Gulf of California Industrial Shrimp
Fishery Improvement Project

Archive Date: June 2017

A portion of the Gulf of California Industrial Shrimp FIP was transitioned from SFP to PROMARMEX in June 2017. PROMARMEX’s FIP is specific to their supply chain and is being implemented at the producer level. Other former FIP participants may also transition their portion of the work to a new FIP, which would also be considered a transition of the SFP FIP to industry. The following FIP report reflects the status of the FIP at the time of the transition. PROMARMEX’s FIP public report can be found at http://fisheryprogress.org/fip-profile/gulf-california-shrimp-bottom-trawl.

Species:
yellowleg shrimp (Farfantepenaeus californiensis)
Pacific blue shrimp (Litopenaeus stylirostris)
whiteleg shrimp (Litopenaeus vannamei)

FIP Scope/Scale: Stock and fishing gear (bottom-trawl) level

Fishery Location: Gulf of California, Mexico

![Map of Gulf of California industrial shrimp fishery area]

FIP Participants:
- Aqua Star (importer)
- Blessings Seafood
- Meridian Products (importer)
- PROMARMEX (Producers/processors)
- Amende & Schultz (importer)
- Santa Monica Seafood (distributor)
- Seattle Fish Company (distributor)
- Fortune Fish Company (distributor)
Other Partners/Stakeholders:
- Cámara Nacional de la Industria Pesquera y Acuícola (CANAINPESCA)
- Unión de Armadores del Pacífico
- Comisión Nacional de Acuacultura y Pesca (CONAPESCA)
- Instituto Nacional de la Pesca (INAPESCA)
- Sinaloa State Government
- Sonora State Government

Sustainability Information:
For sustainability information for this fishery on FishSource see:
Whiteleg shrimp – Sinaloa Gulf of California
Blue shrimp – Upper Gulf of California
Yellowleg shrimp – Central-South Sonora Gulf of California
Blue shrimp – Sinaloa Gulf of California
Blue shrimp – Central-South Sonora Gulf of California
Yellowleg shrimp – Sinaloa Gulf of California
Yellowleg shrimp – Upper Gulf of California
See also Seafood Watch of Monterey Bay Aquarium and Guide to Ocean Friendly Seafood of Blue Ocean Institute

Date Publicly Announced: 2009

FIP Stage: 4, FIP is delivering improvement in policies or practices

Current Improvement Recommendations:
• Start using bycatch reduction devices in advance of the 2016 deadline and monitor their impact on shrimp and bycatch capture rates.
• Establish third-party auditable control documents to verify compliance with the fishery regulations.
• Increase supply chain transparency and accountability by implementing traceability and vessel monitoring systems.

Background:
The Gulf of California is Mexico’s most productive fishing area, providing approximately 75 percent of Mexico’s total fish catch by volume, and accounting for a majority of the country’s seafood exports by value.

Its shrimp fishery is Mexico’s most important fishery, having the greatest economic value and averaging $260 million per year in landings. It is also the highest-ranked fishery in terms of number of vessels (711 bottom trawlers and about 16,000 small-scale vessels) and number of direct jobs (37,000 direct jobs and 75,000 indirect ones). The shrimp fishery in Mexico is the country’s third largest by volume with annual landings of approximately 40,000 tonnes during a season that begins in September and runs through March.

At the same time, the industrial shrimp fishery has been identified as the most ecologically damaging fishery in the Gulf of California. For decades, the use of antiquated gear and an increase in the number and the size of vessels
have exacted a heavy toll on the environment and Gulf of California marine habitats. Prior to the fleet reduction 8 years ago, it was estimated that high levels of bycatch had resulted in the wasteful discard of tens of thousands of tonnes of approximately 600 marine species.

Fortunately, in recent decades the Gulf of California industrial shrimp fishery has begun to implement major improvements toward achieving sustainability:

- The fleet reduction is by far the biggest change implemented. Thanks to the federal government’s buyout program begun in 2006, the fleet was reduced by 50 percent and today has the same number of vessels that it had in the 1970s (724).
- The shrimp fishing gear has also evolved significantly. All vessels in the fleet now use low-weight materials that have reduced their drag weight by 90 percent. Furthermore, the new fishery regulations require mandatory use of bycatch reduction devices (BRDs) by September 2016, establish a maximum net size, and require bigger mesh sizes to foster selective harvesting.
- Fishery administration and enforcement have also improved. All shrimp fishing vessels are now monitored 24/7 by the fisheries agency CONAPESCA through a vessel monitoring system (VMS).

Despite these significant advances, important issues remain to be resolved before the fishery can reach a level of sustainability that will satisfy the increasing market demands for responsible fishing. From the administrative perspective, compliance, regulatory enforcement, and transparency of reporting by the fisheries agency continue to be a challenge. From the environmental perspective, bycatch continues to be the primary issue, since current volume and composition of bycatch are unknown, and the fishery does not have an agreed strategy in place for managing bycatch.

During the last 3 years, the Gulf of California Industrial Shrimp FIP has focused on providing producers and their customers with the tools necessary to demonstrate and verify that their shrimp was produced in compliance with applicable regulations and provided training to interested companies on how to install, use, and maintain bycatch reduction technology on their shrimp fishing vessels.

*Market of GoC industrial shrimp*

The market for GoC industrial shrimp is the US (70%, primarily frozen in 5-pound blocks) and the domestic market (30%, fresh and frozen in 4-pound blocks).

*Beginning of the FIP*

In 2009, SFP invited to the GoC shrimp main importers to the US to start a dialogue on the fishery status and markets sustainability demands.

**FIP Objectives:**

- Promote the use of gear that diminish environmental impacts.
- Promote full compliance with fishery regulations.
- Implement traceability programs to Increase the producers' transparency and accountability.

**Progress Update:**

2012
January – March

A FIP roundtable was held in March during the International Boston Seafood Show with major importers, buyers and some producers participating. A workplan for the balance of 2012 was presented and the need verification of regulatory compliance was discussed.

Six companies have signed the FIP agreement with SFP and two of the importers will utilize the control documents.

All FIP importer participants were required, by October 15, 2012, to have signed a FIP agreement and have in place control documents or some other verifiable mechanism for documentation that vessels are complying with Mexican federal fishing regulations. Only importers that have complied with this requirement are listed as FIP participants. Discussions continue with importers and producers not signing FIP agreements or securing control documents.

July – September

In late August and early September 2012, Mexican fishing gear experts provided training to FIP participants’ suppliers on the installation, use, and maintenance of bycatch reduction devices and double footropes in preparation for the 2012–13 season. A report on the workshops can be found on this website.

A revised 2012–2013 workplan was developed, which stresses the importance of continued dialogue with CONAPESCA to try to reach agreement on regulatory enforcement and transparency of reporting.

October – December

SFP conducted a monitoring initiative on the Gulf of California no-take zones, registering 158 vessels presumably fishing in the no-take zones. CONAPESCA made publicly available the 2011 “Fishing in prohibited zone” reports generated by vessel monitoring systems (VMS). 295 vessels were reported.

CONAPESCA made publicly available the VMS track records for the Mexican Pacific coast industrial shrimp fleet.

CONAPESCA confirmed the development of the 5-fathom digital “geo-fence” to be incorporated in the vessel monitoring system.

2013

January – March

CONAPESCA made publicly available the 2012 “Fishing in prohibited zone” reports generated by vessel monitoring systems. 80 vessels were reported.

CONAPESCA made publicly available the 5-fathom “geo-fence” files.
The new shrimp fishery regulations, the Mexican Official Standard 002, were published for public consultation. The standard includes:
• Use of bycatch reduction devices
• Use of nets with 120-ft. float line (maximum length)
• Use of 2-inch (minimum mesh size) webbing throughout the net, except in the codend (1½-inch minimum mesh size)
• These requirements will be mandatory/enforceable for 3 years after publication of the new standard
• Optional use of a double lead line.

April – July

A proposal for increasing transparency and accessibility to the VMS data by vessel owners and buyers was presented by SFP to CONAPESCA under the public consultation process for the new fishery regulation.

On June 25, SAGARPA/CONAPESCA published in the Diario Oficial de la Federación (DOF, the Mexican official gazette) the answers to the proposals received during the public consultation. However, SFP’s comments and proposals were not addressed. An email to CONAPESCA and SAGARPA asked for the reasons for the omission, but no answer has been received.

On July 11, SAGARPA/CONAPESCA published in the DOF the new shrimp fishery regulation (NOM-002), which will become official on September 9, 2013, just in time for the beginning of the new season.

The published NOM-002 confirms the mandatory use of BRDs and the 120-ft maximum float line length for fishing gear, and establishes new minimum mesh sizes for the different net components (all of this will be enforceable and inspected 3 years after its publication).
It also includes an evaluation of conformity, which is an audit process to verify/demonstrate whether the shrimp from a specific company or vessel was produced in accordance with the fishery regulations.

The new NOM-002 annuls most of the no-take zones except for the following:
• The waters with 0–5 fathoms depth

A 5-nautical-mile buffer around the mouths of the following coastal lagoons:
• Bahía de Kino, Sonora
• Agiabampo, Sonora-Sinaloa
• Topolobampo, Sinaloa
• Agua Brava, Nayarit
• Coyuca, Guerrero
• Laguna Superior, Oaxaca
• Mar Muerto, Chiapas
• La Encrucijada, Chiapas

August – December

The Federal Office for Environmental Protection (PROFEPA) made public the results of their certification and inspection activities highlighting that:
• 1,077 vessels were inspected (including both Pacific and Gulf of Mexico coasts)

• 148 inspection campaigns were conducted to verify proper installations and use of turtle excluder devices (TEDs) have being conducted (52 at port and 96 at sea). Only one serious irregularity detected (closed TEDs)

A survey was conducted in the main fishing ports (Guaymas and Mazatlan) among crew members to understand the level of understanding of the new fishery regulations and the willingness for early adoption of bycatch reduction technology. The survey revealed that:

• 78% of the shrimp fishermen do not know there is a new Mexican Official Standard for the shrimp fishery

• 0% of the shrimp skippers are willing to use the bycatch reduction technology during this season.

A field trip to monitor shrimp vessel activities in the no-take zones was conducted on October 8 –11 in the Guaymas-Culiacan region. Of a total of 246 vessels detected, 72 vessels were presumably fishing in the no-take zones.

• MSC pre-assessment for the fishery was updated.

• Results of the report are the following:
For access to the full pre-assessment report please click here.

2014

January – April

• An audit protocol for the control document was developed and tested in agreement with Meridian Products and three company signatories of the control documents. In this initial trial, four vessels were audited and the corresponding reports, including observations, were delivered to the involved parties.

• The number of vessels with signed control document increased to 176, representing 25% of the Gulf of California fleet.

• During the 2014 Seafood Expo North America, a Gulf of California Suppliers Roundtable meeting was held, including an update on the FIP achievements and challenges. Special emphasis was on the need for further actions, including:
  o Request the update and publication of shrimp stock assessments
  o Request the formalization of the fishery management plan
  o Establish third-party auditable control documents
  o Implement the compliance verification protocol with your suppliers
  o Start a dialogue with producers and regulators on how to provide each company (or groups of companies) with VMS software to monitor and control, in real-time, their correspondent fleet
  o Develop and implement a plan for the early adoption of bycatch reduction technology and adherence to the limits on headrope and mesh sizes.

May – August

• The National Commission of Aquaculture and Fishing (CONAPESCA) organized and started to conduct the formal training program for the use of bycatch reduction devices (BRDs). The first workshop of the training program was held in Mazatlan where 400 fishermen attended. Detailed information can be found here.

• CONAPESCA published in the DOF a modification project for the Mexican Official Standard regulating the vessel monitoring systems. The project provides the license holders access to the track records of their correspondent vessels through a complementary system. This increases significantly the transparency and verification by third parties as considered in the control documents.

September – December
• The National Fisheries Institute made public the Gulf of California shrimp stocks assessments (link here).
• NOAA certified the Mexican program for the protection of sea turtles and the fleet’s use of turtle excluder devices (TEDs) (link here).
• CONAPESCA published the results of the VMS supervision of the fleet’s operations highlighting that only 12 violation reports on restricted areas where issued during 2014. This represents a substantial improvement in the restricted areas observance since 329 reports were issued in the 2011-12 period while 80 were issued in the 2012-13.
• PROFEPA also made public the results of their enforcement program on turtle excluder devices (TEDs):
  • 1,088 shrimp fishing vessels, 100% of the Mexican fleet (including Gulf of Mexico and Pacific Coast), were inspected and certified.
  • 231 vessels were inspected at sea.
  • 1 major violation was detected (closed TEDs) and sanctioned.

2015

January – March

• During January and February, FIP participants conducted bycatch reduction device (BRD) testing during commercial fishing activities; 45 vessels from different companies participated in the testing. Results indicate that there are no major challenges for the general adoption of BRD use in 2016, and 75 vessels (10% of the fleet) concluded the season using the BRDs during all of their fishing operations.

• During the Gulf of California Shrimp Suppliers Roundtable, the FIP participants made public the commitment of producers and government to implement a national training program for the proper adoption of the BRDs.

April – June

• Forty audits were conducted on vessels with control documents. Audit reports were provided to vessel owners and buyers. No major issues where detected and for those minor instances of non-compliance, corrective action plans were suggested to boat owners.

July – September

• CONAPESCA, INAPESCA, producers associations, and companies participating in the FIP organized and conducted a training program for the whole Mexican shrimp fleet, including both Gulf of Mexico and Pacific coast. In accordance with the March supplier roundtable meeting commitment, the training included reinforcement of TED use and maintenance, as well as BRD installation, use, and maintenance.

• FIP participants reported that 50% of the fleet were using BRDs during the 2015 season.

• The VMS regulatory framework was amended, allowing the boat owners to acquiring the VMS platform software to monitor their own vessels’ operations as recommended by the FIP. Now each boat owner is capable of monitoring their vessel’s operations in real time.

• Currently, 475 vessels (65% of the fleet) are being monitored by their owners with the system.
• Several discussions were conducted with boat operators, first-tier suppliers, and traceability service providers. The FIP participants ultimately decided to implement the Pelagic Data Systems package, which is totally autonomous to the boat and crew and which can store and report with only seconds of delay not only the vessel location and activity but also cold storage and brine tank temperatures (relevant to industry for quality assurance). The system is linkable to the first-tier suppliers’ traceability platforms.

• Mexican experts on bycatch mitigation and shipbuilders participated in the assessment of the modifications required to install shrimp hoppers onboard commercial shrimp vessels in the Gulf of California. Results indicate that major modifications would be required on the operations decks. In addition to incurring additional costs for the equipment and modifications, the modifications could result in major impacts on the vessels’ stability and security.

• An extensive review of published reports on the benefits of the use of shrimp hoppers was conducted, resulting in no conclusive evidence of positive impact on (survival of) bycatch returned alive from using the hoppers.

2016

• In February, the NOAA mission certified the TED program of the Mexican shrimp fleet as comparable to that implemented in the US (link here).

• In July, CONAPESCA and the fishing industry announced the final stages of the training program for the installation, use, and maintenance of BRDs in the shrimp fishing activities using bottom-trawl gear. This training program is in preparation for the mandatory use of the devices in all of the commercial shrimp fishing activities, starting in September 2016.

• CONAPESCA announced an onboard observers program for the industrial shrimp fishery to be implemented in the coming season, which starts in the third quarter of 2016. The FIP participants requested this program from the fisheries authorities after the Gulf of California Shrimp SR meeting conducted in March 2015.

2017

• A portion of the Gulf of California Industrial Shrimp FIP was transitioned from SFP to PROMARMEX in June 2017. PROMARMEX’s FIP is specific to their supply chain and is being implemented at the producer level. Other former FIP participants may also transition their portion of the work to a new FIP, which would also be considered a transition of the SFP FIP to industry. PROMARMEX’s FIP public report can be found at http://fisheryprogress.org/fip-profile/gulf-california-shrimp-bottom-trawl.