

Engineers Environmental Scientists Software Developers Landscape Architects Planners Surveyors

www.bscgroup.com

JUNE 13, 2022

Heather Charles Lis Holbrook Conservation Agent Holbrook, MA 02343 Sent Via Email: <u>HLis@holbrookmassachusetts.us</u>

RE: Brigadoon Excavation Plan

Dear Heather,

BSC Group, Inc. (BSC) is pleased to submit the attached plan and following construction sequencing for the excavation of fill material from the adjacent lot to support the roadway construction of the Brigadoon Residences project. BSC has estimated that approximately 18,000 cy of sandy loam material could potentially be excavated for use under the proposed access driveway in the fill areas of the drive. To access the fill material, approximately 2,000 cy of topsoil and organics will need to be stripped and stockpiled for re-use once the excavation of the fill materials is completed to re-stabilize the area. A seed mixture of wildflowers and quick growing grasses will be planted at the completion of the work.

All work will be in accordance with the ongoing active Storm Water Pollution Prevention Plan for the site work. The Contractor shall utilize the necessary erosion and sedimentation control measures, even if not specified herein or elsewhere, to minimize erosion damage at the site to prevent the migration of sediment into environmentally sensitive areas. Environmentally sensitive areas include all wetland resource areas within, and downstream of, the site, and those areas of the site that are not being altered.

Construction Phasing

The following is the suggested order of construction that shall minimize erosion and the transport of sediments. The construction sequence is not intended to prescribe definitive construction methods and should not be interpreted as a construction specification document. However, the Contractor shall follow the general construction phase principles provided below:

- Protect and maintain existing vegetation wherever possible.
- Minimize the area of disturbance.
- To the extent possible, route unpolluted flows around disturbed areas.
- Install mitigation devices as early as possible.
- Minimize the time disturbed areas are left unstabilized.
- Maintain siltation control devices in proper condition.

Grubbing and Stripping of Limits of Construction Phase

- Install TEC devices as required to prevent sediment transport into resource areas.
- Place a ring of silt socks and/or hay bales around stockpiles.
- Remove and stockpile topsoil for re-use.
- Excavate material as required to the limits shown on the attached drawings.
- Stabilize all exposed surfaces that will not be under immediate construction.



Final Clean-up

- Clean all downstream inverts of culverts and catch basins that may have been impacted by the excavation operations.
- Remove sediment and debris form rip-rap outlet areas.
- Remove TEC devices only after permanent vegetation and erosion control has been fully established.

Site Stabilization

Grubbing Stripping and Grading

- Erosion control devices shall be in place before any excavation commences.
- Stripping shall be done in a manner, which will not concentrate runoff. If precipitation is expected, earthen berms shall be constructed around the area being stripped, with a silt sock, silt fence or hay bale dike situated in an arc at the low point of the berm.
- If intense precipitation is anticipated, additional silt socks, hay bales, dikes and /or silt fences shall be used as required to prevent erosion and sediment transport. The materials required shall be stored on site at all times.

Maintenance of Disturbed Surfaces

- Runoff shall be diverted from disturbed side slopes in both cut and fill.
- Mulching may be used for temporary stabilization.
- Silt sock, hay bale or silt fences shall be set where required to trap products of erosion and shall be maintained on a continuing basis during the construction process.

Topsoil and Seeding

- Stockpiled topsoil shall not be placed unless it is to be seeded directly thereafter.
- All disturbed areas shall have a minimum of 4" of topsoil placed before seeded and mulched.
- Consideration shall be given to hydro-mulching, especially on slopes in excess of 3 to 1.
- Topsoil and seeded slopes shall be protected from washout by mulching or other acceptable slope protection until vegetation begins to grow.

We trust that this construction sequencing meets your request for the excavation of the fill material from the adjacent parcel of land. If you require any additional information please feel free to contact me at 617-896-4347 or at <u>dbiancavilla@bscgroup.com</u>

Sincerely, BSC Group, Inc.

David P. Biancavilla, PE, LEED AP Vice President

Cc: Sid Siddharth