

## 5. Port infrastructure

### 5.1 Berth information

| Berth               | Design Depth <sup>1</sup> | Length Berth Face | Berth Pocket Dimensions | Maximum Air Draft at LAT <sup>2</sup> | Maximum Fender Load <sup>4</sup> |
|---------------------|---------------------------|-------------------|-------------------------|---------------------------------------|----------------------------------|
| Hay Point 1         | 16.6 m                    | 203.6 m           | 342.9x60.96x16.6 m      | 27.8 m                                | 150,000 t                        |
| Hay Point 2         | 16.7m                     | 188.7 m           | 365.7x60.96x16.7 m      | 24.3 m                                | 180,000 t                        |
| Hay Point 3         | 19.0m                     | 255.65 m          | 460.0x70.0x19.0 m       | 30.9m                                 | 180,000 t                        |
| Dalrymple Bay 1 & 2 | 19.6 m                    | 662 m (combined)  | 838.0x65.0x19.6 m       | 31.14 m                               | 220,000 t                        |
| Dalrymple Bay 3 & 4 | 19.0 m                    | 676 m (combined)  | 890.0 x65.0x19.0 m      | 31.14 m                               | 220,000 t                        |

**Table 10 Berth Information**

Notes:

- Depths are subject to change; consult the Queensland Notices to Mariners for latest information.
- The actual air draft must consider the vessel's draft and the tide height.
- Fender design based on Port of Hay Point maximum displacement berthing limits

## 5.2 Berth restrictions

|  | HP1   | HP2                       | HP3, DB 1-4               |
|--|---|---------------------------|---------------------------|
| <p><b>Maximum DWT</b></p> <p>Ships in excess of Max. DWT to be approved on a case by case by the terminal. RHM, MVTM &amp; Duty Pilot to be informed</p>   | 180,000 tonnes  | 210,000 tonnes            | 220,000 tonnes            |
| <p><b>Maximum berthing displacement</b></p> <p><i>Ships in excess of Max. disp. to be approved on a case by case by the terminal. RHM, MVTM &amp; Duty Pilot to be informed. Duty pilot to assess whether additional tug is required</i></p> | 100,000 tonnes  | 110,000 tonnes            | 110,000 tonnes            |
| <p><b>Arrival current restrictions</b></p> <p>(Vessels to berth Starboard side to. Vessels berthing Port side to require RHM Approval)</p>   | <p>Berthing <b>PST</b> is not permitted at HP1.</p> <p>For ships berthing <b>SST</b> the following restrictions apply:</p> <ul style="list-style-type: none"> <li>• The earliest POB will not be earlier than when the flood current reduces to 0.1kt at the end of the flood tide.</li> <li>• The latest POB will be 90 minutes before the ebb current reduces to 0.1kt</li> </ul> | Any time (subject to UKC) | Any time (subject to UKC) |

|                                       |   |  |  |
|---------------------------------------|---|--|--|
| <b>Departure current restrictions</b> | <b>≤ 110,000t disp.</b><br>Anytime (subject to UKC)   | <b>≤ 110,000t disp or SST:</b><br>Anytime<br>(subject to UKC)  | <b>≤ 110,000t disp or SST:</b><br>Anytime<br>(subject to UKC)  |
|                                       | <b>&gt; 110,000t disp.</b><br>Anytime on the flood tide, and no later than when the current reaches 0.3kts on the ebb tide (subject to UKC) | <b>&gt; 110,000t disp and PST -</b><br>Anytime on the flood tide, and no later than when the current reaches 0.5kts on the ebb tide (subject to UKC) | <b>&gt; 110,000t disp and PST -</b><br>Anytime on the flood tide, and no later than when the current reaches 0.5kts on the ebb tide (subject to UKC) |

**Table 11 Hay Point and DBCT arrival restrictions**

## 5.3 Coal loading gantries

For berthing a ship, the terminal must have the loader parked out of the way at its designed securing site for berthing.

Berthing's / sailings at DBCT are permitted with the boom retracted at least 60 degrees above the horizontal with the gantry secured at the strong point adjacent the vessel's bow.

Shipping officers are to ensure that there is sufficient clearance prior to sailing the vessel.

When there is no vessel alongside the berth and any such equipment is required to have the main boom or structure down for maintenance etc, and it protrudes out from the berth, the Terminal Operator is required to notify the Regional Harbour Master or his delegate of the times that the particular piece of equipment will be in this condition. The equipment must be adequately lit during night hours.

## 5.4 Navigation aids

### 5.4.1 Fixed navigation aids

| Departure Channel    |        |             |              |           |
|----------------------|--------|-------------|--------------|-----------|
| Hay Point Channel #2 | Beacon | 21° 14.92's | 149° 24.77'e | Fl R 4sec |
| Hay Point Channel #4 | Beacon | 21° 15.30's | 149° 23.18'e | Fl R 4sec |
| Hay Point Channel #6 | Beacon | 21° 15.96's | 149° 20.80'e | Fl R 4sec |
| Hay Point Channel #1 | Beacon | 21° 15.70's | 149° 20.73'e | Fl G 4sec |

**Table 12 Navigation aids**

Please be advised of the following notations:

- Hay Point Channel #2 (Fairway Beacon) is fitted with a tide gauge and an electronic weather station.
- The beacons are fitted with GPS synchronisation.
- Mount Griffiths Light — established on the Port Administration Building located 330° (T) from Mount Griffiths. Elevation 78 metres – FI (2) 10 sec – Range 20 miles.
- The wharves and dolphins of both terminals exhibit fixed blue berthing leads at night and yellow by day at their extreme ends.

## 5.4.2 Virtual navigation aids

Virtual aids to navigation beacons have been established at Hay Point to aid the safe pilotage and navigation of deep draft vessel departing via the shipping channel. The virtual beacons broadcast on the Automatic Identification System (AIS) adopted by IALA and IMO.

A “virtual navigation beacons signal” will appear on vessels fitted with AIS 'a' or AIS 'b' receivers and indicate the following positions within the port of Hay Point:

| Virtual aid name | Latitude       | Longitude       | MMSI      |
|------------------|----------------|-----------------|-----------|
| Hay Point V.07   | 21° 15.9577' S | 149° 19.7005' E | 995036068 |
| Hay Point V.08   | 21° 16.2201' S | 149° 19.7759' E | 995036069 |
| Hay Point V.R    | 21° 15.6081' S | 149° 19.5386' E | 995036067 |
| Hay Point V.04   | 21° 15.3267' S | 149° 23.1767' E | 995031021 |

**Table 13 Virtual navigation aids**