being developed for the North Pacific striped marlin and swordfish stocks.
Draft Web Page for the ISC Billfish Working Group

William Walsh¹ and Jon Brodziak²

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Abstract

This working paper describes the proposed structure for the web page being developed for the Billfish Working Group of the International Scientific Committee on Tuna and Tuna-Like Species in the North Pacific. The set of information presented in this working paper focuses on the Western and Central North Pacific striped marlin stock, which is one of the key species for the Working Group. Similar sets of information are being developed for the two North Pacific swordfish stocks and also for the Pacific blue marlin stock.
Figure 1. Blue shark indices of relative abundance in the deep- and shallow-set sectors of the Hawaii-based longline fishery as estimated from generalized linear model (GLM) analyses.
Figure 2. Blue marlin catches and CPUE in the Hawaii- (red) and American Samoa-based (blue) longline fisheries in 2001–2010.