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Unlimited

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LIMITLESS

Based on the extensive Agronomic Soil Fertility Analyses performed by Wallace Laboratories in the United States on numerous soil and compost samples, the following are the recommended soil mixes for the Downtown Jebel Ali Project:

(homogeneously blended on a volume basis, expressed per cubic meter (m³)):

- [illegible]

Cc: David Gal (SWA), Mohammed Noor Ahmed (CAPD), Michael Cienko (BLL), Medhat Khalil (Limitless), David Filice (BLL), Hisham Zanaty (Limitless), Ross Nadeau (SWA), Kin Baumgardner (SWA), Mamia Cootman (CAPD)

Safe, long-lasting slow-release, uniform, free-flowing granular high-phosphorous fertilizer that does not leach (key in sandy soils), and especially formulated for high temperature environments.

- **0.25 kg Agricultural-grade Gypsum**
Powder form. Gypsum will raise the calcium content of the plantation soil without changing the pH; Improves the structure of the alkaline soil by removing excess sodium. Also will help manage the high strontium levels as detected in testing.

PLANTATION SOIL MIX

(homogeneously blended on a volume basis, expressed per cubic meter (cm³)):

80% • **75% Sweet Soil** (source to be nominated by the Dubai Municipality).

- **15% High Quality Organic Compost** (Al Bayader Uni-Growth Compost).
This is an excellent compost; well aerated, stable, and locally-available, with >57% organic matter, 6.7 pH, a 14.0 carbon:nitrogen ratio, low salinity, sodium, and chloride, and no calcium carbonate.

5% • **10% Water-Holding Pozzolan/Zeolite ("ZeoPlant")**.
Reduces infiltration rate of water through sandy soil profile, thereby increasing the water holding capacity of the soil and the associated cation exchange capacity. Improves soil structure and increases rate of plant growth.

- **Plus the following Supplemental Amendments & Fertilizers** (added on a weight basis per cubic meter of volume):

- **0.2 kg Ureaformaldehyde Fertilizer (38-0-0 NPK)**
Safe, long-lasting Insoluble slow-release uniform, free-flowing coated high-nitrogen fertilizer that does not leach (key in sandy soils), and especially formulated for high temperature environments.
- **0.15 kg Triple Super Phosphate Fertilizer (0-45-0 NPK)**
Safe, long-lasting slow-release, uniform, free-flowing granular high-phosphorous fertilizer that does not leach (key in sandy soils), and especially formulated for high temperature environments.
- **0.25 kg Agricultural-grade Gypsum**
Powder form. Gypsum will raise the calcium content of the plantation soil without changing the pH; Improves the structure of the alkaline soil by removing excess sodium. Also will help manage the high strontium levels as detected in testing.

STRUCTURAL SOIL MIX

(homogeneously blended on a volume basis, expressed per cubic meter (cm³)):



- 80% Gap Graded Aggregate.
Uniformly-graded, durable, hard, crushed, angular aggregates, $\frac{3}{4}$ " to 1-1/2" in size.
- 20% Plantation Soil Mix (see above)
- Plus the following Supplemental Amendment (added on a volume basis per cubic meter of Plantation Soil Mix):
 - .11 kg (approx. 4 oz) Water Storing Polymer "a.k.a. Hydrogel" (a non-toxic, non-phytotoxic tackifier)

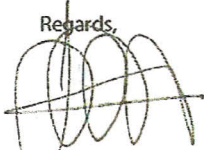
Calculations:

(Need 190 cubic meters of Structural Soil for project)

= +/-152 cubic meters of Gap Graded Aggregate.

= +/- 38 cubic meters of Plantation Soil Mix (= 1,341 cubic feet/27 = 48 cubic yards).

+ rate of Hydrogel is approx 3 oz. per cubic yard of Plantation Soil, or approx. 4 oz/cubic meter.

Regards,


Lance Lowrey (c/o David Gal)

Associate

SWA Group