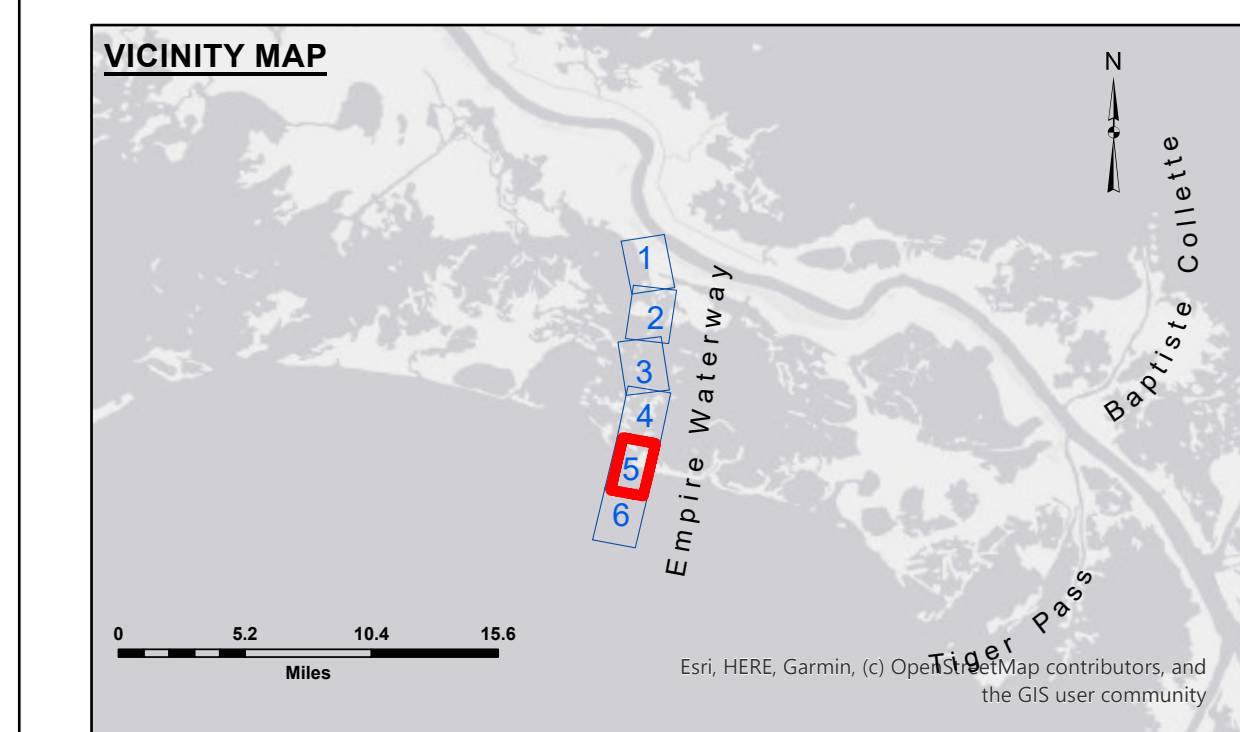
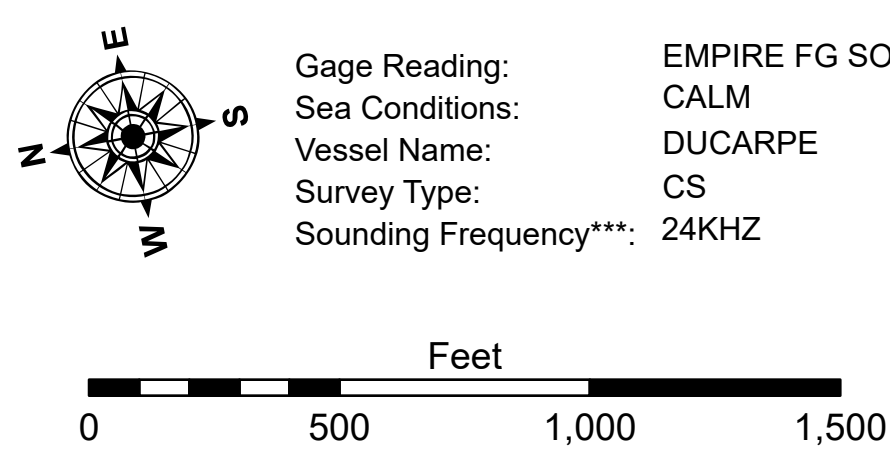




LEGEND

--- Federal Navigation Channel	Cable Area	Borrow Area	
— Federal Navigation Center Line	Placement Area	Shoalest Sounding**	-9' and above
As-built Pipeline/Cable	Anchorage Area	Beacon, General	-9' and below
..... Unconfirmed Pipeline/Cable	Obstruction Point	Red Navigation Buoy	
— Project Depth Contour	Wrecks-Submerged	Green Navigation Buoy	



NOTES:
Horizontal Coordinate System:
North American Datum of 1983 (NAD83), projected to the State Plane
Coordinate System (SPCS), Louisiana South Zone. Distance units in U.S. Survey Feet.

VD88 Datum:
Soundings are shown in feet and indicate depths below North American Vertical Datum
of 1988 (NAVVD88).

The location of navigation aids are base on and provided by the U.S. Coast Guard.

2019 Aerial Photography data source: NAIP. 1998 DOQQ imagery
shown in green from USGS.

Reference is N.O.A.A. Navigation Chart No. 11358 and 11364.

*** Shoalest Sounding per Quarter per Reach.

*** Highest Frequency (200 kHz) survey data represents the first signal return at a sounding
location and will include suspended solids, known as "fluff", if present. Low frequency (2
survey data normally penetrates through this "fluff" layer to depict elevations of consolidated
material. Low frequency accuracies may vary depending on channel conditions and bathymetric
settings.

[illegible]

U.S. ARMY MEDICAL DEPARTMENT ENGINEERS		Surveyed By: P.M.L.T. _____
Submitted: _____		
Recommended: _____	Chief, Survey Section	Plotted By: J.H. _____
Approved: _____	Chief, Waterways Maintenance Section	Checked By: J.H. _____

EMPIRE WATERWAY
EMPIRE BAR
EM_05_BAR_20250807_CS
07 August 2025

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Reference
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5 of 6