Offshore mineral leasing areas and blocks indicated in red from Bureau of Land Management data furnished to July 1974.

NOTE A

Navigation regulations are published in Chapter 2, U.S. Coast Pilot 5, or weekly Notice to Mariners which include new or revised regulations. Information concerning the regulations may be obtained at the Office of the District Engineer, Corps of Engineers in Galveston, Texas.

Anchorage regulations may be obtained at the Office of the Commander, 8th Coast Guard District in New Orleans, La.

Refer to section numbers shown with area designation.

WARNING

The prudent mariner will not rely solely on any single aid to navigation, particularly on floating aids. See U.S. Coast Guard Light List and U.S. Coast Pilot for details.

NOAA — NATIONAL OCEAN SURVEY

UNITED STATES — GULF COAST

GALVESTON TO RIO GRANDE

SOUNDINGS IN FATHOMS AT MEAN LOW WATER

(For offshore navigation only)

Floating Aids to Navigation inside the sea buoys are not shown on this chart.

See 1:80,000 scale series and large scale harbor charts for aids marking maintained channels.

Mercator Projection
Scale 1:60,732 at Lat. 28°

ABBREVIATIONS (For complete list of Symbols and Abbreviations, see Chart No. 1)

Lights (Lights are white unless otherwise indicated.)

F. fixed	Mo. (A) morse code	OBSC. obscured	Rot. rotating
Fl. flashing	Occ. occulting	WHIS. whistle	SEC. sector
Qk. quick	Alt. alternating	DIA. diaphone	m. minutes
Gp. group	I. Qk. interrupted quick	M. nautical miles	sec. seconds
E. Int. equal interval			

Buoys: T.B. temporary buoy; N. nun; B. black; Or. orange; W. white; C. can; S. spar; R. red; G. green; Y. yellow

Bottom characteristics:

Cl. clay	M. mud	hrd. hard	bk. black	gy. gray
Co. coral	Rk. rock	rky. rocky	br. brown	rd. red
G. gravel	S. sand	sft. soft	bu. blue	wh. white
Grs. grass	Sh. shells	stk. sticky	gn. green	yl. yellow

(2) Wreck, rock, obstruction, or shoal swept clear to the depth indicated.
(2) Rocks that cover and uncover, with heights in feet above datum of soundings.

AERO aeronautical; R. Bn. radiobeacon; C. G. Coast Guard station
Bn. daybeacon; R. TR. radio tower; D.F.S. distance finding station
AUTH. authorized; Obstr. obstruction; P.A. position approximate; E.D. existence doubtful

HEIGHTS

Heights in feet above Mean High Water.

AUTHORITIES

Hydrography and topography by the National Ocean Survey (formerly the Coast and Geodetic Survey) with additional data from the Corps of Engineers and U.S. Coast Guard.

CAUTION

Temporary changes or defects in aids to navigation are not indicated on this chart. See Notice to Mariners.

AIDS TO NAVIGATION

Consult U.S. Coast Guard Light List for supplemental information concerning aids to navigation.

CAUTION

Submerged Pipelines and Cables

Uncharted submerged pipelines and cables may exist in the vicinity of oil well structures, and between such structures and the shoreline. Mariners should use caution when anchoring.

Covered wells may be marked by lighted or unlighted buoys.

CAUTION

Oil well structures, some submerged and capped, and submerged cables are charted only where offshore of the indicated limits of the 1:80,000 scale series chart.

STORM WARNINGS

The National Weather Service displays storm warnings at the following approximate locations:
Galveston C.G. Station (29°20'-94°46')
Freeport C.G. Station (28°56.5'-95°18.1')
Port Aransas C.G. Station (27°50.1'-97°03.5')
Port Isabel (26°04.4'-97°09.8')
For a complete list of storm warning stations, see large scale charts.

NEW CHART NUMBERING SYSTEM

The National Ocean Survey, in cooperation with the Defense Mapping Agency Hydrographic Center, is in the process of adopting a new national chart numbering system. See Notice to Mariners No. 19, May 11, 1974, or Nautical Chart Catalog for cross references of old and new chart numbers.

Chart Number

New System	Old System	New System	Old System
11301	1288	11315	891-SC
11302	898-SC	11316	1284
11303	897-SC	11319	889-SC
11304	1287	11321	1283
11305	896-SC	11322	887-SC
11306	895-SC	11323	1282
11307	1286	11324	518
11308	893-SC	11326	152-SC
11309	523	11327	519
11313	1285	11332	1280
11314	892-SC		

LORAN-C
GENERAL EXPLANATION

LORAN-C FREQUENCY ..... 100kHz.
PULSE REPETITION INTERVAL
9930 ..... 99.300 Microseconds
STATION TYPE DESIGNATORS: (Not individual station letter designators)
M ..... Master
W ..... Secondary
X ..... Secondary
Y ..... Secondary
Z ..... Secondary
EXAMPLE: 9930-X

RATES ON THIS CHART
* 9930-W 9930-Z

This chart has been prepared for use with ground wave signals. Sky wave corrections are not provided. The Loran-C lines of position on this chart are compensated for observed propagation delay.

*Group repetition interval 9930 was formerly designated SS7.

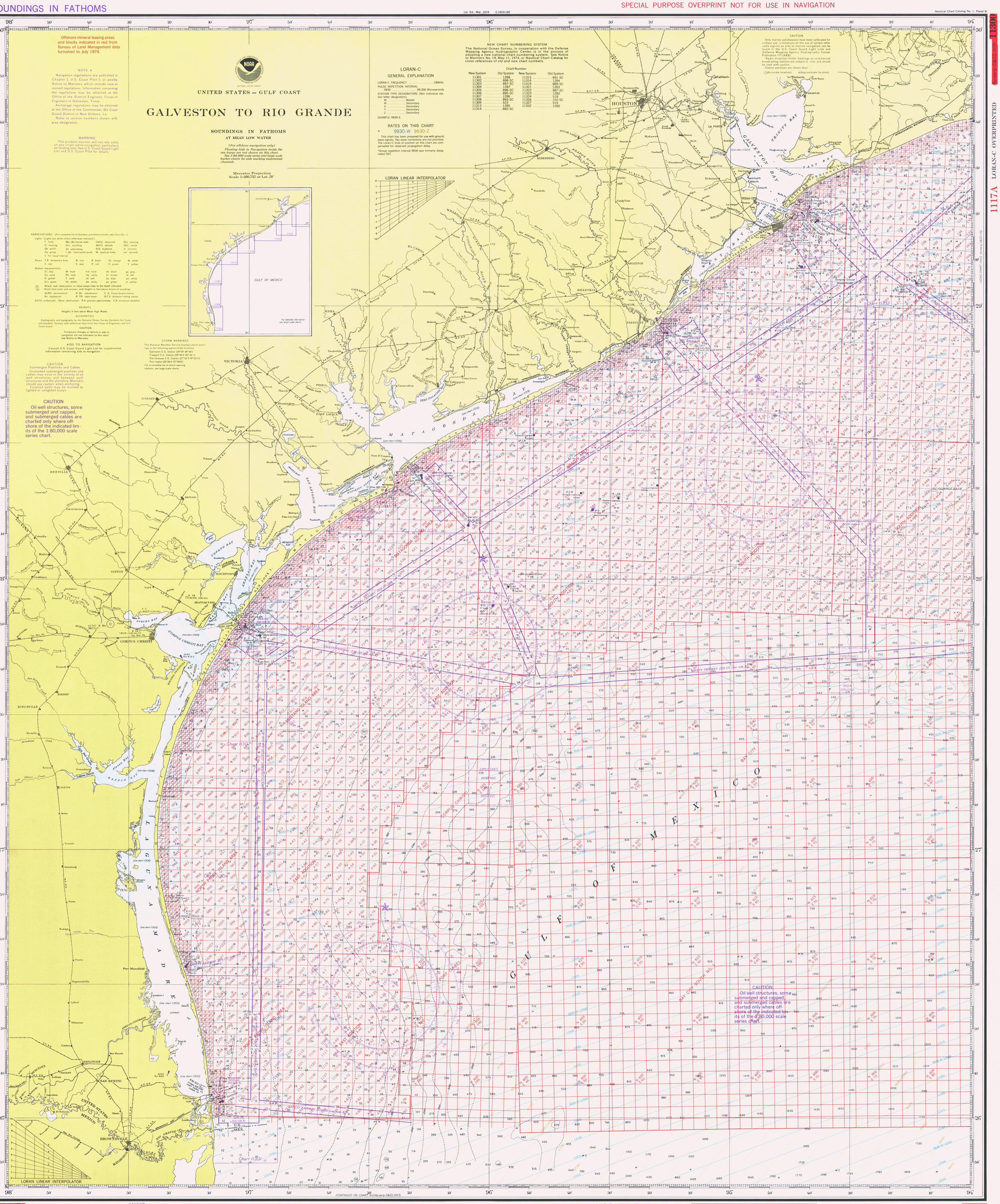
LORAN LINEAR INTERPOLATOR

CAUTION

Only marine radiobeacons have been calibrated for surface use. Limitations on the use of certain other radio signals as aids to marine navigation can be found in the U.S. Coast Guard Light Lists and Defense Mapping Agency Hydrographic Center Publication 117 (A&B).

Radio direction-finder bearings to commercial broadcasting stations are subject to error and should be used with caution.

Station positions are shown thus:
○(Accurate location) ○(Approximate location)



(CONTINUED ON CHART 411) (formerly C&GS 1007)

CAUTION

This chart has been corrected from the Notice to Mariners published weekly by the Defense Mapping Agency Hydrographic Center and the Local Notice to Mariners issued periodically by each U.S. Coast Guard district to the print date shown in the lower left hand corner.

SPECIAL PURPOSE OVERPRINT NOT FOR USE IN NAVIGATION

Offshore mineral leasing areas and blocks indicated in red from Bureau of Land Management data furnished to July 1974.

Published at Washington, D. C.
U. S. DEPARTMENT OF COMMERCE
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION
NATIONAL OCEAN SURVEY

SOUNDINGS IN FATHOMS

For LORAN-A coverage see reverse side

FATHOMS	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17
FEET	6	12	18	24	30	36	42	48	54	60	66	72	78	84	90	96	102
METERS	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17

(Galveston to Rio Grande)

SOUNDING IN FATHOMS - SCALE 1:460,732

1117A 11300
(formerly C&GS 1117)
LORAN-C OVERPRINTED