

Appendix F

1. Scope

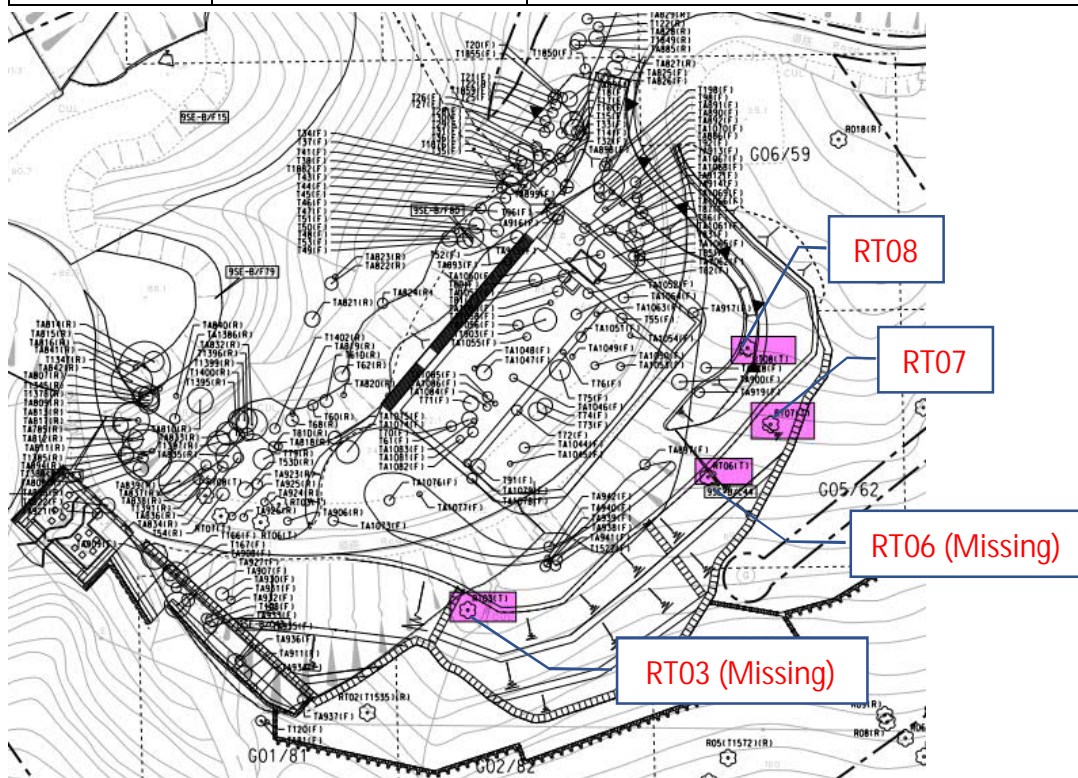
For execution of construction works, two *Gmelina chinensis* (Verbenaceae) under this contract have been identified to be transplanted. This document is to present the methodology of the transplanting works of the captioned trees.

The trees will be transplanted to designated positions or in the holding nursery. The transplanted trees will then be re-planted to the final locations as instructed by the Project Manager and maintained for a specified establishment period. The photographic records for each root pruning and transplanting will be submitted. Also, the location plan of holding nursery will also be submitted and for which is suitable for receiving the transplanted trees.

Table 1 The Target Species to be transplanted

Location plan for RT03, RT06, RT07, RT08

Tree No.	Botanical Name	Chinese Common Name
RT08	<i>Gmelina chinensis</i>	石梓
RT07	<i>Gmelina chinensis</i>	石梓
RT06 (MISSING)	<i>Gmelina chinensis</i>	石梓
RT03 (MISSING)	<i>Gmelina chinensis</i>	石梓



Please refer to Attachment 1 for the abstract of detailed tree survey report and supplementary tree photos for the captioned trees.

2. Methodology for Pre-Construction Survey

- The transplanting operations – Root Pruning should be referring to Guidelines on Tree Transplanting by DEVB.
- A root ball area which incorporates at least half of the area of the tree crown should be marked out and later a trench is dug around this area. Roots should be carefully pruned and treated with an accepted fungicidal gel. The root zone should be watered.
- The rootball size for transplanted trees should be a minimum of 1000 mm in diameter and 700 mm in depth.
- Before the commencement of root pruning, 3 wiring with anchors shall be fixed to the tree.
- The diameter of root ball shall be subject to Qualified Personnel's assessment and should be ten times the trunk diameter at breast height and not less than 1500mm diameter, and 600 – 1200mm deep to enhance survival rate for transplanting.
- For young trees – tree no. RT07 & RT08, the root pruning shall be carried out in three stages at two weeks interval.
- After completion of each stage of root pruning, trenches shall be backfilled with soil mix to encourage new growth of roots.
- When root pruning is done. The root ball shall be wrapped with damp hessian or Geotextile (Terram). Root activator and water crystal shall be applied to increase the survival rate.
- Cutting of the underside of the root ball and root ball shall be wrapped with geotextile or hessian. The space shall be filled with moist soil conditioner as transplanting of the tree to the holding nursery immediately.

3. Preservation and Translocation for Each Species

- No transplanting operations will take place until the final planting area is fully prepared and approved by the Engineer.
- Transplanting shall be carried out during early morning or late afternoon when the sun is not directly overhead. No lifting shall take place during rainfall. Trees shall be transplanted within twenty-four hours of lifting.
- A crane or lifting device shall be used to secure the tree and support its full weight when lifted without damaging the branches or trunk. No items of hardware shall be inserted into the trunk or branches for lifting or other purposes. Cables used for lifting shall be wrapped with protective rubber sheaf to prevent damage.
- Upon lifting, the root ball shall be wrapped with damp hessian and kept moist from the time of lifting until it is transplanted. Trunk shall be tied and secured on burlap material during transplanting.

- Plants shall be lifted carefully to avoid damage to rootball. Roots shall be cut free from ground, not pulled, using a suitable implement to give a clean cut.
- During transportation, trees shall be protected against excessive sunlight, wind and drought.

4. Identification of Suitable receptor Sites and Preparation

- Prior to the transplanting of the trees, tree pits and transplantation records shall be approved by the Engineer.
- The tree pit shall be prepared as follows:
 - All pits shall be 300mm-500mm greater than the size of root ball of the tree to be transplanted at all dimensions.
 - The base and sides of the pit shall be broken up to a depth of 150mm.
- For trees requiring to be held in a holding nursery at the period between lifting and planting, they shall be carefully protected and maintained. Maintenance shall include watering, weeding and if necessary, addition of fertilizer, insecticide and herbicide until the final planting location is available
- The holding nursery is well equipped with manual irrigation system. The trees maintained in the nursery will be lined up in rows with sufficient spaces in between.
- After the tree has been placed in its final position, adjust orientation of crown, backfill with topsoil which has been mixed with a slow release fertilizer at a rate of 500gm/m³.
- Backfilling shall be done in layers, each being firmly consolidated to eliminate air pockets. The base of the tree trunk shall be level with surrounding ground level and a saucer shaped depression of the diameter of the root ball shall be left to facilitate watering; The trees shall be thoroughly watered in after planting.

5. Implementation Programme

For tree no. RT07 & RT08, the tentative commencement of root pruning will be in mid-October 2021 and the corresponding tree transplanting work will be carried out in November 2021 or immediately after acceptance of this method statement.

6. Post Translocation Monitoring Programme

- The transplanted trees shall be maintained immediately after transplanting works, from existing location and maintenance shall continue for a period of time.
- Regular watering, weeding and pest control should be implemented during the maintenance period of the transplanted trees. Also, regular report as well as inspection reports should be carried out to monitor the health condition of the

transplanted trees.

i. Watering

Watering shall be more frequent during the early part of the establishment period. Watering frequency would be applied daily during the dry season (September to April). Watering shall be carried out as required during the wet season to maintain a vigorous and healthy growing condition.

ii. Stakes

Firming up of the transplanted trees and the supporting materials shall be undertaken from time to time during the period and particularly after heavy rain and/or wind.

iii. Mulching

Apply a layer of organic mulch can mimic a more natural environment and improve the plant health. The recommended mulching depth is 50mm, extending 150mm beyond the perimeter of the tree pit and covering at least the entire root ball zone.

iv. Fertilizer

Instructed by the qualified Arborist, slow-release fertilizer application would be carried out in March and September each year.

v. Tree Pruning

The transplanted trees shall be pruned to remove dead or dangerous branches follow the advice of the Tree technician.

vi. Pest and Fungal Control

Regularly check on pest and disease infection during maintenance period. Removal of diseased plant or the use of pesticide shall be applied if necessary.

vii. Inspection & Reporting

Recording the status of transplanted individuals during the establishment period and the post-establishment period until the end of construction phase, following the accepted monitoring schedule.

Attachment 1

Project Title:
Survey Area:
Inspector:
Date of Survey:

Detailed Tree Surveys for Tung Chung New Town Extension - Salt Water Supply System
Portion 3
Kenneth Kwok (ISA CA No.: HK-1798A)
13/8/2021

Tree No.	Botanical Name	Chinese Name	SIZE (M)			Amenity Value	Form	Health	Structural Condition	Suitability for Transplanting		Conservation Status	Recommendation (Retain/ Transplant/ Fell)	Justification	Additional Remarks
			Height	Trunk DBH	Spread					(Good/ Fair/ Poor)					
G82/RT-03	<i>Casuarina equisetifolia</i>	石梓	-	-	-	-	-	-	-	-	-	Yes	Transplant	Direct conflict with proposed works	Missing
G62/RT-06	<i>Casuarina equisetifolia</i>	石梓	-	-	-	-	-	-	-	-	-	Yes	Transplant	Direct conflict with proposed works	Missing
G62/RT-07	<i>Casuarina equisetifolia</i>	石梓	9	110	6	Fair	Poor	Fair	Fair	Low	-	Yes	Transplant	Direct conflict with proposed works	Young tree, on slope, leaning, broken leader, imbalanced crown, root flare was in conflict with other tree, not suitable to be transplanted
G62/RT-08	<i>Casuarina equisetifolia</i>	石梓	8	110	6	Fair	Poor	Fair	Fair	Low	-	Yes	Transplant	Direct conflict with proposed works	Young tree, imbalanced crown, broken bark



G62 RT-06_Missing



G62 RT-07__Tag



G62 RT-07__WholeView



G62 RT-08__Tag



G62 RT-08__WholeView



G82 RT-03_Missing

Supplementary Photos For RT-07 & RT-08



...NL/2020/02 Tung Chung New Town Extension
... Supply System

Gmelina chinensis 石梓

G62/RT-07
Transplant 移植



University of Queensland, St. Lawrence and St. George's
Queensland University of Technology
G62/RT-07
Transplant 移植





G5213T-01
HARRISON





2020/02 Tung Chung New Town Extension
Supply System
Gmelina chinensis 石梓
62/RT-08
ransplant 移植



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