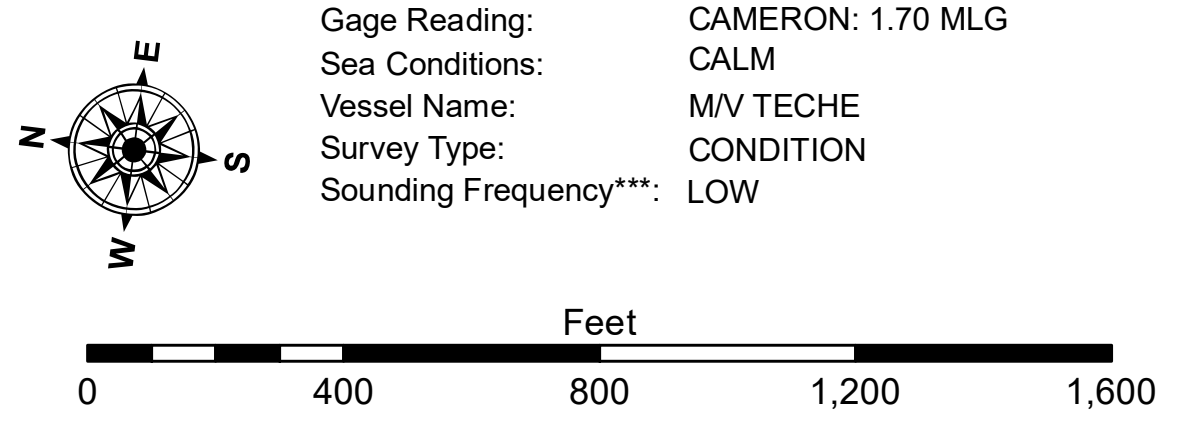


**LEGEND**

--- Federal Navigation Channel	● Cable Area	3 Fluff Thickness (feet)*	■ -15' and above
— Federal Navigation Center Line	□ Placement Area	● Shoalest Sounding**	■ -15' to -20'
— As-built Pipeline/Cable	□ Anchorage Area	★ Beacon, General	■ -20' to -25'
..... Unconfirmed Pipeline/Cable	⊗ Obstruction Point	◆ Red Navigation Buoy	■ -25' to -32'
— Project Depth Contour	✈ Wrecks-Submerged	◆ Green Navigation Buoy	■ -32' to -38'
			■ -38' to -40'
			■ -40' to -42'
			■ -42' and below



**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.

Vertical Datum: CAMERON: 1.70 MLG  
 Sea Conditions: CALM  
 Vessel Name: M/V TECHE  
 Survey Type: CONDITION  
 Sounding Frequency\*\*\*: LOW

Distances on the Calcasieu River are shown at 1 mile intervals.

The location of navigation aids are based on and provided by the U.S. Coast Guard and USACE survey crews.

2015 Aerial Photography data source: NAIP  
 Reference is N.O.A.A. Navigation Chart No. 11339.

\* Difference between high and low frequency elevations where greater than 1.0'.  
 \*\* Shoalest Sounding per Quarter per Reach.  
 \*\*\* High 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 (20 kHz) survey data normally penetrates through this "fluff" layer to depict elevations of consolidated bottom material. Low frequency accuracies may vary depending on channel conditions and fathometer settings.



**DISCLAIMER**

Accession: The United States Government furnishes these data and the recipient accepts and uses them with the express understanding that the United States Government makes no warranty, expressed or implied, concerning the accuracy, completeness, reliability, usability or suitability for any particular purpose of the information furnished. The user is responsible for the results obtained from the use of this information. The user is responsible for the results obtained from the use of this information. The user is responsible for the results obtained from the use of this information.

The information depicted on this map represents the results of a survey conducted on or about the date shown in the title block. It is not intended to represent the general condition existing at that time.

Submitted:	Surveyed By: SR, JH
Recommended:	Plotted By: BD
Approved:	Checked By: AC

U.S. ARMY CORPS OF ENGINEERS  
NEW ORLEANS DISTRICT

**CALCASIEU SHIP CHANNEL**  
**BAR SHEET 31**  
**CR\_31\_BAR\_20180123\_CS**  
**23 January 2018**

**Sheet Reference Number**  
**31 of 53**