(2.) TOME APPROACH.—Buoys established :-

- (a.) Position.-At a distance of one cable, 180° (S. 16° E. mag.), from Zealous rock. Zealous rock, lat. 36° 37' S., long. 72° 59¾' W. Description. — A black cylindrical buoy with
- cylindrical topmark. (b.) Position.—Close westward of the 6 ft. rock, situated at a distance of one mile, 25° (N. 9° E.
- mag.), from the extremity of Parra Point. Description. — A black cylindrical buoy with cylindrical topmark.

Variation .--- 16° E.

SOUTH PACIFIC OCEAN.

Solomon Islands.—Guadalcanal Island.—Coughlan Harbour. Reef in Approach.

Position.-At a distance of 31 miles, 282° (N. 86° W. mag.), from the south-western extreme of Sow Reef, Coughlan Har-bour. Lat. 9° 14' 50" S., long. 159° 31' 10" E., on Chart No. 1469.

Depth.-2 fathoms.

Remarks .-- Discoloured water extends 8 cables westward from the reef.

Variation.-8° E.

NEAL ISLAND ANCHORAGE.-HYDROGRAPHIC INFORMATION. -A recent survey has disproved the existence of the four extensive shoals now shown on the charts to the eastward and north-eastward of Neal Island, Neal Island Anchorage, Guadalcanal Island, Solomon Islands, but has revealed the existence of the following :

A rocky shoal, with a least depth of 2 fathoms over it, 2,150 yards 53° from the centre of Weldon Reef.

A rocky shoal, with a least depth of 2 fathoms over it, 1,250 yards 87° from the centre of Weldon Reef. A rocky shoal, with 14 fathoms over it, 2,000 yards 61° 30'

from the centre of Weldon Reef.

A depth of 13 fathoms 2,000 yards 65° from the centre of Weldon Reef.

Approximate position of Weldon Reef on B.A. Chart No. 1414 : Latitude 9° 29' S., longitude 160° 26' 40" E. The conspicuous tree on Neal Island has a height of 144 ft.

COUGHLAN HARBOUR.-REEF IN APPROACH .- The commanding officer of H.B.M. surveying vessel "Sealark" reports a reef, with a least depth of 2 fathoms over it, $3\frac{1}{2}$ miles 282° from the south-western extremity of Sow Reef, Coughlan Harbour, Guadalcanal Island, Solomon Islands.

Discoloured water extends about 1,600 yards westward from this reef.

Approx. position : Lat. 9° 14' 50" S., long. 159° 31' 10" E.

SOCIETY ISLANDS.-RAIATEA ISLAND.-TEAVARUA (UTU-Roa) HARBOUR.—Non-EXISTENCE of BUOYS.—The master of the American schooner "Borealis" reports that the two mooring-buoys formerly moored off the trading-station at American Cove, Teavarua (Uturoa) Harbour, Raiatea Island, Society Islands, no longer exist, and should be removed from the charts

Approximate position of Traders' House : Latitude 16° 44' 15" S., longitude 151° 25' 20" W.

JAPAN.

WEST COAST .-- SHIMONOSEKI STRAIT .-- MOJI KO.-- WRECK LIGHT-BUOYS ESTABLISHED.—Referring to Notice to Mariners No. 48 (3950) of 1912, the Japanese Government has given further notice that a gas-buoy has been established at the bow and another at the stern of the wreck of the steamer "Umegka Maru," sunk in Moji Ko, Shimonoseki Strait, west coast of Japan.

Each buoy is conical in shape, painted green, surmounted by a latticework supporting the lantern, and shows 10 ft. above the water an *intermittent green* light every 6 seconds thus, light 4 seconds, eclipsed 2 seconds.

The gas buoy marking the bow of the wreck is moored in 6 fathoms of water, on the bearings-

Chinney of quarantine station at Hikoshima, 247° 10'. Hane Ishi, 306° 20'.

Conspicuous tree on Hiyori-Yama, 339° 15' The gas-buoy marking the stern of the wreck is moored in 8 fathoms of water, on the bearings—

Chimney of quarantine station at Hikoshima, 253°. Hane Ishi, 307° 20'.

Conspicuous tree on Hiyori-Yama, 338°.

F

SHIMONOSEKI KO.—LIGHT-BUOY RE-ESTABLISHED.—Refer-ring to Notice to Mariners No. 51 (4188) of 1912, the Japanese Government has given further notice that the black light-buoy showing an *intermittent red* light, moored 667 yards 176° from the Meteorological Station, Shimonoseki Ko, Shimono-seki Strait, Japan, but temporarily withdrawn, has been re-replaced on its station.

Approximate position of Meteorological Station (observa-tion spot): Latitude 33° 57' 24" N., longitude 130° 56' 9" E.

WASHINGTON.

COLUMBIA RIVER ENTRANCE. — INTENDED CHANGE IN RANGE-LIGHTS. — About 1st January, 1913, the entrance range-lights, Columbia River, Washington, will be changed as follows :--

The characteristic of the front light will be changed from fixed to flashing white every 2 seconds—thus, flash 0.2 second, eclipsed 1.8 seconds.

The characteristic of the rear light will be changed from fixed to intermittent white every 2 seconds-thus, light 1 second, eclipsed 1 second.

The luminous power of both lights will be increased from

170 to 3,000 candles. Approximate position of front light: Latitude 46° 15′ 33″ N., longitude 123° 57′ 50″ W.

PUGET SOUND .---- TACOMA.--- LIGHT AND FOG-SIGNAL ESTA-BLISHED.—On 1st December, 1912, an intermittent white in-candescent electric light of about 300 candle-power every 5 seconds—thus, light 3 seconds, eclipsed 2 seconds—was esta-blished on the point on the eastern side of the entrance to the city waterway, Tacoma, Puget Sound, Washington, on the bearings

City Hall, left tangent, 215°.

St. Lukes Church, right tangent, 240° 15'. High School, right tangent, 302°.

The light is exhibited 25 ft. above the water from a white, keleton, frame structure.

On the same date a fog-bell, which sounds 2 strokes in quick succession every 10 seconds, was established at the station. Approx. position: Lat. 47° 15′ 42″ N., long. 122° 26′ 5″ W.

BRAZIL

RIO DE JANEIRO BAY.—BEACONS ESTABLISHED.—BUOYS WITHDRAWN.—The Brazilian Government has given notice that the following changes have been made in the aids to A beacon, with a spherical topmark, painted red, has been

A beacon, with a spherical topmark, painted red, has been established on Espinho Rock. Approx. position : Lat. 22° 50′ 40″ S., long. 43° 9′ 37″ W. A beacon, with a spherical topmark, painted red, has been established on Little Mucangue (Coal) Island. Approx. position : Lat. 22° 52′ 4″ S., long. 43° 8′ W. A beacon, with a triangular topmark, painted black, has been established on Duas Irmas Rocks, located between Pocunta and Praccio Islands.

Paqueta and Brocoio Islands.

Approx. position : Lat. 22° 45′ 46″ S., long. 43° 7′ 20″ W. The black conical buoy marking Pao Rock has been discontinued, and a beacon, with a triangular topmark, painted black, has been established on the rock. Approx. position : Lat. 22° 50′ 40″ S., long. 43° 10′ 23″ W.

The red conical buoy marking Il Manoel has been discontinued, and a beacon, consisting of a staff, with a red cask, has been established on the rock. Approx. position : Lat. 22° 48' 22" S., long. 43° 9' 15" W. H.O. Charts Nos. 1130, 1331, 1332, 1402, 1674, 971, and

972

H.O. Publication No. 88, East Coast of South America, 1904, page 445.

URUGUAY.

PLATA RIVER.-LOBOS ISLAND LIGHT-STATION.-RADIO-TELEGRAPH STATION ESTABLISHED.—A radio-telegraph sta-tion, call letters U L B, range 53 miles, has been established at Lobos Island Light-station, Plata River. Approx. position : Lat. 35° 1' 15" S., long. 54° 53' 15" W.

CHINA.

YANGTZE RIVER. - LANGSHAN CROSSING. - NORTH TREE LIGHT-BEACON MOVED.—The Chinese Government has given notice that on 15th September, 1912, on account of the washing-away of the river-bank, North Tree light-beacon, Langshan Crossing, Yangtze River, China, was moved and re-established 2.5 miles 281° from Langshan Pagoda.

JAVA

NORTH COAST .--- SURABAYA STRAIT .--- WEST CHANNEL. BUOY FROVIDED WITH TOFMARK. – Referring to Notice to Mariners No. 46 (3779) of 1912, further notice is given that the black can buoy recently established in West Channel, Surabaya Strait, in (approximately) latitude 7° 10' 15" S., longitude 112° 41' 20" E., has been provided with a truncated cone topmark.

RED SEA.

Daedalus Reef Light.-Intended Alteration in Character Position .-- Lat. 24° 551' N., long. 35° 511' E.