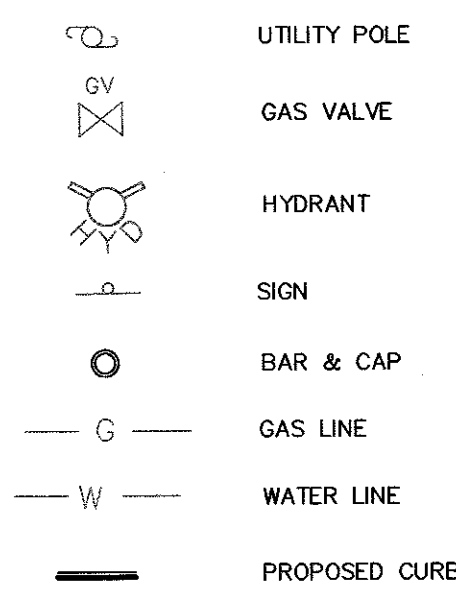
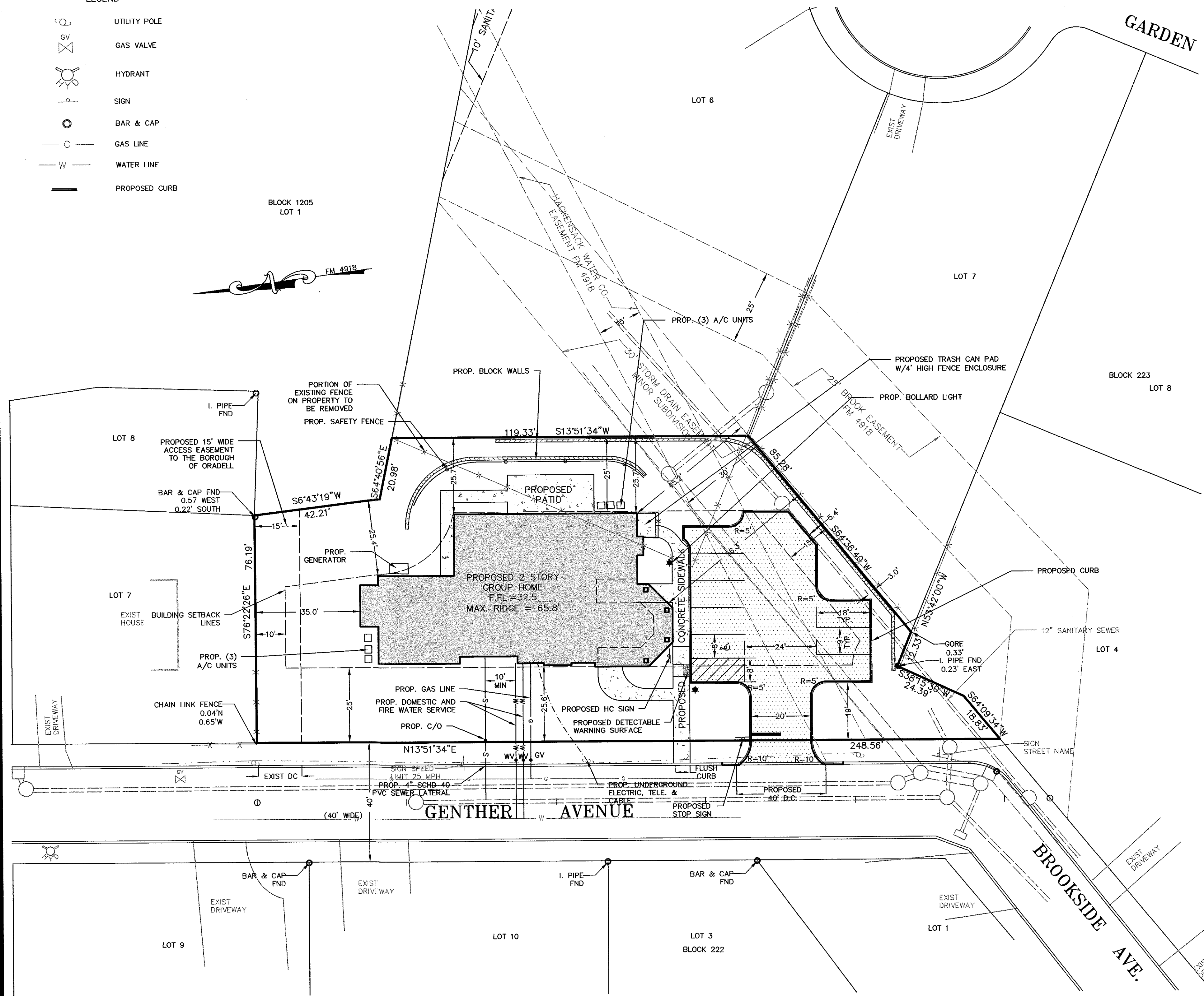
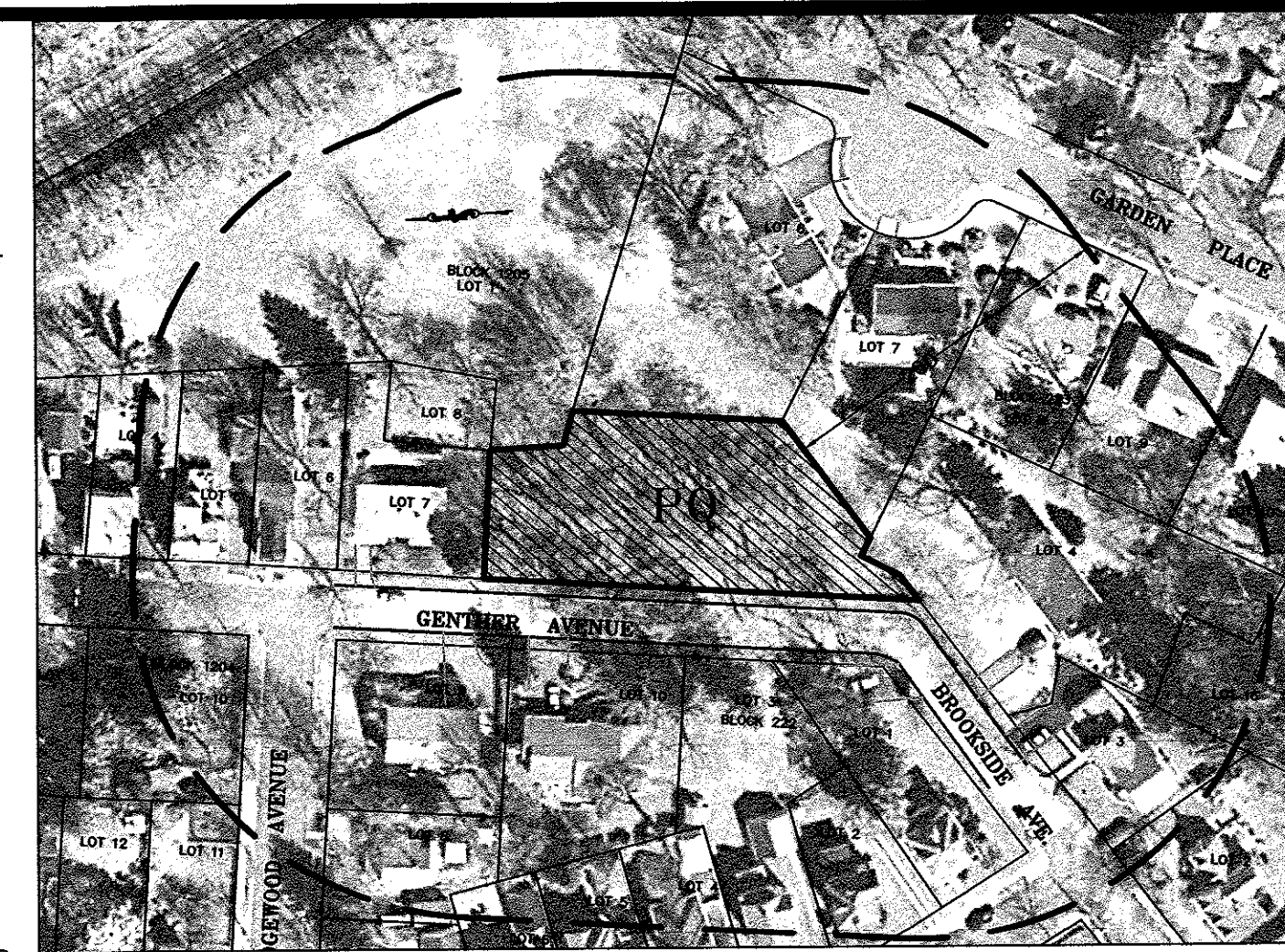


## LEGEND

BLOCK 1205  
LOT 1

## PROPERTY OWNER LIST W/IN 200'

Block	Lot	Location	Owner
223	2	615 BROOKSIDE AVE	CALLAHAN, BRIAN J. & JODI L.
223	3	583 BROOKSIDE AVE	CONZA, GINA A & CASICANO, JOSEPH F
223	4	575 BROOKSIDE AVE	AKEHI, AKIYOSHI & AKIKO
223	6	273 GARDEN PLACE	CZYPEK, MONIKA
223	7	263 GARDEN PLACE	JOHNSON, PETER D & LESLIE J
223	8	259 GARDEN PLACE	LEE, YUN & ELISE
223	9	253 GARDEN PLACE	PARK, HYOSUB & HYEMIN
223	10	249 GARDEN PLACE	CHAN, KAH O & MING WAI
223	16	208 KINDERKAMACK RD	ZENREICH, ALAN & LAUREN
222	1	234 MAPLE AVE	OLIVER, LIAM & OLIVER
222	2	240 MAPLE AVE	COSTOPOULOS, NANCY
222	3	242 MAPLE AVE	242 MAPLE LLC
222	4	256 MAPLE AVE	CROONQUIST, WILLIAM S. & CHRISTINE
222	5	258 MAPLE AVE	WINTERS, JAMES & LORI
222	6	264 MAPLE AVE	HOFFMAN, DAVID J & BARBARA A
222	8	581 RIDGEWOOD AVE	MENENDEZ, RALPH & JILL
222	9	577 RIDGEWOOD AVE	MC CAFFREY, TIMOTHY J & ROBIN D
222	10	263 GENTHER AVE	CHO, JASON & MELINDA
1204	10	285 GENTHER AVE	MULDERIG, ROURK & MCGRANAGHAN, JUSTINE
1204	11	282 MAPLE AVENUE	SURI, NEEL KUMAR & SOCHA, STACY LEE
1205	1	GENTHER AVENUE	BOROUGH OF ORADELL
1205	4	286 GENTHER AVE	DE STEFANO, JON & DOREEN
1205	5	284 GENTHER AVE	LORIA, PETER & MERILYN
1205	6	280 GENTHER AVENUE	MAXSON, JAMES W. & DENISE L.
1205	7	272 GENTHER AVE	ENNIS, CAROL
1205	8	GENTHER AVENUE	BOROUGH OF ORADELL



## KEY MAP

SCALE 1"=100'

## GENERAL NOTES

- PROPERTY KNOWN AS LOT 5 IN BLOCK 223 ON SHEET NO 2 OF THE CURRENT TAX MAP OF THE BOROUGH OF ORADELL.
- PROPERTY LINE INFORMATION FROM :
  - A MAP ENTITLED "MINOR SUBDIVISION (TOPOGRAPHICAL SURVEY) OF PROPERTY IN THE BOROUGH OF ORADELL, BERGEN COUNTY, N.J. PREPARED BY WILLIAM O. SCHWANWEDE, DATED 9/10/79.
  - A MAP ENTITLED "MAP OF GRANT PARK HOMES, SITUATED IN THE BOROUGH OF ORADELL, BERGEN COUNTY, N.J., PREPARED BY FRANK W. KOESTNER, DATED OCT. 1955" AND FILLED IN THE BERGEN COUNTY CLERK'S OFFICE ON JANUARY 4TH, 1956 AS MAP NO. 4918.
  - A MAP ENTITLED "SURVEY OF PROPERTY AT ORADELL, N.J." PREPARED BY FONDA & THOMSON, CE & S, DATED MAY 1924.
  - DEED BOOK:
 

V BK 01770 PG 1180	BK 7379 PG 084
V BK 03255 PG 1769	V BK 02510 PG 0691
V BK 00502 PG 0675	BK 6702 PG 77
V BK 03403 PG 2051	BK 7818 PG PG 177
V BK 03282 PG 2060	BK 8001 PG 915
BK 6682 PG 156	V BK 03350 PG 1470
BK 6712 PG 668	BK 7655 PG 268
	V BK 02576 PG 1088
- A FIELD SURVEY BY SCHWANWEDE/HALS ENGINEERING CO. ON FEBRUARY 8, 2021.
- PROPERTY IS LOCATED IN THE R-4 ZONE.
- TOTAL LOT AREA : 19,943 S.F. = 0.458 Ac.
- ELEVATIONS ARE BASED ON NAVD 1988.
- PROPERTY CONTAINS EASEMENTS FOR STORMDRAINAGE, SANITARY SEWER AND WATERMAIN.
- PROPERTY USE:
 

EXIST: VACANT	
PROPOSED: SUPPORTIVE HOUSING (GROUP HOME + (2) UNITS)	
- PARKING SPACES REQUIRED (SUPPORTIVE HOUSING):
 

PROPOSED: FIRST FLOOR: 4 BEDROOM (GROUP HOME)=2.5 SPACES	
SECOND FLOOR: 1 BEDROOM UNIT = 1.8 SPACES	
2 BEDROOM UNIT = 2.0 SPACES	
TOTAL REQUIRED = 7 SPACES (RSIS 5:21-4.14)	
TOTAL PROPOSED = 8 SPACES	
- COVERAGE:
 

LOT COVERAGE:	BUILDING COVERAGE:
EXISTING: VACANT	EXISTING: VACANT
PROPOSED:	PROPOSED: BUILDING
BUILDING = 4,020 S.F.	4,020 S.F./19,943 S.F.=20.2%
PAVEMENT = 3,165 S.F.	
WALKS/PATIO = 1,215 S.F.	
PADS = 60 S.F.	
TOTAL: 8,460 S.F.	
8,460 S.F. / 19,943 S.F. = 42.4%	

## ZONING TABLE - ZONE R-4 RESIDENTIAL DISTRICT

	REQUIRED	EXISTING	PROPOSED
LOT AREA (SQUARE FT)	7,500 S.F.	19,943	19,943
LOT WIDTH (FT)	75'	248.56'	248.56'
FRONT YARD (FT)	25'	N/A	25.6'
REAR YARD (FT)	* 25' OR 25% OF LOT DEPTH	N/A	25.4'
SIDE YARD (FT)	10'	N/A	35.0'
COMBINED SIDE YARDS (FT)	109.3'	N/A	91.3' (V)
HEIGHT (FT)	34'	N/A	27'
BUILDING COVERAGE	25%	N/A	20.2%
LOT COVERAGE	40%	N/A	42.4% (V)
FLOOR AREA RATIO	3,938 S.F.	N/A	5,930 S.F (V)

\* LOT DEPTH = 76.19' x 25% = 19.05'

(V) VARIANCE REQUIRED

## VARIANCE REQUIRED:

- SEC. 240-6.5 D(3)B(b)(c)(2) SIDE YARD SETBACK  
MIN. TOTAL BOTH SIDES: 25' + (248.56-80)\*50% = 25' + 84.3' = 109.3'  
REQUIRED: 109.3'  
PROPOSED: 91.3' (V)
- SEC. 240-6.5 D(e) FLOOR AREA RATIO  
REQUIRED: (35% x 7500) + (17.5% x 7500) = 3,938 S.F.  
MAX. ALLOWABLE 3,938 S.F.  
PROPOSED: 5,930 S.F. (V)
- SEC. 240-6.5 D(d) MAXIMUM LOT COVERAGE  
REQUIRED: 40%  
PROPOSED: 42.4% (V)

APPROVED BY THE BOROUGH OF  
ORADELL ENGINEER

DATE

ENGINEER

APPROVED BY THE BOROUGH OF  
ORADELL PLANNING BOARD

DATE

CHAIRMAN

SECRETARY

OWNER:  
BOROUGH OF ORADELL  
355 KINDERKAMACK ROAD  
ORADELL, NJ 07649  
201-261-8200APPLICANT:  
BCUW/MADELINE HOUSING PARTNERS  
6 FOREST AVENUE  
PARAMUS, NJ 07652  
201-291-4050

DATE	BY	DESCRIPTION
3/28/24	DH	1. ENGINEERING COMMENTS
		REVISIONS

**SITE PLAN**  
**BLOCK 223 - LOT 5**  
**GENTHER AVENUE**  
FOR  
**BCUW/MADELINE HOUSING PARTNERS**  
BOROUGH OF ORADELL, BERGEN COUNTY, N.J.

**SCHWANWEDE HALS & VINCE**  
ENGINEERING • LAND SURVEYING • PLANNING  
111 LITTLETON ROAD - SUITE 200 - PARSIPPANY, N.J. 07054  
(201) 337-0053

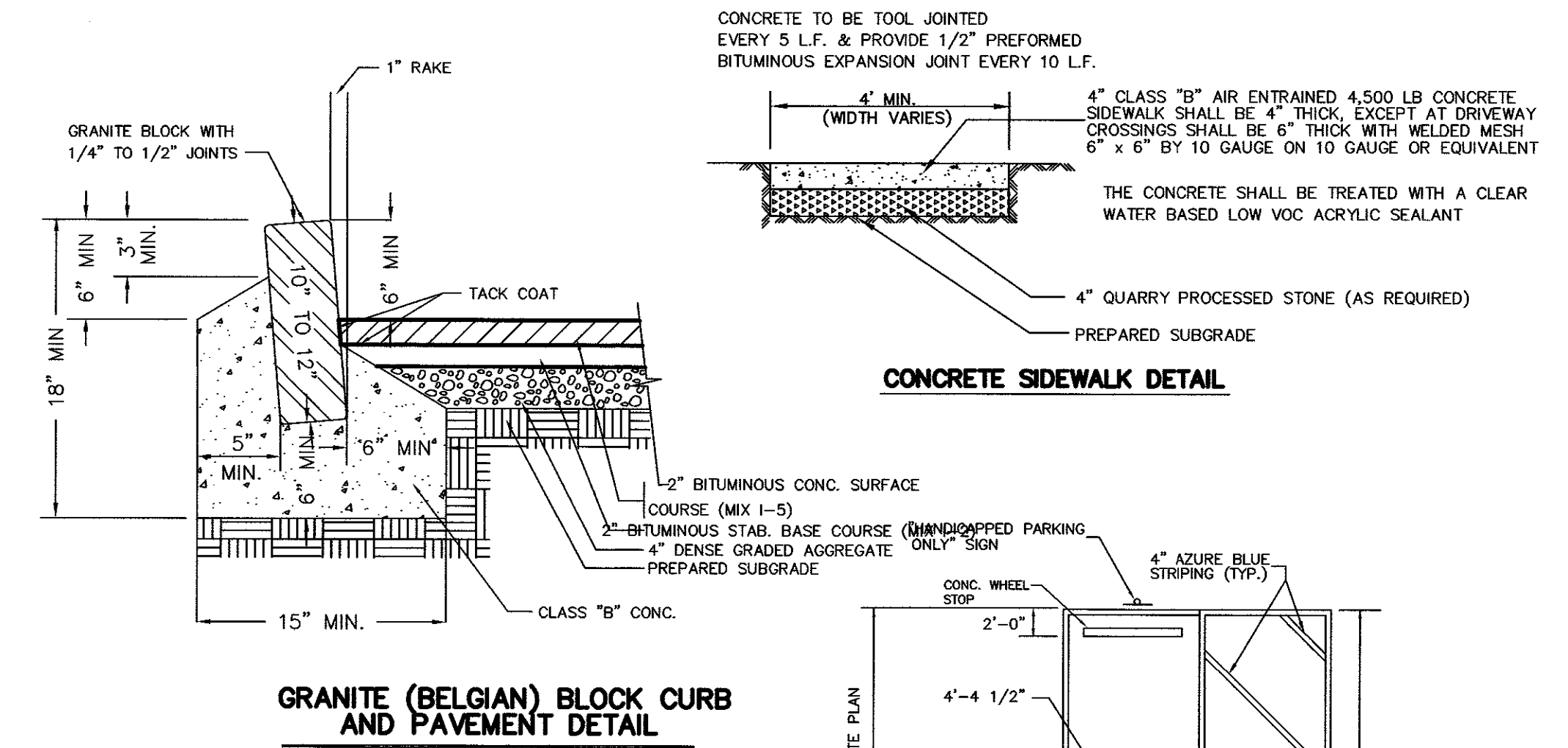
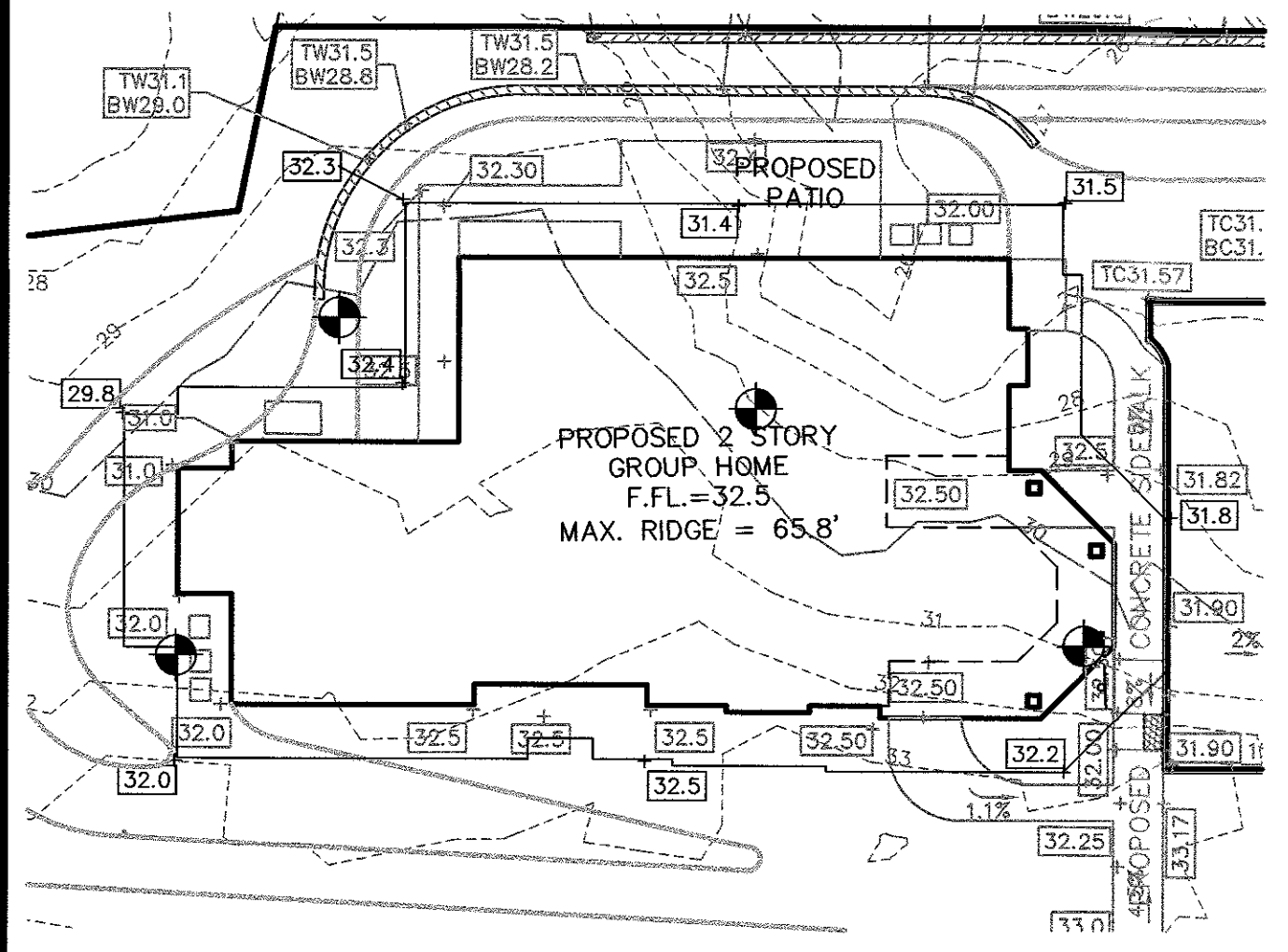
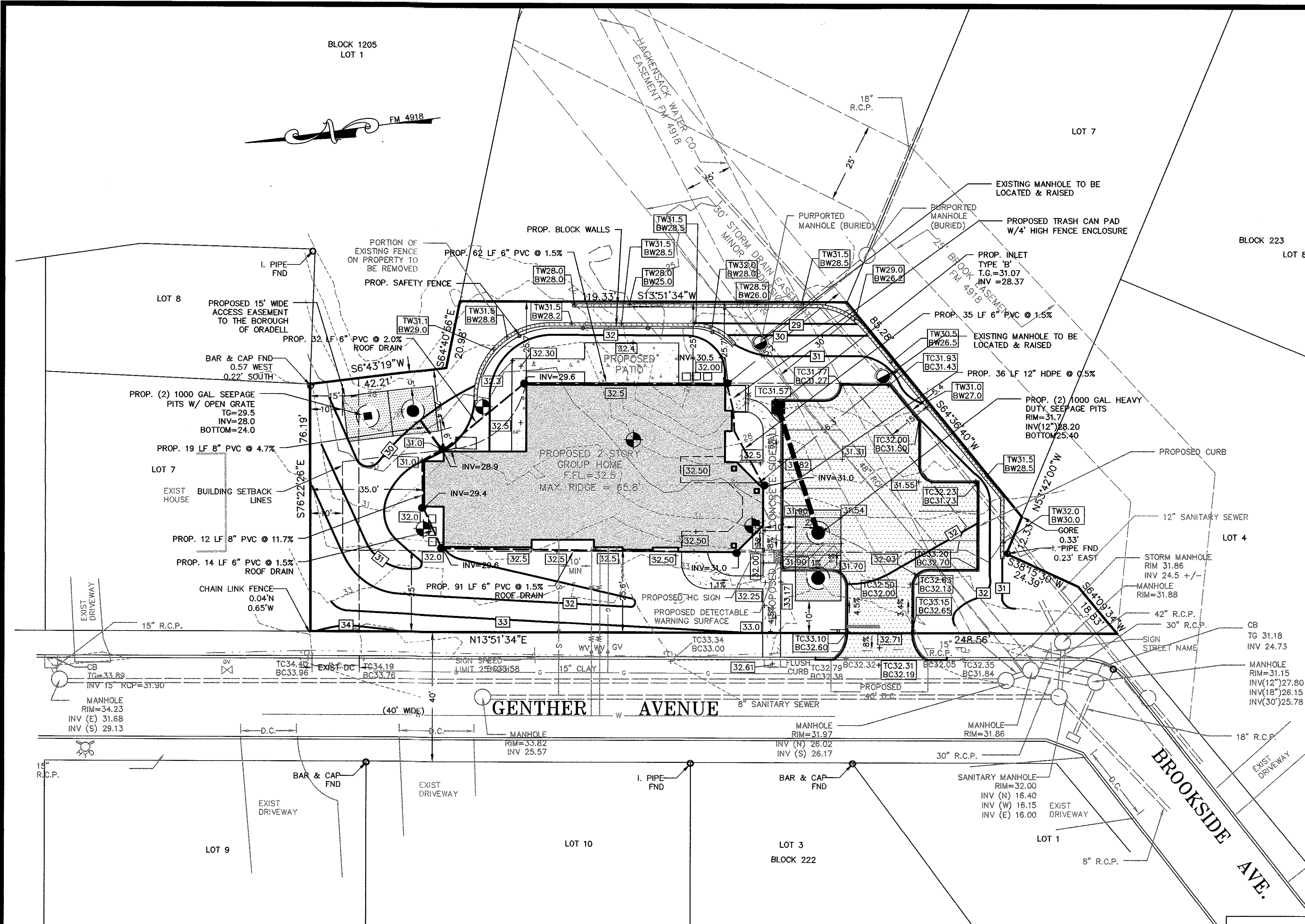
*David A. Hals*  
**DAVID A. HALS, PE, LS, PP**  
N.J. PROFESSIONAL ENGINEER AND  
LAND SURVEYOR LIC. NO. 22694

*Joseph F. Vince*  
**JOSEPH F. VINCE, PE, LS, PP**  
N.J. PROFESSIONAL ENGINEER AND  
LAND SURVEYOR LIC. NO. 6842588

SCALE  
1"=20'  
0 20 40  
GRAPHIC SCALE

DATE: SEPT. 14, 2023  
JOB NO: 7892-1620  
SHEET NO: 1 OF 6

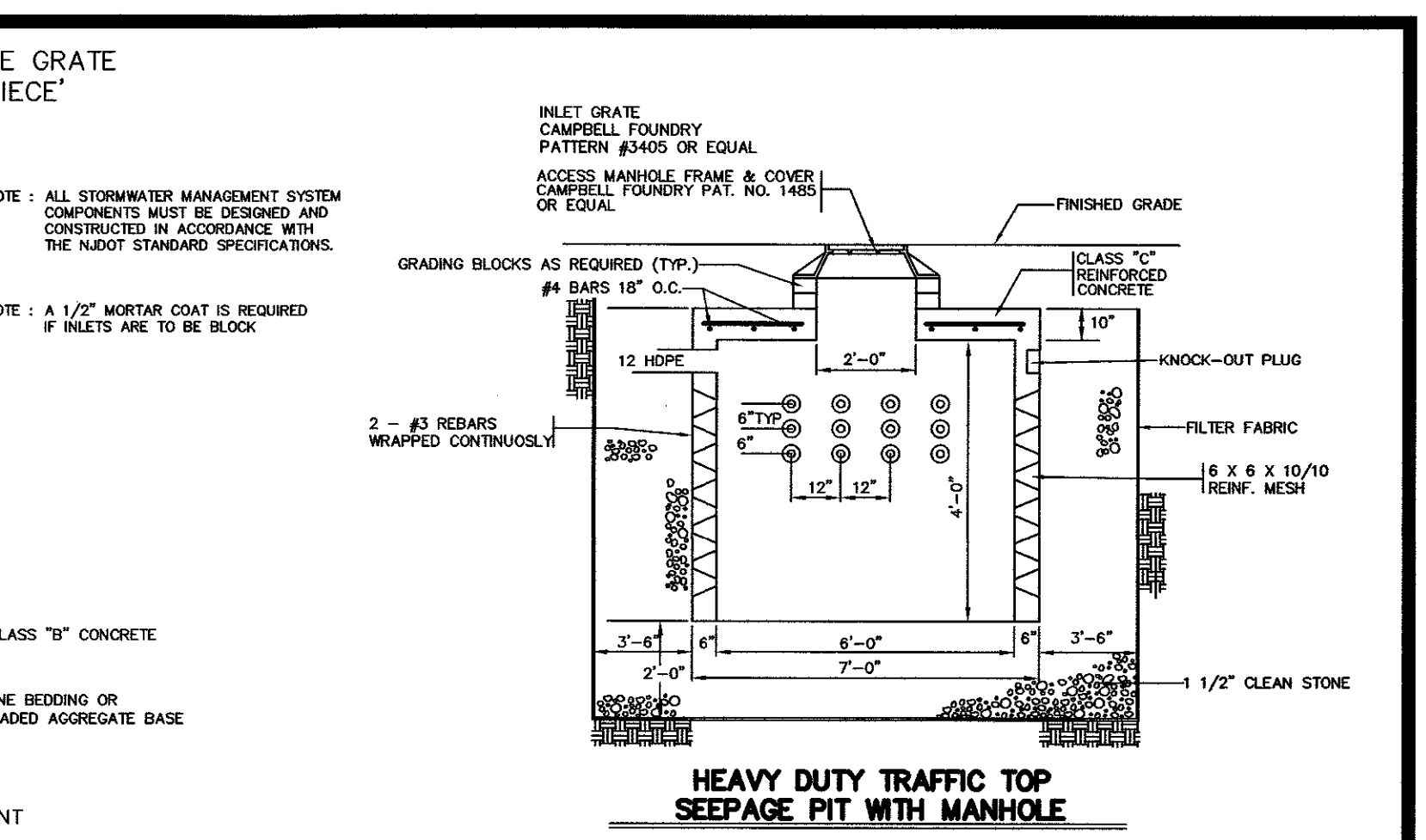
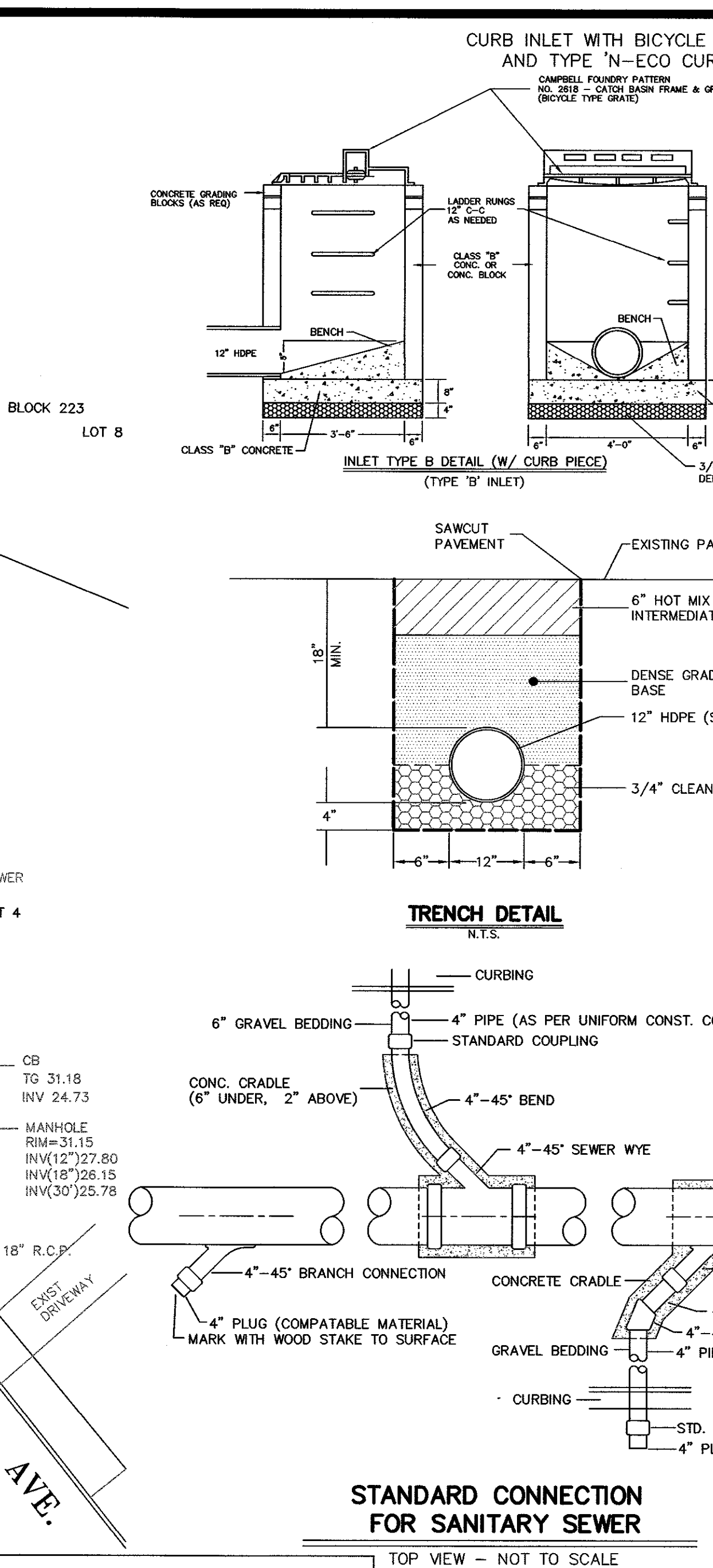
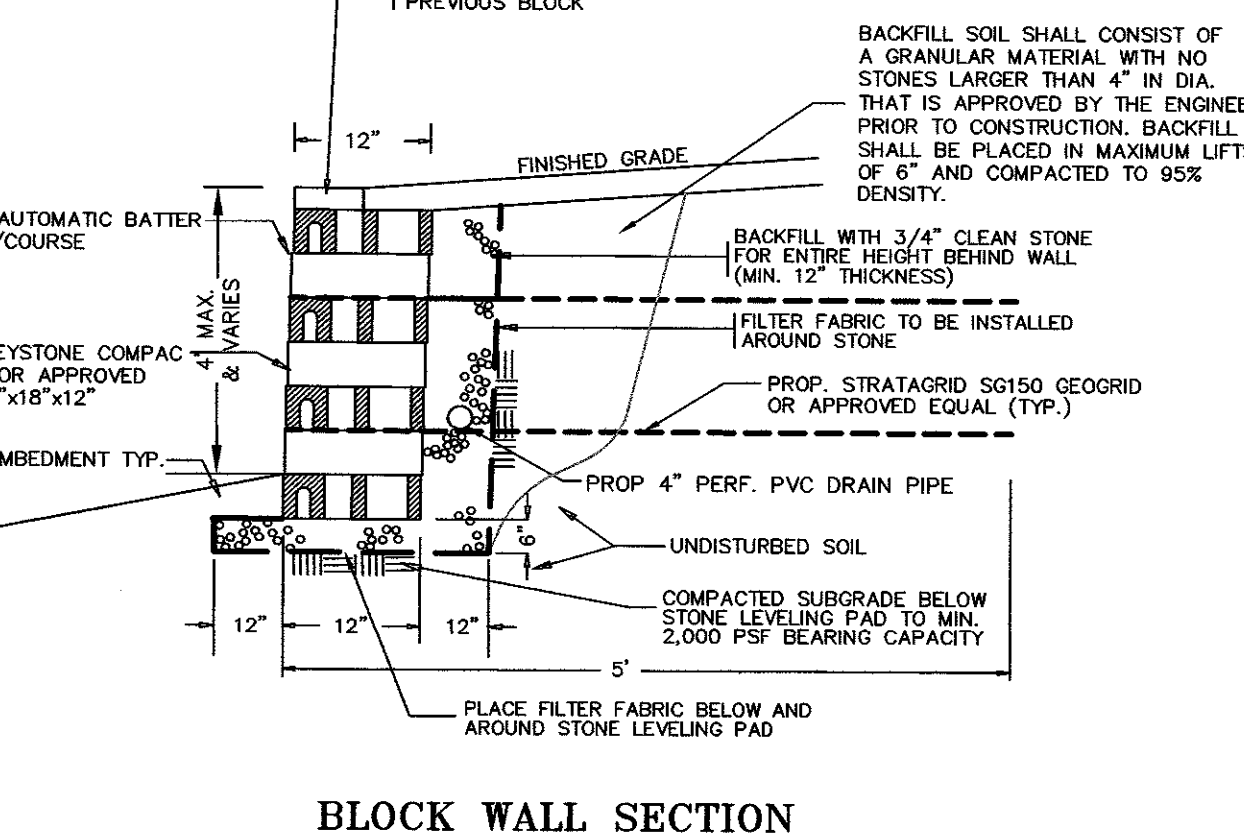
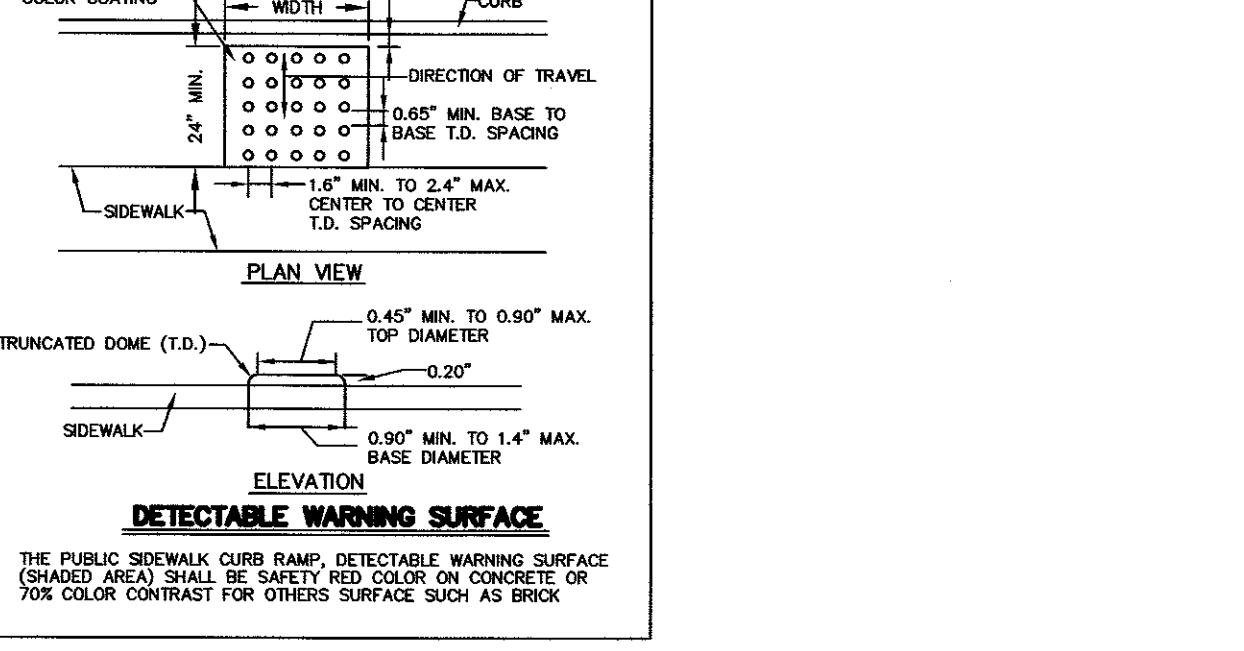
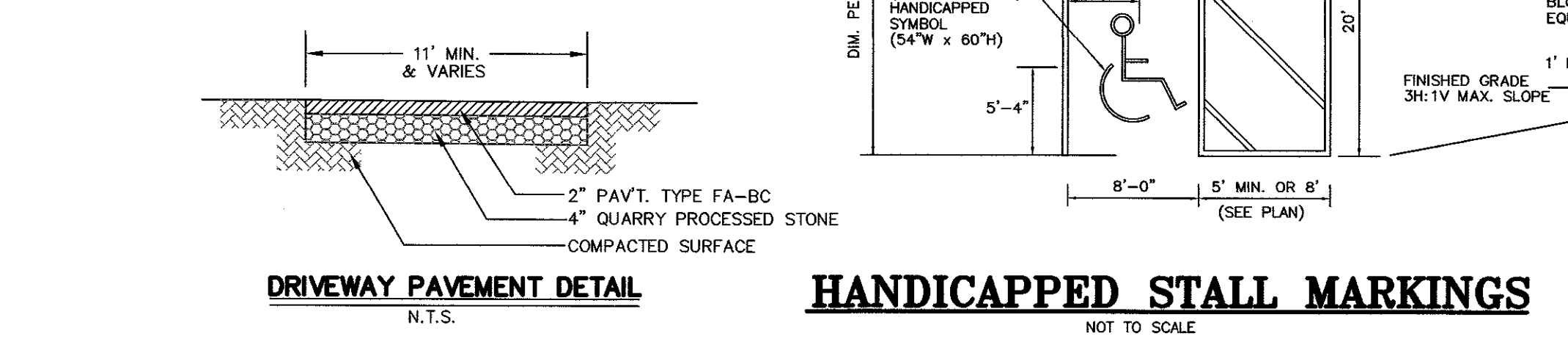




**BUILDING HEIGHT CALCULATION**

BUILDING HEIGHT:  
 AVERAGE GRADE 6' OFF BUILDING LINE:  
 29.8 + 32.4 + 32.3 + 31.4 + 31.5 + 31.8 + 32.2 +  
 32.5 + 32.0 = 285.9 / 9 = 31.9'

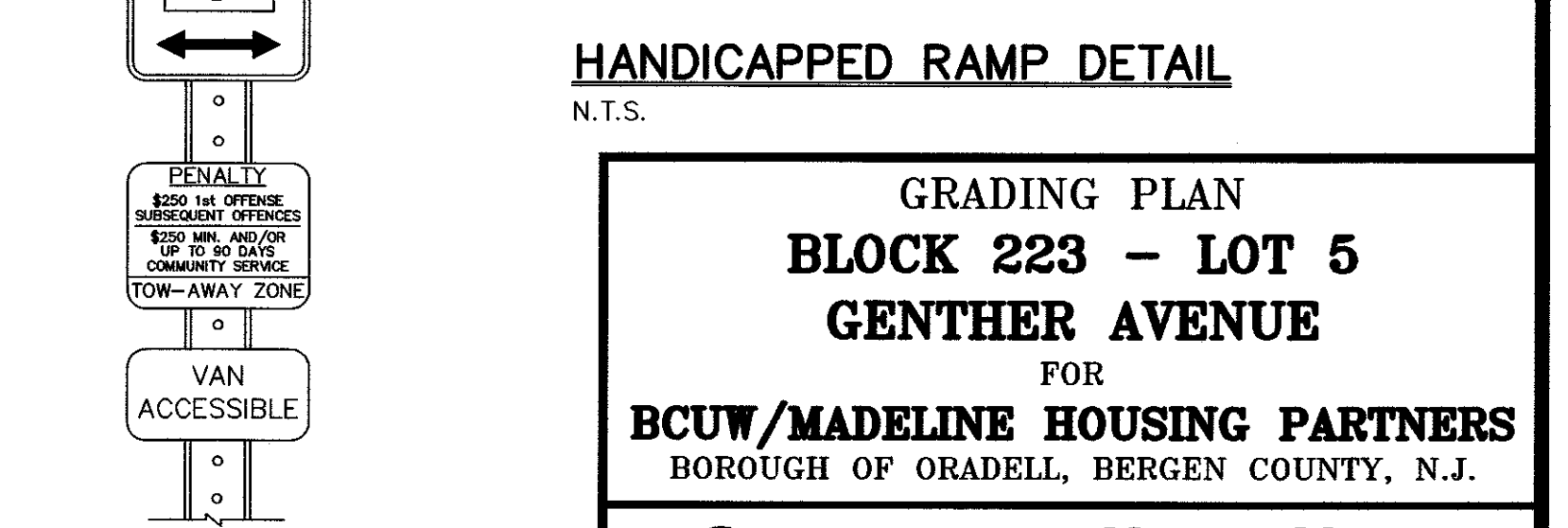
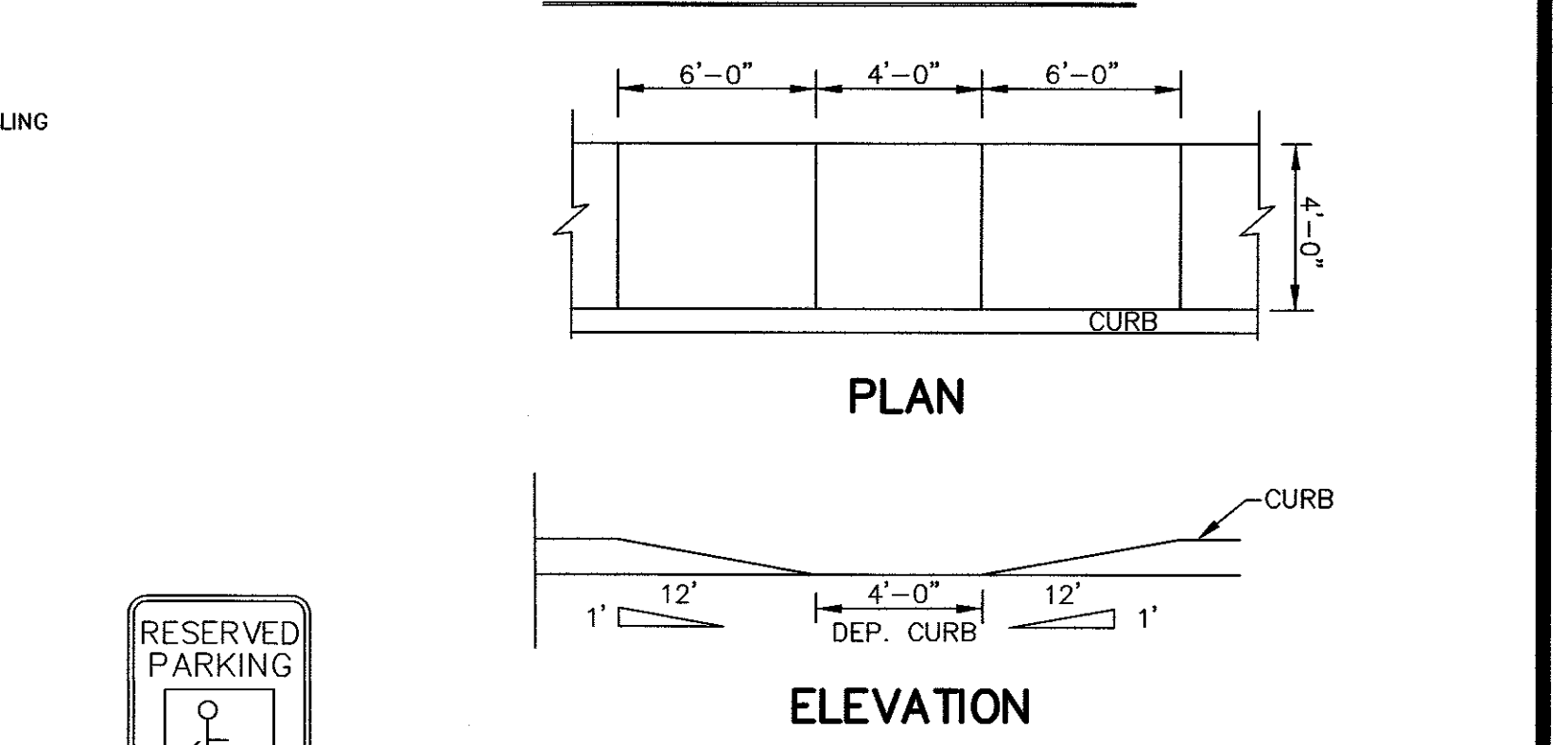
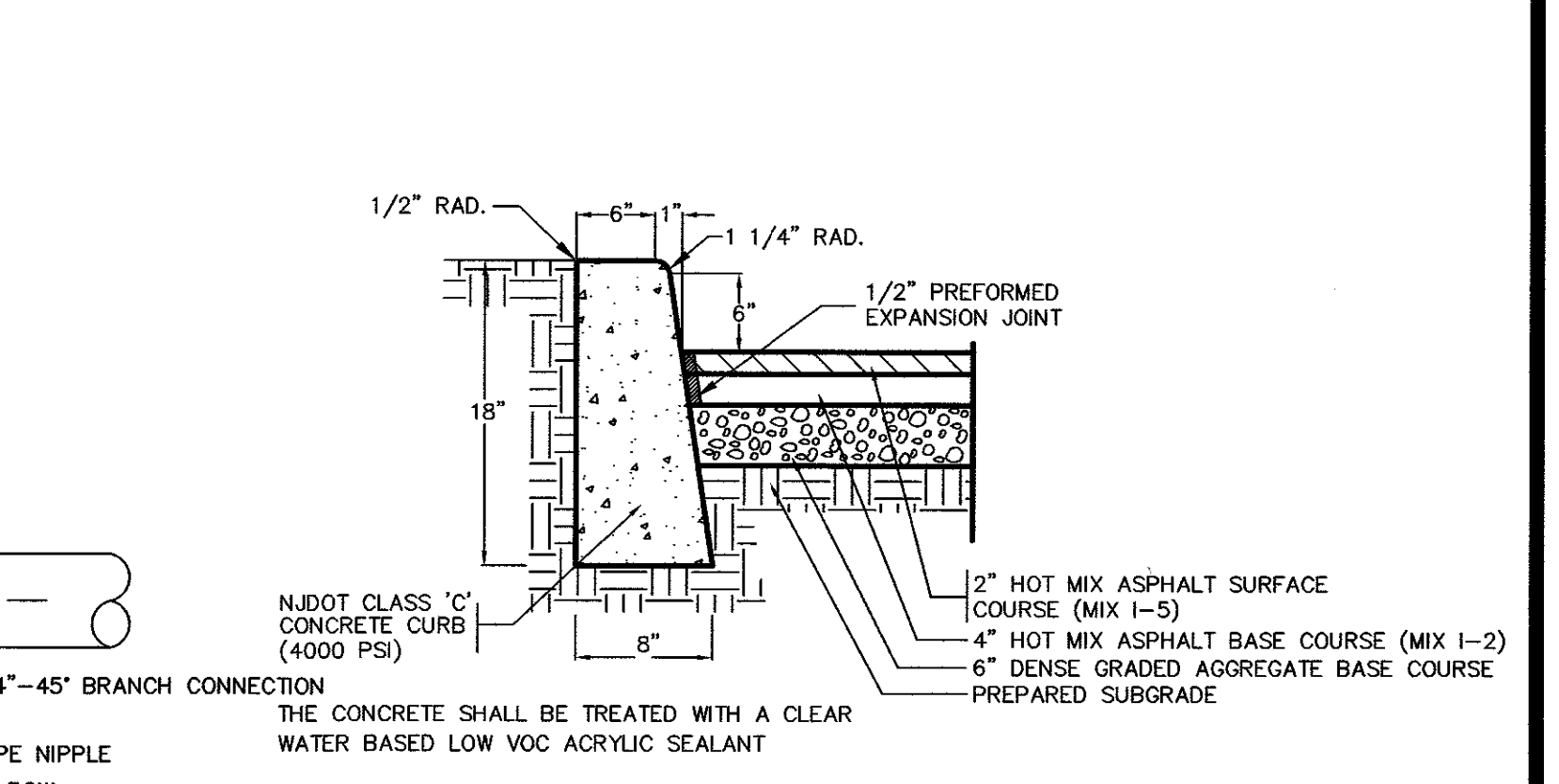
AVERAGE GRADE = 31.8'  
 MAX. RIDGE HEIGHT = 65.8'



**SOIL TESTS (3/26/2024)**

0 - 8" TOPSOIL  
 8" - 40" YELLOW BROWN SILT CLAY LOAM  
 40" - 180" YELLOW BROWN FINE SAND

NO WATER / NO MOTTILING ENCOUNTERED  
 ESTIMATED PERMEABILITY K-3 (2"-6"/HR)



REVISIONS			
DATE	BY	DESCRIPTION	
3/26/24	DH	1. ENGINEERING COMMENTS	

**GRADING PLAN**  
**BLOCK 223 - LOT 5**  
**GENTER AVENUE**  
 FOR  
**BCUW/MADELINE HOUSING PARTNERS**  
 BOROUGH OF ORADELL, BERGEN COUNTY, N.J.

**SCHWANEWEDE HALS & VINCE**  
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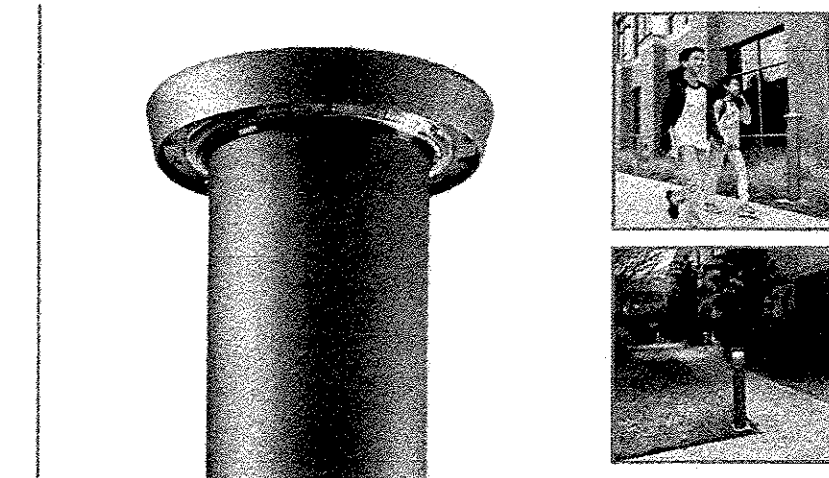
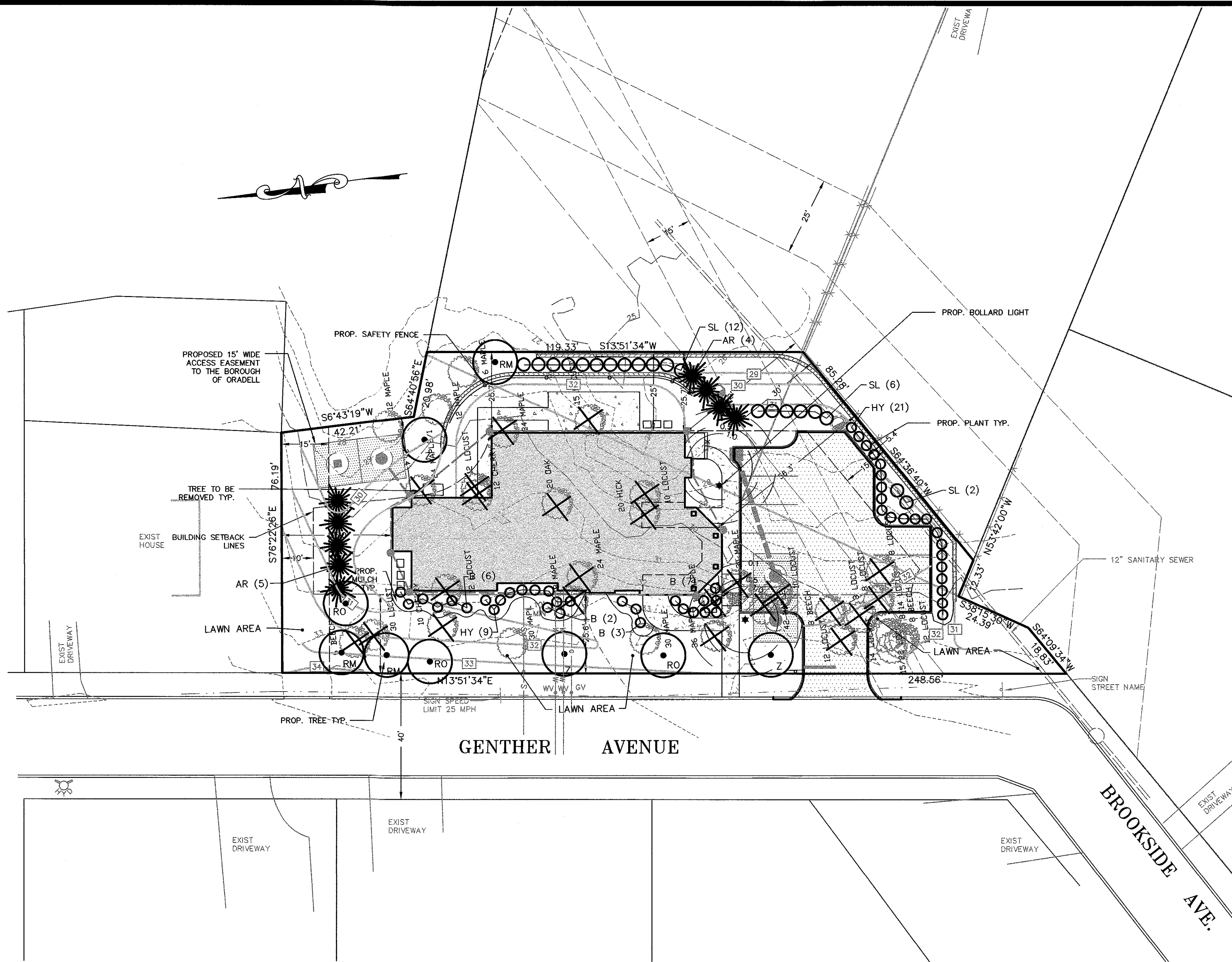
**DAVID A. HALS, PE, LS, PP**  
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 LAND SURVEYOR LIC. NO. 6842588

DATE: SEPT. 14, 2023  
 JOB NO: 7892-1620  
 SHEET NO: 2 OF 6

SCALE  
 1" = 20'  
 0 20 40  
 GRAPHIC SCALE



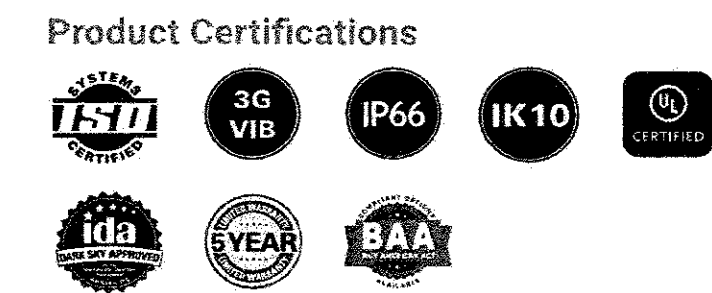


## McGraw-Edison

### BRT6 Bollard

Round LED Pedestrian Luminaire

- Interactive Menu**
- Ordering Information page 2
  - Product Specifications page 2
  - Optical Distributions page 2
  - Energy and Performance Data page 3

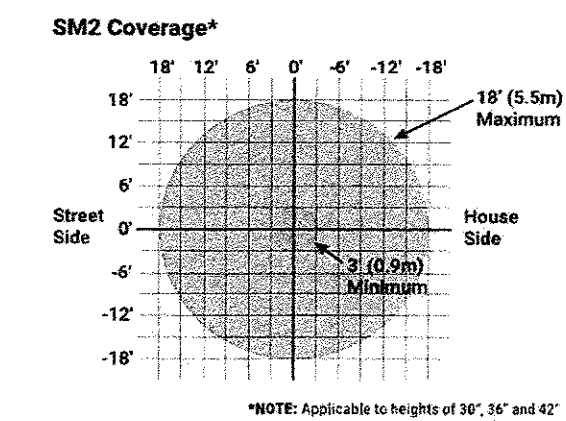


COOPER LIGHTING

Lumen Maintenance (TM-21)					
Ambient Temperature	25,000 hours*	50,000 hours*	60,000 hours*	100,000 hours**	Theoretical L70 hours**
25°C	95.9%	92.9%	91.7%	87.1%	271,000
40°C	95.7%	92.5%	91.3%	86.5%	256,000
50°C	95.3%	91.9%	90.6%	85.7%	242,000

\*Supported by IES TM-21 standards  
\*\*Theoretical values represent estimates commonly used; however, refer to the IES position on LED Product Lifetime Prediction, IES PS-18-18, explaining proper use of IES TM-21 and LM-80

[View BRT6 IES Files](#)



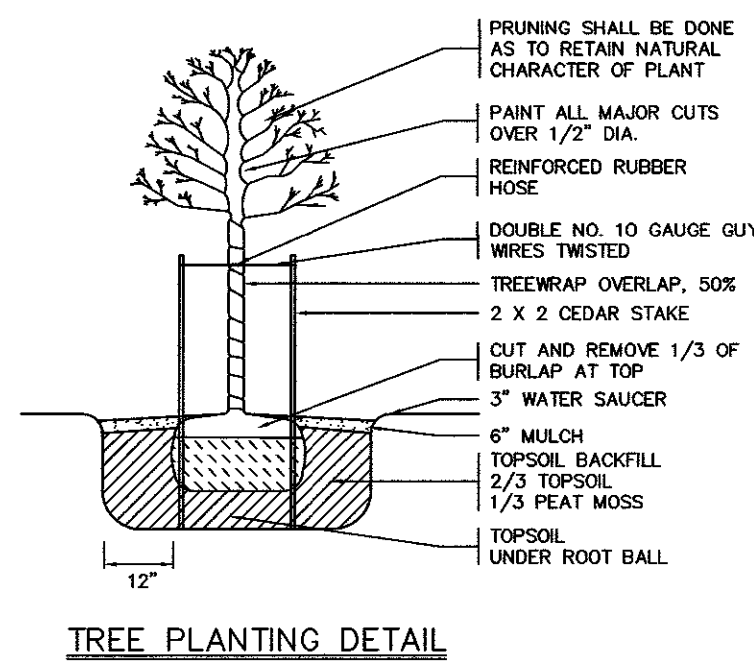
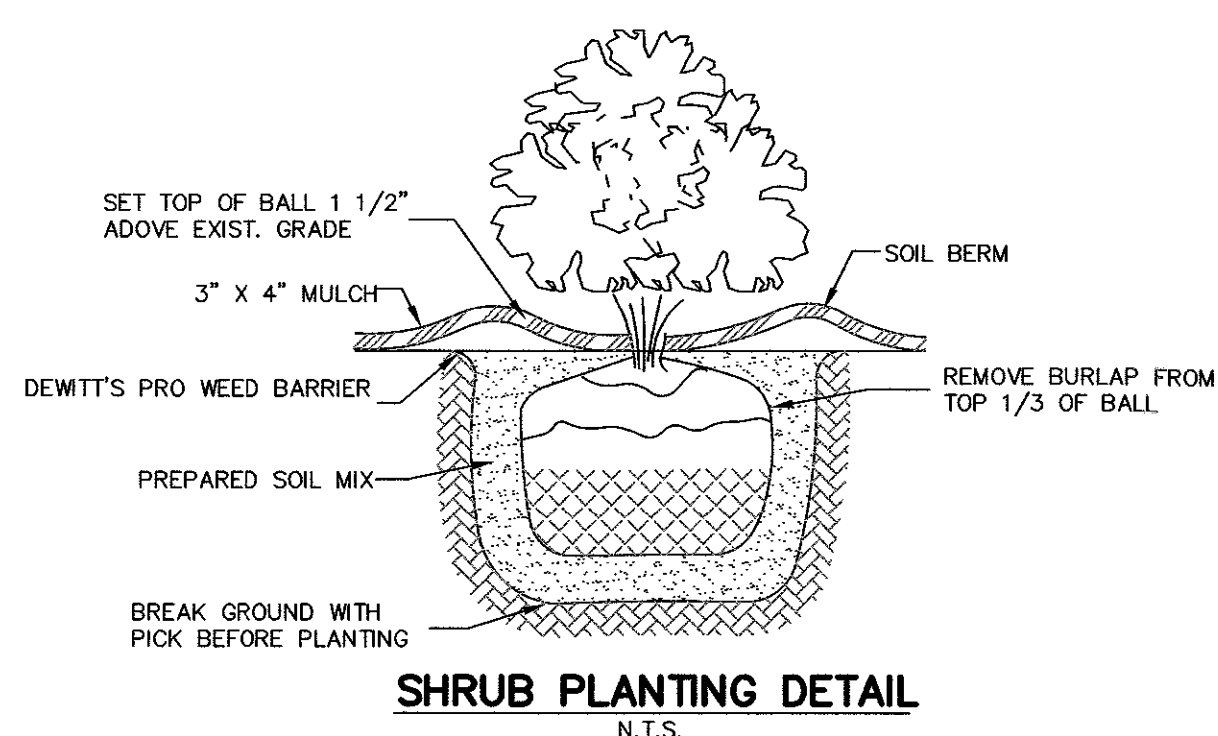
### Product Specifications

- Construction**
- Extruded aluminum housing with cast base and top
  - Patent-pending base plate design offers superior rigidity
  - 3G vibration rated
  - IK10 impact rating for housing and optic assembly
- Optics**
- High-efficiency injection-molded AccuLED optics technology
  - 4 optical distributions; 2 symmetric and 2 asymmetric
  - IDA Certified (3000K CCT and warmer only)

- Electrical**
- Standard with 0-10V dimming
  - Suitable for operation in -40°C to 40°C ambient environments. Optional 50°C high ambient (HA) configuration
  - 10KV surge module standard
- Finish**
- Super durable TGIC polyester powder coat paint, 2.5 mil nominal thickness
  - RAL and custom color matches available
  - Coastal Construction (CC) option available

- Typical Applications**
- Outdoor, Walkway, Perimeter, Landscapes, Hardscapes
- Warranty**
- Five year warranty

NOTE: SHRUBS MAY BE PLANTED IN TRENCHES INSTEAD OF PITS.



PLANTING SCHEDULE				
SYMBOL	COMMON NAME	LATIN NAME	QUANTITY	HEIGHT
Z	ZELKOVA	ZELKOVA SERRATA	3	3'-3 1/2'; 12'-24'
RO	RED OAK	QUERCUS RUBRA	3	3-3 1/2'; 12'-14'
RM	RED MAPLE	ACER RUBRUM	3	3-3 1/2'; 12'-14'
HY	HICK YEW	TAXUS MEDIA	30	2-2 1/2'
SL	SCHIP LAUREL	PRUNUS LAUROCERSASUS	20	36" HIGH
B	JAPANESE BOXWOOD	BUHUS MICROPHYLLA	18	15" - 18"
AR	GREEN GIANT	ARBORVITAE	9	6' - 8'

REPLACEMENT TREES			
SIZE	NUMBER OF TREES	TREES TO BE REMOVED	REPLACEMENT TREES REQUIRED
4" - 8"	6	0	0
8" - 17"	16	13	13
17" - 31"	10	8	16
> 31"	2	2	6
TOTAL	34	23	35

TOTAL NUMBER OF EXISTING TREES = 34  
TREES TO BE REMOVED = 23  
REQUIRED TREES TO BE REPLACED = 35  
PROPOSED TREE TO BE PLANTED:  
PROP. DECIDUOUS TREES = 9  
PROP. EVERGREEN TREES = 9  
TREE TO BE PLANTED = 18

LIGHTING AND LANDSCAPING PLAN  
**BLOCK 223 - LOT 5**  
**GENTHER AVENUE**  
FOR  
**BCUW/MADELINE HOUSING PARTNERS**  
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DATE: SEPT. 14, 2023  
JOB NO: 7892-1620  
SHEET NO: 3 OF 6

DATE	BY	DESCRIPTION
3/28/24	DH	1. ENGINEERING COMMENTS
REVISIONS		



BERGEN COUNTY SOIL CONSERVATION DISTRICT  
SOIL EROSION AND SEDIMENT CONTROL NOTES

- ALL SOIL EROSION AND SEDIMENT CONTROL PRACTICES WILL BE INSTALLED IN ACCORDANCE WITH THE NJ STANDARDS FOR SOIL EROSION AND SEDIMENT CONTROL IN NEW JERSEY (NJ STANDARDS) AND WILL BE INSTALLED IN PROPER SEQUENCE AND MAINTAINED UNTIL PERMANENT STABILIZATION IS ESTABLISHED.
- ANY DISTURBED AREA THAT WILL BE LEFT EXPOSED FOR MORE THAN THIRTY (30) DAYS AND NOT SUBJECT TO CONSTRUCTION TRAFFIC SHALL IMMEDIATELY RECEIVE A TEMPORARY SEEDING AND MULCHING. IF THE SEASON PROHIBITS TEMPORARY SEEDING, THE DISTURBED AREA WILL BE MULCHED WITH UNROTTED STRAW AT A RATE OF 2 TONS PER ACRE ANCHORED BY APPROVED METHODS (i.e. PEG AND TWINE, MULCH NETTING, OR LIQUID MULCH BINDER).
- IMMEDIATELY FOLLOWING INITIAL DISTURBANCE OR ROUGH GRADING, ALL CRITICAL AREAS SUBJECT TO EROSION WILL RECEIVE A TEMPORARY SEEDING IN COMBINATION WITH STRAW MULCH OR A SUITABLE EQUIVALENT, AT A RATE OF 2 TONS PER ACRE, ACCORDING TO THE NJ STANDARDS.
- STABILIZATION SPECIFICATIONS:
  - TEMPORARY SEEDING AND MULCHING:
    - GROUND LIME/STONE - APPLIED UNIFORMLY ACCORDING TO SOIL TEST RECOMMENDATIONS. FERTILIZER - APPLY 11 LBS./1000 S.F. OF 10-10-10 OR EQUIVALENT WITH 50% WATER INSOLUBLE NITROGEN (UNLESS A SOIL TEST INDICATES OTHERWISE) WORKED INTO THE SOIL. A MINIMUM OF 4" DEPTH.
    - SEED - PERENNIAL RYEGRASS 100 LBS./ACRE (2.3 LBS./1,000 SF) OR OTHER APPROVED SEED; PLANT BETWEEN MARCH 1 AND MAY 15 OR BETWEEN AUGUST 15 AND OCTOBER 1.
    - MULCH - UNROTTED STRAW OR HAY AT A RATE OF 70 TO 90 LBS./1,000 SF APPLIED TO ACHIEVE 95% SOIL SURFACE COVERAGE. MULCH SHALL BE ANCHORED BY APPROVED METHODS (i.e. PEG AND TWINE, MULCH NETTING, OR LIQUID MULCH BINDER).
  - PERMANENT SEEDING AND MULCHING:
    - TOPSOIL - A UNIFORM APPLICATION TO AN AVERAGE DEPTH OF 5", MINIMUM OF 4" FIRMED IN PLACE.
    - GROUND LIME/STONE - APPLIED UNIFORMLY ACCORDING TO SOIL TEST RECOMMENDATIONS. FERTILIZER - APPLY 11 LBS./1000 S.F. OF 10-10-10 OR EQUIVALENT WITH 50% WATER INSOLUBLE NITROGEN (UNLESS OTHERWISE INDICATED) WORKED INTO THE SOIL A MINIMUM OF 4" DEPTH.
    - SEED - TURF TYPE TALL FESCUE (BLENDED OF 3 CULTIVARS) 350 LBS./ACRE (8 LBS./1,000 SF) OR OTHER APPROVED SEED; PLANT BETWEEN MARCH 1 AND OCTOBER 1. (SUMMER SEEDING REQUIRES IRRIGATION)
    - MULCH - UNROTTED STRAW OR HAY AT A RATE OF 70 TO 90 LBS./1,000 SF APPLIED TO ACHIEVE 95% SOIL SURFACE COVERAGE. MULCH SHALL BE ANCHORED BY APPROVED METHODS (i.e. PEG AND TWINE, MULCH NETTING, OR LIQUID MULCH BINDER).
- THE SITE SHALL AT ALL TIMES BE GRADED AND MAINTAINED SUCH THAT ALL STORMWATER RUN-OFF IS DIVERTED TO SOIL EROSION AND SEDIMENT CONTROL FACILITIES.
- SOIL EROSION AND SEDIMENT CONTROL MEASURES WILL BE INSPECTED AND MAINTAINED ON A REGULAR BASIS, INCLUDING AFTER EVERY STORM EVENT.
- STOCKPILES ARE NOT TO BE LOCATED WITHIN 50' OF A FLOODPLAIN, SLOPE, ROADWAY OR DRAINAGE FACILITY. THE BASE OF ALL STOCKPILES SHALL BE CONTAINED BY A HAYBALE SEDIMENT BARRIER OR SILT FENCE.
- A CRUSHED STONE, VEHICLE WHEEL-CLEANING BLANKET WILL BE INSTALLED WHEREVER A CONSTRUCTION ACCESS ROAD INTERSECTS ANY PAVED ROADWAY. SAID BLANKET WILL BE COMPOSED OF 1"-2 1/2" CRUSHED STONE, 6" THICK, WILL BE AT LEAST 30' X 100' AND SHOULD BE UNDERLAIN WITH A SUITABLE SYNTHETIC SEDIMENT FILTER FABRIC AND MAINTAINED.
- MAXIMUM SLOPE SIDES OF ALL EXPOSED SURFACES SHALL NOT EXCEED 3:1 UNLESS OTHERWISE APPROVED BY THE DISTRICT.
- DRIVEWAYS MUST BE STABILIZED WITH 1"-2 1/2" CRUSHED STONE OR SUBBASE PRIOR TO INDIVIDUAL LOT CONSTRUCTION.
- ALL SOIL WASHED, DROPPED, SPILLED OR TRACKED OUTSIDE THE LIMIT OF DISTURBANCE OR ONTO PUBLIC RIGHT-OF-WAYS, WILL BE REMOVED IMMEDIATELY. PAVED ROADWAYS MUST BE KEPT CLEAN AT ALL TIMES.
- CATCH BASIN INLETS WILL BE PROTECTED WITH AN INLET FILTER DESIGNED IN ACCORDANCE WITH SECTION 28-1 OF THE NJ STANDARDS.
- STORM DRAINAGE OUTLETS WILL BE STABILIZED, AS REQUIRED, BEFORE THE DISCHARGE POINTS BECOME OPERATIONAL.
- DEWATERING OPERATIONS MUST DISCHARGE DIRECTLY INTO A SEDIMENT CONTROL BAG OR OTHER APPROVED FILTER IN ACCORDANCE WITH SECTION 14-1 OF THE NJ STANDARDS.
- DUST SHALL BE CONTROLLED VIA THE APPLICATION OF WATER, CALCIUM CHLORIDE OR OTHER APPROVED METHOD IN ACCORDANCE WITH SECTION 16-1 OF THE NJ STANDARDS.
- TREES TO REMAIN AFTER CONSTRUCTION ARE TO BE PROTECTED WITH A SUITABLE FENCE INSTALLED AT THE DRIP LINE OR BEYOND IN ACCORDANCE WITH SECTION 9-1 OF THE NJ STANDARDS.
- THE PROJECT OWNER SHALL BE RESPONSIBLE FOR ANY EROSION OR SEDIMENTATION THAT MAY OCCUR BELOW STORMWATER OUTFALLS OR OFF-SITE AS A RESULT OF CONSTRUCTION OF THE PROJECT.
- ANY REVISION TO THE CERTIFIED SOIL EROSION AND SEDIMENT CONTROL PLAN MUST BE SUBMITTED TO THE DISTRICT FOR REVIEW AND APPROVAL PRIOR TO IMPLEMENTATION IN THE FIELD.
- A COPY OF THE CERTIFIED SOIL EROSION AND SEDIMENT CONTROL PLAN MUST BE AVAILABLE AT THE PROJECT SITE THROUGHOUT CONSTRUCTION.
- THE BERGEN COUNTY SOIL CONSERVATION DISTRICT MUST BE NOTIFIED, IN WRITING, AT LEAST 48 HOURS PRIOR TO ANY LAND DISTURBANCE. BERGEN COUNTY SCD, 700 KINDERKAMACK ROAD, SUITE 106, ORADELL, NJ 07649 TEL NO. 201-261-4407; FAX 201-261-7573.
- THE BERGEN COUNTY SOIL CONSERVATION DISTRICT MAY REQUEST ADDITIONAL MEASURES TO MINIMIZE ON OR OFF-SITE EROSION PROBLEMS DURING CONSTRUCTION.
- THE OWNER MUST OBTAIN A DISTRICT ISSUE REPORT OF COMPLIANCE PRIOR TO THE ISSUANCE OF ANY CERTIFICATE OF OCCUPANCY. THE DISTRICT REQUIRES AT LEAST ONE WEEK'S NOTICE TO FACILITATE THE SCHEDULING OF ALL REPORT OF COMPLIANCE INSPECTIONS. ALL SITE WORK MUST BE COMPLETED, INCLUDING TEMPORARY/PERMANENT STABILIZATION OF ALL EXPOSED AREAS, PRIOR TO THE ISSUANCE OF A REPORT OF COMPLIANCE BY THE DISTRICT.

SEQUENCE OF CONSTRUCTION

- INSTALL FILTER BARRIERS AND STABILIZED CONSTRUCTION ACCESS.
- CLEAR, STRIP AND STOCKPILE TOPSOIL. (2 DAYS)
- EXCAVATE AND INSTALL FOUNDATION. (2 WEEKS)
- CONNECT UTILITIES, COMPLETE DWELLING. (4 MONTHS)
- ROUGH GRADE INSTALL DRAINAGE, CURBS, PAVEMENT
- TOPSOIL & SEED - PERMANENTLY STABILIZE ALL DISTURBED AREAS. (5 DAYS)
- FOLLOWING THE COMPLETION OF BUILDING - INSTALL FINAL PAVEMENT, PERMANENTLY STABILIZE ALL DISTURBED AREAS ON SITE (2 DAYS)

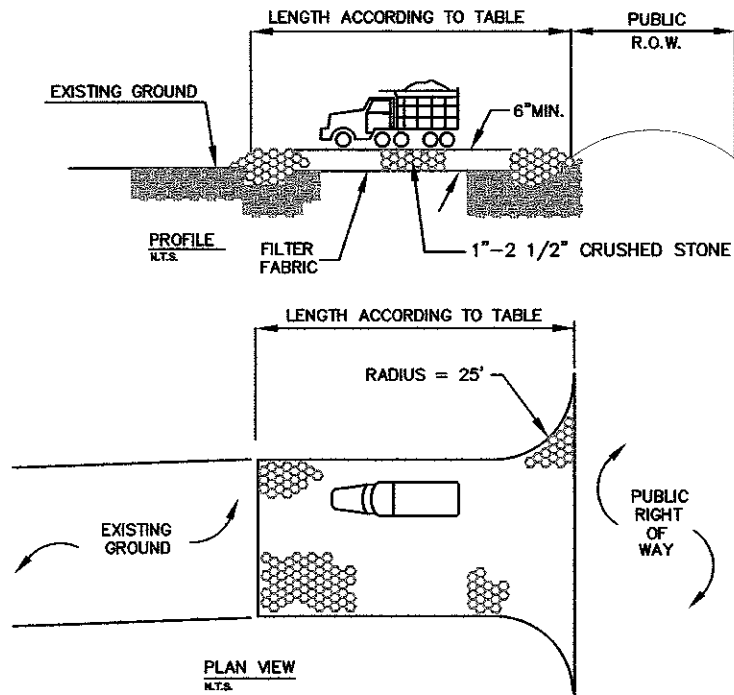
SOIL EROSION AND SEDIMENT CONTROL

PLAN AND DETAILS  
**BLOCK 223 - LOT 5**  
**GENTHER AVENUE**  
FOR  
**BCUW/MADELINE HOUSING PARTNERS**  
BOROUGH OF ORADELL, BERGEN CO., N.J.

**SCHWANEWEDE HALS & VINCE**  
ENGINEERING • LAND SURVEYING • PLANNING  
111 LITTLETON ROAD - SUITE 200 - PARSIPPANY, N.J. 07054  
(201) 337-0053

**DAVID A. HALS, PE, LS, PP** **JOSEPH F. VINCE, PE, LS, PP**  
N.J. PROFESSIONAL ENGINEER AND LAND SURVEYOR LIC. NO. 29994 N.J. PROFESSIONAL ENGINEER AND LAND SURVEYOR LIC. NO. GB42588

SCALE 1"=20'  
DATE: SEPT. 14, 2023  
JOB NO: 7892-1620  
SHEET NO: 4 OF 6



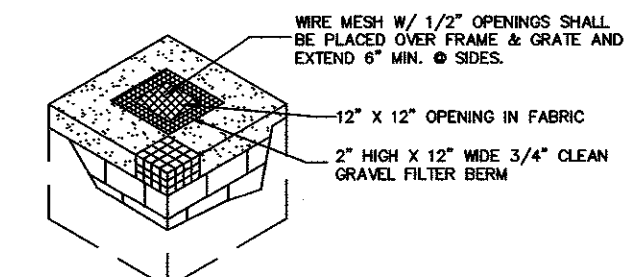
PERCENT SLOPE OF ROADWAY	LENGTH OF STONE REQUIRED
0 TO 2%	50 FT
2 TO 5%	100 FT
>5%	200 FT

NOTES:  
- PROVIDE APPROPRIATE TRANSITION BETWEEN STABILIZED CONSTRUCTION ENTRANCE AND PUBLIC R.O.W.  
- INDIVIDUAL LOT ACCESS POINTS MAY REQUIRE STABILIZATION  
- THICKNESS SHOWN IS FOR STONE CONSTRUCTION ENTRANCE ONLY (TYP)

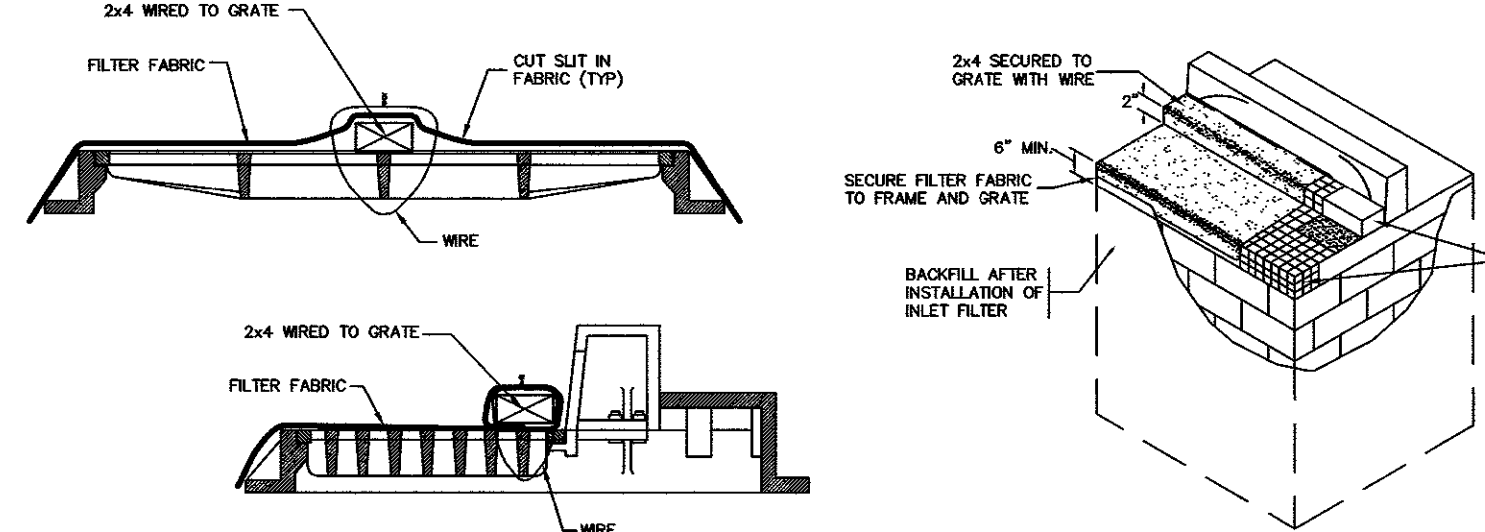
STABILIZED CONSTRUCTION ENTRANCE

INLET FILTER PROTECTION TYP.

PROP. STABILIZED CONSTRUCTION ACCESS (20' x 50' FROM CURB EDGE)



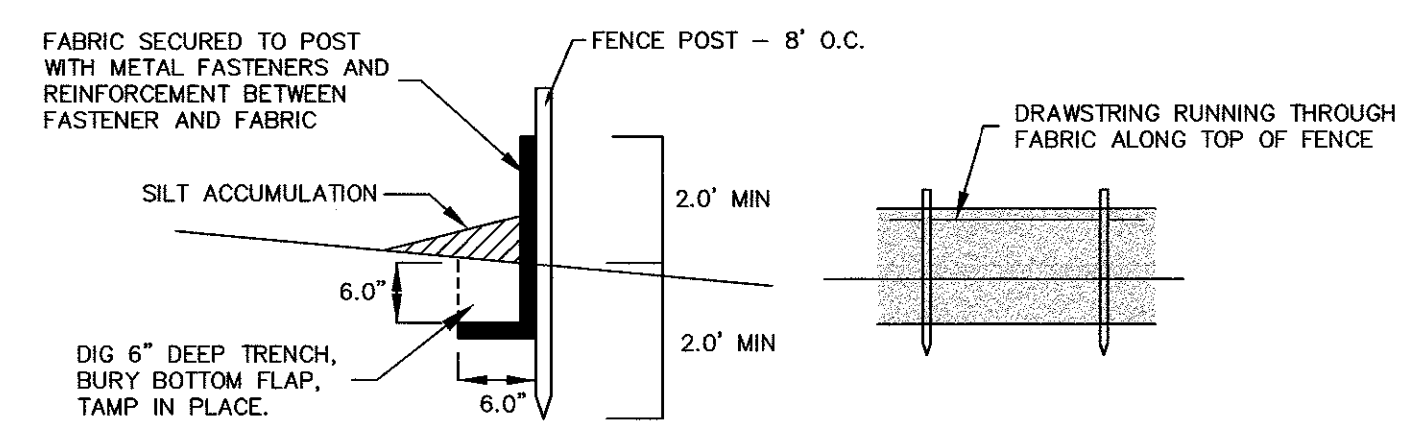
TYPE 'A' & 'E' INLET FILTER DETAIL



INLET FILTER DETAIL

- CONTRACTOR IS TO CLEAN INLET FILTER AFTER EVERY STORM.
- CONTRACTOR TO REMOVE FABRIC JUST PRIOR TO PAVING.
- IF BOTTOM OF ROADWAY IS BELOW TOP OF INLET, GRATE, TO ALLOW PASSAGE OF WATER.
- THE PROTECTION DEVICE WILL BE DESIGNED TO CAPTURE OR FILTER RUNOFF FROM THE 1 YEAR, 24 HOUR STORM EVENT AND SHALL SAFELY CONVEY HIGHER FLOWS DIRECTLY INTO THE STORM SEWER SYSTEM.

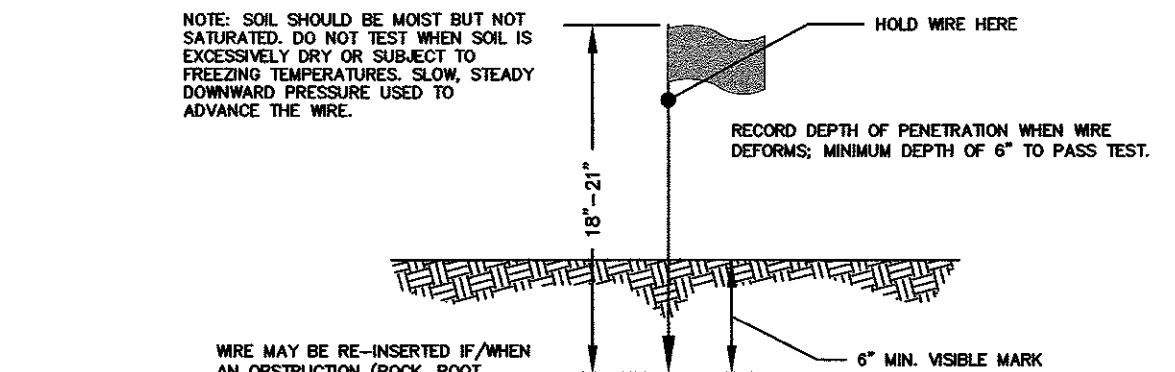
INLET FILTER DETAIL



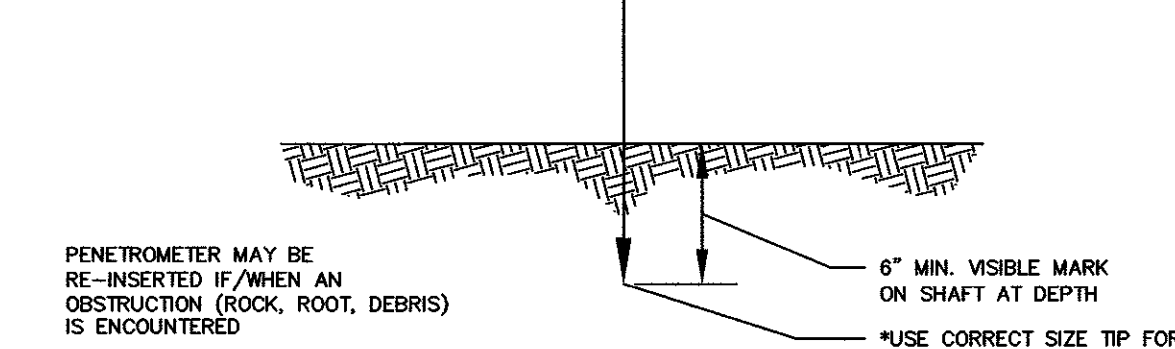
SEDIMENT FENCE

PROBING WIRE TEST: 15.5 GA STEEL WIRE (SURVEY FLAG)

N.T.S.



NOTE: SOIL SHOULD BE MOIST BUT NOT SATURATED. DO NOT TEST WHEN SOIL IS EXCESSIVELY DRY OR SUBJECT TO FREEZING TEMPERATURES. SLOW, STEADY DOWNWARD PRESSURE USED TO ADVANCE THE PROBE. PROBE MUST PENETRATE AT LEAST 6" WITH LESS THAN 300 PSI READING ON THE GAUGE.



HANDHELD SOIL PENETROMETER TEST

N.T.S.

LIMIT OF DISTURBANCE AREA = 18,400 S.F.

INLET PROTECT FILTER

TOPSOIL STOCKPILE W/ SEDIMENT FENCE AROUND PERIMETER

SOIL DE-COMPACTION AND TESTING REQUIREMENTS

SOIL COMPACTION TESTING REQUIREMENTS

- SUBGRADE SOILS PRIOR TO THE APPLICATION OF TOPSOIL (SEE PERMANENT SEEDING AND STABILIZATION NOTES FOR TOPSOIL REQUIREMENTS) SHALL BE FREE OF EXCESSIVE COMPACTION TO A DEPTH OF 6.0 INCHES TO ENHANCE THE ESTABLISHMENT OF PERMANENT VEGETATIVE COVER.
- AREAS OF THE SITE WHICH ARE SUBJECT TO COMPACTION TESTING AND/OR MITIGATION ARE GRAPHICALLY DENOTED ON THE CERTIFIED SOIL EROSION CONTROL PLAN.
- COMPACTION TESTING LOCATIONS ARE DENOTED ON THE PLAN. A COPY OF THE PLAN OR PORTION OF THE PLAN SHALL BE USED TO MARK LOCATIONS OF TESTS AND ATTACHED TO THE COMPACTION MITIGATION VERIFICATION FORM, AVAILABLE FROM THE LOCAL SOIL CONSERVATION DISTRICT. THIS FORM MUST BE FILLED OUT AND SUBMITTED PRIOR TO RECEIVING A CERTIFICATE OF COMPLIANCE FROM THE DISTRICT.
- IN THE EVENT THAT TESTING INDICATES COMPACTION IN EXCESS OF THE MAXIMUM THRESHOLDS INDICATED FOR THE SIMPLIFIED TESTING METHODS (SEE DETAILS BELOW), THE CONTRACTOR/OWNER SHALL HAVE THE OPTION TO PERFORM EITHER (1) COMPACTION MITIGATION OVER THE ENTIRE MITIGATION AREA DENOTED ON THE PLAN (EXCLUDING EXEMPT AREAS), OR (2) PERFORM ADDITIONAL, MORE DETAILED TESTING TO ESTABLISH THE LIMITS OF EXCESSIVE COMPACTION WHEREUPON ONLY THE EXCESSIVELY COMPACTED AREAS WOULD REQUIRE COMPACTION MITIGATION. ADDITIONAL DETAILED TESTING SHALL BE PERFORMED BY A TRAINED, LICENSED PROFESSIONAL.

COMPACTION TESTING METHODS

- PROBING WIRE TEST (SEE DETAIL)
- HAND-HELD PENETROMETER TEST (SEE DETAIL)
- TUBE BULK DENSITY TEST (LICENSED PROFESSIONAL ENGINEER REQUIRED)
- NUCLEAR DENSITY TEST (LICENSED PROFESSIONAL ENGINEER REQUIRED)

NOTE: ADDITIONAL TESTING METHODS WHICH CONFORM TO ASTM STANDARDS AND SPECIFICATIONS, AND WHICH PRODUCE A DRY WEIGHT, SOIL BULK DENSITY MEASUREMENT MAY BE ALLOWED SUBJECT TO DISTRICT APPROVAL.

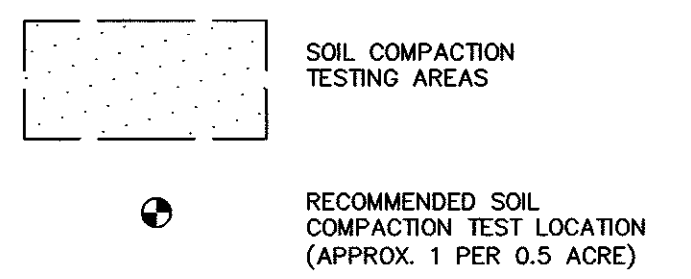
SOIL COMPACTION TESTING IS NOT REQUIRED IF WHEN SUBSOIL COMPACTION REMEDIATION (SCARIFICATION/TILLAGE (6" MINIMUM DEPTH) OR SIMILAR) IS PROPOSED AS PART OF THE SEQUENCE OF CONSTRUCTION.

PROCEDURES FOR SOIL COMPACTION MITIGATION

PROCEDURES SHALL BE USED TO MITIGATE EXCESSIVE SOIL COMPACTION PRIOR TO PLACEMENT OF TOPSOIL AND ESTABLISHMENT OF PERMANENT VEGETATIVE COVER.

RESTORATION OF COMPACTED SOILS SHALL BE THROUGH DEEP SCARIFICATION/TILLAGE (6" MINIMUM DEPTH) WHERE THERE IS NO DANGER TO UNDERGROUND UTILITIES (CABLES, IRRIGATION SYSTEMS, ETC.). IN THE ALTERNATIVE, ANOTHER METHOD AS SPECIFIED BY A NEW JERSEY LICENSED PROFESSIONAL ENGINEER MAYBE SUBSTITUTED SUBJECT TO DISTRICT APPROVAL.

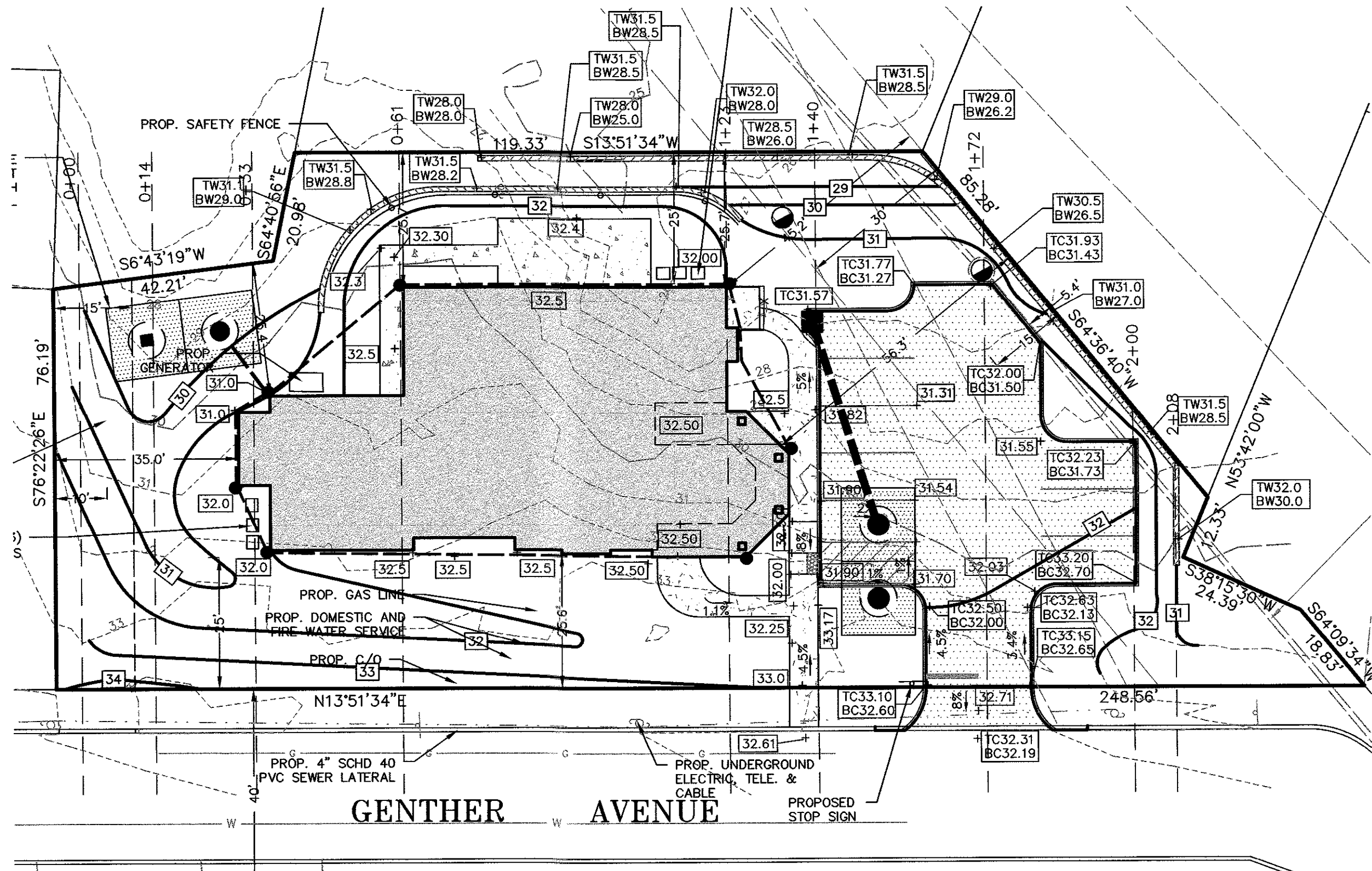
SOIL COMPACTION LEGEND



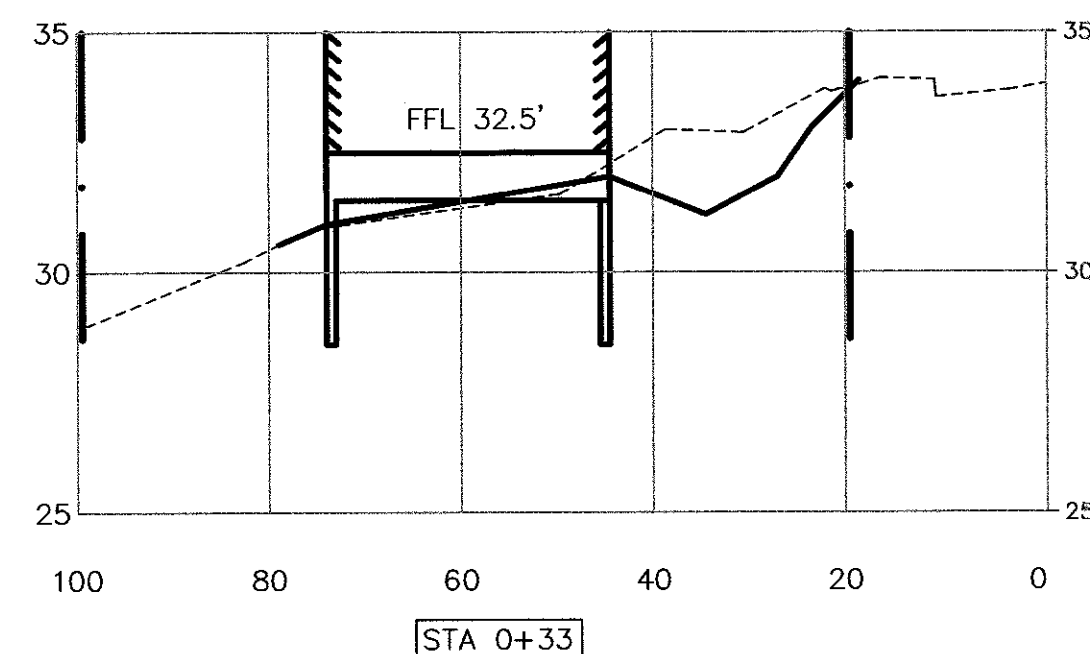
SOIL COMPACTION TESTING AREAS

RECOMMENDED SOIL COMPACTION TEST LOCATION (APPROX. 1 PER 0.5 ACRE)

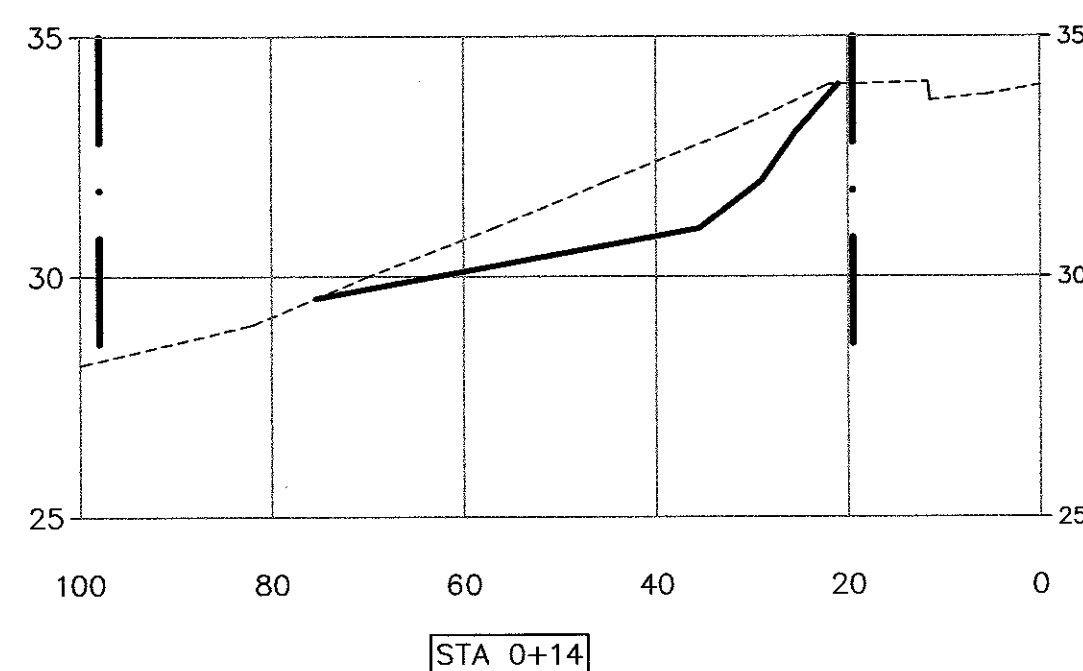




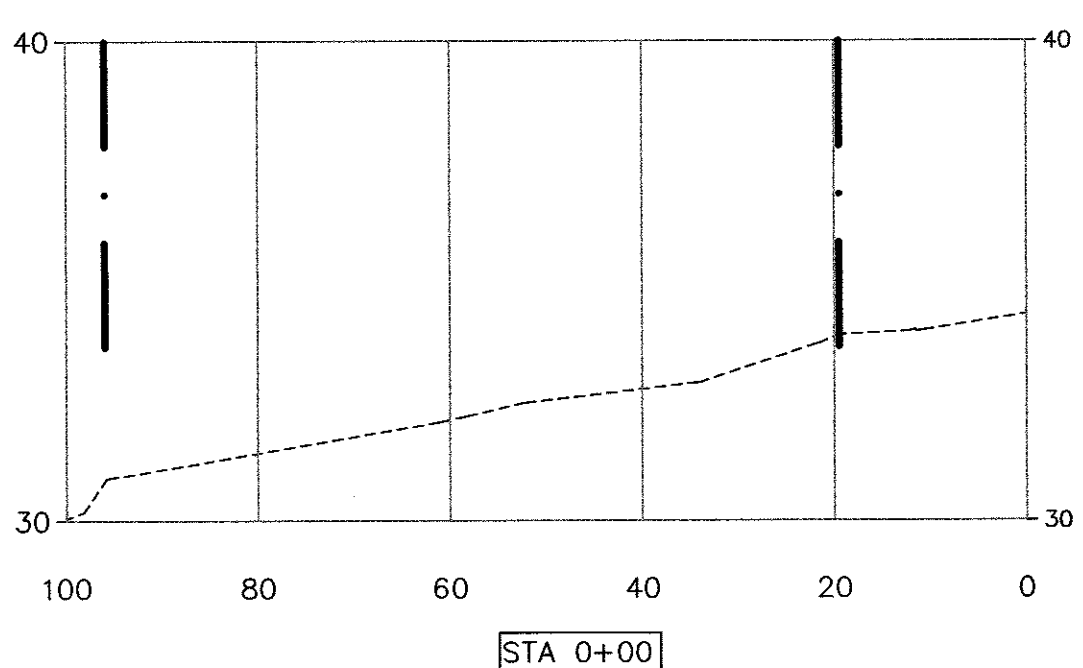
PLAN VIEW  
SCALE  
1"=20'



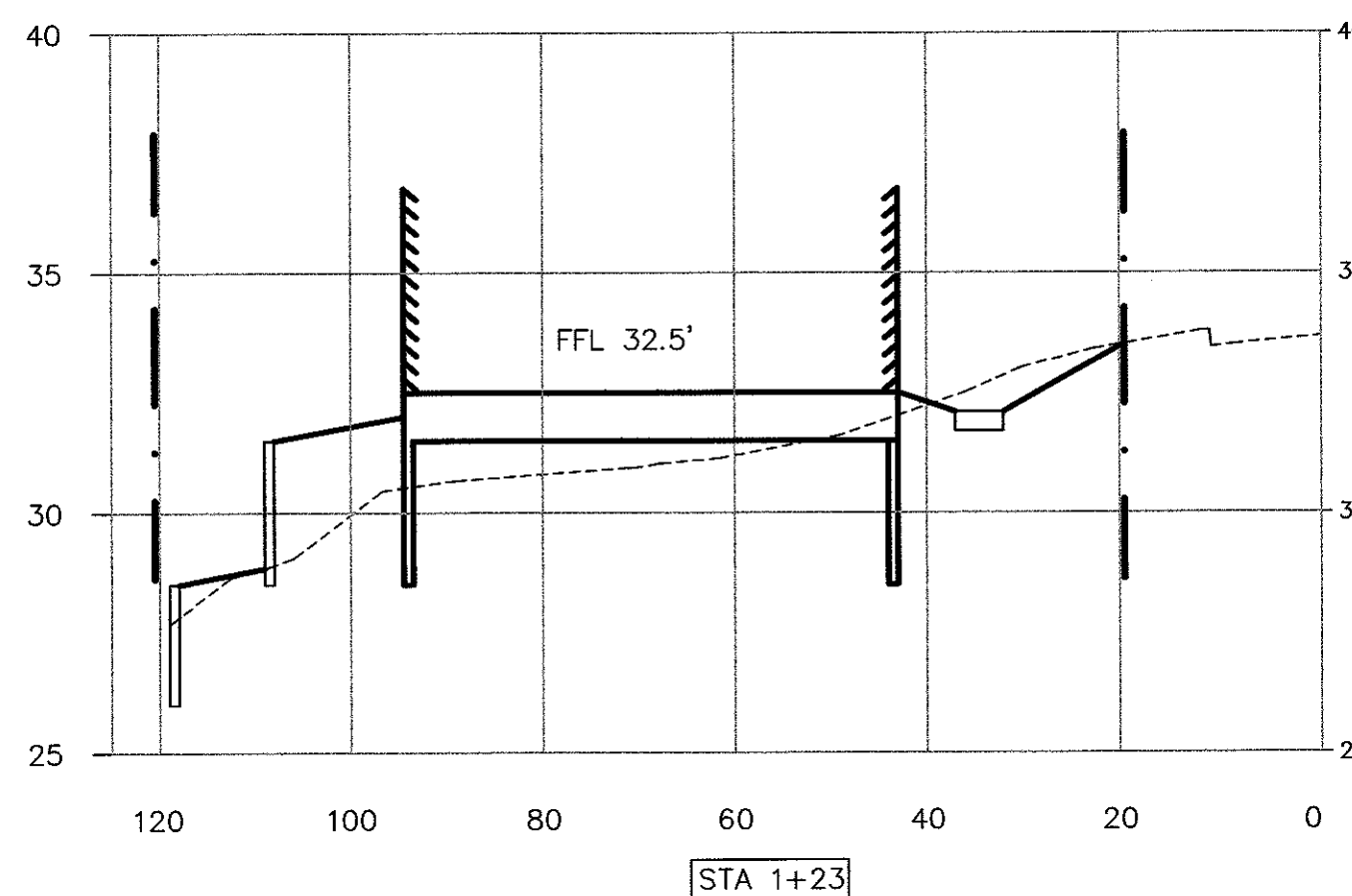
AHEAD  
C= 29.9 SF  
F= 32.2 SF  
BACK  
C= 27.7 SF  
F= 3.2 SF



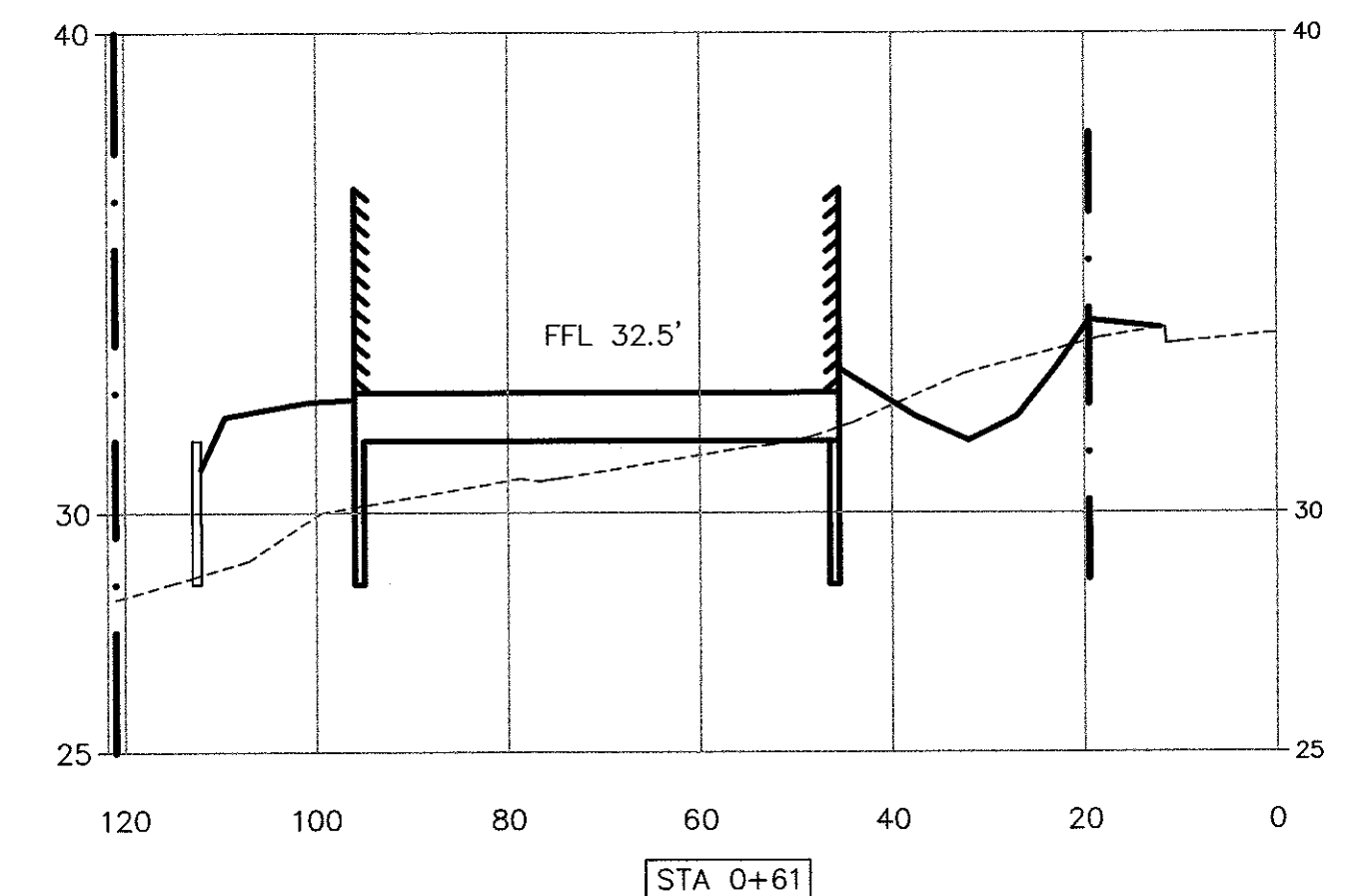
C= 50.3 SF  
F= 0 SF



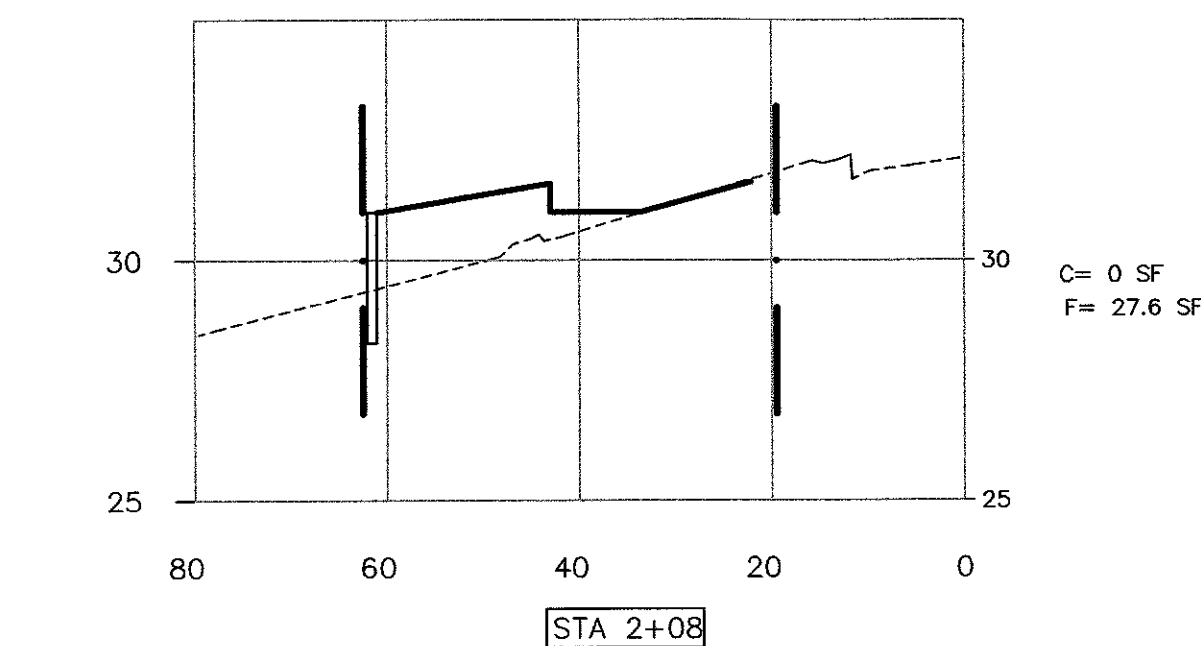
C= 0 SF  
F= 0 SF



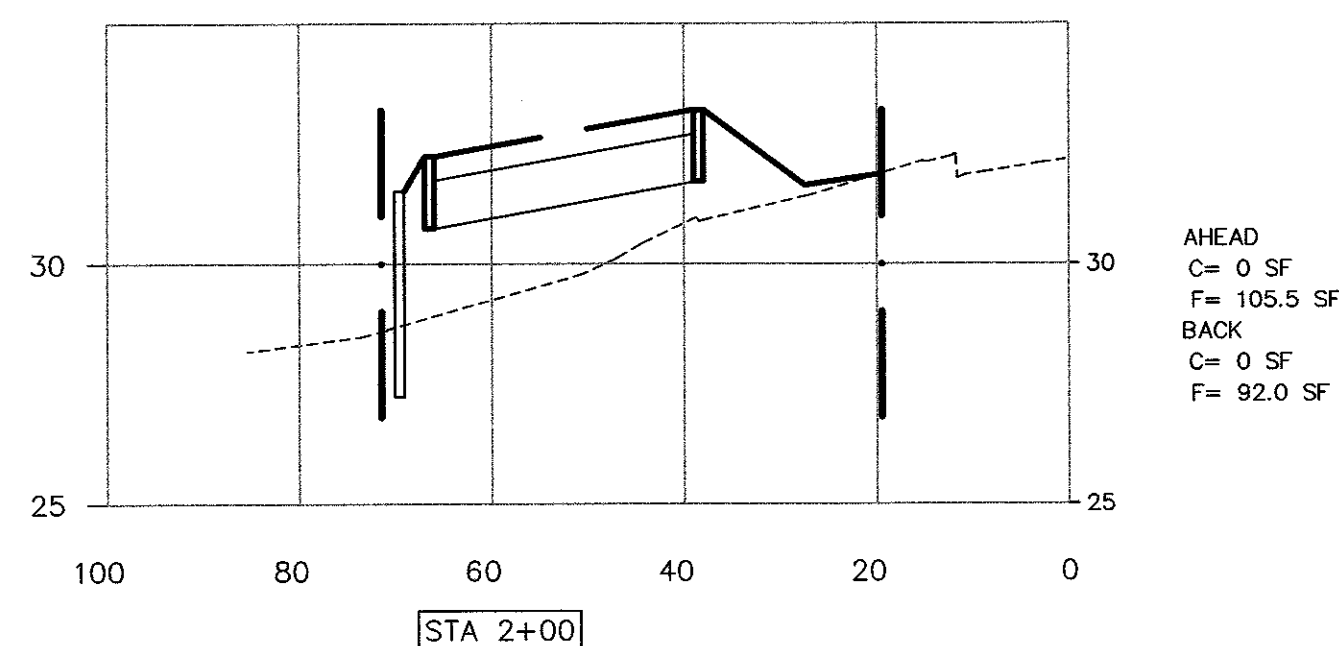
AHEAD  
C= 10.5 SF  
F= 102.8 SF  
BACK  
C= 12.5 SF  
F= 52.5 SF



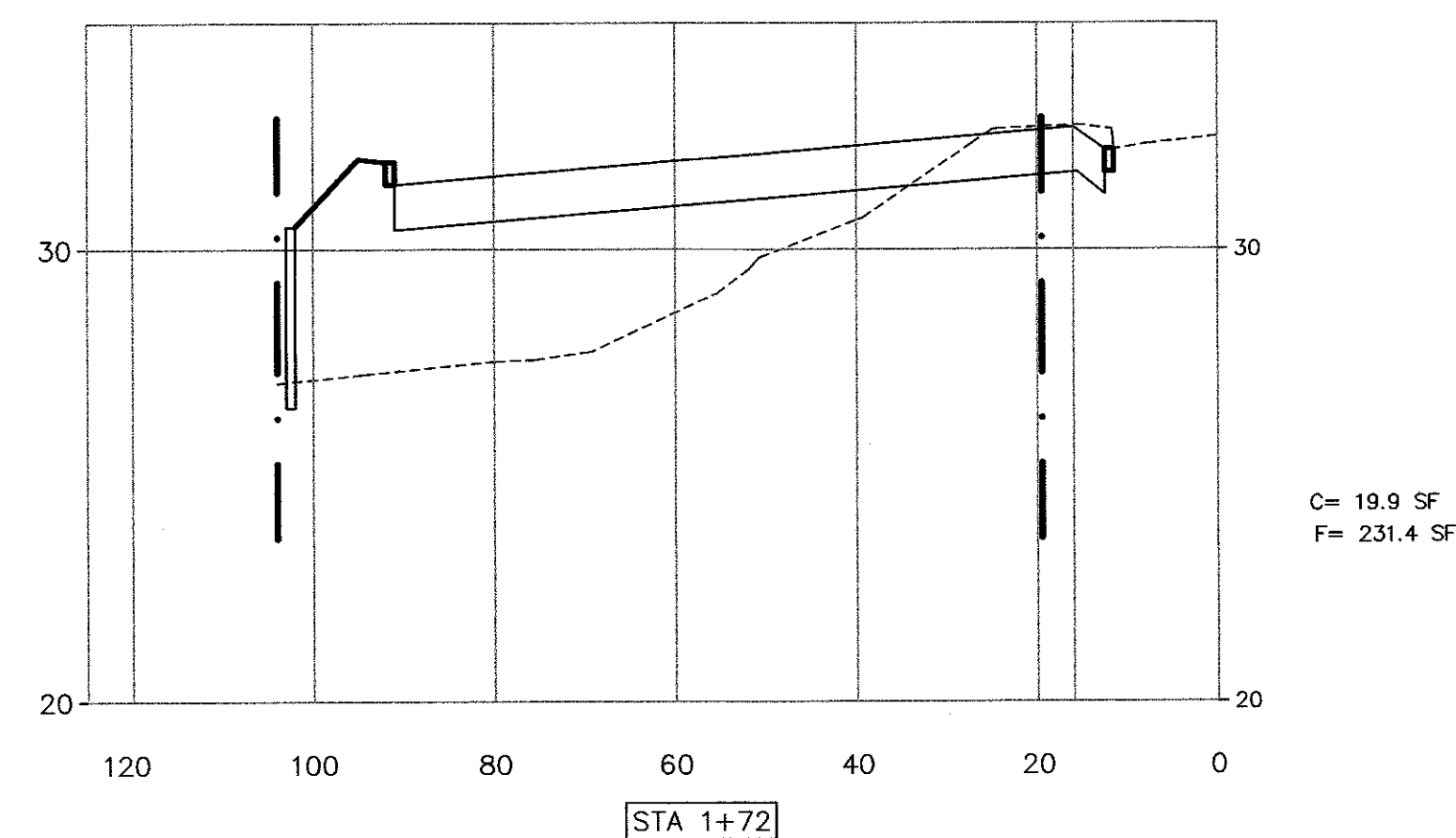
C= 16.2 SF  
F= 78.5 SF



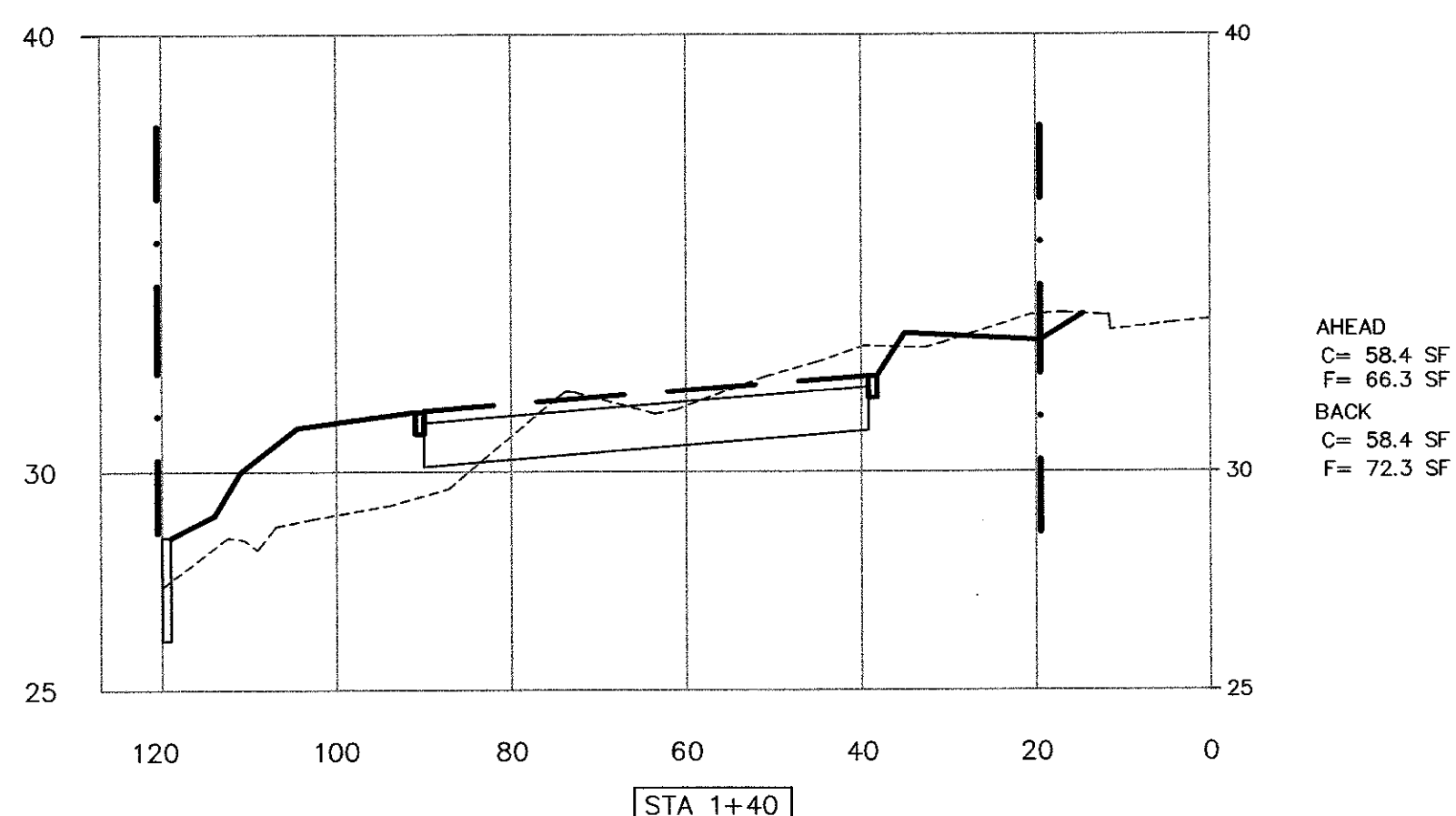
C= 0 SF  
F= 27.6 SF



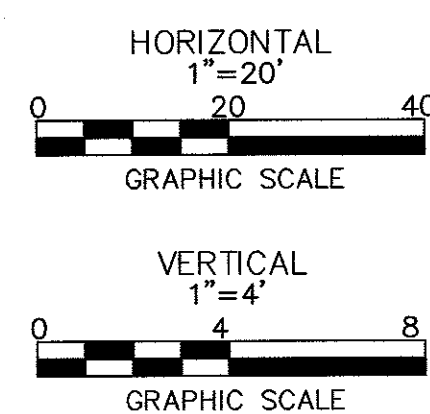
AHEAD  
C= 0 SF  
F= 105.5 SF  
BACK  
C= 0 SF  
F= 92.0 SF



C= 19.9 SF  
F= 231.4 SF



AHEAD  
C= 58.4 SF  
F= 66.3 SF  
BACK  
C= 58.4 SF  
F= 72.3 SF



EARTHWORK CALCULATIONS			FILL VOLUME		
STATION	DISTANCE	AREA (S.F.)	AVG. AREA (S.F.)	VOLUME (C.F.)	VOLUME (C.Y.)
0+0		0			
0+14	14	0	0.0	0.0	0.0
0+33 BACK	19	3	1.5	28.5	1.1
0+33 AHD	0	32	17.5	0.0	0.0
0+61	28	79	55.5	1,554.0	57.6
1+23 BACK	62	53	66.0	4,092.0	151.6
1+23 AHD	0	103	78.0	0.0	0.0
1+40 BACK	17	72	87.5	1,487.5	55.1
1+40 AHD	0	66	69.0	0.0	0.0
1+72	32	231	148.5	4,752.0	176.0
2+00 BACK	28	92	161.5	4,522.0	167.5
2+00 AHD	0	106	99.0	0.0	0.0
2+08	8	28	67.0	536.0	19.9
			14.0	0.0	0.0
TOTAL VOLUME =				628.6	

EARTHWORK CALCULATIONS			CUT VOLUME		
STATION	DISTANCE	AREA (S.F.)	AVG. AREA (S.F.)	VOLUME (C.F.)	VOLUME (C.Y.)
0+0		0			
0+14	14	50	25.0	350.0	13.0
0+33 BACK	19	28	39.0	741.0	27.4
0+33 AHD	0	30	29.0	0.0	0.0
0+61	28	16	23.0	644.0	23.9
1+23 BACK	62	13	14.5	899.0	33.3
1+23 AHD	0	11	12.0	0.0	0.0
1+40 BACK	17	58	34.5	586.5	21.7
1+40 AHD	0	58	58.0	0.0	0.0
1+72	32	20	39.0	1,248.0	46.2
2+00 BACK	28	0	10.0	280.0	10.4
2+00 AHD	0	0	0.0	0.0	0.0
2+08	8	0	0.0	0.0	0.0
			0.0	0.0	0.0
TOTAL VOLUME =				176	

SOIL MOVEMENT GRADING:  
FILL = 629 C.Y.  
CUT = 176 C.Y.  
IMPORT = 453 C.Y.

SOIL MOVEMENT DRAINAGE:  
SEEPAGE PITS:  
CUT = 29 C.Y. X 4 = 116 C.Y.

TOTAL SOIL MOVING = 629+176+116  
= 921 C.Y.

SOIL MOVEMENT  
CUT = 176 C.Y. + 116 C.Y. = 292 C.Y.  
FILL = 629 C.Y.  
TOTAL SOIL TO BE IMPORTED TO THE SITE  
= 629 C.Y. - 292 C.Y. = 337 C.Y.

**CROSS SECTIONS**  
**BLOCK 223 - LOT 5**  
**GENTHER AVENUE**  
FOR  
**BCUW/MADELINE HOUSING PARTNERS**  
BOROUGH OF ORADELL, BERGEN CO., N.J.

**SCHWANEWEDE HALS & VINCE**  
ENGINEERING - LAND SURVEYING - PLANNING  
111 LITTLETON ROAD - SUITE 200 - PARSIPPANY, N.J. 07054  
(201) 337-0053

*David A. Hals*  
**DAVID A. HALS, PE, LS, PP**  
N.J. PROFESSIONAL ENGINEER AND  
LAND SURVEYOR LIC. NO. 24594

*Joseph F. Vince*  
**JOSEPH F. VINCE, PE, LS, PP**  
N.J. PROFESSIONAL ENGINEER AND  
LAND SURVEYOR LIC. NO. 6842588

SCALE  
1"=20'  
0 20 40  
GRAPHIC SCALE

DATE: SEPT. 14, 2023  
JOB NO: 7892-1620  
SHEET NO: 5 OF 6

DATE	BY	DESCRIPTION
3/28/24	DH	1. ENGINEERING COMMENTS
		REVISIONS

**SURVEY**

**BLOCK 223 - LOT 5**

**GENTHER AVENUE**

**FOR**

**BCUW/MADELINE HOUSING PARTNERS**

**BOROUGH OF ORADELL, BERGEN COUNTY, N.J.**

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111 LITTLETON ROAD - SUITE 200 - PARSHIPANY, N.J. 07054

(201) 337-0053

*David A. Hals*

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**DAVID A. HALS, PE, LS, PP**

N.J. PROFESSIONAL ENGINEER AND  
LAND SURVEYOR LIC. NO. 28984

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**JOSEPH F. VINCE, PE, LS, PP**

N.J. PROFESSIONAL ENGINEER AND  
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SCALE  
1" = 20'

0 20 40

GRAPHIC SCALE

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DATE: SEPT. 14, 2023

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SHEET NO: 6 OF 6