

Geotechnical Foundations Land Planning Geo-Structural Environmental Water Resources

Principals:

June 12, 2018via email: HSchulweis@nianticpartners.comRevised November 22, 2019Revised June 26, 2020

Harvey Schulweis Putnam Seabury Partners, LP 287 King Street Chappaqua, NY 10514 Steven P. Byszewski, PE, PP Anthony Castillo, PE Fuad Dahan, PhD, PE, LSRP Roger Hendrickson John M. Nederfield, PE Justin M. Protasiewicz, PE Kenneth Quazza, PE Michael St. Pierre, PE

RE: Geotechnical Investigation and Report Commercial Campus at Fields Corner Town of Southeast, New York SESI Project No. 9999

Dear Mr.Schulweis:

In accordance with our Professional Services Agreement dated December 7, 2017, we have completed our geotechnical investigation for the above referenced project. This report contains a description of our investigation, an evaluation of the subsurface soil and groundwater characteristics, and presents recommendations for general site preparation procedures and foundation design criteria for the proposed construction.

Enclosed are three (3) copies of the report.

If you have any questions, please call.

Sincerely,

SESI CONSULTING ENGINEERS D.P.C.

Michael St. Pierre, P.E. Principal

Encl: Geotechnical Investigation Report Dated June 26, 2020 CC: DLombardi@jmcpllc.com JSarchino@jmcpllc.com RPearson@jmcpllc.com BDarcy@jmcpllc.com

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GEOTECHNICAL INVESTIGATION REPORT

FOR

Commercial Campus At Fields Corner Route 312 and Pugsley Road Town of Southeast, Putnam County, New York

Prepared For:

Putnam Seabury Partners, LP 287 King Street Chappaqua, NY, 10514

Prepared By:

SESI CONSULTING ENGINEERS D.P.C. 12A Maple Avenue Pine Brook, NJ 07058

Project No.: 9999

DATE: June 12, 2018

Revised June 26, 2020



INTRODUCTION AND PROPOSED CONSTRUCTION

We have completed our geotechnical investigation for the proposed Commercial Campus At Fields Corner in Southeast, Putnam County, New York. The site is located west of Pugsley Road and south of New York State Route 312. The project site is currently wooded with occasional tracked trails, boulders walls, and wetlands located in the approximate middle of the site running north to south, in the west, and in the east beyond Pugsley Road. The site is bounded Pugsley Road and Fields Corner Road to the east and by a wooded area beyond; to the south by Route 312 and Barrett Road; to the west by Barrett Road and residential buildings beyond; to the north by Barrett Road and residential buildings beyond. The previous site use consisted of agricultural fields and are currently overgrown with dense low-lying vegetation and trees.

We have reviewed the Overall Grading Plan and Grading Plan 'A' through Grading Plan 'E' revision 2 plans prepared by JMC Planning, Engineering, dated March 18, 2019, last revised June 17, 2020. We understand that the proposed construction will consist of constructing two (2) warehouse buildings with footprint areas of 303,100 sf (Building A), and 630,000 sf (Building B) with associated parking, loading and roadway areas. Additionally, the development will include seven (7) proposed stormwater management areas, a trench drain along Route 312, four (4) septic fields, and several large multi-tiered retaining walls.

Topographically, based on the Overall Grading Plan and Grading Plan 'A' through Grading Plan 'E' revision 2 plans prepared by JMC Planning, Engineering, dated March 18, 2019, last revised June 17, 2020, indicate that the proposed building locations are located in moderately sloped areas, with steep slopes towards the east and west. In the southern portion of the site, grades vary from elevation $672\pm$ in the southwestern portion of Building-A and slope downward to the east towards Pugsley Road at elevation $600\pm$ and to the west at elevation $600\pm$. In the northern portion of the site, site grades vary from elevation $690\pm$ in the southern portion of Building-B and slope downward to elevation $600\pm$ in the east, to elevation $530\pm$ in the southwest, and to $600\pm$ in the northwest.

Based on the grading plans, the proposed finished floor elevations are el. 649.00 for Building-A, el. 672.50 for Building-B. Based on the existing and proposed grades provided, it is anticipated cuts up to $17\pm$ feet and fills up to $22.5\pm$ will be required to reach finished floor elevation. Similar cuts and fills will be required to reach proposed grades in the parking/roadway areas.

Detailed structural loading criteria were not provided to us at this time; however, we have assumed typical column and wall loads for this type of structure. Typical floor loads for the warehouse are anticipated to be on the order of 750 psf.

Once final site and grading plans, and structural loading are available, we should be provided an opportunity to review them to confirm that our recommendations remain valid.

FIELD INVESTIGATION

Our engineering study consisted of a site reconnaissance, a review of existing soils and geologic data, and a field investigation consisting of observing one-hundred and twenty-two (122) test-pits and twenty-six (26) borings. Nine (9) borings and nine (9) test pits were performed within the vicinity of the proposed buildings, four (4) test pits within the vicinity of the proposed retaining walls, eleven (11) borings along Pugsley road, four (4) borings along

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route 312, thirty-eight (38) test pits within the proposed septic fields, and seventy (85) test pits within the vicinity of the proposed stormwater management areas.

Soil samples suitable for identification purposes were extracted from the test pits at variable depths. All soil samples were taken to our soils laboratory for classification and appropriate geotechnical testing.

The borings were drilled within the two proposed building footprints to depths of 12 to 22.5feet below existing grade with an ATV drill-rig. The seven (7) building area test pits were advanced to depths ranging from 9.5 to $11\pm$ feet below the existing ground surface with a track-excavator at accessible locations within the footprint of the buildings. The stormwater and septic test pits were advanced to depths ranging from 5.5 to $12\pm$ ' and 8 to $10.5\pm$ ', respectively. The four (4) retaining wall test pits were advanced to depths ranging from 9 to $11\pm$ ' below grade. Ground surface elevations at the exploration locations were provided from survey data provided by others.

The approximate locations of the borings are shown on the Test Pit and Boring Location Plan included as *Figure 1*. Individual test pit logs and boring logs, which describe the materials encountered, are presented as Figures 2 through 142. A key to soil terminology is include as Figure 143. In addition, the individual supplemental test pit logs, performed in September and October of 2018, which describe the materials encountered, are included in Appendix B. The individual test pit logs, performed in November of 2019, and the individual test pits logs and borings logs, performed in January, February, and June of 2020, are included in Appendix C. The approximate locations of the supplemental test pits performed are shown on the Test Pit Location Plan Included as Figure 1.

Soil samples suitable for identification purposes were extracted from the borings at closelyspaced intervals in accordance with the Standard Penetration Test (ASTM D1586-11). For this test, a standard split-spoon sampler (2 inches outside diameter, one and three-eighths inches inside diameter) is driven into the soil by a 140-pound weight falling 30 inches. After discounting the initial six inches of penetration due to possible disturbance of the material resulting from the drilling operation, the number of blows required to advance the sampler a distance of 12 inches are recorded and designated as the standard penetration resistance or "N" value. The "N" value is an indication of the relative compactness of the soil in-situ.

Laboratory testing on samples collected from the borings consisted of seven (7) mechanical grain size analyses, one (1) Atterburg Limit test, one (1) CBR test, nine (9) percent passing No. 200 sieve analyses, and one (1) expansive index test. The results of the mechanical grain size analyses are presented on the individual boring logs and in graphical form, presented as Figures 144 thru 148. The additional two (2) grainsize analyses, Atterberg limit analysis, expansion index testing, and CBR results are included in the Appendix.

All fieldwork was performed under the full time technical observation of an engineer from SESI Consulting Engineers D.P.C. SESI located survey stakes, staked by others, for the test pits and borings in the field, maintained continuous logs of the explorations as work proceeded and coordinated the soil sampling operations in order to develop the required subsurface information.

SESI previously completed a Preliminary Subsurface Investigation report dated October 7, 1987. The investigation consisted of advancing eight (8) soil borings using hollow-stem augers and excavating fifty-two (52) test pits using a rubber-tired backhoe.

GENERALIZED SUBSURFACE CONDITIONS

Geologically, the site soils are mapped as alluvial materials composed of stratified material deposited during the Quaternary period. The upper 4 to 8 feet generally consist of silty soils and overlie coarser, stratified material consisting of intermixed sand and gravel. The percentage of gravel generally increases with depth. Bedrock is generally encountered at depths greater than 10-feet in the area.

The onsite soils are in general agreement with the geological mapping in the areas investigated for this study, with exception to the depth of bedrock which was not encountered during our investigation. The following subsurface conditions were encountered in order of increasing depth:

<u>Surficial Materials</u>: Topsoil was encountered in all building borings and test pits. The building area test pits and borings encountered a layer of topsoil with thicknesses ranging from 4 to $8\pm$ inches. The septic and storm area test pits encountered 3 to $12\pm$ " and 2 to $18\pm$ " of topsoil, respectively. Approximately 4 to $8\pm$ inches of gravel subbase with varied amounts of silt and sand was encountered below the asphalt in the roadway borings. Fill was encountered within test pits TP-49, TP-50, and TP-50A, to depths ranging from 2 to $8\pm$ feet below grade, and generally consisted of natural sandy silts used to fill the utilities and foundations from the previously demolished residences. An abandoned strip footing was encountered at $8\pm$ feet below grade in TP-49, and abandoned utilities were encountered in TP-50 and TP-50A approximately $2\pm$ feet below grade.

<u>Natural Soils</u>: Beneath the topsoil, asphalt, and fill (where encountered), the natural soils encountered in both the test pits and boring primarily consisted of light brown clayey silt to sand and clayey silt with trace amounts of gravel with occasional cobbles. Cobbles and boulders were encountered periodically throughout the test pits and borings and increased in frequency with depth.

Based on the bucket resistance during excavation of the test pits and the blow counts from the borings, the granular soils are typically in a medium dense condition and the fine-grained soils are typically in a medium stiff to hard condition.

<u>Bedrock:</u> Sound bedrock was not encountered to the depths explored; however, TP-3A, TP-4A, TP-18B, TP-20A, TP-27A, and TP-27B encountered weathered boulder/bedrock at depths ranging from 2 to 5<u>+</u> below existing grade.

<u>Groundwater:</u> Groundwater was encountered in test pits TP-54, TP-56 and TP-57, TP-101, TP-103 thru TP-105, TP-107, RWTP-2, RWTP-4, RWTP-5, RWTP-7, TP-B312-5, TP-312-6 ranging from 1.5 to $10\pm$ feet below existing grade. Borings SB-5, SB-19, SB-21, SB-22, SB-24,B-312-1 thru B-312-4 and test pits TP-17, TP-55, TP-102, TP-106, TP-27A, TP-50, RWTP-1, RWTP-3, RWTP-6, and STP- 21 did not encounter groundwater during the short period of time the holes were left open. The building and roadway borings encountered groundwater at depths ranging from 5 to $15\pm$ feet below existing grade. The septic and stormwater area test pits encountered groundwater at depths ranging from 2 to $9\pm$ ' and 20-inches to $10\pm$ ' below existing grade, respectively. Test Pits TP-10 through 12 were left open for a 24-hour period and standing water was recorded to be 3 to 13-inches below existing grade. It is probable that the groundwater may be perched within the upper fine grained materials after heavy precipitation events. Fluctuations in the groundwater should be anticipated based on the time of year and amount of recent precipitation. Mottling was observed in most of the test pits ranging from 6-inches to 7.0-feet below existing grade.

<u>Pavement Cores:</u> Borings SB-16, 18 thru 20, and SB-23 encountered 1-inch thick asphalt. Due to the poor condition of the asphalt, the asphalt would break-up during drilling. No asphalt cores were obtained. All roadway borings encountered a 4 to 8-inch thick layer of gravel subbase with varied amounts of sand and silt.

Based on the results of the expansive index testing, the existing on-site soils are within the "low" potential expansion index category in accordance with ASTM D 4829.

EVALUATION AND RECOMMENDATIONS

General

From a soils and foundation support standpoint, the existing subsurface conditions can be considered good with respect to providing satisfactory support of the planned buildings and roadways. The natural soils encountered below the topsoil are suitable for support of the anticipated building loads on conventional spread/strip foundations with a slab-on-grade. The primary negative aspects of the site are the high silt/clay content of the existing natural soils making them highly moisture sensitive and the relatively high groundwater in some areas. Groundwater will likely be encountered within the deeper building, roadway, and utility excavations. No organic materials (other than the surface topsoil) or uncontrolled fills were encountered during the investigation within the proposed building areas. If any uncontrolled fill is encountered, it should be removed and replaced.

SITE PREPARATION PROCEDURES

<u>General</u>

The site preparation procedures should consist of clearing the trees, stripping the surface vegetation, topsoil and uncontrolled fill (if encountered) from within the proposed building areas and then cutting and filling the site to grade. The existing site soils can be reused as a structural fill; however, a majority of these soils possess a high silt/clay content and will rut and weave when over optimum moisture content. Therefore, we strongly recommend that these soils be kept a minimum of 2 feet below the building slab subgrade. In order to reuse these materials, it may be necessary to treat the soils with lime/cement to achieve the required moisture contents and densities. We recommend the inorganic granular soils be used immediately below the slab and pavement subgrades.

Prior to placing any fill material in areas requiring fill to achieve the proposed subgrade elevation, the entire area should be proofrolled with a large vibratory roller (minimum 10-ton static weight) under the observation of a qualified geotechnical engineer. The proofrolling operation should consist of making a minimum of 4 complete coverages of the area. Any soft areas disclosed during the proofrolling should be excavated to stable material and backfilled with suitable material in compacted lifts to achieve a minimum of 92 percent and an average of greater than 95 percent of Modified Proctor density (ASTM D 1557). The compaction/proofrolling operations should be inspected by a qualified soils engineer. After completion of the proofrolling operations, the construction of a controlled compacted fill may commence.

The inorganic cut soils beneath the topsoil, may be used as structural fill; however, the majority of these materials possess a high silt/clay content and are moisture sensitive, they cannot be worked or compacted when significantly over optimum water content and, once wet, will require a long period of time to dry. The ease with which soil fills can be constructed

on this site will, to a degree, depend on the time of year in which construction takes place and the construction procedures utilized by the earthwork contractor. Wetting or drying of the fill soils may be required prior to their reuse. The moisture sensitive soils can also be treated with lime/cement in order to achieve the required moisture contents and densities.

Much of the site contains boulder walls used as a boundary line during prior use. These boulders could be used for deep area fills and should be placed as thinly as possible with granular materials tracked between the boulders, with the use of a large dozer, in order to eliminate void space between boulders. Alternatively, the boulders encountered during excavation or from the existing boundary walls may be crushed for use beneath the proposed building slabs or foundations. Shotrock/boulder fills should be limited to areas which will not require future access for utilities, foundations, and/or structures etc.

The fill should be placed in maximum 12-inch thick lifts, with each layer compacted to the required density using a large vibratory roller (minimum 10-ton static weight). Building area fills should be compacted to a minimum of 92 percent and an average of greater than 95 percent of the Modified Proctor density (ASTM D 1557).

Areas, which will not have any foundations or other structural loads, may be compacted to a minimum of 90 percent of the maximum Modified Proctor density (ASTM D 1557).

The fill materials may be obtained from on-site sources or from offsite borrow. Offsite borrow material, if required, should have a maximum particle size of 6 inches and the maximum amount of fines (percentage passing a No. 200 mesh sieve) should be 15% to help facilitate construction during wet weather. The "fines" should be non-plastic.

Backfill in confined areas such as utility trenches and foundations within load bearing or paved areas should be placed in maximum 6-inch thick layers and compacted to a minimum of 95 percent of Modified Proctor density.

As previously indicated, the majority of the subsurface soils encountered contained significant percentages of silt/clay and will readily soften during wet weather and from construction activity. Wetting or drying of the fill material should be accomplished as necessary to achieve the required density. The subgrade should be graded to drain and tight-rolled at the end of the day, particularly if wet weather is anticipated. In addition, stormwater runoff should be diverted away from any open excavations.

If stormwater seepage is encountered during construction, gravel filled sumps with pumps should be installed below the subgrade elevation to allow for dewatering of the excavation.

Slopes and Excavations

All temporary excavations greater than 4 feet in depth should have the sides sloped back or be appropriately sheeted and braced in accordance with all applicable codes.

Permanent soil cut and fill slopes should be limited to a maximum of 2 horizontal to 1 vertical for slopes up to 35 feet high with surcharge loads on the order of 250 psf for proposed roadways and 2ksf to 3ksf for proposed building footing loads. Our analysis consisted of performing global stability calculations along the eastern slope of Building-A through Pugsley Road, and along the southwest corner of Building-B. We should be provided with the final grading plans in order to confirm our recommendation remain valid. It should be noted that only the proposed slopes were evaluated, and the global stability analyses did

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not include the proposed retaining walls. Any changes to the slopes or loading conditions should be evaluated by SESI.

The global stability analyses was performed assuming a sandy silt and/or sandy clay soil. During the placement of fill for the steep slopes, each lift should be keyed into the existing

slope by cutting a bench into the existing slope to each lift. In addition, the lifts of fill should extend beyond the proposed slope edge to all compaction of all fill soils and then cut the slope back to the required grade. Erosion matting such as Landlock S2 Erosion Control Blanket from Propex, should be installed on all 2:1 slopes to keep the surface erosion from occurring and to help establish vegetative growth.

All excavations should be performed in accordance with OSHA requirements, including but not limited to, temporary shoring, trench boxes and benching and be evaluated by a qualified Geotechnical Engineer.

Utility Lines

The site soils will provide suitable support for utility lines. Cobbles greater than 3 inches in diameter should be removed from the utility line subgrade or a minimum 4-inch thick sand layer placed beneath the utility lines. If utility lines fall within soft soils, the excavation should be extended an additional 12 inches and replaced with ³/₄-inch clean crushed stone or clean sand and gravel.

Backfill material placed around utility lines to 6 inches above the utility line should have a maximum particle size of 1.5 inches. Backfill of utility trenches that fall within load-bearing areas should be placed in maximum 6-inch thick lifts and compacted to the same density requirements as in the building/parking areas.

FOUNDATION DESIGN CRITERIA

After the site preparation procedures described above are completed, conventional spread/strip footings and a slab-on-grade floor system may be constructed within the natural inorganic soils/compacted structural fill and may be designed for a maximum net allowable soil bearing pressure of 5,000 psf (2.5 tsf). It should be noted that the allowable bearing capacity is higher than is allowable by IBC 2015 and should be approved by the local building department. Regardless of the loads, the minimum plan dimension of isolated footings should be 36 inches and the minimum width of continuous footings should be 24 inches.

Exterior footings and those footings potentially exposed to frost action should be founded a minimum of 4.0 feet below adjacent exterior grade or as required by the local building code. Interior footings within heated building areas may be founded at conventional depths below the slab provided they are placed on the natural soils or controlled compacted fill.

Should the bottom of a footing excavation become softened during construction, the soft material should be excavated and replaced with clean ³/₄-inch crushed stone. It may be prudent to over-excavate at all footing locations and place a minimum of 6 inches of ³/₄-inch clean crushed stone. The stone will provide a stable working mat and a medium through which to pump stormwater runoff. If water is encountered, it should be controlled locally with gravel filled sumps.

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The floor slab may be designed using a subgrade modulus of 175 pci, assuming that 6 inches of Item 4 or recycled concrete aggregate with a maximum particle size of 1.5 inches

and a maximum percent passing the No. 200 mesh sieve of 12 percent is placed beneath the floor slab.

After satisfactory completion of the outlined building area preparation procedures, footings and floor slabs founded on the compacted structural fill/natural soils should have post-

construction total settlements of less than 1-inch and maximum differential settlements in a 30-foot span of less than 1/2 inch.

All retaining walls including foundation walls should be provided with positive drainage behind the wall to preclude hydrostatic pressures from developing or be designed for hydrostatic pressures.

A summary of soil design parameters is provided in the attached Table 1.

Seismic Design

The site soils have been classified as Site Class D for seismic design purposes in accordance with the 2015 International Building Code.

Based on a structural occupancy/risk category of I/II/III and information provided by the USGS: U.S. Seismic Design Maps, the following seismic design criteria should be used for this project:

Mapped Spectral Response Acceleration for Short Periods	SS = 0.222g
Mapped Spectral Response Acceleration for 1-Second Period	S1 = 0.068g
Site Coefficient	Fa = 1.60
Site Coefficient	Fv = 2.40
Spectral Response for short periods	SMS = 0.355g
Spectral Response for 1 second period	SM1 = 0.163g
Design Spectral Response Acceleration for Short Periods	SDS = 0.237g
Design Spectral Response Accelerations for 1-Second Period	SD1 = 0.108g

Retaining Walls

Several large, multi-tiered retaining walls will be required in order to attain the final site grades. The retaining wall leveling coarse subgrade should be excavated to a dense and stable subgrade and proofrolled with a vibratory roller under full-time engineering observation. The retaining wall foundation and backfill material should be placed in accordance with the design specifications. Retaining wall backfill should consist of a free-draining granular material with less than 15 percent non-plastic fines. The maximum particle size for the retaining wall backfill should be 3 inches or as specified by the design engineer. Retaining wall backfill should be placed in maximum 8-inch lifts and compacted with hand-operated compactors to achieve 95 percent of the Modified Proctor density (ASTM D1557). The proposed retaining walls should be designed by a licensed Professional Engineer. It should be noted that the majority of the on-site soils will not be able to be used within the reinforced zone of the walls due to the high silt/clay content.

Based on the presence of large boulders and due to the relatively high silt content within the existing natural soils and site grades, a large block wall such as a Recon retaining wall

would be an applicable option for this condition. The Recon gravity wall would limit the need to excavate behind the wall within the natural silty soils and minimize the need to import select materials for wall backfill.

All retaining walls should be provided with positive drainage behind the wall to preclude hydrostatic pressures from developing.

PAVEMENT AREAS

After stripping the surface topsoil, the parking lot/roadway area subgrade should be proofrolled using a loaded tandem dump truck or a large vibratory roller (minimum 10-ton static weight). Based on the proposed on-site roadway and parking grades, large cuts and fills, up to approximately 20<u>+</u> feet will be required to reach final grades. The proofrolling should consist of making 4 complete coverages of the area. If any soft areas are encountered during the proofrolling, they should be excavated to stable material and replaced with a controlled compacted fill. The thickness of individual lifts of soil fill should be limited to 12 inches. The compaction criteria for fills in the roadway areas may consist of 92 percent, except in the uppermost 2 feet where 95 percent should be achieved to provide for good pavement support. Visual observations and in-place field density tests should be made to determine the adequacy of the compaction. The proofrolling should be inspected by a qualified geotechnical engineer prior to placing any compacted fill.

Upon completion of the stripping/excavation/proofrolling operations, the fill required to attain finished subgrade elevation should be placed in lifts and compacted with the same or similar compactor as used for the proofrolling. The fill materials may be obtained from the existing inorganic onsite soils or from offsite borrow.

It should be noted that the soils are moisture sensitive and possess a high silt/clay content and will rut and weave under construction equipment when they become over optimum moisture content. Therefore, we recommend that these soils be kept a minimum of 2 feet below the pavement subgrade. These soils could also be treated with lime/cement to achieve the required moisture contents and densities.

If offsite borrow material is required, it should have a maximum particle size of 6 inches and the maximum amount of fines (percentages passing a No. 200 mesh sieve) should be 15% to help facilitate construction during wet weather. The "fines" should be non-plastic.

The fill should be compacted using a large vibratory roller (minimum 10-ton static weight) to achieve a minimum dry density of 92 percent and an average density of greater than 95 percent of Modified Proctor density as determined from laboratory test ASTM D 1557.

Based on the CBR testing results, the subgrade soils will have a CBR value (California Bearing Ratio) on the order of 5% due to the relatively high quantity of clayey silt. A representative of SESI should inspect the pavement subgrade prior to the placement of the pavement section in order to determine if it is in accordance with our estimated design criteria. The subgrade soils should be compacted at ± 2 percent of optimum moisture to 95 percent of Modified Proctor density (ASTM D 1557). The Pavement Design Analysis is included in the Appendix.

Wetting or drying of the fill material should be accomplished as necessary to achieve the required density.

SESI provided a *Pavement Design Analysis* letter, dated May 23, 2018, for the proposed Pugsley Road improvement and is included in the **Appendix**. Based on the poor condition of the asphalt within the existing Pugsley Road, the asphalt should be milled and removed. A light-duty pavement section is as follows: 1.5-inches of Type 6F – Item 403.17, 3-inches Type 3 – Item 403.13, and 6-inches Type 4 – Item 304.05. It should be noted the township may have a minimum pavement section that is greater than the light-duty pavement section provided.

STORMWATER AND SEPTIC TESTING

Infiltration testing was conducted in accordance with the New York State Stormwater Management Design Manual and was tested at test pits TP-33 thru TP-35, TP-37 thru TP-41, and TP-45 thru TP-48 with results ranging from 4.5 in/hr to 30.6 in/hr. Supplemental infiltration testing conducted in September and October of 2018 consisted of test pits TP-20A, TP-27, TP-27A, TP-404, TP-404A, TP-407, TP-412, and TP-413A with results ranging from 7 to 15 in./hr. Additional infiltration testing conducted in November of 2019 consisted of test pits TP-A1 through TP-A5 with results ranging from 7 to 12 in/hr. The results of the in-situ testing is shown on each individual test pit log. Additional infiltration testing conducted in January, February, and June of 2020 consisted of borings B-312-1 thru B-312-4 and test pits TP-AA1 thru TP-AA5, TP-A2-1, TP-A2-2, TP-A4-1 thru TP-A4-3, TP-AA6, and TP-AA7 with results ranging from 0.75 in/hr. to 20 in/hr. The results of the in-situ testing is shown on each individual test.

Percolation testing was conducted in accordance with the requirements of the Putnam County Health Department, and was conducted at test pits STP-1 thru STP-32. The percolation results ranged from 2.3 min./in. to 120 min./in. Supplemental percolation testing conducted in September and October of 2018 consisted of test pits STP-1, STP-2, STP-8, STP-12, STP-101, STP-102, STP-103, and STP-104. The percolation results ranged from 6.0 min./in. to 40 min./in. The results of the in-situ testing is shown on each individual test pit log.

TESTING REQUIREMENTS

During the placement of all fill, visual observations and in place density tests should be performed to determine the adequacy of the fill. Density testing should be done in accordance with the following minimum frequency requirements, or as determined by the geotechnical engineer:

Building Areas: Minimum of 4 tests per 12-inch lift; spacing not to exceed 50 feet between test locations.

<u>Parking/Roadway Areas:</u> Minimum of 3 tests per 12-inch lift; spacing not to exceed 100 feet between test locations.

Minimum density requirements are outlined in the previous sections of this report.

INSPECTION

The recommendations presented in the previous sections of this report are based on the assumption that the site preparation procedures will be done under engineering inspection by a representative of SESI Consulting Engineers D.P.C. We should inspect the proofrolling operations, the over-excavation (if required), the placement of the compacted fill, and the bottom of the footing excavations prior to the placement of concrete and/or stone. Visual observations and in-place density testing should be done throughout fill construction to determine that the work is done in accordance with our recommendations.

LIMITATIONS

The subsurface investigation performed identifies the subsurface conditions only at the locations of the explorations and at the depths where the samples were taken. SESI Consulting Engineers D.P.C. reviews the published geologic data and the field and laboratory data and uses their professional judgment and experience to render an opinion on the subsurface conditions throughout the site. Because the actual subsurface conditions may differ, we recommend that SESI be retained to provide construction inspection in order to minimize the risks associated with unanticipated conditions.

This report should not be used:

- 1. When the nature of the proposed building is changed;
- 2. When the size or configuration of the proposed building is altered;
- 3. When the location or orientation of the proposed building is modified;
- 4. When there is a change in ownership; or
- 5. For application to an adjacent or any other site.

SESI shall not accept any responsibility for problems, which may occur if SESI is not consulted when there are changes to the factors considered in this report's development.

The soil logs should not be separated from the Engineering Report in order to minimize the possibility of soil log misinterpretation.

DISCLAIMER

This Report was prepared by SESI for the sole and exclusive use of Putnam Seabury Partners, LP. Nothing under the Professional Services Agreement between SESI and its client, Putnam Partners, LP shall be constructed to give any rights or benefits to anyone other than Client and SESI, and all duties and responsibilities undertaken pursuant to the Agreement will be for the sole and exclusive benefit of Client and SESI and not for the benefit of any other party. This Report has been prepared and issued subject to the express condition that same is not to be disseminated to anyone other than Client, without the advance written consent of SESI (which SESI, in its sole discretion, is free to grant or withhold). Use of the Report by any other person is unauthorized and such use is at the sole risk of the user.

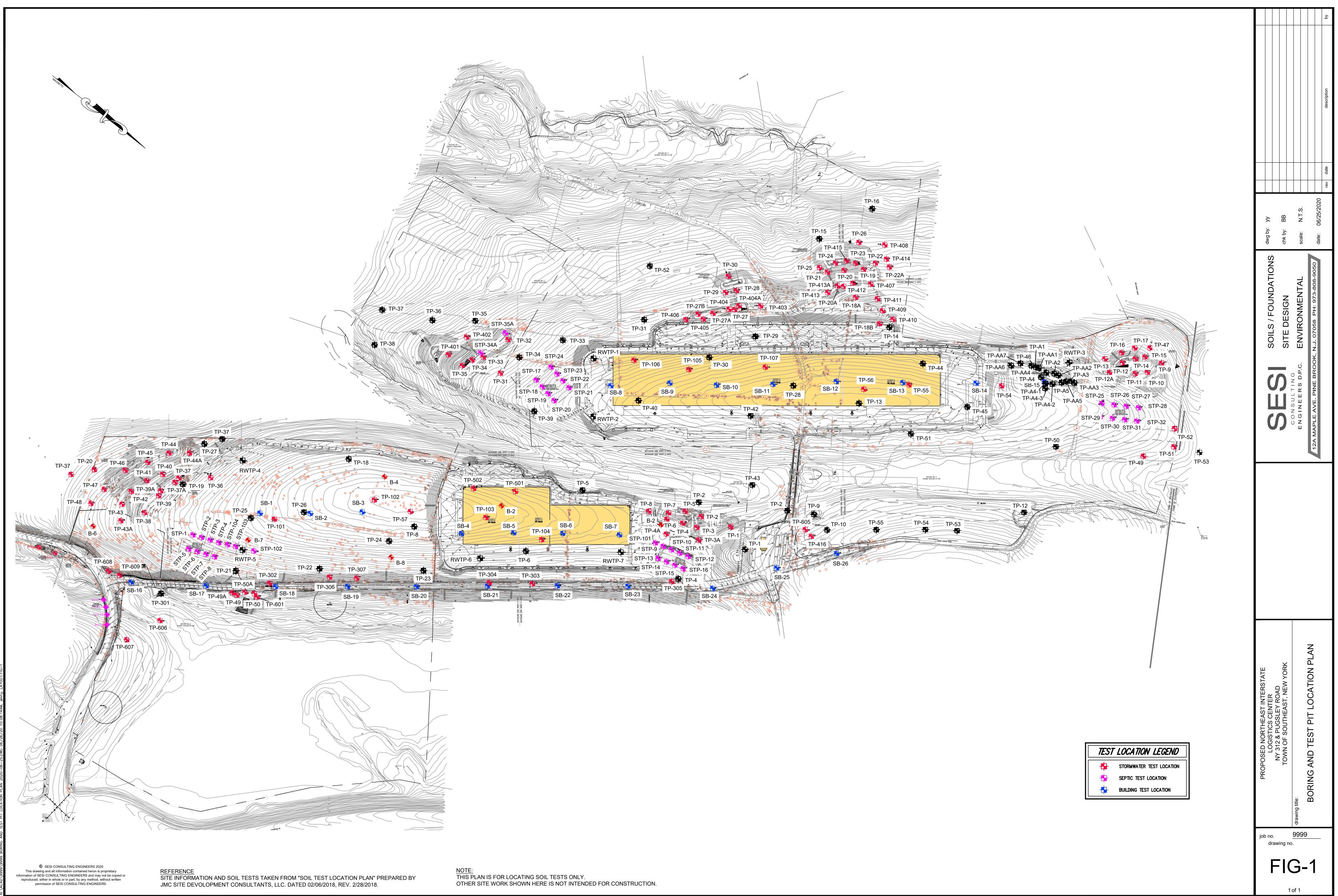
TABLE I

SUMMARY OF SOIL DESIGN PARAMETERS

PARAMETER	VALUE
1. Allowable Bearing Capacity (net)	5,000 psf (2.5 tsf)
2. Total Unit Weight	125 pcf
 Angle of Internal Friction - Backfill against Structures 	28 degrees
 Earth Pressure Coefficient (See Note 1) Active Earth Pressure (Ka) Earth Pressure @ Rest (Ko) Passive Earth Pressure (Kp) 	0.35 0.55 2.9
8. Coefficient of Sliding (concrete over soil)	0.45
 Subgrade Modulus for Floor Slab Design Granular Fill 	175 pci
10.CBR (California Bearing Ratio)	5%
 Slopes (above groundwater) (See Note #3) Maximum Cut Slope in Soil Maximum Fill Slope in Soil 	2.0 H:1V 2.0 H:1V
12. Seismic Design Criteria- Site Class	D
13. Minimum Footing Depth (exterior footings)	4.0 feet

Notes:

- 1.) A drainage medium should be installed along all retaining walls to avoid hydrostatic pressures from developing.
- 2.) Compaction equipment used within 5<u>+</u> feet of permanent walls should not weigh more than 5,000 pounds.
- 3.) Recommended slopes in #11 above do not consider surcharge loading above unless specifically noted in the report. Any slopes greater than 15 feet high and/or have surcharge loading above should be further evaluated by a geotechnical engineer.



	<u> </u>	FS	51				NAME:	F		d Logistics		er	BORING NO. SB-				
	00	NSULTI	NQ		<u> </u>		CATION:			east, New			JOB NO.				9999
		GINEEF			-		ETHOD:	_								50.0'	
	NG BY:		GBI				ARTED:		2018	GROUNDWATER TABLE DEPTH							
	ECTOR:		MZ		DATE	COMP	LETED:	3/23	2018	0 Hr. 8± Date 3/23/18 24 Hr. N/A D						Date	N/A
DEPTH	SAMPLE	REC	DEF		1	Blows o	on Spoon		N								Symbo
(ft)	No.	(1.)	FROM	TO		Laura	Louis	4.0.00.4	41.1.1011	8	SOIL E	DESCRI	PTION AN	ND STRAT	IFICATIC	DN	
0	0.1	(ln)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)		711		_				USCS
	S-1	8*	0		2	3		_	5	18" Topso	M.						1
	S-2	14 ⁿ	2	2		-	2	1									
	3-2	14.	4	4	5	7	8	-	15				, little coar	se to fine Sa	ind, trace	Gravel,	
5		_	-	4	-		0	7		with occasi	onal C	obbles					-
-	S-3	20*	5		11	8				5						1	-
	6-0	20	-	7	11	0	12	9	20	Same							
	S-4	12"	7		8	14	12	7	31	Same							
		14	· /	9	0	14	17	20	21	Same							
10				,			11	20									
	S-5	20"	10		9	10			27	Same						5	-
				12		10	17	20	41	Samo							
								20									
								-									-
16								_	-								
	S-6	20"	15		28	38		-	81	Same						00	
				17			44	39	01	CONTROL							
20																	
	S-7	NR	20		29	53			93	No Recover	v						-
				22		_	40	40									-
	-				li Ti						BC	RING C	OMPLET	ED AT 22±	FEET		
25																	
																	-
30																	
- 0																	
35																	
40																	

Lagra ante		P. FORMET FINISHINGER, WOTH, WEIght OF FIRINGER, WORK, WEIght OF ROL
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
Drop of Hammer on Drive Pipe	lin	engineers recommendations contained in the report from which these logs were extracted.
		or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
		to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
		It is made available to authorized users only that they may have access to the same information available
Nominal I.D. of Spilt Barrel Sampler		
INOMINAL I.D. OT HOLE	l in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client,

Approximate Change in Strata: _____ Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	-	-			P		NAME:		Inches	d Logisti	on Cast		BORING	NO		2 BORING		
	S	ES	51		-		ATION:			a Logisu Ieast, Ne		21	JOB NO.	NU,				
	00	NSULTI	NG		-		ETHOD:										999	
200	NG BY:	GINEEF	GBI	_	-					w Stem	Auger			DELEVAT	33.0'			
_							ARTED:		3/23/2018 GROUNDWATER TABLE DEPTH 3/23/2018 0 Hr. 10± Date 3/23/18 24 Hr. N/A Date									
DEPTH	CTOR:		MZ	WTLL	DATE	DATE COMPLETED:			/2018	0 Hr.	1 0'±	Date	3/23/18	24 Hr.	N/A	Date	N/A	
	SAMPLE	REC			-	Blows o	on Spoor	1	N								Symbo	
(ft)	No.	(1-)	FROM	TO	-	Laura	4040	4.0.10.4	1		SOILD	ESCRI	PTION AN	ID STRAT	FICATIO	N		
0	0.1	(In) 8"	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)	-							USCS	
	S-1	8"	0		2	2			4		Topsoil						-	
		101		2			2	6		ł								
	S-2	12"	2	4	10	14	50.00		64	1				se to fine Sa	nd, trace			
_				4	-	-	50/3"			Gravel, v	with occas	sional C	obbles				-	
5	6.2	14 ⁿ														-	-	
	S-3	14"	5		6	6			14	Same	•							
	8.4	108		7	1.0	10	8	9										
	\$-4	18"	7	_	15	15		-	25	Same							-	
10				9	-	-	10	9	-									
IV.	8-5	6"	10	_	12	26		_	40	0						-	-	
	8-3	0	10	10	12	20	- 00	00	46	Same							<u> </u>	
	0.0	0.1	10	12			20	20									<u> </u>	
	S-6	8"	12		24	50/3"				Same							-	
40				14	-	-					BC	ORING (COMPLET	ED AT 13±	FEET			
15						-		_								-		
					-	-												
			$ \rightarrow $		-													
20					· · · · · · ·													
20					-													
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40																1		

Nominal I.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel		or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe		engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	· ·
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

í –	C	EC	21		PF	ROJECT	NAME:	F	Propose	d Logist	ics Cent	er	BORING	NO.		8	3B-3
	U						CATION:			east, Ne			JOB NO.				999
		GINEEF					ETHOD:			w Stern	Auger		-	D ELEVATI			69.0'
	NG BY:		GBI				ARTED:		3/23/2018 GROUNDWATER TABLE DEPTH								
	ECTOR:		MZ DEF	-	DATE		LETED:	3/23	3/23/2018 0 Hr. 5'± Date 3/23/18 24 Hr. N/A							Date	N/A
DEPTH	SAMPLE	REC	FROM	то		Blows o	on Spoor	ı	N		901 I			ND STRATI			Symbol
(ft) 0	No.	(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bi/ft)		SOIL I	JESCRI		ND STRAT	FICATION	N.	USCS
0	S-1	12"	0	(14)	3	3	12/10	10/24			and a large state						0808
	5-1	14	- U	2	3	3	2	3	5	1 10	psoil	_	_			F	
	S-2	14"	2	-	4	6	-	3	13	I isht De		СП 1	1	rse to fine Sa			
		44	-	4	- T	0	7	5	15	1	with Occ			use to THE 91	nd, nace		
5						-	<u> </u>			Giavos,	will 000		000105				
-	S-3	14"	5	_	3	7			14	Same						5	
		_		7			7	8									<u> </u>
	S-4	24"	7		8	12		_	22	Same							-
				9			10	10									_
10																	
	S-5	12"	10		6	13			33	Same						1	
				12			20	23									
	S-6	16"	12		28	34			87	Same							
				14			53	40									
15											BOI	NING CO	MPLETE	D AT 14± FE	ET ON		
												PR	OBABLE I	BOULDER		1	
								i									
						_											
20																	
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25				_												_	
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	-		-														
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- 1				_													-
40			-		_												-
						_											L

		Approximate Change in Strata: Inferred Change in Strata:
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
Drop of Hammer on Drive Pipe	in	engineers recommendations contained in the report from which these logs were extracted.
Weight/type of Hammer on Split Barrel	140 ib	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Nominal I.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	<u> </u>	FS	SI -		Fr Fr		NAME:			d Logistics Center		ORING NO. SB-4			
			Ng				CATION:			east, New York	JOB NO.		999		
_	EN	GINEEF	8	_			ETHOD:			w Stem Auger	GROUND ELEVATION:	68	58.0'		
	NG BY:		GBI		+		ARTED:		/2018	GROUNDWATER TABLE DEPTH					
	ECTOR:		MZ		DATE		LETED:	3/23	/2018	0 Hr. 10 ¹ Date	3/23/18 24 Hr. N/A	Date	N/A		
DEPTH (ft)	SAMPLE	REC	DEF			Blows o	on Spoon		N	SOIL DESCRI	PTION AND STRATIFICATION	J	Symbo		
Ó	No.	(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)				USCS		
	S-1	12"	0		2	2			5	Topsoil		5			
				2			3	5							
	S-2	8"	2		8	11			61		, little coarse to fine Sand, trace				
			-	4			50/3*	-		Gravel, with occasional C	obbles				
5						-						-	-		
	<u>S-3</u>	5"	5		6	6			12	Same with Root fibers					
				7		-	6	6					-		
	<u>S-4</u>	8"	7	-	9	9		10	23	Same			-		
40		_		9	-	-	14	13	i;						
10	S-5	20"	10		3	12			24	8		-			
	8-3	20"	10	12	3	12	14	12	26	Same					
				12	-		14	13					<u> </u>		
		_		-		-							<u> </u>		
15									-				-		
10	S-6	18"	15	-	21	23	+		44	0		77	<u> </u>		
	3-0	19	15	17	21	23	21	23	44	Same with Cobbles			<u> </u>		
				17			41	23	-		TOLOT PERMIT		<u> </u>		
		_						_		BORING	COMPLETED AT 17± FEET				
20								-	-						
20				-		-	\vdash	_				170			
													<u> </u>		
						-		-							
					-										
25								-					-		
	-			-		-						1.0			
					1			-							
					1								-		
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30															
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35					1										
Ì															
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40															

		The subsurface mitormation shown hereon was obtained for the design and estimating purposes for our client.
Iominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Velght/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Velght/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
rop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
	ominal I.D. of Split Barrel Sampler /eight/type of Hammer on Drive Pipe /eight/type of Hammer on Split Barrel rop of Hammer on Drive Pipe	Image: Second

Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

FIGURE 5

	C		21		P		NAME:		Propose	d Logistics Center BORING NO. \$	B-5			
	0					LOC	CATION:		South	east, New York JOB NO. 9	999			
	EN	GINEEF	NG 16			М	ETHOD:		Holic	w Stem Auger GROUND ELEVATION: 65	58.0'			
BORI	NG BY:		GBI		D	ATE ST	ARTED:	3/23	/2018	GROUNDWATER TABLE DEPTH				
	CTOR:		MZ		DATE	E COMP	LETED:	3/23	/2018	OHr. NE Date 3/23/18 24 Hr. N/A Date N	A			
DEPTH	SAMPLE	REC	DEP	тн		Blower	on Spoor		N	n	Symbo			
(ft)	No.	REO	FROM	то		DIOWOC	in opoor		IN .	SOIL DESCRIPTION AND STRATIFICATION	Symbo			
0		(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)		USCS			
	S-1	6"	0		3	2			5	Topsoil				
				2			3	8						
	S-2	14"	2	_	6	12			24	Light Brown Clayey SILT, little coarse to fine Sand, trace				
				4			12	11		Gravel, with occasional Cobbles				
5	· ·													
	S-3	14"	5		9	8			17	Same				
				7			9	8						
	S-4	14"	7		10	13			28	Same with Dark Brown/Black Sand				
				9			15	12						
10														
	S-5	24"	10		11	14			33	Light Brown Clayey SILT, little coarse to fine Sand, trace				
				12			19	18		Gravel				
		_							[]					
15														
11	S-6	NR	15		12	14			34	No Recovery				
				17			20	38						
										BORING COMPLETED AT 17± FEET				
20				_										
								_						
										-				
	_													
25				-	-	_		_						
1				-				_						
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20						-			_					
30														
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TV														

Nominal I.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	in	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

									2011							
	<u> </u>	ES	21				NAME:	F		d Logistics Center BORING NO. SB						
							ATION:			east, New York JOB NO. 999						
L	EN	QINEEA	*				ETHOD:			w Stem Auger GROUND ELEVATION: 652	2.0'					
<u> </u>	NG BY:		GBI				ARTED:		/2018	GROUNDWATER TABLE DEPTH						
<u> </u>	CTOR:		MZ		DATE	COMP	LETED:	3/23	/2018	0 Hr. 15'± Date 3/23/18 24 Hr. N/A Date	N/A					
DEPTH	SAMPLE	REC	DEP			Blows o	n Spoon	1	N							
(ft)	No.		FROM	то						SOIL DESCRIPTION AND STRATIFICATION	Symbol					
0		(in)	(ft)	(ft)	0/6	<u> </u>	12/18	18/24	(bl/ft)		USCS					
	S-1	4"	0		6	5			11	Topsoil						
				2		<u> </u>	6	6								
	S-2	14"	2		7	5		_	11	Light Brown Clayey Silt, and coarse to fine Sand, trace fine Gravel, with Cobbles						
				4			6	8		(-200) = 49.0% W.C. = 13.1%						
5																
	S-3	18"	5		4	7			11	Same						
				7			4	7								
	S-4	15"	7		8	6			11	Same						
				9			5	11								
10								<u>i i</u>								
	S-5	16"	10		6	9			22	Light Brown Clayey SILT, some coarse to fine Sand, trace						
		-		12			13	16		Gravel, with Cobbles						
								-								
15											i i i					
	S-6	6"	15		13	16		i li	37	Light Brown Clayey SILT, little coarse to fine Sand, trace						
				17			21	22		Gravel, with Cobbles						
										BORING COMPLETED AT 17± FEET						
20										_						
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25																
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 ib	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	in	engineers recommendations contained in the report from which these logs were extracted.
Core Size	in	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	0	100 M			PF		NAME:	5	Inner	d Logistics Cente	12°	BORING	NO		6	B-7
	- 5	ES	51				CATION:			east, New York		JOB NO. 9999				
		NEULTI					ETHOD:		_	w Stern Auger	_					47.0'
	NG BY:	GINEEF	GBI				ARTED:		/2018	ow Stem Auger GROUND ELEVATION: GROUNDWATER TABLE DEPTH						¥7.0
	CTOR:		MZ				LETED:		/2018	0 Hr. 7±	Date				Date	
DEPTH			DEP	тн	DATE		LETED:	3/22	2018	UHr. /1	Date	3/22/18	24 11.	NA	Date	N/A
(ft)	SAMPLE	REC	FROM	то	1	Blows of	on Spoor	1	N	SOIL D	ESCRI				J	Symbo
0	No.	(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)		LOOK		DONAN			USC
	S-1	12"	0		1	2		1	6	Topsoil						
				2			4	5								
	S-2	16"	2		4	6			12	Light Brown Clay	ey SILT	, little coan	se to fine Sar	id, trace		
				4			6	5		Gravel, with Cobb		-		-		
5										1						
	S-3	20"	5		4	11			25	Light Brown/Gray	Clayey	SILT, little	coarse to fin	ie Sand,		1
				7			14	16		trace Gravel, with						<u> </u>
	S-4	20"	7		10	13			63	Light Brown Claye	ey SILT	, little coars	se to fine Sar	id, trace		
				9			50/3*			Gravel, with Cobb						
10]						
	S-5	14"	10		29	48			106	Same						
				12			58	22								
										1						
										1						
15																
	S-6	16"	15		12	11			36	Same					100	
				17	l.		25	31		Ī						
					l											
20																
	S-7	16"	20		23	12			28	Light Brown/Gray	Clayey	SILT, little	coarse to fin	e Sand,		
	Ī.			22			16	27		trace Gravel, with	Cobbles	1				
								[]		BO	RING (OMPLET	ED AT 22± 1	FEET		
	·······				·											
25																
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30																
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										-						
- 1																
35																
i i															6	
40																

Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C	FS	21		PF	OJECT	NAME:	F	Propose	d Logistics Center BORING NO.	SB-8 9999				
	J					LOC	ATION:		South	east, New York JOB NO. S					
		GINEEF	18	_		ME	ETHOD:		Holk	w Stem Auger GROUND ELEVATION: 6	60.0'				
	NG BY:		GBI				ARTED:	3/22	/2018	GROUNDWATER TABLE DEPTH					
	ECTOR:		MZ		DATE	COMP	LETED:	3/22	/2018	0 Hr. 10'± Date 3/22/18 24 Hr. N/A Date	N/A				
DEPTH (ft)	SAMPLE	REC	DEF	лн то		Blows o	n Spoor	1	N	SOIL DESCRIPTION AND STRATIFICATION					
0	No.	(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)		USCS				
	S-1	12"	0		3	5			10	Topsoil					
				2	1		5	5							
	S-2	14 ⁿ	2	_	5	12			28	Light Brown Clayey SILT, little coarse to fine Sand, trace					
				4			16	17		Gravel, with Cobbles	1				
5										2	-				
	S-3	12"	5		7	9			19	Same (mottled)					
				7			10	10							
	S-4	14*	7	-	10	17			30	Same	-				
10				9	-		13	17	-		-				
10	S-5	7"	10		27	50/3"			-	Light Deserve Classes OT T little agains to Gas Gas & tone	+				
	<u> </u>	/	10	12	41	5013		-		Light Brown Clayey SILT, little coarse to fine Sand, trace Gravel, with Cobbles	<u> </u>				
					-				-	Chavel, will Coopies	-				
15								_			-				
	S-6	3"	15		50/3"	- 1			1.0	Light Brown Clayey Silt, some coarse to fine gravel, little coarse to fine Sand	1				
				17											
										BORING COMPLETED AT 17± FEET ON					
										PROBABLE BOULDER					
20				_						_					
										2					
											-				
							_								
25							-								
20				-	-	-	-	_		-					
									-		-				
30															
											1				
				1											
									_						
									-						
35				_						7					
l.															
40				_			-	_							
40															

Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Spilt Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer, WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C			P	ROJECT	NAME:	F	Propose	d Logistics Center BORING NO. SE	B-9						
	0	ES					CATION:				99					
	COL	GINEEF	NG 18				ETHOD:				670.0'					
BORI	NG BY:		GBI		D,		ARTED:		/2018	GROUNDWATER TABLE DEPTH						
NSP	ECTOR:		MZ				LETED:		/2018	0 Hr. 101 Date 3/19/18 24 Hr. N/A Date N/A	A					
DEPTH	SAMPLE	REC	DEP			Blows	on Spoor	1	N							
(ft)	No.		FROM	то		Diotio				SOIL DESCRIPTION AND STRATIFICATION	Symbo					
0		(In)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)		USCS					
	S-1	12"	0		2	2			4	4" Topsoil						
				2			2	4								
	S-2	15"	2		12	12			19	Light Brown Clayey SILT, little coarse to fine Sand, trace						
			-	4	-		7	5		Gravel						
5																
	S-3	16"	5		3	6			16	Light Brown Clayey SILT, little coarse to fine Sand, trace Gravel						
				7			10	30/2"								
						-			×							
44	S-4	NR	8		6	7			15	No Recovery	-					
10			-	10		-	8	18			1					
	S-5	18"	10		12	24			63	Light Brown Clayey SILT, little coarse to fine Sand, trace						
	-			12			29	26		Gravel with Cobbles and Boulders						
								_			_					
				_	-	-		_								
15						-			_		_					
	S-6	14"	15		24	41			107	Light Brown Clayey SILT, little medium to fine Sand, trace						
				17		-	66	58		Gravel						
				_	-	-				BORING COMPLETED AT 17± FEET ON						
00		_				-		_	_	PROBABLE BOULDER						
20					-	-										
		_						_								
								_								
25								_								
20	-				-											
								_								
										-						
										-						
30										-						
50	-						-		-							
		_						-		-						
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35						-			-	-						
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Nominal I.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C	ES	21		PF	ROJECI	NAME:	F	Propose	d Logistics Center	BORING	NO.	S	SB-10		
		NSULTIN					ATION:			east, New York	JOB NO.		S	999		
-	EN	GINEEA	8		-		ETHOD:		_	in the second se		ELEVATION:	6	81.0'		
-	NG BY:		GBI	_			ARTED:		/2018			ER TABLE DEPTH	-	N/A		
	ECTOR:		MZ	MT-1		COMP	LETED:	3/19	/2018	0 Hr. 10 ¹ / ₂ Date 3/19/18 24 Hr. N/A Date						
DEPTH (ft)	SAMPLE No.	REC	FROM	тн то	1	Blows o	n Spoor	1	N	SOIL DESCRIP	1	Symbo				
0	110.	(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)					USCS		
	S-1	12"	0		2	3			7	2ª Topsoil						
				2			4	9								
	S-2	22	2		9	10			24	Light Brown Clayey SILT,	some coar	se to fine Sand, trace				
				4	-		14	15		Gravel						
5			-		-											
	<u>S-3</u>	12*	5		8	8			16	Light Brown Clayey SILT,	little coars	e to fine Sand, trace				
	6.4	22"		7			8	7	4.5	Gravel, with Cobbles						
	<u>S-4</u>	22"	7		6	6			13	Same						
10				9		-	7	6								
IV.	S-5	9"	10		39	23			53	Light Brown Clayey SILT,	little soo	to fine Cand tenco				
	5-5		10	12		20	30	29	33	Gravel, with Cobbles		<u> </u>				
								~			vel, with Cobbles					
														-		
15																
	S-6	6"	15		13	24			54	Same				<u> </u>		
				17			30	34								
					<u> </u> !											
20																
	S-7	14"	20		7	14			_	Gray/Green Clayey SILT, li	ittle coarse	to fine Sand, trace		L		
				22			17	18		Gravel						
									_	BORING C	OMPLETE	D AT 22± FEET				
25				_				-						<u> </u>		
20														-		
									-					<u> </u>		
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30																
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35																
			_	_		_										
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C	ES	21		PF	ROJECT	NAME:						BORING NO. SB-1 1				
	J					LOC	ATION:	_	South	east, New York		JOB NO.			1	9999	
		GINEER	18	_			ETHOD:		Hollo	w Stem Auger		GROUN	D ELEVATK	DN:	ð	82.0'	
BORIN	NG BY:		GBI			ATE ST/		3/19/2018		GROUNDWATER TABLE DEPTH							
_	CTOR:		MZ		DATE	E COMP	LETED:	3/19	/2018	0 Hr. 10'±	Date	3/19/18 24 Hr. N/A Date		Date	N/A		
DEPTH	SAMPLE	REC	DEF			Blows o	n Spoon		N							Symb	
(ft)	No.		FROM	TO						SOIL DESCRIPTION AND STRATIFICATION					N	USC	
0		(in)	(ft)	(ft)	0/6		12/18	18/24	(bl/ft)								
	S-1	9º	0		2	5		_	9	_2" Topioil							
		101		2			4	3			-	-		_		-	
	S-2	10"	2		8	11		-	20	Light Brown SILT, some coarse to fine SAND, trace Gravel Light Brown Clayey SILT, little coarse to fine Sand, trace							
5	S-3	14*	4	4	5	8	9	9									
0	3-3	14.	4	6	3	0	12	13	20								
	S-4	20"	6	0	14	11	12	13	22	Gravel							
	0-4	20		8	47	11	11	6		Same							
	S-5	14*	8		24	14		5	20	Light Brown Cla	VEN STIT	little open	e to fine Con	d trace		1-	
10				10			6	11	20	Gravel	<i>усу</i> зш.1	, mus coan		ч, цасо		-	
	S-6	6"	10		60	50/2*			-	Same						1	
				12			- 1		-	Dame				-			
								_		1						-	
										1							
15																-	
	S-7	12"	15		18	19			39	Light Brown Clay	yey SILT	, some coar	se to fine Sa	nd, little		-	
10				17	i i		20	26		Gravel							
	1																
]]								
20																	
	S-8	1"	19		50/3"	-			- 1	Light Brown Clayey SILT, trace Sand, trace Gravel with Cobbles							
				20			-	-		BORING COMPLETED AT 19.1± FEET							
					_			-								<u> </u>	
25	-				-										_	-	
		_														-	
									-								
30	-	-			-		-		-								
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer, WOH: Weight of Hammer, WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C	ES	21		PF	PROJECT NAME: Proposed Logistics Center BORING NO.									
							ATION:		Southeast, New York JOB NO.						
_	EN	GINEEF	16		_		ETHOD:		Holic	w Stem Auger GROUND ELEVATION: 6					
_	NG BY:		GBI				ARTED:	3/22	/2018	GROUNDWATER TABLE DEPTH					
	ECTOR:		MZ		DATE		LETED:	3/22	/2018	0 Hr. 5'± Date 3/22/18 24 Hr. N/A Date	N/A				
DEPTH	SAMPLE	REC	DEF		-	Blows o	n Spoor		N		Symbo				
(ft)	No.		FROM	то	-					SOIL DESCRIPTION AND STRATIFICATION	_				
0		(In)	(ft)	(ft)	0/6	-	12/18	18/24			USCS				
	S-1	12"	0		2	2			4	Topsoil					
				2		-	2	3		-					
	<u>\$-2</u>	12"	2		4	5		-	10	Light Brown Clayey SILT, little coarse to fine Sand, trace Gravel					
F				4	<u></u>	-	5	8		-					
5	S-3	.16"	1	-	5				10						
	3-3	.10"	5	7	3	6	6	7	12	Same	_				
	S-4	10"	7		10	11	0		26	Light Drawn Olever Off T. some surgers to first first trans Council					
		10	- ' I	9	10		14	13	25	Light Brown Clayey SILT, some coarse to fine Sand, trace Gravel, with occasional Cobbles					
10				,			17	13		WILL OVERSIDERI COUDES	-				
	S-5	11*	10	-	20	18		-	38	Light Brown Clayey SILT, little coarse to fine Sand, trace Gravel					
				12		-	20	17	50	Light Drown Chrycy Bible, has ounse to fine bank, have onever					
					-	-				-	_				
				-											
15											_				
	S-6	14	15		19	22			42	Same	_				
				17			20	21		1					
20															
	S-7	12"	20		45	48		i. I	96	Same					
				22			48	51							
	S-8	3"	22		50/4"	143				Same with Cobbles					
				24						BORING COMPLETED AT 22.5± FEET					
25				-											
								1							
							_								
				_											
00					-		-		_		_				
30					-					-	_				
		_													
					-					-	_				
									_	-					
35								_							
50				-	-	-									
				X		-		_							
										-					
40										-					
		_		-				1							

Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominai I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	ín	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pockst Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod

Approximate Change in Strata: _____ Inferred Change in Strata: _____

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C	FC	21		PI	_	NAME:			2	SB-13 9999	
							CATION:		South	east, New York JOB NO. 99		
		QINEEF	18		_		ETHOD:		Holic	w Stem Auger GROUND ELEVATION: 68	4.0'	
BORII	NG BY:		GBI		D.	ATE ST	ARTED:	3/22	/2018	GROUNDWATER TABLE DEPTH		
NSPE	ECTOR:		MZ		DATE	E COMP	LETED:	3/22	/2018	0 Hr. 104 Date 3/22/18 24 Hr. N/A Date N/A	A	
DEPTH	SAMPLE	REC	DEP			Blows o	n Spoor		N		Symbo	
(ft)	No.		FROM	то						SOIL DESCRIPTION AND STRATIFICATION		
0		(In)	(ft)	(ft)	0/6	6/12	12/18	18/24			USC	
	S-1	8"	0		2	3		_	6	Topsoil		
				2			3	3				
	<u>S-2</u>	12"	2	-	2	7		- 10	16	Light Brown Claycy SILT, little coarse to fine Sand, trace		
5			-	4	-		9	13		Gravel		
0	S-3	10	5		25	15						
	3-3	10	- 3	7	25	15	17	18	32	Same	<u> </u>	
	S-4	NR	7	-	19	21	17	19	42	No Decement		
	3-4	INK	+ ' -	9	19	21	22	27	43	No Recovery		
10				,			- 44	21				
10	S-5	8"	10		13	23			67	Light Brown Clayey SILT, some coarse to fine Sand, trace		
			10	12	1.5	60	44	50	07	Genuel with Cohhlee	-	
	S-6	6"	15		67	58			125	Light Brown Clayey SILT, some coarse to fine Sand, trace		
				17		50	67	69	14.5	Gravel, with Cobbles	_	
15							07	0,7				
	S-7	9"	20		60	100/3*			-	Light Brown Clayey SILT, little coarse to fine Sand, trace		
				22			-	- 1		Gravel		
				_	-	-				BORING COMPLETED AT 22± FEET		
								_				
20												
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- 11							[]					
25												
- 1												
- 1												
30												
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Spilt Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C		M		PF	ROJECT	NAME:	1	Propose	d Logistics Cer	nter	BORING	SE	3-14	
	J		21			LOC	CATION:		South	east, New York	(JOB NO.			999
	EN	NSULTII QINEEF	18			М	ETHOD:		Holic	w Stem Auger		GROUND	ELEVATION:	67	'4.0'
-	NG BY:		GBI				ARTED:	3/22	/2018				TER TABLE DEPTH		
	ECTOR:		MZ		DATE	COMP	LETED:	3/22	/2018	0 Hr. 9.5 <u>+</u>	Date	3/22/18	24 Hr. N/A	Date N/	A
DEPTH (ft) .	SAMPLE No.	REC	DEF	то		Blows o	on Spoor		N	SOIL	DESCR	IPTION AN	ID STRATIFICATION	N	Symbol
0	10.	(In)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)	1					USCS
	S-1	10"	0		2	3			5	Topsoil					
				2		1 1	2	2							
	S-2	12"	2		8	9			18	Light Brown Cl	ayey SILT	, little coars	e to fine Sand, trace		
			-	4			9	11		Gravel, with occ	casional C	obbles			
5		-		_										-	
	S-3	24"	5		5	6			15	Same					
				7			9	10		-					
	<u>S-4</u>	20"	7	0	6	9	<u> </u>	14	20	Same					-
10				9			11	13		-					
10	S-5	15"	10		10	8			16	Sere.					-
	3-5	15	10	12	10	0	8	16	10	Same					
				12			0	10				COMPLET	ED AT 12± FEET		
										-	JORING				
15									-	1					
					-			_						-	
	-								-						
		1						-		1					
										1					
20				_										-	
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	in	engineers recommendations contained in the report from which these logs were extracted.
Core Size	in	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C	ES	21		P	ROJECT	NAME:	F	ropose	d Logistics	s Cent	ter	BORING	NO.		S	3-15
						LOC	ATION:		Southeast, New York JOB NO.							9	999
		GINEEF					ETHOD:			w Stem A			GROUN		TION:		31.0'
3ORII	NG BY:		GBI		D		ARTED:	3/22	/2018		- M	GRO	UNDWA				
_	ECTOR:		MZ			E COMP			/2018	0 Hr.	9±	Date		24 Hr.	N/A	Date N	/A
DEPTH	1 1		DEF	тH	1						-	1		1		1-400 14	1
(ft)	SAMPLE No.	REC	FROM	то	1	Blows o	n Spoon		N		SOIL [DESCRI			TIFICATI	ON	Symb
0	NO.	(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)	1							USC
	S-1	18"	0		2	3			6	Topsoil				-			
		_		2			3	8		Land granter							
	S-2	12"	2		6	9			25	Light Brow	n coan	se to fine	SAND. and	d Silt. little	medium te	o fine Gravel,	-
				4			16	19	-	with occas			,,	,			
5									-								-
	S-3	22"	5		7	7		_	14	Same						-	
				7			7	9		1							6
	S-4	24"	7		7	8			16	Same							
				9			8	9		(-200) = 3:	5.9%	W.C. =	14.2%				
10]						-	
	S-5	18*	10		6	15			35	Same							
				12			20	24		1							
											B	ORING (OMPLET	ED AT 12	± FEET		
]							
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1 % in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	in	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C	ES	21		P		NAME:	F	and the second second		1 6		
		NSULTI				_	CATION:		South	neast, New York JOB NO. 99	999		
_	EN	GINEEF	8				ETHOD:		Holic		54		
	NG BY:	_	GBI		D.	ATE ST.	ARTED:	3/20/2018		GROUNDWATER TABLE DEPTH			
	ECTOR:		MZ		DATE	COMP	LETED:	3/20	/2018	0 Hr. 94 Date 3/20/18 24 Hr. N/A Date N/A	A		
DEPTH	SAMPLE	REC	-	тн	1	Blows o	on Spoon		N		Symb		
(ft) 0	No.	(In)	FROM (ft)	TO (ft)	0/6	6/12	12/18	18/24	(bl/ft)	SOIL DESCRIPTION AND STRATIFICATION			
-	S-1	12	0	(14)	52	44	12/10	10/24	78	18 Autole Al Gulling	USC		
		12	Ť	2	34	-	54	29	/0	1" Asphalt: 4" Subbase Light Brown Clayey SILT, little coarse to			
	1		1	-			54	43	-	fine Sand, trace Gravel, with Cobbles	-		
								-		Inte Band, Part Clavel, Will Cobbies			
5			1			-		_					
	S-2	20"	5		34	25			54	Light Brown Clayey Silt, some coarse to fine Sand, little medium to fine			
				7			29	28		Gravel (-200) = 48.9% W.C. = 9.1%			
	S-3	10"	7		48	41			91	Same	-		
				9			50	44			-		
10									11	BORING COMPLETED 9± FEET	-		
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler		It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe		to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
		or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe		engineers recommendations contained in the report from which these logs were extracted.
Core Size	in	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod

Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

					-					SB-17 BORING L	0G
	C	FS	21		PI		NAME:	_			8-17
		NSULTI			_		CATION:				999
	EN	GINEEF					ETHOD:		Holk	w Stem Auger GROUND ELEVATION: 5	84
_	NG BY:		GBI	_			ARTED:	3/20	/2018	GROUNDWATER TABLE DEPTH	
	CTOR:		MZ		DATE	E COMP	LETED:	3/20	/2018	0 Hr. 94 Date 3/20/18 24 Hr. N/A Date N/A	Α
DEPTH	SAMPLE	REC	DEF			Blows	on Spoor		N		Symb
(ft)	No.		FROM	то						SOIL DESCRIPTION AND STRATIFICATION	Gynno
0		(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)		USC
	S-1	18*	0		24	23			43	Fill: Gray coarse to fine GRAVEL, little coarse to fine Sand, little Silt	
				2			20	17		Light Brown Clayey SILT, little coarse to fine Sand, trace Gravel	_
			-		-	-	-				
_					-	-					
5			-		-					_	1
	<u>8-2</u>	12"	5		5	6			18	Light Brown Clayey SILT, little coarse to fine Sand, trace	
				7			12	11		Gravel, with occasional Cobbles	
	S-3	24"	7		10	8			19	Same	_
10				9		-	11	17			
10					-	-				BORING COMPLETED AT 9± FEET	
					-						
									-		-
						-		_			
15				_		-			-		
14						-			-		
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler		It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe		to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel		or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe		engineers recommendations contained in the report from which these logs were extracted.
Core Size	in	· · ·

ata: ______ Inferred Change in Strata: ______

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted,

SESI PRO							NAME:	F		d Logistics Cente	ər					SB-18		
									Southeast, New York JOB NO.							9999		
	EN	GINEEF	15		_		ETHOD:			w Stem Auger		GROUND ELEVATION:			598' <u>+</u>			
	NG BY:		GBI				ARTED:	3/20/2018			_		TER TAB	LE DEPT				
	ECTOR:		MZ		DATE	E COMP	LETED:	3/20	/2018	0 Hr. 8'±	Date	3/20/18 24 Hr. N/A Date N						
DEPTH (ft)	SAMPLE	REC	DEF	тн то	Blows on Spoon				N	SOIL DESCRIPTION AND STRATIFICATION						Symb		
0	No.	(In)	(ft)	(ft)	0/6	6/12 12/18		18/24	(bl/ft)	-								
	S-1	12"	0		38	31			59	Fill: 1" Asphat	1, 6" Sto	ne Subbas	0					
				2			28	17	_	Light Brown Clay	ey SILT	, little coar	se to fine S	Sand, trace	Gravel			
								_										
5																		
	<u>S-2</u>	8"	5	_	8	8			21	Light Brown Clay	ey SILT	, little coar	se to fine S	and, trace				
	S-3	12"	7	7	9	14	13	27	30	Gravel Same								
		100		9			16	16	50	Sulle						-		
10										B	BORING COMPLETED AT 9± FEET							
						-												
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Nominal i.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	in	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod

Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

SESI PROJECT NAME						ROJECT	NAME:	Proposed Logistics Center BORING NO.							
CONSULTING LOCATION:									South	neast, New York JOB NO. 9	999				
	EN EN	GINEEF	18		-	M	ETHOD:		Holk	ow Stem Auger GROUND ELEVATION: 6	310				
	NG BY:		GBI		D	ATE ST.	ARTED:	3/20	/2018	GROUNDWATER TABLE DEPTH					
	CTOR:		MZ		DATE	E COMP	LETED:	3/20	/2018	0 Hr. NE Date 3/20/18 24 Hr. N/A Date N	/A				
DEPTH	SAMPLE	REC	DEPTH			Blows o	on Spoor		N		Symt				
(ft)	No.		FROM	то	-		_			SOIL DESCRIPTION AND STRATIFICATION	Synt				
0		(in)	(ft)	(ft)	0/8		12/18	18/24	(bl/ft)		USC				
	S-1	12"	0		7	11			22	Fill: 1" Asphalt, 8" Gravel Subbase					
				2			11	17		Light Brown Clayey SILT, little coarse to fine Sand, trace Gravel					
										-					
6			-		-	-		_							
0	S-2	14"			00	10					_				
	3-2	14.	5	7	28	19		10	73	Light Brown Clayey SILT, little coarse to fine Sand, trace	-				
	S-3	10"	7		9	7	54	10		Gravel, with cobbles	-				
	3-3	10		9	9		8	14	15	Light Brown Clayey SILT, little coarse to fine Sand, trace					
10				,	-		0	14	-	Gravel	-				
					-	-			-	BORING COMPLETED AT 9± Feet	<u> </u>				
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Nominal I.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler		It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe		to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel		or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe		engineers recommendations contained in the report from which these logs were extracted.
Core Size	in	_
	W	

Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

SEGI					P	ROJECT	NAME:	F	Propose	d Logistics Center BORING NO. SE	3-20
	0			LOC	CATION:		South	east, New York JOB NO. 9	999		
	CÓ EN	NSULTI Igineef				м	ETHOD:)7 <u>+</u>
BORIN	IG BY:		GBI		D		ARTED:		/2018	GROUNDWATER TABLE DEPTH	_
NSPE	CTOR:		MZ		DATE		LETED:	3/20	/2018	0 Hr. 9'± Date 3/20/18 24 Hr. N/A Date N/	A
DEPTH		REC	DEF	DEPTH		Diama a	e Caser		N		
(ft)	SAMPLE No.	REC	FROM	то	Blows on Spoon				N	SOIL DESCRIPTION AND STRATIFICATION	Symb
0		(in)	(ft)	(ft)	0/8	6/12	12/18	18/24	(bl/ft)		USC
	S-1	1 6 "	0		20	7			15	Fill: 1" Asphalt: 6" Subbase	
. 1				2			8	7		Light Brown Clayey SILT, little coarse to	
										fine Sand, trace Gravel	
5						-					
	S-2	16"	5		8	50			85	Light Brown Clayey SILT, little coarse to fine Sand, trace	
				7			35	8		Gravel	
	S-3	12"	7		8	8			20	Same	
10				9	-		12	29			-
10					-	-				BORING COMPLETED AT 9± FEET	
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrei	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

SESI PROJECT NAME:																SB-21	
COMBULTING LOOATION.									Southeast, New York JOB NO.							9999	
		GINEEF		_			ETHOD:	_		w Stem Auger			GROUND ELEVATION:				610' <u>+</u>
	NG BY:		GBI	_			ARTED:		2018		_						
	ECTOR:		MZ		DATE	COMP	LETED:	3/20/2018		0 Hr.	NE	Date	3/20/18 24 Hr. N/A Da				N/A
DEPTH (ft)	SAMPLE	REC	DEF	то	Blows on Spoon				N		8011				IFICATIO		Symbo
0	No.	(in)	(ft)	(ft)	0/6	6/12	6/12 12/18		(bl/ft)	SOIL DESCRIPTION AND STRATIFICATION						USCS	
	S-1	18"	0		5	8		18/24	11	Fill 4	" Subba	se					
				2			3	4					, little coars	e to fine S	and, trace		
									ii	Gravel							1
_																	
5			-				\vdash	-									-
	S-2	20	5	7	8	6		10	13	Same							
	S-3	18	7		9	12	7	10	28	Forma							-
	0-3	10	- ' -	9	7	14	23	30	35	Same							
10				-							R	ORING	COMPLET	ED AT 9+	FEET	-	1
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Core Size	In	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
Drop of Hammer on Drive Pipe	in	engineers recommendations contained in the report from which these logs were extracted.
Weight/type of Hammer on Split Barrel		or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Nominal I.D. of Split Barrel Sampler	1% in	It is made available to authorized users only that they may have access to the same information available
Nominal I.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.

Approximate Change in Strata: _____ Inferred Change in Strata: _____

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

SESI PROJECT NAME: LOCATION:									ropose				BORING	NO.	_		B-22		
		NSULTI						_			ew York	<u> </u>	JOB NO.			9999			
		GINEEF			-		ETHOD:			w Stem Auger			GROUND ELEVATION:				610		
	NG BY:		GBI				ARTED:	3/20/2018											
	ECTOR:		MZ DEPTH		DATE	COMP	LETED:	3/20/	2018	0 Hr.	NE	Date	3/20/18	24 Hr.	N/A	Date N	/A.		
)EPTH (ft)	SAMPLE	REC	FROM	то	Blows on Spoon				N	SOIL DESCRIPTION AND STRATIFICATION						NN	Symt		
0	No.	(in)	(ft)	(ft)	0/6	6/12 12/18		18/24	(bl/ft)								USC		
	S-1	14	0		20	15			22							nd, little Sil			
				2		i i	7	11		Light Brown Clayey SILT, little coarse to									
										fine Sa	nd, trace	Gravel							
5	-							_											
9	S-2	10"	5		4	5			11	Same						-5-	-		
	3-2	10		7	-	5	6	7	11	Samç	•						-		
	S-3	20"	7		15	10		-	24	Same							-		
				9			14	20									-		
10											1	BORING	COMPLET	ED AT 91	FEET	-			
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Nominal I.D. of Hole	in	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
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Weight/type of Hammer on Drive Pipe		to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe		engineers recommendations contained in the report from which these logs were extracted.
Core Size	In	
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

	C	ES	21		Př		NAME:	F		d Logistics C		BORING	BORING NO.			SB-23	
		·····				LOC	CATION:		South	east, New Yo	ork	JOB NO			6	9999	
	EN	GINEEF				M	ETHOD:		Hollo	ow Stem Auger GROUND ELEVATION:			6	13'+			
_	NG BY:		GBI				ARTED:	3/20	/2018			OUNDWA		LE DEPTH			
	CTOR:		MZ	_	DATE	COMP	LETED;	3/20	/2018	0 Hr. 8±	Date	3/20/18	24 Hr.	N/A	Date N	// A	
DEPTH	SAMPLE	REC	DEP		-	Blows o	n Spoon		N							Symb	
(ft) 0	No.	(in)	FROM (ft)	TO (ft)	0/6	6/12	12/18	18/24	(bl/ft)	SO SO	IL DESCR	IPTION AN	ND STRAT	FIFICATIO	N	USC	
-	S-1	18"	0	(14)	33	22	12/10	10/2-4	35						1	030	
				2			13	12		Light Brown			se to fine S	and, trace			
										Gravel		-		-			
_																	
5	S-2	18"	5		10	10									-		
	3-2	18	5	7	12	12	12	15	24	Same							
	S-3	16"	7	-	12	11	12	15	23	Same							
				9			12	13	~~	Samora						-	
10											BORING	COMPLE	TED AT 9	FEET			
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Nominal I.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler		It is made available to anthorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe		to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
Core Size	in	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod

Approximate Change in Strata;

Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

FIGURE 24

	C	ES	21		PF		NAME:			d Logistics		ər	BORING	NO.		8	B-24
						LOC	CATION:		South	east, New	York		JOB NO.		9999		
	EN	GINEEF	15		[М	ETHOD:		Holic	w Stern A	uger		GROUN	D ELEVA	FION:	6	42' <u>+</u>
BORII	NG BY:		GBI		D	ATE ST	ARTED:	3/20	20/2018 GROUNDWATER TABLE DEPT								
	ECTOR:		MZ		DATE	COMP	LETED:	3/20	/2018	0 Hr. 1	NE	Date	3/20/18	24 Hr.	N/A	Date N	/A
DEPTH	SAMPLE	REC	DEF			Blows	on Spoon		N								Symbo
(ft)	No.		FROM	то					-	8	SOIL D	DESCRI	PTION AN	ID STRAT	FIFICATIO	N	Gymod
0		(in)	(市)	(ft)	0/6	_	12/18	18/24								USCS	
	S-1	20"	0		30	22			40	6" Subl							
				2			18	14		Light Brow	vn Clay	ey SILT	, little coart	se to fine S	and, trace		
					-					Gravel							
-			-														_
5			-					-								_	-
	<u>S-2</u>	20*	5	-	14	21			32	Same							
	6.2	0.48		7	10	14	11	18		_							
	S-3	24"	7	0	13	14		10	28	Same							
10				9			14	16				ODDIC	CO) (77 -			_	-
IV.											B	UKING	COMPLET	ED AT 9	FEEL	77	
							\vdash										<u> </u>
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15		_															
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35							_	_								_	
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40											_						

Nominal I.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler		It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	_	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe		engineers recommendations contained in the report from which these logs were extracted.
Core Size	in	_
		Approximate Change in Strata: Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

FIGURE 25

	<u> </u>	F.S	SI				NAME:				SB-25	
		NSULTI	NG		<u> </u>		CATION:				9999	
		GINEEF		_	-		ETHOD:			ow Stem Auger GROUND ELEVATION: 664	<u>+</u>	
	NG BY:		GBI				ARTED:	_	/2018	GROUNDWATER TABLE DEPTH		
	ECTOR:		MZ		DATE	E COMP	LETED:	3/20	/2018	0 Hr. 7± Date 3/20/18 24 Hr. N/A Date N/A		
DEPTH (ft)	SAMPLE No.	REC	DEF	то		Blows	on Spoor	1	N	SOIL DESCRIPTION AND STRATIFICATION	Symb	
0		(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)		USC	
	S-1	20"	0		19	20			35	Fill: 5" Subbase		
			-	2	-	-	15	8		Light Brown Clayey SILT, little coarse to fine Sand, trace		
										Gravel	_	
5												
	S-2	16"	5	7	4	12	14	8	26	Same		
	S-3	8"	7		6	8	14	8	16	Same		
				9			8	9				
10										BORING COMPLETED AT 9± FEET		
					1				-	-		
										1 [
15												
10						-		-			_	
									<u> </u>			
20										4 –	_	
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] [
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25								_	-	· –	_	
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- 1										-		
30				_		_		-		-	-	
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							_					
								_				
35									_			
										-		
40												
_	al I.D. of Ho al I.D. of Sp		Semaler	-						n hereon was obtained for the design and estimating purposes for our client users only that they may have access to the same information available	t.	
	/type of Har									users only that they may have access to the same information available od faith, but it is not intended as a substitute for investigations, interpretation	me	
101-	100			-		للله مسوحت سرر	A6 AG	Lo de altres			GLLD	

		to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Split Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical

In engineers recommendations contained in the report from which these logs were extracted. In

Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod

_____ Inferred Change in Strata: Approximate Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

Drop of Hammer on Drive Pipe

Core Size

	C	ES	21		PF		NAME;	F			BORING NO.		SB-26	
		NSULTI					CATION:				JOB NO.	9	999	
	EN	GINEEF	18				ETHOD:	_	Holic	w Stem Auger	GROUND ELEVATION:	6	674' <u>+</u>	
BORI	NG BY:		GBI		D	ATE ST.	ARTED:	3/20/2018		GROUNDWATER TABLE DEPTH				
NSPI	ECTOR:		MZ		DATE	E COMP	LETED:	3/20	/2018	0 Hr. 7± Date	3/20/18 24 Hr. N/A	Date N	'A	
DEPTH (ft)	SAMPLE	REC	DEF FROM	тн то		Blows o	on Spoon	1	N	SOIL DESCRIPTION AND STRATIFICATION				
0	No.	(in)	(ft)	(ft)	0/6	6/12	12/18	18/24	(bl/ft)	SOIL DESCRIP	TION AND STRATIFICATION	4	USC	
	S-1	18"	0		26	21			31	Fill: Subbase				
				2			10	20		Light Brown Clayey SILT, I	little coarse to fine Sand, trace			
										Gravel				
_														
5			-			-						15		
	S-2	20"	5		6	7			28	Same			_	
		167		7			18	20	-					
	<u>S-3</u>	12*	7	-	43	48			88	Same				
10				9		-	40	37				_	-	
10								_	-	BORING C	OMPLETED AT 9± FEET		-	
			-			-		_	-					
			-					_						
					-	-								
15	<u>├</u>					-		_						
10	+ +					-		_					-	
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25								_						
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												4		
					1							8		
30												2		
													-	
					ī							18		
35														
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		-			-				-					
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40														
_	· · · · ·													

Nominal I.D. of Hole	In	The subsurface information shown hereon was obtained for the design and estimating purposes for our client.
Nominal I.D. of Split Barrel Sampler	1 % in	It is made available to authorized users only that they may have access to the same information available
Weight/type of Hammer on Drive Pipe	300 lb	to our client. It is presented in good faith, but it is not intended as a substitute for investigations, interpretations
Weight/type of Hammer on Spilt Barrel	140 lb	or judgment of such authorized users. Information on the logs should not be relied upon without the geotechnical
Drop of Hammer on Drive Pipe	In	engineers recommendations contained in the report from which these logs were extracted.
Core Size	in	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod
Core Size	in	Pp: Pocket Penetrometer; WOH: Weight of Hammer; WOR: Weight of Rod

Approximate Change in Strata:

Inferred Change in Strata:

Soil descriptions represent a field identification after D. M. Burmister unless otherwise noted.

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-1
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	649±'	INSPECT	ED BY	RR
WAT	FER OBSE	RVATION	Light seepage	@ 2.5:	:'; Seepage @ 3.5±'	DATE EX	CAVATED	<u>3/5/2018</u>
DEPTH FT.		DES	CRIPTION / SO	IL CLAS	SSIFICATION			DENSITY OR
0	6-inch Top	osoli						
1 <u> </u>	Light Brow		, and coarse t	o fine S	Sand, trace Gravel, v	with		
2	(USCS : C	CL)		Medlum-Stiff				
3 4	Same as a (USCS: C		ttled Clayey SI	LT and	occasional cobbles		Medi	ium-Stiff
5								
6			End of Test P	lt at 5.6	5± Feet			
7_								
_								
8 <u>—</u>								
9								
10								
_								
¹¹ —								
12								
 13								
_								
14								NGINEERS

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-2		
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	643± '	INSPECT	ED BY	RR		
WAT	ER OBSE	RVATION	Seepage	@ 2', 4',	Heavy @ 7±',	DATE EX	CAVATED	3/5/2018		
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION			DENSITY OR		
0	3-inch To	psoil								
-	Light Brow	wn Clayey SILT	, and coarse t	o fine Sa	and, trace Gravel,	with				
1	occasiona	al cobbles					Medium-Stiff			
_	(USCS : C	CL)								
2										
-	Light Brow	vn mottled Claye	e Gravel, with							
3	occasiona	al cobbles								
-	(USCS : C	CL)					Medi	um Stiff		
4										
-										
5										
_										
6										
7										
			End of Test I	Pit at 7±	Feet					
8										
9										
10										
10_										
11										
12										
13										
14										
_						SESI CONS	UI TING F			

PRO	JECT NO.	9999	PROJECT	Prop	Logistics Center	TEST PIT	NO.	TP-3
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	646± '	INSPECT	ED BY	RR
WAT	ER OBSE	RVATION	Heav	y seep	age @ 2±'	DATE EX	CAVATED	<u>3/5/2018</u>
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION			DENSITY OR
0	3-Inch Top	osoil						
-	Light Brow	vn Clayey Silt, s	some coarse t	o fine :	Sand, trace Gravel,	with		
1	occassion	al cobbles					Med	ium-Stiff
-	(USCS : C	C)						
2								
-	Light Brow	vn mottled Clay	Gravel, with					
3	occasiona	i cobbles					Med	ium Stiff
	(USCS :C	L)						
4								
5_								to
°—								
6								
0-								Stiff
7_								
			End of Test Pi	tat 8 7	5+ East			
8		· ·		t at 0.7	ot reat			
	1							
9								
10								
_								
11								
—								
12								
—								
13								
14								NGINEERS

PRO	JECT NO. 9999 PROJECT Prop. Logistics Center T	EST PIT NO	D.	TP-3A							
LOC		SPECTED	BY	RR							
WAT	ER OBSERVATION Seepage at 3' D	ATE EXCA	VATED	4/7/2018							
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION	R	RELATIVE DENSITY CONSISTENCY								
0	4" Topsoil										
1_	Light Brown SILT, and coarse to fine Sand, trace Gravel with	Cobbles	Medium Stiff								
			Mediu	um Stiff							
2	Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel with Cobbles and Boulders										
3_											
_											
4											
_	Same Mottled Clayey Silt with weathered Rock or Boulder		Mediu	ım Stiff							
5											
6											
6 7											
7		-									
8	End of Test Pit at 7 ± Feet										
9											
-											
10											
11											
12											
_											
13											
14											
	SESI CONS		NGINE	RSDPC							

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-4
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	638 ± '	INSPECT	ED BY	MZ
WAT	FER OBSEI	RVATION	Seepage @ 2.	.5±', He	avy seepage @ 4±'	DATE EX	CAVATED	<u>3/5/2018</u>
DEPTH FT.		DES	CRIPTION / SO	IL CLAS	SIFICATION			DENSITY OR
0	4-Inch Top	osoil						
1 2	Brown Cla (USCS : C		coarse to fine	Sand,	trace Gravel		Med	ium-Stiff
3 <u> </u>	Light Brow	n Clayey SILT	', little coarse t	o fine S	Sand, trace Gravel		Medi	um Stiff
4 5	with occas (USCS : C	ional cobble :L)					to	
6 <u> </u>	_							Stiff
7 8			End of Test P	it at 6.8	± Feet			
9								
10								
11								
 12								
 13								
 14								NGINEERS

PRO.	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	'NO.	TP-4A	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	647 ±	INSPECT	ED BY	RR	
WAT	ER OBSE	RVATION	S	eepage) at 22"	DATE EX	CAVATED	4/7/2018	
DEPTH FT.		DESC	RIPTION / SO		SSIFICATION			DENSITY OR	
0	5" T	opsoil							
1 <u>—</u> 1—	_	t brown SILT, a vel with Cobble		fine Sa	nd, trace coarse to	fine	Med	ium Stiff	
2 <u> </u>					e to fine Sand, little	e coarse		Stiff	
4	to fir	e Gravel with (Coddies and E	souider	8				
 5	-								
_									
6									
7_									
8_	Sam	e with Gray (Clayey Silt and	d possi	ble weathered Bed	rock or	ŀ	lard	
9_	Boul	der							
_			End of Test F	Pit at 9 :	± Feet				
¹⁰ —									
11									
_									
¹³ —									
14									
	SESI CONSULTING ENGINEERS D.P.C.								

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-5
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	641± '	INSPECT	ED BY	RR
WAT	WATER OBSERVATION Light Seepage @ 22*/ @ 4±' DATE E							<u>3/5/2018</u>
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION			DENSITY OR
0	5-inch Top	osoil						
1 1 2	Light Brow (USCS : (6		, some coarse	e to fine	e Sand, trace Grave	d	Med	ium Stiff
3 4	Light Brow occasiona (USCS : C	l cobbles	ey SILT, little	coarse	to fine Sand, trace	Gravel, with		ium Stiff
5	Light Brow	n Clayey Slit, s	ome coarse t	o fine S	Sand, little coarse to	fine Gravel	Medium Stiff	
6	-	th occassional			Sand, trace medium	to fine	Mədi	um Stiff
7 <u> </u>								
_								
9 <u> </u>								
10								
 11			End of Test P	it at 9.8	3± Feet			
12								
14								NGINEERS

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Cente	r TEST	PIT NO	T NO. TP-6	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	645± '	INSPE	CTED	BY	JQ
WAT		RVATION	Seepage @	1.5±'; H	eavy seepage 4	±' DATE	EXCA	VATED	<u>3/5/2018</u>
DEPTH FT.									DENSITY OR
0	4-inch Top	bsoil							
1 1 2	Brown Cla (USCS : C		e coarse to fir	ne Sano	d, trace Gravel			Medi	ium-Stiff
_	Dark Brow	n Clayey Silt,	ittle coarse to	fine Sa	nd, trace Grave	l, with		Medi	um Stiff
3	occasiona	l cobbles							
	(USCS : C	;L)							
4									to
5									10
-									
6									
7									Durg
									Stiff
8									
			End of Test P	it at 8.1	± Feet				
9									
10									
_									
11									
12									
13									
_									
14									NGINEERS

LOCATION SEE FIGURE 1 APPROX. ELEV. 643±' INSPECTED BY JQ/F WATER OBSERVATION Seepage @ 2±'/ Heavy @ 5±' DATE EXCAVATED 3/5/20 DEPTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSIT CONSISTENCY 0— 3-inch Topsoli
DEPTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY CONSISTENCY 0 — 3-inch Topsoll
FT. DESCRIPTION / SOIL CLASSIFICATION CONSISTENCY 0— 3-inch Topsoll 1— Light Brown Clayey SILT, some coarse to fine Sand, trace coarse to fine Medium-Stiff
1 Light Brown Clayey SILT, some coarse to fine Sand, trace coarse to fine Medium-Stiff
Gravel with occassional cobbles (USCS : CL)
3— with occasional cobbles and boulders
(USCS : CL)
5 to
6
7
Stiff
8
9 End of Test Pit @ 8.5± Feet
11
—
12
13
14 SESI CONSULTING ENGINE

PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	EST PIT NO.	TP-8
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 644±'	NSPECTED BY	RR
WAT	TER OBSERVATION Seepage @ 2±1/ Heavy seepage @ 6±1 [FED <u>3/5/2018</u>
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		ATIVE DENSITY OF
0	3-inch Topsoil		
_	Light Brown SILT, and coarse to fine Sand, trace medium to fine Gra W.C. = 15% (-200) = 53.5% (USCS : CL)	avel	Medium-Stiff
3 <u> </u>	Light Brown mottled SILT, some coarse to fine Sand, little medium to fir with occasional cobbles and boulders	e Gravel	Medium Stiff
	W.C. = 12.9% (-200) = 52.3% (USCS : CL)		
6 7			to
8 9 10			Stiff
 11 12			
	End of Test Pit @ 12± Feet		
	QEC		

R			
PRO	JECT NO. 9999 PROJECT Southeast, NY TE	ST PIT NO.	TP- 9
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 625'+ IN	SPECTED BY	RR
WAT	ER OBSERVATION Light seepage at 6'± DA	ATE EXCAVATED	3/5/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR SISTENCY
0	3" Topsoil		
1 1 2	Light-brown coarse to fine SAND, and Silt, trace medium to fine (USCS : SM)	Gravel Med	ium Dense
	Light-brown coarse to fine SAND, some Silt, little medium to fine	Gravel	
3	with occasional cobbles		ium Dense
_	(USCS :SM)		
4			
5			
6			
7_	End of Test Pit at 6.75± Feet		
_			
8			
9			
10			
11			
_			
12			
13			
14			
NOTE:		C	SESI
	Figure 38		



PRO	JECT NO. 9999 PROJECT Southeast, NY TEST PI	T NO.	TP- 10
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 629' <u>+</u> INSPEC'	TED BY	RR
WAT	24-hour water reading = 13±" ER OBSERVATION Light seepage at 2'±, Heavy seepage at 4'±	CAVATED	3/5/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR BISTENCY
0	4" Topsoll		
-			
1	Light-brown coarse to fine SAND, and Clayey Silt, trace medium to fine	Mediu	um Dense
2	Gravel, with occassional cobbles		
1 1	(USCS:SM)		
3 3 4			
4			
_			
5			
-			
6			
7_			
' <u>-</u>	End of Test Plt at 6.5± Feet		
8			
9			
-			
10			
11			
12			
13			
_			
14			
NOTE:	Figure 39		SESI

PRO.	JECT NO.	9999	PROJECT	Sou	theast, NY	TEST PIT	NO.	TP- 11
LOC	ATION	SEE FIGURE 1	APPROX. EL	EV.	630' <u>+</u>	INSPECT	ED BY	RR
WAT	ER OBSE	RVATION	Seepage at 28":	:; 24-ho u	ur reading = 4±"	DATE EX	CAVATED	3/5/2018
DEPTH FT.				DENSITY OR				
0	18"	Topsoli with lig	ht-brown coarse	e to fine	Sand, some Silt,	, little		
	coar	se to fine Grav	vel					
1								
2	l inc	t have access	to fine Cond. o			turn to fine	Mad	Danas
	-	vel, with occas		nd Clay	ey Silt, little medi		Medi	um Dense
3		CS : SM/SC)						
_	,							
4								
-								
5_								
6								
7_								
8								
_			End of Test Pr	t at 8± F	eet			
9								
—								
10								
11_								
12								
13								
_								
14								
NOTE:							S	ESI



PRO	IECT NO. 99999 PROJECT Southeast, NY TEST P	T NO.	TP- 12
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 629'+ INSPEC	TED BY	RR
WAT	ER OBSERVATION Seepage at 26±"; 24-hour reading = 3±" DATE E	XCAVATED	3/5/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OR
0	6" Topsoil		
1_	Light-brown mottled Clayey SILT, some coarse to fine Sand, trace		
	Gravel with occassional cobbles		
2	(USCS : CL)	Medi	um Stiff
3_			
3 4			
4			
5			
6_			
7_			
_			
8	End of Test Pit at 7.5± Feet		
9			
10			
-			
11			
12			
13			
-			
14			
IOTE:	Figure 41		ESI Naulting



PRO.	JECT NO.	9999	PROJECT	Prop	Logistics Center	TEST PIT	NO.	TP-12A
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	677 ±	INSPECT	ED BY	RR
WAT	ER OBSE			Seepag	e at 2'	DATE EX	CAVATED	4/7/2018
DEPTH FT.			DENSITY OR					
0	1' To	opsoil						
1								
_	Light	t brown SILT, a	and coarse to	fine Sa	nd, trace Gravel w	lth	Med	ium Stiff
2	Cobl	bles						
3_								
_	Brow	n mottled Clay	ey SILT, and c	oarse	to fine Sand, little c	oarse to fine		Stiff
4	Grav	el with Cobble	s and Boulder	8				
5_								
6								
7_								
_								
8								
9								
_								
10			End of Test P	it at 40	+ East			
11					IFOOL			
_								
¹² —								
13								
_								
14					SFSI C			ERS D.P.C.

r			
PRO.	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	TP- 13
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 627'+	INSPECTED BY	RR
WAT	ER OBSERVATION Seepage at 3'± to 3.5'±	DATE EXCAVATE	D 3/5/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		VE DENSITY OR NSISTENCY
0	2-3" Topsoil		
 1 2 3	Light-brown coarse to fine SAND, some Clayey Silt, little coars fine Gravel with occassional cobbles (USCS : SM)	se to Me	dium Dense
4 5 6 7	Same as above with mottled Clayey Silt	Me	dium Dense
7 8 9	End of Test Pit at 7± Feet		
_			
11			
12			
13			
_			
14			
NOTE:	Figure 43		SESI



PRO	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT	NO.	TP- 14
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 633'+	INSPECT	ED BY	RR
WAT	ER OBSERVATION Seepage at 7.5'±	DATE EX	CAVATED	3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY O
0	8" Topsoil			
1_	Light-brown coarse to fine SAND, some Silt, little coarse	to fine Gravel.		
_	with occassional cobbles		Mediu	ım Dense
2	(USCS : SM/SC)			
3_	Light-brown coarse to fine SAND, some clayey Silt, little c	oarse to		
-	fine Gravel, with occassional cobbles		Mediu	ım Dense
4	(USCS : SM/SC)			
5_				
6_				
7_				
-1				
8				
s—	End of Test Pit at 8.5± Feet			
₀_				
_				
1				
-				
2				
_				
3				
4_				
)TE:			S	ESI
	Figure 44			



PRO	JECT NO. 9999 PROJECT Southeast, NY T	EST PIT NO.	TP- 15
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 631'+	SPECTED BY	RR
WAT	TER OBSERVATION Seepage at 7'± D	ATE EXCAVATED	3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR BISTENCY
0	6" Topsoil		
1 2 3	Light-brown coarse to fine SAND, some clayey Silt, little mediur to fine Gravel, with occassional cobbles (USCS : SM) W.C. = 13.8% (-200) = 34.2%		ium Dense
4 <u> </u>	Light-brown coarse to fine SAND, some clayey Silt, little medium to fine Gravel, with occassional cobbles (USCS : SM)	n Mediu	um Dense
5 6 7	Same as above with mottled Clayey Silt and occasional Boulder (USCS: SM)	Med	ium Stiff
8 9 10 11 11 12 13 14	End of Test Pit at 7± Feet		
NOTE:	Figure 45		SESI



PRO.	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT	NO.	TP- 16
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 629'+	INSPECTE	DBY	RR
WAT	ER OBSERVATION Seepage at 6'11"±	DATE EXC	AVATED	3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	6" Topsoil			
1_	Light-brown coarse to fine SAND, some Silt, little coarse to fir	ne	Mediu	m Dense
_	Gravel with occassional cobbles			
2	(USCS : SM)			
-				
3				
-				
4				
5		1		
	Same as above with some mottled Clayey Silt, with occassiona and boulders	ai coddies	Medii	um Dense
6				
	(USCS : SM/SC)			
7				
_				
8	End of Test Pit at 7.5± Feet			
_				
9				
-				
10				
11				
12				
·				
13				
14				
NOTE:			S	ESI





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PRO.	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT	NO.	TP- 17
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 630'+	INSPECT	ED BY	RR
WAT	ER OBSERVATION NE	DATE EX	CAVATED	3/6/2018
DEPT H FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	8" Topsoil			
1_	Light brown/Orongo SILT, some coores to fine Send, little sea	mo to fina		
	Light-brown/Orange SILT, some coarse to fine Sand, little coar Gravel with occassional cobbles	Se to Tine	Modi	um Stiff
2	(USCS : CL)		MOGI	un sun
3	Light-brown mottled SILT, some coarse to fine Sand, little coar	se to fine		
-	Gravel with occassional cobbles and boulders		Med	ium Stiff
4	(USCS : CL)			
5				
6 7				
7				
8_	End of Test Pit at 7.5± Feet			
_				
9				
_				
10				
11				
12				
13				
14				
NOTE:				
	Electric 47		S	ESI



1			1
PRO	JECT NO. 9999 PROJECT Southeast, NY TEST	PIT NO.	TP- 18
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 628'+ INSPE	CTED BY	RR
WAT	ER OBSERVATION Seepage at 2'±, Heavy at 3'± DATE	EXCAVATED	3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR BISTENCY
0	7" Topsoil		
1	Light-brown Clayey SILT, some medium to fine Sand, trace Gravel		
	(USCS : CL)	Med	um Stiff
2			
3	Light-brown mottled Clayey SILT, some coarse to fine Sand, little	Medi	ium Stiff
-	coarse to fine Gravel, with occassional cobbles		l.
4	(USCS : CL)		
5_			
6			
 7			
7_	End of Test Pit at 6.75± Feet		
8_			
°—			
9			
10			
11			
12			
13			
_			
14			
NOTE:	Figure 48		SESI



ATION SEE FIGURE 1 APPRO			1
	X. ELEV. 659 ±	INSPECTED BY	RR
	Seepage at 8'	DATE EXCAVATED	4/7/2018
DESCRIPTION /		RELATIVE DENSITY OR CONSISTENCY	
5" Topsoil			
Light brown SILT, some coar Cobbles	se to fine Sand, trace Gravel	with Mec	llum Stiff
			lium Stiff
Sa	me (Mottled)	Med	lium Stiff
End of Te	st Pit at 10 ± Feet		
	5" Topsoil Light brown SILT, some coar Cobbles Brown Clayey Silt, some coar Gravel with Cobbles and Bou	Light brown SILT, some coarse to fine Sand, trace Gravel Cobbles Brown Clayey Silt, some coarse to fine Sand, little coarse to Gravel with Cobbles and Boulders Same (Mottled) End of Test Pit at 10 ± Feet	Description / Soil CLASSIFICATION CONS 5" Topsoil Image: Construction of the stand in the

					TP-18B
PROJECT NO. 9999 PROJECT Prop. Logistics Center TEST PIT N					
LOC	ATION SEE FIGURE 1	APPROX. ELEV. 645 ±		DBY	RR
WATI	ER OBSERVATION	Seepage at 9'	DATE EXC	AVATED	4/7/2018
DEPTH FT.	DESC	CRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	5" Topsoil				
- [
1					
_	_	and coarse to fine Sand, trace Gravel	with	Medi	um Stiff
2	Cobbles				
3	D 01 0114				0.11
4	Gravel with Cobble	and coarse to fine Sand, little coarse t	o tine		um Stiff
	Gravel with Copple				to Stiff
5				· ·	2011
	Same (Mottled S	ilt with weathered Mica Schist)			
6		······································		ş	Stiff
_					
6 7					
_					
8					
-					
9					
-					
10					
11		End of Test Pit at 10 ± Feet			
12					
13					
_					
14					
- sense 1		SESI	CONSULTING	ENGINE	ERS D.P.C

11			
PRO	JECT NO. 9999 PROJECT Southeast, NY	FEST PIT NO.	TP- 19
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 619'+	NSPECTED BY	RR
WAT	ER OBSERVATION Seepage at 30"±	DATE EXCAVATED	3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR SISTENCY
0	5" Topsoll		
	Light-brown coarse to fine SAND, some Silt, little coarse to fine		
¹ —	Gravel, with occassional cobbles (USCS : CL)	Medi	um Dense
2_	Light brown econo to fine CAND some method Sitt little score		
	Light-brown coarse to fine SAND, some mottled Silt, little coars fine Gravel, with occassional cobbles		um Dense
3	(USCS : CL)	INIGUI	
	(,		
4			
-			
5			
6			
7_	End of Test Pit at 6.25± Feet		
/			
8_			
9			
_			
10			
-			
11			
12			
13			
14			
NOTE:		C	ESI
	Figure 51	2	



PRO.	JECT NO. 9999 PROJECT Southeast, NY TES	ST PIT NO.	TP- 20	
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 618' <u>+</u> INS	PECTED BY	RR	
WATER OBSERVATION Light seepage at 4'± DATE EXCAVATE				
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR SISTENCY	
0	6" Topsoil			
1 1 2	Light-brown SILT, some coarse to fine Sand, little medium to fine Gravel, with occassional cobbles (USCS : CL)	Med	ium Stiff	
3 	Light-brown mottled SILT, some coarse to fine Sand, little medium to fine Gravel, with occassional cobbles (USCS : CL) End of Test Pit at 7.3± Feet	n Med	ium Stiff	
NOTE:	Figure 52		SESI	



LOCATION SEE FIGURE 1 APPROX. ELEV. 577 ± INSPECTED BY RR WATER OBSERVATION Seepage at 6' DATE EXCAVATED 4/7/2018 DEPTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY 0	PRO	JECT NO.	9999	PROJECT	Prop	Logistics Center	TEST PIT	NO.	TP-20A
DEPTH PT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY 0 4" Topsoll 4" - Light brown SILT, and coarse to fine Sand, trace Gravel with Medium Stiff 1 Cobbles 4" - Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel with Cobbles and Boulders Medium Stiff 4 - - Medium Stiff 5 - - Medium Stiff 6 - - Stiff 7 - - Stiff 8 - - Stiff 9 - - Stiff 10 - - - 11 - - - 12 - - - 13 - - - 14 - - -	LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	577 ±	INSPECT	ED BY	RR
PT. DESCRIPTION / SOIL CLASSIFICATION CONSISTENCY 0	WAT	ER OBSE	RVATION	5	Seepag	e at 6'	DATE EX	CAVATED	4/7/2018
Light brown SILT, and coarse to fine Sand, trace Gravel with Light brown SILT, and coarse to fine Sand, trace Gravel with Cobbles Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel with Cobbles and Boulders Hedium Stiff Medium Stiff Medium Stiff to Stiff Light brown SILT, and coarse to fine Sand, little coarse to fine Gravel with Cobbles and Boulders End of Test Pit at 9 ± Feet Light brown SILT, and coarse to fine Sand, little coarse to fine Cobbles End of Test Pit at 9 ± Feet Light brown SILT, and coarse to fine Sand, little coarse to fine Cobbles End of Test Pit at 9 ± Feet Cobbles Cobbles Cobbles Cobbles Cobbles Cobbles Cobbles Cobbles Cobbles Cobbles Cobbl		DESCRIPTION / SOULCLASSIFICATION							
1 Cobbles 2 Brown Clayey Silt, and coarse to fine Sand, little coarse to fine 3 Gravel with Cobbles and Boulders 4 Medium Stiff 4 Medium Stiff 5 Medium Stiff 5 Medium Stiff 6 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 6 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 6 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 6 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 7 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 8 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 9 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 10 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 11 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 12 Same Mottled (Observed decomposed Mica Schist) Same Mottled (Observed decomposed Mica Schist) 13 Same Mottled (Observed decomposed Mica Schist) Same Mottled (Observed decomposed Mica Schist) 14	0	4" Te	opsoll						
2 Brown Clayey Silt, and coarse to fine Sand, little coarse to fine 3 Gravel with Cobbles and Boulders 4 Medium Stiff 5 Medium Stiff 6 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 6 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 7 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 8 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 10 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 11 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 11 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 10 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 11 Same Mottled (Observed decomposed Mica Schist) Medium Stiff 12	-								lium Stiff
Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Medium Stiff Gravel with Cobbles and Boulders Medium Stiff	1	Cobl	bles						
Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Medium Stiff Gravel with Cobbles and Boulders Medium Stiff									
3 Gravel with Cobbles and Boulders Medium Stiff 4	2								
	-	Brow	vn Clayey Silt, a	and coarse to	fine Sa	and, little coarse to	fine		
		Grav	el with Cobble	s and Boulder	5				
	-							Med	ium Stiff
	4	-							
	-								
6 to	5_	_							
		Sa	me Mottled (O	bserved deco	mpose	d Mica Schist)		Med	
7	6—								
									Stiff
End of Test Pit at 9 ± Feet 10 11 12 13 14									
End of Test Pit at 9 ± Feet 10 11 12 13 14	8_								
End of Test Pit at 9 ± Feet 10 11 12 13 14									
10 11 12 13 14	9								
$ \begin{array}{c} - \\ 11 \\ - \\ 12 \\ - \\ 13 \\ - \\ 14 \\ \end{array} $	_			End of Test F	Pit at 9	± Feet			
 12 13 14	10								
 12 13 14	_								
 13 14	11								
 13 14	_								
 14	12								
 14	—								
	13								
SESI CONSULTING ENGINEERS D.P.C.	14								

PRO	JECT NO. 9999 PROJECT Southeast, NY TEST F	PIT NO.	TP- 21
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 618'+ INSPEC	CTED BY	RR
WAT	ER OBSERVATION Light seepage at 5'9"± DATE I	EXCAVATED	3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR BISTENCY
0	2" Topsoll		
1_	Light-brown/yellow coarse to fine SAND, some Silt, trace Gravel	Med	lum Dense
	(USCS : SM)		
2	Light-brown Clayey SILT, some coarse to fine Sand, little medium		
_	to fine Gravel with occassional cobbles	Medi	um Stiff
3	(USCS : CL)		
4_	Light-brown mottled Clayey SILT, some coarse to fine Sand, little		
	medium to fine Gravel with occassional cobbles	Medi	um Stiff
5	(USCS : CL)		
-			
6			
7_			
8	End of Test Pit at 7.6± Feet		
_			
9			
10			
11_			
12			
13			
NOTE:			
INVIE.		5	ESI



PRO	JECT NO. 9999 PROJECT Southeast, NY TEST	PIT NO.	TP- 22
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 616'+ INSPE	CTED BY	RR
WAT	ER OBSERVATION Light seepage at 1'8"±; Heavy at 5'± DATE	EXCAVATED	3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR BISTENCY
0	8" Topsoll		
1	Light-brown coarse to fine SAND, some Silt, little coarse to fine		
	Gravel with occassional cobbles	Med	ium Dense
2	(USCS : SM)		
3_			
	Light-brown mottled Clayey SILT, some coarse to fine Sand, little coarse		
4	to fine Gravel with occassional cobbles		
-	(USCS : CL)	Med	ium Stiff
5			
6 <u>—</u>			
7_			
8			
_	End of Test Pit at 8.1± Feet		
9			
10			
11			
_			
12			
_			
13			
NOTE:			
		S	SESI



PRO	JECT NO. 9999 PROJECT Prop. Logistics Center TI	EST PIT NO.	TP-22A	
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 582 ± IN	SPECTED BY	RR	
WAT	ER OBSERVATION Heavy Seepage at 8'	ATE EXCAVATED	4/7/2018	
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		RELATIVE DENSITY OR CONSISTENCY	
0	5" Topsoll			
1 2 3	Light brown SILT, and coarse to fine Sand, trace Gravel with Cobbles	Med	lium Stiff	
4 4 5	Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel with Cobbles and Boulders	Med	Medium Stiff	
6 <u> </u>			lum Stiff	
8 8 9	Same (Mottled Silt)		To Stiff	
10 11	End of Test Pit at 10 ± Feet			
12 <u> </u>				
13 <u> </u>				

PRO.	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT	NO.	TP- 23
LOC	OCATION SEE FIGURE 1 APPROX. ELEV. 615'+ INSPEC		DBY	RR
WAT	WATER OBSERVATION Seepage at 5'3"± DATE EX		AVATED	3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		RELATIVE DENSITY OR CONSISTENCY	
0	3" Topsoil			
-	Light-brown coarse to fine SAND, some Silt, little coarse to f	ine Gravel	Medi	um Dense
1	(USCS : SM)			
-				
2_				
-				
3				
	Light-brown coarse to fine SAND, some mottled Silt, little coarse to	fine Gravel,	Mediu	m Dense
4—1	with occassional cobbles and boulders			
	(USCS : SM)			
5				
6_				
°				
7_				
8	End of Test Pit at 7.3± Feet			
9				
10				
11				
_				
12				
13				
_				
14				
NOTE:			S	ESI
	Figure 57			NSULTING

1F.			
PRO	JECT NO. 9999 PROJECT Southeast, NY TEST PIT	NO.	TP- 24
LOC	LOCATION SEE FIGURE 1 APPROX. ELEV. 614' <u>+</u> INSPECT		RR
WAT	ER OBSERVATION Seepage at 4'± DATE EX	CAVATED	3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OR
0	4" Topsoll		
-	Light-brown/yellow Clayey SILT, some coarse to fine SAND, trace Gravel	Medi	um Stiff
1	(USCS : CL)		
2	Light-brown coarse to fine SAND, some Silt, little medlum to fine	Medium Dense	
	Gravel with occassional cobbles (USCS : SM)		
3	Light-brown mottled Clayey SILT, some coarse to fine Sand, little		
-	medium to fine Gravel, with occassional cobbles and boulders	Medium Stiff	
4	(USCS : CL)		
5			
•—			
6 7			
	End of Test Pit at 7± Feet		
8			
9			
10			
-			
11			
_			
12			
13			
14			
NOTE:		S	ESI
	Figure 58		INSULTING

1 ¹							
PRO	JECT NO.	9999	PROJECT	Southeast, NY	TEST PI	'NO.	TP- 25
LOC	LOCATION SEE FIGURE 1 A		APPROX. ELE	EV. 615' <u>+</u>	INSPECT	ED BY	RR
WAT	ER OBSE	RVATION	Seepage at 4.5'	£	DATE EX	CAVATED	3/6/2018
DEPTH FT.		DESC	CRIPTION / SOIL	CLASSIFICATION			DENSITY OR
0	6" T	opsoil					
1 2		t-brown/yellow CS : SM)	coarse to fine S/	AND, some Silt, trace (Gravel	Mediu	im Dense
2 <u> </u>	-	t-brown coarse occassional co		ome mottled Silt, trace	Gravel,	Mediu	im Dense
4 <u> </u>	(US	CS : SM)					to
5 6						D	ense
7 7 8			End of Test Pit a	at 6.4± Feet			
9 <u>—</u> 9—							
10							
11							
12							
13 <u> </u>							
14 NOTE:							
			Figure 59				ESI

PRO	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	TP- 26
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 602'+	INSPECTED BY	RR
WAT	ER OBSERVATION Seepage at 6'1"±	DATE EXCAVATI	ED 3/6/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		IVE DENSITY OR
0	3" Topsoil		
1	Light-brown SILT, some coarse to fine Sand, trace Gravel, v occassional cobbles (USCS : CL)	vith N	ledium Stiff
2			
	Light-brown mottled SILT, some coarse to fine Sand, trace C	Gravel, N	ledium Stiff
<u> </u>	with high frequency of boulders (USCS : CL)		
4	(0303.01)		
5			
-			
6			
7_			
_	End of Test Pit at 7.25± Feet		
8			
9			
10			
11			
-			
12			
13			
14			
NOTE:			SESI
	Figure 60		OONSULTING

PRO.	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	TP- 27						
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 636'+	INSPECTED BY	RR						
WAT	ER OBSERVATION Seepage at 6.5'±	DATE EXCAVATED	4/16/2018						
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR BISTENCY						
0	4" Topsoil								
1 1 2	Light-brown SILT, and coarse to fine Sand, trace Gravel, with cobbles and boulders (USCS : CL)	Med	Medium Stiff						
2 3 4	 Brown SILT, and coarse to fine Sand, trace Gravel, with cobbles and boulders 								
5 6 7	Same mottled SILT	Med	lium Stiff						
8 9 9 10 11 11 12 12 13 13 14 14	End of Test Plt at 8± Feet								
NOTE:		S	ESI						



PRO	JECT NO.	JECT NO. 9999 PROJECT Prop. Logistics Center TEST				TEST PIT	NO.	TP-27A
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	635 ±	INSPECT	ED BY	RR
WAT	ER OBSE	RVATION		NE		DATE EX	CAVATED	4/7/2018
DEPTH FT.		DESC	RIPTION / SO		SIFICATION		1	DENSITY OR
0	Tops	soll with Light B	rown SILT, a	nd coars	se to fine Sand, tra	ice		
-	Gravel with occasional Cobbies							
1								
-								
2								
3								
3								
4		Brown SILT, a	fine	Med	ium Stiff			
- 4	Gravel with Cobbles and Bouiders							
5_	Brown Clayey SILT, and coarse to fine Sand, light coarse to fine Gravel with Cobbles and Boulders (Weathered Boulders/Bedrock)							Stiff
	Grav			8 (998	unered boulders/b	Barock)		
6								
_	Si	ame (Mottled S	iit)					
7								
-								
8								
-								
9								
			End of Test F	Pit at 9 ±	Feet			
10								
11								
12								
13_								
14								
					SESI C	ONSULTING	G ENGINE	ERS D.P.C.

PRO	JECT NO.	9999	PROJECT Prop. L	ogistics Center	TEST PIT NO.	TP-27B		
LOC		SEE FIGURE 1	APPROX. ELEV.	629 ±	INSPECTED BY	RR		
WAT	ER OBSER	VATION	Seepage a	at 10'	DATE EXCAVATE	D 4/7/2018		
DEPTH FT.		DESC	CRIPTION / SOIL CLASS	BIFICATION		IVE DENSITY OR		
0	Topse	oil						
1 2 3		brown SILT, s les and Bould	ome coarse to fine Sa ers	nd, trace Gravel	with N	ledium Stiff		
4 5 6			, and coarse to fine Sa s and Boulders (Weath					
7 8 9 10	Same (Mottled Silt) Stiff							
10 11 12 13 14			End of Test Pit at 10 ±	Feet				

PRO	JECT NO.	9999	PROJECT	Sou	theast, NY	TEST PIT	NO.	TP- 28
LOC	ATION	SEE FIGURE 1	APPROX. EL		621' <u>+</u>	INSPECT		RR
WAT	ER OBSE	RVATION	Seepage at 21"	-		-	CAVATED	3/6/2018
				1,11001	y ut 4.02			
DEPTH FT.		DES	CRIPTION / SOIL	CLASS	IFICATION		RELATIVE DENSITY OR CONSISTENCY	
0	3" T	opsoil						
	-		some coarse to	fine Sar	nd, trace Gravel	, with		
1		assional cobble	S				Mediu	ım Dense
	(US	CS : CL)						
2								
			d SILT, some co	parse to	fine Sand, trace	e Gravel,	Med	ium Stiff
3		occassional co	obbles					
	(US	CS : CL)						
4								
5_								
6								
7_								
(2		End of Tool D	4 _4 7, F	4			
8			End of Test Pi	$t at / \pm r$	-66(
9								
10								
_								
11								
_								
12								
_								
13								
_								
14								
NOTE:							2	ESI
			Figure 64				\sim	



PRO.	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	TP- 29		
	ATION SEE FIGURE 1 APPROX. ELEV. 621'±	INSPECTED BY	RR		
WAT	ER OBSERVATION Seepage at 3.5'±	DATE EXCAVAT			
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		RELATIVE DENSITY OR CONSISTENCY		
0	4" Topsoil				
-	Yellow-brown SILT, and coarse to fine Sand, trace Gravel, w	ith			
1	cobbles (USCS : CL)		Medium Stiff		
2	Brown SILT, and coarse to fine Sand, little coarse to fine Gra	vel			
	with cobbles and occasional boulders (USCS: CL)		Medium Stiff		
3					
—					
3 4 5					
5	Same mottled SILT				
			Medium Stiff		
6 6 7					
_					
7—					
8					
	End of Test Pit at 8± Feet				
9					
-					
10					
11					
12					
_					
13					
-					
14					
IOTE:	Figure 65		SESI		



LOCATIO WATER O	SEE FIGURE 1 APPROX. ELEV. 612'± OBSERVATION Seepage at 2'± DESCRIPTION / SOIL CLASSIFICATION 4" Topsoil Light-brown SILT, and coarse to fine Sand, trace Gravel, w cobbles (USCS : CL)		ATED	RR 4/16/2018 DENSITY OF STENCY
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION 4" Topsoil Light-brown SILT, and coarse to fine Sand, trace Gravel, w	REL		
FT.	4" Topsoil Light-brown SILT, and coarse to fine Sand, trace Gravel, w			
0	Light-brown SILT, and coarse to fine Sand, trace Gravel, w	ith		
_		ith		
1_	cobbles (USCS : CL)			
' <u> </u>			Mediu	m Stiff
2	Brown SILT, and coarse to fine Sand, little coarse to fine G	ravel,		
-	with cobbles (USCS: CL)		Mediu	m Stiff
3				
4	Same mottled SILT		Mediu	
				in Sun
5				
-	Brown SILT, and coarse to fine Sand, little coarse to fine G	ravel,	Mediu	m Stiff
6	with cobbles (gravel fequency increased with depth)			
7_				
_				
8				
_	End of Test Pit at 8± Feet			
⁹ —				
o				
_				
1				
2				
3_				
_				
4				
TE:	Figure 66		S	ESI



PROJ	ECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	TP- 31
LOCA	TION SEE FIGURE 1 APPROX. ELEV. 618'±	INSPECTED BY	JQ
WATE	ROBSERVATION Seepage at 7.5'±	DATE EXCAVATE	D 4/17/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		IVE DENSITY OF
0	3" Topsoil		
1_	Yellow-brown SILT, and coarse to fine Sand, trace Gravel cobbles (USCS : CL)		edium Stiff
2 3 4	Light-brown SILT and coarse to fine Sand, little Sand, little to fine Gravel, with cobbles (USCS : CL)		edium Stiff
	Light-brown mottled SILT, and coarse to fine Sand, little co fine Gravel, with occasional cobbles (USCS : CL)		edium Stiff
0 1 2 3 4	End of Test Plt at 10± Feet		
TE:	Figure 67		SESI



PRO	JECT NO.	9999	PROJECT	Southeast, NY	TEST PI	г NO .	TP- 32		
LOC	ATION	SEE FIGURE 1	APPROX. EL	EV. 602'±	INSPECT	ED BY	JQ		
WAT	ER OBSE	RVATION	Seepage at 5'±		DATE EX	CAVATED	4/17/2018		
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY								
0 <u> </u>	8" T	opsoil							
1 <u></u> 2	-	t-brown/yellow vel (USCS : CL		d coarse to fine Sar	nd, trace	Med	ium Stiff		
3 <u> </u>	-		and coarse to fin ional cobbles (U	ne Sand, little coarse SCS : CL)	e to fine	Med	ium Stiff		
4 5 6 7 8 9 10	fine Gravel, with occasional cobbles (USCS : CL) Medium Stiff								
10 End of Test Pit at 10± Feet 11 Indextor 12 Indextor 13 Indextor 14 Indextor									
NOTE:						S	ESI		



PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-33
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	603'±	INSPECT	ED BY	JQ/RR
WAT	ER OBSE	RVATION	S	eepage	e at 7'±	DATE EX	CAVATED	4/17/2018
DEPTH FT.		DESC	RIPTION / SO		SSIFICATION			DENSITY OR
0	4" T	opsoli						
1	Yello	ow-brown/Light	-brown SILT, a	and coa	arse to fine Sand, t	race Gravel		
_	Ligh	t-brown SILT, a	and coarse to	fine Sa	nd, little coarse to f	îne		
2	Grav	vel, with occasi	onal cobbles					
-	Infilt	ration Rate at e	l. 601 = 22 in/	'nr				
3 <u></u> 4								
4								
5_	Link	4 h						
	-				fine Sand, little co	arse		
6	to in	ne Gravel, with	occasional co	opies				1
7_								
_								
8								
-			End of Test F	Pit at 83	Feet			
9								
10								
11_								
12								
_								
13								
—								
14								
						SESI CONS	ULTING E	NGINEERS

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-34	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	600'±	INSPECT	ED BY	JQ/RR	
WAT	ER OBSE	RVATION	S	eepage	ə at 7'±	DATE EX	CAVATED	4/17/2018	
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION			E DENSITY OR BISTENCY	
0	4" T	opsoil							
1	Yello Grav		-brown SiLT, a	and co	arse to fine Sand, t	race			
2	Infilt	ration Rate at e	l. 598.5 = 30.0	6 in/hr					
	Ligh	t-brown SILT, a	and coarse to	fine Sa	ind, little coarse to t	ine			
3	Grav	el, with occasi	onal cobbles						
4 <u>—</u>									
5									
6									
_	Light	t-brown mottled	SILT, and co	arse to	o fine Sand, little co	arse			
7	to fin	e Gravel, with	occasional co	bbles					
-									
8									
-									
9									
10									
			End of Test P	it at 10	L. East				
11				natiU					
_									
12									
_									
13									
_									
14									
	SESI CONSULTING ENGINEERS								

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	'NO.	TP-35	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	599'±	INSPECT	ED BY	JQ/RR	
WAT	ER OBSE	RVATION	No	t Enco	untered	DATE EX	CAVATED	4/17/2018	
DEPTH FT.		DESC	RIPTION / SO		SSIFICATION			DENSITY OR	
0	4-5" Topsoil								
1		ow-brown/Light Gravel	-brown Sand,	some (Slit, little coarse to				
2 3									
3 4 4									
5 6	Infilt	ration Rate at E	:l. 595 ≕ 29.5 i	n/hr					
7_	-	t-brown mottled			fine Sand, little co	arse			
	10 11			DICO					
8									
9									
10									
_			End of Test P	lt at 10	± Feet				
11									
12									
13									
_									
14									
SESI CONSULTING ENGINEERS									

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-36
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	623' <u>+</u>	INSPECT	ED BY	RR
WAT	ER OBSE	RVATION	S	eepage) at 2' <u>+</u>	DATE EX	CAVATED	5/1/2018
DEPTH FT.		DESC	CRIPTION / SO	IL CLA	SIFICATION			DENSITY OR
0	4" Topsoil							
1	Brov			fine Sa	- and, trace Gravel w	ith occasional	Medi	um Stiff
2	San	cobbles and						
-	Gair		1,				Med	ium Stiff
3								
4								
						1		
5								
_								
6								
7_								
	End	of Test Pit at 7	+ East					
8	Eng	UT TOSL FIL ALT						
_								
9								
_								
10								
11								
12								
-								
13								
14				_		SESI CONS		NOINEEDO

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-37
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	607' <u>+</u>	INSPECT	ED BY	RR
WAT	ER OBSEI	RVATION	Se	epage	at 6.5' <u>+</u>	DATE EX	CAVATED	4/31/2018
DEPTH FT.		DESC	RIPTION / SO		SSIFICATION			E DENSITY OR SISTENCY
0	4" Topsoil							
1	Linkt Day	- 014			. A 1 10			0.110
	Light Brow	n Siit, and coai	se to tine Sar	10, Trac e	e Gravel with occas	ional cobbies	Medi	um Stiff
2								
3		, and coarse to I cobbles and b		tle coar	se to fine Gravel w	ith	Med	ium Stiff
4	occasiona		ouiders					
_	Infiltration	Rate at Ei. 604	= 4.5 in/hr					
5								
6	Sam	e Mottled Silt					Medi	um Stiff
7								
_								
8 <u> </u>								
9								
—	End o	of Test Pit at 9	<u>-</u> Feet					
10								
 11								
12								
—								
13								
14								
						SESI CONS		NGINEERS

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Cente	r TEST РЛ	NO.	TP-38
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	600' <u>+</u>		ED BY	RR
WAT		RVATION	S	eepage	e at 4' <u>+</u>	DATE EX	CAVATED	4/31/18
DEPTH FT.		DESC	CRIPTION / SO	il Clas	SSIFICATION			DENSITY OR
0	4" Topsoll							
1 <u> </u>	Light Brown	n Silt, and coarse	to fine Sand, trac	e Grave	l with occasional co	bbles and boulders	Medi	um Stiff
2 <u> </u>		yey Slit, and co sional cobbles a		and, litt	le coarse to fine	Gravel	Med	ium Stiff
3	Infiltration	Rate at El. 604	l = 16.5 in/hr					
4	Same M	ottled Slit					Med	ium Stiff
5								
 6								
6								
7				_				
_	End	of Test Pit at 7	<u>'+</u>					
8								
9_								
10								
12								
¹³ —								
14								
						SESI CONS		NCINEEDO

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PI	ſ NO.	TP-39
LOC	CATION	SEE FIGURE 1	APPROX. E	LEV.	608' <u>+</u>	INSPECT	ED BY	RR
WAT		RVATION	Seepage at 4	l' <u>+</u> / stai	nding water at 7	<u>+</u> DATE EX	CAVATED	4/31/2018
DEPTH FT.		DES	CRIPTION / SO	IL CLAS	SIFICATION			DENSITY OR
0	4" Topsoil							
1 2		n Silt, and coars			avel with occasion	al cobbles	Medi	um Stiff
3_		yey Silt, and co I cobbles and I		and, tra	ce Gravel with		Məd	ium Stiff
4 5	Same M	ottled Silt					Medi	um Stiff
6 <u> </u>								
7 <u> </u>								
 9	End of Tes	it Pit at 8 <u>+</u> Fee	t					
 10								
 11								
_								
¹³ —								
14						SESI CONS		NONEEDO

PRO	JECT NO. 9999 PRO	JECT Prop.	Logistics Center	TEST PIT	NO.	TP-40
LOC	ATION SEE FIGURE 1 APP	ROX. ELEV.	598' <u>+</u>	INSPECT	ED BY	RR
WAT	ER OBSERVATION	Seepage	at 9' <u>+</u>	DATE EX	CAVATED	4/31/18
DEPTH FT.	DESCRIPTIO	ON / SOIL CLAS	SIFICATION			DENSITY OI STENCY
0	4" Topsoil					
1	Light Brown Silt, and coarse to t	fine Sand, trace	Gravel with occas	ional cobbles	Mediu	Im Stiff
_	Brown clayey Slit, and coa	arse to fine Sand	d, little coarse to fin	e Gravel with		
2	occasional cobbles and bo	oulders			Mediu	um Stiff
3						
_	Infiltration Rate at El. 595	= 12 in/hr				
4						
5_						
°	Same Mottled Silt				Mediu	m Stiff
6					Modia	
7						
8_						
-						
9						
o_	End of Test Pit at 9 <u>+</u> Feet					
-						
1-						
2_						
_						
3						
4_						
				SESI CONSI		

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PI	г NO .	TP-41
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	596' <u>+</u>	INSPECT	ED BY	RR
WAT	ER OBSEI	RVATION	Se	epage	at 6.5' <u>+</u>	DATE EX	CAVATED	4/31/18
DEPTH FT.		DES	CRIPTION / SO		SSIFICATION			DENSITY OR
0	4" Topsoll							
-	Light Brow	n Silt, and coa	rse to fine Sa	nd, trad	ce Gravel with occa	slonal	Med	lum Stiff
1	cobbles							
-								
2								
-	Brown clay	vey Silt, and co	arse to fine S	and, liti	tie coarse to fine G	ravel	Med	lum Stiff
3	with occas	ional cobbles a	and boulders					
	Infiltration	Rate at el. 592	? = 12in/hr.					
4								
-	0							
5								
—	Sam	e Mottled Silf	t				Mediu	um Stiff
6								
7								
—								
8								
_								
9								
-								
10	1							
—			End of Test P	it at 10	<u>+</u> Feet			
11								
-								
12								
13								
—								
14								
					5	SESI CONS	ULTING E	NGINEERS

F				
PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	TP- 42
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 596'±	INSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepage at 12"±;	DATE EX	CAVATED	4/31/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	4" Topsoil			
1	Light-brown SILT, some coarse to fine Sand, trace Gravel, v occassional cobbies	vith	Med	ium Stiff
2 3 4				
4 5	Light-brown mottled SILT, some coarse to fine Sand, trace C with occassional cobbles and occasional boulder (USCS : SC/CL)	Gravel,	Medi	um Stiff
6 <u> </u>				to
7			Ş	Stiff
8 	End of Test Pit at 7.5± Feet			
9 <u> </u>				
10 <u> </u>				
11				
14				
NOTE:			C	ESI
	Fig. 78			NSULTING

PRO.	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-43	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	596' <u>+</u>	INSPECT	ED BY	RR	
WAT	ER OBSEI	RVATION	Se	epage	at 3.5' <u>+</u>	DATE EX	CAVATED	4/31/18	
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION			E DENSITY OR BISTENCY	
0	5" Topsoil								
1 2	Li	ght Brown Silt, occasional co		o fine S	and, trace Gravel v	vith	Medlum Stiff		
3_	Brown clay	ey Silt, and coa	irse to fine Sar	nd with	occasional cobbles	and boulders	s Medium Stiff		
4 4 5	Same N	fottled Silt					Medi	um Stiff	
6 <u> </u>									
7	End	of Test Pit at 6.	5 <u>+</u> Feet						
8									
9_									
11									
12									
_									
¹³ —									
14									

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PI	ΓNO.	TP-43A
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	603 ±	INSPECT	ED BY	RR
WAT	ER OBSEI	RVATION	Se	epage	at 4.75'	DATE EX	CAVATED	4/7/2018
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION			DENSITY OR
0	4" To	opsoíl						
-	Light	t brown SILT					Med	ium Stiff
1								
2 <u> </u>								
2								
3_								
	Brow	n Clayey Silt						
4	DIOW	IT Clayey Sill						
	Sa	me (Mottled S	it)					
5			,					
_								
6								
7								
8								
9_								
<u> </u>								
10								
_		i	End of Test Pi	it at 10	± Feet			
11								
_								
12								
_								
13								
14								ERS D.P.C.

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	'NO.	TP-44
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	584' <u>+</u>	INSPECT	ED BY	RR
WAT		RVATION	S	eepage	ə at 3' <u>+</u>	DATE EX	CAVATED	4/31/18
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION			DENSITY OR
0	4" Topsoil							
1 1 2	Light	Brown Silt, and	d coarse to fin	e Sanc	I, trace Gravel with	cobbles	Med	lum Stiff
3		own clayey Silt			Sand, little coarse t	o fine	Medi	ium Stiff
4								
-								
5								
6								
<u> </u>								
						1		
	End	of Test Pit at 7;	+ Feet					
8								
_								
9								(
10								
11_								
12								
_								
13								
_								
14								

PRO	IECT NO. 9999 PROJECT Prop. Logistics Center TEST PIT	NO.	TP-44A
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 582 ± INSPECT	ED BY	RR
WAT	ER OBSERVATION Light Seepage at 3' Heavy Seepage at 7' DATE EX	CAVATED	4/7/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OR
0	4" Topsoil		
1 1 2 2	Light brown SILT, and coarse to fine Sand, trace Gravel with Cobbles	Məd	um Stiff
3 4 5 6 7	Brown Clayey Mottled SILT, and coarse to fine Sand, little coarse to fine Gravel with Cobbles and Boulders	Medi	um Stiff
7 8	End of Test Pit at 8 ± Feet		
9 10 10 11 11 12 13 13 14 14 14			

PROJ	ECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT NO.	TP-45
LOCA	TION SEE FIGURE 1 APPROX. ELEV. 584 ±	INSPECTED BY	RR
WATE	ER OBSERVATION Seepage @ 5+ '	DATE EXCAVATED	4/31/201
EPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY C
0	4" Topsoil		
1 <u></u>	Light brown SILT, and coarse to fine Sand, trace Gravel with Cobbles		ium Stiff
2 <u> </u>	Brown Clayey Mottled SILT, and coarse to fine Sand, little control to fine Gravel with Cobbles and Boulders	carse Med	lum Stiff
4 <u> </u>	Infiltration Rate at El. 581.5 = 15 in/hr		
	Same (Mottled Silt)	Med	ium Stiff
6 <u> </u>			
_			
3			
_	End of Test Pit at 8 ± Feet		
-1			
-			
-			

PRO	JECT NO.	9999	PROJECT	So	outheast, NY	TEST PIT	NO.	TP- 46
LOC	ATION	SEE FIGURE 1	APPROX. EL	EV.	581' <u>+</u>	INSPECT	ED BY	JQ
WAT	ER OBSE	RVATION	Seepage at 2'3	"±; He	avy at 4.0'±	DATE EX	CAVATED	3/22/2018
DEPTH FT.		DES	CRIPTION / SOIL	. CLAS	SIFICATION			DENSITY OR
0	8" T	opsoil						
1 2	Ligh occa (US)	Med	ium Stiff					
3 4 5 6 7 8 9	Ligh with (USC	Medi	um Stiff					
10 11 12 13 14								
NOTE:		S	ESI					

PRO	JECT NO.	9999	PROJECT	Prop. I	Logistics Center	TEST PIT	NO.	TP-47	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	583' <u>+</u>	INSPECT	ED BY	RR	
TAW	ER OBSEI	RVATION	S	eepage	at 7' <u>+</u>	DATE EX	CAVATED	4/31/18	
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION		RELATIVE DENSITY CONSISTENCY		
	4" Topsoll Light Brow	n Silt, and coa	sional cobbles	Medium Stiff					
1 2	occa	Brown clayey aslonal cobbles			e Sand, trace Gra	avel with	Medi	um Stiff	
3 <u></u> 4	Infilt	ration Rate at I	El. 581 = 17 ir	v∕hr					
5 <u></u> 6 <u></u>	Sam	e Mottled Silt	:				Mediu	m Stiff	
7 7 8									
9	Endo	of Test Pit at 9	+ Feet						
10 <u> </u>			_						
¹¹ — — 12—									
 13									
14						SESI CONS			

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-48
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	581' <u>+</u>	INSPECT	ED BY	RR
WAT		RVATION	Se	epage a	at 7.5' <u>+</u>	DATE EX	CAVATED	4/31/18
DEPTH FT.		DESC	RIPTION / SO		SIFICATION			DENSITY OR
0	4" Topsoil							
1		ight Brown Cilt	fine Onevel	Mad	046			
		ight Brown Silt, with occasic	tine Gravel	Meai	um Stiff			
2								
-	Brov	vn clayey Silt, a	Med	lum Stiff				
3	with o	ccasional cobb						
4	Infiltration	Rate at El. 578	= 12 in/br					
		Talo al El. 070) — 12 mgm					
5								
_	Sam	e Mottled Sill					Medi	um Stiff
6								
7_								
_						1.		
8								
_								
9								
10								
			End of Test P	it at 10-	+ Feet			
11				-	_			
_								
12								
13								
14								
						SESI CONS		NGINEERS

PRO	JECT NO.	9999	r TEST Pl	PIT NO. TP-4					
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	586' <u>+</u>	INSPEC	TED BY	RR	
TAW	ER OBSEI	RVATION	Se	epage at	10.5' <u>+</u>	DATE EX	CAVATED	5/1/2018	
DEPTH FT.		DESC	RIPTION / SO		BIFICATION		RELATIVE DENSITY OR CONSISTENCY		
0	4" Topsoil								
1 <u></u>	Fill- Light Brown Silt, and coarse to fine Sand, trace Gravel with occasional cobble, brick, and concrete								
2	FIIL B	rown clayey Sil	t and coorne t	o fino Co	nd little second				
3	1	ccasional cobb			no, illie coarse				
—									
4 <u></u> 5									
ə									
6									
7_									
-									
8									
9	Same	e (Bottom of I	Footing from p	pervious	residence)		Medi	um Stiff	
»									
10	Same Mottled Silt								
_									
11									
-	End of Test Pit at El. 11 <u>+</u> Feet								
12									
 13									
14									

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PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-50		
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	588' <u>+</u>	INSPECT	ED BY	RR		
WAT	ER OBSE	RVATION		N/E		DATE EX	CAVATED	5/1/2018		
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION			DENSITY OR		
0	4" Topsoil									
1 1 2 	Fill- Light Brown Silt, some coarse to fine Sand, trace Gravel with occasional cobbles (Existing Drain line observed at 2 Feet below Grade)									
3 4 5		yey Silt, and co es and boulder	Medi	ium Stiff						
6 7 8										
9 10 11	Same M	ottled Silt		Medi	um Stiff					
12 12 13	End									
14 SESI CONSULTING ENGI										

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-50A
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	588	INSPECT	ED BY	RR
WAT	FER OBSEI	RVATION	Se	epage	at 10' <u>+</u>	DATE EX	CAVATED	5/2/2018
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION		RELATIVE DENSITY OF CONSISTENCY	
0	5" Topsoil							
1	Fill- Light Brown Silt, and coarse to fine Sand, trace Gravel with cobbles							ium Stiff
2	6-inch diameter clay pipe at 2' (From previous residence)							
3				se to fi	ne Sand, little coars	e to fine	Med	ium Stiff
4	Gravel with cobbles							1
5	Brow	n clayey Silt, a	nd coarse to f	îne Sa	nd, little coarse to f	ine	Med	ium Stiff
6	Grav	el with cobbles						
7								
—								
8 <u> </u>	Same	e Mottled Silt					Medi	um Stiff
9 <u> </u>								
10								
	End o	of Test Pit at 11						
_								
¹³								
14								

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100 m									
PRO.	JECT NO.	NO.	TP-51						
LOC	ATION S	SEE FIGURE 1	APPROX. E	LEV.	635.0±	INSPECT	ED BY	JQ	
WAT		VATION	Seepage at 7.	5±'		DATE EX	CAVATED	3/19/2018	
DEPTH FT.		DESC	CRIPTION / SOI	L CLA	SSIFICATION		RELATIVE DENSITY O CONSISTENCY		
0 <u> </u>	9" Тор	soil							
1_	Light B	Brown/Yellow	coarse to fine	Sand	, and Silt, trace Gra	ivel	Medi	um Dense	
2_	(USCS	6: SM)							
	Light B	irown Silt, sor	ne coarse to fir	ne San	d, travel Gravel with	occassional	Medi	um Stiff	
3	cobble	5							
4	(USCS	3: CL)							
	Light B	rown mottled	d Silt, some co	arse to	o fine Sand, little co	arse to fine	Medi	um Stiff	
5	Gravel	with occass	ional cobbles						
	(USCS	6: CL)							
6									
7_									
7									
8									
9									
10									
	T+ D'								
11_	Test Pit								
12									
13									
14	14								
NOTE:						SESI CONS	ULTING E	NGINEERS	

1								1
PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-52
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	634±'	INSPECT	ED BY	JQ
WAT	ER OBSE	RVATION	Seepage at 4±	:', Hea	vy seepage at 4.5±'	DATE EX	CAVATED	3/19/2018
DEPTH FT.		DES	CRIPTION / SO	IL CLA	SSIFICATION			E DENSITY OR BISTENCY
0	4" T	opsoil						
1 1 2	Ligh cobl (US	occassional	I Medium Stiff					
3								
4	Ligh Grav	Medi	um Stiff					
		CS: CL)						
5								
6_								
7								
8								
9								
 10	Test	Pit Completed	at 9.5± Feet					
12								
 13								
14								
NOTE:					S	ESI CONS	ULTING E	NGINEERS

PRO.	JECT NO. 9999 PROJECT Prop. Logistics Cente	r TEST PIT	NO.	TP-53
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 632±'	INSPECT	ED BY	JQ
WAT	ER OBSERVATION Heavy seepage at 5.5±'	DATE EX	CAVATED	3/19/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	6" Topsoil			
1	Light Brown/Yellow coarse to fine Sand, some Slit, trace Gra	avel (USCS: SM)	Mediu	Im Dense
_	Light Brown Silt, some coarse to fine Sand, trave Gravel w	vith occassional	Med	ium Stiff
2	cobbles			
	(USCS: CL)			
3	Light Brown mottled Silt, some coarse to fine Sand, little	coorse to fine	Modi	um Stiff
4	Gravel with occassional cobbles		Madi	un sun
_	(USCS: CL)			
5				
_				
6				
7_				
′ —				
8				
_				
9				
10	Test Pit Completed at 9.3± Feet			
11				
_				
12				
13				
14				
IOTE:		SESI CONS	ULTING E	NGINEERS

PROJECT	T NO. 9999 PROJECT Prop. Logistics Center	TEST DIT	PIT NO. TP-54							
			-							
LOCATIO		INSPECT	EDBY	JQ						
WATER C	OBSERVATION Seepage at 4±' Heavy seepage at 5±'	DATE EX	CAVATED	3/19/2018						
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR						
0	7" Topsoil									
1	Light Brown Silt, some coarse to fine Sand, trace Gravel with a	Medi	um Stiff							
2	cobbles (USCS: CL)									
3	Light Brown mottled Silt, some coarse to fine Sand, little coa	arse to fine	Med	ium Stiff						
	Gravel with occassional cobbles									
4	(USCS: CL)									
5										
6				to						
_				-						
7				9						
_										
8										
9										
				Stiff						
10				>uii						
	Test Pit Completed at 9.9±'									
11										
-										
12										
13										
14										
NOTE:	S	ESI CONSI	ULTING E	NGINEERS						

8									
PRO	JECT NO.	NO.	TP-55						
LOC	ATION	SEE FIGURE 1	APPROX. E	ELEV.	686±'	INSPECT	ED BY	JQ	
WAT	ER OBSE	RVATION	NE			DATE EX	CAVATED	3/19/2018	
DEPTH FT.		DES	CRIPTION / SO		SSIFICATION		RELATIVE DENSITY O		
0 <u> </u>	8" T	opsoil							
1 2	Ligh (USI	Gravel	Medi	um Dense					
 3		t Brown Silt, so CS: CL)	ome coarse to	fine Sa	and, trace Gravel		Medi	um Stiff	
4 4 5	Light cobb (USC	Med	ium Stiff						
6 7 8 9 10 11 11 12 13 	Light Brown mottled Silt, some coarse to fine Sand, little coarse to fine Gravel with occassional cobbles (USCS: CL) Test Pit Completed at 10.3±'								
14 NOTE:						SESI CONS	ULTING E	NGINEERS	

PRO	JECT NO.	'NO.	TP-56							
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	688±'	INSPECT	ED BY	JQ		
WAT	ER OBSEI	RVATION	Seepage at 10)±'		DATE EX	CAVATED	3/19/2018		
DEPTH FT.		DES	CRIPTION / SO		SSIFICATION			DENSITY OR		
0	4" To	opsoll								
1 2 3	_									
4										
	Grav	Brown mottle el with occass CS: CL)	ional cobbles	parse t	o fine Sand, little c	oarse to fine	Medi	um Stiff		
IOTE:						SESI CONS	ULTING E	NGINEERS		

*				
PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	TP-57
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 672 <u>+'</u>	INSPECT	ED BY	JQ
WAT	ER OBSERVATION 7' 0" seepage	DATE EX	CAVATED	3/28/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	4" Topsoil			
1	Light Brown/Yellow coarse to fine Sand and Silt, trace Grave		Medi	um Dense
2 3	Light Brown Silt, some coarse to fine sand, little coarse to fine Gravel with occassional cobbles	Ð	Mediu	um Stiff
4 	Light Brown mottled Silt, some coarse to fine Sand, little coar Gravel with occassional cobbles	se to fine	Mədiı	um Stiff
12	TEST PIT COMPLETED AT 11' 3"			
13 <u> </u>				
NOTE;	SE	SI CONSI	JLTING E	NGINEERS

PROJECT NO. 9999 PROJECT Prop. Logistics Center TEST PIT NO. LOCATION SEE FIGURE 1 APPROX. ELEV. 652+' INSPECTED BY	TP-101 RR
LOCATION SEE FIGURE 1 APPROX. ELEV. 652+' INSPECTED BY	RR
WATER OBSERVATION 4' 0" seepage DATE EXCAVATED	5/1/2018
FT. CONS	DENSITY OR
0 5" Topsoil	
1 Light brown Silt, and coarse to fine Sand, trace Gravel, with Mediu occassional cobbles 2	um Stiff
3 Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Media	um Stiff
4	
5	
—	to
7	
8	
9s	tiff
10	
12	
 13	
 14	
IOTE: SESI CONSULTING EN	GINEERS

PROJECT NO. 9999 PROJECT Prop. Logistics Center TEST PIT NO. TP-102 LOCATION SEE FIGURE 1 APPROX. ELEV. 671 ±' INSPECTED BY RR WATER OBSERVATION NE DATE EXCAVATED 5/1/2018 DATE EXCAVATED 5/1/2018 DEPTH DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY CONSISTENCY 0 4* Topsoil					
WATER OBSERVATION NE DATE EXCAVATED 5/1/2018 DEPTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY 0 4° Topsoil	PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	TP-102
DEFTIN DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY 0 4" Topsoil 1 Light brown Silt, and coarse to fine Sand, trace Gravel, with occassional cobbles Medium Stiff 2 Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel, with cobbles and occassional boulders Medium Stiff 3 Gravel, with cobbles and occassional boulders Medium Stiff 4	LOC	ATION SEE FIGURE 1 APPROX. ELEV. 671 <u>+'</u>	INSPECT	ED BY	RR
FT. DESCRIPTION / SOIL CLASSIFICATION CONSISTENCY 0 4" Topsoil	WAT	ER OBSERVATION NE	DATE EX	CAVATED	5/1/2018
Light brown Silt, and coarse to fine Sand, trace Gravel, with Coccassional cobbles Light brown Silt, and coarse to fine Sand, little coarse to fine Gravel, with cobbles and occassional boulders Medium Stiff Medium Stiff Medium Stiff Medium Stiff Medium Stiff TEST PIT COMPLETED AT 10.0 FEET TEST PIT COMPLETED AT 10.0 FEET TEST PIT COMPLETED AT 10.0 FEET		DESCRIPTION / SOIL CLASSIFICATION			
- occassional cobbles 2 Brown Clayey Silt, and coarse to fine Sand, little coarse to fine 3 Gravel, with cobbles and occassional boulders 4 - 5 - 6 - 7 - 8 - 9 - 10 - 11 - 12 - 13 - 14 -	0	4" Topsoil			
2 Brown Clayey Silt, and coarse to fine Sand, little coarse to fine 3 Gravel, with cobbles and occassional boulders 4	1 <u> </u>		ו	Medi	um Stiff
3 Gravel, with cobbles and occassional boulders Medium Stiff 4	2				
		Brown Clayey Silt, and coarse to fine Sand, little coarse to	fine		
5 6 7 8 9 10 10 10 11 12 13 14	3	Gravel, with cobbles and occassional boulders		Med	lum Stiff
5 6 7 8 9 10 10 10 11 12 13 14	4_				
6_ 7_ 7_ 8_ 9_ 10_ 10_ 11_ 12_ 13_ 14_ 14_ 14_ 12_ 14_ 14_ 14_ 14_ 12_ 14_ 14_ 14_ 14_ 14_ 14_ 14_ 14	_				
	5				
9 9 10 10 10 11 12 13 14	7				
9 9 10 10 10 11 12 13 14	_				
10	8				
— TEST PIT COMPLETED AT 10.0 FEET 11	9				
— TEST PIT COMPLETED AT 10.0 FEET 11					
11 12 13 14	10				
 13 14	11	TEST PIT COMPLETED AT 10.0 FEET			
 13 14	_				
 14	12				
 14					
14 OTE: SESI CONSULTING ENGINEERS					
OTE: SESI CONSULTING ENGINEERS	14				
	NOTE:		SESI CONS	ULTING E	NGINEERS

	0				
WATER OBSERVATION Seepage at 8'0" DATE EXCAVATED 5/2/2018 DEFTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY 0	PRO.	IECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	TP-103
DEFTH DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY 0 6-7" Topsoil	LOC	ATION SEE FIGURE 1 APPROX. ELEV. 667.5+'	INSPECT	ED BY	RR
FT. DEBCRIPTION / SOIL CLASSIFICATION Inclusive Defentition of Network 0 6-7" Topsoil	WAT	ER OBSERVATION Seepage at 8'0"	DATE EX	CAVATED	5/2/2018
Image: Construction of the stand Light brown Silt, and coarse to fine Sand, trace Gravel, with cobbles Medium Stiff Image: Construction of the stand Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel, with cobbles and occassional boulders Medium Stiff Image: Construction of the stand Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel, with cobbles and occassional boulders Medium Stiff Image: Construction of the stand Image: Construction of the stand Medium Stiff Image: Construction of the stand Image: Construction of the stand Medium Stiff Image: Construction of the stand Image: Construction of the stand Medium Stiff Image: Construction of the stand Image: Construction of the stand Medium Stiff Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Construction of the stand Image: Constructing the stand Image:		DESCRIPTION / SOIL CLASSIFICATION			
cobbles 2	0	6-7" Topsoil			
3. Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Medium Stiff 4. Gravel, with cobbles and occassional boulders Medium Stiff 5. - - 6. - - 7. - - 8. - - 9. - - 10. - TEST PIT COMPLETED AT 10.0 FEET 11. - - 12. - - 13. - - 14. - -	1 <u> </u>		h	Medi	ium Stiff
Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Medium Stiff 4					
6_ Same as above, mottled Silt Medium Stiff 7_ Same as above, mottled Silt Medium Stiff 8_ 9_ 10_ TEST PIT COMPLETED AT 10.0 FEET 11_ 12_ 13_ 14_	-		fine	Medi	um Stiff
- Same as above, mottled Silt Medium Stiff 7 - - 8 - - 9 - - 10 - - 10 - TEST PIT COMPLETED AT 10.0 FEET 11 - - 12 - - 13 - - 14 - -	5 <u> </u>				
	_	Same as above, mottled Silt		Medi	ium Stiff
10	_				
— TEST PIT COMPLETED AT 10.0 FEET 11 12 13 14	9				
— TEST PIT COMPLETED AT 10.0 FEET 11 12 13 14	10				
 13 14	11	TEST PIT COMPLETED AT 10.0 FEET			
 14					
14 DTE: SESI CONSUL TING ENGINEERS					
DTE: SESI CONSUL TING ENGINEERS	 14				
	OTE:		SESI CONSI	ULTING E	NGINEERS

PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT NO.	TP-104
LOC	ATION SEE FIGURE 1 APPROX, ELEV. 660+	INSPECTED BY	RR
WAT	ER OBSERVATION Seepage at 9'0"	DATE EXCAVATED	5/2/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY O SISTENCY
0	5" Topsoil		
1 2	Light brown Silt, and coarse to fine Sand, trace Gravel, with cobbles	Med	ium Stiff
3 4 5	Brown Clayey Silt, and coarse to fine Sand, little coarse to fi Gravel, with cobbles and boulders	ne Med	lum Stiff
6 <u> </u>			
-1			
7 8 9	Same as above, mottled Silt	Medi	um Stiff
7	Same as above, mottled Silt TEST PIT COMPLETED AT 9.5 FEET	Medi	um Stiff

ATION SEE FIGURE 1 APPROX. ELEV. 679±' ROBSERVATION Seepage at 8.75' DESCRIPTION / SOIL CLASSIFICATION 5" Topsoil Light brown Silt, and coarse to fine Sand, trace Gravel, with cobbles	CONS	RR 5/2/2018 DENSITY O SISTENCY
DESCRIPTION / SOIL CLASSIFICATION 5" Topsoil Light brown Silt, and coarse to fine Sand, trace Gravel, with	RELATIVE	DENSITY O
5" Topsoil Light brown Silt, and coarse to fine Sand, trace Gravel, with	CONS	
Light brown Silt, and coarse to fine Sand, trace Gravel, with	Medi	
	Medi	
		um Stiff
Brown Clayey Slit, and coarse to fine Sand, little coarse to f	lne Medi	um Stiff
Gravel, with cobbles and boulders		
Same as above, mottled Silt	Mediu	um Stiff
TEST PIT COMPLETED AT 9.0 FEET		
	Gravel, with cobbles and boulders Same as above, mottled Silt TEST PIT COMPLETED AT 9.0 FEET	Gravel, with cobbles and boulders Same as above, mottled Silt Media TEST PIT COMPLETED AT 9.0 FEET EST PIT COMPLETED AT 9.0 FEET SESI CONSULTING E

PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT NO.	TP-106		
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 671+		RR		
WAT	ER OBSERVATION NE	DATE EXCAVA	TED <u>5/2/2018</u>		
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		ATIVE DENSITY OR CONSISTENCY		
0	5" Topsoll				
1	Light brown Silt, and coarse to fine Sand, trace Gravel, with cobbles		Medium Stiff		
2					
3_	Brown Clayey Silt, and coarse to fine Sand, little coarse to fine		Medium Stiff		
	Gravel, with cobbies and boulders				
4					
4 5					
5					
6					
7					
_					
8					
9	Same as above, mottled Silt		Medium Stiff		
_	TEST PIT COMPLETED AT 9.0 FEET				
10					
11					
12					
_					
13					
14					
IOTE: SESI CONSULTING ENGINEERS					

LOCATION SEE FIGURE 1 APPROX. ELEV. 682-* INSPECTED BY RR WATER OBSERVATION Seepage at 9.0* DATE EXCAVATED 5/2/2 DEPTH DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSIT CONSISTENCY 0	PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center TES	T PIT NO.	TP-107
DEFTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSIT CONSISTENCT 0- 5" Topsoil 1- Light brown Sit, and coarse to fine Sand, trace Gravel, with cobbles Medium Stiff 2- - 3- Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel, with cobbles and boulders Medium Stiff 4- - 5- - 6- - 7- - 8- - 9- - 10- TEST PIT COMPLETED AT 10.0 FEET	LOÇ	ATION SEE FIGURE 1 APPROX. ELEV. 682+' INS	PECTED BY	RR
FT. DESCRIPTION / SOIL CLASSIFICATION CONSISTENCI CONSISTENCI 0 5" Topsoll	WAT	ER OBSERVATION Seepage at 9.0' DAT	E EXCAVATED	5/2/2018
Light brown Silt, and coarse to fine Sand, trace Gravel, with Light brown Silt, and coarse to fine Sand, trace Gravel, with cobbles Light brown Silt, and coarse to fine Sand, little coarse to fine Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel, with cobbles and boulders Brown Clayey Silt, and coarse to fine Sand, little coarse to fine Gravel, with cobbles and boulders Same as above, mottled Silt Medium Stiff TEST PIT COMPLETED AT 10.0 FEET Complementary Street Stree		DESCRIPTION / SOIL CLASSIFICATION		
Image: A source of the sour	0	5" Topsoil		
Gravel, with cobbles and boulders Medium Stiff Medium Stiff TEST PIT COMPLETED AT 10.0 FEET T	_		Mediu	m Stiff
9	4 5 6		Mediu	ım Stiff
TEST PIT COMPLETED AT 10.0 FEET	8 <u> </u>	Same as above, mottled Silt	Mədiur	n Stiff
4	1	TEST PIT COMPLETED AT 10.0 FEET		

BDO			RWTP-1
		PIT NO.	
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 651.0'± INSPE	CTED BY	JQ
WAT	ER OBSERVATION Not Encountered DATE	EXCAVATED	4/17/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OR
0	6" Topsoil		
1 1 2	Yellow-brown/light-brown SILT, and coarse to fine Sand, trace Gravel (USCS : CL)	Med	ium Stiff
3	Light-brown SILT, and coarse to fine Sand, little coarse to fine Gravel, with occasional Cobbles (USCS : CL)		
4		Med	ium Stiff
5 <u> </u>	Light-brown mottled SILT, and coarse to fine Sand, little coarse to fine Gravel, with occasional Cobbles (USCS : CL)	Məd	um Stiff
6 <u>—</u>			
7 <u> </u>			
8 <u> </u>			
9 <u> </u>	End of Test Pit at 9 ± Feet	-	
10 <u> </u>			
¹¹ —			
¹² —			
13 <u>—</u>			
14			
OTE: Reta	ining Wall B1-3	S	FSI



				RWTP-2
PRO	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT I	NO. [RW1F-2
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 655' ±	INSPECTE	DBY	JQ
WAT	ER OBSERVATION Seepage at 8' ±	DATE EXC	AVATED	4/17/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR ISTENCY
0	5" Topsoil			
1	Yellow-brown/light-brown SILT, and coarse to fine Sand, trac Gravel (USCS : CL)	e		
2 3	Light-brown SILT, and coarse to fine Sand, little coarse to fine Gravel, with occasional Cobbles (USCS : CL)	Ð		
-			Medi	um Stiff
4				
5	Light-brown mottled SILT, and coarse to fine Sand, little coars	se to		
	fine Gravel, with occasional Cobbles (USCS : CL)		Mediu	im Stiff
6				
	Boulder frequency increased with depth			
8				
9				
—	End of Test Pit at 9 ± Feet			
10				
11				
12				
_				
13				
-				
14				
NOTE: Reta	Figure 105			ESI



PROJ	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	RWTP- 3
LOC/	ATION SEE FIGURE 1 APPROX. ELEV. 644'+	INSPECTED BY	JQ
WATI	ER OBSERVATION Not Encountered	DATE EXCAVATED	4/17/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY O
0	3" Topsoli		
-1	Yellow-brown/light-brown SILT, and coarse to fine Sand,	trace Med	ium Stiff
1	Gravel (USCS : CL)		
2	Light-brown SILT, and coarse to fine Sand, little coarse to	o fine Med	ium Stiff
3_	Gravel, with occasional Cobbles (USCS : CL)		
4			
_	Light-brown mottled SILT, and coarse to fine Sand, little o	coarse to Med	lum Stiff
5	fine Gravel with occasional Cobbles (USCS : CL)		on our
6			
7	Boulder frequency increased with depth		
e			
9			
_	End of Test Pit at 9 ± Feet		
o			
-			
2			
3_			
1 I			



PRO	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	RWTP-4
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 622'+	INSPECTED BY	RR
WAT	ER OBSERVATION Seepage at 2' ±	DATE EXCAVAT	ED <u>5/2/2018</u>
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		TIVE DENSITY OR
0	4" Topsoil		
	Light Brown SILT, and coarse to fine Sand, trace Gravel wit	h Cobbles	
1	(USCS : CL)		Medium Stiff
2			
	Brown Clayey SILT, and coarse to fine Sand, little coarse to	fine Gravel	Medium Stiff
3	with Cobbles and Boulders (USCS : CL)		
-		1	
4			
-			
5_			
6			
7_	Boulders increased frequency with depth		Stiff
			to
8 <u></u>			Hard
9			
_	End of Test Pit at 9 ± Feet		
10			
_			
11			
12			
_			
13			
_			
14			
NOTE: Reta	Ining Wall B12-1 Figure 107		SESI



PRO	JECT NO. 9999 PROJECT Southeast, NY T	EST PIT	NO.	RWTP- 5
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 631'+ IN	ISPECTI	ED BY	RR
WAT	ER OBSERVATION Seepage at 9' ± D	CAVATED	5/2/2018	
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	3-4" Topsoll			
	Light Brown SILT, and coarse to fine Sand, trace Gravel with Co	obbies	Medi	um Stiff
1	(USCS : CL)			
2				
3	Brown Clayey SILT, and coarse to fine Sand, little coarse to fine	Gravel		
4	with Cobbles and Boulders (USCS : CL)			
∥ ⁴—				
5_				
°—			Mediu	ım Stiff
6				
0 ° –				
7_				
/ 				
8_	Same (Method Sills)			
	Same (Mottled Silt)		Mediu	m Stiff
9				
10				
t	End of Test Pit at 10 ± Feet			
11				
12				
_				
13				
_				
14				
NOTE: Reta	ining Wall B12-1 Figure 108			ESI



PRO	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT	NO.	RWTP-6
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 640'+	INSPECT	ED BY	RR
WAT	ER OBSERVATION Not Encountered	DATE EXC	AVATED	5/2/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR ISTENCY
0	4" Topsoil			
	Light Brown SILT, and coarse to fine Sand, trace Gravel with	Cobbles		
1	(USCS : CL)			
-			Medi	um Stiff
2_				
3_				
3				
	Brown Clayey SILT, and coarse to fine Sand, little coarse to fi	ne Gravel		
4	with Cobbles and Boulders (USCS : CL)			
5			Mediu	ım Stiff
6				
				to
7—				
8			5	Stiff
9				
9-				1
10	End of Test Pit at 9 ± Feet			
11_				
12				
13				
14				
NOTE: Reta	ining Wall B12-1		C	ECI
	Figure 109			ESI



10				
PRO	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT	NO.	RWTP- 7
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 642'+	INSPECT	ED BY	RR
WAT	ER OBSERVATION Seepage at 9' ±	DATE EX	CAVATED	5/2/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	5" Topsoil			
-	Light Brown SILT, and coarse to fine Sand, trace Gravel wit	h Cobbles	Medi	um Stiff
1	(USCS : CL)			
-				
2				
3				
3				
-	Brown Clayey SILT, and coarse to fine Sand, little medium to	o fine		
4	Gravel with Cobbles and Boulders (USCS : CL)			
5			Mediu	um Stiff
6				
7_				
'				
8_	Same (Mottled Silt)		Mediu	ım Stiff
°—				
9				
9_				
10				
11	-			
12	End of Test Pit at 11 ± Feet			
13				
14				
NOTE: Reta	ining Wall B12-2		-	
	Figure 110			ESI



			OTD 4
PRO	JECT NO. 9999 PROJECT Prop. Logistics Center TEST PIT	Г NO .	STP-1
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 626.0±' INSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepage at 2±'; Heavy seepage at 3±' DATE EX	CAVATED	3/28/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OR
0	4" Topsoil		
-	Light Brown Silt, some coarse to fine Sand, trace Gravel	Med	ium Stiff
1	(USCS: CL)		
2	Percolation Rate = 60 min/in @ Elv. 624.1	Medi	um Stiff
3	Light Brown mottled Silt, some coarse to fine Sand, little coarse to fine		
3 <u> </u>	Gravel with frequent cobbles and occasional Boulder		
4 <u> </u>	(USCS: CL)		
			4-
5_			to
_			1
6			
_			
7			
-		:	Stiff
8			
	Test Pit Completed at 8± Feet		
9			
10			
11			
_			
12			
_			
13			
_			
14			
OTE:	SESI CONS	ULTING E	NGINEERS

pr-				
PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	STP-2
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 628.0±'	INSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepage at 2±'	DATE EX	CAVATED	3/28/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	4" Topsoil			
-	Light Brown Silt, some coarse to fine Sand, little coarse to fir	ne Gravel	Med	lum Stiff
1	with occassional cobbles			
-	(USCS: CL)			
2				
	Percolation Rate: 120 min/in @ Elv. 626		Medi	lum Stiff
3_	Light Brown mottled Silt, some coarse to fine Sand, little coa	rse to fine		
	Gravel with occassional cobbles			
4	(USCS: CL)			
5_				
°—				
6				1
°—				
7_				
8				
_				
9	Test Pit Completed at 8.5± Feet			
-				
10				
-				
11				
-				
12				
13				
14				
IOTE:	SI	ESI CONSI	JL TING F	NGINEERS

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	STP-3
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	632±'		ED BY	JQ
WAT	WATER OBSERVATION Seepage at 6±' DATE					DATE EX	CAVATED	3/28/2018
DEPTH FT.				DENSITY OR				
0	6" To	opsoli						
1 2	Light (USC	Medlum Dense						
_	Perc	olation Rate =	40 min/in @ E	iv. 630)		Med	ium Stiff
3				fine Sa	and, little coarse to	fine Gravel		
4	with occassional cobbles (USCS: CL)							
	(050						Medi	um Stiff
5	Light	Brown mottles	d Silt, some co	arse to	o fine Sand, little o	parse to fine		
-	Grave	el with occassi	ional cobbles a	and bo	ulders			
6	(USC	CS: CL)						
7_								
8_								
9								
10	Test l	Pit Completed	at 9.5± Feet					
_								
11								
_								
12								
13								
14								
NOTE:						SESI CONS		NCINEEDS

1								
PRO.	JECT NO.	9999	PROJECT	Prop.	Logistics Center		NO.	STP-4
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	631.0±'	INSPECT	ED BY	JQ
WAT	WATER OBSERVATION Seepage at 6'10"± DATE E					DATE EX	CAVATED	3/28/2018
DEPTH FT.				E DENSITY OR DISTENCY				
0	6" To	opsoil						
1 <u> </u>		t Brown/Yellow CS: SM)	avel	Mediu	ım Dense			
2			00 la /la -O -	1 000				
			30 min/in @ E		nd, little coarse to	fine Gravel	Medi	um Stiff
3		occassional co						
		CS: CL)						
4								
_	Light	Brown mottle	d Silt, some co	arse to	o fine Sand, little c	parse to fine	Medi	m Stiff
5	Grav	el with occass	ional cobbles					
_	(USC	S: CL)						
6								
								to
7_								
8								
9								Stiff
-	Test	Pit Completed	at 9.1± Feet					
10								
-								
11								
_								
12								
_								
13								
_								
14								
NOTE:						SESI CONS	ULTING F	NGINEERS

PRO	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT	NO.	STP- 5
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 618'+	INSPECTI	ED BY	JQ
WAT	ER OBSERVATION Seepage at 3'4"±	DATE EX	CAVATED	3/22/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	3" Topsoli			
-				
1	Light-brown SILT, some coarse to fine Sand, trace Gravel, wi	ith		
-	occassional cobbles (USCS : SC/CL)		Med	ium Stlff
2				
	Percolation Rate = 40 min/in @ Elv. 616		Med	ium Stiff
3	Light-brown mottled SILT, some coarse to fine Sand, trace G	ravel,		
	with occassional cobbles			
4	(USCS : SC/CL)			
5				
6				
7_				
'				
8				
9				
10	End of Test Pit at 9.5± Feet			
_				
11				
_				
12		1		
13				
_				
14				
NOTE:			C	FSI



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PRO.	JECT NO.	9999	PROJECT	Southeast, NY	TEST PIT	'NO.	STP- 6
LOC	ATION	SEE FIGURE 1	APPROX. ELI	EV. 613' <u>+</u>	INSPECT	ED BY	JQ
WAT	ER OBSE	RVATION	Seepage at 8'10)"±	DATE EX	CAVATED	3/22/2018
DEPTH FT.		DES	CRIPTION / SOIL	CLASSIFICATION			DENSITY OR
0 <u> </u>	8" T	opsoil					
1 <u> </u>	-	t-brown SILT, CS : SC/CL)	and coarse to fin	e Sand, trace Gravel		Med	ium Stiff
2		-	15 min/in @ Elv	^{7.} 610.9			
3							
4	Ligh	t-brown mottle	d SILT, some co	arse to fine Sand, trace	e Gravel,	Medi	um Stiff
-	with	occassional co	obbles				
5	(US	CS : SC/CL)					
6							
7_							
8							
_							
9							
-							
10							
11			End of Test Pit a	t 10.5± Feet			
12							
13							
_							
14							
IOTE:						S	FSI



PROJECT NO. 9999 PROJECT Prop. Logistics Center TEST P	IT NO.	STP-7	
LOCATION SEE FIGURE 1 APPROX. ELEV. 616.0±' INSPEC	TED BY	JQ	
WATER OBSERVATION Seepage at 6.5±' DATE E	XCAVATED	3/28/2018	
DEPTH FT. DESCRIPTION / SOIL CLASSIFICATION	RELATIVE DENSIT		
0 6" Topsoil			
1 Light Brown Silt, and coarse to fine Sand, trace Gravel (USCS: CL)	Med	ium Stiff	
2 Percolation Rate = 40 min/in @ Elv. 614.0			
 Light Brown mottled Silt, some coarse to fine Sand, little coarse to fine Grave with occassional cobbles 	I Medi	um Stiff	
6		to	
7			
8	:	Stiff	
9 Test Plt Completed at 8.5± Feet			
11 12			
14 NOTE: SESI CON	 Sulting F	NGINEERS	



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PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	STP-8
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 619.0±'	NSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepage at 6±'	DATE EX	CAVATED	3/28/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	3" Topsoil			
1	Light Brown/Yellow medium to fine Sand, and Silt, trace Grave (USCS: SM)		Medi	um Dense
_	Light Brown Silt, some coarse to fine Sand, little coarse to fine	Gravel	Med	lum Stiff
2	with occassional cobbies			
	(USCS: CL)			
3	Percolation Rate = 120 min/in @ Elv. 617.0			
4	Light Brown mottled Silt, some coarse to fine Sand, little coarse	e to fine	e Medium Stiff	
-	Gravel with occassional cobbles			
5	(USCS: CL)			
6				
7_				
(-				
8				
<u> </u>				
9				
_	Test Pit Completed at 9± Feet			
10				
_				
11				
_				
12				
_				
13				
-				
14				
NOTE:	SES	I CONS	ULTING E	NGINEERS

WATER OBSERVATION Seepage at 4±' DATE EXCAVATED DEPTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE IS CONSIST	STP-9 JQ 3/28/2018 DENSITY OR ISTENCY
WATER OBSERVATION Seepage at 4±' DATE EXCAVATED DEPTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE I CONSIST	3/28/2018 DENSITY OR ISTENCY
DEPTH DESCRIPTION / SOIL CLASSIFICATION RELATIVE CONSIST	DENSITY OR ISTENCY
FT. DESCRIPTION / SOIL CLASSIFICATION CONSIS	ISTENCY
	um Céléé
0 6" Topsoil	
1 — Light Brown Silt, some coarse to fine Sand, trace Gravel Mediur (USCS: CL) Percolation Rate = 40 min/in @ Elv. 642.0	un Sun
3 Light Brown mottled Silt, some coarse to fine Sand, little coarse to fine Gravel Medium	ım Stiff
14 SESI CONSULTING EN	NGINEERS

r								
PRO	JECT NO. 9999 PROJECT Southeast, NY TEST PI	IT NO. STP-						
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 645'+ INSPECT	ED BY	JQ					
WAT	ER OBSERVATION Light seepage at 4'9"±; Heavy at 5'2"± DATE EX	CAVATED	3/22/2018					
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR					
0	8" Topsoil							
1 <u> </u>	Light-brown SILT, and coarse to fine Sand, trace Gravel (USCS : SC/CL)	Med	lium Stiff					
2	Percolation Rate = 20 min/in @ Elv. 643.0							
3								
4	Light-brown mottled SILT, some coarse to fine Sand, trace Gravel,	Medium Stiff						
5_	with occassional cobbles (USCS : SC/CL)							
6 <u> </u>		to						
 7								
			0.000					
_			Stiff					
9 <u> </u>								
10	End of Test Pit at 9.0± Feet							
11								
12								
 13								
 14								
NOTE:		2	FSI					



PRO	JECT NO.	9999	PROJECT	Southeast,	NY	TEST PIT	NO.	STP- 11	
LOC	ATION	SEE FIGURE 1	APPROX. ELI	EV. 645	;' <u>+</u>	INSPECT	े ED BY	JQ	
WAT	ER OBSE	RVATION	Seepage at 7'6"	±		DATE EX	CAVATED	3/22/2018	
DEPTH FT.		DES	CRIPTION / SOIL	CLASSIFICATI	ON			DENSITY OR	
0	10" -	Topsoil							
1_				-					
_		t-drown Sill), a	and coarse to fin	e Sand, trace	Gravel		Med	ium Stiff	
2	Perc	olation Rate =	15 min/in @ Elv	. 643.0					
3									
<u> </u>	Light-brown mottled SILT, some coarse to fine Sand, trace Gravel, Medium Stiff								
4		occassional co	Gravel,	INGO					
-	(USC	CS : SC/CL)							
5									
6									
_									
7									
°_									
9									
-									
10			End of Test Pit a	at 9.0± Feet					
11_									
_									
12									
¹³ —									
14									
NOTE:							S	ESI	



1										
PRO.		9999	PROJECT	Prop	. Logistics Center	TEST PIT	IT NO. STP-1			
LOC	ATION SEE	FIGURE 1	APPROX. E	LEV.	645.0±'	INSPECT	ED BY	JQ		
WAT	ER OBSERVAT		Seepage at 4	2		DATE EX	CAVATED	3/28/2018		
DEPTH FT.		DESC	RIPTION / SOI	L CLA	SSIFICATION			DENSITY OR		
0	6" Topsoil	l								
1	-		d coarse to fir	ne San	d, trace Gravel		Medi	um Stiff		
2_	(USCS: CL)									
	Percolation Rate = 60 min/in @ Elv. 643.0 Medium Stiff									
3					o fine Sand, little c	oarse to				
4		fine Gravel, with occassional cobbles								
	(USCS: C	E)								
5_										
5—								l,		
6										
7_										
8_										
9	Test Pit Co	ompleted	at 8.5± Feet							
-										
10										
-										
11										
-										
12										
_										
13										
14					_					
NOTE:						SESI CONS	ULTING E	NGINEERS		



PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	STP-13				
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 639.0±	INSPECT	ED BY	JQ				
WAT	ER OBSERVATION Seepage at 4±'	DATE EX	CAVATED	3/28/2018				
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			E DENSITY OR DISTENCY				
0	6" Topsoil							
1 <u> </u>	Light Brown Silt, some coarse to fine Sand, trace Gravel (USCS: CL)		Medi	um Stiff				
2 <u> </u>	Percolation Rate = 30 min/in @ Elv. 637.0							
3 <u> </u>	Light Brown mottled Silt, some coarse to fine Sand, little co	parse to fine	Medi	um Stiff				
4	Gravel with occassional cobbles and boulder							
	(USCS: CL)							
5								
6_								
7_								
8								
_								
9								
-	Test Pit Completed at 9± Feet							
10								
11								
12								
13								
_								
14								
NOTE:		SESI CONS	ULTING E	NGINEERS				



PROJ	ECT NO.	9999	PROJECT	Prop	. Logistics Cent	er TES	T PIT	NO.	STP-14
LOCA	TION	SEE FIGURE 1	APPROX. E	LEV.	639.0±	INS	PECT	TED BY JQ	
WATE	ER OBSEI	RVATION	Seepage at 6:	?		DAT	'E EX	CAVATED	3/28/2018
DEPTH FT.		DESC	CRIPTION / SO	L CLA	SSIFICATION			RELATIVE DENSITY OR CONSISTENCY	
0 <u> </u>	8" To	opsoll							
1 2		t Brown Silt, an CS: CL)		Medi	um Stiff				
3_	Percolation Rate = 10 mln/in @ Elv. 637.0 Medium Stiff Light Brown Silt, some coarse to fine Sand, trace Gravel (USCS: CL)								um Stiff
4 4 5	Light Brown mottled Silt, some coarse to fine Sand, little coarse to fine Gravel with occassional cobbles (USCS: CL)							Medium Stiff	
6 <u> </u>									to
8 9								S	Stiff
10 10 11	Test	Pit Completed	at 9.25±'						
12 <u> </u>									
14 OTE:				_		SESI C	ONS	UI TING F	NGINEERS

PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center TE	ST PIT NO.	STP-15		
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 639.0±' INS	SPECTED BY	JQ		
WAT	ER OBSERVATION Light seepage at 4.5±'; Heavy seepage at 7±' DA	TE EXCAVATED	3/28/201		
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		RELATIVE DENSITY OF		
0	9" Topsoil				
_					
1	Light Brown Silt, and coarse to fine Sand, trace Gravel	Med	lum Stiff		
2	(USCS: CL) Percolation Rate = 2.3 min/in @ Elv. 637.0				
_					
3					
-	Light Brown mottled Silt, some coarse to fine Sand, little coarse to	o fine Med	lum Stiff		
4	Gravel with occassional cobbles				
5_	(USCS: CL)				
6 7			to		
_					
7_					
-					
8					
9			Stiff		
	Test Pit Completed at 9± Feet				
0					
-					
1					
2					
3					
4					
ГЕ;	SESI (NGINEER		

PRO	ECT NO. 9999 PRO	JECT Prop	. Logistics Center	TEST PIT	NO.	STP-16
LOC	TION SEE FIGURE 1 APP	ROX. ELEV.	638.0±	INSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepa	ge at 3±'		DATE EX	CAVATED	3/28/2018
DEPTH FT.	DESCRIPTIC	ON / SOIL CLA	SSIFICATION			E DENSITY OR
0	4" Topsoil					
1	Light Brown Silt, some coa (USCS: CL)	Medi	um Stiff			
2	Percolation Rate = 15 min	/in @ Elv. 636	3.0		Medi	um Stiff
-	Light Brown mottled Clays	y Silt, some c	oarse to fine Sand,	little coarse		
3	to fine Gravel with occass	ional cobbles				
	(USCS: CL)					
4						
5						
_						
6						
7_						
8						
_						
9						
_	Test Pit Completed at 9± F	eet				
10						
11)
-						
12						
13						
14						
DTE:				SESI CONS	ULTING E	NGINEERS

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PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center	EST PIT	NO.	STP- 17	
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 638'± i	INSPECTED BY		JQ	
WAT	ER OBSERVATION Seepage at 7'	DATE EXC		3/19/2018	
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR	
0	6" Topsoll				
1	Light-brown SILT, some medium to fine Sand, trace Gravel		Medium Stiff		
	Percolation Rate = 30 min/in @ Elv. 636.0				
2					
3_					
3					
4					
5_					
°—	Light-brown mottled SILT, some medium to fine Sand, little coa	rea to	Medi	um Stiff	
6	fine Gravel, with occassional cobbles	150 10	MOUN		
7					
8					
9					
10	End of Test Pit at 10.1 Feet				
11					
-					
12					
 13					
14					
NOTE:			S	ESI	



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PRO.	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	STP- 18	
LOC		SEE FIGURE 1	APPROX. E	LEV.	640' <u>+</u>	INSPECT	ED BY	JQ	
WAT	ER OBSER	VATION	Seepage at 7'			DATE EX	CAVATED	3/19/2018	
DEPTH FT.		DESC	CRIPTION / SO	IL CLAS	SIFICATION			DENSITY OR	
0	8" Toj	osoli							
1	Light-l	brown/yellow	ravel	Medium Stiff					
2 3	Light-brown SILT, some medium to fine Sand, little coarse to fine Gravel Media Percolation Rate = 17.1 min/in @ Elv. 638.0								
4 4 5									
6 6 7 8 9 10			I SILT, some i cassional cob		n to fine Sand, little d boulder	coarse to	Medi	um Stiff	
 11 12 13 14		1	End of Test Pi	t at 10.:	2 Feet				
NOTE:			Fig. 128					ESI	

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	STP- 19	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	649' <u>+</u>	INSPECT	ED BY	JQ	
WAT	ER OBSE	RVATION		8'+		DATE EX	CAVATED	3/19/2018	
DEPTH FT.		DESC	CRIPTION / SO	IL CLAS	SIFICATION		RELATIVE DENSITY OR CONSISTENCY		
0	8" T	8" Topsoil							
1 <u> </u>	Light-brown/yellow coarse to fine Sand, some Silt, little coarse to fine Medium Dense Gravel, with occassional cobbles and boulders								
3_	Light-brown SILT, some coarse to fine Sand, little coarse to fine Gravel, Medium Stiff								
4	with occassional cobbles and boulders Percolation Rate = 17.1 min/in @ Elv. 647.0								
5 6 7 7 8 9 10 11 11		vel, with occass		and bo		rse to fine	Medi	um Stiff	
12 13 14									
NOTE:							S	ESI	



PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	STP- 20
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	648' <u>+</u>	INSPECT	ED BY	JQ
WAT	ER OBSER	RVATION	Seepage at 8'	5"		DATE EX	CAVATED	3/19/2018
DEPTH FT.		DESC	CRIPTION / SO	IL CLAS	SSIFICATION			E DENSITY OF
0	6 [∗] To	opsoil						
1_	Light	-brown/yellow	medlum to fin	e Sand	, and Silt, trace Gr	avel	Med	ium Dense
2	Percolation Rate = 30 min/in @ Elv. 646.0							
3	Liabt		and medium to	fine S	and, little coarse to	fine Crovel	Mad	ium Dense
4	Ligin	-DIOWIT GILT, 6			and, illie coarse lo		Medi	um Dense
4 4 5								
_	Light-	brown mottled	d Silt, some me	edium t	o fine Sand, little o	coarse to fine	Medi	ium Stiff
6	Grave	el, with occass	ional cobbles					
6 7								
8_								
°								
9								
10								
		I	End of Test Pi	t at 10.	0 Feet			
¹¹ —								
12								
13								
14 OTE:							<u> </u>	ECI
			Fig. 130					ESI

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PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center TEST	PIT NO.	STP- 21		
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 638'+ INSPE	CTED BY	JQ		
WAT	ER OBSERVATION Not Encountered DATE	EXCAVATED	3/19/2018		
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR SISTENCY		
0	12" Topsoil				
1_					
2	Light-brown/yellow coarse to fine Sand, and Silt, trace Gravel	Medi	um Dense		
	Light-brown SILT, and medium to fine Sand, little coarse to fine Grave	əl Medi	um Stiff		
3	Percolation Rate = 10 min/in @ Elv. 636.0				
4					
_	Light-brown mottled Silt, some medium to fine Sand, little coarse to fi	ne Medi	Medium Stiff		
5	Gravel, with occassional cobbles				
6			to		
7					
8			Stiff		
9					
10	End of Test Pit at 9.5 Feet				
_					
11					
12					
¹³ —					
14					
NOTE:	Fig. 131		ESI		
		00	NSULTING		

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PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	STP- 22
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 646'+	ON SEE FIGURE 1 APPROX. ELEV. 646'+ INSPECTI		JQ
WAT	ER OBSERVATION Seepage at 9'±	DATE EX	CAVATED	3/19/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	4" Topsoil			
1 <u> </u>	Light-brown SILT, some coarse to fine Sand, trace Gravel volution occassional cobbies	vith	Med	ium Stiff
2	Percolation Rate = 30 min/in @ Elv. 644.0			
 3 4				
4				
5				
6	Light-brown mottled Slit, some coarse to fine Sand, little coa Gravel, with occassional cobbles	arse to fine	Med	ium Stiff
_	Gravel, with occassional cobbles			
7_				
8				
9_				
10				
	End of Test Pit at 10.5 Feet			
12				
13				
14				
NOTE:			S	ESI
	Fig. 132		00	NSULTING

17									
PRO.	JECT NO.	9999	PROJECT	Prop	. Logistics Cen	ter TES	T PIT	NO.	STP- 23
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	644' <u>+</u>	INSF	PECT	ED BY	JQ
WAT	ER OBSE	RVATION	Seepage at 8	±		DAT	EEX	CAVATED	3/19/2018
DEPTH FT.		DES	CRIPTION / SO	IL CLA	SSIFICATION				DENSITY OR
0	4" T	opsoil							
1 <u> </u>			/ SILT, some c sional cobbles		o fine Sand, litt	le coarse to	fine	Med	ium Stiff
3	-	t-brown SILT, occassional c		o fine (Sand, little coar	se to fine G	ravel,	Med	ium Stiff
4_	Perc	colation Rate =	: 15 min/in @ E	Elv. 642	2.0				
	-		d SILT, some o		to fine Sand, lit oulders	tle coarse to) fine	Med	ium Stiff
8 <u></u> 9 <u></u> 10 <u></u>									
			End of Test P	it at 10	.3 Feet				
NOTE:			El 400					S	ESI



8F					
PRO	JECT NO. 9999 PROJECT Prop. Log	istics Center	TEST PIT	NO.	STP- 24
LOC	ATION SEE FIGURE 1 APPROX. ELEV.	649' <u>+</u>	INSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepage at 7'4"±		DATE EX	CAVATED	3/19/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIF	ICATION			DENSITY OR
0	8" Topsoil				
1	Light-brown/yellow SILT, some medium to fi	ne Sand, trace	Gravel	Med	ium Stiff
2 3	Light-brown SILT, some medium to fine Sand Percolation Rate = 10 min/in @ Elv. 647.0	I, little coarse to	o fine Gravel,	Med	lum Stiff
	Light-brown mottled SILT, some medium to fi Gravel, with occassional cobbles	ne Sand, little o	coarse to fine	Med	ium Stiff
10 11 12 13 13 14	End of Test Pit at 10.2 Fe	et			
NOTE:	Fig. 134				ESI

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PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	STP- 25
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 657'+	INSPECTE	D BY	JQ
WAT	ER OBSERVATION Seepage at 5'6"±	DATE EXC	AVATED	3/19/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	8" Topsoil			
1	Light-brown/yellow coarse to fine SAND, and Silt, little coarse to	fine Gravel	Mediu	m Dense
2	Percolation Rate = 40 min/in @ Elv. 655.0			
3_	Light-brown SILT, some coarse to fine Sand, little coarse to with occassional cobbles	fine Gravel,	Medi	ium Stiff
4 <u> </u>				
 5	Light-brown mottled SILT, some coarse to fine Sand, little co Gravel, with occassional cobbles	arse to fine	Med	ium Stiff
6 7				
7				
8 <u> </u>	End of Test Plt at 8.0 Feet			
9				
10				
 11				
_				
13 <u>—</u>				
14 NOTE:			2	
	Fig. 135		<u> </u>	

PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center TES	ST PIT NO).	STP- 26
LOC	LOCATION SEE FIGURE 1 APPROX. ELEV. 655'+ INSPECTE			JQ
WAT	ER OBSERVATION Seepage at 6.5'± DA		ATED	3/19/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION	RE		DENSITY OR
0	4" Topsoil			
1 1 2	Light-brown SILT, some coarse to fine Sand, little coarse to fine G with occassional cobbles	Gravel,	Medi	um Stiff
1	Percolation Rate = 13.3 min/in @ Elv. 653.0			
3 3 4 5	Brown coarse to fine SAND, some Slit, trace Gravel		Mediu	n Dense
4				
5				
6				
7	Light-brown mottled SILT, some coarse to fine Sand, trace Gravel	9	Mədiu	um Stiff
7 8	with occassional cobbles			
° 9	End of Test Pit at 8.0 Feet			
_				
10				
11_				
_				
12				
13				
_				
14				
NOTE:			S	ESI



8				
PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	STP- 27
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 652'+	INSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepage at 8'±	DATE EX	CAVATED	3/19/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	4" Topsoil			
1 <u></u>	Light-brown SILT, some coarse to fine Sand, trace Gravel, with occassional cobbles		Med	lum Stiff
2	Percolation Rate = 24 mln/in @ Elv. 650.0			
3_				
_				
4				
5 <u> </u>				
	Light-brown mottled SILT, some coarse to fine Sand, trace with occassional cobbles	Gravel,	Medi	um Stiff
6				
_				
7				
8				
°				
9				
_	End of Test Pit at 9.0 Feet			
10				
_				
11				
12				
_				
13				
-				
14				
IOTE:			S	ESI



1			1	
PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	STP- 28
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 648'+	NSPECTE	ED BY	JQ
WAT	ER OBSERVATION Seepage at 8'±	DATE EXC	CAVATED	3/19/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	8" Topsoil			
1	Light-brown/yellow coarse to fine SAND, and Silt, trace Gravel		Mediu	m Dense
2	Percolation Rate = 7.2 min/in @ Elv. 646.0			
3 4 5	Light-brown SILT, some coarse to fine Sand, little coarse to fin with occassional cobbles	e Gravel,	Medi	um Stiff
5 6 7 8	Light-brown mottled SILT, some coarse to fine Sand, little coars	se to	Medi	um Stiff
9 9 10 10 11 12 13 13 14 14 14	End of Test Pit at 8.5 Feet			
NOTE:			S	ESI



1			
PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center TES	ST PIT NO.	STP- 29
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 657'± INS	PECTED BY	JQ
WAT	ER OBSERVATION Seepage at 7'± DA	TE EXCAVATED	3/19/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OR SISTENCY
0	4" Topsoil		
1 1 2	Light-brown SILT, some coarse to fine Sand, trace Gravel, with occassional cobbles	Media	um Dense
	Percolation Rate = 10 min/in @ Elv. 655.0		
 3 4 5 6 7 8	Brown/gray mottled SILT, some coarse to fine Sand, trace Gravel	Med	llum Stiff
9 10 11 11 12 13 14 14 12	End of Test Pit at 8.5 Feet		
NOTE:		S	ESI



1								
PRO.	JECT NO.	9999	PROJECT	Prop. L	ogistics Center	TEST PIT	NO.	STP- 30
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	655' <u>+</u>	INSPECT	ED BY	JQ
WAT	ER OBSE	RVATION	Light seepage	e at 5'5"±;	Heavy at 6'±	DATE EX	CAVATED	3/19/2018
DEPTH FT.		DES	CRIPTION / SO		FICATION			DENSITY OR
0 <u> </u>	8" T	opsoil						
1	Ligh	t-brown/yellow	coarse to fine	SAND, a	and Silt, trace Gra	vel	Mediu	ım Dense
2 <u></u>		colation Rate = -brown SILT, son	-		e Gravel, with occas	ional cobbles	Med	ium Stiff
3 <u> </u>					fine Sand, little c		Medi	lum Stiff
4		el, with occase					iniou	
5_								
6_								
7								
_								
9			End of Test F	Pit at 9.0 l	Feet			
¹⁰ —								
11								
12								
13								
 14								
IOTE:							S	ESI



-				
PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	STP- 31
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 652'+	INSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepage at 7'±	DATE EX	CAVATED	3/19/2018
DEPTH FT,	DESCRIPTION / SOIL CLASSIFICATION		1 V	DENSITY OR
0	4" Topsoil			
'	Light-brown/yellow SILT, some coarse to fine Sand, trace (with occassional cobbles	Gravel,	Med	ium Stiff
2	Percolation Rate = 10.9 min/in @ Elv. 650.0		6	
3				
-	Light-brown mottled SILT, some coarse to fine Sand, little c	oarse to fine	Medi	um Stiff
4	Gravel, with occassional cobbles			
4 <u> </u>				
6				
7_				
_				
8				
_				
9				
10	End of Test Pit at 9.0 Feet			
11_				
_				
12				
_				
13				
14				
OTE:				
			S	ESI



PRO	JECT NO. 9999 PROJECT Prop. Logistics Center T	EST PIT NO.	STP- 32
LOC		NSPECTED BY	JQ
WAT	ER OBSERVATION Seepage at 6.5'± D		D 3/19/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		IVE DENSITY OR
0	8" Topsoil		
1	Light-brown/yellow coarse to fine SAND, and Silt, trace Gravel	Me	dlum Dense
2	Percolation Rate = 12 min/ln @ Elv. 645.0		
3 4 5	Light-brown SILT, some coarse to fine Sand, trace Gravel, with occassional cobbles	N	ledium Stiff
5 6 7 8	Light-brown mottled SILT, some coarse to fine Sand, little coarse Gravel, with occassional cobbles	e to fine M	edium Stiff
8			
9 10 10 11 11 12 13 13 14 14 14 12	End of Test Pit at 8.0 Feet		
NOTE:			SFSI



Definitions of Identification Terms for Granular Soils

Our experience has shown that the following field identification system, which is patterned somewhat after the Burmister System, permits a more detailed breakdown of the components within a soil sample than other identification systems allow. It also compels the supervising technician to examine a sample quite closely in order to accurately describe the components within the sample.

Principal Component (All Capitalized)

- GRAVEL More than 50% of the sample by weight is Gravel
- SAND More than 50% of the sample by weight is Sand
- SILT More than 50% of the sample by weight is Silt

Minor Component (Proper Case)

- Gravel Less than 50% of the sample by weight is Gravel
- Sand Less than 50% of the sample by weight is Sand
- Silt Less than 50% of the sample by weight is Silt

Proportion Terms

- and Component ranges from 35% to 50% of the sample by weight
- some Component ranges from 20% to 35% of the sample by weight
- little Component ranges from 10% to 20% of the sample by weight
- trace Component ranges from 0% to 10% of the sample by weight

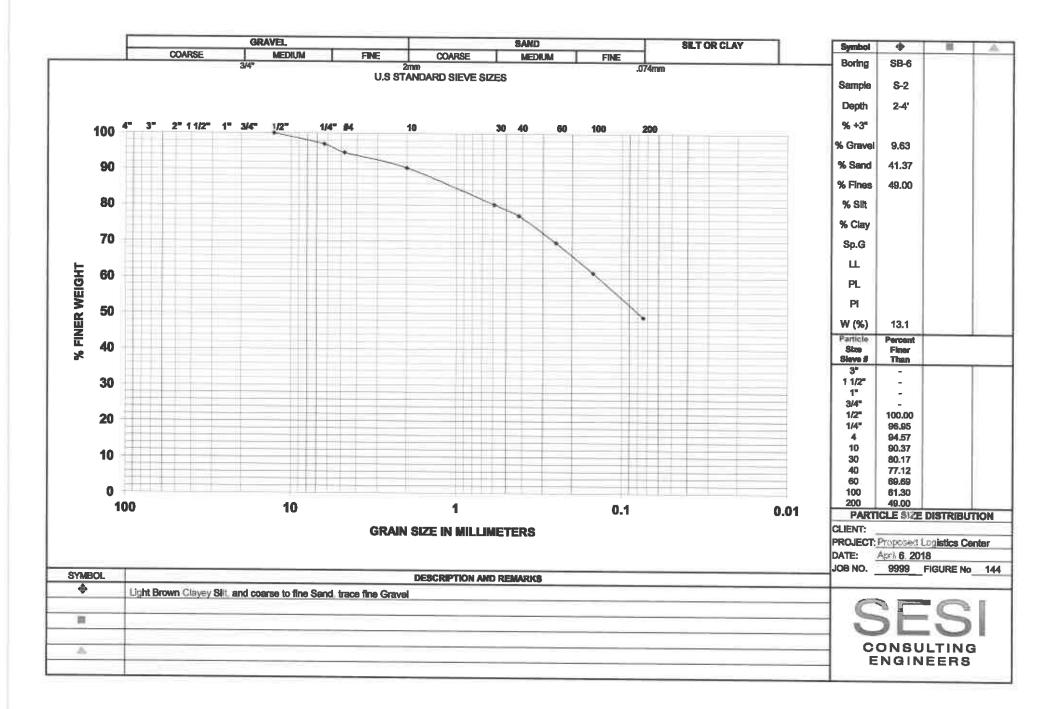
Size of Soil Components

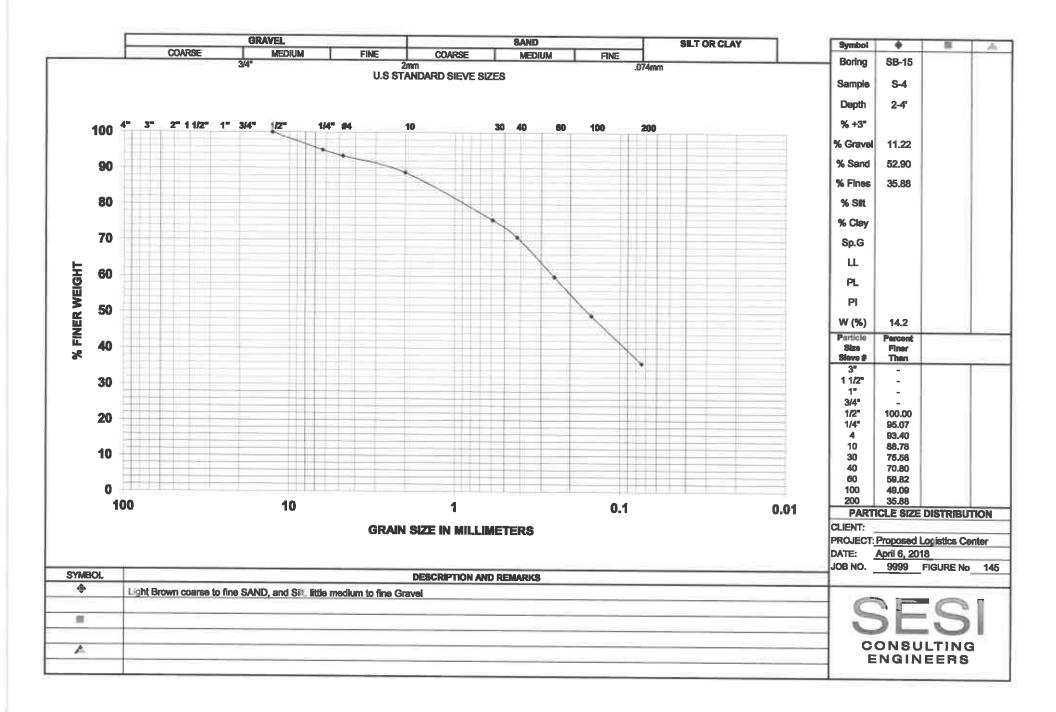
- Gravel
 - Coarse gravel ranges from 3 inches to 1 inch
 - Medium gravel ranges from 1 inch to 3/8 inch
 - Fine gravel ranges from 3/8 inch to No. 10 sieve
- Sand
 - o Coarse sand ranges from No. 10 sieve to No. 30 sieve
 - o Medium sand ranges from No. 30 sieve to No. 60 sieve
 - o Fine sand ranges from No. 60 sieve to No. 200 sieve
- Silt
 - o Material which passes the No. 200 sieve
- Clay
 - o Material which passes the No. 200 sieve
 - o Exhibits varying degrees of plasticity

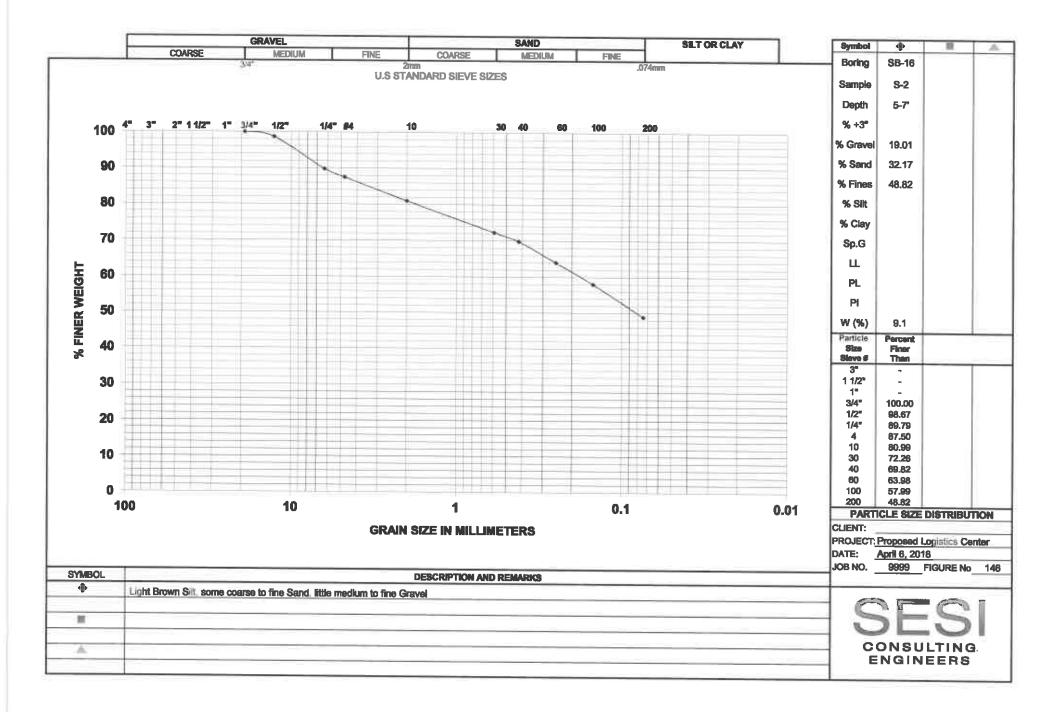
Gradation Designations

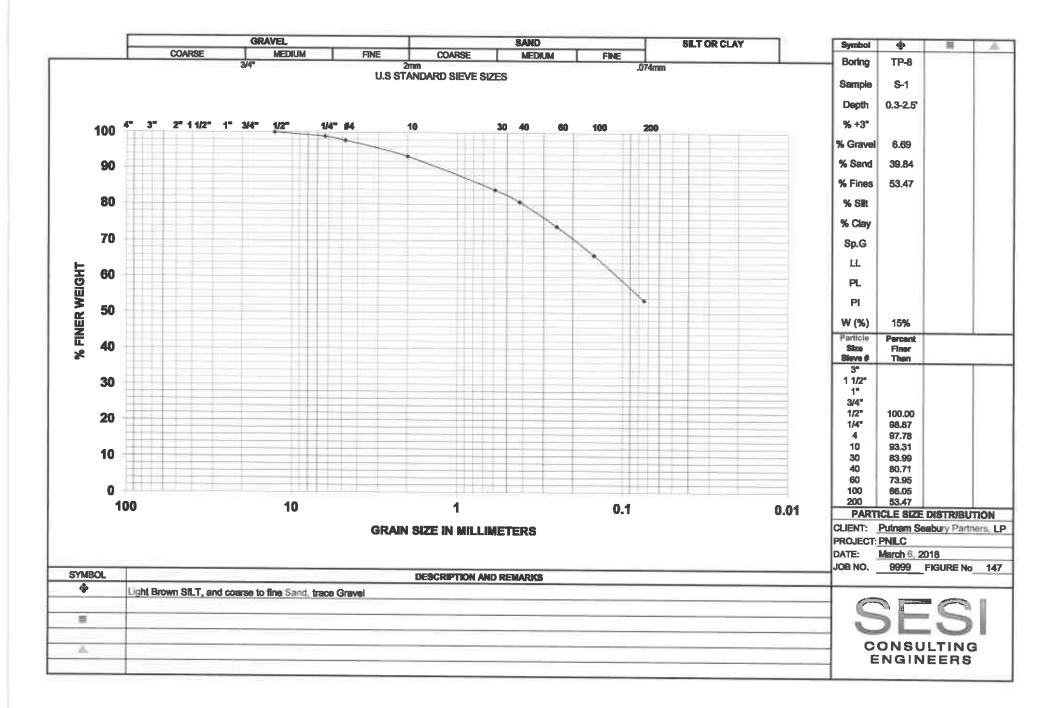
- Coarse to fine (c-f)
- Coarse to medium (c-m)
- Medium to fine (m-f)
- Coarse (c)
- Medium (m)
- All fractions greater than 10% of the component Less than 10% of the component is fine
- Less than 10% of the component is coarse
- Less than 10% of the component is redium and fine
- (m) Less than 10% of the component is neutral and fine
- Fine (f)

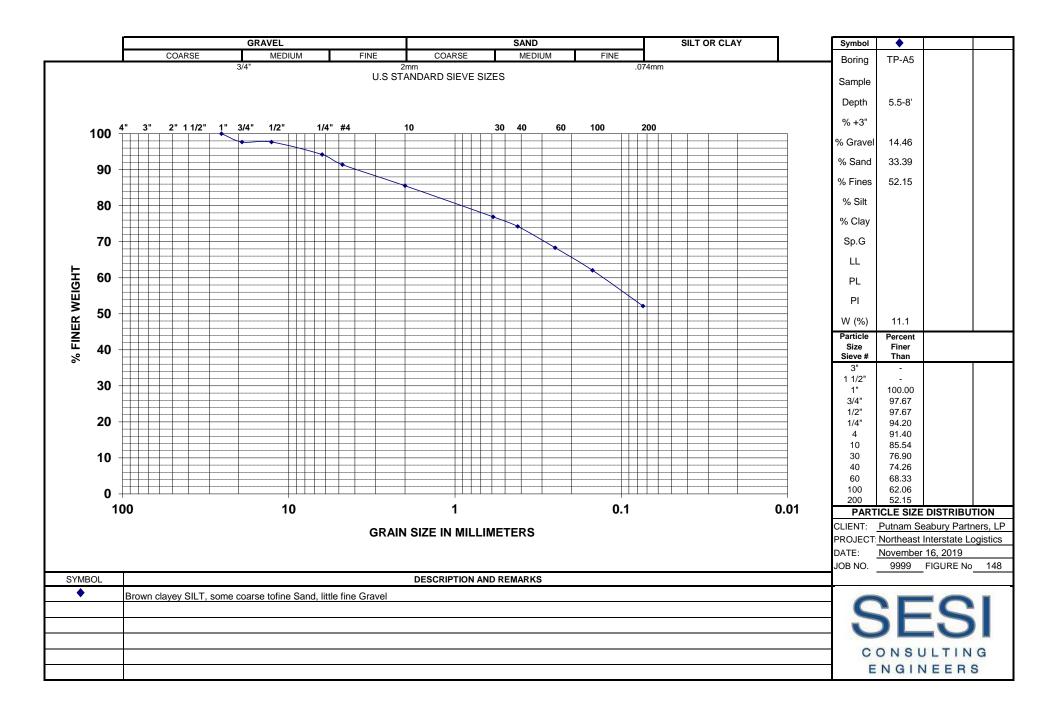
Less than 10% of the component is coarse and medium



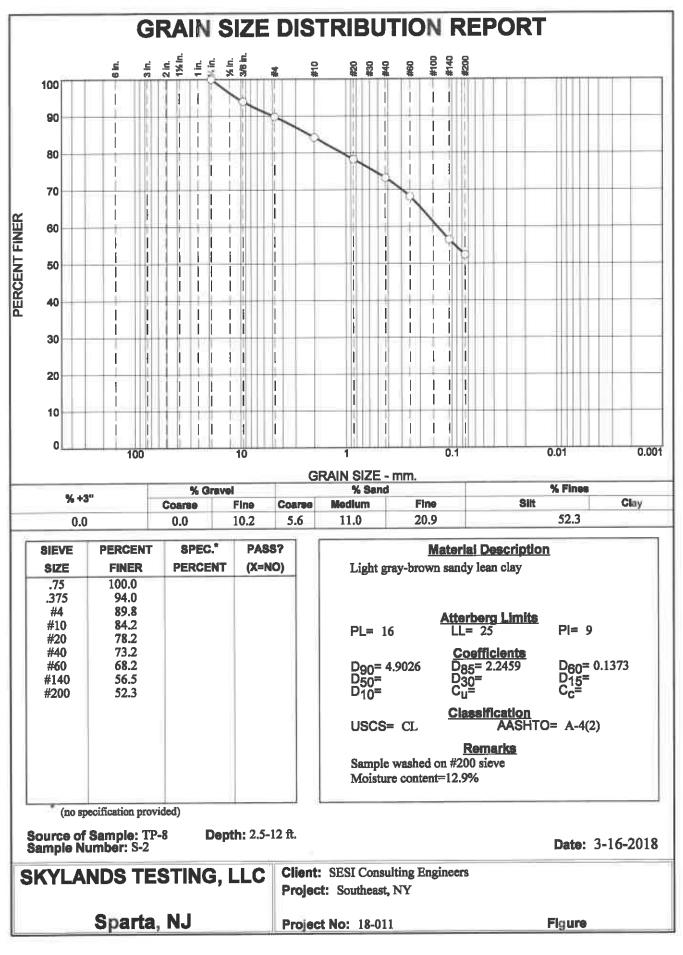




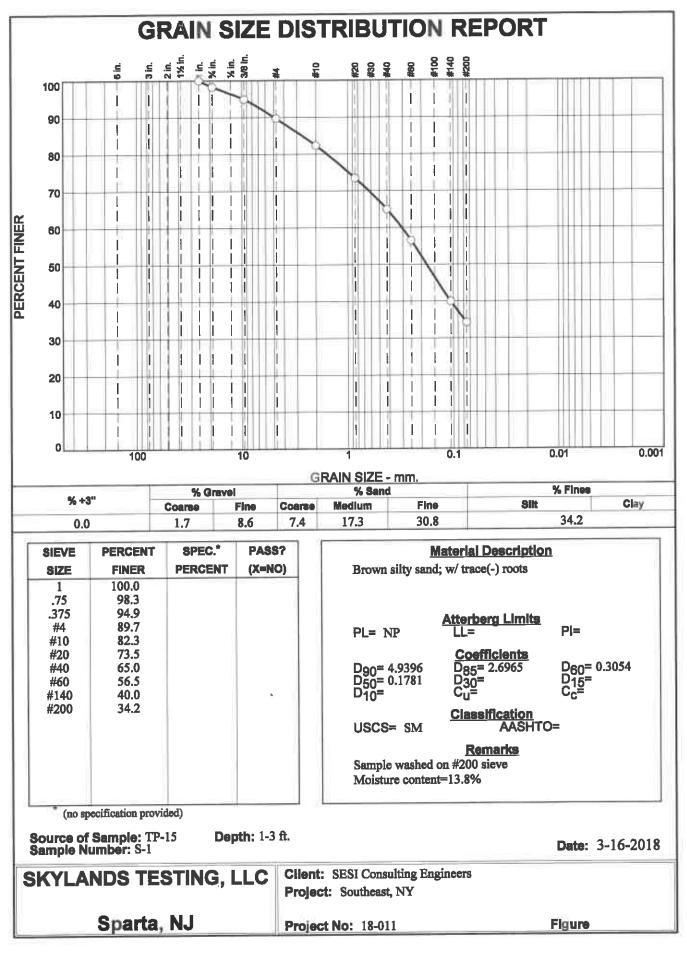




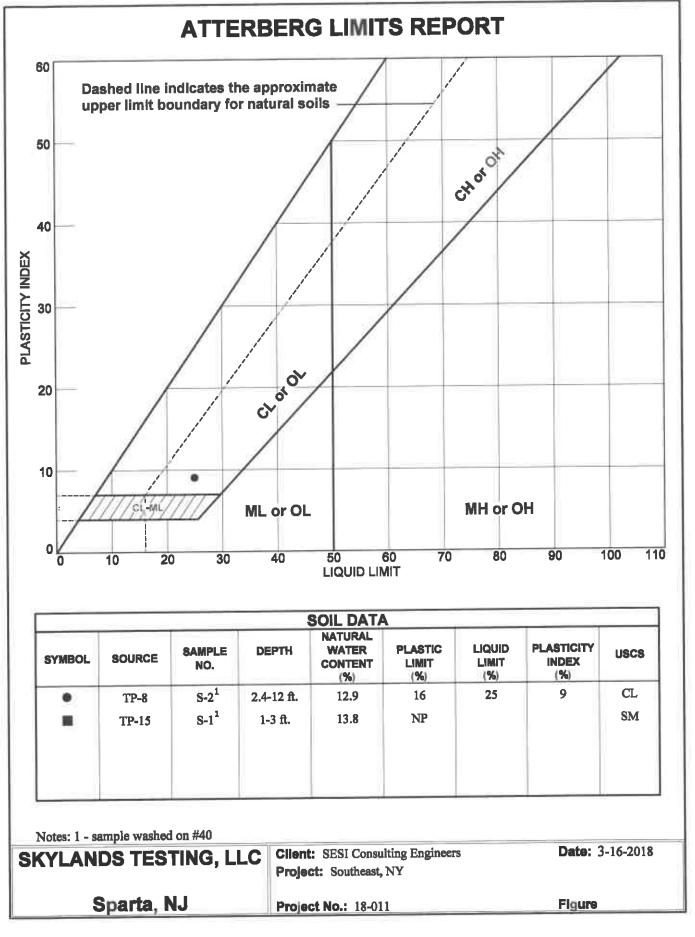
APPENDIX



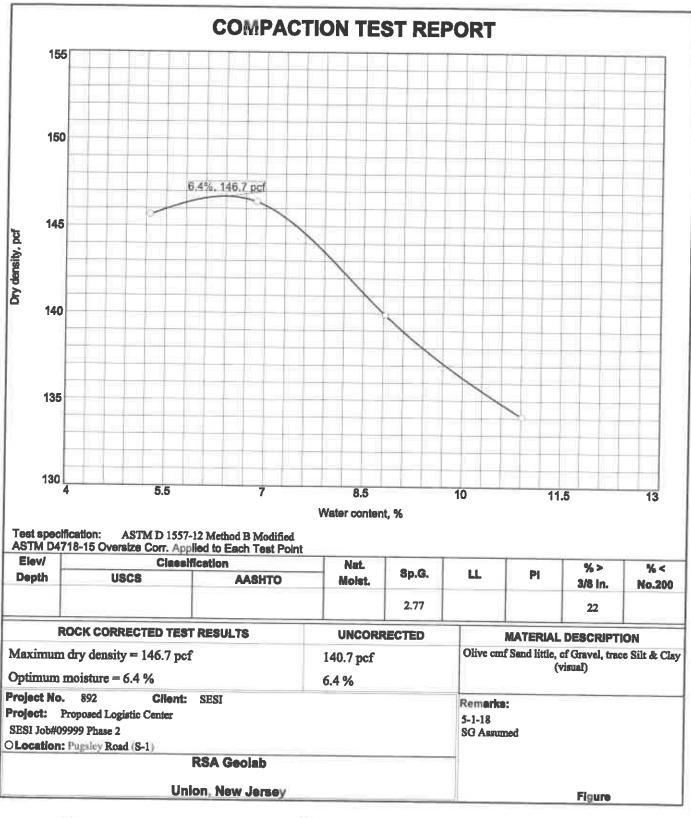
Checked By: VRS



Checked By: VRS



Checked By: VRS



Tested By: MF

Checked By: KP

RSA GEOLAB

CALIFORINIA BEARING RATIO

Project:	Propose Logistics Center	Project No.:	892
	SESI Job No. 09999 Phase 2	Lab Log #:	18-086
Client:	SESI Consulting Engineers	Date:	5-1-18

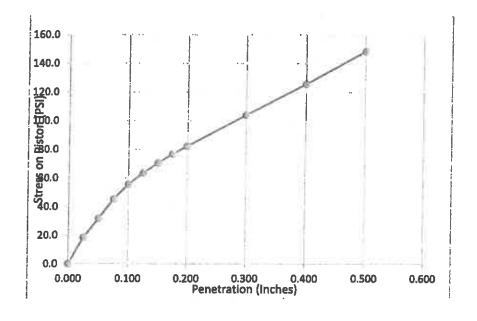
Sample: Pugsley Road (S-1) Blows/Layer: 10

M	oisture Co	ontent	Dry Density:	126.2	pcf (initial)
			CBR Soaked' Yes		
Initial:	6.6	%	Soak Period	96	hrs.
Final:	10.8	%	Surcharge W	10	lbs.
inal (Top 1"):	9.7	%	Swell:	0.27	%

Rate of Penetration: 0.05 in./min.

14

Penetration	Load	Corrected	Stress	C.B.			
(inches)	(inches) Ibs.		Ibs. Load (Ibs) (ps		(psi)	Ratio	
0.000	-8.3	0.0	0.0				
0.025	46.3	54.6	18.3				
0.050	86.2	94.5	31.6				
0.075	126.8	135.1	45.2				
0.100	157.1	165.4	55.4	5.54			
0.125	181.5	189.8	63.6				
0.150	202.2	210.5	70.5				
0.175	221.0	229.3	76.8				
0.200	237.2	245.5	82.2	5.48			
0.300	302.0	310.3	103.9				
0.400	367.0	375.3	125.7				
0.500	435.4	443.7	148.6				





EM\NY-GL\CBR\SESI-pugsley10

RSA GEOLAB

CALIFORINIA BEARING RATIO

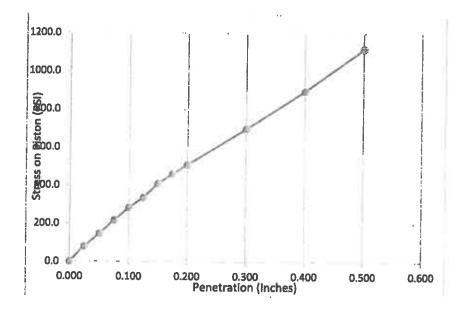
Project:	Propose Logistics Center	Project No.:	892
	SESI Job No. 09999 Phase 2	Lab Log #:	18-086
Client:	SESI Consulting Engineers	Date:	5-1-18

Sample: Pugsley Road (S-1) Blows/Layer: 25

M	oisture Content	Dry Density:	135.3	pcf (initial)
		CBR Soaked Yes		
Initial:	6.6 %	Soak Period	96	hrs.
Final:	8.4 %	Surcharge W	10	lbs.
inal (Top 1"):	8.1 %	Swell:	0.04	%

Rate of Penetration: 0.05 in./min.

Penetration	Load	Corrected	Stress	C.B.
(inches)	Ibs.	Load (lbs)	(psi)	Ratio
0.000	-8.3	0.0	0.0	
0.025	228.6	236.9	79.3	
0.050	429.6	437.9	146.6	
0.075	642.6	650.9	217.9	
0.100	836.6	844.9	282.9	28.29
0.125	995.6	1003.9	336.1	
0.150	1211.0	1219.3	408.3	
0.175	1370.0	1378.3	461.5	
0.200	1510.0	1518.3	508.4	33.89
0.300	2074.0	2082.3	697.2	
0.400	2665.0	2673.3	895.1	
0.500	3329.0	3337.3	1117.5	





EM\NY-GL\CBR\SESI-pugsley25

RSA GEOLAB

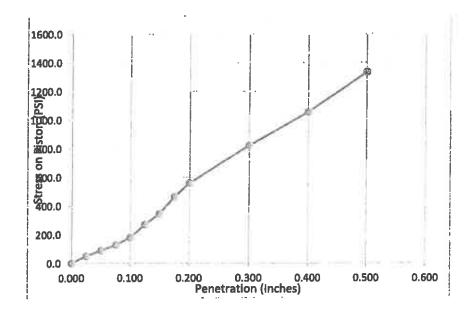
CALIFORINIA BEARING RATIO

Project:	Propose Logistics Center	Project No.:	892
	SESI Job No. 09999 Phase 2	Lab Log #:	18-086
Client:	SESI Consulting Engineers	Date:	5-1-18

Sample: Pugsley Road (S-1) Blows/Layer: 56

1

	Moisture Co	ntent	Dry Density:		pcf (initial)
			CBR Soaked		1
Initial:			Soak Period		hrs.
Final:	9.6	%	Surcharge W	10	lbs.
inal (Top 1"):	7.9	%	Swell:	0.03	%
Rate of Penetra	ation: 0.05 in.	/min.			
1	Penetration	Load	Corrected	Stress	C.B.
	(inches)	ībs.	Load (Ibs)	(psi)	Ratio
	0.000	-8.3	0.0	0.0	
	0.025	139.0	147.3	49.3	
	0.050	255.0	263.3	88.2	
	0.075	375.0	383.3	128.3	
	0.100	525.0	533.3	178.6	17.86
	0.125	796.0	804.3	269.3	
	0.150	1022.0	1030.3	345.0	
	0.175	1380.0	1388.3	464.9	
	0.200	1663.0	1671.3	559.6	37.31
	0.300	2445.0	2453.3	821.5	
	0.400	3146.0	3154.3	1056.2	
	0.500	3975.0	3983.3	1333.8	





EM\NY-GL\CBR\SESI-pugsley56

RSA Geolab Expansion Index of Solis ASTM D4829

Project:	Proposed Log	pistics Center				Proj. No.	892
Client:		09999 Phase 2 ing Engineers				Dates	5-1-18
Sample:	TP-16						
Initial Moisture:	ß	0%		Ring Wt:	204.94		
	_			LAUG AAC	210.00	gma.	
initial Wet Wt:	<u>174.66</u>	igms.		initial Ht:	<u>1.000</u>	in	
Initial Dry Unit Wt:	127.87	(pof		Specific Gravity: (assumed)		27	
Initial Saturation:	<u>51.35</u>	%		Final Wt:	<u>182.11</u>	gms	
				Dry Wt:	<u>164.77</u>	gms	
Expansion Test Data							
Initial Dial Reading:	0.000	171271	Final Moisture	E.	<u>10.5</u>	%	
Rinel Dial Reading:	0.548	mm					
Expansion Index (El):	22					
Tested by:	RE	Entered by:	KH	Check	ed by:	KP	



Geotechnical Foundations Land Planning Geo-Structural Environmental Water Resources

Principals:

Steven P. Byszewski, PE, PP Anthony Castillo, PE Fuad Dahan, PhD, PE, LSRP Roger Hendrickson John M. Nederfield, PE Justin M. Protaslewicz, PE Kenneth Quazza, PE Michael St. Pierre, PE

May 23, 2018

via omail: HSchulweis@nianticpartners.com

Harvey Schulweis Putnam Seabury Partners, LP 287 King Street Chappaqua, NY 10514

RE: Pavement Design Analysis Proposed Northeast Interstate Logistics Center Town of Southeast, New York SESI Project No. 9999

Dear Mr. Schulweis:

SESI Consulting Engineers is pleased to submit this Pavement Design and Equivalent Section Analysis for the subject project. Based on our experience in projects of this type, and based on your particular concerns, we have outlined the appropriate design that we believe will fit your needs.

If you have any questions, please call.

Sincerely,

SESI CONSULTING ENGINEERS D.P.C.

MM UL-

Michael St. Pierre, P.E. Vice President

Cc: David P. Lombardi, P.E. (JMC) via email: DLombardi@imcplic.com

Enci: Pavement Design dated May 23, 2018

N:\PROJECTS\9999 \Calculations\9999 PAVEMENT DESIGN_05232018.doc

12A Maple Avenue • Pine Brook, NJ 07058 • Phone: (973) 808-9050 • Fax: (973) 808-9099 • www.sesi.org

PROPOSED NORTHEAST INTERSTATE LOGISTICS CENTER SOUTHEAST, NY SESI JOB #9999

PAVEMENT DESIGN (Car and Tractor Tralier Traffic)

Proposed Traffic (Provided)

Loaded: 3,490 Average Cars per day x 365 days per year = 1,273,850 vehicles per year 510 Delivery Trucks per day x 365 days per year = 186,150 vehicles per year

Subgrade Conditions - From SESI Draft Report Dated 4/11/2018

Compacted onsite material (silty sandy soils)

Estimated California Bearing Ratio (CBR): 5-10% (Use conservative CBR = 5% for design purposes)

Asphalt Institute - "Asphalt Pavements for Highways & Streets" (MS-1, 10th Edition)

M_R = CBR x 1500psi = 5 x 1500psi = 7,500psi = 7.5x10³ psi

Design Load Equivalency Factors for 10, 15, and 20 years (5% growth factor)

Car Load Equivalency Factor (EAL) = 0.00036 (gross weight = 4,000/bs) Truck Load Equivalency Factor (EAL) = 2.39 (gross weight = 80,000/bs)

Design EAL with 5% Growth factor

- 10 years: [(1,273,850 x 0.00036) + (186,150 x 2.39)] x 12.58 = 5.6 x 10⁶
- 15 years: [(1,273,850 x 0.00036) + (186,150 x 2.39)] x 21.58 = 9.6 x 10⁶
- 20 years: [(1,273,850 x 0.00036) + (186,150 x 2.39)] x 33.06 = 14.7 x 107

Pavement Thickness (Full-Depth Asphalt Concrete - Design Chart A-19)

- 10 years: M_R = 7,500psi; EAL = 5.6 x 10⁶ =11.0 inch minimum pavement thickness
- 15 years: M_R = 7,500psi; EAL = 9.6 x 10⁸ = 12.0 inch minimum pavement thickness
- 20 years: M_R = 7,500psl; EAL = 14.7 x 10⁷ = 12.5 inch minimum pavement thickness

10 Year Pavement Thickness (Equivalent Section)

Road Surface

2" Top Coarse - Asphalt Concrete, Type 6F - Item 403.17

5" Binder Course - Asphalt Concrete, Type 3 - Item 403.13

12.5" Base/Subbase Course - Subbase, Type 4 - Item No. 304.05

Compacted Soils

15 Year Pavement Thickness (Equivalent Section)

Road Surface

2" Top Coarse - Asphalt Concrete, Type 6F - Item 403.17

5" Binder Course - Asphalt Concrete, Type 3 - Item 403.13

16" Base/Subbase Course - Subbase, Type 4 - Item No. 304.05

Compacted Solls

20 Year Pavement Thickness (Equivalent Section)

Road Surface

2" Top Coarse - Asphalt Concrete, Type 6F - Item 403.17

5" Binder Course - Asphait Concrete, Type 3 - Item 403.13

17.5" Base/Subbase Course - Subbase, Type 4 - Item No. 304.05

Compacted Soils

Minimum Town Pavement Section

Road Surface

2" Top Coarse - Asphalt Concrete, Type 6F - Item 403.17

5" Binder Course - Asphalt Concrete, Type 3 - Item 403.13

12" Base/Subbase Course - Subbase, Type 4 -- Item No. 304.05

Compacted Solls

It should be noted that the Equivalent Pavement Sections designed by SESI above are greater than the minimum required by the Township.

We have also provided the following pavement sections using TrIAx TX8 geogrid produced by Tensar. The cost for the TrIAx TX8 is approximately \$4/SY.

10 Year Pavement Thickness (Equivalent Section)

Road Surface

2" Top Coarse - Asphait Concrete, Type 6F -- Item 403.17

2.5" Binder Course - Asphait Concrete, Type 3 – Item 403.13

8" Base/Subbase Course - Subbase, Type 4 - Item No. 304.05

TX8 Geogrid

Compacted Soils

15 Year Pavement Thickness (Equivalent Section)

Road Surface

2" Top Coarse - Asphalt Concrete, Type 6F - Item 403.17

2.5" Binder Course - Asphalt Concrete, Type 3 - Item 403.13

10" Base/Subbase Course - Subbase, Type 4 - Item No. 304.05

TX8 Geogrid

Compacted Soils

20 Year Pavement Thickness (Equivalent Section)

Road Surface

2" Top Coarse - Asphalt Concrete, Type 6F - Item 403.17

3" Binder Course - Asphalt Concrete, Type 3 - Item 403.13

12" Base/Subbase Course - Subbase, Type 4 - Item No. 304.05

TX8 Geogrid

Compacted Soils

APPENDIX B

PRO	JECT NO.	9999	PROJECT	Prop. I	Logistics Center	TEST PIT	NO.	TP-20A		
LOC	ATION SEI	E FIGURE 1	APPROX. E	LEV.	625 ±	INSPECT	ED BY	RR		
WAT	ER OBSERVA		Se	epage a	at 7' ±	DATE EX	CAVATED	10/29/2018		
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION			RELATIVE DENSITY OR CONSISTENCY		
0	4" Topso	oli								
-	Light bro	th	Med	ium Stiff						
1	Cobbles									
2						_				
3_					id, little coarse to f	nne				
			and Boulder				Mod	um Stiff		
4	minado		. 022 - 9 11011							
5										
	Same	Mottled (Ot	served deco	mposed	Mica Schist)		Medium Stiff			
6								to		
-								Stiff		
7										
8_										
°—										
9										
			End of Test F	Pit at 9 ±	Feet					
10										
_										
11										
-										
12										
13										
14										
					6			NGINEERS		

PRO.	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-27	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	632 ±	INSPECT	ED BY	RR	
WAT	ER OBSEI	RVATION	No	t Encou	ntered	DATE EX	CAVATED	10/29/2018	
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION		RELATIVE DENSITY OR CONSISTENCY		
0	2 inc	h Topsoil							
-	Brow	vn coarse to fin	ravel	Mediu	Im Dense				
1	with	occasional Col	obles and Bou	lders					
2									
3_	Infiltr	ration Rate at e	629 = 15.0	in/hr					
_									
4									
-	Sam	e Mottled Sil	t				Medium Dense		
5									
6									
7_									
8									
_									
9									
-									
10									
 11			End of Test P	lt at 10 :	Feet				
··· —									
12									
13									
_									
14									
					5	SESI CONS	LIL TING E	NCINEEDO	

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	TNO.	TP-27A		
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	634 ±	INSPECT	ED BY	RR		
WAT	ER OBSE	RVATION	No	t Encou	Intered	DATE EX	CAVATED	10/29/2018		
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION			RELATIVE DENSITY OR CONSISTENCY		
0	2 inc	ch Topsoil								
1 1 2	Brow	Mediu	ım Dense							
3 <u></u> 3 <u></u> 4										
5 <u> </u>	Infiltr	ation Rate at e	l. 629.5 = 15.	0 in/hr						
6 <u> </u>	Sam	e Mottled SII	.T				Medi	um Stiff		
8 <u> </u>										
9 10										
		I	End of Test P	it at 10 :	t Feet					
12 <u></u> 										
14								NGINEERS		

PRO.	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-34A		
LOC	ATION s	EE FIGURE 1	APPROX. E	LEV.	600 ±	INSPECT	ED BY	RR		
WAT	ER OBSERV	ATION	S	eepage	at 9' ±	DATE EX				
DEPTH FT.		DESC	RIPTION / SO		SIFICATION			DENSITY OR		
0	2 inch	Topsoil								
	Brown	Mediu	m Dense							
1	with oc									
2										
 3										
4										
-										
5										
	_									
6	Same	Mottled Silt					Mediu	m Dense		
7_										
_										
8										
9										
			End of Test F	Pit at 9 ±	: Feet					
10										
12										
_										
13										
—										
14						SESI CONS				

PROJECT NO. 9999		9999	PROJECT Prop. Logistics Center			TEST PIT NO.		TP-35A
LOC			APPROX. E	LEV.	599 ±	INSPECT	ED BY	RR
WATER OBSERVATION			Seepage at 8' ±		DATE EX			
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION						RELATIVE DENSITY OR CONSISTENCY	
0	2 inch Topsoil							
1 2 3 4		vn coarse to fin occasional Col			coarse to fine Gr	avel	Mediu	m Dense
5 6 7	Same Mottled Silt						Medium Dense	
8 9								
¹⁰		E	End of Test Pi	t at 9.5 :	± Feet			
12								
 13								
14								
	_	_				SESI CONS		

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PI	г но.	TP-37A	
LOC		SEE FIGURE 1	APPROX. E	LEV.	607 ±	INSPECT	TED BY	RR	
WAT	ER OBSER		S	epage	at 6' ±	DATE EX	E EXCAVATED 10/31/2018		
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION		RELATIVE DENSITY O CONSISTENCY		
0	4 inch	n Topsoil							
	Brown	n coarse to fine	e Sand, and S	Silt, little	medium to fine G	ravel	Mediu	m Dense	
¹	with o	occassional Co	bbles and Bo	oulders					
2_									
3_									
4									
_	Same	Mottled Sill	t				Mediu	m Dense	
5									
_									
6									
7									
8									
			End of Test F						
9			End of Test F	nialo I					
10									
_									
11									
_									
12									
13									
14									
								NGINEERS	

PRO	JECT NO.	9999	PROJECT	Prop	Logistics Center	TEST PI		TP-39A	
			APPROX. E			8	2	RR	
		SEE FIGURE 1		2	608 ±				
WAT	ER OBSE	RVATION	Se	epage a	at 6.5' ±	DATE EX	XCAVATED 10/31/2010		
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION		RELATIVE DENSITY C		
0	3 ind	ch Topsoil							
-	Brow	wn Silt, and coa	rse to fine Sa	nd, little	medium to fine G	ravel with	Med	ium Stiff	
1	OCCa	asional Cobbles	and Boulder	5					
2_									
2									
3_									
4									
_	Sam	ne Mottled Sil	t				Medi	um Stiff	
5									
-									
6									
			End of Test F	2it at 7 -	- Fast				
8					. 1 081				
_									
9									
_									
10									
11							b.		
12									
13									
14									
						SESI CONS	ULTING E	NGINEERS	

PRO	JECT NO.	9999	PROJECT	Prop. L	ogistics Center	TEST PIT	NO.	TP-49A	
LOC	ATION :	SEE FIGURE 1	APPROX. E	LEV.	588 ±	INSPECT	ED BY	RR	
WAT	ER OBSER	VATION	S	eepage a	t 8' ±	DATE EX	EXCAVATED 10/31/2018		
DEPTH FT.		DESC	RIPTION / SO	IL CLASS	BIFICATION			DENSITY OR	
0	3 inch	Topsoil							
 1		n Silt, and coal ional Cobbles			medium to fine G	ravel with	Med	lum Stiff	
2									
_									
3									
-									
4									
5	Same	Mottled Silt					Medi	um Stiff	
—									
6									
7									
8									
9									
_									
10								1	
11	×								
		E	End of Test P	it at 11 ±	Feet				
12									
13									
14									
		_				SESI CONS		NCINEEDS	

PRO.	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-50A	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	588 ±	INSPECT	ED BY	ŔR	
WAT	ER OBSER		Light	Seepa	3e at 8' ±	DATE EX	XCAVATED 10/31/201		
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION		RELATIVE DENSITY O CONSISTENCY		
0	Brown	n clayey Silt, a	nd coarse to	fine Sar	id, little medium te	o fine Gravel			
	with o	occasional Col		Med	ium Stiff				
1									
 2									
3_									
4									
	Same	Mottled cla	yey Silt				Medi	um Stiff	
5									
6									
-									
7									
°—-									
9			End of Test F	nt at 8 ±	Feet				
10									
							1		
11									
_									
12									
13									
14						SESI CONS		NOINEEDO	

PROJ	ECT NO.	9999	PROJECT	Prop. I	Logistics Center	TEST PIT	NO.	TP-301
LOCA	TION	SEE FIGURE 1	APPROX. E	LEV.	555' <u>+</u>	INSPECT	ED BY	RR
WATE	R OBSEI	RVATION	No	t Encou	ntered	DATE EX	AVATED	9/14/2018
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION			DENSITY OF
0	3" To	opeoli						
1 1 2		lght Brown/Gri Bravel, with occ	-		, soms Siit, little n and concrete	nedium to	L	0080
3 4		ble Fill- Light B ravel, with coc			and, some Silt, littl	e medium to	L¢	088
5	Торео	R						
6	Oran	ge brown clay	ey Silt, some i	medium	to fine Send, treo	Grave l	Mediu	im-Stiff
7 8	Brow	n medium to fi	ne Sand, som	ie Silt, tr	sce Gravel		Mediu	m-Dense
9 10			End of Test P	1t at 9.0 <u>-</u>	<u>-</u> Feet			
_								
1 								
2								
_								
3 <u> </u>								

PROJ	ECT NO.	9999	PROJECT	Prop. Logistics Cente	r TEST PIT	NO.	TP-302
LOCA	TION	SEE FIGURE 1	APPROX. EL	EV. 596' <u>+</u>	INSPECT	ED BY	RR
WATE	R OBSEI	RVATION	Not	Encountered	DATE EXC	CAVATED	6/14/2018
EPTH FT.		DESC	RIPTION / SOIL	CLASSIFICATION			DENSITY OI
0 1 2	Light i bould		to fine Sand, a	ome Silt, little Gravel, v	with occasional	Mediu	m-Dense
3 4 5	Brown bouide		e Sand, some i	Silt, little Gravel, with c	ocasional	Mediu	m -Dense
			End of Test Pit	at 5.5 <u>+</u> Feet			
_							
-							
-							

			Logiatics Center	TEST PIT		
ATION	SEE FIGURE 1	APPROX. ELEV.	618' <u>+</u>	INSPECT	ED BY	RR
er obsei	RVATION	Not Enco	untered	DATE EX	CAVATED	G/14/2018
	DESC	RIPTION / SOIL CLAS	B 8IFICATION			DENSITY OF
-			it, little medium to f	ine Gravel,	Mediu	n- Dense
		End of Test Pit at 5	<u>-</u> Feet			
	Light	Light Brown medium	DESCRIPTION / SOIL CLAS Light Brown medium to fine Sand, and Si with occasional cobbies and boulders	DESCRIPTION / SOIL CLASSIFICATION	DESCRIPTION / SOIL CLASSIFICATION Light Brown medium to fine Sand, and Slit, little medium to fine Gravel, with occasional cobbies and boulders	DESCRIPTION / SOIL CLASSIFICATION RELATIVE CONSI Light Brown medium to fine Sand, and Silt, little medium to fine Gravel, with occessional cobbles and boulders Medium

PRO.	IECT NO.	9999	PROJECT	Prop. Logistics (Center	TEST PI	NO.	TP-304
LOC/	ATION	SEE FIGURE 1	APPROX. E	LEV. 618;	<u>t</u>	INSPECT	ED BY	RR
WATI	er obse	RVATION	No	t Encountered		DATE EX	CAVATED	9/14/2018
DEPTH FT.		DESC	RIPTION / SO	IL CLASSIFICATIO	N			DENSITY O
0								
	Light	Brown medium	to fine Sand,	some Silt, trace G	Gravel, wi	th	Mediu	m-Dense
1	OCCER	lonal oobbles a	nd boulders					
2								
3 <u> </u>								
4								
-1						8		
5								
-1			End of Test F	Pit at 5<u>+</u> Feet				
3								
_								
_								
-								
-								
-								
2								
·								
-						1		

PROJE	EGT NO.	9999	PROJECT	Prop. Logistics Cente	er TEST PIT N	0.	TP-305
LOCA	TION SEE	FIGURE 1	APPROX. EL	EV. 618' <u>+</u>) BY	RR
WATE	R OBSERVA		Not	Encountered	DATE EXC	VATED	9/14/2018
EPTH FT.		DESC	RIPTION / SOIL	CLASSIFICATION	9		DENSITY OF
0 1 1 2 3 4 5 5	-		to fine Sand, a nd bouldera	ome Silt, trace Grave	el, with	Mediu	m -Dense
 8 7 8 8			End of Test Pi	t at 6 <u>+</u> Feet			
1							
2							
_							
·							

PROJ	ECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT NO.	TP-306
LOCA	ATION SEE FIGURE 1 APPROX. ELEV. 618'±	INSPECTED BY	RR
WATE	ER OBSERVATION Not Encountered	DATE EXCAVATED	9/14/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OR
0	2-Inches Topsoil		
1 2 3 4	Light Brown Slit, some coarse to fine Sand, trace Gravel	8	Suff
5 6 7 8	Light Bown mottled Silt, some medium to fine Sand, little me to fine Gravel with weathered boulders	dium Very 8	<u>Stiff</u>
9 0 1	End of Test Pit at 9.0 <u>+</u> Feet		
2 3			
4		ESI CONSULTING EI	

PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT NO.	TP-307
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 618'±	INSPECTED BY	RR
WAT	TER OBSERVATION Not Encountered	DATE EXCAVATED	9/14/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OF
0 1	Light Brown medium to fine SAND, and Silt, trace Gravel	Mediu	m-Dense
2 3	Inflitration Rate= 8 in/hr @ El. 616'±		
4			
5_			
6	Same with some mottled Silt and occasional boulder	D	9769
-			
7			
8_			
9	***************************************		
_	End of Test Pit at 9± Feet		
₀			
-			
1-			
2			
3_			
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PROJ		9999	PROJECT	Prop. L	ogistics Center	TEST PIT	NO.	TP-401
LOC	ATION SEE	FIGURE 1	APPROX. E	LEV.	568.5'±	INSPECT	ed by	RR
WATE	ER O BSERVA	TION	No	t Encour	itered	DATE EX	CAVATED	9/17/2018
DEPTH FT.		DESC	RIPTION / SO	IL CLASE	FICATION			DENSITY OF
0	2-Inch Top							
	Light Brow cobbles	m medium	to fine SAND,	and Silt	, trace Gravel, wit	h occesional	Mediu	m-Dense
3_	Light Brow	n to Brown	n medium to fi	ne SANI), some Silt, trace		Mediur	m- Dense
_	Gravel, wit	th occasion	nal oobbies an	d boulde	13			to
4 5							De	61186
5								
·								
6	Same wi	th mottled	SH:					
6								
7								
88								
8								
9								
10			End of Test P	it at 9<u>+</u> F	eet			
11								
12								
13								
_								
4								

PRO	IECT NO.	9999	PROJECT	Prop.	Logistics Center		F NO.	TP-402
LOC/	ATION	SEE FIGURE 1	APPROX. E	ELEV.	586.5' <u>+</u>	INSPECT	TED BY	RR
WAT	er obse	RVATION	No	x Enco	untered	DATE EX	CAVATED	9/17/2018
DEPTH FT.		DESC	RIPTION / 80	IL CLAI	SEIFICATION			DENSITY OF
0	2-inci	h Topeoli						
 1 2 	-	Brown medium sional cobbles a	-	and old	ayey Slit, trace Gra	vel, with	Mediu	im-Dense
3 4 5 6 7 8 9	Grave	Brown to Brown of, with occasion are with mottled	nal cobbles ar		ND, some Silt, trac ders	8		m-Dense to ense
10 11 12 13			End of Test P	it et 10 <u>:</u>	<u>+</u> Feet			

PRO	ECT NO. 9999 PROJECT Prop. Logistics Center TEST P	T NO.	TP-403
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 634'± INSPEC	TED BY	RR
WAT	ER OBSERVATION Not Encountered DATE E	CAVATED	9/17/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OF
0	3-Inch Topsoli		
 1 2 3	Light Brown clayey Silt, and medium to fine Sand, little medium to fine Gravel, with occasional cobbles and boulders Infiltration Rate = 15 in/hr @ El. 632±	Medi	um-Stiff
4 5 6 7 8 8 9 9	Brown medium to fine SAND, some mottled clayey Slit, trace Gravel, with occasional cobbles and boulders		n-Dense to mse
	End of Test Pit at 11 <u>+</u> Feet		
2 3			

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	' NO.	TP-404	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	632 ±	INSPECT	ED BY	RR	
WAT	ER OBSEI	RVATION	No	t Encou	ntered	DATE EX	EXCAVATED 10/29/201		
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION		RELATIVE DENSITY OF		
0	Brow	vn coarse to fin	e Sand, and S	Silt, little	coarse to fine G	ravel with	Mediu	Im Dense	
—	occa	sional Cobbles	and Boulder	3					
1									
2									
3_									
<u> </u>	Infiltr	ration Rate at e	ol. 629 = 10.25	5 in/hr					
4									
5	Sam	e Mottled Sil	t				Mediu	m Dense	
_			•					Bolloo	
6									
7									
—									
8									
_									
9									
10			End of Test F	Pit at 9 ±	Feet				
11									
12									
_									
13									
—									
14									

PRO.	JECT NO. 99999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-404A	
LOC	ATION SEE FIGURE 1	APPROX. E	ELEV.	632	INSPECT	ED BY	RR	
WAT	ER OBSERVATION	N	ot Encou	Intered	DATE EX	CAVATED	10/29/2018	
DEPTH FT.	DES	CRIPTION / SC	DIL CLAS	SIFICATION		RELATIVE DENSITY OF		
0	3-inch topsoil							
-	Brown medium to	Mediu	m Dense					
1	with occasional Co	bbles and Bo	ulders					
2								
3	Infiltration Rate at	ol 620 - 7 inc	hee/heu					
		el. 629 = 7 Inc	nes/nou	r				
4								
_								
5	Same Mottled S	ilt				Mediu	m Dense	
_								
6								
-								
7								
8								
<u> </u>								
		End of Test I		- East				
10		ENU OF 10SU						
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11								
_								
12								
_								
13								
14					SESI CONS			

PRO		9999	PROJECT	Prop.	Logistics Center	TEST PI	T NO.	TP-405	
LOC	ATION SEE	FIGURE 1	APPROX. E	LEV.	634.75' <u>+</u>	INSPEC	TED BY	RR	
WAT	TER OBSERVA	TION	No	t Encou	ntered	DATE E)	CAVATED	9/17/2018	
DEPTH FT.		DESC	RIPTION / 80		BIFICATION			E DENSITY OR	
0	3-inch Top	eoli							
					ine Sand, trace Gr	(ava)	Medi	um-Stiff	
	Inflitration Rate	= 6 in/hr (g El. 631.75±	I					
5	Same wit	h mottled d	dayey Siit						
6									
6 7									
7_									
-									
8									
_									
0	024 - 4 - 5 - 2 - 2 - 2 - 2 - 2 - 2 - 2 - 2 - 2								
1_		E	End of Test Pi	t at 10 <u>+</u>	Feet				
2									
_									
3									
-									
4									

PRO	JECT NO. 9999 PROJECT Southeast, NY TE	ST PIT NO.	TP- 406
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 632'± IN	SPECTED BY	RR
WAT	ER OBSERVATION Not Encountered DA	TE EXCAVATED	9/17/2018
рертн Гт.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OF
0	3" Topeoli		
1 2	Light Brown clayey Silt, some coarse to fine Sand, trace Gravel	Med	um Stiff
3 4	Inflitration Rate = 5 in/hr @ El. 629±'		
5	Same with mottled claysy Slit		
<u></u>			
<u> </u>			
_			
	End of Test Pit at 10 ± Feet		
2			
_			

PRO	JECT NO. 98	999 PROJEC	T Prop.	Logistics Center	TEST PIT	NO.	TP-407
LOC	ATION SEE FI		. ELEV.	625	INSPECT	ED BY	RR
WAT	ER OBSERVATIO	ON S	eepage at	8 Feet <u>+</u>	DATE EX	E EXCAVATED 10/29/201	
DEPTH FT.		DESCRIPTION /	SOIL CLAS	SIFICATION			DENSITY OR
0	3-inch tops	oli					
	Brown me	dium to fine Sand,	and Silt, lit	tle medium to fine	Gravel	Mediu	Im Dense
	Infiltration F	Rate at el. 622 = 12	2.0 Inches/h	nour			
5	Brown Mott	tled Silt, and mediu	m to fine S	and		Medi	um Stiff
		to fine Gravel with				INIOCI	
6							
-1							
7_							
8							
з <u> </u>				P4			
10		End of Te	st Pit at 9 ±	: F88[
11							
_							
12							
_							
13							

	IO. 9999	PROJECT Pr	op. Logistics Center	TEST PIT NO.	TP-408
LOCATION	SEE FIGURE 1	APPROX. ELEV	. 604 ±	INSPECTED BY	RR
WATER OB	SERVATION	Not En	countered	DATE EXCAVATE	D 9/17/2018
EPTH FT.	DES	CRIPTION / SOIL CI	ASSIFICATION		TVE DENSITY OF
0 2	Inch Topsoll				
1 2 3	ight Brown clayey .Same with mottle		um to fine Sand, trac	e Gravel N	to Stiff
B		End of Test Pit at	8 ± Fest		
1_					
2					
3					
_					
1					

PROJ	ECT NO.	6999	PROJECT	Prop. L	ogistica Center	TEST PIT	NO.	TP-409	
LOCA	TION	SEE FIGURE 1	APPROX. E	LEV.	642 ±	INSPECT	ED BY	RR	
WATE	er obser	RVATION	No	t Encour	ntered	DATE EX	CAVATED	9/17/201	
PEPTH FT.		DESC	RIPTION / 80	IL CLASS	BFICATION		RELATIVE DENSITY CONSISTENCY		
0	2-Inc	h Topsoil							
1	Light	Brown clayay	SILT, some n	n edium t a	o fine Sand, trace	e Gravel	Medi	um Stiff	
2 3		ation Rate = 6	in/hr 🥑 El. 64	10±'				to	
4	Same with mottled clayey Silt							Suit	
5									
-1									
_									
7			End of Test P	Yt at 8 ± F	Feet				
			End of Test P	Yt et 8 ± F	Feet				
			End of Test P	¥tat8±F	Feet				
7 8 9 0 1			End of Test P	Yt at 8 ± F	Feet				
7 8 9 1 1			End of Test P	Yt at 8 ± F	Feet				
6 7 8 9 1 2 3			End of Test P	Yt at 8 ± F	Feet				

PROJI	ECT NO.	9999	PROJECT Prop. Log	istics Center	TEST PIT NO.	TP-410
LOCA	TION	SEE FIGURE 1	APPROX. ELEV.	APPROX. ELEV. 644 ±		RR
WATE	R OBSER	RVATION	Seepage @	82'	DATE EXCAVATE	D 9/21/2018
PEPTH		DESC	RIPTION / SOIL CLASSIF	ICATION		IVE DENSITY OF
0	3-Inc	h Topsoll				
1 2	-		and medium to fine Sand	, trace Gravel	M	edium Stiff
2 3	infilm	ation Rate = 16	0in/hr @ El. 642±'			
4 5	-			. 1445		
			ne Sand, and mottled Sili anal Cobbles and Boulde	-		dium Dense
/						
_						
9						
_						
)			End of Test Pit at 10 ± Fe			
2 <u> </u>						
-						
3						

PRC	DJECT NO. 9999	PROJECT	Prop. Logistics Center	TEST PI	г NO.	TP-4 11
LOC	CATION SEE FIGURE 1	APPROX. E	LEV	INSPECT	ED BY	RR
WA	TER OBSERVATION	Light	Seepage at 8'+/-	DATE EX	CAVATED	9/21/2015
DEPTH FT.	DESC	RIPTION / SO	IL CLASSIFICATION			DENSITY O
0	2" Topsoil with light brow	n medium to f	ine Send, and Silt, trace (3ravel		
	Light brown SILT, and m	edium to fine (Sand, trace Gravel with Bo	oulders	Medk	um Stiff
	Brown mottled medium to with occasional Cobbles	fine SAND, a	nd Silt, little medium to fin	e Grave l	Mediu	m Dense
0		End of Test	Pit at 10'±			

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-412	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	625 ±	INSPECT	ED BY	RR	
WAT	ER OBSEI	RVATION	No	ot Encou	ntered	DATE EX	EXCAVATED 10/29/2018		
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION		RELATIVE DENSITY OF CONSISTENCY		
0	3 inc	ch Topsoil							
1 1 2	Brow	vn coarse to fin	e Sand, and S	Silt, little	medium to fine (Gravel	Mediu	ım Dense	
3 4	Infilt	ration Rate at e	ol. 622 = 10.2	5 in/hr					
5	Sam	e Mottled Sil	lt						
_									
6									
7									
8_									
_									
9			a=po = po=po=		<				
_			End of Test I	Pit at 9 d	: Feet				
10									
11_									
12									
13									
14								NGINEERS	

PRO	JECT NO.	9999	PROJECT	Prop. I	_ogistics Center	TEST PIT	NO.	TP-413
LOC	ATION SEE	E FIGURE 1	APPROX. E	LEV.	625 ±	INSPECT	ED BY	RR
WAT	ER OBSERVA	TION	S	eepage	at 7 <u>+</u>	DATE EX	CAVATED	10/29/2018
DEPTH FT.		DESC						DENSITY OR
0	2-Inch to	2-Inch topsoil						
1 2 3		Brown coarse to fine Sand, and Silt, little medium to fine Gravel with occasional Cobbles and Boulder						im Dense
4 <u> </u>	Same I	Mottled Silt					Mediu	m Dense
5 6 7								
7 8								
9								
 10			End of Test F	Pit at 9 ±	Feet			
11_								
_								
12 <u>—</u>								
13								
14								
						SESI CONS		NCINEEDS

PRO.	JECT NO. 9999.4.1	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-413A	
LOC	ATION SEE FIGURE 1	APPROX. E	ELEV.	625 ±	INSPECT	ED BY	RR	
WAT	ER OBSERVATION	No	ot Encou	Intered	DATE EX	CAVATED	10/29/2018	
DEPTH FT.	DES	CRIPTION / SO	IL CLAS	SIFICATION				
°	2-Inch topsoil							
	Brown medium to			te medium to fine	Gravel	Mediu	ım Dense	
1	with occasional Co	bbles and Bo	ulders					
2								
_								
3_	Infiltration Rate at	el. 622 = 12 in	/hr					
-								
4								
5	Drawn Mattlad Silk				ha fina Crawal	Mad	0446	
	Brown Mottled Silt,	and coarse to	o nne Sa	ina, little mealum i		Med	ium Stiff	
6								
7								
8		End of Test I	 Dit at 0 4	East				
9_		Endorresti						
_								
10								
11								
12								
13								
_								
14					SESI CONS			

PRO	DJECT NO. 9999	PROJECT	Prop. Logistics Center	TEST PI	r NO.	TP-414
LOC	CATION SEE FIGURE	1 APPROX.	ELEV.	INSPECT	ED BY	RR
WAT	TER OBSERVATION		NE	DATE EX	CAVATED	9/21/2018
DEPTH FT.	DE	SCRIPTION / SC	DIL CLASSIFICATION			DENSITY OF
0	2" Topaol					
	Light brown SILT, and cobbies	casional	Medium Stiff			
3						
4						
-						
6						
6_						
-						
	Brown medium to fine S occasional Cobbles and		ittle mottled medium to fine	Gravel with	Mediu	im Dense
8_	occasional Coddies and	Bouiders				
-						
9						
10						
_		End of Tes	t Pit at 10'±			
11 <u> </u>						
12						
						1
13 <u></u>						

PRC	JECT NO. 9999 PROJECT Prop. Logistics Center TEST P	T NO.	TP-415
LOC	ATION SEE FIGURE 1 APPROX. ELEV. INSPEC	TED BY	RR
WAT	TER OBSERVATION NE DATE E	XCAVATED	9/21/2018
рертн Рт.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OR ISTENCY
0	2" Topeol		
1 2 3 4	Light Brown SILT, and medium to fine Sand	Medi	um Stiff
	Brown mottled medium to fine SAND, and Silt, little medium to fine Gravel with coccesional Cobbles and Boulders	Mediu	m Dense
0_			
	End of Test Pit at 10'±		
1			
1 2			
_			

PRO	JECT NO. 9999 PROJECT Prop. Logistics Center TE	EST PIT NO.	TP-416		
LOC	ATION SEE FIGURE 1 APPROX. ELEV.	SPECTED BY	RR		
WAT	TER OBSERVATION Ssepage @ 4' ± DA	ATE EXCAVATED	9/21/2018		
EPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		RELATIVE DENSITY O CONSISTENCY		
0	2ª Topsoli				
 2	Light brown SILT, and medium to fine Sand, trace Grave(Med	lum Stiff		
_					
-					
5 					
-					
	Brown mottled medium to fine SAND, and Silt, little medium to fine Gra	wei Mediu	ım Dense		
	with occasional Cobbles and Boulders				
	End of Test Pit at 10'±				
_	Fue of Loof Lifer in F				
-1					
2					

DJECT NO. 9999 PROJECT Prop. Logistics Center TEST PIT	NO.	TP-601	
CATION SEE FIGURE 1 APPROX. ELEV. INSPECT	ED BY	RR/UK	
WATER OBSERVATION Heavy Seepage @ 5.0½/ Seepage @ 3.0½ DATE EXCAVATED DEPTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DE CONSIST			
DESCRIPTION / SOIL CLASSIFICATION			
2-inch Topsoli			
	Ma	d. Soft	
Brown Sand and mottled Silt, trace Gravel with occasional cobbles and boulders	Med.	Dense	
END OF TEST PIT AT 8 FEET <u>+</u>			
	CATION SEE FIGURE 1 APPROX. ELEV. INSPECT TER OBSERVATION Heavy Seepage @ 5.0½/ Seepage @ 3.0½ DATE EX DESCRIPTION / SOIL CLASSIFICATION 2-Inch Topsoli Date EX 2-Inch Topsoli Ught Brown Silt and medium to fine Sand, trace Gravel with occasional cobbies Brown Sand and motiled Silt, trace Gravel with occasional cobbies and boulders	CATION SEE FIGURE 1 APPROX. ELEV. INSPECTED BY TER OBSERVATION Heavy Seepage @ 5.0'±/ Seepage @ 3.0'± DATE EXCAVATED DESCRIPTION / SOIL CLASSIFICATION RELATIVE CONS 2-Inch Topsoil Illight Brown Silt and medium to fine Send, trace Gravel with occessional cobbies Med. Brown Sand and motiled Silt, trace Gravel with occessional cobbies and boulders Med.	

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PRO	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT NO.	T P-802
LOC	ATION SEE FIGURE 1 APPROX. ELEV.	INSPECTED BY	RR
WAT	TER OBSERVATION Seepage @ 3.5'±/ Heavy Seepage @ 5.5'±	DATE EXCAVATE	D 10/3/2018
EPTX FT.	DESCRIPTION / SOIL CLASSIFICATION		IVE DENSITY O INSISTENCY
0 1 2	Light Brown Silt and medium to fine Sand, trace Gravel		Med. Soft
	Brown medium to fine Sand and mottled Silt, trace Gravel	M	ed. Dense
-1	END OF TEST PIT AT 9 FEET ±		
2 			
		ESI CONSULTING	

PRC	JECT NO. 9999	PROJECT Prop. Logistics Center	TEST PIT	NO.	TP-601
LOC	CATION SEE FIGURE 1	APPROX. ELEV.	INSPECTE	D BY	RR
WAT	TER OBSERVATION	Seepage @ 9.0' <u>+</u>	DATE EXC	AVATED	10/3/2018
DEPTH FT.	DESC	RIPTION / BOIL CLASSIFICATION			DENSITY O
0	2-Inch Topsol				
	Light Brown Silt, and med	um to fine Sand, trace Gravel with ccoal	ional cobbles	Mec	i. Suit
4 5 6 7	Brown medium to fine Sand and	I mottled Silt, trace Grave: with occasional cobbi	ee and bouiders	Med. [)ense
8 8 9					
0	END OF TEST PIT AT 10	FEET <u>t</u>			
<u> </u>					

PRC	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT	NO.	TP-602
LOC	ATION SEE FIGURE 1 APPROX. ELEV.	INSPECTI	ED BY	RR
WAT	ER OBSERVATION Beepage @ 3.5' ± /Heavy Seepage @ B' ±	DATE EX	AVATED	10/4/2018
EPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY O
0	2-Inch Topsoll			
1 2 3	Light Brown Silt and medium to fine Sand, trace Gravel with occasion	ei cobbies	Mec	i. Stiff
_	Brown medium to fine Sand and motiled Silt, little coarse to fine Gravel with cobbies and cooses	mei boutdens	Med.	Dense
7 <u> </u>				
	END OF TEST PIT AT 9 FEET ±			
3 4		SI CONSU		

TP-603 and TP-604 NOT EXCAVATED

PRO.	ECT NO. 9999 PROJECT Prop. Logistics Center TEST PR	NO.	TP-605	
LOC	TION SEE FIGURE 1 APPROX. ELEV. ± INSPECT	'ed by	RR	
WAT	ROBSERVATION Light Seepage @ 3.5±', Heavy @ 6.5±' DATE EX	CAVATED	10/4/2018	
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION	RELATIVE DENSITY (CONSISTENCY		
0	2-Inch Topsoll			
1 1 2 3	Light Brown SiLT, and medium to fine Sand, trace Gravel, with Cobbies Percolation Rate = 6 in/hr	Medi	um Stiff	
4 5 6	Brown coarse to fine Sand, and Silt, little medium to fine Gravel with occasional Cobbles and Boulders	Mediu	m Dense	
7 8 ·				
9 	End of Teet Pit at 8 ± Feet			
4	SESI CONS			

PRO	JECT NO.	9999	PROJECT Prop.	Logistics Center	TEST PIT	NO.	TP-606
LOC	ATION	SEE FIGURE 1	APPROX. ELEV.	El 540 <u>+</u>	INSPECTE	ED BY	RR
WAT	ER OBSE	RVATION	Seepage @ 1' <u>+</u>	/Heavy @ 3' <u>+</u>	DATE EXC	AVATED	10/16/2018
DEPTH FT.		DESC	RIPTION / SOIL CLAS	SIFICATION			E DENSITY OR BISTENCY
0-10)-Inch Tops	soil					
1G	ray/Brown \$	SILT, and medi	um to fine Sand, trac	e Gravel with occas	ional cobbles	Me	od. Stiff
2							
3_							
4							
5							
6 E		ST PIT AT 5 FE	== I <u>+</u>				
_							
7							
-							
8							
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o							
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2							
3							
4							
14					SESI CONS	ULTING E	

PRC	JECT NO. 999	9 PROJECT Prop	Logistics Center	TEST PIT NO.	TP-607
LOC	CATION SEE FIG	JRE 1 APPROX. ELEV.	El 560 <u>+</u>	INSPECTED BY	RR
WA [.]	TER OBSERVATIO	N Heavy Seepa	ge @ 2.74' <u>+</u>	DATE EXCAVATE	10/16/2018
DEPTH FT.		DESCRIPTION / SOIL CLA	SSIFICATION		VE DENSITY OR NSISTENCY
0	6-inch Topsoil				
1_	Light Brown SILT, a	nd medium to fine Sand,tra	ce Gravel with occa	sional cobbles	
2					
	Mottled Silt @ 2'+				
3					
4	END OF TEST PIT	AT 3.5 FEET <u>+</u>	*		
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5					
6					
7					
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8					
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 12					
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PRO.	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT N	10.	TP-608
LOC	ATION	SEE FIGURE 1	APPROX. E	ELEV.	El 550 <u>+</u>	INSPECTE	D BY	RR
WAT	ER OBSEI	RVATION	No	ot Encou	ntered	DATE EXC.	AVATED	10/31/2018
DEPTH FT.		DES	CRIPTION / S		SSIFICATION		RELATIVE DENSITY O	
0	10-ir	nch Topsoil						
1	Light	Brown medium	to fine Sand a	nd Siit, tra	ace Gravel with o	ccasional cobbles	Medi	um Dense
2								
3_								
-°								
4								
5 <u> </u>								
	Light	: Brown mediur	n to fine Sand	d and mo	ottled Silt, trace	Gravel with	Medi	um Dense
6	occa	sional Cobbles	I					
7_								
_								
8								
9			End of Test	Pit at 8 :	± Feet			
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10								
11								
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12								
13								
_								
14	-					SESI CONS		

PRO	JECT NO. 9999	PROJECT Prop.	Logistics Center	TEST PIT N	0.	TP-609
LOC	ATION SEE FIGURE	1 APPROX. ELEV.	El 550 <u>+</u>	INSPECTED	BY	RR
WAT	ER OBSERVATION	Not Enco	untered	DATE EXC	VATED	10/31/2018
DEPTH FT.	ם	ESCRIPTION / SOIL CLA	SSIFICATION			E DENSITY OR SISTENCY
0	6-inch Topsoil					
1 1 2	Light Brown Silt a	nd medium to fine Sand, t	race Gravel with occi	asional cobbles	Mec	lium Stiff
3 <u> </u>						
4						
_						
5						
_	-	tled Silt and medium to	fine Sand, trace G	ravel	Med	lum Stiff
6	with occasional of	obbles				
7_						
'—						
8_						
_						
9	2		~			
_		End of Test Pit at 9	± Feet			
10						
11						
-						
12						
13						
14						
_				SESI CONSI	IL TIMA	

PRO	IECT NO. 9999 PROJECT Prop. Logistics Center TEST PIT	NO.	STP-1
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 626.0±' INSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepage at 2±'; Heavy seepage at 3±' DATE EX	CAVATED	3/28/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OR
0	4" Topsoil		
	Light Brown Silt, some coarse to fine Sand, trace Gravel	Med	ium Stiff
	(USCS: CL)		
2	Percolation Rate = 6 min/in (Test A) @ Elv. 624 (10/30/18)	Medi	um Stiff
_	Percolation Rate = 10.9 min/in (Test B) @ Elv. 624.1 (10/30/18)		
3			
4	Light Brown mottled Silt, some coarse to fine Sand, little coarse to fine		•
5	Gravel with frequent cobbles and occasional Boulder (USCS: CL)		to
-			
6			
7_			
′ —			2446
8			Stiff
_	Test Pit Completed at 8± Feet		
9			
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10			
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13			
14			
NOTE:	SESI CONS		NGINEERS

PRO.	JECT NO. 9999 PROJECT Prop. Logistics Center TEST P	IT NO. 8TP-2
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 628.0±' INSPEC	TED BY JQ
WAT	ER OBSERVATION Seepage at 2±' DATE E	XCAVATED 3/28/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION	RELATIVE DENSITY OR CONSISTENCY
0	4" Topsoll	
-	Light Brown Silt, some coarse to fine Sand, little coarse to fine Gravel	Medium Stiff
1	with occassional cobbles	
2	(USCS: CL)	
2		
3_	Percolation Rate: 20 min/in (Test A) @ Elv. 626 (10/30/18)	Medium Stiff
	Percolation Rate: 20 min/in (Test B) @ Elv. 626 (10/30/18)	
4		
4		
5	Light Brown mottled Silt, some coarse to fine Sand, little coarse to fine	
	Gravel with occassional cobbles	
_	(USCS: CL)	
0_		
6 <u> </u>		
· —		
8_		
9	Test Pit Completed at 8.5± Feet	
_		
10		
11		
-		
12		
13		
 14		
NOTE:		SULTING ENGINEERS

PRO	JECT NO. 9999 PROJECT Prop. Logistics Center TEST Pin	г NO .	STP-8
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 619.0±' INSPECT	ED BY	JQ
WAT	ER OBSERVATION Seepage at 6±' DATE EX	CAVATED	3/28/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OR
0	3" Topsoli		
1	Light Brown/Yellow medium to fine Sand, and Silt, trace Gravel (USCS: SM)	Medi	um Dense
-	Light Brown Silt, some coarse to fine Sand, little coarse to fine Gravel	Med	ium Stiff
2	with occassional cobbles		
	Percolation Rate = 30 min/in (Test A) @ Elv. 617.0 (10/30/18)		
3	Percolation Rate = 40 min/in (Test B) @ Elv. 617.0 (10/30/18)		
4	Light Brown mottled Silt, some coarse to fine Sand, little coarse to fine	Medi	um Stiff
-	Gravel with occassional cobbles		
5	(USCS: CL)		
6			
8			
_			
9			
_	Test Pit Completed at 9± Feet		
10			
-			
11			
12			
13			
14			
NOTE:	SESI CONS	SUI TING F	NGINEERS

DDO				STP-12
	JECT NO. 9999 PROJECT Prop. Logistics Center	TEST PIT I		
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 645.0±'	INSPECTE	DBY	JQ 10/3/2018
WAT	ER OBSERVATION Seepage at 4±'	DATE EXC	AVATED	3/28/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION			DENSITY OR
0	6" Topsoil			
1	Light Brown Silt, and coarse to fine Sand, trace Gravel		Medi	um Stiff
2	(USCS: CL)			
	Test 1: Percolation Rate = 60 min/in @ Eiv. 643.0			
3	Test 2: Percolation Rate = 30 min/in @ Elv. 643.0 (10/3/18)			
4	Test 3: Percolation Rate = 30 min/in @ Elv. 643.0 (10/3/18)			
*—				
5				
_	Light Brown mottled Silt, some coarse to fine Sand, little coa	arse to	Medi	um Stiff
6	fine Gravel, with occassional cobbles			
	(USCS: CL)			
7				
-				
8—				
9	Test Pit Completed at 8.5± Feet			
_				
10				
-				
11				
12				
12				
13_				
14				
NOTE:	S	ESI CONSU	ILTING E	NGINEERS

PRO	JECT NO. 9999 PROJECT Prop. Logistics Center		0.	STP-101
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 659.0±	INSPECTED	1	RR
WAT	ER OBSERVATION Seepage at 5±'	DATE EXCA	VATED	9/14/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION	F		DENSITY OR
0	2ª Topsoi			
1 1 2	Light Brown Sllt, some medium to fine Sand, trace Gravel (USCS: CL) Percolation Rate = 15 min/in @ Elev. 657 (10/31/18)		Med	um-Stiff
3 <u> </u>				
4				
5	Light Brown mottled Silt, and medium to fine Sand, little coa	rse to fine	Medi	um-Stiff
6	Gravel, with occassional cobbles (USCS: CL)			
_				
7				to
8_				
9			s	Stiff
10	Test Pit Completed at 9.5± Feet			
¹¹ —				
12				
-				
13				
14				
IOTE:	S	ESI CONSUL	TING E	NGINEERS

PRO.	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	STP-	102
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 632'+	INSPECTED B	YRF	र
WAT	ER OBSERVATION Not Encountered	DATE EXCAVA	TED 9/14/2	2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION	REL	ATIVE DENSIT	
0	2" Topsoil			
 1 	Light-brown SILT, and medium to fine Sand, trace Gravel . (USCS : SC/CL)		Soft to	
2 3	Percolation Rate = 30 min/in @ Elv. 630.0 (10/30/18)		Medlum-Stiff	
4 <u> </u>	Light-brown SILT, some medium to fine Sand, little Gravel, with occassional cobbles		Medium-Stiff	
5	(USCS : SC/CL)			
6 7 8	Same with mottled SILT		to	
9 <u> </u>			Stiff	
11	End of Test Pit at 10.5± Feet	1		
12				
13 <u> </u>				
				_

PRO	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	STP- 103
	ATION SEE FIGURE 1 APPROX. ELEV. 631'±	INSPECTED BY	RR
wat	ER OBSERVATION Not Encountered	DATE EXCAVATE	S
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		IVE DENSITY OR INSISTENCY
0	2" Topsol		
1	Light have OILT and an diversity for Oracle 1.		
	Light-brown SILT, and medium to fine Sand, trace Gravel . (USCS : SC/CL)		Soft to
2	Percolation Rate = 9.6 min/in @ Elv. 629.0 (10/30/18)	l M	edium-Stiff
3			
4	Light-brown SILT, some medium to fine Sand, little Gravel,	M	edium-Stiff
5_	with occassional cobbles (USCS : SC/CL)		
6	Same with mottled SILT		to
7			
8_			Stiff
			Sun
9	End of Test Pit at 8.5± Feet		
10			
11_			
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12			
_			
13			
_			
14			
NOTE:			SESI



PRO	JECT NO. 9999 PROJECT Southeast, NY	TEST PIT NO.	STP- 104
LOC	ATION SEE FIGURE 1 APPROX. ELEV. 630'±	INSPECTED BY	RR
WAT	ER OBSERVATION Not Encountered	DATE EXCAVATED	9/14/2018
DEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		E DENSITY OF
0	2" Topsoil		
1 2	Light-brown SILT, and medium to fine Sand, trace Gravel . (USCS : SC/CL) Percolation Rate = 30 min/in @ Elv. 628.0 (10/30/18)	Med	dium-Stiff
3 4			
	Light-brown SILT, some medium to fine Sand, little Gravel,		
5	with occassional cobbles	Med	lium-Stiff
	(USCS : SC/CL)		to
6			Stiff
7_	Same with mottled SILT		
'—			
8			
9			
_	End of Test Pit at 9.0± Feet		
10			
-1			
11			
-			
12			
13			
		S	



	TION SEE FIGURE 1 APPROX. ELEV. 638'+	TEST PIT NO.	STP- 108
	TION SEE FIGURE 1 APPROX. ELEV. 638' <u>+</u>		RR
		DATE EXCAVATED	9/14/2018
XEPTH FT.	DESCRIPTION / SOIL CLASSIFICATION		DENSITY OF
0	2º Topsoil		
1 2 3	Light-brown SILT, and medium to fine Sand, trace Gravel . (USCS : SC/CL)	Med	ium-Stiff
4 5	Light-brown SiLT, some medium to fine Sand, little Gravel, with occassional cobbies (USCS : SC/CL)		um-Stiff to Stiff
8	Same with mottled SILT		
-			
·			
,			
_	End of Test Pit at 10.0± Fest		
-			
-1.			



APPENDIX C

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-A1	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	655±	INSPECT	ED BY	RR/JT	
WAT		RVATION	No	ot Enco	ountered	DATE EX	CAVATED	11/11/2019	
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION			E DENSITY OR SISTENCY	
0	4± Inches	Topsoil							
	Light brow	/n Clayey Silt, a	and coarse to	fine Sa	and, trace Gravel		Mec	lium Stiff	
1	with occas	sional Cobbles							
_									
2									
-									
3	Infilt	ration Rate at e	el. 652 = 7.5 ir	n/hr	Kv = 0.67	′ in/hr			
4									
		arse to fine SAI	arse to fine	Mediu	um Dense				
5	¡ Gravel, with Cobbles and occasional Boulders								
		TES	F PIT COMPL	ETED.	AT 5± FEET				
6									
7									
8									
9									
10									
_									
11									
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12									
13									
—									
14									

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-A2	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	655±		ED BY	RR/JT	
WAT		RVATION	No	ot Enco	ountered	DATE EX	CAVATED	11/11/2019	
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION			E DENSITY OR SISTENCY	
0	4± Inches	Topsoil							
	Brown Cla	ayey Silt, and co	parse to fine S	Sand, t	race Gravel,		Mec	lium Stiff	
1	with occas	sional Cobbles							
_									
2									
-									
3	Infilt	ration Rate at e	el. 652 = 7 in/ł	۲r	Kv = 0.62 ir	n/hr			
4									
		arse to fine SAI	ne Gravel	Mediu	um Dense				
5	with occasional Cobbles and Boulders								
		TES	F PIT COMPL	ETED	AT 5± FEET				
6									
7									
8									
9									
10									
_									
11									
_									
12									
13									
14									

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-A3	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	655±		ED BY	RR/JT	
WAT		RVATION	No	ot Enco	ountered	DATE EX	CAVATED	11/11/2019	
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION			E DENSITY OR SISTENCY	
0	3± Inches	Topsoil							
_	Light brow	n Clayey Silt, a	and coarse to	fine Sa	and, trace Gravel		Mec	lium Stiff	
1	with occas	sional Cobbles							
_									
2									
_									
3	Infilt	ration Rate at e	el. 652 = 12 in	/hr	Kv = 1.24	in/hr			
_									
4									
_	Brown mo	ottled Clayey SI	dium to fine		Stiff				
5	Gravel, with frequent Cobbles and occasional Boulders								
		TES	F PIT COMPL	ETED	AT 5± FEET				
6									
_									
7									
8									
_									
9									
_									
10									
11									
12									
—									
13									
14									

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-A4
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	659±	INSPECT	ED BY	RR/JT
WAT		RVATION	No	ot Enco	ountered	DATE EX	CAVATED	11/11/2019
DEPTH FT.		DESC	CRIPTION / SO		SSIFICATION		RELATIVE DENSITY OR CONSISTENCY	
0	3± Inches	Topsoil						
_	Light brow	n Clayey Silt, a	and coarse to	fine Sa	and, trace Gravel,		Mec	lium Stiff
1	with occas	sional Cobbles						
2								
3								
4								
5								
b								
6	l o filt	ration Data at a		⊳ /l⊳ v		1 in /h		
	Inflit	ration Rate at e	ei. 652 = 2.5 ir	1/nr	Kv = 0.24	+ IN/Nr		
7								
_	Brown mo	ottled coarse to	fine SAND, se	ome C	layey Silt, little me	dium to fine	L	oose
8	Gravel, wi	th frequent cot	bles and occa	asional	boulders			to
_							Medi	um Dense
9								
_		TES	T PIT COMPL	ETED	AT 9± FEET			
10								
11								
10								
12								
13								
13								
14								

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-A5
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	658±		ED BY	RR/JT
WAT		RVATION	Nc	t Enco	untered	DATE EX	CAVATED	11/11/2019
DEPTH FT.		DESC	CRIPTION / SO		SSIFICATION		RELATIVE DENSITY OR CONSISTENCY	
0	4± Inches	Topsoil						
_	Light brow	n Clayey Silt, a	and coarse to	fine Sa	nd, trace Gravel	,	Mec	lium Stiff
1	with occas	sional Cobbles						
_								
2								
_								
3 <u> </u>								
_								
4								
_								
5								
6					I, little fine Grave		L	oose
	with freque	ent cobbles an	d occasional b	oulder	s (-200) = 52%	W.C. = 11.1%		to
7							Mediu	um Dense
8	Infilt	ration Rate at e	el. 652 = 12 in.	/hr	Kv = 1.24	1 in/hr		
		тео.	T PIT COMPL	ETED				
9		113						
10								
_								
11								
12								
13								
14								

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-AA1	
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	655±	INSPECT	ED BY	RR/JT	
WAT	ER OBSE	RVATION	No	ot Enco	ountered	DATE EX	CAVATED	1/8/2020	
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION		RELATIVE DENSITY O CONSISTENCY		
0	4± Inches	Topsoil	When an annual second						
	Light brow	vn Clayey Silt, a	and coarse to	fine Sa	and, trace Gravel		Med	ium Stiff	
1	with occas	sional Cobbles							
_									
2	Infilt	ration Rate at e	el. 653 = 3 in/h	nr	Kv =0.31 in/h	r			
3									
4	Brown coa	arse to fine SAM	ND, some mot	ttled Cl	ayey Silt, little coars	e to fine	Mediu	um Dense	
	Gravel	, with Cobbles a							
5		TEST							
_						=			
6									
6 <u> </u>									
7									
-									
8									
_									
9									
-									
10									
_									
11									
12									
10									
13									
14				or and the second s					

PRO	JECT NO.	9999	PROJECT Prop.	Logistics Center	TEST PIT	NO.	TP-AA2				
LOC	ATION	SEE FIGURE 1	APPROX. ELEV.	655±	INSPECT	ED BY	RR/JT				
WAT	ER OBSE	RVATION	Not Encou	Intered	DATE EX	CAVATED	1/8/2020				
DEPTH FT.		DESC	CRIPTION / SOIL CLAS	SIFICATION		RELATIVE DENSITY O CONSISTENCY					
0	4± Inches	Topsoil									
1 <u></u>		iyey Silt, and co sional Cobbles	parse to fine Sand, tra	ace Gravel,		Medi	um Stiff				
2 3		Infiltration Rate at el. 653 = 0.25 in/hr Kv = 0.02 in/hr									
4 4 5			ND, some Clayey Silt, es and Boulders	little coarse to fine	e Gravel	Mediu	m Dense				
6 <u> </u>		TEST	Γ PIT COMPLETED A	AT 5± FEET							
8 <u> </u>											
9											
10											
···											
12											
—											
13											
14											
		69904			SESI CONS	ULTING E	NGINEERS				

PRO	JECT NO.	9999	PROJECT F	Prop. Logistics Ce	nter TEST PIT	NO.	TP-A2-1	
LOC	ATION	SEE FIGURE 1	APPROX. ELE	V. 655±	INSPECT	ED BY	RR/JT	
WAT	ER OBSER	VATION	Not E	ncountered	DATE EX	CAVATED	2/14/2020	
DEPTH FT.		DESC	RIPTION / SOIL	CLASSIFICATION		RELATIVE DENSITY O CONSISTENCY		
0	4± Inches T	Fopsoil						
1 <u> </u>		vey Silt, and co onal Cobbles	parse to fine San	d, trace Gravel,		Med	um Stiff	
2 3		ation Rate at e	l. 653 = 14 in/hr	Kv = 2	2.0 in/hr			
4	Brown coar	se to fine SAN	to fine Gravel	Mediu	m Dense			
5	with occ	asional Cobble	es and Boulders	'				
-		TEST	PIT COMPLET	ED AT 5± FEET				
6								
7								
· —								
8								
_								
9								
10								
11								
12								
12								
13								
14								
					SESI CONS			

PRO	JECT NO.	TEST PIT	NO.	TP-A2-2						
LOC	ATION	SEE FIGURE 1	APPROX. ELEV.	655±	INSPECT	ED BY	RR/JT			
WAT	ER OBSEF	RVATION	Not Encou	ntered	DATE EX	CAVATED	2/14/2020			
DEPTH FT.		DESC	CRIPTION / SOIL CLAS	SIFICATION		RELATIVE DENSITY O CONSISTENCY				
0	4± Inches	Topsoil								
1 <u> </u>		yey Silt, and co ional Cobbles	parse to fine Sand, tra	ce Gravel,		Med	ium Stiff			
2 3	Infiltration Rate at el. 653 = 20 in/hr Kv = 4.1 in/hr									
4	Brown coarse to fine SAND, some Clayey Silt, little coarse to fine Gravel Medium Dense									
5	with occasional Cobbles and Boulders									
—	TEST PIT COMPLETED AT 5± FEET									
6										
7										
8										
9										
_										
10										
-										
11										
12										
13										
14							NGINEERS			

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-AA3
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	655±	INSPECT	ED BY	RR/JT
WAT	ER OBSE	RVATION	Se	eepage	e @ 4'±	DATE EX	CAVATED	1/8/2020
DEPTH FT.		DESC	CRIPTION / SO	IL CLA	SSIFICATION			E DENSITY OR
0	3± Inches	Topsoil						
—	Light brow	vn Clayey Silt, a	and coarse to	fine Sa	nd, trace Gravel		Med	ium Stiff
1	with occas	sional Cobbles						
-								
2	Infilt	ration Rate at e	٦r					
—								
3								
4		5.5						
	Brown mo	ttled Clayey SI	ium to fine	ïne Stiff				
5	₁ Gravel,	with frequent (
—		TEST	PIT COMPLE	ETED	AT 5± FEET			
6 <u> </u>								
7								
_								
8								
_								
9								
10								
10								
11								
12								
13								
14								

LOCATION SEE FIGURE 1 APPROX. ELEV. 656± INSPECTED BY RRUT WATER OBSERVATION Seepage @ 4'±, GW @ 4.8'± DATE EXCAVATED 1/8/2020 DEPTH Fr. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY 0 3± Inches Topsoil	PRO	JECT NO.	9999	PROJECT	Prop. I	_ogistics Cente	rTEST PIT	NO.	TP-AA4			
DEPTH FT. DESCRIPTION / SOIL CLASSIFICATION RELATIVE DENSITY OR CONSISTENCY 0 3± Inches Topsoil	LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	656±	INSPECT	ED BY	RR/JT			
FT. DESCRIPTION / SOIL CLASSIFICATION CONSISTENCY 0 3± Inches Topsoil	WAT	ER OBSE	RVATION	Seepage	e @ 4'±,	GW @ 4.8'±	DATE EX	CAVATED 1/8/2020				
Light brown Clayey Silt, and coarse to fine Sand, trace Gravel, Medium Stiff 1 with occasional Cobbles Medium Stiff 2			DESC	CRIPTION / SO	IL CLAS	SIFICATION						
1 with occasional Cobbles 2	0	3± Inches	Topsoil									
	1 1 2											
5 — Gravel, with frequent cobbles and occasional boulders Medium Dense	3 <u> </u>	Infiltration Rate at el. 653 = 8.6 in/hr Kv = 1.04 in/hr										
5 — Gravel, with frequent cobbles and occasional boulders Medium Dense	· · · · · · ·	Brown mo	ttled coarse to	fine SAND, so	edium to fine	Loc	ose to					
6 TEST PIT COMPLETED AT 5.5± FEET 7	5											
	6 <u> </u>		TEST	PIT COMPLE	TED AT	5.5± FEET						
- - 9 - 10 - 10 - 11 - 12 - 13 - 14 -	8											
9												
10 11 12 13 14	9											
	10											
11 12 13 14												
 12 13 14	11											
12 13 14	_											
 13 14	12											
14	13											
14	13											
	14											

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-A4-1
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	660±	INSPECT	ED BY	RR/JT
WAT	ER OBSE	RVATION	Se	eepage	e at 5.5'	DATE EX	CAVATED	2/14/2020
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION		RELATIVE DENSITY OR CONSISTENCY	
0	4± Inches	Topsoil						
_	Brown Cla	ayey Silt, and co	parse to fine S	and, ti	race Gravel,		Med	ium Stiff
1	with occas	sional Cobbles						
2								
3								
3								
4								
5								
	Brown coa	arse to fine SAN		IOV Sil	t, little coarse to fir	Crovel	Modiu	m Danaa
6		casional Cobbl				le Glavel	wediu	m Dense
7								
8								
9								
		TEST	PIT COMPLE	ETED	AT 6± FEET			
10								
11						~		
—								
12								
—								
13								
14								

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Cente	r TEST PIT	NO.	TP-A4-2
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	660±	INSPECT	ED BY	RR/JT
WAT	TER OBSE	RVATION	Se	eepage	at 5.5'	DATE EX	CAVATED	2/14/2020
DEPTH FT.		DESC	RIPTION / SO	IL CLAS	SIFICATION			DENSITY OR ISTENCY
0	4± Inches	Topsoil						
_	Brown Cla	yey Silt, and co	parse to fine S	and, tra	ace Gravel,		Med	ium Stiff
1	with occas	sional Cobbles						
—								
2								
-								
3								
-								
4								
5								
					little coarse to t	fine Gravel	Mediu	m Dense
6	with oc	casional Cobbl	es and Boulde	ers				
7								
8								
°								
9								
10		TEST	PIT COMPLE	ETED A	T 6± FEET			
10								
11								
12								
12-								
13								
14								

PRO	JECT NO.	9999	PROJECT	Prop	Logistics Cente	r TEST PI	۲NO.	TP-A4-3
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	664±	INSPECT	ED BY	RR/JT
WAT	FER OBSE	RVATION	Se	eepage	at 6.5'	DATE EX	CAVATED	2/14/2020
DEPTH FT.		DESC	RIPTION / SO	IL CLA	SSIFICATION		1	E DENSITY OR BISTENCY
0	4± Inches	Topsoil						
-	1	ayey Silt, and co	parse to fine S	and, tr	ace Gravel,		Med	ium Stiff
1	with occas	sional Cobbles						
2								
3								
4 <u> </u>								
5								
6								
	Brown coa	arse to fine SAN	ID, some Clay	ey Silt	, little coarse to f	ine Gravel	Mediu	m Dense
7	with oc	casional Cobble	es and Boulde	ers				
8								
9								
°		TEST						
10		TLOT			AI OI FEEL			
_								
11								
-								
12								
13								
14								

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP-AA5
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	656±	INSPECT	ED BY	RR/JT
WAT	ER OBSE	RVATION	Seepa	ge at 4	<u>+</u> '; GW @5'	DATE EX	CAVATED	1/8/2020
DEPTH FT.			RIPTION / SO	IL CLAS	SSIFICATION			E DENSITY OR DISTENCY
0	4± Inches	Topsoil						
	1		nd coarse to	fine Sa	nd, trace Gravel,		Med	ium Stiff
1	with occas	sional Cobbles						
2								
3	Infilt	ration Rate at e	653 = 13 5 i	n/hr	Kv = 1.93 in/l	or		
_			. 000 - 10.01		RV - 1.93 III/	1		
4								
_	Brown	mottled clayey	SILT, some c	oarse t	o fine Sand, little fir	ne Gravel	Lo	ose to
5	with fre	equent cobbles	and occasion	al bould	ders		Mediu	m Dense
6 7		TEST	PIT COMPLE	TED A	T 5.5± FEET			
7								
8								
9								
10								
11								
12								
13								
14								

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	TP AA6
LOC	ATION	SEE FIGURE 1	APPROX.	ELEV.	658'±	INSPECT	ED BY	RR
WAT	ER OBSEI	RVATION	М	ottled (@ 6.5'±	DATE EX	CAVATED	06.13.2020
DEPTH FT.		DESC	CRIPTION / SC		SSIFICATION			E DENSITY OR DISTENCY
0	6"± Topso	bil						
		n coarse to fine sional cobbles	e Sand, some	coarse	e to fine Gravel, litt	e Silt,	L	oose to
							M	edium
3							C	ense
4	Tan-brow	n coarse to fine	e Sand, some	coarse	e to fine Gravel, so	me Silt,		
_	with occas	sional cobbles						
5	Infiltration	n Rate: Kv=1.4	in/hr					
6							C	ense
_								
7		 						
8		I	EST PIT CON	/IPLE I	ED @ 7 ±			
-								
9								
10								
_								
11								
12								
_								
13								
14								

PRO	JECT NO.	9999	PROJECT	Prop.	Logistics Center	TEST PIT	NO.	ΤΡ ΑΑ7
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	656' ±	INSPECT	ED BY	RR
WAT	ER OBSE	RVATION		NE		DATE EX	CAVATED	06.13.2020
DEPTH FT.		DESC	RIPTION / SO		SSIFICATION			E DENSITY OR SISTENCY
0	6"± Topso	il						
1		n coarse to fine sional cobbles	Sand, some	coarse	to fine Gravel, litt	le Silt,	Mediu	um Dense
2 3	Infiltration	Rate: Kv=1.2 i	n/hr					to
4							C	ense
5								
		Т	EST PIT CON	/IPLETE	ED @ 5'±			
6								
7								
8								
9								
10								
12								
13								

C		0					Job:	9999	Boring:	B-312-1	0	Client	Putnam Seaburty Partners, LP
0			B	ORIN	IG L	OG	Project:	Northeas	t Interstate I	ogistics Center	Obs	erver:	RR/JT
	GINE			•			Location:		Southeast	NY	Elev	ation	547'±
Date Started:	1	ne 4, 2020	Date C	ompleted:	lune	e 4, 2020	Boring Locat	ion Offset:			_	B'± NE	_
Contractor:		l Borings, IN		ype of Rig:		ATV	Weather:			Sunny			nperature: 75F
Driller:	Genera	John		Helper:			Rotary Bit Di	ameter:		Junny		10	
Casing Dia.:		Inche	s Cas	ing Depth:		Feet	Auger Diame		OD:	6 Inc	hes	ID:	4 Inches
Drilling Muc	l I Itilizad	1	None		Water		Quickgel		Bentonite		vert	-	Ez Mud U Other
Drining wide	-	plit Spoon S				h Diameter	Quickgei			3-inch Diam			
SAMPLIN	-	J-tube Samp			Piston	in Diameter		Shelby			her		
EQUIPME		ore Barrel:						Core Bit:					
(type and	-i	ampler Han	mer.		External	Anvil		Mobile Safe	tv	☑ Au	to		Mechanical Trip
		Veight:			lbs.		Drop Height:		Inches				
		0				WATER LEV	EL OBSERVAT						
Date		Time	C	epth of Ho	le	Depth	of Casing	Depth t	o Water			R	emarks
06.05.20	20	8:05 AM		13'±		1	0'±	r	IE				
		SAMPLE								2	ta		
Number	Inter	val Bl	ows/6"	N- Value			SAMPLE D	ESCRIPTIC	N	Douth	Strata	Rec.	REMARKS
		-								C	ک د	<u> </u>	
	-		_		Augered	to 5'±					_		10.4' = Top of casing to bottom
													of hole
										5			
S-1	5	6	7	18	Brown co	arse to fine S	and, and Claye	v Silt little m	edium to fine	Gravel			
51	7		-	10	Diowirco		and, and elaye	y one, near m			_	-	
		11	11		_						_		-
S-2	7	8	10	22	Same as a	above					_		-
	9	12	12										
S-3	9	3	5	12	Brown Si	lt, and coarse	to fine Sand, li	ttle medium	to fine Gravel	1	D		
	11	7	9		Unfactor	ed Infiltration	Rate (EL 353'±) = 0.7"/hr					
S-4	11	3	6	13	Same as a	above							
	13	7	10										
							BORING CON	/PLETED @ 1	 3'±				
								C		1			
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												_	
										3	5]
			1	Page 1 of	1								Figure No.:
The subsurfac	e informa	ation shown I	ereon was	-		and estimation	ting purnoses f	or our client	It is made ava	ilable to authori:	ed user	s only	that they may have access to the
					-								t of such authorized users.
	-				-	-	ers recommen	dations conta	ined in the re	port from which	these lo	gs we	re extracted.
Pp: Pocket Pe	netromet		-	imer; WOR: ge in Strata:	-	коа			Inferred Char	nge in Strata: -			
Soil descriptio	ons repres			-		unless otherw	vise noted.						

C		C						Job:	9999	Boring:	B-312-2		C	ient:	Putnam Seaburty Partners, LP
0		0		B	ORIN	IG L	OG	Project:	Northeas	t Interstate L	ogistics Cent	er	Obse	rver:	RR/JT
	GINE			-	•		•••	Location:		Southeast,	NY		Eleva	tion:	552'±
Date Started:		une 4, 2		Date Co	ompleted:	June	4, 2020	Boring Locati	ion Offset:	,				±NE	
Contractor:	-		ngs, INC.		pe of Rig:		ATV	Weather:			Sunny		-		nperature: 75F
Driller:	Gene	John	-	.,	Helper:			Rotary Bit Di	ameter:		Junny			Ter	
Casing Dia.:			Inches	Casi	ng Depth:		Feet	Auger Diame		OD:	6 1	nche	s	ID:	4 Inches
Drilling Mud	l Utilize	۰d۰		None		Water		Quickgel		Bentonite	_	Rever			Ez Mud Dother
Dining inte			poon Sar				n Diameter	QuickBei	_		3-inch Dia			-	
SAMPLIN	NG		e Sample			Piston			Shelby			Other			
EQUIPME			Barrel:						Core Bit:		_				
(type and	size)	Samp	ler Hamm	ner:		External	Anvil		Mobile Safe	ty		Auto			Mechanical Trip
		Weigh				lbs.		Drop Height:		Inches					
		I					WATER LEV	EL OBSERVAT	IONS						
Date		т	ïme	D	epth of Ho	le	Depth	of Casing	Depth t	o Water				R	emarks
06.05.20	20	8:1	L5 AM		11'±		1	0'±	1	IE					
		SAI	MPLE					CALAD:				Ъ	ata	ن	
Number	Inte	erval	Blow	/s/6"	N- Value			SAMPLE D	ESCRIPTIC	IN		Depth	Strata	Rec.	REMARKS
						Augered	to 5'±					-	•,		9.7' = Top of casing to bottom
						Mugereu					-				of hole
											-				
											_				
												5			
S-1	ļ	5	5	9	20	Brown Si	t, and coarse	to fine Sand, tr	ace medium	to fine Gravel					
		7	11	13											
S-2		7	8	11	23	No recov	ery (gravel in i	tip)							
		9	12	12											
S-3		9	12	13	28	Grav-bro	wn coarse to f	fine Sand, and S	Silt little mer	lium to fine Gr	avel	10			
55		.1			20			Rate (EL 543'±)				10			
	1	.1	15	17											
								BORING COM	1PLETED @ 1	Ľ±	_				
											_				
												15			
	1										F				
	1										ŀ	20			
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	1										ŀ	30			
	1			I	Page 1 of	1									Figure No.:
The subsurfac	e inform	nation	shown her		-		n and estima	ting purnoses f	or our client	It is made ava	ilable to autho	rized	USers	only	that they may have access to the
						-		- · ·							t of such authorized users.
		-				-	-	ers recommen	dations conta	ined in the re	port from whic	ch the	se log	s wer	e extracted.
Pp: Pocket Pe	netrome		-		mer; WOR: ge in Strata:	-	NUU			Inferred Char	ige in Strata:				
Soil descriptio	ons repre						unless otherw	vise noted.			-				

C		1					Job:	9999	Boring:	B-312-3	c	lient:	Putnam Seaburty Partners, LP		
0			B	ORIN	IG L	OG	Project:	Northeas	t Interstate L	ogistics Center	Obse	erver:	RR/JT		
	GINEER			•••••			Location:		Southeast,	NY	Eleva	ation:	556'±		
Date Started:	1	4, 2020	Date Co	ompleted:	June	4, 2020	Boring Locat	ion Offset:				N/A			
Contractor:	General E	Borings, INC.	ту	/pe of Rig:		ATV	Weather:		s	unny		Ter	nperature: 75F		
Driller:	ſ	ohn		Helper:			Rotary Bit Di	ameter:							
Casing Dia.:		Inches	Casi	ng Depth:		Feet	Auger Diame	eter:	OD:	6 Inch	es	ID:	4 Inches		
Drilling Mud	Utilized:	 	None		Water		Quickgel		Bentonite	Rev	ert		Ez Mud 🛛 Other		
	Spl	lit Spoon Sar	mpler:	\checkmark	2-incl	h Diameter	1			3-inch Diame	ter				
SAMPLIN		ube Sample	r:		Piston			Shelby		Oth	er				
EQUIPME (type and s		re Barrel:						Core Bit:	. 1						
(0) p 0 and 1	Ja	mpler Hamm eight:	ner:		External lbs.	Anvil		Mobile Safe	Inches	✓ Auto	C		Mechanical Trip		
		agiit.			105.	WATER LEV	Drop Height: EL OBSERVAT		linches						
Date		Time	D	epth of Ho	le	Depth	of Casing	Depth t	o Water			R	emarks		
06.05.20	20	8:30AM		13'±		1	0'±	1	IE						
		SAMPLE					C A A A B			th	ıta	ن			
Number	Interva	l Blow	vs/6"	N- Value			SAMPLE D	ESCRIPTIC	N	Depth	Strata	Rec.	REMARKS		
					Augered	to 5'±							10.4' = Top of casing to bottom		
					U						-		of hole		
											-				
											-				
										_	-				
											5				
S-1	5	3	3	7	Brown co	arse to fine S	and, some Silt,	trace mediur	n to fine Grave						
	7	4	6								_				
S-2	7	4	7	15	Brown co	arse to fine S	and, and Silt, ti	race medium	to fine Gravel		_				
	9	8	12								_	-			
S-3	9	8	8	17	Brown co	arse to fine S	and, some coar	rse to fine Gr	avel, some Silt	10					
	11	9	11		Unfactor	ed Infiltration	Rate (EL 545'±) = 1.5"/hr							
S-4	11	14	14	26	Brown Si	lt, some coars	e to fine Sand,	trace mediur	n to fine Grave	1					
	13	12	16												
							BORING CON	/IPLETED @ 1	3'±						
										15					
										20					
											1				
L															
										25					
										23	1				
											1				
											-				
											-				
L			L	Dage 1 -	1					30	<u> </u>		Figure No :		
The subcurfe -	a informati	on shown h		Page 1 of		in and active-	ting purposes f	or our client	It is made as:	lable to authori	ducer	onh	Figure No.:		
					-								that they may have access to the t of such authorized users.		
	-				-	-	ers recommen	dations conta	ined in the rep	port from which the	nese lo	gs wei	e extracted.		
Pp: Pocket Per	ieuometer	-		mer; WOR: ge in Strata:	-	RUU			Inferred Chan	ge in Strata:					
Soil descriptio	ns represer		-			unless otherw	/ise noted.								

C		C						Job:	9999	Boring:	B-312-	4	С	lient	Putna	n Seab	urty Partne	rs, LP
0		0		В	ORIN	IG L	OG	Project:	Northeas	t Interstate I	ogistics Cer	nter	Obse	erver		R	R/JT	
	GINE		10					Location:		Southeast	, NY		Eleva	ation		57	70.0±	
Date Started:	1	une 4, 2	2020	Date Co	ompleted:	June	4, 2020	Boring Locat	ion Offset:				4	'± SE				
Contractor:	Gener	al Bori	ngs, INC.	Ту	/pe of Rig:		ATV	Weather:		:	Sunny			Tei	mperatu	re:	75F	
Driller:		John	I		Helper:			Rotary Bit Di	iameter:									
Casing Dia.:			Inches	Casi	ng Depth:		Feet	Auger Diame	eter:	OD:	6	Inche	es	ID:		4	Inches	
Drilling Mud	d Utilize	d:	\checkmark	None		Water		Quickgel		Bentonite		Reve	rt	[Ez	Mud	□ Otł	her
		Split S	poon Sar	npler:			h Diameter				3-inch D							
SAMPLIN	ŀ		e Sample	r:		Piston			Shelby			Othe	r					
EQUIPME (type and	(100)	Core B				E. damal	A		Core Bit:	. .	7	A + -						
(-)		Sampl Weigh	er Hamm	ner:		External lbs.	Anvii	Drop Height:	Mobile Safe	Inches		Auto				IVIE	chanical Trip	2
		weign				103.	WATER LEV	EL OBSERVAT		inches								
Date		Т	ime	D	epth of Ho	le	Depth	of Casing	Depth t	o Water				R	emarks			
06.05.20	020	8:0	0 AM		24'±		2	:0'±	1	NE								
		SAN	MPLE									th	ita	ۍ				
Number	Inte	rval	Blow	/s/6"	N- Value			SAMPLE D	DESCRIPTIC	N		Depth	Strata	Rec.		REN	IARKS	
						Augered	to 6'±						0,		23.2' = T	op of ca	sing to botto	om
						.0.									of hole		0	-
												-						
															_			
															-			
												5			-			
S-1	6		6	7	19	Light-bro	wn coarse to	fine Sand, som	e Silt, little m	edium to fine	Gravel				_			
	8	3	12	12														
S-2	8	3	6	10	22	Black-gra	y coarse to fir	ne Sand, some	coarse to fine	Gravel, trace	Silt,			-	_			
	10	0	12	14		with cobl	oles					10						
S-3	10	0	6	6	18	Brown m	edium to fine	Sand, some Si	lt, trace Grave	el (moist)								
	1	2	12	12														
S-4	1	2	6	12	22	Same as	above											
	14	4	10	10														
S-5	14	4	8	10	20	Gray-bro	wn medium t	o fine Sand, so	me Silt, trace	Gravel		15						
	1	6	10	17														
S-6	1	6	9	10	22	Gray Clay	ey Silt, some	coarse to fine S	Sand, trace G	ravel					1			
	18	8	12	18											1			
S-7	1	8	8	12	27	No recov	ery								1			
	20	0	15	19								20			1			
S-8	20	0	10	13	31	Gray Clay	ey Silt, and co	oarse to fine Sa	and, trace Gra	vel								
	2	2	18	26			-	Rate (EL 548'±				\vdash			1			
S-9	2		24	26	60			nd, some Claye	-	ravel					1			
	24		34	36		,		,,.	. ,			\vdash			-			
	-		54	50				BORING CON	م API FTFD م 2	 1'+					_			
												25			_			
	1											\vdash			-			
												\vdash		<u> </u>	-			
												\vdash		<u> </u>	_			
												\vdash			-			
	1											30	<u> </u>					
The ends of	- 1- C	- * * -	la avera d'		Page 1 of			**************************************		In the second	dahlar in s	· - · *	1	!	-	e No.:		- + la -
								ting purposes f ntended as a s										tne
Information o	n the log	gs shou	ld not be	relied upo	on without f	the geote	chnical engine	ers recommen		-								
Pp: Pocket Pe	netrome		-		mer; WOR: ge in Strata:	-	Kod			Inferred Chai	nge in Strata							
Soil descriptio	ons repre				-		unless otherw	vise noted.			J							

PRO	JECT NO.	9999	PROJECT	Prop. L	ogistics Cente	r TEST PIT	NO.	TP 301A
LOC	ATION	SEE FIGURE 1	APPROX. EL	_EV	556' ±	INSPECT	ED BY	RR
WAT	ER OBSE	RVATION		NE		DATE EX	CAVATED	06.04.2020
DEPTH FT.		DES	CRIPTION / SOII	L CLASS	FICATION			DENSITY OR
0	Fill: Black	coarse to fine	Sand, little Silt,	, trace G	ravel		L	oose
1								
_	Tan-brow	n coarse to fine	e Sand, some S	Silt, trace	e Gravel, with	cobbles	M	edium
2							D	ense
3								to
								ense
5								
_		Т	EST PIT COM	PLETED) @ 5'±			
6								
7_								
8								
_								
9								
10								
11								
12								
13								
∥ —								
14	<u> </u>							

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Cente	r TEST PIT	NO.	TP-B312-5
LOC	ATION	SEE FIGURE 1	APPROX. E	LEV.	525' ±	INSPECT	ED BY	RR
WAT	ER OBSE	RVATION	Se	epage	@ 1.5' ±	DATE EX	CAVATED	06.04.2020
DEPTH FT.		DESC	RIPTION / SO		SSIFICATION			E DENSITY OR DISTENCY
0	6"± Topso	bil						
1 2		n coarse to fine ent cobbles; sli			o fine Gravel, so	me Silt,		edium Dense
					to			
3 <u> </u>							C	ense
5	Tan-browr	n coarse to fine	Sand, and S	ilt. som	ne coarse to fine	Gravel, with		
					veathered rock		C	ense
6								to
7								Very Dense
								ense
8								
9		Т	EST PIT CON	/IPLET	ED @ 8'±			
10								
11								
12								
13								
14								

PRO	JECT NO.	9999	PROJECT	Prop	. Logistics Center	TEST PIT	NO.	TP-B312-6
LOC	ATION	SEE FIGURE 1	APPROX. E	ELEV.	520' ±	INSPECT	ED BY	RR
WAT		RVATION	Se	epage	@ 1.5' ±	DATE EX	CAVATED	06.04.2020
DEPTH FT.		DESC	CRIPTION / SO		SSIFICATION			E DENSITY OR DISTENCY
0	6"± Topso	il						
					o fine Gravel, som			edium Dense
2								to
3 <u> </u>							C)ense
5		TE	ST PIT COM	PLETE	ED @ 4.5'±			
6								
7								
8								
9								
10								
11								
 12								
9 10 11 12 13								
14								