

PULAU SEBAROK - VOPAK TERMINAL (OSV)

JETTY	DEPTH A/S (m)	APPROACH DEPTH (m)	MAX LoA (m)	MAX DISPL (tonnes)	REMARKS
OSV2	11.3	16.6	264	45,800	
OSV3	16.9	16.6	370	210,000	see para. 3 under General Information
OSV4	12.9	16.6	250	80,000	11.5m patch located 50m SE of southern most dolphin
OSV5	17.6	17.0	280	106,000	See General Information
OSV6	10.3	7.6	116	13,000	
OSV7	10.1	7.6	110	12,000	
OSV8	17.0	17.0	280	210,000	See General Information
OSV9	17.0	11.1	145	19,500	
OSV10	11.7	10.0	145	19,500	

GENERAL INFORMATION

1. No berthing of vessels above the maximum displacement.
2. Berthing of VLCC to be carried out only during daylight and on slack tide.
3. OSV3

A 12.0m patch is located 14m off the northernmost mooring dolphin. An additional tug may be considered when berthing deep draft vessels.
4. OSV5
 - a) The tidal predictions are based on Main Strait – off Shell SBM Buoy Tidal Predictions.
 - b) Vessels should keep clear of the SBM mooring area (SBM buoy and floating hoses).
5. OSV8
 - a) Shallow waters of depths 11.1m lie 100m west of the transit of W. Jambi Beacon and the yellow dolphin marker at the western end of berth 9.
 - b) For berthing on a flood, it is recommended to turn and stem the flood tide off OSV5 first then followed by backing in to berth at OSV8

Note: Anchoring in the area is prohibited due to the Shell SBM pipeline.
6. OSV6 and 7
 - a) Generally during the beginning of the flood stream at Main Strait – off Shell SBM Buoy, the tidal stream at jetty flows in a 345°T direction.
 - b) A counter tidal stream occurs and flows in the opposite direction (-165°T) at around the time of the maximum flood prediction at Main Strait – off Shell SBM Buoy.
 - c) The tidal stream would continue in the direction of 165°T till the time of the

maximum (Main Strait – off Shell SBM Buoy Prediction) when it would reverse its direction and flow in a direction of 345°T right through the next flood.

- d) The recommended approach to and from the jetty is via the channel south of Sebarok Beacon.

7. Pilot walkie talkie channel - 05

Terminal contact number	OSV2-8(Vopak)	+65-9127 3169;	+65-9126-7210
	OSV2(SPC)	+65-6272 0611	
	OSV2(Clean sea)	+65-9828 0538	

PILOTAGE GUIDELINES

1. BERTHING (DAY)

a) Flood Tide

(i)	<u>OSV3, 4, 6, 7, 9 & 10</u>	No restriction
(ii)	<u>OSV5</u> LOA \leq 210m	No restriction
	LOA >210 to 260m	Tidal strength \leq 2.0 kt
	LOA >260m	Tidal strength \leq 1.0kt
(iii)	<u>OSV8</u> LOA \leq 210m	No restriction
	LOA >210 to 260m	Tidal strength \leq 1.5 kt
		Tidal strength >1.5 to 2.0kt ¹
	LOA >260m	Tidal strength \leq 1.0kt
Tidal strength >1.0 to 1.5kt ²		

b) Ebb Tide

(i)	<u>OSV3, 4, 6, 7, 9 & 10</u>	
	When no counter current exists	No restriction
	When counter current exists	Vessel's displ to be \leq 40,000GT
(ii)	<u>OSV5</u>	No restriction
(iii)	<u>OSV8</u>	
	LOA \leq 210m	No restriction
	LOA >210 to 260m	Tidal strength \leq 2.0kt
	LOA >260m	Tidal strength \leq 1.0kt
Tidal strength >1.0 to 1.5kt ³		

¹ Flood - Vessel with draft >11.6 metres - 3 big tugs

² Flood - Vessel with draft >11.6 metres - 3 big tugs

³ Ebb - Vessel with draft >11.6 metres - 3 big tugs with at least 45 tonnes bollard pull

2. UNBERTHING (DAY)

a) Flood Tide

(i)	<u>OSV3, 4, 6, 7, 9 & 10</u>	No restriction
(ii)	<u>OSV 5</u> Stbd side a/s:	
	LOA \leq 210m	No restriction
	LOA >210 to 260m draft \leq 11.6m	Tidal strength \leq 1.5kt
	LOA >210 to 260m draft >11.6m	Tidal strength \leq 1.0kt
	LOA >260m	Tidal strength \leq 0.5kt
	Port side a/s	No restriction
(iii)	<u>OSV8</u> Stbd side a/s: LOA \leq 210m	No restriction
	LOA >210 to 260m	Tidal strength \leq 1.5kt Tidal strength >1.5 to 2.0kt ⁴
	LOA >260m	Tidal strength \leq 0.5kt Tidal strength >0.5 to 1.0kt ⁵

b) Ebb Tide

(i)	<u>OSV3, 4, 6, 7, 9 & 10</u>	No restriction
(ii)	<u>OSV 5</u> Stbd side a/s	No restriction
	Port side a/s	
	LOA \leq 210m	No restriction
	LOA >210 to 260m draft \leq 11.6m	Tidal strength \leq 1.5kt
	LOA >210 to 260m draft >11.6m	Tidal strength \leq 1.0kt
	LOA >260m	Tidal strength \leq 0.5kt
(iii)	<u>OSV 8</u> Stbd side a/s	No restriction
	Port side a/s: LOA \leq 210m	No restriction
	LOA >210 to 260m	Tidal strength \leq 1.5kt Tidal strength >1.5 to 2.0kt ⁶
	LOA >260m	Tidal strength \leq 0.5kt Tidal strength >0.5 to 1.0kt ⁷

⁴ Flood - Vessel with draft >11.6 metres - 3 big tugs

⁵ Flood - Vessel with draft >11.6 metres - 3 big tugs

⁶ Ebb - Vessel with draft >11.6 metres - 3 big tugs with at least 45 tonnes bollard pull

⁷ Ebb - Vessel with draft >11.6 metres - 3 big tugs with at least 45 tonnes bollard pull

BERTHING (NIGHT)

a) Flood Tide

(i)	<u>OSV3 & 4</u>	
	Tidal strength ≤ 1.0 kt	No restriction
	Tidal strength > 1.0 kt	Vessel's displ. to be $\leq 50,000$ GT
(ii)	<u>OSV5</u>	
	LOA ≤ 210 m	No restriction
	LOA > 210 to 260m	Tidal strength ≤ 2.0 kt
	LOA > 260 m	Tidal strength ≤ 1.0 kt
(iii)	<u>OSV6, 7, 9 & 10</u>	No restriction
(iv)	<u>OSV8</u>	
	LOA ≤ 210 m	No restriction
	LOA > 210 to 260m	Tidal strength ≤ 1.5 kt Tidal strength > 1.5 to 2.0 kt ⁸
	LOA > 260 m	Tidal strength ≤ 1.0 kt Tidal strength > 1.0 to 1.5 kt ⁹

b) Ebb Tide

(i)	<u>OSV3 & 4</u>	
	When no counter current exists	No restriction
	When counter current exists	Vessel's displ. to be $\leq 40,000$ GT
(ii)	<u>OSV5, 6, 7, 9 & 10</u>	No restriction
(iii)	<u>OSV8</u>	
	LOA ≤ 210 m	No restriction
(iv)	LOA > 210 to 260m	Tidal strength ≤ 2.0 kt
	LOA > 260 m	Tidal strength ≤ 1.0 kt Tidal strength > 1.0 to 1.5 kt ¹⁰

⁸ Flood - Vessel with draft > 11.6 metres - 3 big tugs

⁹ Flood - Vessel with draft > 11.6 metres - 3 big tugs

¹⁰ Ebb - Vessel with draft > 11.6 metres - 3 big tugs with at least 45 tonnes bollard pull

3. UNBERTHING (NIGHT)

a) Flood Tide

(i)	<u>OSV3, 4, 6, 7, 9 & 10</u>	No restriction
(ii)	<u>OSV5</u> Stbd side a/s: LOA \leq 210m	No restriction
	LOA >210 to 260m draft \leq 11.6m	Tidal strength \leq 1.5kt
	LOA >210m to 260m draft >11.6m	Tidal strength \leq 1.0kt
	LOA >260m	Tidal strength \leq 0.5kt
(iii)	<u>OSV8</u> Stbd side a/s: LOA \leq 210m	No restriction
	LOA >210 to 260m	Tidal strength \leq 1.5kt Tidal strength >1.5 to 2.0kt ¹¹
	LOA >260m	Tidal strength \leq 0.5kt Tidal strength >0.5 to 1.0kt ¹²

b) Ebb Tide

(i)	<u>OSV3, 4, 6, 7, 9 & 10</u>	No restriction
(ii)	<u>OSV5</u> Stbd side a/s	No restriction
	Port side a/s: LOA \leq 210m	No restriction
	LOA >210 to 260m draft \leq 11.6m	Tidal strength \leq 1.5kt
	LOA >210m to 260m draft >11.6m	Tidal strength \leq 1.0kt
	LOA >260m	Tidal strength \leq 0.5kt
(iii)	<u>OSV8</u> Stbd side a/s	No restriction
	Port side a/s: LOA \leq 210m	No restriction
	LOA >210 to 260m	Tidal strength \leq 1.5kt Tidal strength >1.5 to 2.0kt ¹³
	LOA >260m	Tidal strength \leq 0.5kt Tidal strength >0.5 to 1.0kt ¹⁴

¹¹ Flood - Vessel with draft >11.6 metres - 3 big tugs

¹² Flood - Vessel with draft >11.6 metres - 3 big tugs

¹³ Ebb - Vessel with draft >11.6 metres - 3 big tugs with at least 45 tonnes bollard pull

¹⁴ Ebb - Vessel with draft >11.6 metres - 3 big tugs with at least 45 tonnes bollard pull

TUG ASSIGNMENT GUIDELINES

The following guidelines are for assigning tugs to vessels berthing and unberthing at jetties at **OSV2** to **OSV9**:

LENGTH OVERALL OF VESSEL (LOA)	NUMBER OF TUGS	REMARKS
Up to 70 metres	Pilot, in consultation with the master, may order a tug from the tug company nominated by the ship's agent	
71 to 122 metres	1 small tug	A vessel equipped with a suitable bow/stern thruster(s), in good working condition, may dispense with the need for a tug in that position.
123 to 152 metres	2 small tugs	
153 to 180 metres	2 medium tugs	
181 to 220 metres	2 big tugs*	
221 to 280 metres	2 big tugs*	
281 metres and above	4 big tugs	

* Pilot, in consultation with the master, may order an additional tug from the tug company nominated by the ship's agent

The following guidelines are for assigning tugs to vessels berthing and unberthing at jetty **OSV10**:

LENGTH OVERALL OF VESSEL (LoA)	NUMBER OF TUGS	REMARKS
Up to 70 metres	1 small tug	Pilot, in consultation with the master, may order a additional tug from the tug company nominated by the ship's agent during strong ebb stream
71 metres and above	2 small tugs	A vessel equipped with a suitable bow/stern thruster(s), in good working condition, may dispense with the need for a tug in that position.
