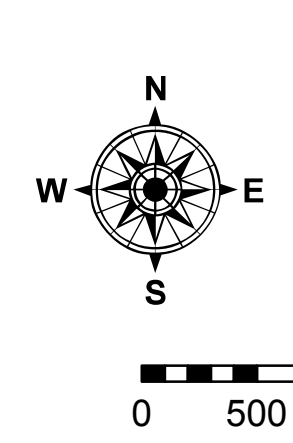
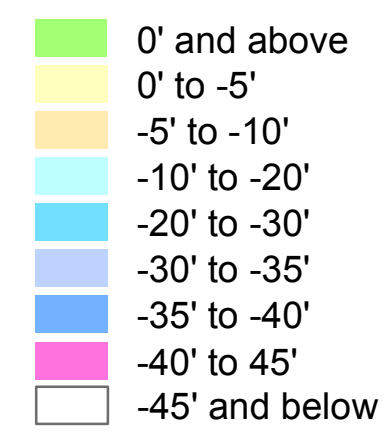


LEGEND	
--- Federal Navigation Channel	○ Cable Area
— Federal Navigation Center Line	□ Placement Area
— As-built Pipeline/Cable	□ Anchorage Area
..... Unconfirmed Pipeline/Cable	⊗ Obstruction Point
— Project Depth Contour	★ Wrecks-Submerged
□ Borrow Area	★ Beacon, General
● Shoalest Sounding**	♦ Red Navigation Buoy
★ Beacon, General	♦ Green Navigation Buoy



LWRP: 1.4
 Gage Reading: BR:8.9 DON:5.1 USED:5.1 NAVD
 Sea Conditions: SMOOTH
 Vessel Name: OB189
 Survey Type: AD
 Sounding Frequency***: HIGH

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:
 Soundings are shown in feet and indicate depths below Low Water Reference Plane 2007 (NAVD).
 Distances on the Mississippi River, above and below Head of Passes are shown at 1 mile intervals.
 The location of navigation aids are based on and provided by the U.S. Coast Guard and USACE crew.
 2015 Aerial Photography data source: NAIP, USDA-FSA-APFO Aerial Photography Field Office.
 Reference is N.O.A. Navigation Chart No. 11370.
 ** 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 bathymeter settings.



Access/Availability: The data represents the results of data collection/processing for a specific US Army Corps of Engineers project and is only valid for its intended use, content, time and accuracy specifications. The user is responsible for the results and accuracy of the data for other than its intended purpose.
Data Accuracy: Hydrographic survey data is subject to change rapidly due to several factors including but not limited to dredging, sedimentation, and other natural processes. The Corps of Engineers does not warrant the accuracy of the data for other than its intended purpose.
 The information depicted on this map represents the results of a survey conducted on the date of the survey. It is not intended to represent the general condition existing at that time.

Submitted:	Checked By: JHT
Recommended: Chief, Survey Section	Checked By: JHT
Approved: Chief, Waterways Maintenance Section	

MISSISSIPPI RIVER - B. R. TO GULF
SMOKE BEND CROSSING
MD_22_SMB_20211130_AD
30 November 2021

Sheet Reference Number
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