18 | Harvest Strategy in development

**WCPO Skipjack Tuna**

**Management Objectives:**

**Interim Objective:**
- The spawning biomass of skipjack tuna is to be maintained on average at a level consistent with the interim target reference point of 50% of the spawning biomass in the absence of fishing.

**Draft performance indicators:**
- Maintain skipjack, yellowfin, and bigeye biomass at or above levels that provide fishery sustainability throughout their range.
- Be above limit reference point (proposed: with an >80% probability).
- Rebuild stock to the average SB/SB_{F=0} in selected reference period, a proxy for the target reference point.
- Maximise economic yield from the fishery (average expected catch, and relative to a reference period).
- Maintain acceptable catch per unit effort for purse seines (relative to a reference period).
- Catch stability.
- Stability and continuity of market supply (effort variation relative to a reference period).
- Stability and continuity of market supply (probability of and deviation from SB/SB_{F=0}>50%)

**Reference Points:**

- **Interim Limit Reference Point:** 20%SB_{F=0}
- **Interim Target Reference Point:** 50%SB_{F=0}

*SB_{F=0} = spawning stock size that would exist in the absence of fishing*

**Candidate Harvest Strategies:**

Using MSE to evaluate several model-based harvest strategies with threshold (i.e., hockey stick), stepped and asymptotic harvest control rules; HS must have <20% chance of breaching the limit reference point.

**Progress Update & Workplan:**

Evaluation of candidate harvest strategies underway via MSE

- **2020-21:** Refine and further develop MSE and candidate harvest strategies
- **2022:** Adopt final harvest strategy

**Link to relevant policy document or update:**

- **WCPFC Harvest Strategies:** [https://www.wcpfc.int/harvest-strategy](https://www.wcpfc.int/harvest-strategy) Navigate to ‘Skipjack tuna in the WCPO’ to read an overview of the current work going towards the harvest strategy.
- **Performance Indicators and Management Procedures Explorer (PIMPLE):** [https://pimple.shinyapps.io/pimple/](https://pimple.shinyapps.io/pimple/) A shiny app where a user can explore and compare the performance of alternative candidate harvest strategies.