New Bedford Harbor Superfund Site – Unanticipated Shipwreck Discovery

Marine Archaeological Documentation and Assessment
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Project Location & 1999 Cultural Resources Survey

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**Figure 7.** Excerpted plot of contoured 1959 magnetometer survey data (i.e., the black contours superimposed onto the MASSGIS 2003 aerial photograph of New Bedford’s Upper Harbor) relative to the location of the unanticipated shipwreck discovery and the 2008 supplemental marine archaeological remote sensing survey area (i.e., the red-lined polygon). Note the absence of any significant magnetic anomalies at the unanticipated shipwreck discovery’s location (after Cox, Jr. 2000).
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Dredging and Debris Removal
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- Timbers encountered and recovered July 2009
- Examined by USACE-NAE, MBUAR, and Fathom Research archaeologists
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- Timbers recovered in July 2009 included:
  - Keel
  - Frames (“ribs”)
  - Exterior hull planking fragments
- Timbers appeared to be from a sailing vessel dating from the late 1700s to early 1800s
- Timbers were charred – clue that ship had burned – possibly linked with 1778 British attack on New Bedford and Acushnet when 30 to 70 ships were reportedly burned
- Fathom Research of New Bedford hired to document and assess shipwreck remains and site
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• **Step 1**: ship find area surveyed with magnetometer, side scan sonar and sub-bottom profiler

• Additional wreckage found; required removal and documentation
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- **Step 2**: recover additional ship timbers from find area under supervision of archaeologist; keep timbers wet until documentation
Step 3: document ship’s timbers and conduct archival research to attempt to identify vessel’s name and assess its historical significance
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• **Hull timbers:** 45 timbers (i.e., 5 keel fragments, 1 sternpost, 1 stem, 15 floors, 10 large planking fragments, 3 cant frames, 9 futtocks, and 1 miscellaneous timber)

• **Artifacts:** 1 intact hearth brick; 25 brick fragments (two of which were intrusive, the remainder of which were hearth bricks), two vegetable-fiber rope fragments, broken base of a glass case-bottle, iron barrel hoop, a wooden bucket base fragment, two wooden barrel base fragments, a wooden box panel fragment, a square-in-section piece of wood stock, and leather shoe sole (possibly intrusive)
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- Macro/microscopic Analyses of Hull Timbers:
  - All “Old Growth” compass timbers consisting of oak and hickory
  - Indicated earlier (1700s) date and southern New England to Middle Atlantic origin
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- Saw marks, hull shape and size, use of “old growth” wood, compass timbers, and faceted, hand-cut tree-nails all pointed to a late 18th century date for the shipwreck.

- Use of White Oak and Hickory indicates vessel was built somewhere between southern New England and the Middle Atlantic region.

- Vessel’s hull shape (full vs. fine or narrow) is suggestive of a merchant ship designed to have increased cargo capacity.
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• 3-D digital modeling from 2-D drawings:
  • Enabled virtual reconstruction of vessel’s disarticulated remains
So, what ship was it?

Archival research to date has not been able to identify the name of the ship; however, archaeological research indicates that the NBHSS shipwreck appears to be that of an abandoned 70 ft long, 100-ton merchantman sloop or schooner used in the inter-colonial/West Indies trades (evidence of wooden hull sheathing indicates usage in southern/tropical waters).