

Amendment to Special Beach Licences for use of the foreshore and floor of the sea to carry out geotechnical investigation by China Harbour Engineering Company and the Port Authority of Jamaica; Date Received: 1 May 2014

Application Number
2014-14017-BL00010

Designer
N/A

Date Received
1 May 2014

Location
Galleon Harbour, Special Fisheries Conservation Area, Portland Bight Protected Area St. Catherine, extending south towards the ship channel including Great and Little Goat Islands

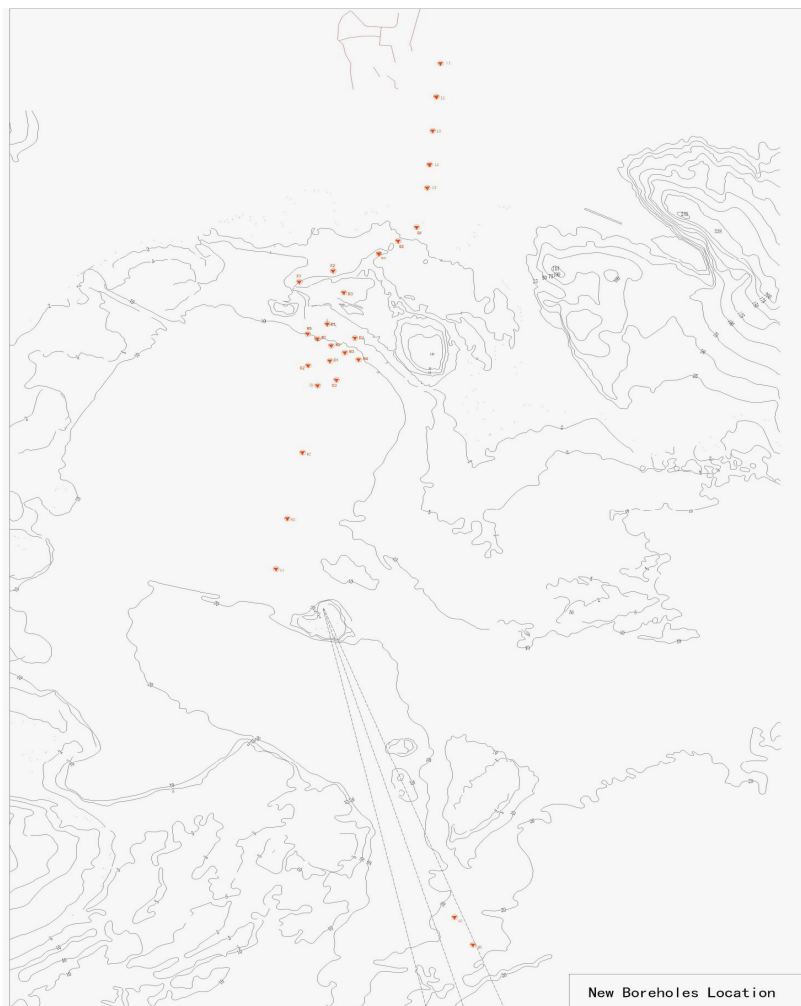


Figure 1 Showing location of new boreholes

Background

The Authority in April 2014 granted a Special Beach Licence (L3408) to Chain Harbour Engineering Company Limited for the boreholes to carry out the geotechnical survey in Galleon

Harbour, Goat Islands and surrounding waters. The approval was granted for the activities as outlined below:

The drilling of twenty-six (26) boreholes (12 sampling boreholes and 14 standard penetration test (STP) boreholes) at a distance of approximately 1-2km apart. Five (5) boreholes will be done onshore while the remaining twenty-one (21) will be done offshore (4 on-island and 17 underwater boreholes). The working footprint of each borehole will be within a 36m² area. The terrestrial boreholes are proposed to be either along the shoreline or along existing roads and hence no disturbance to vegetation is expected as a consequence of the work.

The activity will be undertaken using the xy-1 drilling rig with a 2 ton capacity driven by a diesel engine and a derrick of about 6m in height. Drilling depth will be controlled at 1-2m into medium weathered rock or 6m into highly weathered rock. The resultant cores will be approximately 75-100mm in size. Once removed from the soil, the cores will be placed into a core box, identified, described, tagged, carefully stored and sent to the lab for analysis. A log of the drilling programme will be maintained on a daily basis. The lab analysis is to determine the physical and mechanical parameters used to ascertain the bearing capacity of each soil or rock layer, ultimate skin friction and toe resistance of piles. For on-land boreholes, the drilling rig will be towed by a vehicle and moved by workers on site while for offshore boreholes the rig will be placed on cantilevered platform built on an exploration boat.

The activity is proposed to take approximately fifty (50) working days to complete (this does not include mobilization and demobilization of personnel and equipment) based on the following schedule:

- Preparation of work site - 3 working days
- Drilling, in-situ test - 37 working days
- Laboratory test - finish with 5 working days after field activity
- Interim report - 27th calendar day of starting work
- Finalized report - 5 days following completed lab analysis

Requested Amendment

The previous approval was granted to carry out twenty six (26) boreholes, five (5) onshore while the remaining twenty-one (21) offshore (4 on-island and 17 underwater boreholes). In letter dated 28 April 2014 received and date stamped by the Agency 1 May 2014 CHEC has requested to modify the number and location of the boreholes as follow: twenty seven (27) boreholes, five on land, and twenty one (21) at sea and one (1) on Goat Island.

Recommendations

Based on the review of the letter dated 28 April 2014 the Agency is recommending approval for the proposed changes. The following conditions of the Special Beach Licence for Geotechnical Survey will be required to be **amended** as follows:

The Second Schedule

Specific Condition 1 which states:

“The Licensee shall comply with all the representations made in the application number 2014-14017-BL00010 dated 15 January 2014 received and date stamped 24 January 2014 by the Natural Resources Conservation Authority and document titled ‘Implementation Plan of Geotechnical Investigation for the First-Stage Container Terminal Project in Portland Bight

Port, Jamaica’ dated January 2014 received and date stamped 24 January 2014 and any accompanying addenda.”

shall be amended to read:

“The Licensee shall comply with all the representations made in the application number 2014-14017-BL00010 dated 15 January 2014 received and date stamped 24 January 2014 by the Natural Resources Conservation Authority and documents entitled ‘Implementation Plan of Geotechnical Investigation for the First-Stage Container Terminal Project in Portland Bight Port, Jamaica’ with the exception of table 2.1 Borehole Coordinates dated January 2014 received and date stamped 24 January 2014; “ First Phase of Jamaica Portland Container Terminal Statement for Changing of Engineering Survey & Geotechnical Investigation” dated 24 April 2014 received and date stamped 1 May 2014 and any accompanying addenda.”

Specific Condition 5 which states:

“The Licensee shall ensure that boreholes are drilled only at the GPS Coordinates outlined below as stated in document titled ‘Implementation Plan of Geotechnical Investigation for the First-Stage Container Terminal Project in Portland Bight Port, Jamaica’ dated January 2014 received and date stamped 24 January 2014:”

No.	Borehole type	coordinate	
		longitude	latitude
ZK01	sampling borehole	77°05'10.3"W	17°48'39.7"N
ZK02	SPT borehole	77°04'48.3"W	17°50'29.2"N
ZK03	sampling borehole	77°05'4.0"W	17°51'59.4"N
ZK04	SPT borehole	77°04'34.6"W	17°51'42.9"N
ZK05	sampling borehole	77°04'5.2"W	17°51'26.4"N
ZK06	SPT borehole	77°04'46.8"W	17°52'27.5"N
ZK07	sampling borehole	77°04'17.3"W	17°52'11.2"N
ZK08	SPT borehole	77°03'47.9"W	17°51'54.4"N
ZK09	sampling borehole	77°04'29.5"W	17°52'55.7"N
ZK10	SPT borehole	77°04'0.0"W	17°52'39.1"N
ZK11	sampling borehole	77°03'30.5"W	17°52'22.7"N
ZK12	SPT borehole	77°04'12.1"W	17°53'24.0"N
ZK13	sampling borehole	77°03'42.7"W	17°53'7.2"N
ZK14	SPT borehole	77°03'13.3"W	17°52'50.8"N
ZK15	sampling borehole	77°03'41.2"W	17°53'44.3"N
ZK16	SPT borehole	77°03'14.7"W	17°54'4.8"N
ZK17	sampling borehole	77° 3'0.67"W	17°54'46.73"N
ZK18	SPT borehole	77°02'58.9"W	17°55'9.0"N

ZK19	sampling borehole	77°02'56.0"W	17°55'41.4"N
ZK20	SPT borehole	77°02'53.1"W	17°56'13.9"N
ZK21	sampling borehole	77°02'49.5"W	17°56'45.9"N
ZK22	sampling borehole	77°04'40.9"W	17°52'24.3"N
ZK23	SPT borehole	77°04'35.0"W	17°52'21.0"N
ZK24	sampling borehole	77°04'29.0"W	17°52'17.6"N
ZK25	SPT borehole	77°04'23.3"W	17°52'14.3"N
ZK26	SPT borehole	77°04'11.4"W	17°52'7.6"N

shall be amended to read:

“The Licensee shall ensure that boreholes are drilled only at the GPS Coordinates outlined below as stated in document titled “ First Phase of Jamaica Portland Container Terminal Statement for Changing of Engineering Survey & Geotechnical Investigation” dated 24 April 2014 received and date stamped 1 May 2014.”

NAME	LONG.	LAT.
L01	77°2'48.07"W	17°56'43.78"N
L02	77°2'51.62"W	17°56'11.61"N
L03	77°2'54.65"W	17°55'39.63"N
L04	77°2'57.31"W	17°55'7.08"N
L05	77°2'59.21"W	17°54'45.35"N
Q01	77°3'8.33"W	17°54'7.91"N
Q02	77°3'23.97"W	17°53'54.64"N
Q03	77°3'40.51"W	17°53'42.86"N
X01	77°4'48.55"W	17°53'15.15"N
X02	77°4'19.61"W	17°53'25.18"N
D01	77°4'24.53"W	17°52'34.77"N
D02	77°4'1.02"W	17°52'21.44"N
D03	77°4'10.6"W	17°53'4.17"N
M01	77°4'32.84"W	17°52'20.73"N
M02	77°4'20.94"W	17°52'14.07"N
M03	77°4'9.63"W	17°52'7.56"N
M04	77°3'57.51"W	17°52'0.81"N
M05	77°4'41.3"W	17°52'25.6"N
C01	77°4'22.6"W	17°51'59.49"N
C02	77°4'40.94"W	17°51'55.67"N
C03	77°4'16.7"W	17°51'41.34"N
H01	77°4'32.74"W	17°51'36.3"N
H02	77°4'45.75"W	17°50'32.38"N
H03	77°4'58.48"W	17°49'28.99"N
H04	77°5'8.27"W	17°48'40.82"N
H05	77°2'35.98"W	17°43'9.21"N
H06	77°2'19.93"W	17°42'42.59"N