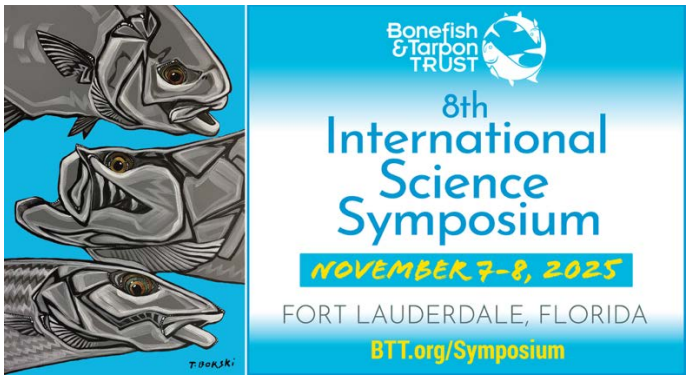


A best catch approach to transform data-poor fisheries

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By harnessing local ecological knowledge through structured surveys, a 'best catch' provides a cost-effective, standardized way to generate robust, management-relevant data in data-poor systems—enabling informed conservation and policy decisions where population estimates are absent and traditional stock assessments are not feasible. A Best Catch Assessment leverages local angler and fishing guide knowledge approach in a standardized, quantitative protocol to assess the status and trends of flats fisheries. The approach involves anglers recounting their most successful catches over time, and emphasizes diverse respondent sampling, and community validation through workshops. The approach was applied to bonefish in South Florida to reconstruct a 60-year trajectory of population trends (via "shots" at bonefish) and fish size across regions. Findings revealed that bonefish abundance peaked in the mid 1980s, experienced a significant decline through 2010, and has shown signs of steady recovery since—though the population now appears dominated by smaller individuals. Overall, this standardized and quantitative assessment approach effectively integrates local ecological knowledge into fisheries monitoring, ensuring robust, inclusive, and data-driven management decisions for data-poor fisheries, including the flats fisheries.

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