

2.0 Bioswale

2.5 BIOSWALE SPECIFICATIONS

CONSTRUCTION NOTES

1. The contractor shall verify all information prior to excavation including elevations and locations of existing utilities.
2. The contractor shall notify the engineer immediately if any field conditions differ materially from those represented on these drawings and the specifications or if, in the contractor's opinion, said conditions conflict with the designs shown hereon.
3. The engineer shall inspect all planting bed/seeding areas before planting/seeding to insure that adequate drainage exists for bioswales. If any areas to be planted/seeded show evidence of poor drainage, the contractor shall take corrective action.
4. The contractor shall have all utilities marked before any excavation. If any utilities interfere with the project, the contractor shall notify the engineer.
5. The contractor shall avoid over-compacting the existing materials to avoid poor infiltration.
6. The contractor shall verify that the swale will capture stormwater runoff from the desired drainage area.
7. The contractor shall establish all elevations and lines as shown on the site plan for review by the engineer prior to construction.
8. The contractor shall verify that the subgrade is consistent with line, grade, and elevations as indicated on the site plan. Any areas showing erosion or potential ponding shall be regraded before subbase installation.
9. Immediately after the subgrade is approved by the engineer, the contractor shall begin subbase construction which includes all materials below the swale base and above the native subgrade.
10. Prior to backfilling the bioswale with bioretention media, the contractor shall scarify native soil to promote infiltration into the underlying subgrade.
11. The bioretention media layer shall be installed evenly over the native subgrade.
12. The bioswale shall have an infiltration of at least 5-30 ft/day or 50% of the hydraulic conductivity (D2434).
13. The contractor shall install a gabion basket check dam (if specified) as shown on site plans. A minimum of six inches of the basket shall be buried.
14. The contractor shall install erosion control blanket along the base and side slopes of the newly constructed swale for stabilization.

SPECIFICATIONS

1. The bioretention layer shall be comprised of 70% sand and 30% compost mixture.
2. Inlet protection for the swale shall be comprised of 3-5-inch diameter washed river stone. Stone shall be placed on geotextile fabric.
3. The gabion basket check dam shall be dura-weld galvanized and PVC coated baskets. Baskets are typically 6'x3'x1'; refer to site plan for basket size.
4. Gabion stone shall be 4-10-inch diameter washed.
5. The swale shall be seeded with contractor turf mix unless specified otherwise on plans.