

# GLFC – Lake Ontario Sturgeon Restoration Plan



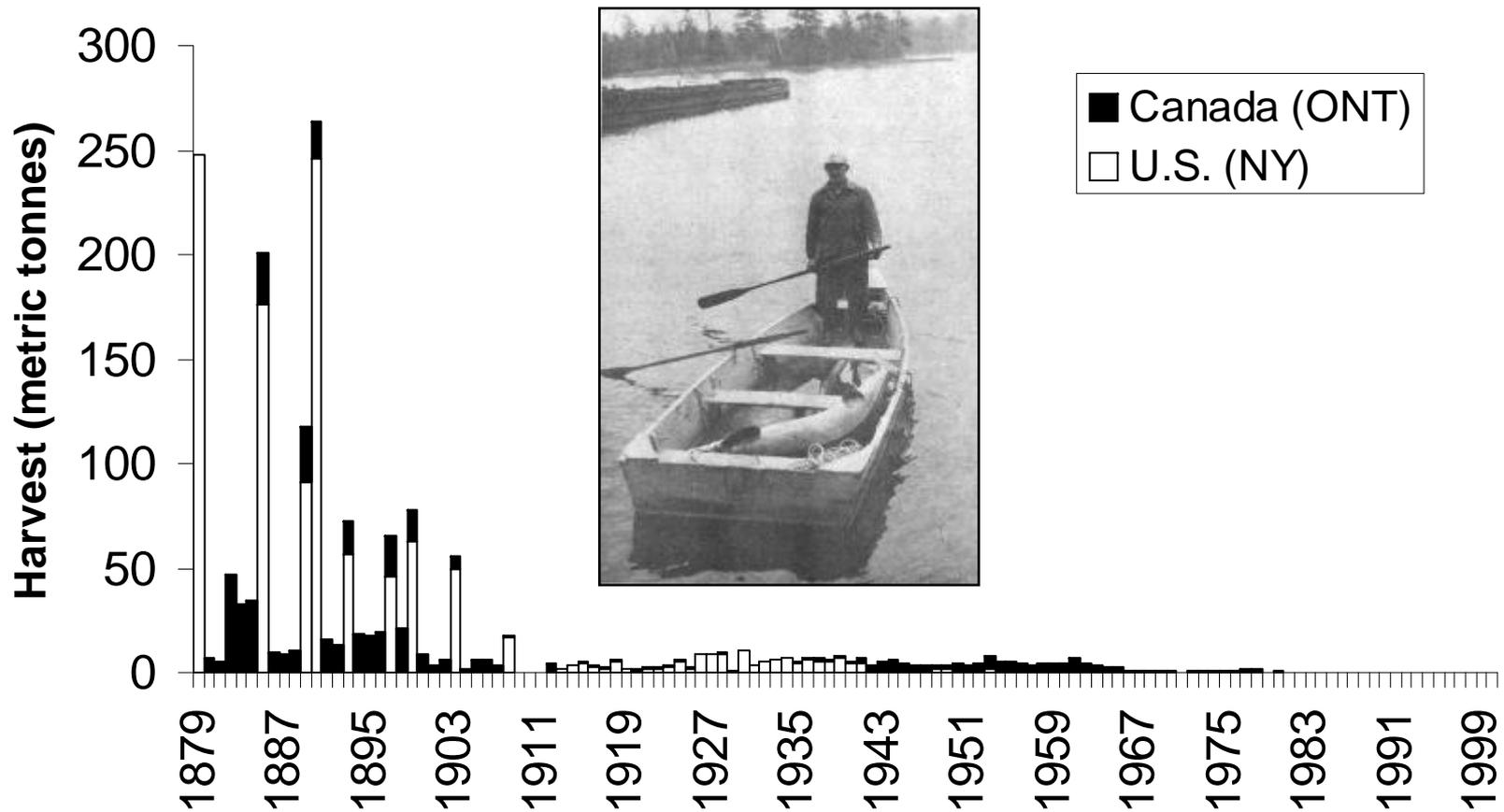
Presentation to 2008 GREAT LAKES LAKE  
STURGEON COORDINATION MEETING

December, 2008

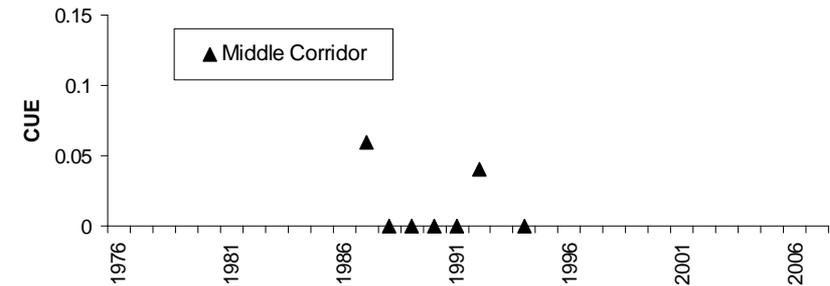
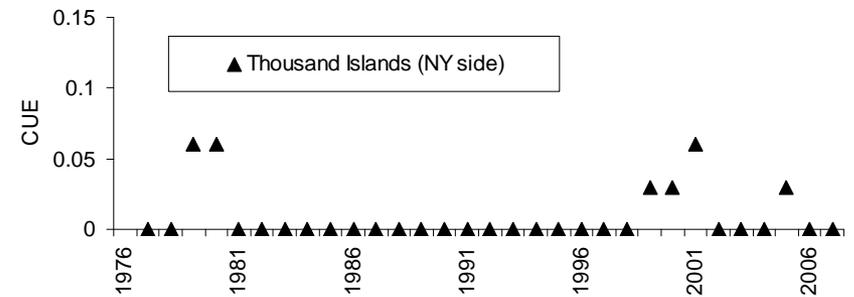
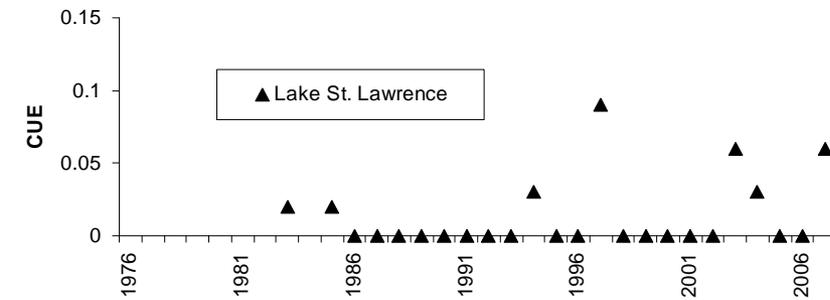
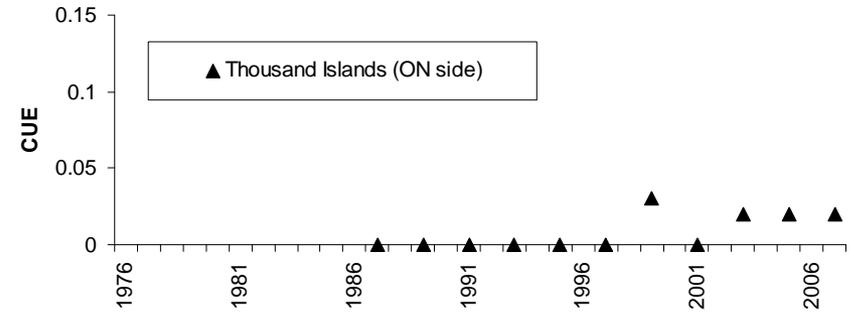
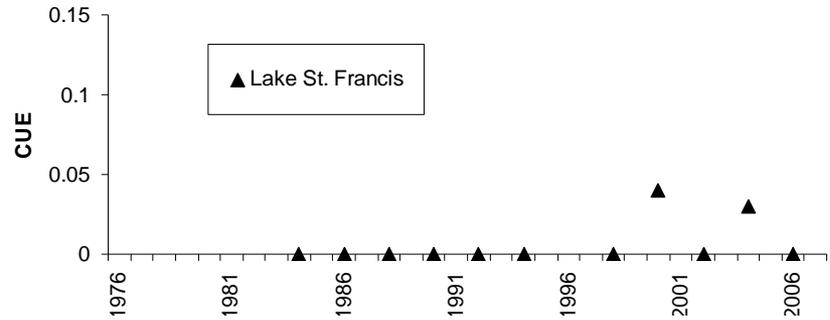
# Why do we need a plan?

- Decline of sturgeon populations
- Ontario, Canadian and New York State Species at Risk Act
- Coordinate activity around the lake
  - Management agencies include:
    - USA: USFWS, USGS, NYSDEC
    - Canada: DFO, Quebec MRNF, OMNR
- Get research priorities onto the GLFC list
- Focus more attention (and funding) on sturgeon

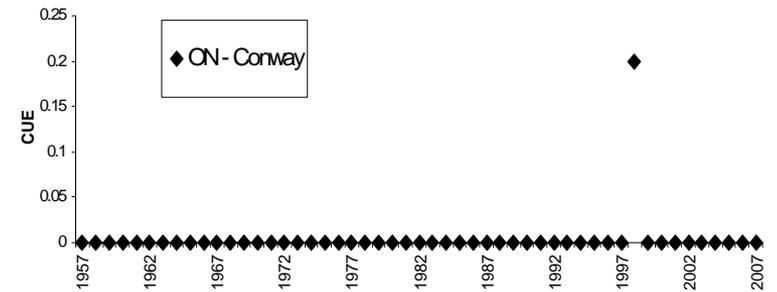
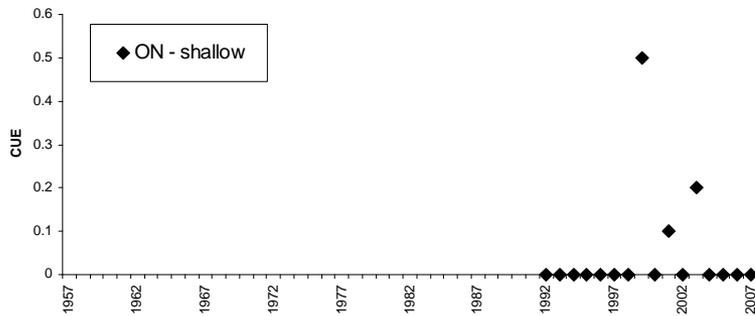
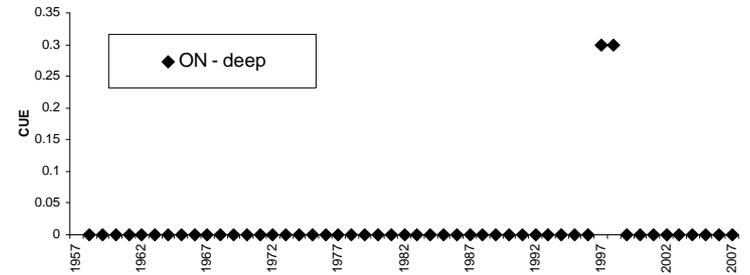
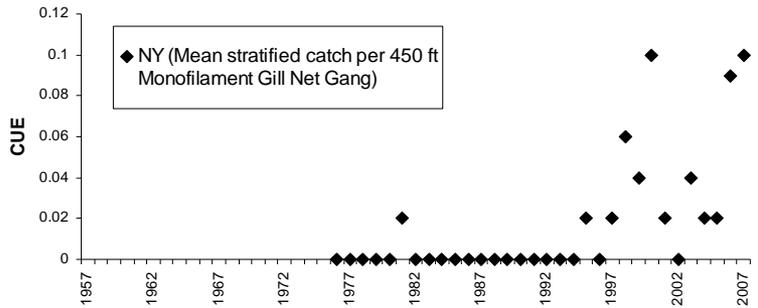
# Commercial harvest of sturgeon in Lake Ontario and upper St. Lawrence River



# Sturgeon catch in St. Lawrence River



# Sturgeon catch in eastern Lake Ontario



# A LAKE STURGEON REHABILITATION PLAN FOR LAKE ONTARIO, THE LOWER NIAGARA RIVER AND THE UPPER ST. LAWRENCE RIVER

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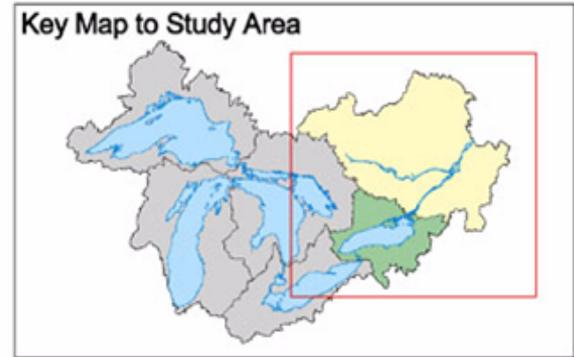
- Introduction (including geographic scope of plan)
- Background, and Current Status
  - Population structure
  - Abundance
  - Conservation Status
- Guiding principles
- Recovery Goals
  - Spawning population-level goals
- Management Practices, Issues and Strategies
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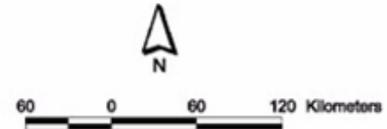
# Geographic scope of plan

- **“Lake Ontario system”** is defined as:
  - the waters of Lake Ontario,
  - the Niagara River below Niagara Falls
  - the St. Lawrence River above the Beauharnois Power Dam
  - includes tributaries to this system that may have provided important sturgeon habitat in the past, but now have barriers to sturgeon migration (i.e. up to the first natural barrier).

# Lake Ontario - St. Lawrence River Drainage Basin



- Legend**
- Cities
  - - - International Border
  - St. Lawrence River Drainage Basin
  - Lake Ontario Drainage Basin



# Goals:

- Conservation, rehabilitation and re-establishment of self-sustaining populations of lake sturgeon in the Lake Ontario system.

## Indicators:

- Increased catches of lake sturgeon in assessment netting programs.
- Removal of sturgeon from N.Y., Ontario and federal Endangered Species legislations.

## Strategies:

- Conserve or rehabilitate at least 4 additional lake sturgeon spawning populations (list spawning locations after consultation with LOTC team)
- Where populations have been extirpated, re-establish at least 4 lake sturgeon populations when possible to their known former range (list spawning locations after consultation with LOTC team)

# Stocking and Genetics

- All stocked fish should be marked – possibly with PIT tags
- Fish for stocking should come from source stocks that are as similar genetically as possible (St. Lawrence River stocks)
- Need to state how we are doing relative to the recommended GLFC guidelines with rationale for our approach

# Contaminants and Fish Diseases

- Dead sturgeon have been associated with Botulism type E outbreaks in the Lower Great Lakes
  - Will botulism have a strong influence on sturgeon abundance?
  - If so, what can be done about it?
- Risk of VHS transfer may limit opportunities for fish culture

# Assessment, Research and Management Needs

- Study of spawning populations:
  - Historic importance
  - Genetics
  - Habitat evaluation
  - Issue identification
- Identify nursery habitats
- Abundance estimates for mixed populations

# Process

- Discussion and agreement on details within GLFC - Lake Ontario Technical Committee
  - Broader scale internal review by agencies
- Presentation to GLFC Lake Ontario Committee meeting March 2009
- Distribution to stakeholders for comment
- Finalization of plan at March 2010 GLFC Lake Ontario Committee meeting?

# Thanks for your attention!

➤ Suggestions?

