

PILOTAGE ADVISORY COMMITTEE

Proposed Amendments to the Berthing Guidelines

Purpose

The purpose of this paper is to seek members' endorsement on the proposed amendments to the Berthing Guidelines as attached in Annex 1.

Background

2. The proposed amendments in Annex 1 are to update the depths of Kwai Chung berths, information of Government Mooring Buoys and current operational requirements for the berthing and unberthing at the Lamma Power Station.

Consultation

3. The paper was circulated and endorsed by all Working Group members in December 2003.

Recommendation

4. Members are recommended to endorse the proposed amendments.

Brief Notes on Proposed Amendments to Berthing Guidelines

Item	Description		Amendments	Reason	Implications
1.	Chapter 4	Berthing Remarks	To include depths of Kwai Chung berths as declared by the terminal operators.	Kwai Chung berths were recently dredged and the water depths were deepened. To include such information in the Guidelines as agreed by PAC on 5.9.2003.	Maximum drafts for KC berths are increased and updated.
2.	Chapter 11	Government Mooring Buoy	To update information of the government mooring buoys in harbour.	24 government mooring buoys would be removed as per MDN No. 138 of 2003 dated 6.10.2003.	None
3.	Location: HKELECT(N)	Lamma Power station north wharf	To extend the tidal window for berthing and unberthing at night time. Add extra pilot for night berthing and unberthing of 172, 198 & 250m LOA. To delete the restriction of no outer-foul for berthing of 262m LOA.	The ship wreck within the Lamma Power Station navigation channel was removed on 27.10.2003, night berthing and unberthing are practicable. Restriction of no outer-foul for berthing of 262m LOA can be deleted.	Berthing and unberthing windows are extended to night time. Two pilots for night berthing and unberthing of 172, 198 & 250m LOA. The restriction of no outer-foul for berthing of 262m LOA is deleted.

4.	Location: HKELECT(S)	Lamma Power station south wharf	To extend the tidal window for berthing and unberthing at night time. Add extra pilot for night berthing and unberthing of 172, 198 & 250m LOA.	The ship wreck within the Lamma Power Station navigation channel was removed on 27.10.2003, night berthing and unberthing are practicable.	Berthing and unberthing windows are extended to night time. Two pilots for night berthing and unberthing of 172, 198 & 250m LOA.
5.	Location: KC1-8	Kwai Chung berth 1-8	To update depths of berths. To separate location codes and names for different depths at berths.	To update present depths as declared by the berth operators.	Maximum drafts for the berths are increased and updated.
6.	Location: KC6-7/O-F	Kwai Chung berth 6-7 outer-foul	Same as item 5.	Same as item 5.	Same as item 5.
7.	Location: KC9-14	Kwai Chung berth 9-14	Same as item 5.	Same as item 5.	Same as item 5.
8.	Location: KC15-20 (Provisional)	Kwai Chung berth 15-20	To amend the General Remarks.	On trial. Guidelines would be revised from time to time to reflect current operational need based on pilots' practical experience	Provisional guidelines on trial.

Note : Please refer to the attached Item 1- 8 for details of the proposed amendment .

Berthing Guidelines*Pending*

Chapter: 4

BERTHING REMARKS

(1) Kwai Chung Terminal

- a. Sufficient fore-and-aft clearances should be allowed for during berthing and unberthing operations. The following table shall be used to determine the clearances required:

<u>Vessel's LOA</u>	<u>Minimum Clearance at Each End*</u>	<u>Remarks</u>
300m and above	25 metres	Note 2
200m to under 300m	20 metres	Note 1,2,3 & 4
Under 200m	15 metres	Note 1,2,3 & 4

Note 1 : A mooring rope serving as back spring is needed to be in place on the appropriate bollard of the berth before the vessel is closing in and reaches a position which is about half ship breadth from the outer-side of the vessels secured at the adjacent berths. Under adverse weather conditions, such as when wind speed is above 22 knots, additional tug(s) may be called for with the consent of the Master.

Note 2 : At the western most of KC5, KC6, KC7, KC10 and KC14, the southern most of KC4 and KC9, the northern most of KC8 and any other berth with one end open, a minimum clearance of 5 metres less than those specified in the above table would be acceptable at the end adjacent to the berth occupied by other ships, but in no circumstances should a clearance be less than 15 metres.

Note 3 : When a vessel is required to berth alongside in a reverse direction to its approach (i.e. stern in approach), such as the cases like portside alongside to KC1, KC2, KC3, KC4, KC7, KC11, KC12, KC13 & KC14 and starboard side alongside to KC6 & KC10, and additional 5 metres clearance at both ends, more than those specified in the table above should be allowed, but it needs not be more than 25 metres.

Note 4 : During typhoons and when visibility is less than 3 cables, terminal operators should endeavour to arrange the fore-and-aft clearance of not less than 25 metres for any length of vessel.

* Notwithstanding the requirements specified, Kwai Chung terminal operators should endeavour to arrange a clearance of not less than 25 metres as far as possible.

- b. Irrespective of the ship's length, a clearance of not less than 25 metres shall be maintained at the corner between berth KC1 and KC5; at the eastern most of KC6, KC7, KC10 and KC11.
- c. Under Keel Clearance (**UKC**) at berth and throughout the harbour passage:
To ensure safe navigation, **10% UKC** must be maintained throughout the entire berthing/unberthing operation at all tidal conditions. The tidal height to be used for calculating the maximum allowable draft should be the lowest within the 2 hours period during the berthing/unberthing operation. **The required 10% UKC is allowed for various factors, including but not limited to the following:**
- (i.) Listing due to e.g. inadequate GM (Vessel Tender),
 - (ii.) Delay of berthing/unberthing due to delayed schedule, traffic congestion, weather etc. particularly on a falling tide.
 - (iii.) **Squat**
Warning:
Owners or masters of vessels may be liable to lighten their vessels to avoid touching of bottom due to insufficient UKC.
- d. **Declared Depths at Kwai Chung Berths: (KC basin maintained depth 15.0m)**

<u>Berth No.</u>	<u>*Depth @ berth</u>	<u>Max. Sailing or Arrival Draft @ KC Basin</u>
KC 1,2,3 & 5	14.0m	14.0m + Tide -10% UKC
KC 4 & 6	12.2m	12.2m + Tide -10% UKC
KC 7 & 8	14.2m	14.2m + Tide -10% UKC
KC 9	15.0m	15.0m + Tide -10% UKC
KC 10 -14	15.5m	15.0m + Tide -10% UKC
KC 15 - 20	15.5m	15.0m + Tide -10% UKC

Remarks:

- ❖ *Depth @ berths (50m from berth to seaward) were declared and maintained by terminal operators and may subject to change. Masters, agents & operators are cautioned to check with terminal operator for updated information.
- ❖ Vessels intending to sail or arrive with draft exceeding **15.0m** should submit the following information to **VTC & HK Pilots** in ample time for consideration.
 - (i.) Water density used for calculating the declared draft
 - (ii.) Draft at water density SG 1.017
 - (iii.) TPC (tonne per centimetre)
 - (iv.) Estimated GM @ sailing
 - (v.) Increase of draft due to squat @ 8 and 12 knots respectively
 - (vi.) Increase of draft due to heeling of 1 & 2 degrees respectively

- e. Any berthing movements within Kwai Chung, which are not in compliance with the guidelines endorsed by the PAC, should have the agreement from the Duty Pilot and/or one of the Executive Directors of HKPA. General Manager of HKPA would be responsible for coordinating with all the involved parties.
- (2) CLPTSK – China Light & power (Tap Shek Kok coal wharf)
Tap Shek Kok Coal wharf – If berth is partly occupied, then berth with bow pointing to each other @ slack water (HW+2 or LW+2 to +3, but may vary with seasons). Agents to be advised that limited anchorage off berth.
- (3) TPGAS – Tai Po Town Gas berth, Tolo harbour
Town gas berth, Tolo Harbour – give warning upon typhoon signal No.1 is hoisted or likely to affect HK as per pilot’s advice.
- (4) EUROASIA wharf. Tsing Yi
a. VHF watch on ch.11 by berths’ supervisor. Also ch.8,9,15,17,69,72,73 and 77 are available.
b. Clearance from barges would be required during berthing and unberthing.
c. Bridge mark/light available.
- (5) Sea trial – due to the limited sea room and congest traffic flow in Hong Kong waters, sea trial will only be carried out at day light hours for safety reason. Water at West and South of Lamma Island will be a suitable location to carry out sea trial, compass adjustment and DF calibration.
- (6) Transverse thruster(s) at one end meets conditions stipulated below, not limited to, may be accepted to substitute one tug: -
a. It is in good working condition, such that the control button can be adjusted to full power operating position.
b. It can run continuously for not less than 30 minutes.
c. It must be totally immersed in water.
d. It must not be interrupted by the operation of the main engine or other auxiliary engine.
Note: Master should consider Pilot’s recommendation to use tug even the above conditions are met, especially in adverse weather or small maneuvering area.

Vessel’s Length overall	Actual minimum Horse Power	Actual minimum Kilo Watts	Actual minimum Kilo Newton
<131m	600	438	45
131-180m	800	584	61
181-250m	1000	730	75
>250m	1500	1095	113

Berthing Guidelines*Updated December 2003*Chapter: 11 **GOVERNMENT MOORING BUOYS**

<u>BUOY</u>	<u>LOA (m.)</u>	<u>Draft (m.)</u>	<u>BUOY</u>	<u>LOA (m.)</u>	<u>Draft (m.)</u>
‘A’ Buoys:					
A13	183	8.8	A60	183	7.8
A17*	183	8.5	A62	198	10.2
A29*	160	9.8	A70	170	9.9
A35*	160	9.5	A71	183	9.1
A36	160	8.1	A72	183	9.5
A38	183	7.2	A73	183	9.5
A39*	183	8.4	A74	183	9.5
A43*	183	9.0	A76	170	9.6
A46*	183	10.8	A77	183	9.5
			A78	183	9.8
‘B’ Buoys:					
B01	120	4.8	B06	137	9.0
B02*	137	6.4	B20	137	7.3
B03*	137	6.7	B26	137	9.7
B04*	137	9.1	B30	137	8.1
B05	137	7.5	B31	137	9.1

* = Classified as Non typhoon mooring buoy

Remarks:

	<u>‘A’ buoy</u>	<u>‘B’ buoy</u>
Normal weather max. length	183m	138m
Typhoon class max. length	183m	113m
Swinging radius	214m	168m
Buoy link diameter	146mm	146mm

The location and sounding of the GMBs are subject to change without notice. Agents/Operators are cautioned to check with Mardep for updated information when booking GMB.

Berthing Guidelines*PAC endorsed on 4 December 2001*

Location : HKELECT(N)

Lamma power station north wharf

010 **Berthing** LOA: Max 153m
Draft: Max. 9.5m (min 15% UKC)
Time: Day light only
Tugs: 2
Remarks: Any side to.

011 **Unberthing** LOA: Max 153m
Draft: Max. 9.5m (min 15% UKC)
Time: Day light only
Tugs: 2
Remarks:

020 **Berthing** LOA: Max 172m
Draft: Max. 10.66m (min 15% UKC)
Time: Day HW-0.5 to LW-1
Tugs: 2
Remarks: Starboard side to.

021 **Unberthing** LOA: Max 172m
Draft: Max. 10.66m (min 15% UKC)
Time: Day light only
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 198m
Draft: Max. 11.5m (min 15% UKC)
Time: Day HW-0.5 to LW-1
Day HW-0.5 to HW+0.5 when
outerfoul.
Tugs: 3 incl. 2 est.
Remarks: Starboard side to.

031 **Unberthing** LOA: Max 198m
Draft: Max. 11.5m (min 15% UKC)
Time: Day light only
Tugs: 2. If D>9m 3
Remarks:

040 **Berthing** LOA: Max 250m
Draft: Max. 13.89m (min 15% UKC)
Time: Day HW-0.5 to LW-1
Day HW-0.5 to HW+0.5 when
outerfoul.
Tugs: 4 incl. 2 est.
Remarks: Starboard side to.

041 **Unberthing** LOA: Max 250m
Draft: Max. 13.89m (min 15% UKC)
Time: Day light only
Tugs: 3. If D>10m 4
Remarks:

050 **Berthing** LOA: Max 262m
Draft: Max. 13.89m (min 15% UKC)
Time: Day HW-0.5 to HW+0.5
Tugs: 4 incl. 2 est.
Remarks: 2 pilots. Starboard side to.
No outer-foul.
Not exceeding 100,000 DWT.

051 **Unberthing** LOA: Max 262m
Draft: Max. 13.89m (min 15% UKC)
Time: Day light only
Tugs: 3. If D>10m 4
Remarks: 2 pilots.

Berthing Guidelines*Pending*

Location : HKELECT(N)

Lamma power station north wharf

010 **Berthing** LOA: Max 153m
Draft: Max. 9.5m (min 15% UKC)
Time: 24 hours
Tugs: 2
Remarks:

011 **Unberthing** LOA: Max 153m
Draft: Max. 9.5m (min 15% UKC)
Time: 24 hours
Tugs: 2
Remarks:

020 **Berthing** LOA: Max 172m
Draft: Max. 10.66m (min 15% UKC)
Time: D&N HW-0.5 to LW-1
Tugs: 2
Remarks: Starboard side to.
Day: 1 pilot
Night: 2 pilots

021 **Unberthing** LOA: Max 172m
Draft: Max. 10.66m (min 15% UKC)
Time: 24 hours
Tugs: 2
Remarks: Night: Draft >8.5m 2 pilots

030 **Berthing** LOA: Max 198m
Draft: Max. 11.5m (min 15% UKC)
Time: D&N HW-0.5 to LW-1
D&N HW-0.5 to HW+0.5 when
outerfoul.
Tugs: 3 incl. 2 est.
Remarks: Starboard side to.
Day: 1 pilot
Night: 2 pilots

031 **Unberthing** LOA: Max 198m
Draft: Max. 11.5m (min 15% UKC)
Time: 24 hours
Tugs: 2. If Draft>9m 3
Remarks: Night: Draft >8.5m 2 pilots

040 **Berthing** LOA: Max 250m
Draft: Max. 13.89m (min 15% UKC)
Time: D&N HW-0.5 to LW-1
D&N HW-0.5 to HW+0.5 when
outerfoul.
Tugs: 4 incl. 2 est.
Remarks: Starboard side to.
Day: 1 pilot
Night: 2 pilots

041 **Unberthing** LOA: Max 250m
Draft: Max. 13.89m (min 15% UKC)
Time: 24 hours
Tugs: 3. If Draft>10m 4
Remarks: Day: 1 pilot
Night: 2 pilots

050 **Berthing** LOA: Max 262m
Draft: Max. 13.89m (min 15% UKC)
Time: D&N HW-0.5 to HW+0.5
Tugs: 4 incl. 2 est.
Remarks: 2 pilots. Starboard side to.
Not exceeding 100,000 DWT.

051 **Unberthing** LOA: Max 262m
Draft: Max. 13.89m (min 15% UKC)
Time: 24 hours
Tugs: 3. If Draft>10m 4
Remarks: 2 pilots.

Berthing Guidelines

PAC endorsed on 4 December 2001

Location : HKELECT(S)

Lamma power station south wharf

010 **Berthing** LOA: Max 153m
Draft: Max. 9.5m (min 15% UKC)
Time: Day light only
Tugs: 2
Remarks: Any side to.

011 **Unberthing** LOA: Max 153m
Draft: Max. 9.5m (min 15% UKC)
Time: Day light only
Tugs: 2
Remarks:

020 **Berthing** LOA: Max 172m
Draft: Max. 10.66m (min 15% UKC)
Time: Day HW-0.5 to LW-1
Tugs: 2
Remarks: Starboard side to.

021 **Unberthing** LOA: Max 172m
Draft: Max. 10.66m (min 15% UKC)
Time: Day light only
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 198m
Draft: Max. 11.5m (min 15% UKC)
Time: Day HW-0.5 to LW-1
Tugs: 3 incl. 2 est.
Remarks: Starboard side to.

031 **Unberthing** LOA: Max 198m
Draft: Max. 11.5m (min 15% UKC)
Time: Day light only
Tugs: 2. If D>9m 3
Remarks:

040 **Berthing** LOA: Max 250m
Draft: Max. 13.89m (min 15% UKC)
Time: Day HW-0.5 to LW-1
Tugs: 4 incl. 2 est.
Remarks: Starboard side to.

041 **Unberthing** LOA: Max 250m
Draft: Max. 13.89m (min 15% UKC)
Time: Day light only
Tugs: 3. If D>10m 4
Remarks:

050 **Berthing** LOA: Max 262m
Draft: Max. 13.89m (min 15% UKC)
Time: Day HW-0.5 to HW+0.5
Tugs: 4 incl. 2 est.
Remarks: 2 pilots. Starboard side to.
Not exceeding 100,000 DWT.

051 **Unberthing** LOA: Max 262m
Draft: Max. 13.89m (min 15% UKC)
Time: Day light only
Tugs: 3. If D>10m 4
Remarks: 2 pilots.

Berthing Guidelines*Pending*

Location : HKELECT(S)

Lamma power station south wharf

010 **Berthing** LOA: Max 153m
Draft: Max. 9.5m (min 15% UKC)
Time: 24 hours
Tugs: 2
Remarks:

011 **Unberthing** LOA: Max 153m
Draft: Max. 9.5m (min 15% UKC)
Time: 24 hours
Tugs: 2
Remarks:

020 **Berthing** LOA: Max 172m
Draft: Max. 10.66m (min 15% UKC)
Time: D&N HW-0.5 to LW-1
Tugs: 2
Remarks: Starboard side to.
Day: 1 pilot
Night: 2 pilots

021 **Unberthing** LOA: Max 172m
Draft: Max. 10.66m (min 15% UKC)
Time: 24 hours
Tugs: 2
Remarks: Night: Draft >8.5m 2 pilots

030 **Berthing** LOA: Max 198m
Draft: Max. 11.5m (min 15% UKC)
Time: D&N HW-0.5 to LW-1
Tugs: 3 incl. 2 est.
Remarks: Starboard side to.
Day: 1 pilot
Night: 2 pilots

031 **Unberthing** LOA: Max 198m
Draft: Max. 11.5m (min 15% UKC)
Time: 24 hours
Tugs: 2. If Draft >9m 3
Remarks: Night: Draft >8.5m 2 pilot

040 **Berthing** LOA: Max 250m
Draft: Max. 13.89m (min 15% UKC)
Time: D&N HW-0.5 to LW-1
Tugs: 4 incl. 2 est.
Remarks: Starboard side to.
Day: 1 pilot
Night: 2 pilots

041 **Unberthing** LOA: Max 250m
Draft: Max. 13.89m (min 15% UKC)
Time: 24 hours
Tugs: 3. If Draft >10m 4
Remarks: Day: 1 pilot
Night: 2 pilots

050 **Berthing** LOA: Max 262m
Draft: Max. 13.89m (min 15% UKC)
Time: D&N HW-0.5 to HW+0.5
Tugs: 4 incl. 2 est.
Remarks: 2 pilots. Starboard side to.
Not exceeding 100,000 DWT.

051 **Unberthing** LOA: Max 262m
Draft: Max. 13.89m (min 15% UKC)
Time: 24 hours
Tugs: 3. If Draft >10m 4
Remarks: 2 pilots.

Berthing Guidelines

PAC endorsed on 17 January 2003

Location : KC1-8

Kwai Chung berth 1-8

010 **Berthing** LOA: Max 130m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If D>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 **Unberthing** LOA: Max 130m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2.
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 **Berthing** LOA: Max 230m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 **Unberthing** LOA: Max 230m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 270m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

031 **Unberthing** LOA: Max 270m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 **Berthing** LOA: Max 350m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

041 **Unberthing** LOA: Max 350m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

To ensure safe navigation, 10% UKC must be maintained throughout the entire Berthing/Unberthing operation at all tidal conditions. The tidal height to be used for calculating the maximum allowable draft should be the lowest within the 2 hours period during the berthing/unberthing operation. Ample margin must be allowed for the following when calculating the effective UKC:

- (i.) Listing due to e.g. inadequate GM (Vessel Tender),
- (ii.) Delay of berthing/unberthing due to delayed schedule, traffic congestion, weather etc. particularly on a falling tide.

Warning:

Owners or masters of vessels may be liable to lighten their vessels to avoid touching of bottom due to insufficient UKC.

Berthing Guidelines*Pending*

Location : KC1235

Kwai Chung berth 1, 2, 3 & 5*(Declared Depth 14.0m)*

010 **Berthing** LOA: Max 130m
Draft: Max. 14.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If Draft>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 **Unberthing** LOA: Max 130m
Draft: Max. 14.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2.
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 **Berthing** LOA: Max 230m
Draft: Max. 14.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 **Unberthing** LOA: Max 230m
Draft: Max. 14.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 270m
Draft: Max. 14.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks:

031 **Unberthing** LOA: Max 270m
Draft: Max. 14.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 **Berthing** LOA: Max 350m
Draft: Max. 14.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks:

041 **Unberthing** LOA: Max 350m
Draft: Max. 14.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

- Please see Chapter 4(1) Berthing Remarks for Kwai Chung Terminals.
- Vessels intending to sail or arrive with draft exceeding 15.0m should inform VTC & HK Pilots in ample time for consideration.

Berthing Guidelines*PAC endorsed on 17 January 2003*

Location : KC1-8

Kwai Chung berth 1-8

010 **Berthing** LOA: Max 130m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If D>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 **Unberthing** LOA: Max 130m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2.
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 **Berthing** LOA: Max 230m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 **Unberthing** LOA: Max 230m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 270m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

031 **Unberthing** LOA: Max 270m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 **Berthing** LOA: Max 350m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

041 **Unberthing** LOA: Max 350m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

To ensure safe navigation, 10% UKC must be maintained throughout the entire Berthing/Unberthing operation at all tidal conditions. The tidal height to be used for calculating the maximum allowable draft should be the lowest within the 2 hours period during the berthing/unberthing operation. Ample margin must be allowed for the following when calculating the effective UKC:

- (i.) Listing due to e.g. inadequate GM (Vessel Tender),
- (ii.) Delay of berthing/unberthing due to delayed schedule, traffic congestion, weather etc. particularly on a falling tide.

Warning:

Owners or masters of vessels may be liable to lighten their vessels to avoid touching of bottom due to insufficient UKC.

Berthing Guidelines*Pending***Location :** KC46**Kwai Chung berth 4 & 6***(Declared Depth 12.2m)*

010 **Berthing** LOA: Max 130m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If Draft>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 **Unberthing** LOA: Max 130m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2.
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 **Berthing** LOA: Max 230m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 **Unberthing** LOA: Max 230m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 270m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

031 **Unberthing** LOA: Max 270m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 **Berthing** LOA: Max 350m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

041 **Unberthing** LOA: Max 350m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

Please see Chapter 4(1) Berthing Remarks for Kwai Chung Terminals

Berthing Guidelines

PAC endorsed on 17 January 2003

Location : KC1-8

Kwai Chung berth 1-8

010 **Berthing** LOA: Max 130m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If D>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 **Unberthing** LOA: Max 130m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2.
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 **Berthing** LOA: Max 230m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 **Unberthing** LOA: Max 230m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 270m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks:

031 **Unberthing** LOA: Max 270m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 **Berthing** LOA: Max 350m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks:

041 **Unberthing** LOA: Max 350m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

To ensure safe navigation, 10% UKC must be maintained throughout the entire Berthing/Unberthing operation at all tidal conditions. The tidal height to be used for calculating the maximum allowable draft should be the lowest within the 2 hours period during the berthing/unberthing operation. Ample margin must be allowed for the following when calculating the effective UKC:

- (i.) Listing due to e.g. inadequate GM (Vessel Tender),
- (ii.) Delay of berthing/unberthing due to delayed schedule, traffic congestion, weather etc. particularly on a falling tide.

Warning:

Owners or masters of vessels may be liable to lighten their vessels to avoid touching of bottom due to insufficient UKC.

Berthing Guidelines*Pending*

Location : KC78

Kwai Chung berth 7 & 8*(Declared Depth 14.2m)*

010 **Berthing** LOA: Max 130m
Draft: Max. 14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If Draft>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 **Unberthing** LOA: Max 130m
Draft: Max. 14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2.
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 **Berthing** LOA: Max 230m
Draft: Max. 14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 **Unberthing** LOA: Max 230m
Draft: Max. 14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 270m
Draft: Max. 14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

031 **Unberthing** LOA: Max 270m
Draft: Max. 14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 **Berthing** LOA: Max 350m
Draft: Max. 14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

041 **Unberthing** LOA: Max 350m
Draft: Max. 14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

- Please see Chapter 4(1) Berthing Remarks for Kwai Chung Terminals.
- Vessels intending to sail or arrive with draft exceeding 15.0m should inform VTC & HK Pilots in ample time for consideration.

Berthing Guidelines

PAC endorsed on 5 September 2003

Location : KC6-7/O-F

Kwai Chung berth 6-7 outer-foul

010 **Berthing** LOA: Max 250m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thruster not considered.

011 **Unberthing** LOA: Max 250m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered.

020 **Berthing** LOA: Max 290m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3
Remarks: No stern in.
Full length of opposite berth must
be clear.

021 **Unberthing** LOA: Max 290m
Draft: Max. 12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered.

General Remarks:

To ensure safe navigation, 10% UKC must be maintained throughout the entire Berthing/Unberthing operation at all tidal conditions. The tidal height to be used for calculating the maximum allowable draft should be the lowest within the 2 hours period during the berthing/unberthing operation. Ample margin must be allowed for the following when calculating the effective UKC:

- (i) Listing due to e.g. inadequate GM (Vessel Tender),
- (ii) Delay of berthing/unberthing due to delayed schedule, traffic congestion, weather etc. particularly on a falling tide.

Warning:

Owners or masters of vessels may be liable to lighten their vessels to avoid touching of bottom due to insufficient UKC.

Berthing Guidelines*Pending*

Location : KC6/O-F

Kwai Chung berth 6 outer-foul*(Declared Depth 12.2m)*

010 **Berthing** LOA: Max 250m
Draft: Max.12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered

011 **Unberthing** LOA: Max 250m
Draft: Max.12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered

020 **Berthing** LOA: Max 290m
Draft: Max.12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3
Remarks: No stern in.
Full length of opposite berth must
be clear.

021 **Unberthing** LOA: Max 290m
Draft: Max.12.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered

General Remarks:

Please see Chapter4(1) Berthing Remarks for Kwai Chung Terminals.

Berthing Guidelines

PAC endorsed on 5 September 2003

Location : KC6-7/O-F

Kwai Chung berth 6-7 outer-foul

010 **Berthing** LOA: Max 250m
Draft: Max. 12.2m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thruster not considered.

011 **Unberthing** LOA: Max 250m
Draft: Max. 12.2m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered.

020 **Berthing** LOA: Max 290m
Draft: Max. 12.2m + tide – 10%UKC
Time: 24 hrs.
Tugs: 3
Remarks: No stern in.
Full length of opposite berth must
be clear.

021 **Unberthing** LOA: Max 290m
Draft: Max. 12.2m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered.

General Remarks:

To ensure safe navigation, 10% UKC must be maintained throughout the entire Berthing/Unberthing operation at all tidal conditions. The tidal height to be used for calculating the maximum allowable draft should be the lowest within the 2 hours period during the berthing/unberthing operation. Ample margin must be allowed for the following when calculating the effective UKC:

- (i) Listing due to e.g. inadequate GM (Vessel Tender),
- (ii) Delay of berthing/unberthing due to delayed schedule, traffic congestion, weather etc. particularly on a falling tide.

Warning:

Owners or masters of vessels may be liable to lighten their vessels to avoid touching of bottom due to insufficient UKC.

Berthing Guidelines*Pending*Location : **KC7/O-F****Kwai Chung berth 7 outer-foul***(Declared Depth 14.2m)*

010 **Berthing** LOA: Max 250m
Draft: Max.14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered

011 **Unberthing** LOA: Max 250m
Draft: Max.14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered

020 **Berthing** LOA: Max 290m
Draft: Max.14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3
Remarks: No stern in.
Full length of opposite berth must
be clear.

021 **Unberthing** LOA: Max 290m
Draft: Max.14.2m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks: Thrusters not considered

General Remarks:

- Please see Chapter 4(1) Berthing Remarks for Kwai Chung Terminals.
- Vessels intending to sail or arrive with draft exceeding 15.0m should inform VTC & HK Pilots in ample time for consideration.

Berthing Guidelines

PAC endorsed on 17 January 2003

Location : KC9-14

Kwai Chung berth 9-14

010 **Berthing** LOA: Max 130m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 1. If D>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 **Unberthing** LOA: Max 130m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 **Berthing** LOA: Max 230m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 **Unberthing** LOA: Max 230m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 270m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks:

031 **Unberthing** LOA: Max 270m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 **Berthing** LOA: Max 350m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks: L>230m stern in 3 tugs.

041 **Unberthing** LOA: Max 350m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

To ensure safe navigation, 10% UKC must be maintained throughout the entire Berthing/Unberthing operation at all tidal conditions. The tidal height to be used for calculating the maximum allowable draft should be the lowest within the 2 hours period during the berthing/unberthing operation. Ample margin must be allowed for the following when calculating the effective UKC:

- (i) Listing due to e.g. inadequate GM (Vessel Tender),
- (ii) Delay of berthing/unberthing due to delayed schedule, traffic congestion, weather etc. particularly on a falling tide.

Warning:

Owners or masters of vessels may be liable to lighten their vessels to avoid touching of bottom due to insufficient UKC.

Berthing Guidelines*Pending*

Location : KC9

Kwai Chung berth 9*(Declared Depth 15.0m)*

010 **Berthing** LOA: Max 130m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If Draft>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 **Unberthing** LOA: Max 130m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 **Berthing** LOA: Max 230m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 **Unberthing** LOA: Max 230m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 270m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks: L>230m stern in 3 tugs.

031 **Unberthing** LOA: Max 270m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 **Berthing** LOA: Max 350m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

041 **Unberthing** LOA: Max 350m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

- Please see Chapter 4(1) Berthing Remarks for Kwai Chung Terminals.
- Vessels intending to sail or arrive with draft exceeding 15.0m should inform VTC & HK Pilots in ample time for consideration.

Berthing Guidelines

PAC endorsed on 17 January 2003

Location : KC9-14

Kwai Chung berth 9-14

010 Berthing LOA: Max 130m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 1. If D>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 Unberthing LOA: Max 130m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 Berthing LOA: Max 230m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 Unberthing LOA: Max 230m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 Berthing LOA: Max 270m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks:

031 Unberthing LOA: Max 270m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 Berthing LOA: Max 350m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks: L>230m stern in 3 tugs.

041 Unberthing LOA: Max 350m
Draft: Max. 13.8m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

To ensure safe navigation, 10% UKC must be maintained throughout the entire Berthing/Unberthing operation at all tidal conditions. The tidal height to be used for calculating the maximum allowable draft should be the lowest within the 2 hours period during the berthing/unberthing operation. Ample margin must be allowed for the following when calculating the effective UKC:

- (iii) Listing due to e.g. inadequate GM (Vessel Tender),
- (iv) Delay of berthing/unberthing due to delayed schedule, traffic congestion, weather etc. particularly on a falling tide.

Warning:

Owners or masters of vessels may be liable to lighten their vessels to avoid touching of bottom due to insufficient UKC.

Berthing Guidelines*Pending*

Location : KC10-14

Kwai Chung berth 10-14*(Declared Depth 15.5m)*

010 **Berthing** LOA: Max 130m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If Draft>8m 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

011 **Unberthing** LOA: Max 130m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2
Remarks: Ro-Ro vessel 2 tugs if adverse weather.

020 **Berthing** LOA: Max 230m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

021 **Unberthing** LOA: Max 230m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2
Remarks:

030 **Berthing** LOA: Max 270m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks: L>230m stern in 3 tugs.

031 **Unberthing** LOA: Max 270m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

040 **Berthing** LOA: Max 350m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
 1 if bow & stern thrusters fitted.
Remarks:

041 **Unberthing** LOA: Max 350m
Draft: Max.15.0m + tide – 10% UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks:

General Remarks:

- Please see Chapter 4(1) Berthing Remarks for Kwai Chung Terminals.
- Vessels intending to sail or arrive with draft exceeding 15.0m should inform VTC & HK Pilots in ample time for consideration.

Provisional berthing guideline for CT9**Berthing Guidelines***Updated December 2003*

Location: KC15-20

Kwai Chung berth 15-20*(Declared Depth 15.5m)*

010 **Berthing** LOA: Max 130m
Draft: Max.15.0m + tide – 10%UKC
Time: 24 hrs.
Tugs: 1. If Draft>8m 2
Remarks: If Swing around &/or wedge-in
min. 2 tugs

011 **Unberthing** LOA: Max 130m
Draft: Max.15.0m + tide – 10%UKC
Time: 24 hrs.
Tugs: 1. If no anchor down 2
Remarks: If swing around min. 2 tugs

020 **Berthing** LOA: Max 230m
Draft: Max.15.0m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2
Remarks: If Swing around &/or wedge-in
min. 2 tugs

021 **Unberthing** LOA: Max 230m
Draft: Max.15.0m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2
Remarks: If swing around min. 2 tugs

030 **Berthing** LOA: Max 270m
Draft: Max.15.0m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks: Min. 2 tugs during on trial

031 **Unberthing** LOA: Max 270m
Draft: Max.15.0m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks: If swing around min. 2 tugs

040 **Berthing** LOA: Max 352m
Draft: Max.15.0m + tide – 10%UKC
Time: 24 hrs.
Tugs: 3 incl. 1 GI est. if no bow thruster.
1 if bow & stern thrusters fitted.
Remarks: Min. 2 tugs during on trial

041 **Unberthing** LOA: Max 352m
Draft: Max.15.0m + tide – 10%UKC
Time: 24 hrs.
Tugs: 2. 1 if bow & stern thrusters fitted.
Remarks: If swing around min. 2 tugs

General Remarks:

- Please see Chapter 4(1) Berthing Remarks for Kwai Chung Terminals.
- Vessels intending to sail or arrive with draft exceeding 15.0m should inform VTC & HK Pilots in ample time for consideration.