

# **THE SHIPS' ROUTEING SYSTEM IN THE WATERS OF QINGDAO (2011)**

Reference charts: Chinese charts, No.12339/12351/30501/30502 (WGS84)

The Ships' Routeing System in the Waters of Qingdao comprises traffic separation schemes, precautionary areas and inshore traffic zones.

## **1. Traffic separation scheme**

Traffic separation scheme comprises separation lines, boundary lines and traffic lanes.

### **1.1 No.1 traffic separation scheme**

#### **1.1.1 Separation Line**

The separation line of No.1 traffic separation scheme is the line connecting the two following geographic positions:

36°01'52.1"N/120°17'02.7"E;

36°01'27.9"N/120°19'14.5"E.

#### **1.1.2 Boundary Line**

The north boundary line of No.1 traffic separation scheme is the line connecting the two following geographic positions:

36°02'10.9"N/120°16'59.8"E;

36°01'47.4"N/120°19'19.9"E.

The south boundary line of No.1 traffic separation scheme is the line connecting the two following geographic positions::

36°01'33.0"N/120°17'05.7"E;

36°01'08.3"N/120°19'08.9"E.

#### **1.1.3 Traffic Lane**

Inbound ships' traffic lane is the water area between separation line and the north boundary line of the routing scheme. The west width of the lane is 0.30 nm and the east width is 0.33 nm. The length of center line of the traffic lane is 1.89 nm. The main traffic direction is 282°11'00"(true course)

Outbound ships' traffic lane is the water area between separation line and the

south boundary line of the routing scheme. The west width of the lane is 0.30 nm and the east width is 0.33 nm. The length of center line of the traffic lane is 1.77 nm. The main traffic direction is  $103^{\circ}15'00''$ (true course)

## 1.2 No.2 traffic separation scheme

### 1.2.1 Separation Line

The separation line of No.2 traffic separation scheme is the line connecting the following two geographic positions:

$36^{\circ}01'14.7''N/120^{\circ}20'26.5''E$ ;

$36^{\circ}00'30.8''N/120^{\circ}24'25.1''E$ .

### 1.2.2 Boundary Line

The north boundary line of No.2 traffic separation scheme is the line connecting the following two geographic positions:

$36^{\circ}01'35.2''N/120^{\circ}20'32.1''E$ ;

$36^{\circ}00'55.1''N/120^{\circ}24'31.2''E$ .

The south boundary line of No.2 traffic separation scheme is the line connecting the following two geographic positions:

$36^{\circ}00'54.1''N/120^{\circ}20'20.8''E$ ;

$36^{\circ}00'06.6''N/120^{\circ}24'18.9''E$ .

### 1.2.3 Traffic Lane

Inbound ships' traffic lane is the water area between the separation line and the north boundary line of the traffic separation scheme. The west width of the lane is 0.35 nm and the east width is 0.41 nm. The length of the center line of the traffic lane is 3.3 nm. The main traffic direction is  $282^{\circ}11'00''$ (true course)

Outbound ships' traffic lane is the water area between the separation line and the south boundary line of the traffic separation scheme. The west width of the lane is 0.35 nm and the east width is 0.41 nm. The length of the center line of the traffic lane is 3.30 nm. The main traffic direction is  $103^{\circ}15'00''$ (true course).

## 1.3 No.3 traffic separation scheme

### 1.3.1 Separation Line

North separation line: the line connecting the following two geographic positions

is the separation line for traffic lanes of ships with a draft of 15 meters and above and the inbound traffic lanes for ships with a draft of less than 15 meters.

36°00'11.3"N/120°26'51.0"E;

35°59'25.2"N/120°31'02.0"E.

South separation line: the line connecting the following two geographic positions is the separation line for traffic lanes of the ships with a draft more than 15 meters (including 15 meters) and the outbound traffic lanes of ships with a draft less than 15 meters.

35°59'57.4"N/120°26'47.5"E;

35°59'11.4"N/120°30'58.1"E.

### 1.3.2 Boundary Line

The north boundary line of No.3 traffic separation scheme is the line connecting the following two geographic positions

36°00'37.8"N/120°26'57.7"E;

36°00'07.6"N/120°31'13.8"E.

The south boundary line of No.3 traffic separation scheme is the line connecting the following two geographic positions:

35°59'30.9"N/120°26'40.7"E;

35°58'29.2"N/120°30'46.4"E.

### 1.3.3 Traffic lane

Traffic lanes for ships with a draft of 15 meters and above are the water areas between the south separation line and the north separation line. The width of the lane is 0.24 nm. The length of the central line is 3.48nm. The main traffic direction is 283°00'00" (true course).

The traffic lane for inbound ships with a draft of less than 15 meters is the water area between the north separation line and the north boundary line. The west width of the lane is 0.45 nm and the east width is 0.72 nm. The length of the central line of the lane is 3.49nm. The main traffic direction is 280°46'00" (true course).

The traffic lane for outbound ships with a draft of less than 15 meters is the water area between the south separation line and the south boundary line. The west width of

the lane is 0.45 nm and the east width is 0.72 nm. The length of the central line is 3.48nm. The main traffic direction is 105°14'00" (true course).

## **2. Precautionary area**

### 2.1 No.1 precautionary area

No.1 precautionary area is the water area with the geographical position of 36°01'48.3"N/120°16'25.7"E as the center and 0.6nm as the radius. One virtual AtoN is set in the geographical position of 36°01'55.7"N/120°16'42.7"E in this water area

### 2.2 No.2 precautionary area

No.2 precautionary area is the water area bounded by the line connecting the following four geographic positions.

36°01'47.4"N/120°19'19.9"E;

36°01'08.3"N/120°19'08.9"E;

36°00'54.1"N/120°20'20.8"E;

36°01'35.2"N/120°20'32.1"E.

The central line of this area is 1.00nm. The west width is 0.66nm and the east width is 0.70 nm.

### 2.3 No.3 precautionary area

No.3 precautionary area is the water area bounded by the line connecting the following four geographic positions.

36°00'55.1"N/120°24'31.2"E;

36°00'06.6"N/120°24'18.9"E;

35°59'30.9"N/120°26'40.7"E;

36°00'37.8"N/120°26'57.7"E.

The central line of this area is 2.00nm. The west width is 0.82nm and the east width is 1.14 nm.

## **3. Inshore traffic zone**

### 3.1 North inshore traffic zone

The north inshore traffic zone is the water area bounded by the line connecting

the following four geographical positions and the coastlines between Tuandaozui and Huiquanjiao.

36°02'38.8"N/120°16'54.7"E (Tuandaozui)

36°02'10.9"N/120°16'59.8"E (the northwest endpoint of the north boundary line of No.1 traffic separation scheme)

36°01'47.4"N/120°19'19.9"E (the northeast endpoint of the north boundary line of No.1 traffic separation scheme)

36°02'38.8"N/120°20'07.8"E (Huiquanjiao)

### 3.2 South inshore traffic zone

The south inshore traffic zone is the water area bounded by the lines connecting the following four geographical positions and the coastlines between Jiaozishizui and Xiangzui.

36°00'58.7"N/120°17'10.9"E (Jiaozishizui)

36°01'33.0"N/120°17'05.7"E (the southwest endpoint of the south boundary line of No.1 traffic separation scheme)

36°01'08.3"N/120°19'08.9"E (the southeast endpoint of the south boundary line of No.1 traffic separation scheme)

36°00'40.7"N/120°18'22.9"E (Xiangzui)

## 4. Special requirements

4.1 When navigating from the waters north of the virtual AtoN into No.1 traffic separation scheme waters or from No.1 traffic separation scheme waters into the waters south of the virtual AtoN, ships shall pass by from the west of the virtual AtoN in No.1 precautionary area and navigate with caution.

4.2 Ships in the waters of Qingdao ships' routing scheme shall standby VHF08.

4.3 Pilots shall board and disembark a ship with a draft of less than 15 meters in No.2 precautionary area. Pilots shall board and disembark a ship with a draft of 15 meters and above abeam Xiaogongdao waters.

4.4 Ships with the length overall of 50 meters and above shall navigate in the traffic lane as required and other ships shall navigate in navigable waters other than

traffic lanes

Ships with a draft of less than 15 meters shall not navigate in traffic lanes for ships with a draft of 15 meters and above, unless permitted by Qingdao VTS Center.

4.5 Ships shall navigate at a speed of less than 12 knots in the waters of No.1 traffic separation scheme.

4.6 Overtaking is forbidden in the waters of No.1 traffic separation scheme.

4.7 Participating ships shall not navigate over separation lines, unless such navigation is reported to and approved by Qingdao VTS Center.

4.8 Anchoring, trawling and aquaculture are forbidden in precautionary areas, traffic lanes and the nearby waters of the terminations, unless such activities are approved by the administrations.

4.9 Participating ships are not exempted from responsibilities and obligations of *the International Regulations for Preventing Collision at sea, 1972*.

4.10 The Administration may impose penalties on any ship failing to comply with the system in accordance with related laws and regulations.

4.11 The routeing system shall be implemented from 1 March 2011, and the previous version shall be abrogated at the same time.