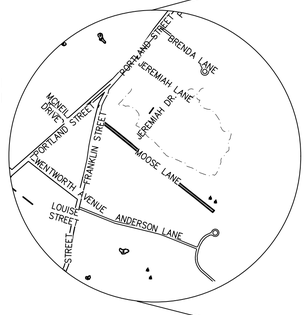
STUART ACRES
MAJOR SUBDIVISION
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

WHETHER OR NOT OTHERWISE EXPRESSLY RECITED ON THIS SUBDIVISION PLAN, THE SUBDIVISION APPROVAL GRANTED IS CONDITIONED ON FAITHFUL AND DILIGENT ADHERENCE BY THE OWNER/SUBDIVIDER/DEVELOPER OF ALL TERMS, CONDITIONS, PROVISIONS AND SPECIFICATIONS OF THE CITY OF ROCHESTER LAND SUBDIVISION REGULATIONS AS AMENDED OR AS MAY LATER BE AMENDED, IN EFFECT ON THE DATE OF APPROVAL, UNLESS OR EXCEPT INSOFAR AS EXPRESSLY WAIVED, IN ANY PARTICULAR, BELOW. NON – ADHERENCE MAY RESULT IN A REVOCATION OF APPROVAL. ANY VARIATION FROM THE APPROVED PLAN WILL REQUIRE A RESUBMISSION FOR SUBDIVISION APPROVAL.

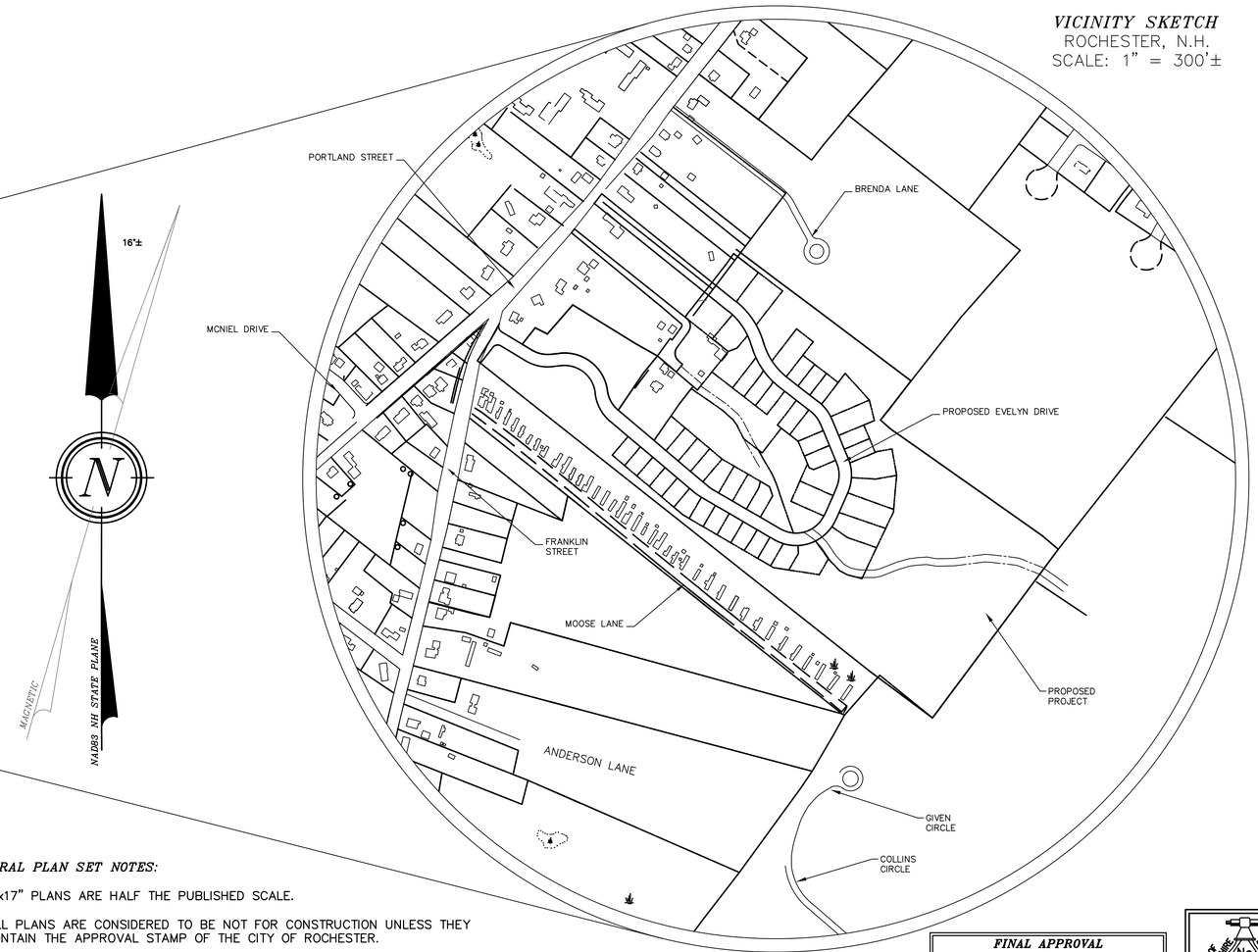
TABLE OF CONTENTS:

SHEET 1 – NEIGHBORHOOD PLAN
SHEET 2 – ABUTTERS AND REFERENCES
SHEET 3 – EXISTING CONDITIONS PLAN (100 SCALE)
SHEET 4–5 – EXISTING CONDITIONS PLANS (50 SCALE)
SHEET 6–7 – SITE SPECIFIC SOILS MAP
SHEET 8 – PHASING PLAN
SHEET 9 – SUBDIVISION OVERVIEW
SHEET 10–14 – SUBDIVISION DETAIL PLAN
SHEET 15 – EASEMENT PLAN
SHEET 16 – SUBDIVISION OVERVIEW TOPOGRAPHY
SHEET 17–21 – SUBDIVISION DETAIL TOPOGRAPHY
SHEET 22 – LIMITS OF CONSTRUCTION PLAN
SHEET 23 – SITE PLAN – PORTLAND / EVELYN INTERSECTION
SHEET 24–30 – ROAD DESIGN SITE PLAN – EVELYN DRIVE
SHEET 31–32 – DRAINAGE OVERVIEW PLAN
SHEET 33 – GRADING & DRAINAGE PLAN – PORTLAND / EVELYN INTERSECTION
SHEET 34–40 – GRADING & DRAINAGE PLAN – EVELYN DRIVE
SHEET 41 – PIPE PROFILES
SHEET 42 – EXISTING TRAIL RECONSTRUCTION PROFILES
SHEET 43 – RAIN GARDEN #1 DETAILS
SHEET 44 – RAIN GARDEN #2 DETAILS
SHEET 45 – RAIN GARDEN #3 DETAILS
SHEET 46 – RAIN GARDEN #4 DETAILS
SHEET 47 – RAIN GARDEN #5 DETAILS
SHEET 48 – POND #6 DETAILS
SHEET 49 – RAIN GARDEN #7 DETAILS
SHEET 50 – RAIN GARDEN #8 DETAILS
SHEET 51 – RAIN GARDEN #9 DETAILS
SHEET 52 – RAIN GARDEN #10 DETAILS
SHEET 53 – RAIN GARDEN #11 DETAILS
SHEET 54 – UTILITY DESIGN PLAN OVERVIEW
SHEET 55 – UTILITY DESIGN PLAN – PORTLAND / EVELYN INTERSECTION
SHEET 56–62 – UTILITY DESIGN PLAN – EVELYN DRIVE
SHEET 63 – WATER EXTENSION PLAN – PORTLAND STREET
SHEET 64 – SEWER EASEMENT (EVELYN 16+75)
SHEET 65 – EROSION & SEDIMENT CONTROL PLAN OVERVIEW
SHEET 66 – EROSION & SEDIMENT CONTROL PLAN – PORTLAND / EVELYN INTERSECTION
SHEET 67–73 – EROSION & SEDIMENT CONTROL PLAN – EVELYN DRIVE
SHEET 74–76 – SECTIONS – EVELYN DRIVE
SHEET 77–82 – SIGHT DISTANCE PLANS
SHEET 83–87 – TRAIL DESIGN PLAN
SHEET 88 – DE–WATERING PLAN
SHEET 89–90 – E101–E102 EROSION & SEDIMENT CONTROL DETAILS
SHEET 91 – D101 DRAINAGE DETAILS
SHEET 92 – BIO–SWALE DETAILS (FRANKLIN ENTRANCE)
SHEET 93 – BIO–SWALE DETAILS (PORTLAND ENTRANCE)
SHEET 94 – DIVERSION BERM DETAILS
SHEET 95 – HEADWALL DETAILS
SHEET 96–99 – C101–C104 CONSTRUCTION DETAILS
SHEET 100 – L101 LANDSCAPING DETAILS
SHEET 101–102 – U101–U102 UTILITY DETAILS

LOCATION PLAN
ROCHESTER, NH
NOT TO SCALE



VICINITY SKETCH
ROCHESTER, N.H.
SCALE: 1" = 300'±



OWNER:	REAL ESTATE ADVISORS INC. 76 EXETER STREET NEWMARKET, NH 03857	SURVEYOR OF RECORD:	KENNETH A. BERRY, PE, LLS CPESC, CESSWI, CPSWQ BERRY SURVEYING & ENGINEERING 335 SECOND CROWN POINT ROAD BARRINGTON, NH 03825 (603) 332–2863
DEVELOPER:	REAL ESTATE ADVISORS INC. 76 EXETER STREET NEWMARKET, NH 03857	ENGINEER OF RECORD:	KENNETH A. BERRY, PE, LLS CPESC, CESSWI, CPSWQ BERRY SURVEYING & ENGINEERING 335 SECOND CROWN POINT ROAD BARRINGTON, NH 03825 (603) 332–2863
		WETLAND & SOILS:	GOVE ENVIRONMENTAL SERVICES, INC. 8 CONTINENTAL DR. BUILDING #2, UNIT H EXETER, NH 03833 603–778–0644
		INFILTRATION TEST PITS	STONEY RIDGE ENVIRONMENTAL LLC 229 PROSPECT MOUNTAIN RD. ALTON, NH 03809 603–776–5825

REQUIRED PERMITS:

- NHDES WETLANDS PERMIT
- NHDES SEWER EXTENSION PERMIT
- NHDES ALTERATION OF TERRAIN PERMIT
- US EPA NOI & SWPPP

GENERAL PLAN SET NOTES:

1.) 11x17" PLANS ARE HALF THE PUBLISHED SCALE.

2.) ALL PLANS ARE CONSIDERED TO BE NOT FOR CONSTRUCTION UNLESS THEY CONTAIN THE APPROVAL STAMP OF THE CITY OF ROCHESTER.

3.) BERRY SURVEYING & ENGINEERING HAS PREPARED AN INSPECTION & MAINTENANCE MANUAL AS PART OF THIS PROJECTS DOCUMENTATION. ALL USERS ARE BOUND TO THIS DOCUMENT AS PART OF THE APPROVAL OF THE PLANNING BOARD. COPIES OF THE YEARLY INSPECTIONS ARE TO BE DELIVERED TO THE CEO AS DIRECTED IN THE MANUAL.

FINAL APPROVAL
BY
ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

STATE OF NEW HAMPSHIRE – LICENSED LAND SURVEYOR – No. 805 – KENNETH A. BERRY – SIGNATURE

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

PROPOSED MAJOR SUBDIVISION
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE – KENNETH A. BERRY – No. 14243 – LICENSED PROFESSIONAL ENGINEER

ABBREVIATION LEGEND:

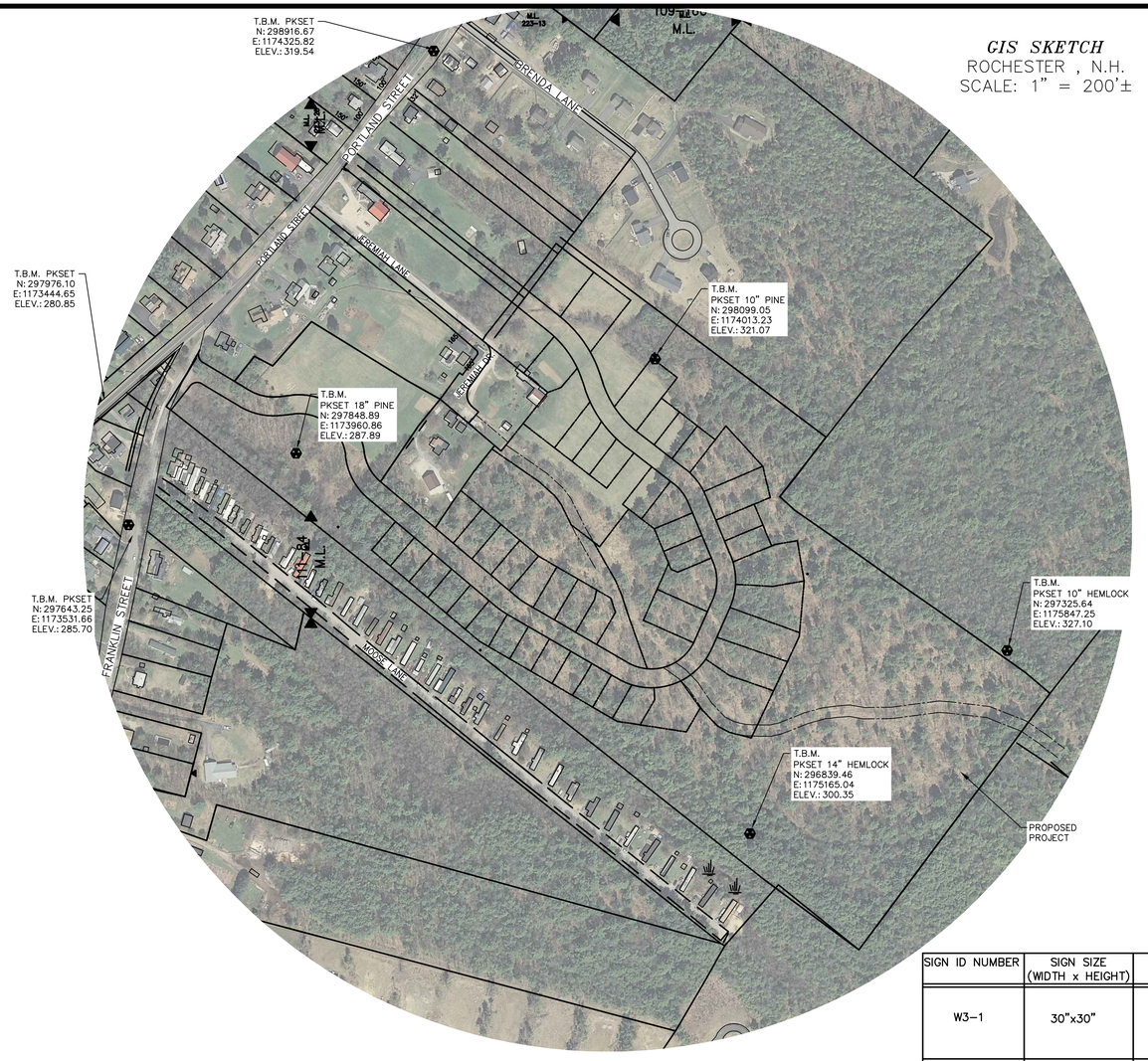
S.G.C.	SLOPED GRANITE CURB
V.G.C.	VERTICAL GRANITE CURB
E.O.P.	EDGE OF PAVEMENT
B.C.C.	BITUMINOUS CONCRETE CURB
BITUM.	BITUMINOUS
E.O.P.	EDGE OF PAVEMENT
E.S.H.W.T	ESTIMATE SEASONAL HIGH WATER TABLE
TYP.	TYPICAL
T. BLOCK	THRUST BLOCK
CONC.	CONCRETE
U.G.E.	UNDER GROUND ELECTRIC / UTILITY
U.D.	UNDER DRAIN
F.E.S.	FLARED END SECTION
HDPE	HIGH DENSITY POLYETHYLENE
RCP	REINFORCED CONCRETE PIPE
F.G.	FINISHED GRADE
E.G.	EXISTING GRADE
T.W.	TRAVELED WAY
T.B.R.	TO BE REMOVED
'/.	FEET / FEET

{ } SSL ( ) ~ {SIZE} SINGLE SOLID LINE (COLOR W=WHITE, Y=YELLOW)
{ } DSL ( ) ~ {SIZE} DOUBLE SOLID LINE (COLOR W=WHITE, Y=YELLOW)
{ } SSB ( ) ~ {SIZE} SINGLE SOLID W/ BROKEN LINE (COLOR W=WHITE, Y=YELLOW)
{ } SBL ( ) ~ {SIZE} SINGLE BROKEN LINE (COLOR W=WHITE, Y=YELLOW)
{ } DBL ( ) ~ {SIZE} DOUBLE BROKEN LINE (COLOR W=WHITE, Y=YELLOW)

EXISTING LEGEND:

- IRON BOUND ~TBS~
- IRON BOUND ~FND~
- GRANITE BOUND ~FND~
- STONE BOUND ~FND~
- UTILITY POLE
- GUY WIRE
- CURB STOP
- GATE VALVE
- GAS VALVE
- FIRE HYDRANT
- CATCH BASIN
- SEWER MANHOLE
- SINGLE POST SIGN
- TEST PIT
- TREE
- BUILDING SETBACK LINE
- EASEMENT LINE
- GAS LINE
- WATER LINE
- SEWER LINE
- OVERHEAD UTILITIES
- HIGHWAY FENCE
- SOILS LINE
- EXISTING CONTOUR MINOR
- EXISTING CONTOUR MAJOR
- EXISTING CULVERT PIPE
- EXISTING AREAS OF GREATER THAN 25% SLOPE
- EXISTING AREAS OF GREATER THAN 15% SLOPE
- ZONE LINE
- EDGE OF JURISDICTIONAL WETLANDS

SIGN ID NUMBER	SIGN SIZE (WIDTH x HEIGHT)	SIGN	TEXT DIMENSIONS	NO. OF SIGNS	BACKGROUND	LEGEND	BORDER	SYMBOL	POST SIZE & QUANTITY
R1–1	30"x30"	STOP	SEE STANDARD HIGHWAY SIGNS 2004 EDITION PUBLISHED BY USDOT – FHWA	3	RED	WHITE	WHITE	–	U–CHANNEL (3)
R2–1	24"x30"	SPEED LIMIT 25	SEE STANDARD HIGHWAY SIGNS 2004 EDITION PUBLISHED BY USDOT – FHWA	8	WHITE	BLACK	BLACK	–	U–CHANNEL (8)
W1–8L	24"x30"		SEE STANDARD HIGHWAY SIGNS 2004 EDITION PUBLISHED BY USDOT – FHWA	2	YELLOW	BLACK	BLACK	–	U–CHANNEL (2)
R7–107	12"x18"	NO PARKING BUS STOP	SEE STANDARD HIGHWAY SIGNS 2004 EDITION PUBLISHED BY USDOT – FHWA	1	TL – RED TR – WHITE BTM – WHITE	WHITE RED RED	RED	–	U–CHANNEL (1)

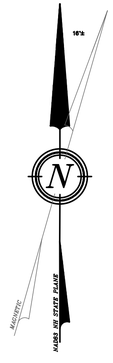


GIS SKETCH
ROCHESTER , N.H.
SCALE: 1" = 200'±

PROPOSED LEGEND:

- UTILITY POLE
- UTILITY PADS
- SEWER MANHOLE
- WATER SHUT OFF / VALVE
- HYDRANT
- THRUST BLOCK
- LIGHTING
- CATCH BASIN / DRAIN MANHOLE
- SIGNAGE
- LAMP
- F41 / F40 CONTOUR MINOR / CONTOUR MAJOR
- F70.33 SPOT GRADE
- CULVERT W/ FLARED END SECTION (F.E.S.)
- E101 / E6 DETAIL SHEET / DETAIL
- TREE LINE
- CENTER LINE
- UGE UNDERGROUND UTILITY / TRANSFORMER / J.BOX
- U.D UNDER DRAIN
- W WATER LINE
- S SEWER LINE
- G GAS LINE
- SILT FENCE / EROSION MIX BERM
- FILTREXX 12" SILT SOXX
- ORANGE CONSTRUCTION PERIMETER FENCE
- 50' WETLANDS BUFFER
- 25' WETLAND BUFFER
- PHASE LINE
- EASEMENT
- (S) SINGLE FAMILY LOT
- (D) DUPLEX LOT
- MULCH BERM
- STOCK PILE
- PROPOSED RIP–RAP

SIGN ID NUMBER	SIGN SIZE (WIDTH x HEIGHT)	SIGN	TEXT DIMENSIONS	NO. OF SIGNS	BACKGROUND	LEGEND	BORDER	SYMBOL	POST SIZE & QUANTITY
W3–1	30"x30"		SEE STANDARD HIGHWAY SIGNS 2004 EDITION PUBLISHED BY USDOT – FHWA	3	YELLOW	BLACK	BLACK	RED/ WHITE	U–CHANNEL (3)
W1–3R	30"x30"		SEE STANDARD HIGHWAY SIGNS 2004 EDITION PUBLISHED BY USDOT – FHWA	1	YELLOW	BLACK	BLACK	–	U–CHANNEL (1)



REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
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NEIGHBORHOOD PLAN & LEGENDS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE — No. 805 KENNETH A BERRY — LICENSED LAND SURVEYOR
SIGNATURE

PLAN REFERENCES:

1.) "LOT LINE ADJUSTMENT PLAN FOR JAMES A. & JANE BENTON AND JEREMIAH JACOB STUART MAP 111–LOT 82 & MAP 223–LOT 21 PORTLAND ST., ROCHESTER, N.H."
BY: MOTT SURVEY COMPANY, LLC
DATED: DECEMBER 6, 2007
S.C.R.D.: PLAN # 7–439 BLA

2.) "PROPOSED ROAD LAYOUT OF JEREMIAH LANE FOR THE CITY OF ROCHESTER & JEREMIAH STUART LOT LINE REVISION FOR JEREMIAH STUART & GERARD METAYER PORTLAND STREET ROCHESTER, N.H. TAX MAP 223, LOT 21"
BY: BERRY SURVEYING & ENGINEERING
DATED: SEPTEMBER 18, 2008
S.C.R.D.: PLAN # 103–15

3.) "PROPOSED LOT LINE REVISION FOR HAROLD C. BURGESS & LINDA WEINBERG AND ESTATE OF JEREMIAH JACOB STUART JEREMIAH LANE ROCHESTER, N.H."
BY: BERRY SURVEYING & ENGINEERING
DATED: SEPTEMBER 3, 2002
S.C.R.D.: PLAN #68–4

4.) "CORRECTED LOT LINE REVISION PLAN PRAY STREET/STONEWALL DRIVE ROCHESTER N.H. FOR GREGORY E. PRAY"
BY: NORWAY PLAINS ASSOCIATES
DATED: JUNE 2006
S.C.R.D.: PLAN #86–66

5.) "SUBDIVISION OF LAND PORTLAND ST. ROCHESTER, N.H. FOR RSA DEVELOPMENT, L.L.C."
BY: NORWAY PLAINS ASSOCIATES, INC.
DATED: DECEMBER 2004
S.C.R.D.: PLAN # 82–17

6.) "TAX MAP 119 LOT 100 & TAX MAP 118 LOT 51 PROPERTY OF CHAMBERLAIN INVESTMENT PROPERTIES, LLC FRANKLIN STREET/CHAMBERLAIN STREET COUNTY OF STRAFFORD ROCHESTER NEW HAMPSHIRE"
BY: AMES MSC ARCHITECTS & ENGINEERS
DATED: SEPTEMBER 20, 2006
S.C.R.D.: PLAN # 93–78

7.) "SUBDIVISION OF LAND SALMON FALLS ROAD TAX MAP 224, LOTS 321, 321–1, 324 & 328 AND TAX MAP 228, LOT 9 ROCHESTER, NH PREPARED FOR STEVEN MILLER"
BY: NORWAY PLAINS ASSOCIATES, INC.
DATED: NOVEMBER 2007
S.C.R.D.: PLAN # 93–42

8.) "TAX MAP 119, LOT 100 & TAX MAP 118, LOT 51 PROPERTY OF CHAMBERLAIN INVESTMENT PROPERTIES, LLC FRANKLIN STREET/CHAMBERLAIN STREET COUNTY OF STRAFFORD ROCHESTER NEW HAMPSHIRE"
BY: AMES MSC ARCHITECTS & ENGINEERS
DATED: SEPTEMBER 20, 2006
S.C.R.D.: PLAN # 93–79

9.) "PLAN OF LOTS WINONA M CHASE TO NORMAND W. & SANDRA CHASE & BERNARD CHASE ROCHESTER, N.H."
BY: G.L. DAVIS & ASSOCIATES CIVIL ENGINEERS
DATED: JUNE 1976
S.C.R.D.: PLAN # 17A–49

ABUTTERS:

N/F TUTTLE, JASON K.
BRENDA L.
70 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–35
S.C.R.D.: BOOK 1924, PAGE 470

N/F WHITTEN, TERI L.
72 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–36
S.C.R.D.: BOOK 2042, PAGE 353

N/F BARTLETT, PENNY LYNN
74 MOOSE LANE
ROCHESTER, NH 03867–2466
TAX MAP 111, LOT 84–37
S.C.R.D.: BOOK 4215, PAGE 754

N/F FOGARTY, CLAIRE
76 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–38

N/F ERICKSON, LOIS
603 PORTLAND STREET #A
ROCHESTER, NH 03867–2437
TAX MAP 223, LOT 18
S.C.R.D.: BOOK 4370, PAGE 303

N/F BELAIR, ROBIN
82 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–31
S.C.R.D.: BOOK 4005, PAGE 114

N/F TREMBLAY, AUSTIN
64 MOOSE LANE
ROCHESTER, NH 03867–2465
TAX MAP 111, LOT 84–32
S.C.R.D.: BOOK 4262, PAGE 200

N/F STARKEY, RICHARD G.
& DIANE M.
66 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–33
S.C.R.D.: BOOK 2114, PAGE 746

N/F LIBBY, SHAWN R.
& DAWN J.
4 HOWE STREET
ROCHESTER, NH 03867–3727
TAX MAP 111, LOT 84–34
S.C.R.D.: BOOK 4148, PAGE 123

N/F DILLOW, TROY
P.O. BOX 1464
ROCHESTER, NH 03866–1464
TAX MAP 223, LOT 19
S.C.R.D.: BOOK 3891, PAGE 308

N/F ALBERT, DAVID
24 SO ELDERBERRY LANE
ROCHESTER, NH 03867–5250
TAX MAP 111, LOT 84–27
S.C.R.D.: BOOK 4034, PAGE 0001

N/F TUTTLE, ADAM E.
56 MOOSE LANE
ROCHESTER, NH 03867–2465
TAX MAP 111, LOT 84–28
S.C.R.D.: BOOK 3984, PAGE 115

N/F RAND, DONALD E.
& CYNTHIA R.
235 WALNUT STREET
ROCHESTER, NH 03867–4204
TAX MAP 111, LOT 84–29
S.C.R.D.: BOOK 3012, PAGE 0030

N/F STEWART, ALAN
& CHRISTOPHER
6 JACKSON STREET APT A
ROCHESTER, NH 03867–2250
TAX MAP 111, LOT 84–30
S.C.R.D.: BOOK 4283, PAGE 619

N/F ELWELL, BETTY B.
32 JEREMIAH LANE
ROCHESTER, NH 03867–2429
TAX MAP 223, LOT 22
S.C.R.D.: BOOK 2006, PAGE 0713

N/F PLACE, ALAN
& SANDRA
46 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–23
S.C.R.D.: BOOK 1218, PAGE 334

N/F MACDOUGALL, SAMANTHA
48 MOOSE LANE
ROCHESTER, NH 03867–2465
TAX MAP 111, LOT 84–24
S.C.R.D.: BOOK 4207, PAGE 457

N/F SUTTON, KIMBERLY
50 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–25
S.C.R.D.: BOOK 3169, PAGE 935

N/F RACHKOSKIE, TRAVIS
& DAPHNE
52 MOOSE LANE
ROCHESTER, NH 03867–2465
TAX MAP 111, LOT 84–26
S.C.R.D.: BOOK 4020, PAGE 648

N/F WEINBERG, LINDA
& BURGESS, HAROLD C.
36 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 23
S.C.R.D.: BOOK 2660, PAGE 0716

N/F BENTZLER, EDWARD W.
& DONNA L.
36 MOOSE LANE
ROCHESTER, NH 03867–2465
TAX MAP 111, LOT 84–18
S.C.R.D.: BOOK 3363, PAGE 375

N/F LIBBY, SHAWN
& DAWN
4 HOWE STREET
ROCHESTER, NH 03867–3727
TAX MAP 111, LOT 84–19
S.C.R.D.: BOOK 4176, PAGE 786

N/F THOMPSON, JEFFREY R.
& DENISE M.
40 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–20
S.C.R.D.: BOOK 1713, PAGE 593

N/F MOORE, WILLIAM C.
& HOLLY S.
44 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–22
S.C.R.D.: BOOK 2469, PAGE 238

N/F HUPPE, LEO
& EVELYN
589 PORTLAND STREET
ROCHESTER, NH 03867–2429
TAX MAP 223, LOT 25

N/F LAMBERT, SCOTT M.
& BELAIR, KERRI L.
34 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–17A
S.C.R.D.: BOOK 3413, PAGE 897

N/F JEREMIAH STUART
REVOCABLE TRUST
JEREMIAH J. STUART TRUSTEE
53 OLDE FARM LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 21
S.C.R.D.: BOOK 3985, PAGE 392

N/F UNGER–MOCHRIE, LESLEY
25 BRENDA LANE
ROCHESTER, NH 03867–2474
TAX MAP 223, LOT 13–9
S.C.R.D.: BOOK 4133, PAGE 688

N/F DEWHURST, CHRISTOPHER A.
42 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–21
S.C.R.D.: BOOK 2634, PAGE 796

N/F METAYER FAMILY REVOCABLE TRUST
METAYER, GERARD R.
& JOYCE
21 JEREMIAH LANE BUILDING INTERIOR
ROCHESTER, NH 03867–2429
TAX MAP 223, LOT 24
S.C.R.D.: BOOK 3985, PAGE 391

N/F ROBERG, JAMES GEORGE
32 MOOSE LANE
ROCHESTER, NH 03867–2416
TAX MAP 111, LOT 84–16
S.C.R.D.: BOOK 4172, PAGE 423

N/F MARTIN, PAUL A.
35 BRENDA LANE
ROCHESTER, NH 03867–2474
TAX MAP 223, LOT 13–7
S.C.R.D.: BOOK 4222, PAGE 250

N/F GARDNER, WILLIAM S.
& MARY F.
26 BRENDA LANE
ROCHESTER, NH 03867–2474
TAX MAP 223, LOT 13–14
S.C.R.D.: BOOK 3417, PAGE 890

N/F CARON, JULIA R.
& BUBAR, RYAN C.
31 BRENDA LANE
ROCHESTER, NH
TAX MAP 223, LOT 13–8
S.C.R.D.: BOOK 4139, PAGE 223

N/F BENTON, ALFRED
& CYNTHIA
585 PORTLAND STREET
ROCHESTER, NH 03867–2429
TAX MAP 111, LOT 81
S.C.R.D.: BOOK 703, PAGE 191

N/F MONTINI, CHRISTINA M &
DONLON, R TYLER
604 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 223, LOT 27
S.C.R.D.: BOOK 4174, PAGE 779

N/F HILTON, GORDON R.
MOOSE LANE
ROCHESTER, NH 03867–2416
TAX MAP 111, LOT 84–15
S.C.R.D.: BOOK 4233, PAGE 505

N/F HUPPE, LEO
& EVELYN
589 PORTLAND STREET
ROCHESTER, NH 03867–2429
TAX MAP 223, LOT 12
S.C.R.D.: BOOK 507, PAGE 304

N/F CHAMBERLAIN INVEST PROP
LLC
P.O. BOX 645
IPSWICH, MA 01938–0645
TAX MAP 119, LOT 100
S.C.R.D.: BOOK 2070, PAGE 652

N/F CURTIS, KELLY J.
& MICHELLE
43 STONEWALL DRIVE
ROCHESTER, NH 03868–5916
TAX MAP 223, LOT 11–16
S.C.R.D.: BOOK 4151, PAGE 771

N/F BENTON, JAMES A.
& JANE
579 PORTLAND STREET
ROCHESTER, NH 03867–2429
TAX MAP 111, LOT 82
S.C.R.D.: BOOK 111, LOT 82

N/F SPEROPOLOUS, LISA L
600 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 26
S.C.R.D.: BOOK 3754, PAGE 729

N/F HARDY, RUSSELL
& MARIE E.
28 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–14
S.C.R.D.: BOOK 1308, PAGE 681

N/F BRUNELLE, DAVID S.
& ARTHUR E.
6 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–3
S.C.R.D.: BOOK 2178, PAGE 23

N/F OSBORNE, MARY E.
8 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–4
S.C.R.D.: BOOK 1841, PAGE 160

N/F LIBBY, SHAWN
& DAWN
4 HOWE STREET
ROCHESTER, NH 03867–3727
TAX MAP 111, LOT 84–1
S.C.R.D.: BOOK 4233, PAGE 278

N/F CALER, HAROLD E.
& DOROTHY F.
151 FRANKLIN STREET
ROCHESTER, NH 03867–2417
TAX MAP 111, LOT 83
S.C.R.D.: BOOK 840, PAGE 43

N/F HOUSE, RICHARD E. & DEBORAH S.
578 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 111, LOT 77
S.C.R.D.: BOOK 3419, PAGE 1

N/F O'BRIEN, JASON A.
26 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–13
S.C.R.D.: BOOK 3693, PAGE 364

N/F RICHEY, PAULA
12 MOOSE LANE
ROCHESTER, NH 03867–2416
TAX MAP 111, LOT 84–6
S.C.R.D.: BOOK 3335, PAGE 123

N/F SABINS, WILLIAM T.
14 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–7
S.C.R.D.: BOOK 3553, PAGE 959

N/F GAY, ROBERT
10 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–5
S.C.R.D.: BOOK 3190, PAGE 530

N/F JUNEAU, NORMA M.
48 MOOSE LANE
ROCHESTER, NH 03867–2466
TAX MAP 111, LOT 84–39
S.C.R.D.: BOOK 4232, PAGE 328

N/F STROGEN, ROBERT
& SHIELA
27 QUARRY DRIVE
ROCHESTER, NH 03867
TAX MAP 223, LOT 17
S.C.R.D.: BOOK 4030, PAGE 498

N/F ONIELL, KATHLEEN
& JEFFREY J.
24 MOOSE LANE
ROCHESTER, NH 03867–2416
TAX MAP 111, LOT 84–12
S.C.R.D.: BOOK 3830, PAGE 0002

N/F PINEO, SHARON
20 MOOSE LANE
ROCHESTER, NH 03867
TAX MAP 111, LOT 84–10
S.C.R.D.: BOOK 2233, PAGE 321

N/F RICE, SARA
22 MOOSE LANE
ROCHESTER, NH 03867–2416
TAX MAP 111, LOT 84–12
S.C.R.D.: BOOK 4166, PAGE 105

N/F FOSTER, MELISSA
16 MOOSE LANE
ROCHESTER, NH 03867–2416
TAX MAP 111, LOT 84–8
S.C.R.D.: BOOK 3532, PAGE 773

N/F GALEUCIA, PETER W.
567 PORTLAND STREET
ROCHESTER, NH 03867–2427
TAX MAP 111, LOT 96
S.C.R.D.: BOOK 4310, PAGE 647

N/F WARREN, SYLVIA
576 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 111, LOT 76
S.C.R.D.: BOOK 1289, PAGE 520

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21.

3.) LOT AREA: 1,811,367 Sq. Ft. 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

6.) I HEREBY CERTIFY THAT, TO THE BEST OF MY KNOWLEDGE & BELIEF, THIS PARCEL DOES NOT FALL WITHIN THE FLOOD PLAIN FLOOD HAZARD REF.: FEMA COMMUNITY# –330150, MAP# – 33017C0204D & 33017C0212D, DATED: MAY 17, 2005

7.) VERTICAL DATUM BASED ON NAVD88 ELEVATIONS. HORIZONTAL COORDINATES BASED ON NAD83. COORDINATES GATHERED USING TOPCON HIPER SR SURVEY GRADE GPS RECEIVERS.

8.) THE BOUNDARY LINES SHOWN ON THIS PLAN ARE THE RESULT OF A CLOSED TRAVERSE PERFORMED BY THIS OFFICE IN OCTOBER OF 2015, WITH AN ERROR OF CLOSURE OF 1 PART IN 107,49.80

ABUTTERS WITHIN 200':

N/F LEGER, JOHN L. & MARGARET E.
570 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 111, LOT 75
S.C.R.D.: BOOK 1289, PAGE 520

N/F BRIDLE WOOD PRESERVES CONDO
EVERGREEN MGMT, INC.
DEPT 355
PO BOX 4579
HOUSTON, TX 77210–4579
TAX MAP 223, LOT 29

N/F THOMPSON, DONALD E. & MARY L.
564 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 111, LOT 74

N/F BENTON, ALFRED & CYNTHIA
585 PORTLAND STREET
ROCHESTER, NH 03867–2429
TAX MAP 111, LOT 81

N/F RADWAN, DOROTHY
584 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 111, LOT 78

N/F STROGEN, ROBERT & SHIELA
27 QUARRY DRIVE
ROCHESTER, NH 03867
TAX MAP 223, LOT 16

N/F ROMANOVITZ, DANIEL KEITH & LISA MARIE
590 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 111, LOT 79

N/F LEMIEUX, HELEN P.
596 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 111, LOT 80

N/F ARMSTRONG III, JAMES T. & ELINOR L.
292 FORESIDE DRIVE
TOPSHAM, ME 04086
TAX MAP 111, LOT 97

N/F ADAMS, ERLON E. & JOANNE
599 PORTLAND STREET
ROCHESTER, NH 03867–2427
TAX MAP 111, LOT 98

N/F RAMSTROM, DEANNA M.
5 SUSAN CIRCLE
RAYMOND, NH 03077–2520
TAX MAP 223, LOT 13–6

N/F LACHANCE, LINDA A.
2 CLEMENT ROAD
SOMERSWORTH, NH 03878
TAX MAP 223, LOT 13–10

N/F LAIRD, MILISSA A.
17 BRENDA LANE
ROCHESTER, NH 03867–2427
TAX MAP 223, LOT 13–11

N/F TRIPP III, ROBERT V.
13 BRENDA LANE
ROCHESTER, NH 03867–2427
TAX MAP 223, LOT 13–12 & 13

N/F BONNEY, H & S TRUSTEES
BONNEY REVOC. FAM TRUST
621 PORTLAND STREET
ROCHESTER, NH 03867–2427
TAX MAP 223, LOT 14

N/F MARTIN, CHARLES L. & DOROTHEA H.
611 PORTLAND STREET
ROCHESTER, NH 03867–2437
TAX MAP 223, LOT 15

N/F DONNELLY, CHRISTINE A. & DIONNE, JUSTIN S.
606 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 223, LOT 28

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

ABUTTERS AND REFERENCES
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

PLAN REFERENCES:

1.) "LOT LINE ADJUSTMENT PLAN FOR JAMES A. & JANE BENTON AND JEREMIAH JACOB STUART MAP 111–LOT 82 & MAP 223–LOT 21 PORTLAND ST., ROCHESTER, N.H."
BY: MOTT SURVEY COMPANY, LLC
DATED: DECEMBER 6, 2007
S.C.R.D.: PLAN # 7–439 BLA

2.) "PROPOSED ROAD LAYOUT OF JEREMIAH LANE FOR THE CITY OF ROCHESTER & JEREMIAH STUART LOT LINE REVISION FOR JEREMIAH STUART & GERARD METAYER PORTLAND STREET ROCHESTER, N.H. TAX MAP 223, LOT 21"
BY: BERRY SURVEYING & ENGINEERING
DATED: SEPTEMBER 18, 2008
S.C.R.D.: PLAN # 103–15

3.) "PROPOSED LOT LINE REVISION FOR HAROLD C. BURGESS & LINDA WEINBERG AND ESTATE OF JEREMIAH JACOB STUART JEREMIAH LANE ROCHESTER, N.H."
BY: BERRY SURVEYING & ENGINEERING
DATED: SEPTEMBER 3, 2002
S.C.R.D.: PLAN #68–4

PLAN REFERENCES CONT.:

4.) "CORRECTED LOT LINE REVISION PLAN PRAY STREET/STONEWALL DRIVE ROCHESTER N.H. FOR GREGORY E. PRAY"
BY: NORWAY PLAINS ASSOCIATES
DATED: JUNE 2006
S.C.R.D.: PLAN #86–66

5.) "SUBDIVISION OF LAND PORTLAND ST. ROCHESTER, N.H. FOR RSA DEVELOPMENT, L.L.C."
BY: NORWAY PLAINS ASSOCIATES, INC.
DATED: DECEMBER 2004
S.C.R.D.: PLAN # 82–17

6.) "TAX MAP 119 LOT 100 & TAX MAP 118 LOT 51 PROPERTY OF CHAMBERLAIN INVESTMENT PROPERTIES, LLC FRANKLIN STREET/CHAMBERLAIN STREET COUNTY OF STRAFFORD ROCHESTER NEW HAMPSHIRE"
BY: AMES MSC ARCHITECTS & ENGINEERS
DATED: SEPTEMBER 20, 2006
S.C.R.D.: PLAN # 93–78

PLAN REFERENCES CONT.:

7.) "SUBDIVISION OF LAND SALMON FALLS ROAD TAX MAP 224, LOTS 321, 321–1, 324 & 328 AND TAX MAP 228, LOT 9 ROCHESTER, NH PREPARED FOR STEVEN MILLER"
BY: NORWAY PLAINS ASSOCIATES, INC.
DATED: NOVEMBER 2007
S.C.R.D.: PLAN # 93–42

8.) "TAX MAP 119, LOT 100 & TAX MAP 118, LOT 51 PROPERTY OF CHAMBERLAIN INVESTMENT PROPERTIES, LLC FRANKLIN STREET/CHAMBERLAIN STREET COUNTY OF STRAFFORD ROCHESTER NEW HAMPSHIRE"
BY: AMES MSC ARCHITECTS & ENGINEERS
DATED: SEPTEMBER 20, 2006
S.C.R.D.: PLAN # 93–79

9.) "PLAN OF LOTS WINONA M CHASE TO NORMAND W. & SANDRA CHASE & BERNARD CHASE ROCHESTER, N.H."
BY: G.L. DAVIS & ASSOCIATES CIVIL ENGINEERS
DATED: JUNE 1976
S.C.R.D.: PLAN # 17A–49

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21.

3.) LOT AREA: 1,811,367 Sq. Ft. 41.58 Ac.
4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

RESIDENTIAL–1 (R1)
FRONTAGE ~ 100'
MINIMUM LOT SIZ ~ 10,000 Sq. Ft.
FRONT SETBACK ~ 10.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0' IF OVER HALF ACRE
MAX. LOT COVERAGE: 35%

6.) I HEREBY CERTIFY THAT, TO THE BEST OF MY KNOWLEDGE & BELIEF, THIS PARCEL DOES NOT FALL WITHIN THE FLOOD PLAIN FLOOD HAZARD REF.: FEMA COMMUNITY# –330150, MAP# – 33017C0204D & 33017C0212D, DATED: MAY 17, 2005

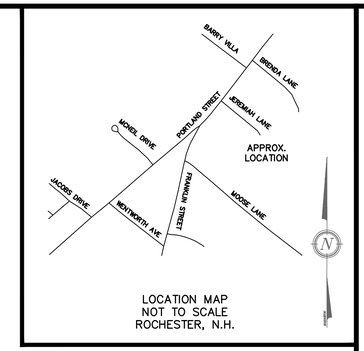
7.) VERTICAL DATUM BASED ON NAVD88 ELEVATIONS. HORIZONTAL COORDINATES BASED ON NAD83. COORDINATES GATHERED USING TOPCON HIPER SR SURVEY GRADE GPS RECEIVERS.

8.) THE BOUNDARY LINES SHOWN ON THIS PLAN ARE THE RESULT OF A CLOSED TRAVERSE PERFORMED BY THIS OFFICE IN OCTOBER OF 2015, WITH AN ERROR OF CLOSURE OF 1 PART IN 107,409.80

9.) THE INTENT OF THIS PLAN IS TO SHOW THE EXISTING CONDITIONS ON TAX MAP 223, LOT 21 AS OF OCTOBER 2015.

10.) SEE SITE SPECIFIC SOILS MAP

11.) TOTAL AREA – 1,811,367 Sq. Ft., 41.58 Ac.
TOTAL UPLAND AREA – 1,476,453 Sq. Ft.
TOTAL WETLAND AREA – 300,668 Sq. Ft.
TOTAL AREA OF GREATER THAN 25% SLOPES – 6,002 Sq. Ft.
TOTAL VERY POORLY DRAINED SOILS AREA – 19,425 Sq. Ft.



LOCATION MAP
NOT TO SCALE
ROCHESTER, N.H.

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

EXISTING CONDITIONS (100 SCALE)
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 100 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

GOVE ENV. SERVICES, INC.
BRENDAN J. QUIGLEY, CWS #249

WETLAND NOTES:

WETLANDS WERE DELINEATED BY GOVE ENVIRONMENTAL SERVICES, INC. IN OCTOBER 2015 AND DECEMBER 2016 UTILIZING THE FOLLOWNG STANDARDS:

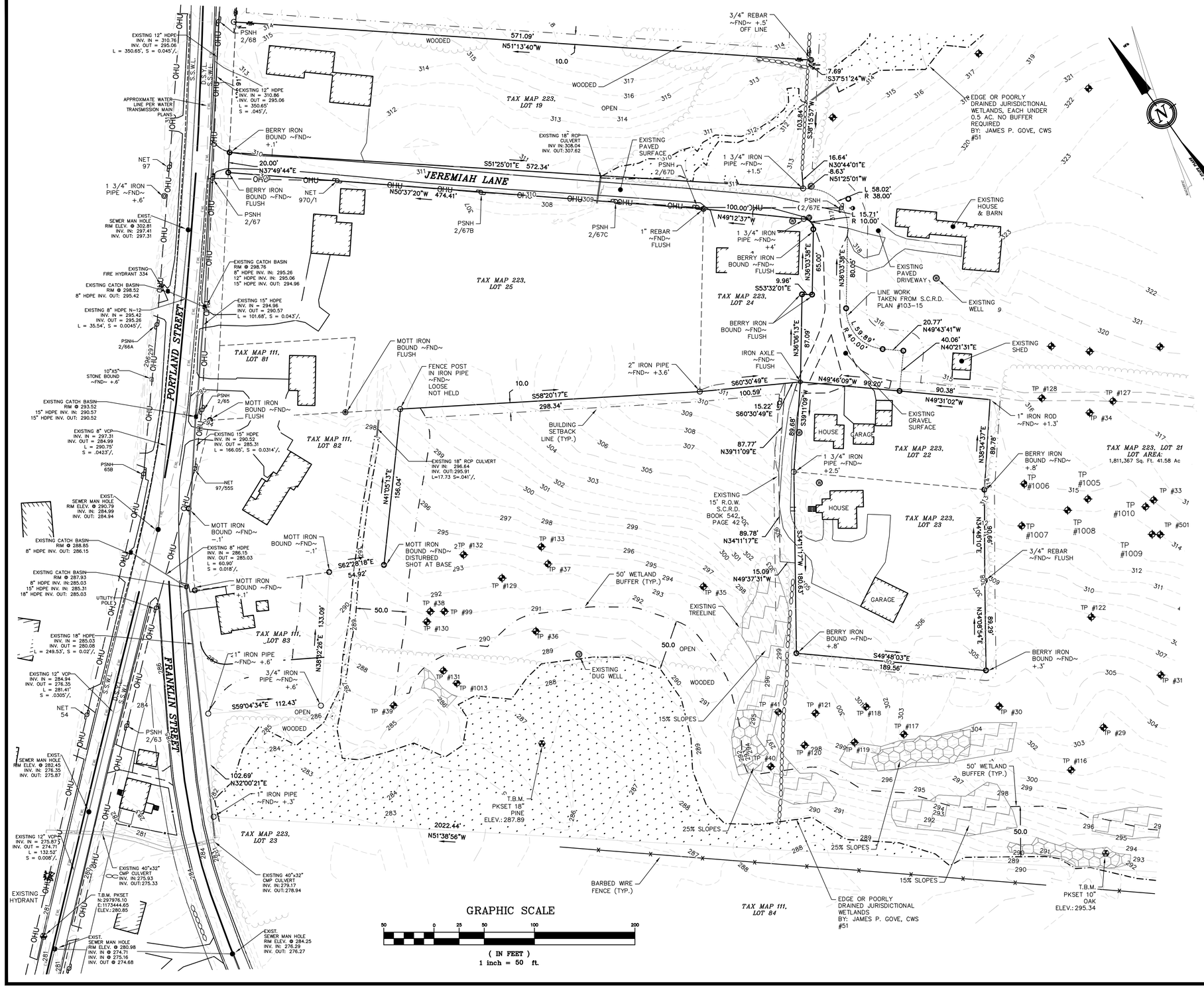
1. REGIONAL SUPPLEMENT TO THE CORPS OF ENGINEERS WETLAND DELINEATION MANUAL: NORTHCENTRAL AND NORTHEAST REGION, (VERSION 2.0) JANUARY 2012, U.S. ARMY CORPS OF ENGINEERS.
2. FIELD INDICATORS OF HYDRIC SOILS IN THE UNITED STATES, A GUIDE FOR IDENTIFYING AND DELINEATING HYDRIC SOILS, VERSION 8.0. UNITED STATES DEPARTMENT OF AGRICULTURE (2016).
3. NATIONAL WETLAND PLANT LIST (CURRENT VERSION).

GRAPHIC SCALE
100 0 50 100 200 400
(IN FEET)
1 inch = 100 ft.

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER, N.H. – 1:10,000 –

KENNETH A. BERRY LLS 805 9-05-18
KENNETH A. BERRY LLS 805 DATE

STATE OF NEW HAMPSHIRE No. 805 KENNETH A. BERRY LICENSED LAND SURVEYOR SIGNATURE

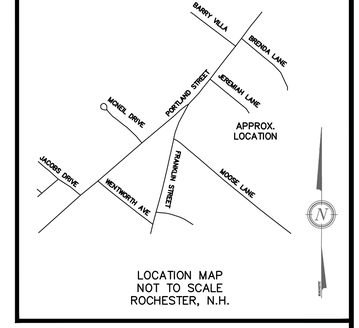


GRAPHIC SCALE

50 0 25 50 100 200

(IN FEET)

1 inch = 50 ft.



LOCATION MAP
NOT TO SCALE
ROCHESTER, N.H.

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21.

3.) LOT AREA: 1,811,367 Sq. Ft. 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

RESIDENTIAL–1 (R1)
FRONTAGE ~ 100'
MINIMUM LOT SIZE ~ 10,000 Sq. Ft.
FRONT SETBACK ~ 10.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0' IF OVER HALF ACRE
MAX. LOT COVERAGE: 35%

6.) I HEREBY CERTIFY THAT, TO THE BEST OF MY KNOWLEDGE & BELIEF, THIS PARCEL DOES NOT FALL WITHIN THE FLOOD PLAIN FLOOD HAZARD REF.: FEMA COMMUNITY# –330150, MAP# – 33017C0204D & 33017C0212D, DATED: MAY 17, 2005

7.) VERTICAL DATUM BASED ON NAVD88 ELEVATIONS. HORIZONTAL COORDINATES BASED ON NAD83. COORDINATES GATHERED USING TOPCON HIPER SR SURVEY GRADE GPS RECEIVERS.

8.) THE BOUNDARY LINES SHOWN ON THIS PLAN ARE THE RESULT OF A CLOSED TRAVERSE PERFORMED BY THIS OFFICE IN OCTOBER OF 2015, WITH AN ERROR OF CLOSURE OF 1 PART IN 107,409.80

9.) THE INTENT OF THIS PLAN IS TO SHOW THE EXISTING CONDITIONS ON TAX MAP 223, LOT 21 AS OF OCTOBER 2015.

WETLAND NOTES:

WETLANDS WERE DELINEATED BY GOVE ENVIRONMENTAL SERVICES, INC. IN OCTOBER 2015 AND DECEMBER 2016 UTILIZING THE FOLLOWING STANDARDS:

1. REGIONAL SUPPLEMENT TO THE CORPS OF ENGINEERS WETLAND DELINEATION MANUAL: NORTHCENTRAL AND NORTHEAST REGION, (VERSION 2.0) JANUARY 2012, U.S. ARMY CORPS OF ENGINEERS.
2. FIELD INDICATORS OF HYDRIC SOILS IN THE UNITED STATES, A GUIDE FOR IDENTIFYING AND DELINEATING HYDRIC SOILS, VERSION 8.0. UNITED STATES DEPARTMENT OF AGRICULTURE (2016).
3. NATIONAL WETLAND PLANT LIST (CURRENT VERSION).

GOVE ENV. SERVICES, INC.
BRENDAN J. QUIGLEY, CWS #249

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER, N.H. – 1:10,000 –

9-05-18

KENNETH A. BERRY LLS 805 DATE

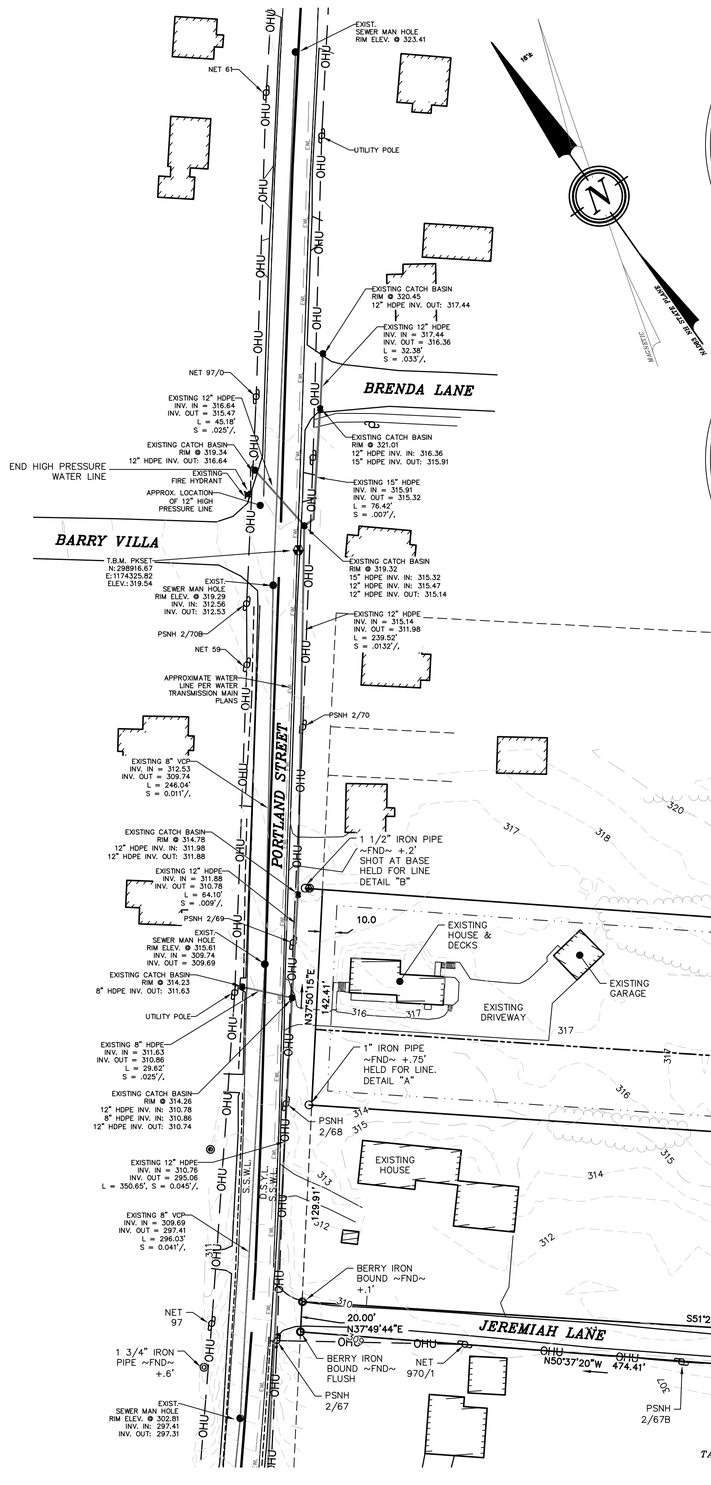
REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

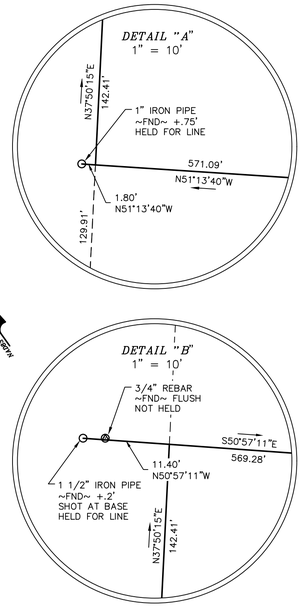
EXISTING CONDITIONS (50 SCALE)
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 50 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE — NO. 805 — KENNETH A. BERRY — LICENSED LAND SURVEYOR — SIGNATURE

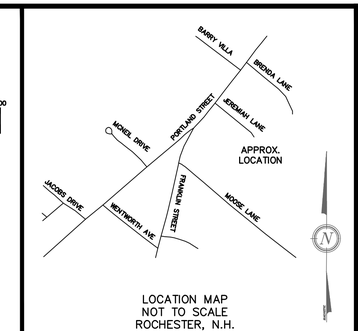




GRAPHIC SCALE

50 0 25 50 100 200

(IN FEET)
1 inch = 50 ft.



LOCATION MAP
NOT TO SCALE
ROCHESTER, N.H.

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21.

3.) LOT AREA: 1,811,367 Sq. Ft. 41.58 Ac.
4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

RESIDENTIAL–1 (R1)
FRONTAGE ~ 100'
MINIMUM LOT SIZE ~ 10,000 Sq. Ft.
FRONT SETBACK ~ 10.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0' IF OVER HALF ACRE
MAX. LOT COVERAGE: 35%

6.) I HEREBY CERTIFY THAT, TO THE BEST OF MY KNOWLEDGE & BELIEF, THIS PARCEL DOES NOT FALL WITHIN THE FLOOD PLAIN FLOOD HAZARD REF.: FEMA COMMUNITY# –330150, MAP# – 33017C0204D & 33017C0212D, DATED: MAY 17, 2005

7.) VERTICAL DATUM BASED ON NAVD88 ELEVATIONS. HORIZONTAL COORDINATES BASED ON NAD83. COORDINATES GATHERED USING TOPCON HIPER SR SURVEY GRADE GPS RECEIVERS.

8.) THE BOUNDARY LINES SHOWN ON THIS PLAN ARE THE RESULT OF A CLOSED TRAVERSE PERFORMED BY THIS OFFICE IN OCTOBER OF 2015, WITH AN ERROR OF CLOSURE OF 1 PART IN 107,409.80

9.) THE INTENT OF THIS PLAN IS TO SHOW THE EXISTING CONDITIONS ON TAX MAP 223, LOT 18 & 21 AS OF OCTOBER 2015 & FEBRUARY 6, 2017.

10.) THE EXISTING BUILDING ON LOT 18 IS A TRIPLEX WITH 3 SEPARATE UNITS.

GOVE ENV. SERVICES, INC.
BRENDAN J. QUIGLEY, CWS #249

WETLAND NOTES:

WETLANDS WERE DELINEATED BY GOVE ENVIRONMENTAL SERVICES, INC. IN OCTOBER 2015 AND DECEMBER 2016 UTILIZING THE FOLLOWING STANDARDS:

1. REGIONAL SUPPLEMENT TO THE CORPS OF ENGINEERS WETLAND DELINEATION MANUAL: NORTHCENTRAL AND NORTHEAST REGION, (VERSION 2.0) JANUARY 2012, U.S. ARMY CORPS OF ENGINEERS.
2. FIELD INDICATORS OF HYDRIC SOILS IN THE UNITED STATES, A GUIDE FOR IDENTIFYING AND DELINEATING HYDRIC SOILS, VERSION 8.0. UNITED STATES DEPARTMENT OF AGRICULTURE (2016).
3. NATIONAL WETLAND PLANT LIST (CURRENT VERSION).

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER, N.H. – 1:10,000 –

9-05-18

KENNETH A. BERRY LLS 805 DATE

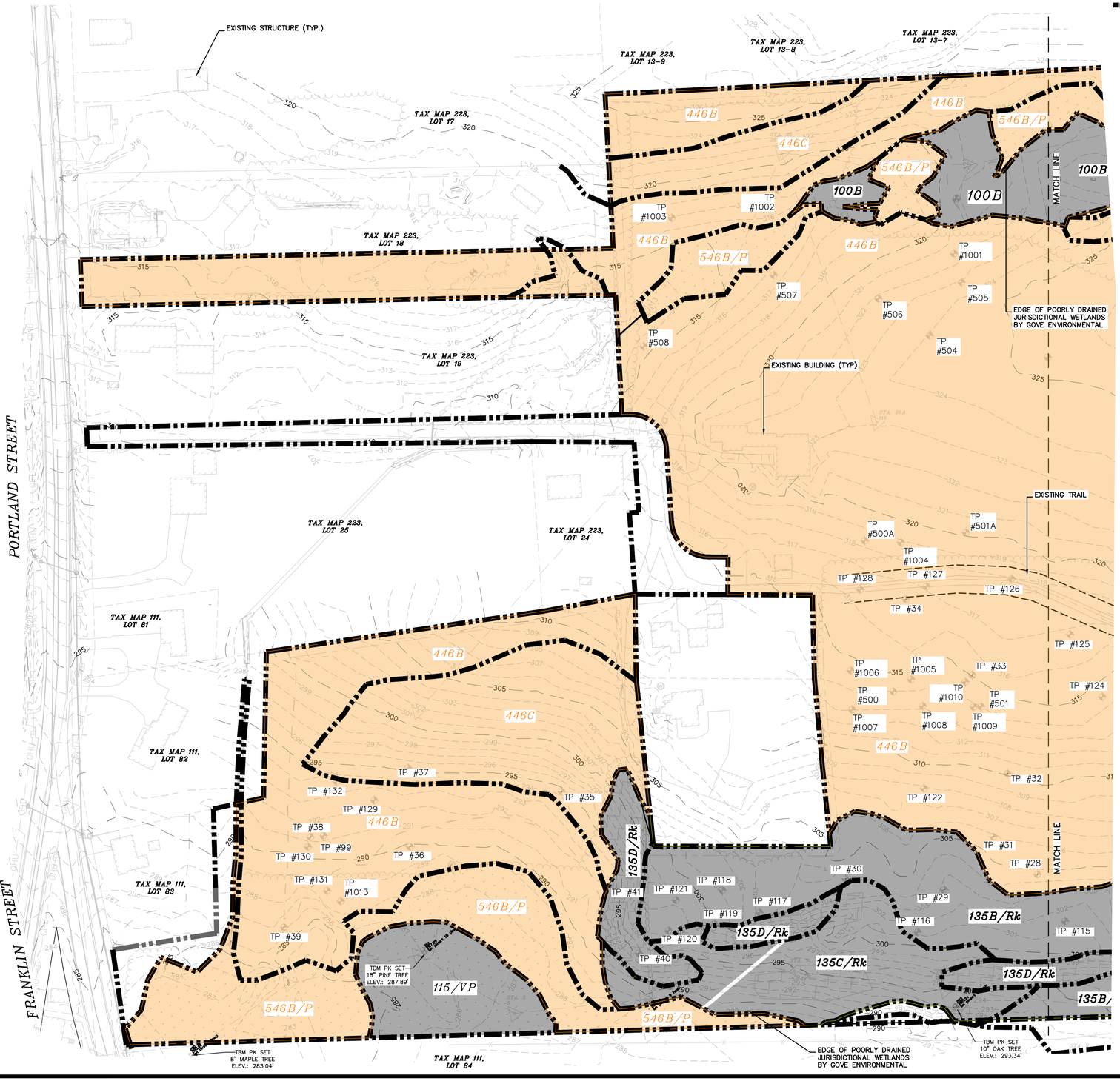
REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

EXISTING CONDITIONS (50 SCALE)
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 50 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE LICENSED LAND SURVEYOR NO 805 KENNETH A BERRY SIGNATURE



LEGEND:

SOIL LINE

446B SOIL SERIES

NOTES:

1.) OWNER: REAL ESTATE ADVISORS INC
24 JEREMIAH LANE
ROCHESTER, NH 03867–1303

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq. Ft. 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) PLAN INTENT: THE INTENT OF THIS PLAN IS TO REPRESENT THE SITE SPECIFIC SOILS ON TAX MAP 223, LOTS 21, AS DETERMINED BY GOVE ENV. SERVICES, INC.

GRAPHIC SCALE

60 0 30 60 120 240

(IN FEET)
1 inch = 60 ft.

SOILS LEGEND

SYMBOL	SOIL TAXONOMIC NAME	HYDROLOGIC SOIL GROUP
100	UDORTHENTS, WET SUBSTRATUM	B
115/VP	SCARBORO MUCK	D
135/Rk	CHATFIELD VARIANT (MODERATLEY WELL DRAINED) – NEWFIELDS COMPLEX	B
446	SCITUATE – NEWFIELDS COMPLEX	C
546/P	WALPOLE FINE SANDY LOAM	C

SLOPES: 0–8% B
8–15% C
15–25% D

DENOMINATOR: /P = POORLY DRAINED
/VP = VERY POORLY DRAINED
/Rk = HALLOW TO BEDROCK

WETLAND NOTES:

WETLANDS WERE DELINEATED BY GOVE ENVIRONMENTAL SERVICES, INC. IN OCTOBER 2015 AND DECEMBER 2016 UTILIZING THE FOLLOWING STANDARDS:

1. REGIONAL SUPPLEMENT TO THE CORPS OF ENGINEERS WETLAND DELINEATION MANUAL: NORTHCENTRAL AND NORTHEAST REGION, (VERSION 2.0) JANUARY 2012, U.S. ARMY CORPS OF ENGINEERS.
2. FIELD INDICATORS OF HYDRIC SOILS IN THE UNITED STATES, A GUIDE FOR IDENTIFYING AND DELINEATING HYDRIC SOILS, VERSION 8.0. UNITED STATES DEPARTMENT OF AGRICULTURE (2016).
3. NATIONAL WETLAND PLANT LIST (CURRENT VERSION).

TEST HOLES WERE CONDUCTED BY:
BERRY SURVEYING & ENGINEERING
AND INFILTRATION TEST PITS CONDUCTED BY:
STONEY RIDGE ENVIRONMENTAL SERVICES

GOVE ENV. SERVICES, INC.
JAMES P. GOVE, CWS #51

GOVE ENV. SERVICES, INC.
JAMES P. GOVE, CSS #04

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
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SITE SPECIFIC SOILS MAP
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 60 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE No. 805 KENNETH A. BERRY LICENSED LAND SURVEYOR
SIGNATURE

SOILS LEGEND

SYMBOL	SOIL TAXONOMIC NAME	HYDROLOGIC SOIL GROUP
100	UDORTHENTS, WET SUBSTRATUM	B
115/VP	SCARBORO MUCH	D
135/Rk	CHATFIELD VARIANT (MODERATLEY WELL DRAINED) – NEWFIELDS COMPLEX	B
446	SCITUATE – NEWFIELDS COMPLEX	C
546/P	WALPOLE FINE SANDY LOAM	C

SLOPES: 0–8% B
8–15% C
15–25% D

DENOMINATOR: /P = POORLY DRAINED
/VP = VERY POORLY DRAINED
/Rk = HALLOW TO BEDROCK

GRAPHIC SCALE

60 0 30 60 120 240

(IN FEET)
1 inch = 60 ft.

NOTES:

1.) OWNER: REAL ESTATE ADVISORS INC
24 JEREMIAH LANE
ROCHESTER, NH 03867–1303

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq. Ft. 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) PLAN INTENT: THE INTENT OF THIS PLAN IS TO REPRESENT THE SITE SPECIFIC SOILS ON TAX MAP 223, LOTS 21, AS DETERMINED BY GOVE ENV. SERVICES, INC.

LEGEND:

SOIL LINE

446B SOIL SERIES

WETLAND NOTES:

WETLANDS WERE DELINEATED BY GOVE ENVIRONMENTAL SERVICES, INC. IN OCTOBER 2015 AND DECEMBER 2016 UTILIZING THE FOLLOWING STANDARDS:

1. REGIONAL SUPPLEMENT TO THE CORPS OF ENGINEERS WETLAND DELINEATION MANUAL: NORTHCENTRAL AND NORTHEAST REGION, (VERSION 2.0) JANUARY 2012, U.S. ARMY CORPS OF ENGINEERS.
2. FIELD INDICATORS OF HYDRIC SOILS IN THE UNITED STATES, A GUIDE FOR IDENTIFYING AND DELINEATING HYDRIC SOILS, VERSION 8.0. UNITED STATES DEPARTMENT OF AGRICULTURE (2016).
3. NATIONAL WETLAND PLANT LIST (CURRENT VERSION).

GOVE ENV. SERVICES, INC.
JAMES P. GOVE, CWS #51

GOVE ENV. SERVICES, INC.
JAMES P. GOVE, CSS #04

TEST HOLES WERE CONDUCTED BY:
BERRY SURVEYING & ENGINEERING
AND INFILTRATION TEST PITS CONDUCTED BY:
STONEY RIDGE ENVIRONMENTAL SERVICES

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
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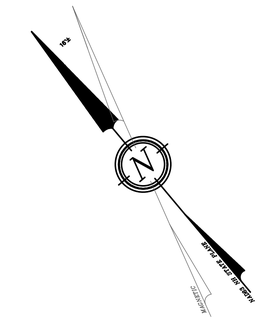
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

SITE SPECIFIC SOILS MAP
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 60 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
NO. 805
KENNETH A. BERRY
LICENSED LAND SURVEYOR
SIGNATURE



DISTURBANCE PER PHASES:

PHASE 1: 358,865 Sq. Ft., 8.24 Ac.

- WATERLINE AND SEWER EXTENSIONS TO EVELYN DRIVE.
- CONSTRUCTION OF EVELYN DRIVE, AND ASSOCIATED UTILITIES & DRAINAGE FACILITIES BETWEEN 34+75 TO 24+50
- CONSTRUCTION OF A HAMMERHEAD BUILT TO THE SATISFACTION OF THE FIRE DEPARTMENT

PHASE 2: 56,975 Sq. Ft., 1.31 Ac.

- INFRASTRUCTURE PROPOSED AS PART OF THE INTERSECTION RE-DESIGN OF PORTLAND AND FRANKLIN STREET.
- SEWER EXTENSION TO THE PROJECT SITE
- CONSTRUCTION OF EVELYN DRIVE TO 2+00 WITH A HAMMERHEAD BUILT TO THE SATISFACTION OF THE FIRE DEPARTMENT

PHASE 3: 177,069 Sq. Ft., 4.06 Ac.

- CONSTRUCTION OF EVELYN DRIVE, AND ASSOCIATED UTILITIES & DRAINAGE FACILITIES BETWEEN 2+00-12+50
- CONSTRUCTION OF THE DRAIN LINE BETWEEN DMH 104 & 105, WITH PROPER COVER AND INSTALL DMH 105
- CONSTRUCTION OF A HAMMERHEAD BUILT TO THE SATISFACTION OF THE FIRE DEPARTMENT
- CONSTRUCTION OF THE DESIGNED WATER FROM PHASE 2 THROUGH PHASE 4 TO PHASE 3.

PHASE 4: 355,320 Sq. Ft., 8.15 Ac.

- ALL REMAINING INFRASTRUCTURE.

PURSUANT TO THE ALTERATION OF TERRAIN RULES, THE ROAD IS TO BE BUILT AND STABILIZED PRIOR TO THE LOT DEVELOPMENT.

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

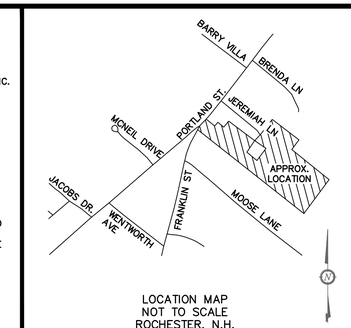
2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq. Ft. 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) THE INTENT OF THIS PLAN IS TO SHOW THE FOUR PHASES OF STUART ACRES.

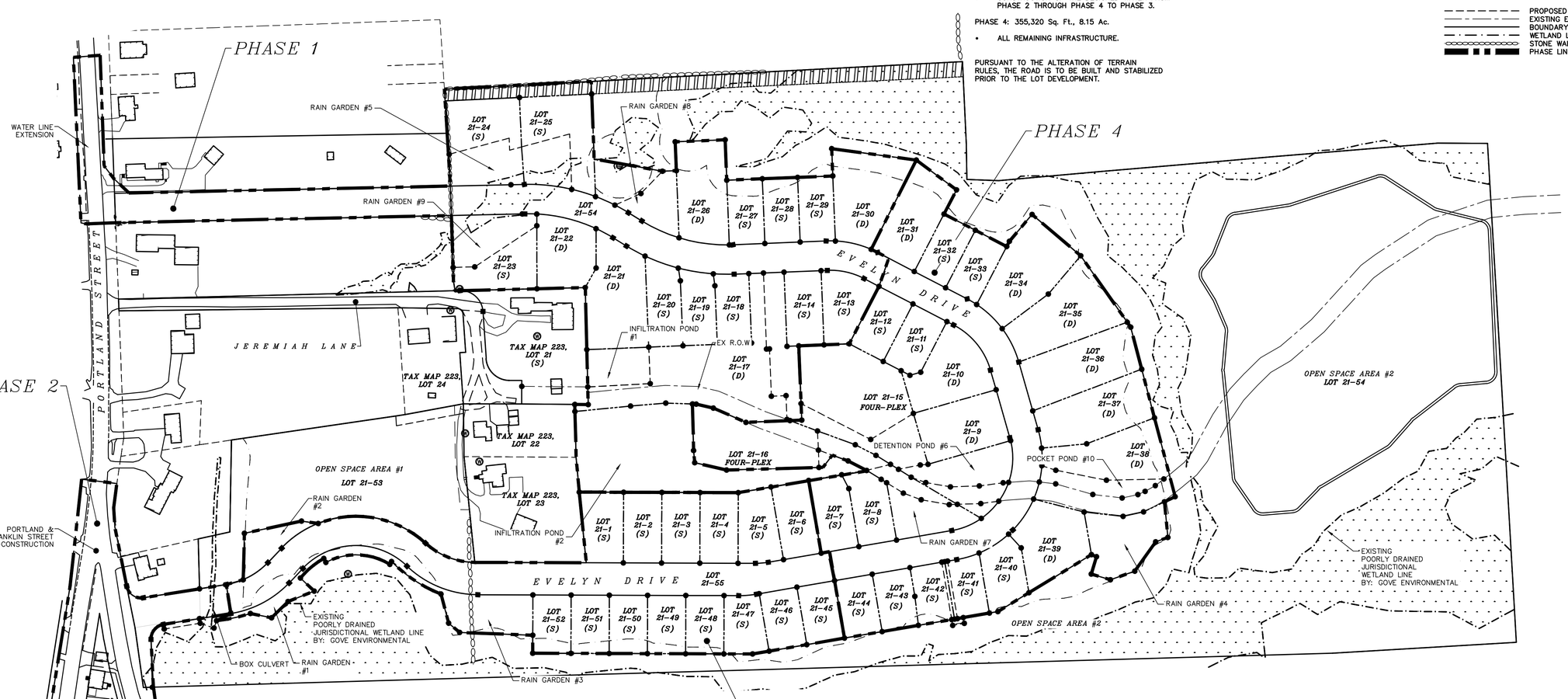
6.) A TEMPORARY HAMMERHEAD WILL BE NEEDED IN THE VICINITY OF LOTS 13 AND 30. NOT BUILDING PERMITS WILL BE ISSUED UNTIL THE HAMMERHEAD IS REMOVED AND PROPER FRONTAGE IS CREATED.



LOCATION MAP
NOT TO SCALE
ROCHESTER, N.H.

LEGEND:

- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BOUNDARY LINE
- WETLAND LINE
- STONE WALL
- PHASE LINE



FINAL APPROVAL BY ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER – 1:10,000 –
9-05-18
KENNETH A. BERRY LLS 805 DATE

GRAPHIC SCALE
100 0 50 100 200 400
(IN FEET)
1 inch = 100 ft.

WHETHER OR NOT OTHERWISE EXPRESSLY RECITED ON THIS SUBDIVISION PLAN, THE SUBDIVISION APPROVAL GRANTED IS CONDITIONED ON FAITHFUL AND DILIGENT ADHERENCE BY THE OWNER/SUBDIVIDER/DEVELOPER OF ALL TERMS, CONDITIONS, PROVISIONS AND SPECIFICATIONS OF THE CITY OF ROCHESTER LAND SUBDIVISION REGULATIONS AS AMENDED OR AS MAY LATER BE AMENDED, IN EFFECT ON THE DATE OF APPROVAL, UNLESS OR EXCEPT INSOFAR AS EXPRESSLY WAIVED, IN ANY PARTICULAR, BELOW. NON – ADHERENCE MAY RESULT IN A REVOCATION OF APPROVAL. ANY VARIATION FROM THE APPROVED PLAN WILL REQUIRE A RESUBMISSION FOR SUBDIVISION APPROVAL.

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
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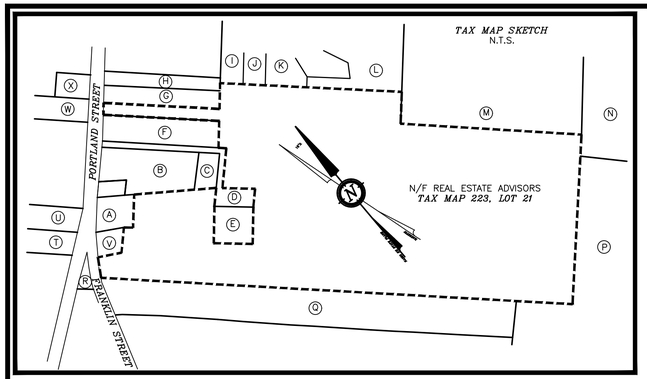
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

PHASING PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 100 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE No. 805 KENNETH A BERRY LICENSED LAND SURVEYOR SIGNATURE



(A) N/F BENTON, JAMES & JANE
579 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 82
S.C.R.D. BOOK 2042, PAGE 195

(B) N/F HUPPE, LEO & EVELYN
589 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 25

(C) N/F METAYER FAMILY REV. TRUST
21 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 24
S.C.R.D. BOOK 3985, PAGE 391

(D) N/F ELWELL, BETTY
32 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 22
S.C.R.D. BOOK 2006, PAGE 713

(E) N/F WEINBERG, LINDA & BURGESS, HAROLD
36 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 23
S.C.R.D. BOOK 2660, PAGE 716

(F) N/F DILLOW, TROY
PO BOX 1464
ROCHESTER, NH 03867
TAX MAP 223, LOT 19
S.C.R.D. BOOK 3891, PAGE 308

(G) N/F ERICKSON, LOIS
603 PORTLAND STREET #A
ROCHESTER, NH 03867
TAX MAP 223, LOT 18

(H) N/F STROGEN, ROBERT & SHEILA
27 QUARRY DRIVE
ROCHESTER, NH 03867
TAX MAP 223, LOT 17
S.C.R.D. BOOK 4030, PAGE 498

(I) N/F UNGER–MOCHRIE, LESLEY
25 BRENDA LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 13–9
S.C.R.D. BOOK 4133, PAGE 688

(J) N/F CARON, JULIE & BUBAR, RYAN
31 BRENDA LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 13–8
S.C.R.D. BOOK 4139, PAGE 223

(K) N/F MARTIN, PAUL
35 BRENDA LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 13–7
S.C.R.D. BOOK 4222, PAGE 250

(L) N/F GARDNER, WILLIAM & MARY
26 BRENDA LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 13–14
S.C.R.D. BOOK 3417, PAGE 890

(M) N/F CURTIS, KELLY & MICHELLE
43 STONEWALL DRIVE
ROCHESTER, NH 03867
TAX MAP 223, LOT 11–16
S.C.R.D. BOOK 4151, PAGE 771

(N) N/F HUPPE, LEO & EVELYN
589 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 12
S.C.R.D. BOOK 507, PAGE 304

(P) N/F CHAMBERLAIN INVEST PROP., LLC.
PO BOX 645
IPSWICH, MA 01938
TAX MAP 119, LOT 100
S.C.R.D. BOOK 2070, PAGE 652

(Q) N/F LIBBY, SHAWN & DAWN
4 HOWE STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 84
S.C.R.D. BOOK 4020, PAGE 151

(R) N/F GALEUCIA, PETER
567 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 96
S.C.R.D. BOOK 4310, PAGE 467

(T) N/F WARREN, SYLVIA
576 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 76

(U) N/F HOUSE, RICHARD & DEBORAH
578 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 77
S.C.R.D. BOOK 3419, PAGE 1

(V) N/F CALER, HAROLD E. SR & DOROTHY
151 FRANKLIN STREET
ROCHESTER, NH 03867–2417
TAX MAP 111, LOT 83
S.C.R.D. BOOK 840, PAGE 43

(W) N/F SPEROPOLOUS, LISA I
600 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 26
S.C.R.D. BOOK 3754, PAGE 729

(X) N/F MONTINI, CHRISTINA & DONLON, TYLER R.
604 PORTLAND STREET
ROCHESTER, NH 03867–2428
TAX MAP 223, LOT 27

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

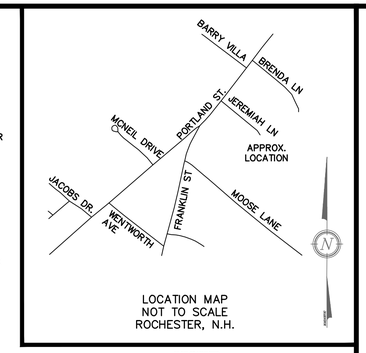
4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

6.) A VARIANCE WAS GRANTED BY THE ROCHESTER ZRA TO ALLOW THE DUPLEX LOTS TO HAVE 60' OF FRONT AGE, CASE #16–37

7.) I HEREBY CERTIFY THAT, TO THE BEST OF MY KNOWLEDGE & BELIEF, THIS PARCEL DOES NOT FALL WITHIN THE FLOOD PLAIN FLOOD HAZARD REF.: FEMA COMMUNITY# –330150, MAP# – 33017C0204D & 33017C0212D, DATED: MAY 17, 2005

8.) VERTICAL DATUM BASED ON NAVD88 ELEVATIONS. HORIZONTAL COORDINATES BASED ON NAD83. COORDINATES GATHERED USING TOPCON HIPER SR SURVEY GRADE GPS RECEIVERS.



LOCATION MAP
NOT TO SCALE
ROCHESTER, N.H.

NOTES CONTINUED:

9.) AREAS DESIGNATED AS OPEN SPACE SHALL BE SET ASIDE AS SUCH IN PERPETUITY, FREE OF ANY ROADS, DEVELOPMENT OR SUBDIVISION.

10.) CONTRACTOR IS TO AVOID COMPACTION IN THE RAIN GARDEN AREAS DURING CONSTRUCTION.

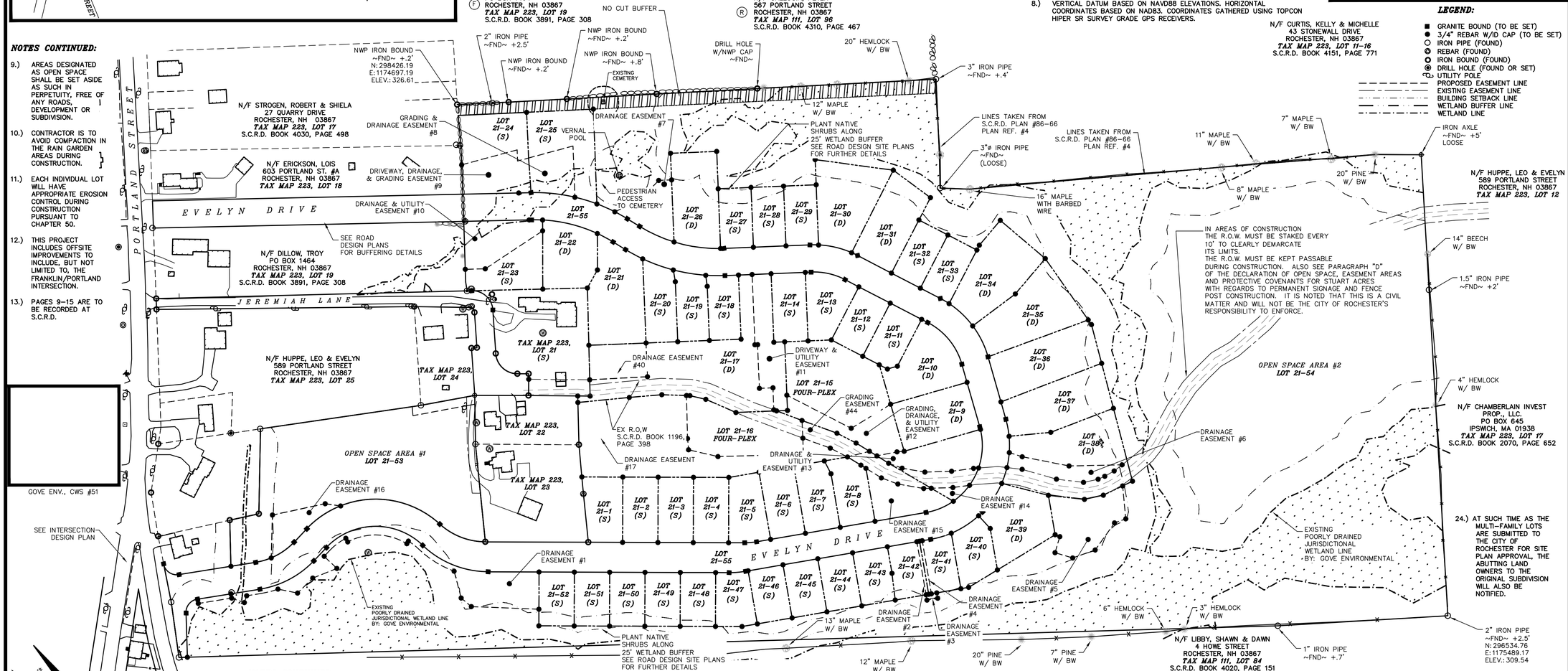
11.) EACH INDIVIDUAL LOT WILL HAVE APPROPRIATE EROSION CONTROL DURING CONSTRUCTION PURSUANT TO CHAPTER 50.

12.) THIS PROJECT INCLUDES OFFSITE IMPROVEMENTS TO INCLUDE, BUT NOT LIMITED TO, THE FRANKLIN/PORTLAND INTERSECTION.

13.) PAGES 9–15 ARE TO BE RECORDED AT S.C.R.D.

LEGEND:

- ■ GRANITE BOUND (TO BE SET)
- ● 3/4" REBAR W/I.D CAP (TO BE SET)
- ○ IRON PIPE (FOUND)
- ⊗ REBAR (FOUND)
- ⊙ IRON BOUND (FOUND)
- ◉ DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE



NOTES CONTINUED:

14.) EACH LOT IS ONLY ALLOWED A MAXIMUM OF 35% IMPERVIOUS SURFACES. A PLOT PLAN WILL BE REQUIRED FOR EACH BUILDING PERMIT CERTIFYING THE PROPOSED COVERAGE

15.) EACH LOT WILL REQUIRE A FOUNDATION CERTIFICATION. IT IS ADVISED THAT EACH HOUSE BE STAKED OUT BY A LLS PRIOR TO CONSTRUCTION

16.) DUPLEXES ARE TO EITHER HAVE GARAGES TO HOUSE TWO CARS PER UNIT OR SPACE IN THE DRIVEWAY OUTSIDE THE RIGHT OF WAY FOR TWO CARS PER UNIT

17.) A CONSTRUCTION ZONE SIGN MUST BE ERECTED PER SUBDIVISION, REGULATION 6.2.3.4

18.) ARCHITECTURAL DESIGNS ARE NOT PART OF THIS APPROVAL HOWEVER PORCHES AND BUMPOUTS WILL BE USED IN THE FINAL DESIGNS

19.) NOTE RESIDENTIAL SITE REVIEWS ARE REQUIRED ON LOTS 21–16 AND 21–17 PRIOR TO BUILDING APPLICABLE PERMIT. ZONING REGULATIONS ARE TO BE ADHERED TO.

20.) TEST PITTING ON SOME OF THE LOTS WITHIN THIS SUBDIVISION REVEALED SEASONAL HIGH WATER TABLES WITHIN 24" OF THE SURFACE. TEST HOLE DATA CAN BE FOUND AT THE CITY OF ROCHESTER PLANNING OFFICE AND LOCATIONS ON THE ENCLOSED PLAN SET. IT IS INCUMBENT ON THE FUTURE OWNERS / BUILDERS TO REVIEW THIS INFORMATION AND BUILD / DEVELOP USING KNOWN BEST MANAGEMENT PRACTICES FOR THESE CONDITIONS. (FILL / FOUNDATION DRAINAGE)

21.) MOST LOTS WITHIN THIS SUBDIVISION WILL REQUIRE FILL TO BE PLACED AROUND THEM WITH TYPICAL FOUNDATION DRAIN CONSTRUCTION.

22.) THE APPLICANT IS TO WORK WITH THE OWNERS OF 576 AND 600 PORTLAND STREET AS WELL AS DPW TO INSTALL EVERGREEN SHRUBS ALONG THE RIGHT OF WAY LINE TO REDUCE IMPACTS FROM HEADLIGHTS.

OPEN SPACE CALCULATION:

REQUIRED OPEN SPACE:	600,589 Sq.Ft.
TOTAL WETLANDS AREA:	300,668 Sq.Ft.
AREAS > 25% SLOPES:	6,538 Sq.Ft.
OHU EASEMENTS:	2,688 Sq.Ft.
TOTAL BUILDABLE AREA:	1,501,473 Sq.Ft.
TOTAL OPEN SPACE OUTSIDE OF DRAINAGE EASEMENTS & WETLANDS:	601,409 Sq.Ft.
PERCENTAGE OF BUILDABLE AREA REMAINING OPEN SPACE OUTSIDE OF DRAINAGE EASEMENTS:	40%

23.) TRANSFORMERS WITHIN THIS PROJECT ARE TO BE REASONABLY SCREENED AND LANDSCAPED. APPLICANT TO WORK WITH EVERSOURCE.

DENSITY CALCULATION:

GROSS LOT AREA:	1,811,367 Sq.Ft.
VERY POORLY DRAINED SOILS:	19,425 Sq.Ft.
AREAS > 25% SLOPES:	6,538 Sq.Ft.
OHU EASEMENTS:	2,688 Sq.Ft.
MINIMUM LOT SIZE (AGRICULTURAL):	20,000 Sq.Ft.

{(1,811,367 – 19,425 – 6,538 – 2,688) * (0.75)}/20,000 * 1.3 = 86.91

86 HOUSE LOTS ALLOWED BY ADJUSTED TRACT ACREAGE APPROACH.
72 TOTAL UNITS ARE PROPOSED (36 SINGLE FAMILY, 14 DUPLEX {28 UNITS} & 2 FOUR–PLEX {8 UNITS})

WHETHER OR NOT OTHERWISE EXPRESSLY RECITED ON THIS SUBDIVISION PLAN, THE SUBDIVISION APPROVAL GRANTED IS CONDITIONED ON FAITHFUL AND DILIGENT ADHERENCE BY THE OWNER/SUBDIVIDER/DEVELOPER OF ALL TERMS, CONDITIONS, PROVISIONS AND SPECIFICATIONS OF THE CITY OF ROCHESTER LAND SUBDIVISION REGULATIONS AS AMENDED OR AS MAY LATER BE AMENDED, IN EFFECT ON THE DATE OF APPROVAL, UNLESS OR EXCEPT INSOFAR AS EXPRESSLY WAIVED, IN ANY PARTICULAR, BELOW. NON – ADHERENCE MAY RESULT IN A REVOCATION OF APPROVAL. ANY VARIATION FROM THE APPROVED PLAN WILL REQUIRE A RESUBMISSION FOR SUBDIVISION APPROVAL.

FINAL APPROVAL
ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER – 1:10,000 –
9-05-18
KENNETH A. BERRY LLS 805 DATE

GRAPHIC SCALE
100 0 50 100 200 400
(IN FEET)
1 inch = 100 ft.

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

SUBDIVISION OVERVIEW
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 100 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE — NO. 805 — KENNETH A. BERRY — LICENSED LAND SURVEYOR — SIGNATURE

TABLE NOTE:

1.) PROVIDED COVERAGE PERCENTAGE IS BASED ON THE TOTAL CONCEPTUAL IMPERVIOUS FOOT PRINT AT FULL LOT BUILD-OUT AS SHOWN SHEETS 25-28 OF THIS CORRESPONDING PLAN SET.

LOT #	AREA Sq.Ft.	FRONTAGE	COVERAGE
#21	31,509	259.18'	
#21-1	8,318	63.00'	33.98%
#21-2	7,800	65.00'	34.85%
#21-3	7,800	65.00'	34.85%
#21-4	7,800	65.00'	34.85%
#21-5	8,302	77.83'	32.76%
#21-6	8,140	65.00'	33.75%
#21-7	8,039	65.00'	34.17%
#21-8	7,849	65.00'	35.00%
#21-9	13,159	90.00'	34.97%
#21-10	13,687	149.18'	33.59%
#21-11	7,060	65.00'	29.55%
#21-12	7,150	65.00'	29.80%
#21-13	8,769	93.39'	31.93%
#21-14	7,947	63.00'	34.53%
#21-15	44,262	150.00'	
#21-16	70,983	150.03'	
#21-17	47,608	60.00'	11.65%

LOT #	AREA Sq.Ft.	FRONTAGE	COVERAGE
#21-18	6,922	60.30'	29.61%
#21-19	7,273	60.31'	28.09%
#21-20	8,250	60.31'	25.33%
#21-21	18,769	95.56'	32.56%
#21-22	13,186	129.15'	30.69%
#21-23	15,313	120.33'	15.90%
#21-24	18,204	103.01'	29.26%
#21-25	19,204	104.02'	12.68%
#21-26	14,724	86.76'	34.90%
#21-27	6,647	60.43'	31.76%
#21-28	6,600	60.00'	30.87%
#21-29	6,604	60.02'	30.85%
#21-30	16,260	62.72	34.06%
#21-31	13,544	82.35'	34.49%
#21-32	6,600	60.00'	30.71%
#21-33	6,606	60.04'	30.68%
#21-34	16,695	60.00'	34.93%
#21-35	17,560	63.64'	32.89%

LOT #	AREA Sq.Ft.	FRONTAGE	COVERAGE
#21-36	16,849	86.36'	34.45%
#21-37	16,090	65.22'	34.36%
#21-38	27,039	88.55'	24.19%
#21-39	13,457	73.68'	34.81%
#21-40	7,510	60.00'	34.65%
#21-41	6,003	60.33'	34.31%
#21-42	6,001	60.00'	34.65%
#21-43	6,374	65.00'	31.86%
#21-44	6,435	65.00'	31.86%
#21-45	6,435	65.00'	31.86%
#21-46	6,435	65.00'	31.86%
#21-47	6,811	60.01'	31.86%
#21-48	6,435	65.00'	29.80%
#21-49	6,435	65.00'	31.40%
#21-50	6,435	65.00'	28.40%
#21-51	6,435	65.00'	31.41%
#21-52	6,435	65.00'	31.26%
#21-53	85,328	N/A	N/A
#21-54	840,884	N/A	N/A

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL-AGRICULTURAL DISTRICT WITH MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

LEGEND:

- GRANITE BOUND (TO BE SET)
- 3/4" REBAR W/ID CAP (TO BE SET)
- IRON PIPE (FOUND)
- REBAR (FOUND)
- IRON BOUND (FOUND)
- DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

GOVE ENV., CWS #51

N/F HUPPE, LEO & EVELYN
589 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 25

N/F METAYER FAMILY REV. TRUST
21 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 24
S.C.R.D. BOOK 3985, PAGE 391

JEREMIAH LANE

LOT 21
31,509 Sq.Ft.
(S)

EXISTING 30' WIDE EASEMENT LINE (TYP.)
S.C.R.D. BOOK 1196, PAGE 398

DRAINAGE EASEMENT

LOT 21-17
47,608 Sq.Ft.
(D)

IRON AXLE ~FND~ FLUSH

2" IRON PIPE ~FND~ +3.6'

"BS&E" IRON BOUND ~FND~ (FLUSH)

3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)

PSNH 2/67G

PROPOSED ACCESS EASEMENT FOR THE BENEFIT OF TAX MAP 223, LOT 25
1,865 Sq.Ft.
0.04 Ac.

N/F ELWELL, BETTY
32 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 22
S.C.R.D. BOOK 2006, PAGE 713

EXISTING HOUSE

EXISTING GARAGE

EXISTING WELL

1 3/4" IRON PIPE ~FND~ +2.5'

LOT 21-16
70,983 Sq.Ft.
(M)

EXISTING HOUSE

EXISTING DRIVEWAY

EXISTING 15' R.O.W.
S.C.R.D. BOOK 542, PAGE 42
SEE EXISTING CONDITIONS PLAN AND PLAN REF. #3 FOR METES AND BOUNDS

PROPOSED BOUNDARY LINE (TYP.)

N/F WEINBERG, LINDA & BURGESS, HAROLD
26 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 23
S.C.R.D. BOOK 2660, PAGE 716

LOT 21-1
8,318 Sq.Ft.
(S)

OPEN SPACE AREA #1
LOT 21-53
85,328 Sq.Ft.
1.96 Ac.

LOT 21-55
AREA OF EVELYN DRIVE
176,744 Sq.Ft.
4.05 Ac.

GRADING & DRAINAGE EASEMENT #16
5,201 Sq.Ft.
0.12 Ac.

50' WETLANDS BUFFER LINE(TYP.)

GRANITE BOUND ~TO BE SET~ (TYP.)

EVELYN DRIVE

N/F BENTON, JAMES & JANE
579 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 82
S.C.R.D. BOOK 2042, PAGE 195

"MOTT SURVEY" IRON BOUND ~FND~ (0.1' HIGH)

IRON BOUND ~FND~ (FLUSH)

N/F CALER, HAROLD & DOROTHY
151 FRANKLIN STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 83
S.C.R.D. BOOK 840, PAGE 43

EXISTING HOUSE

GRANITE BOUND ~TO BE SET~ (TYP.)

EXISTING WELL TO BE ABANDONED

3/4" IRON PIPE ~FND~ +.6' NOT HELD FOR THIS SUBDIVISION

SEE INTERSECTION DESIGN PLAN

1" IRON PIPE ~FND~ +.6'

FRANKLIN STREET

EXISTING POORLY DRAINED JURISDICTIONAL WETLAND LINE
BY: GOVE ENVIRONMENTAL

3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)

GRADING & DRAINAGE EASEMENT #1
16,712 Sq.Ft.
0.38 Ac.

OPEN SPACE AREA #2
LOT 21-54
840,884 Sq.Ft.
19.3 Ac.

LOT 21-51
6,435 Sq.Ft.
(S)

LOT 21-52
6,435 Sq.Ft.
(S)

BUILDING SETBACK LINE (TYP.)

NON-CONCENTRIC CURVES

PROPOSED EASEMENT LINE (TYP.)

50' WETLANDS BUFFER LINE(TYP.)

PLANT NATIVE SHRUBS & MULCH BERM ALONG 25' WETLAND BUFFER OR REAR BOUNDARY LINE, WHICHEVER IS MORE RESTRICTIVE
SEE ROAD DESIGN SITE PLANS FOR MORE DETAILS

WHETHER OR NOT OTHERWISE EXPRESSLY RECITED ON THIS SUBDIVISION PLAN, THE SUBDIVISION APPROVAL GRANTED IS CONDITIONED ON FAITHFUL AND DILIGENT ADHERENCE BY THE OWNER/SUBDIVIDER/DEVELOPER OF ALL TERMS, CONDITIONS, PROVISIONS AND SPECIFICATIONS OF THE CITY OF ROCHESTER LAND SUBDIVISION REGULATIONS AS AMENDED OR AS MAY LATER BE AMENDED, IN EFFECT ON THE DATE OF APPROVAL UNLESS OR EXCEPT INSOFAR AS EXPRESSLY WAIVED, IN ANY PARTICULAR, BELOW. NON - ADHERENCE MAY RESULT IN A REVOCATION OF APPROVAL. ANY VARIATION FROM THE APPROVED PLAN WILL REQUIRE A RESUBMISSION FOR SUBDIVISION APPROVAL.

N/F LIBBY, SHAWN & DAWN
4 HOWE STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 84
S.C.R.D. BOOK 4020, PAGE 151

FINAL APPROVAL
BY
ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER - 1:10,000 -
9-05-18
KENNETH A. BERRY LLS 805 DATE

GRAPHIC SCALE
30 0 15 30 60 120
(IN FEET)
1 inch = 30 ft.

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

SUBDIVISION DETAIL PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
NO. 805
KENNETH A. BERRY
LICENSED LAND SURVEYOR
SIGNATURE

WHETHER OR NOT OTHERWISE EXPRESSLY RECITED ON THIS SUBDIVISION PLAN, THE SUBDIVISION APPROVAL GRANTED IS CONDITIONED ON FAITHFUL AND DILIGENT ADHERENCE BY THE OWNER/SUBDIVIDER/DEVELOPER OF ALL TERMS, CONDITIONS, PROVISIONS AND SPECIFICATIONS OF THE CITY OF ROCHESTER LAND SUBDIVISION REGULATIONS AS AMENDED OR AS MAY LATER BE AMENDED, IN EFFECT ON THE DATE OF APPROVAL, UNLESS OR EXCEPT INSOFAR AS EXPRESSLY WAIVED, IN ANY PARTICULAR, BELOW. NON – ADHERENCE MAY RESULT IN A REVOCATION OF APPROVAL. ANY VARIATION FROM THE APPROVED PLAN WILL REQUIRE A RESUBMISSION FOR SUBDIVISION APPROVAL.

LEGEND:

- GRANITE BOUND (TO BE SET)
- 3/4" REBAR W/ID CAP (TO BE SET)
- IRON PIPE (FOUND)
- REBAR (FOUND)
- IRON BOUND (FOUND)
- DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

LOT 21–17 47,608 Sq.Ft. (D)
LOT 21–12 7,150 Sq.Ft. (S)
LOT 21–11 7,060 Sq.Ft. (S)
LOT 21–10 12,835 Sq.Ft. (D)
LOT 21–15 44,262 Sq.Ft. (M)
LOT 21–9 12,059 Sq.Ft. (D)
LOT 21–16 70,983 Sq.Ft. (M)
LOT 21–1 8,318 Sq.Ft. (S)
LOT 21–2 7,800 Sq.Ft. (S)
LOT 21–3 7,800 Sq.Ft. (S)
LOT 21–4 7,800 Sq.Ft. (S)
LOT 21–5 8,302 Sq.Ft. (S)
LOT 21–6 8,140 Sq.Ft. (S)
LOT 21–7 8,039 Sq.Ft. (S)
LOT 21–8 7,849 Sq.Ft. (S)
LOT 21–39 13,457 Sq.Ft. (D)
LOT 21–40 7,510 Sq.Ft. (S)
LOT 21–41 6,003 Sq.Ft. (S)
LOT 21–42 6,001 Sq.Ft. (S)
LOT 21–43 6,374 Sq.Ft. (S)
LOT 21–44 6,435 Sq.Ft. (S)
LOT 21–45 6,435 Sq.Ft. (S)
LOT 21–46 6,435 Sq.Ft. (S)
LOT 21–47 6,811 Sq.Ft. (S)
LOT 21–48 6,435 Sq.Ft. (S)
LOT 21–49 6,435 Sq.Ft. (S)
LOT 21–50 6,435 Sq.Ft. (S)
LOT 21–51 6,435 Sq.Ft. (S)
LOT 21–54 840,884 Sq.Ft. 19.3 Ac.

DRIVEWAY & UTILITY EASEMENT #11 9,794 Sq.Ft. 0.22 Ac.
DRAINAGE EASEMENT #40
GRADING & DRAINAGE EASEMENT #17 38,389 Sq.Ft. 0.88 Ac.
GRADING & DRAINAGE EASEMENT #44 3,394 Sq.Ft. 0.07 Ac.
GRADING, DRAINAGE & UTILITY EASEMENT #12 9,000 Sq.Ft. 0.20 Ac.
GRADING, DRAINAGE, & UTILITY EASEMENT #13 8,812 Sq.Ft. 0.20 Ac.
GRADING & DRAINAGE EASEMENT #14 939 Sq.Ft. 0.02 Ac.
GRADING & DRAINAGE EASEMENT #15 7,855 Sq.Ft. 0.18 Ac.
GRADING & DRAINAGE EASEMENT #4 495 Sq.Ft. 0.01 Ac.
GRADING & DRAINAGE EASEMENT #3 200 Sq.Ft. 0.004 Ac.
AREA OF EVELYN DRIVE 176,744 Sq.Ft. 4.05 Ac.
OPEN SPACE AREA #2

EXISTING 30' WIDE EASEMENT LINE (TYP.) S.C.R.D. BOOK 1196, PAGE 398
EXISTING 30' WIDE EASEMENT LINE(TYP.) S.C.R.D. BOOK 1196, PAGE 398
200' MULTI FAMILY PERIMETER SETBACK/ PROPOSED ESEMENT
PROPOSED BOUNDARY LINE (TYP.)
BUILDING SETBACK LINE (TYP.)
3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)
GRANITE BOUND ~TO BE SET~ (TYP.)
EXISTING/PROPOSED EASEMENT LINE
EXISTING POORLY DRAINED JURISDICTIONAL WETLAND LINE BY: GOVE ENVIRONMENTAL
EXISTING BOUNDARY LINE
PLANT NATIVE SHRUBS & MULCH BERM ALONG 25' WETLAND BUFFER OR REAR BOUNDARY LINE, WHICHEVER IS MORE RESTRICTIVE, SEE ROAD DESIGN. SITE PLANS FOR MORE DETAILS

N/F ELWELL, BETTY & JEREMIAH LANE, ROCHESTER, NH 03867, TAX MAP 223, LOT 22, S.C.R.D. BOOK 2006, PAGE 713
N/F WEINBERG, LINDA & BURGESS, HAROLD 24 JEREMIAH LANE, ROCHESTER, NH 03867, TAX MAP 223, LOT 23, S.C.R.D. BOOK 2860, PAGE 716
N/F LIBBY, SHAWN & DAWN TAX MAP 111, LOT 841
GOVE ENV., CWS #51

"BS&E" IRON BOUND ~FND~ (0.8' HIGH)
REBAR ~FND~ (FLUSH)

EVELYN DRIVE

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER – 1:10,000 –
KENNETH A. BERRY LLS 805 DATE 9-05-18

FINAL APPROVAL BY ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

GRAPHIC SCALE
30 0 15 30 60 120
(IN FEET)
1 inch = 30 ft.

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
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SUBDIVISION DETAIL PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE — No. 805 KENNETH A BERRY — LICENSED LAND SURVEYOR — SIGNATURE

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

LOT 21-40
7,515 Sq.Ft.
(S)

LOT 21-15
44,262 Sq.Ft.
(M)

LOT 21-39
13,457 Sq.Ft.
(D)

LOT 21-9
13,159 Sq.Ft.
(D)

LOT 21-10
12,835 Sq.Ft.
(D)

LOT 21-11
7,060 Sq.Ft.
(S)

LOT 21-12
7,150 Sq.Ft.
(S)

LOT 21-30
13,908 Sq.Ft.
(D)

LOT 21-31
13,544 Sq.Ft.
(S)

LOT 21-32
6,600 Sq.Ft.
(S)

LOT 21-33
6,606 Sq.Ft.
(S)

LOT 21-34
16,695 Sq.Ft.
(D)

LOT 21-35
17,560 Sq.Ft.
(D)

LOT 21-36
16,849 Sq.Ft.
(D)

LOT 21-37
16,090 Sq.Ft.
(D)

LOT 21-38
27,039 Sq.Ft.
14,179 Sq.Ft.
(D)

LOT 21-54
840,884 Sq.Ft.
19.3 Ac.

AREA LOT 21-55 OF EVELYN DRIVE
176,144 Sq.Ft.
4.05 Ac.

EVELYN DRIVE

GRADING, DRAINAGE, & UTILITY EASEMENT #3
8,828 Sq.Ft.
0.20 Ac.

GRADING & DRAINAGE EASEMENT #5
11,880 Sq.Ft.
0.27 Ac.

OPEN SPACE AREA #2

50' WETLANDS BUFFER LINE (TYP.)

EXISTING/PROPOSED EASEMENT LINE

EXISTING 30' WIDE EASEMENT LINE (TYP.) S.C.R.D. BOOK 1196, PAGE 398

BUILDING SETBACK LINE (TYP.)

3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)

GRANITE BOUND ~TO BE SET~ (TYP.)

EXISTING POORLY DRAINED JURISDICTIONAL WETLAND LINE BY: GOVE ENVIRONMENTAL

3" IRON PIPE ~FND~ +3' SHOT ON TOP LOOSE NEAR 24" PINE

N/F CURTIS, KELLY & MICHELLE
43 STONEWALL DRIVE
ROCHESTER, NH 03867
TAX MAP 223, LOT 11-16
S.C.R.D. BOOK 4151, PAGE 771

LEGEND:

- GRANITE BOUND (TO BE SET)
- 3/4" REBAR W/ID CAP (TO BE SET)
- IRON PIPE (FOUND)
- REBAR (FOUND)
- IRON BOUND (FOUND)
- DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

GRAPHIC SCALE
30 0 15 30 60 120
(IN FEET)
1 inch = 30 ft.

NAD83 NH STATE PLANE
MAGNETIC

GOVE ENV., CWS #51

WHETHER OR NOT OTHERWISE EXPRESSLY RECITED ON THIS SUBDIVISION PLAN, THE SUBDIVISION APPROVAL GRANTED IS CONDITIONED ON FAITHFUL AND DILIGENT ADHERENCE BY THE OWNER/SUBDIVIDER/DEVELOPER OF ALL TERMS, CONDITIONS, PROVISIONS AND SPECIFICATIONS OF THE CITY OF ROCHESTER LAND SUBDIVISION REGULATIONS AS AMENDED OR AS MAY LATER BE AMENDED, IN EFFECT ON THE DATE OF APPROVAL, UNLESS OR EXCEPT INSOFAR AS EXPRESSLY WAIVED, IN ANY PARTICULAR, BELOW. NON – ADHERENCE MAY RESULT IN A REVOCATION OF APPROVAL. ANY VARIATION FROM THE APPROVED PLAN WILL REQUIRE A RESUBMISSION FOR SUBDIVISION APPROVAL.

FINAL APPROVAL
BY
ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER – 1:10,000 –
9-05-18
KENNETH A. BERRY LLS 805 DATE

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

SUBDIVISION DETAIL PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE LICENSED LAND SURVEYOR
No. 805
KENNETH A. BERRY
SIGNATURE

GRAPHIC SCALE

30 0 15 30 60 120

(IN FEET)
1 inch = 30 ft.

MAGNETIC NORTH

LOT 21-15
44,262 Sq.Ft.
(M)

LOT 21-11
7,159 Sq.Ft.
(S)

LOT 21-12
7,150 Sq.Ft.
(S)

LOT 21-13
8,769 Sq.Ft.
(S)

LOT 21-14
7,947 Sq.Ft.
(S)

LOT 21-17
47,608 Sq.Ft.
(D)

LOT 21-18
6,922 Sq.Ft.
(S)

LOT 21-19
7,273 Sq.Ft.
(S)

LOT 21-20
8,250 Sq.Ft.
(S)

LOT 21-21
17,554 Sq.Ft.
(D)

LOT 21-22
11,434 Sq.Ft.
(D)

LOT 21-23
17,618 Sq.Ft.
0.40 Ac.
(S)

LOT 21-24
18,204 Sq.Ft.
0.42 Ac.
(S)

LOT 21-25
19,204 Sq.Ft.
0.44 Ac.
(S)

LOT 21-26
14,724 Sq.Ft.
(D)

LOT 21-27
6,647 Sq.Ft.
(S)

LOT 21-28
6,600 Sq.Ft.
(S)

LOT 21-29
6,604 Sq.Ft.
(S)

LOT 21-30
16,260 Sq.Ft.
(D)

LOT 21-31
12,044 Sq.Ft.
(D)

LOT 21-32
6,600 Sq.Ft.
(S)

LOT 21-54
840,884 Sq.Ft.
19.30 Ac.

TAX MAP 223, LOT 21
31,509 Sq.Ft.
(S)

LOT 21-55 AREA OF EVELYN DRIVE
176,744 Sq.Ft.
4.06 Ac.

DRIVEWAY & UTILITY EASEMENT #11
9,794 Sq.Ft.
0.22 Ac.

GRADING & DRAINAGE EASEMENT #10
6,642 Sq.Ft.
0.15 Ac.

GRADING & DRAINAGE EASEMENT #7
6,540 Sq.Ft.
0.15 Ac.

GRADING & DRAINAGE EASEMENT #8
7,628 Sq.Ft.
0.17 Ac.

DRIVEWAY GRADING & DRAINAGE EASEMENT #9
6,863 Sq.Ft.
0.15 Ac.

GRADING, DRAINAGE, & UTILITY EASEMENT #10
8,432 Sq.Ft.
0.19 Ac.

OPEN SPACE AREA #2

EVELYN DRIVE

JEREMIAH LANE

EXISTING TRAIL

EXISTING 30' WIDE EASEMENT LINE (TYP.)

EXISTING 30' WIDE TRAIL EASEMENT LINE (TYP.) S.C.R.D. BOOK 1196, PAGE 398

BUILDING SETBACK LINE (TYP.)

EXISTING BUILDING TO BE REMOVED

EXISTING WELL

EXISTING BARN

EXISTING DRIVEWAY

EXISTING HOUSE

PSNH 2/67E W/ GUY WIRE

VERNAL POOL

PEDESTRIAN ACCESS THROUGH THE OPEN SPACE TO CEMETERY

50' BUFFER

EDGE OF POORLY DRAINED JURISDICTIONAL WETLANDS, EACH UNDER 0.5 AC. NO BUFFER REQUIRED BY: BY: GOVE ENVIRONMENTAL

EXISTING POORLY DRAINED JURISDICTIONAL WETLAND LINE BY: GOVE ENVIRONMENTAL

50' WETLAND BUFFER LINE (TYP.)

PLANT NATIVE SHRUBS & MULCH BERM ALONG 25' WETLAND BUFFER
SEE ROAD DESIGN SITE PLANS FOR MORE DETAILS

3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)

"BS&E" IRON BOUND ~FND~ FLUSH

"BS&E" IRON BOUND ~FND~ +.6'

"BS&E" IRON BOUND NO HELD FOR THIS SUBDIVISION

GRANITE BOUND ~TO BE SET~ (TYP.)

NO CUT BUFFER

NWP IRON BOUND ~FND~ +.2'

2" IRON PIPE ~FND~ +2.5'

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

LEGEND:

- GRANITE BOUND (TO BE SET)
- 3/4" REBAR W/ID CAP (TO BE SET)
- IRON PIPE (FOUND)
- REBAR (FOUND)
- IRON BOUND (FOUND)
- DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

FINAL APPROVAL
BY
ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER – 1:10,000 –
KENNETH A. BERRY LLS 805 9-05-18 DATE

GOVE ENV., CWS #51

WHETHER OR NOT OTHERWISE EXPRESSLY RECITED ON THIS SUBDIVISION PLAN, THE SUBDIVISION APPROVAL GRANTED IS CONDITIONED ON FAITHFUL AND DILIGENT ADHERENCE BY THE OWNER/SUBDIVIDER/DEVELOPER OF ALL TERMS, CONDITIONS, PROVISIONS AND SPECIFICATIONS OF THE CITY OF ROCHESTER LAND SUBDIVISION REGULATIONS AS AMENDED OR AS MAY LATER BE AMENDED, IN EFFECT ON THE DATE OF APPROVAL, UNLESS OR EXCEPT INSOFAR AS EXPRESSLY WAIVED, IN ANY PARTICULAR, BELOW. NON – ADHERENCE MAY RESULT IN A REVOCATION OF APPROVAL. ANY VARIATION FROM THE APPROVED PLAN WILL REQUIRE A RESUBMISSION FOR SUBDIVISION APPROVAL.

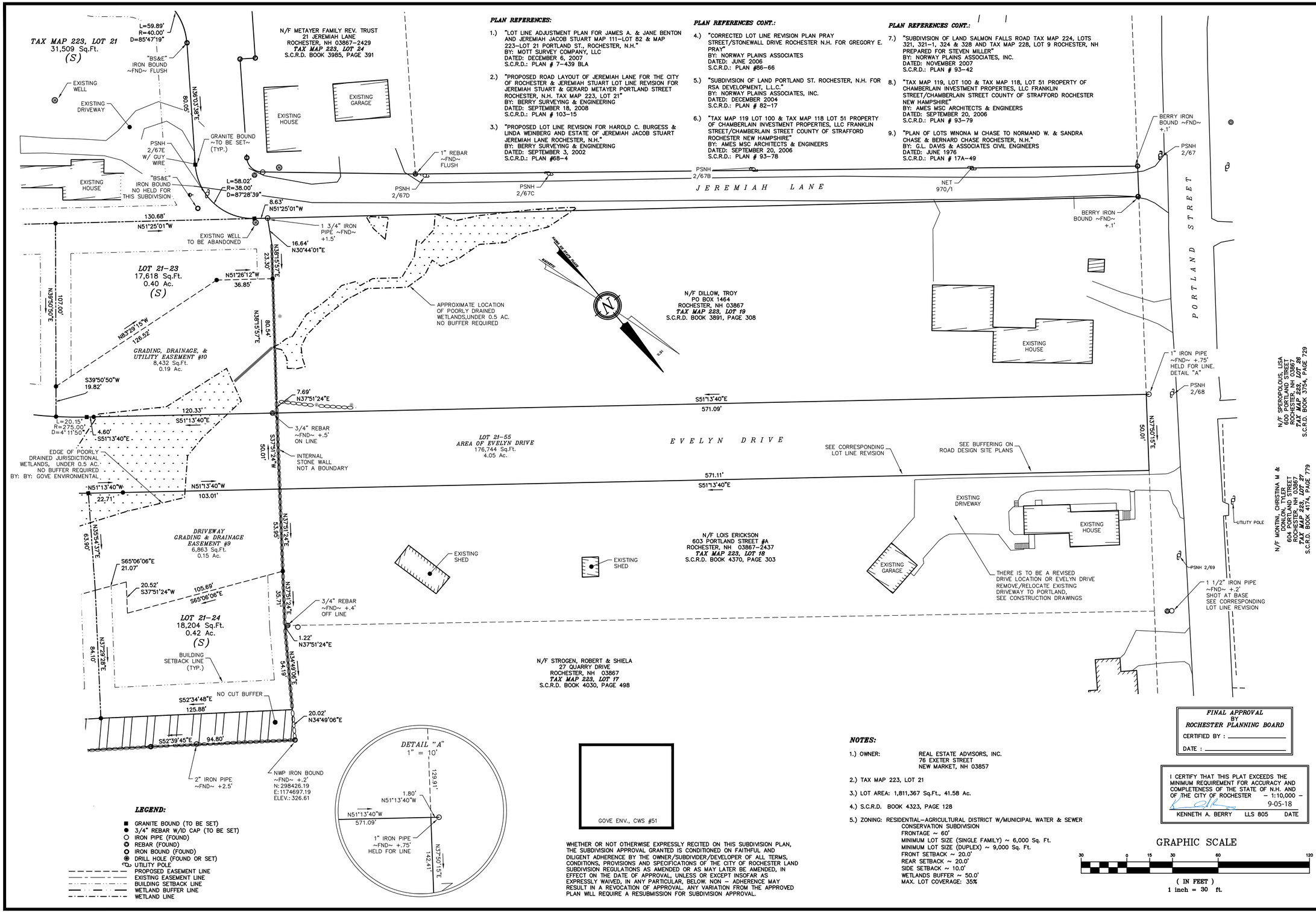
REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

SUBDIVISION DETAIL PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE — No. 805 — KENNETH A. BERRY — LICENSED LAND SURVEYOR — SIGNATURE



PLAN REFERENCES:

1.) "LOT LINE ADJUSTMENT PLAN FOR JAMES A. & JANE BENTON AND JEREMIAH JACOB STUART MAP 111-LOT 82 & MAP 223-LOT 21 PORTLAND ST., ROCHESTER, N.H." BY: MOTT SURVEY COMPANY, LLC DATED: DECEMBER 6, 2007 S.C.R.D.: PLAN # 7-439 BLA

2.) "PROPOSED ROAD LAYOUT OF JEREMIAH LANE FOR THE CITY OF ROCHESTER & JEREMIAH STUART LOT LINE REVISION FOR JEREMIAH STUART & GERARD METAYER PORTLAND STREET ROCHESTER, N.H. TAX MAP 223, LOT 21" BY: BERRY SURVEYING & ENGINEERING DATED: SEPTEMBER 18, 2008 S.C.R.D.: PLAN # 103-15

3.) "PROPOSED LOT LINE REVISION FOR HAROLD C. BURGESS & LINDA WEINBERG AND ESTATE OF JEREMIAH JACOB STUART JEREMIAH LANE ROCHESTER, N.H." BY: BERRY SURVEYING & ENGINEERING DATED: SEPTEMBER 3, 2002 S.C.R.D.: PLAN #68-4

PLAN REFERENCES CONT.:

4.) "CORRECTED LOT LINE REVISION PLAN PRAY STREET/STONEWALL DRIVE ROCHESTER N.H. FOR GREGORY E. PRAY" BY: NORWAY PLAINS ASSOCIATES DATED: JUNE 2006 S.C.R.D.: PLAN #86-66

5.) "SUBDIVISION OF LAND PORTLAND ST. ROCHESTER, N.H. FOR RSA DEVELOPMENT, L.L.C." BY: NORWAY PLAINS ASSOCIATES, INC. DATED: DECEMBER 2004 S.C.R.D.: PLAN # 82-17

6.) "TAX MAP 119 LOT 100 & TAX MAP 118 LOT 51 PROPERTY OF CHAMBERLAIN INVESTMENT PROPERTIES, LLC FRANKLIN STREET/CHAMBERLAIN STREET COUNTY OF STRAFFORD ROCHESTER NEW HAMPSHIRE" BY: AMES MSC ARCHITECTS & ENGINEERS DATED: SEPTEMBER 20, 2006 S.C.R.D.: PLAN # 93-78

PLAN REFERENCES CONT.:

7.) "SUBDIVISION OF LAND SALMON FALLS ROAD TAX MAP 224, LOTS 321, 321-1, 324 & 328 AND TAX MAP 228, LOT 9 ROCHESTER, NH PREPARED FOR STEVEN MILLER" BY: NORWAY PLAINS ASSOCIATES, INC. DATED: NOVEMBER 2007 S.C.R.D.: PLAN # 93-42

8.) "TAX MAP 119, LOT 100 & TAX MAP 118, LOT 51 PROPERTY OF CHAMBERLAIN INVESTMENT PROPERTIES, LLC FRANKLIN STREET/CHAMBERLAIN STREET COUNTY OF STRAFFORD ROCHESTER NEW HAMPSHIRE" BY: AMES MSC ARCHITECTS & ENGINEERS DATED: SEPTEMBER 20, 2006 S.C.R.D.: PLAN # 93-79

9.) "PLAN OF LOTS WINONA M CHASE TO NORMAND W. & SANDRA CHASE & BERNARD CHASE ROCHESTER, N.H." BY: G.L. DAVIS & ASSOCIATES CIVIL ENGINEERS DATED: JUNE 1976 S.C.R.D.: PLAN # 17A-49

LEGEND:

- GRANITE BOUND (TO BE SET)
- 3/4" REBAR W/ID CAP (TO BE SET)
- IRON PIPE (FOUND)
- REBAR (FOUND)
- IRON BOUND (FOUND)
- DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC. 76 EXETER STREET NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL-AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

WHETHER OR NOT OTHERWISE EXPRESSLY RECITED ON THIS SUBDIVISION PLAN, THE SUBDIVISION APPROVAL GRANTED IS CONDITIONED ON FAITHFUL AND DILIGENT ADHERENCE BY THE OWNER/SUBDIVIDER/DEVELOPER OF ALL TERMS, CONDITIONS, PROVISIONS AND SPECIFICATIONS OF THE CITY OF ROCHESTER LAND SUBDIVISION REGULATIONS AS AMENDED OR AS MAY LATER BE AMENDED, IN EFFECT ON THE DATE OF APPROVAL, UNLESS OR EXCEPT INSOFAR AS EXPRESSLY WAIVED, IN ANY PARTICULAR, BELOW. NON - ADHERENCE MAY RESULT IN A REVOCATION OF APPROVAL. ANY VARIATION FROM THE APPROVED PLAN WILL REQUIRE A RESUBMISSION FOR SUBDIVISION APPROVAL.

FINAL APPROVAL
BY
ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER - 1:10,000 -
9-05-18
KENNETH A. BERRY LLS 805 DATE

GRAPHIC SCALE
30 0 15 30 60 120
(IN FEET)
1 inch = 30 ft.

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

SUBDIVISION DETAIL PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE — NO. 805 — KENNETH A. BERRY — LICENSED LAND SURVEYOR — SIGNATURE

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

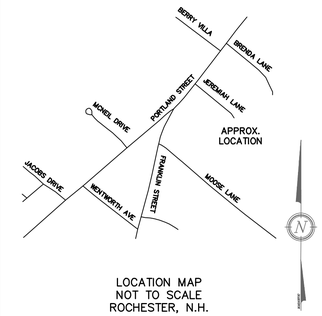
2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

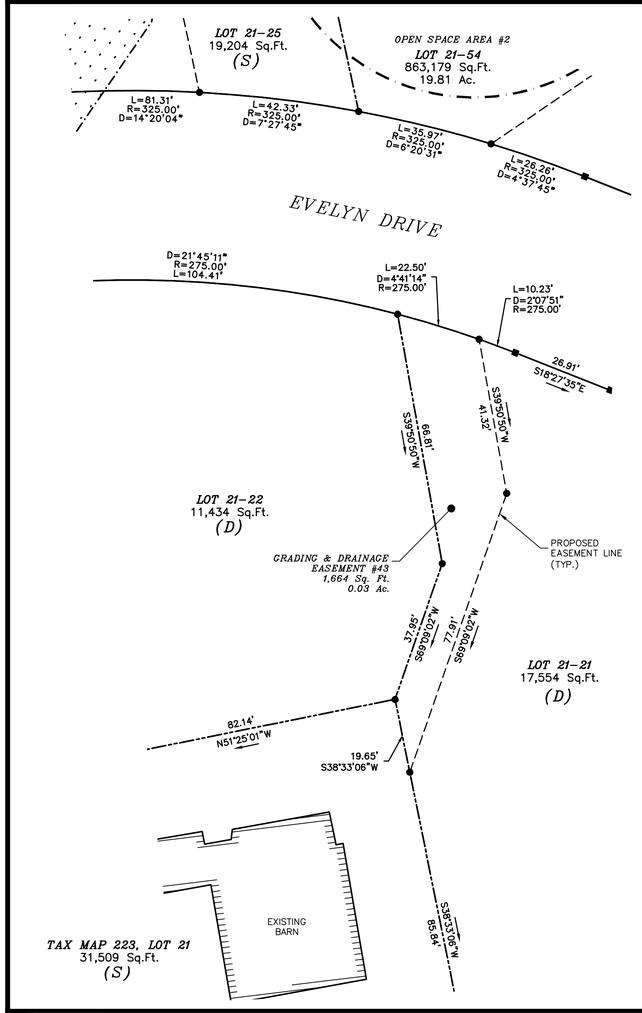
4.) S.C.R.D. BOOK 4323, PAGE 128

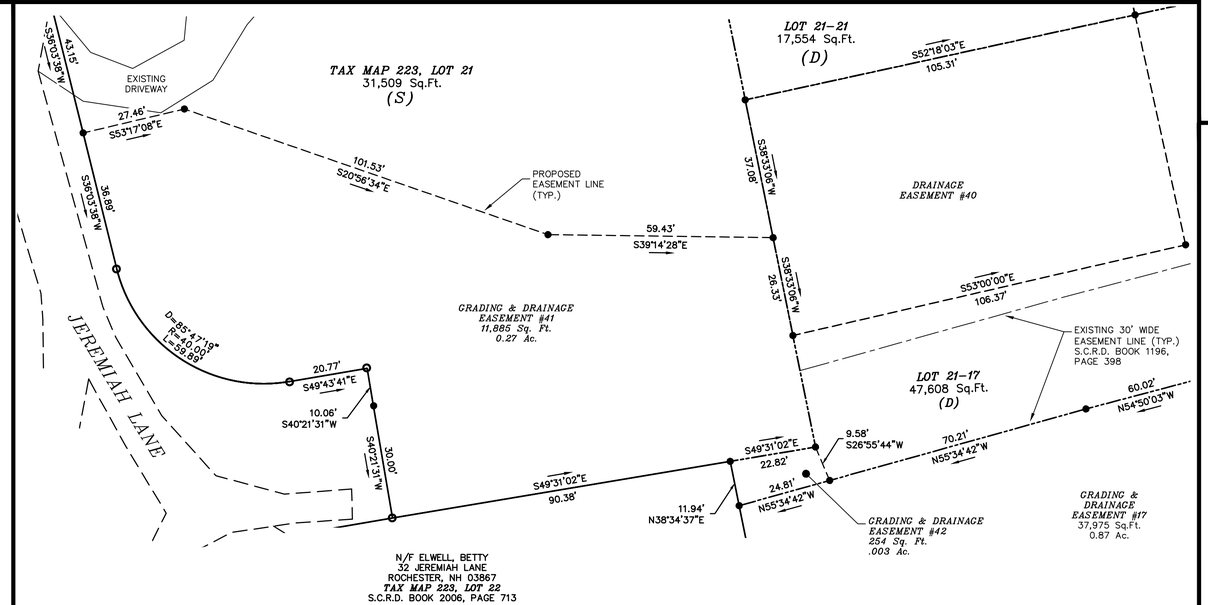
LEGEND:

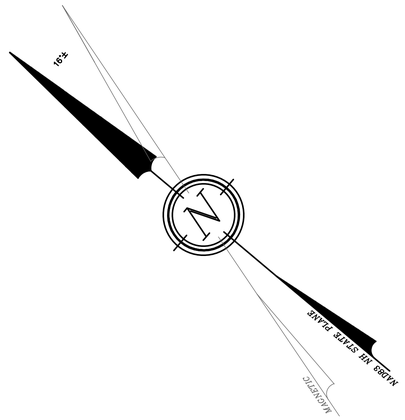
- GRANITE BOUND (TO BE SET)
- 3/4" REBAR W/ID CAP (TO BE SET)
- IRON PIPE (FOUND)
- REBAR (FOUND)
- IRON BOUND (FOUND)
- DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- PROPOSED BOUNDARY LINE



LOCATION MAP
NOT TO SCALE
ROCHESTER, N.H.







GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

GOVE ENV., CWS #51

1. US ARMY CORPS OF ENGINEERS INTERIM REGIONAL SUPPLEMENT TO THE CORPS OF ENGINEERS WETLAND DELINEATION MANUA, VERSION 2: NORTHCENTRAL AND NORTHEAST REGION, TECHNICAL REPORT ERDC/EL TR-09-19 (JAN 2012).
2. FIELD INDICATORS OF HYDRIC SOILS IN THE UNITED STATES, A GUIDE FOR IDENTIFYING AND DELINEATING HYDRIC SOILS, VERSION 7.0. UNITED STATES DEPARTMENT OF AGRICULTURE (2010).
3. NORTH AMERICAN DIGITAL FLORA: NATIONAL WETLAND PLANT LIST, VERSION 2.2.1 (2009).
4. CLASSIFICATION OF WETLANDS AND DEEPWATER HABITATS OF THE UNITED STATES.

5. WETLANDS WERE DELINEATED LATE SUMMER OF 2015.

USFW MANUAL FWS/OBS-79/31 (1979).

I CERTIFY THAT THIS SURVEY PLAT IS NOT A SUBDIVISION PURSUANT TO THIS TITLE AND THAT THE LINES OF STREETS AND WAYS SHOWN ARE THOSE OF PUBLIC OR PRIVATE STREETS OR WAYS ALREADY ESTABLISHED AND THAT NO NEW WAYS ARE SHOWN.

9-05-18

KENNETH A. BERRY L.L.S. 805 DATE

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

EASEMENT PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE — No. 805 — KENNETH A. BERRY — LICENSED LAND SURVEYOR — SIGNATURE

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

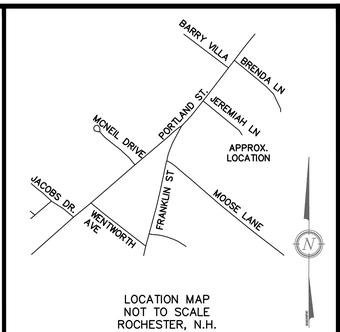
3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

6.) I HEREBY CERTIFY THAT, TO THE BEST OF MY KNOWLEDGE & BELIEF, THIS PARCEL DOES NOT FALL WITHIN THE FLOOD PLAIN FLOOD HAZARD REF.: FEMA COMMUNITY# –330150, MAP# – 33017C0204D & 33017C0212D, DATED: MAY 17, 2005

7.) VERTICAL DATUM BASED ON NAVD88 ELEVATIONS. HORIZONTAL COORDINATES BASED ON NAD83. COORDINATES GATHERED USING TOPCON HIPER SR SURVEY GRADE GPS RECEIVERS.



LOCATION MAP
NOT TO SCALE
ROCHESTER, N.H.

LEGEND:

- ■ GRANITE BOUND (TO BE SET)
- ● 3/4" REBAR W/ID CAP (TO BE SET)
- ○ IRON PIPE (FOUND)
- ⊗ REBAR (FOUND)
- ◎ IRON BOUND (FOUND)
- ◉ DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
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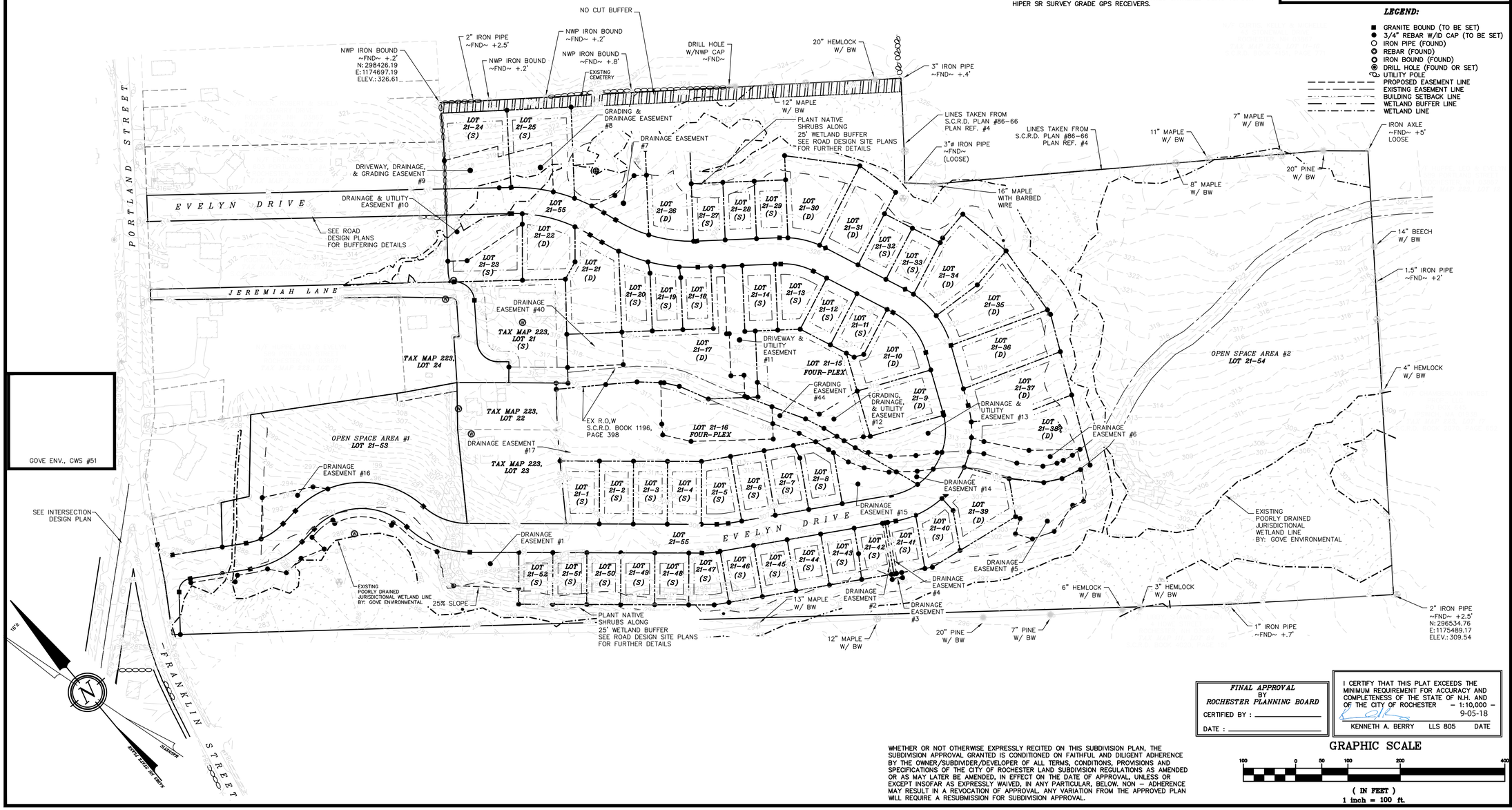

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#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

SUBDIVISION OVERVIEW (TOPOGRAPHY)
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 100 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

FINAL APPROVAL
BY
ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER – 1:10,000 –
9-05-18
KENNETH A. BERRY LLS 805 DATE

STATE OF NEW HAMPSHIRE — LICENSED LAND SURVEYOR
NO. 805
KENNETH A. BERRY
SIGNATURE

WHETHER OR NOT OTHERWISE EXPRESSLY RECITED ON THIS SUBDIVISION PLAN, THE SUBDIVISION APPROVAL GRANTED IS CONDITIONED ON FAITHFUL AND DILIGENT ADHERENCE BY THE OWNER/SUBDIVIDER/DEVELOPER OF ALL TERMS, CONDITIONS, PROVISIONS AND SPECIFICATIONS OF THE CITY OF ROCHESTER LAND SUBDIVISION REGULATIONS AS AMENDED OR AS MAY LATER BE AMENDED, IN EFFECT ON THE DATE OF APPROVAL, UNLESS OR EXCEPT INSOFAR AS EXPRESSLY WAIVED, IN ANY PARTICULAR, BELOW. NON – ADHERENCE MAY RESULT IN A REVOCATION OF APPROVAL. ANY VARIATION FROM THE APPROVED PLAN WILL REQUIRE A RESUBMISSION FOR SUBDIVISION APPROVAL.

GRAPHIC SCALE
100 0 50 100 200 400
(IN FEET)
1 inch = 100 ft.

GOVE ENV., CWS #51

LEGEND:

- GRANITE BOUND (TO BE SET)
- 3/4" REBAR W/ID CAP (TO BE SET)
- IRON PIPE (FOUND)
- REBAR (FOUND)
- IRON BOUND (FOUND)
- DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

N/F HUPPE, LEO & EVELYN
589 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 25

N/F METAYER FAMILY REV. TRUST
21 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 24
S.C.R.D. BOOK 3985, PAGE 391

N/F BENTON, JAMES & JANE
579 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 82
S.C.R.D. BOOK 2042, PAGE 195

N/F CALER, HAROLD & DOROTHY
151 FRANKLIN STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 83
S.C.R.D. BOOK 840, PAGE 43

N/F ELWELL, BETTY
32 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 22
S.C.R.D. BOOK 2006, PAGE 713

N/F WEINBERG, LINDA & BURGESS, HAROLD
26 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 23
S.C.R.D. BOOK 2660, PAGE 716

N/F LIBBY, SHAWN & DAWN
4 HOWE STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 84
S.C.R.D. BOOK 4020, PAGE 151

LOT 21 (S)
LOT 21-17 (D)
LOT 21-16 (M)
LOT 21-1 (S)
LOT 21-51 (S)
LOT 21-52 (S)
LOT 21-53 OPEN SPACE AREA #1
LOT 21-54 OPEN SPACE AREA #2
LOT 21-55 AREA OF EVELYN DRIVE

J E R E M I A H L A N E
E V E L Y N D R I V E
F R A N K L I N S T R E E T

NAD83 NH STATE PLANE MAGNETIC

2" IRON PIPE ~FND~ +3.6'
IRON AXLE ~FND~ FLUSH
"BS&E" IRON BOUND ~FND~ (FLUSH)
EXISTING 30' WIDE EASEMENT LINE (TYP.) S.C.R.D. BOOK 1196, PAGE 398
3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)
PSNH 2/67G
PROPOSED ACCESS EASEMENT FOR THE BENEFIT OF TAX MAP 223, LOT 25 1,865 Sq.Ft. 0.04 Ac.
EXISTING HOUSE
EXISTING GARAGE
EXISTING WELL
1 3/4" IRON PIPE ~FND~ +.2.5'
"BS&E" IRON BOUND ~FND~ (0.8' HIGH)
PROPOSED BOUNDARY LINE (TYP.)
EXISTING 15' R.O.W. S.C.R.D. BOOK 542, PAGE 42 SEE EXISTING CONDIITONS PLAN AND PLAN REF. #3 FOR METES AND BOUNDS
EXISTING DRIVEWAY
REBAR ~FND~ (FLUSH)
"MOTT SURVEY" IRON BOUND ~FND~ (0.1' HIGH)
IRON BOUND ~FND~ (FLUSH)
50' WETLANDS BUFFER LINE(TYP.)
GRADING & DRAINAGE EASEMENT #16
GRADING & DRAINAGE EASEMENT #1
GRANITE BOUND ~TO BE SET~ (TYP.)
EXISTING WELL TO BE ABANDONED
NON-CONCENTRIC CURVES
PROPOSED EASEMENT LINE (TYP.)
BUILDING SETBACK LINE (TYP.)
SEE INTERSECTION DESIGN PLAN
3/4" IRON PIPE ~FND~ +.6' NOT HELD FOR THIS SUBDIVISION
1" IRON PIPE ~FND~ +.6'
EXISTING POORLY DRAINED JURISDICTIONAL WETLAND LINE BY: GOVE ENVIRONMENTAL
T.B.M. HUBSET ELEV.: 289.51
PLANT NATIVE SHRUBS & MULCH BERM ALONG 25' WETLAND BUFFER OR REAR BOUNDARY LINE, WHICHEVER IS MORE RESTRICTIVE SEE ROAD DESIGN SITE PLANS FOR MORE DETAILS

TP#1004 TP#128 TP#1006 TP#1007 TP#133 TP#132 TP#37 TP#35 TP#38 TP#130 TP#36 TP#131 TP#1013 TP#39 TP#41 TP#120 TP#40 TP#121 TP#118 TP#117 TP#119 TP#30

FINAL APPROVAL BY ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER – 1:10,000 –
9-05-18
KENNETH A. BERRY LLS 805 DATE

GRAPHIC SCALE
30 0 15 30 60 120
(IN FEET)
1 inch = 30 ft.

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

SUBDIVISION DETAIL PLAN (TOPOGRAPHY)
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE N.H. LICENSED LAND SURVEYOR 805 KENNETH A. BERRY SIGNATURE

LEGEND:

- ■ GRANITE BOUND (TO BE SET)
- ● 3/4" REBAR W/ID CAP (TO BE SET)
- ○ IRON PIPE (FOUND)
- ⊗ REBAR (FOUND)
- ◉ IRON BOUND (FOUND)
- ◉ DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

GOVE ENV., CWS #51

N/F ELWELL BETTY
32 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 22
S.C.R.D. BOOK 2006, PAGE 713

N/F WEINBERG, LINDA & HAROLD BURGESS, JANE
28 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 23
S.C.R.D. BOOK 2860, PAGE 716

LOT 21-17 (D)
LOT 21-12 (S)
LOT 21-11 (S)
LOT 21-10 (D)
LOT 21-15 (M)
LOT 21-16 (M)
LOT 21-9 (S)
LOT 21-8 (S)
LOT 21-7 (S)
LOT 21-6 (S)
LOT 21-5 (S)
LOT 21-4 (S)
LOT 21-3 (S)
LOT 21-2 (S)
LOT 21-1 (S)
LOT 21-39 (D)
LOT 21-40 (S)
LOT 21-41 (S)
LOT 21-42 (S)
LOT 21-43 (S)
LOT 21-44 (S)
LOT 21-45 (S)
LOT 21-46 (S)
LOT 21-47 (S)
LOT 21-48 (S)
LOT 21-49 (S)
LOT 21-50 (S)
LOT 21-51 (S)
LOT 21-55 AREA OF EVELYN DRIVE

TP#1004, TP#500A, TP#501A, TP#126, TP#127, TP#128, TP#34, TP#125, TP#1006, TP#1005, TP#1008, TP#1009, TP#33, TP#124, TP#1010, TP#1007, TP#32, TP#123, TP#27, TP#31, TP#30, TP#29, TP#28, TP#116, TP#115, TP#114a, TP#24, TP#25, TP#26, TP#23

EXISTING 30' WIDE EASEMENT LINE (TYP.) S.C.R.D. BOOK 1196, PAGE 398
DRIVEWAY & UTILITY EASEMENT #11
UTILITY EASEMENT #12
GRADING, DRAINAGE, & UTILITY EASEMENT #13
GRADING & DRAINAGE EASEMENT #15
GRADING & DRAINAGE EASEMENT #14
GRADING & DRAINAGE EASEMENT #4
GRADING & DRAINAGE EASEMENT #2
GRADING & DRAINAGE EASEMENT #3
EXISTING/PROPOSED EASEMENT LINE
PROPOSED BOUNDARY LINE (TYP.)
BUILDING SETBACK LINE (TYP.)
200' MULTI FAMILY PERIMETER SETBACK
"BS&E" IRON BOUND ~FND~ (0.8' HIGH)
REBAR ~FND~ (FLUSH)
3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)
GRANITE BOUND ~TO BE SET~ (TYP.)
EVELYN DRIVE
55.0'
PLANT NATIVE SHRUBS & MULCH BERM ALONG 25' WETLAND BUFFER OR REAR BOUNDARY LINE, WHICHEVER IS MORE RESTRICTIVE SEE ROAD DESIGN SITE PLANS FOR MORE DETAILS
T.B.M. HUBSET ELEV.: 295.51
EXISTING BOUNDARY LINE
EXISTING POORLY DRAINED JURISDICTIONAL & WETLAND LINE BY: GOVE ENVIRONMENTAL
N/F LIBBY, SHAWN & DAWN TAX MAP 111, LOT 841

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER — 1:10,000 —
KENNETH A. BERRY LLS 805 DATE 9-05-18

FINAL APPROVAL BY ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

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(IN FEET)
1 inch = 30 ft.

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SUBDIVISION DETAIL PLAN (TOPOGRAPHY)
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE — No. 805 KENNETH A BERRY — LICENSED LAND SURVEYOR — SIGNATURE

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL–AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

LOT 21-40 (S)
LOT 21-39 (D)
LOT 21-38 (D)
LOT 21-37 (D)
LOT 21-36 (D)
LOT 21-35 (D)
LOT 21-34 (D)
LOT 21-33 (S)
LOT 21-32 (S)
LOT 21-31 (D)
LOT 21-30 (D)
LOT 21-15 (M)
LOT 21-12 (S)
LOT 21-11 (S)
LOT 21-10 (D)
LOT 21-9 (D)
LOT 21-54 OPEN SPACE AREA #2
LOT 21-55 AREA OF EVELYN DRIVE

EVELYN DRIVE

GRADING, DRAINAGE, & UTILITY EASEMENT #13
GRADING & DRAINAGE EASEMENT #5
GRADING & DRAINAGE EASEMENT #6

TP#1 TP#2 TP#3 TP#4 TP#5 TP#6 TP#7 TP#8 TP#9 TP#10 TP#11 TP#12 TP#13 TP#14 TP#15 TP#16 TP#16a TP#17 TP#18 TP#19 TP#20 TP#21 TP#22 TP#23 TP#100 TP#101 TP#102 TP#103 TP#111 TP#113 TP#1011 TP#1012

50' WETLANDS BUFFER LINE (TYP.)
3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)
EXISTING/PROPOSED EASEMENT LINE
EXISTING 30' WIDE EASEMENT LINE (TYP.) S.C.R.D. BOOK 1196, PAGE 398
GRANITE BOUND ~TO BE SET~ (TYP.)
BUILDING SETBACK LINE (TYP.)
EXISTING POORLY DRAINED JURISDICTIONAL WETLAND LINE BY: GOVE ENVIRONMENTAL
3" IRON PIPE ~FND~ +3' SHOT ON TOP LOOSE NEAR 24" PINE
T.B.M. HUBSET ELEV.: 324.93

N/F CURTIS, KELLY & MICHELLE
43 STONEWALL DRIVE
ROCHESTER, NH 03867
TAX MAP 223, LOT 11-16
S.C.R.D. BOOK 4151, PAGE 771

LEGEND:

- GRANITE BOUND (TO BE SET)
- 3/4" REBAR W/ID CAP (TO BE SET)
- IRON PIPE (FOUND)
- REBAR (FOUND)
- IRON BOUND (FOUND)
- DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

NAD83 NH STATE PLANE
MAGNETIC

GOVE ENV., CWS #51

FINAL APPROVAL BY ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER – 1:10,000 –
9-05-18
KENNETH A. BERRY LLS 805 DATE

GRAPHIC SCALE
30 0 15 30 60 120
(IN FEET)
1 inch = 30 ft.

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#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

SUBDIVISION DETAIL PLAN (TOPOGRAPHY)
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE No. 805 KENNETH A BERRY LICENSED LAND SURVEYOR
SIGNATURE

NADB83 NH STATE PLANE

MAGNETIC

16.5°

LOT 21-15 (M)

LOT 21-11 (S)

LOT 21-12 (S)

LOT 21-13 (S)

LOT 21-14 (S)

LOT 21-18 (S)

LOT 21-19 (S)

LOT 21-20 (S)

LOT 21-21 (D)

TAX MAP 223, LOT 21 (S)

LOT 21-55 AREA OF EVELYN DRIVE

LOT 21-32 (S)

LOT 21-31 (D)

LOT 21-30 (D)

LOT 21-29 (S)

LOT 21-28 (S)

LOT 21-27 (S)

LOT 21-26 (D)

LOT 21-22 (D)

LOT 21-23

LOT 21-24 (S)

LOT 21-25 (S)

OPEN SPACE AREA #2
LOT 21-54

EVELYN DRIVE

JEREMIAH LANE

DRIVEWAY & UTILITY EASEMENT #11

DRAINAGE EASEMENT #40

GRADING, DRAINAGE, & UTILITY EASEMENT #10

GRADING & DRAINAGE EASEMENT #7

GRADING & DRAINAGE EASEMENT #8

DRIVEWAY GRADING & DRAINAGE EASEMENT #9

EXISTING 30' WIDE EASEMENT LINE (TYP.)

EXISTING 30' WIDE EASEMENT LINE (TYP.) S.C.R.D. BOOK 1196, PAGE 398

BUILDING SETBACK LINE (TYP.)

EXISTING WELL

EXISTING BARN

EXISTING DRIVEWAY

EXISTING HOUSE

PSNH 2/67E W/ GUY WIRE

GRANITE BOUND ~TO BE SET~ (TYP.)

"BS&E" IRON BOUND ~FND~ FLUSH

"BS&E" IRON BOUND ~FND~ +.6'

"BS&E" IRON BOUND NO HELD FOR THIS SUBDIVISION

3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)

TP#16a

TP#17

TP#18

TP#100

TP#126

TP#127

TP#128

TP#502

TP#503

TP#504

TP#505

TP#506

TP#507

TP#508

TP#1001

TP#1002

TP#1004

TP#500A

TP#501A

EXISTING POORLY DRAINED JURISDICTIONAL WETLAND LINE BY: GOVE ENVIRONMENTAL

50' WETLAND BUFFER LINE (TYP.)

3/4" REBAR W/ID CAP ~TO BE SET~ (TYP.)

PLANT NATIVE SHRUBS & MULCH BERM ALONG 25' WETLAND BUFFER SEE ROAD DESIGN SITE PLANS FOR MORE DETAILS

EDGE OF POORLY DRAINED JURISDICTIONAL WETLANDS, EACH UNDER 0.5 AC. NO BUFFER REQUIRED BY: BY: GOVE ENVIRONMENTAL

NO CUT BUFFER

T.B.M. HUBSET ELEV.: 321.14

NWP IRON BOUND ~FND~ +.2'

NWP IRON BOUND ~FND~ +.2'

2" IRON PIPE ~FND~ +2.5'

GOVE ENV., CWS #51

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac

4.) S.C.R.D. BOOK 4323, PAGE 128

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CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

LEGEND:

- GRANITE BOUND (TO BE SET)
- 3/4" REBAR W/ID CAP (TO BE SET)
- IRON PIPE (FOUND)
- REBAR (FOUND)
- IRON BOUND (FOUND)
- DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

FINAL APPROVAL BY ROCHESTER PLANNING BOARD

CERTIFIED BY : _____

DATE : _____

GRAPHIC SCALE

30 0 15 30 60 120

(IN FEET)
1 inch = 30 ft.

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER – 1:10,000 –

9-05-18

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STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE No. 805 KENNETH A. BERRY LICENSED LAND SURVEYOR SIGNATURE

TAX MAP 223, LOT 21
(S)

N/F METAYER FAMILY REV. TRUST
21 JEREMIAH LANE
ROCHESTER, NH 03867-2429
TAX MAP 223, LOT 24
S.C.R.D. BOOK 3985, PAGE 391

N/F HUPPE, LEO & EVELYN
589 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 25

"BS&E" IRON BOUND ~FND~ FLUSH
EXISTING WELL
EXISTING DRIVEWAY
EXISTING HOUSE
EXISTING GARAGE
GRANITE BOUND ~TO BE SET~ (TYP.)
PSNH 2/67E W/ GUY WIRE
"BS&E" IRON BOUND NO HELD FOR THIS SUBDIVISION
EXISTING HOUSE
1" REBAR ~FND~ FLUSH
T.B.M. PKSET ELEV.: 310.74
PSNH 2/67D
PSNH 2/67C
PSNH 2/67B
NET 970/1
EXISTING HOUSE
EXISTING GARAGE
BERRY IRON BOUND ~FND~ +.1'
PSNH 2/67
JEREMIAH LANE
PORTLAND STREET
BERRY IRON BOUND ~FND~ +.1'
EXISTING WELL TO BE ABANDONED
1 3/4" IRON PIPE ~FND~ +1.5'
LOT 21-23
APPROXIMATE LOCATION OF POORLY DRAINED WETLANDS,UNDER 0.5 AC. NO BUFFER REQUIRED
N/F DILLOW, TROY
PO BOX 1464
ROCHESTER, NH 03867
TAX MAP 223, LOT 19
S.C.R.D. BOOK 3891, PAGE 308
TP #508
EXISTING 18" CMP CULVERT
INV. IN : 311.60
INV. OUT: 311.19
GRADING & DRAINAGE EASEMENT
EXISTING HOUSE
1" IRON PIPE ~FND~ +.75' HELD FOR LINE. DETAIL "A"
PSNH 2/68
3/4" REBAR ~FND~ +.5' ON LINE
TP#509
LOT 21-55
AREA OF EVELYN DRIVE
EVELYN DRIVE
SEE CORRESPONDING LOT LINE REVISION
INTERNAL STONE WALL NOT A BOUNDARY
EXISTING DRIVEWAY
EXISTING HOUSE
UTILITY POLE
N/F MONTINI, CHRISTINA M & DONLON, TYLER
604 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 27
S.C.R.D. BOOK 4174, PAGE 779
TP #1003
EDGE OF POORLY DRAINED JURISDICTIONAL WETLANDS, UNDER 0.5 AC. NO BUFFER REQUIRED BY: BY: GOVE ENVIRONMENTAL
DRIVEWAY GRADING & DRAINAGE EASEMENT #9
EXISTING SHED
EXISTING SHED
N/F LOIS ERICKSON
603 PORTLAND STREET #A
ROCHESTER, NH 03867-2437
TAX MAP 223, LOT 18
S.C.R.D. BOOK 4370, PAGE 303
EXISTING GARAGE
PSNH 2/69
1 1/2" IRON PIPE ~FND~ +.2' SHOT AT BASE SEE CORRESPONDING LOT LINE REVISION
LOT 21-24
(S)
3/4" REBAR ~FND~ +.4' OFF LINE
BUILDING SETBACK LINE (TYP.)
NO CUT BUFFER
N/F STROGEN, ROBERT & SHIELA
27 QUARRY DRIVE
ROCHESTER, NH 03867
TAX MAP 223, LOT 17
S.C.R.D. BOOK 4030, PAGE 498
2" IRON PIPE ~FND~ +2.5'
NWP IRON BOUND ~FND~ +.2' N: 298426.19 E:1174697.19 ELEV.:326.61

DETAIL "A"
1" = 10'
129.91'
1.80'
N51°13'40"W
N51°13'40"W
571.09'
1" IRON PIPE ~FND~ +.75' HELD FOR LINE
N37°50'15"E
142.41'

GOVE ENV., CWS #51

MAGNETIC
NAD83 NH STATE PLANE
N
16°+

N/F SPEROPOULOS, LISA
600 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 28
S.C.R.D. BOOK 3754, PAGE 729

LEGEND:

- ■ GRANITE BOUND (TO BE SET)
- ● 3/4" REBAR W/D CAP (TO BE SET)
- ○ IRON PIPE (FOUND)
- ⊗ REBAR (FOUND)
- ⊙ IRON BOUND (FOUND)
- ◉ DRILL HOLE (FOUND OR SET)
- UTILITY POLE
- PROPOSED EASEMENT LINE
- EXISTING EASEMENT LINE
- BUILDING SETBACK LINE
- WETLAND BUFFER LINE
- WETLAND LINE

NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
76 EXETER STREET
NEW MARKET, NH 03857

2.) TAX MAP 223, LOT 21

3.) LOT AREA: 1,811,367 Sq.Ft., 41.58 Ac.

4.) S.C.R.D. BOOK 4323, PAGE 128

5.) ZONING: RESIDENTIAL-AGRICULTURAL DISTRICT W/MUNICIPAL WATER & SEWER
CONSERVATION SUBDIVISION
FRONTAGE ~ 60'
MINIMUM LOT SIZE (SINGLE FAMILY) ~ 6,000 Sq. Ft.
MINIMUM LOT SIZE (DUPLEX) ~ 9,000 Sq. Ft.
FRONT SETBACK ~ 20.0'
REAR SETBACK ~ 20.0'
SIDE SETBACK ~ 10.0'
WETLANDS BUFFER ~ 50.0'
MAX. LOT COVERAGE: 35%

FINAL APPROVAL
BY
ROCHESTER PLANNING BOARD
CERTIFIED BY : _____
DATE : _____

I CERTIFY THAT THIS PLAT EXCEEDS THE MINIMUM REQUIREMENT FOR ACCURACY AND COMPLETENESS OF THE STATE OF N.H. AND OF THE CITY OF ROCHESTER - 1:10,000 -
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(IN FEET)
1 inch = 30 ft.

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#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

SUBDIVISION DETAIL PLAN (TOPOGRAPHY)
STUART ACRES
FOR
REAL ESTATE ADVISORS
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 30 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
No. 805
KENNETH A BERRY
LICENSED LAND SURVEYOR
SIGNATURE

N/F METAYER FAMILY REV. TRUST
21 JEREMIAH LANE
ROCHESTER, NH 03867-2429
TAX MAP 223, LOT 24
S.C.R.D. BOOK 3985, PAGE 391

N/F LOIS ERICKSON
603 PORTLAND STREET #A
ROCHESTER, NH 03867-2437
TAX MAP 223, LOT 18
S.C.R.D. BOOK 4370, PAGE 303

N/F DILLOW, TROY
PO BOX 1464
ROCHESTER, NH 03867
TAX MAP 223, LOT 19
S.C.R.D. BOOK 3891, PAGE 308

JEREMIAH LANE

N/F STROGEN, ROBERT & SHIELA
27 QUARRY DRIVE
ROCHESTER, NH 03867
TAX MAP 223, LOT 17
S.C.R.D. BOOK 4030, PAGE 498

N/F HUPPE, LEO & EVELYN
589 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 223, LOT 25

EVELYN DRIVE

N/F BENTON, JAMES & JANE
579 PORTLAND STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 82
S.C.R.D. BOOK 2042, PAGE 195

N/F CALER, HAROLD & DOROTHY
151 FRANKLIN STREET
ROCHESTER, NH 03867
TAX MAP 111, LOT 83
S.C.R.D. BOOK 840, PAGE 43

FRANKLIN STREET

PROPOSED BOX CULVERT
STA. 2+41.31

LIMIT OF CONSTRUCTION
W/IN CITY RIGHT OF WAY
ON FRANKLIN STREET
STA. 2+93.53
(INTERSECTION ROAD DESIGN)

T.B.M. PKSET
N: 298916.67
E: 1174325.82
ELEV.: 319.54

SAW CUT ALONG PORTLAND

SAW CUT ALONG PORTLAND
MILL 1' OFF SAW CUT LINE
1.5" DEEP

SAW CUT AT STA. 2+93.53
MILL 1' OFF SAW CUT LINE
1.5" DEEP

PORTLAND STREET

BARRY VILLA

CONNECTION TO EXISTING
12" WATER MAIN
STA. 0+24.89
(UTILITY PLAN – PORTLAND
STREET WATER DESIGN)

LIMIT OF CONSTRUCTION
W/IN CITY RIGHT OF WAY
ON PORTLAND STREET
STA. 0+00
(UTILITY PLAN – PORTLAND
STREET WATER DESIGN)

LIMIT OF CONSTRUCTION
W/IN CITY RIGHT OF WAY
ON PORTLAND STREET
STA. 4.25.00
(UTILITY PLAN – PORTLAND
STREET WATER DESIGN)

LIMIT OF CONSTRUCTION
W/IN CITY RIGHT OF WAY
ON PORTLAND STREET

PROP. SMH 100
4' ø STA. 0+00.00
(INTERSECTION SEWER DESIGN)

SAW CUT AT STA. -0+14.91
MILL 1' OFF SAW CUT LINE
1.5" DEEP

LIMIT OF CONSTRUCTION
W/IN CITY RIGHT OF WAY
ON PORTLAND STREET
STA. -0+14.91
(INTERSECTION SEWER DESIGN)

T.B.M. PKSET
N: 297976.10
E: 1173444.65
ELEV.: 280.85

GRAPHIC SCALE

50 0 25 50 100 200

(IN FEET)
1 inch = 50 ft.

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
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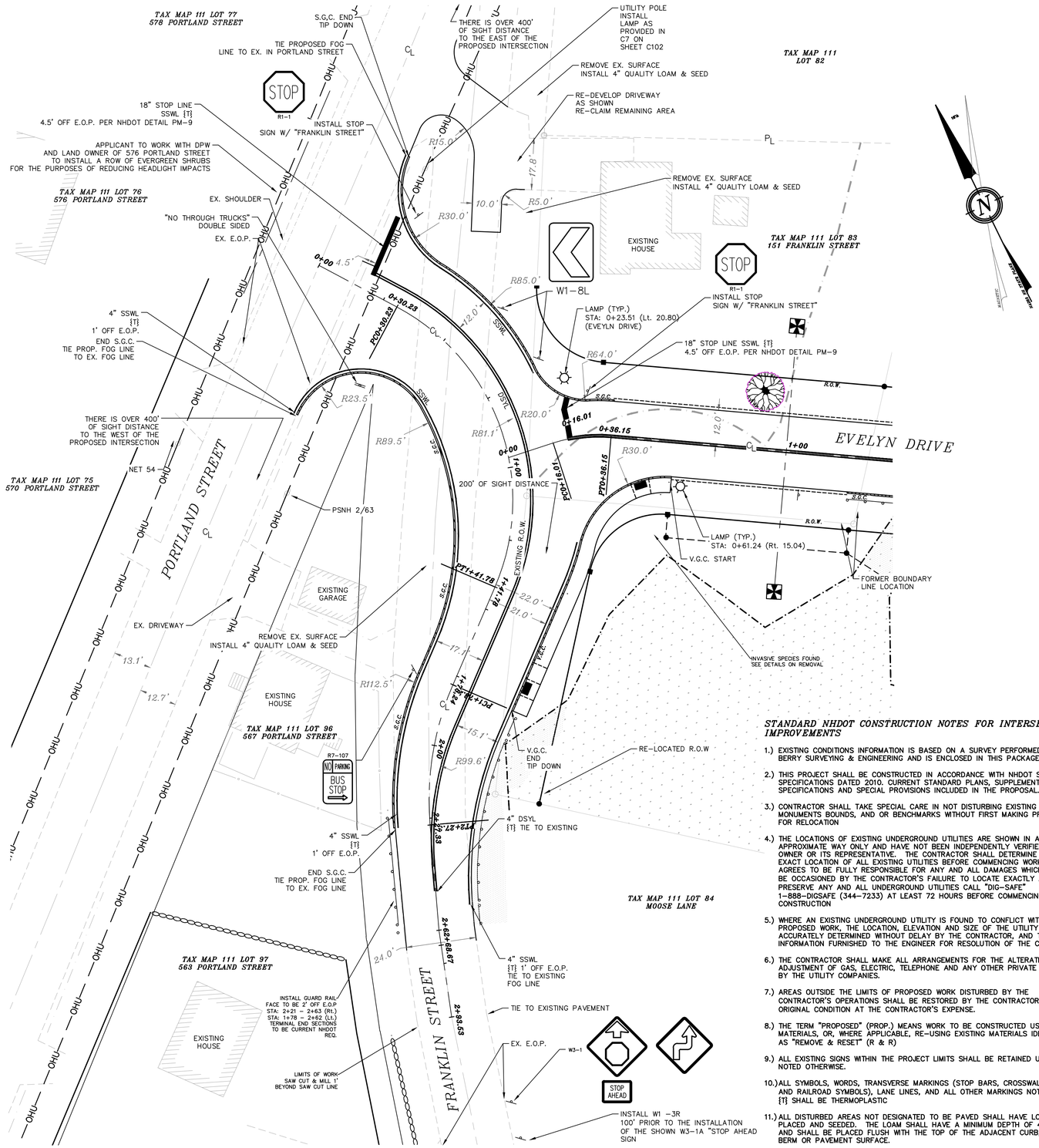
LIMIT OF CONSTRUCTION WITHIN CITY RIGHT OF WAY
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 50 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



NOTES:

1.) OWNER: REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, NH 03867-1303

2.) CITY OF ROCHESTER TAX MAP 233, LOT 21

3.) THE PURPOSE OF THIS PLAN IS TO DEMONSTRATE SITE LAYOUT ITEMS AS WELL AS FINISH CONSTRUCTION ITEMS FOR THE PROPOSED PUBLIC WAY KNOWN AS PORTLAND STREET & FRANKLIN STREET & EVELYN DRIVE.

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

GENERAL PLAN SET NOTES:

1.) AS-BUILT PLANS OF THE SITE SHALL BE SUBMITTED ON A REPRODUCIBLE MYLAR MEDIUM AND IN A DIGITAL DXF FORMAT ON DISK TO THE CITY OF ROCHESTER GIS OFFICE UPON COMPLETION OF PROJECT. AS-BUILT PLANS SHALL BE PREPARED AND CERTIFIED CORRECT BY A L.L.S. OR P.E.

2.) EXTERIOR LIGHTING SHALL BE THE TYPICAL EVERSCOURSE LAMPS PROVIDED IN THE DETAILS OF THIS PLAN SET.

3.) TOPOGRAPHIC SURVEY PERFORMED BY BERRY SURVEYING & ENGINEERING IN 2015 AND UPDATED DURING WINTER 2016..

4.) DATUM: PROJECT DATUM IS BASED ON GPS COORDINATES ESTABLISHED WITH A TOPCON HIPER SR RECEIVER IN JUNE 2013 AND REPRESENTED IN NEW HAMPSHIRE STATE PLANE COORDINATES NAD 1983 AND VERTICALLY BY NAVD 1988.

5.) FINAL UTILITY LOCATIONS TO BE COORDINATED BETWEEN THE CONTRACTOR, ALL APPROPRIATE UTILITY COMPANIES AND THE ROCHESTER DPW.

6.) CONTRACTOR TO CONTACT ROCHESTER DPW A MINIMUM OF TWO WEEKS PRIOR TO ANY CONSTRUCTION TO COORDINATE ALL WORK CONCERNING INSTALLATION OF ANY PROPOSED WATER LINE IMPROVEMENTS.

7.) ALL WATER MAIN AND SERVICE INSTALLATIONS SHALL CONFORM TO CITY OF ROCHESTER STANDARDS.

8.) CONTRACTOR SHALL COORDINATE ALL ELECTRICAL INSTALLATIONS WITH EVERSOURCE AT (603) 436-7708. ALL ELECTRIC CONDUIT INSTALLATION SHALL BE INSPECTED BY EVERSOURCE PRIOR TO BACKFILL. A 48-HOUR MINIMUM NOTICE IS REQUIRED.

9.) CONTRACTOR SHALL COORDINATE ALL TELECOMMUNICATIONS INSTALLATIONS WITH FAIRPOINT COMMUNICATIONS AT (603) 427-5525.

10.) CONTRACTOR SHALL COORDINATE ALL CABLE INSTALLATIONS WITH METROCAST.

11.) ALL NEW ON-SITE UTILITIES SHALL BE INSTALLED UNDERGROUND WITH THE EXCEPTION OF PROPOSED DROP POLE.

12.) THE SUBJECT PARCEL IS SERVED BY MUNICIPAL WATER AND SEWER.

13.) BACKFLOW PREVENTORS SHALL BE PROVIDED FOR DOMESTIC WATER LINES.

14.) ALL MATERIALS AND CONSTRUCTION SHALL CONFORM TO APPLICABLE CITY AND STATE CODES.

15.) ALL CONSTRUCTION SHALL CONFORM TO THE STATE OF NEW HAMPSHIRE DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, AND THE CITY OF ROCHESTER SUBDIVISION REGULATIONS AS AMENDED BY WAIVER REQUEST.

16.) PROTECTION OF SUBGRADE: THE CONTRACTOR SHALL BE REQUIRED TO MAINTAIN STABLE, DE-WATERED SUBGRADES, TRENCHES, AND OTHER AREAS DURING CONSTRUCTION. SUBGRADE DISTURBANCE MAY BE INFLUENCED BY EXCAVATION METHODS, MOISTURE, PRECIPITATION, GROUNDWATER CONTROL, AND CONSTRUCTION ACTIVITIES. THE CONTRACTOR SHALL TAKE PRECAUTIONS TO PREVENT SUBGRADE DISTURBANCE. SUCH PRECAUTIONS MAY INCLUDE DIVERTING STORMWATER RUNOFF AWAY FROM CONSTRUCTION AREAS, REDUCING TRAFFIC IN SENSITIVE AREAS, AND MAINTAINING AN EFFECTIVE DEWATERING PROGRAM. SOILS EXHIBITING HEAVING OR INSTABILITY SHALL BE OVER EXCAVATED TO MORE COMPETENT BEARING SOIL AND REPLACED WITH FREE DRAINING STRUCTURAL FILL MEETING THE ENGINEERS SPECIFIC RECOMMENDED CRITERIA.

17.) IF THE EARTHWORK IS PERFORMED DURING FREEZING WEATHER (NOT ALLOWED IN CITY R.O.W.), EXPOSED SUBGRADES ARE SUSCEPTIBLE TO FROST. NO FILL OR UTILITIES SHALL BE PLACED ON FROZEN GROUND. THIS WILL LIKELY REQUIRE REMOVAL OF A FROZEN SOIL CRUST AT THE COMMENCEMENT OF EACH DAY'S OPERATION. THE FINAL SUBGRADE ELEVATION WOULD ALSO REQUIRE AN APPROPRIATE DEGREE OF INSULATION AGAINST FREEZING.

18.) PLACEMENT OF BORROW MATERIALS SHALL BE PERFORMED IN A MANNER THAT PREVENTS LONG TERM DIFFERENTIAL SETTLEMENT. EXCESSIVELY WET MATERIALS SHALL BE STOCKPILED AND ALLOWED TO DRAIN BEFORE PLACEMENT. FROZEN MATERIAL SHALL NOT BE USED FOR CONSTRUCTION. VOIDS BETWEEN STONES AND CLUMPS OF MATERIAL SHALL BE FILLED WITH FINE MATERIALS.

19.) SEE DETAILS CONCERNING SITE LAYOUT, DRAINAGE, UTILITY AND SEDIMENT AND EROSION CONTROLS.

20.) ALL CATCH BASINS SHALL BE PRE-CAST H-20 LOADING AND SHALL BE EQUIPPED WITH DEEP SUMPS (4' MIN.) AND HOODS (SEE DETAILS) HOODS ARE TO BE "THE ELIMINATOR" BY KLEANSTREAM. RIMS ARE TO BE REXUS STYLE, DRAIN MANHOLES ARE TO BE PAMREX AND SHALL BE SET FLUSH WITH FINISH GRADE, UNLESS OTHERWISE INSTRUCTED DURING CONSTRUCTION BY ROCHESTER DPW. RIMS ABOVE FINISH GRADE WILL BE NOT BE ACCEPTED. ALL RIMS, GRATES AND COVERS ARE TO BE U.S.A MADE.

21.) ALL EROSION CONTROL NOTES SHALL INCLUDE PROVISIONS FOR CONSTRUCTION SEQUENCING, TEMPORARY EROSION CONTROL MEASURES, AND PERMANENT STANDARDS SUCH AS LOAM SPREAD RATE FOR DISTURBED AREAS, RATES OF LIME, TYPE AND RATES FOR FERTILIZER, AND SEED AND MULCH MIXTURE WITH RATES OF APPLICATION. FILTREXX SOXX IS PREFERRED OVER THE USE OF SILT FENCE. FENCING IS TO BE USED ON SITE ONLY AS REQ. AND DIRECTED BY THE SWPPP INSPECTOR.

22.) SEE SEDIMENT & EROSION CONTROL PLAN FOR INLET PROTECTION DETAILS

23.) ALL DRAINAGE PIPE IS TO BE HDPE N-12. INDIVIDUAL PIPE SIZES ARE SPECIFIED. RECYCLED PIPE IS APPROVED FOR PROJECT SITE.

24.) ALL ELEVATIONS TO BE VERIFIED BY THE CONTRACTOR PRIOR TO CONSTRUCTION. THE DESIGN ENGINEER IS TO BE NOTIFIED IMMEDIATELY OF ANY DISCREPANCY. TEMPORARY BENCHMARKS (T.B.M.) ARE TO BE PROVIDED BY THE DESIGN ENGINEER.

25.) NOTE THAT THE PROJECT IS SUBJECT TO THE EPA NPDES PHASE II. THE NOTICE OF INTENT (NOI) MUST BE FILED ALONG WITH A STORMWATER POLLUTION PREVENTION PLAN (SWPPP). WEEKLY INSPECTIONS WILL BE CONDUCTED BY THE DESIGN ENGINEER.

26.) UPON FINAL COMPLETION AND 85% STABILIZATION THE DRAINAGE SYSTEM IS TO BE CLEANED OF ALL DEBRIS TO INCLUDE THE PUMPING OF THE BASIN SUMPS.

27.) ALL UNPAVED AREAS ARE TO RECEIVE 4" QUALITY LOAM AND SEED

28.) ALL BASINS AND DRAINS ARE TO HAVE BOOTS INSTALLED ON ALL INLETS AND OUTLETS

29.) THE LIMITS OF CONSTRUCTION DISTURBANCE AND TREE CLEARING LIMITS ARE TO BE MARKED OUT AND APPROVED BY THE CITY PRIOR TO WORK.

30.) ALL TREATMENT SWALE TO BE CONSTRUCTED SHALL HAVE SOD BOTTOMS UNLESS OTHERWISE INSTRUCTED BY THE DESIGN ENGINEER DURING CONSTRUCTION.

31.) A LETTER OF CREDIT FOR THE COST OF RE-VEGETATING ALL DISTURBED AREAS ON THE SITE SHALL BE SUBMITTED PRIOR TO ANY EARTH DISTURBING ACTIVITY OCCURS, AS MAY BE APPLICABLE.

32.) A PRE-CONSTRUCTION CONFERENCE WITH THE DEVELOPER, THE DESIGN ENGINEER, THE EARTHWORK CONTRACTOR AND ROCHESTER CITY STAFF SHALL OCCUR PRIOR TO ANY EARTH DISTURBING ACTIVITY.

33.) BUILDING ADDRESSES SHALL BE DETERMINED BY THE BUILDING OFFICIAL.

34.) THE FOLLOWING FEDERAL AND STATE PERMITS HAVE BEEN ISSUED FOR THE SUBJECT PROPERTY:
NHDES WETLANDS PERMIT ~ 2017-02325
NHDES ALTERATION OF TERRAIN PERMIT
EPA NOTICE OF INTENT (NOI)
EPA SEWER EXTENSION PERMIT

35.) LIST ANY VARIANCES OR SPECIAL EXCEPTIONS GRANTED BY THE ZONING BOARD OF ADJUSTMENT: DUPLEX LOTS ARE PERMITTED TO HAVE 60' OF FRONTAGE.

36.) THIS SUBDIVISION PLAN PROPOSES XXXXX SQ. FT. OF DISTURBANCE. PER ENV-WQ 1503.12 (B) AN ALTERATION OF TERRAIN PERMIT IS IS REQUIRED.

37.) CALL DIG SAFE PRIOR TO BEGINNING WORK (1-888-344-7233)

38.) WRITTEN DIMENSION ON THIS PLAN TAKE PRECEDENCE OVER SCALED DIMENSIONS. THE CONTRACTOR SHALL USE CAUTION WHEN SCALING REPRODUCED PLANS. IN THE EVENT OF A CONFLICT BETWEEN THIS PLAN SET AND ANY OTHER DRAWINGS AND/OR SPECIFICATIONS, THE ENGINEER SHALL BE NOTIFIED BY THE CONTRACTOR PRIOR TO CONSTRUCTION. CONTRACTOR IS TO CONFIRM ALL ELEVATIONS. CONFLICTS WILL BE REPORTED TO THE DESIGN ENGINEER PRIOR TO CONSTRUCTION.

39.) ALL LAMPS ARE TO BE SIGMA SERIES AS PROVIDED FOR IN DETAIL C8 ON SHEET C102. LED COBRA HEAD LAMPS ARE PROPOSED AT THE INTERSECTION OF FRANKLIN STREET AND PORTLAND STREET AS WELL AS EVELYN DRIVE AND PORTLAND STREET. FOR THESE TWO LOCATIONS REFER TO DETAIL C7 ON SHEET C102 FOR LED "COBRA HEAD" DESIGN. COORDINATE WITH EVERSOURCE ON INSTALLATION ON THESE REVISED POLES.

40.) STREET TREES ARE PROVIDED FOR WITHIN THIS PLAN SET. THREE SPECIES ARE SUGGESTED. IT SHOULD BE NOTED THAT A MIX OF THESE SPECIES IS REQUIRED. AN ALTERNATING PATTERN IS PREFERRED.

41.) ALL PROPOSED STREET TREES ARE TO BE AT LEAST 15' FROM ALL UTILITIES AND STORM DRAINS.

STANDARD NHDOT CONSTRUCTION NOTES FOR INTERSECTION IMPROVEMENTS

1.) EXISTING CONDITIONS INFORMATION IS BASED ON A SURVEY PERFORMED BY BERRY SURVEYING & ENGINEERING AND IS ENCLOSED IN THIS PACKAGE.

2.) THIS PROJECT SHALL BE CONSTRUCTED IN ACCORDANCE WITH NHDOT STANDARD SPECIFICATIONS DATED 2010, CURRENT STANDARD PLANS, SUPPLEMENTAL SPECIFICATIONS AND SPECIAL PROVISIONS INCLUDED IN THE PROPOSAL.

3.) CONTRACTOR SHALL TAKE SPECIAL CARE IN NOT DISTURBING EXISTING MONUMENTS BOUNDS, AND OR BENCHMARKS WITHOUT FIRST MAKING PROVISIONS FOR RELOCATION

4.) THE LOCATIONS OF EXISTING UNDERGROUND UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVE. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTOR'S FAILURE TO LOCATE EXACTLY AND TO PRESERVE ANY AND ALL UNDERGROUND UTILITIES CALL "DIG-SAFE" 1-888-DIGSAFE (344-7233) AT LEAST 72 HOURS BEFORE COMMENCING CONSTRUCTION

5.) WHERE AN EXISTING UNDERGROUND UTILITY IS FOUND TO CONFLICT WITH THE PROPOSED WORK, THE LOCATION, ELEVATION AND SIZE OF THE UTILITY SHALL BE ACCURATELY DETERMINED WITHOUT DELAY BY THE CONTRACTOR, AND THE INFORMATION FURNISHED TO THE ENGINEER FOR RESOLUTION OF THE CONFLICT.

6.) THE CONTRACTOR SHALL MAKE ALL ARRANGEMENTS FOR THE ALTERATION AND ADJUSTMENT OF GAS, ELECTRIC, TELEPHONE AND ANY OTHER PRIVATE UTILITIES BY THE UTILITY COMPANIES.

7.) AREAS OUTSIDE THE LIMITS OF PROPOSED WORK DISTURBED BY THE CONTRACTOR'S OPERATIONS SHALL BE RESTORED BY THE CONTRACTOR TO THEIR ORIGINAL CONDITION AT THE CONTRACTOR'S EXPENSE.

8.) THE TERM "PROPOSED" (PROP.) MEANS WORK TO BE CONSTRUCTED USING NEW MATERIALS, OR, WHERE APPLICABLE, RE-USING EXISTING MATERIALS IDENTIFIED AS "REMOVE & RESET" (R & R)

9.) ALL EXISTING SIGNS WITHIN THE PROJECT LIMITS SHALL BE RETAINED UNLESS NOTED OTHERWISE.

10.) ALL SYMBOLS, WORDS, TRANSVERSE MARKINGS (STOP BARS, CROSSWALK LINES, AND RAILROAD SYMBOLS), LANE LINES, AND ALL OTHER MARKINGS NOTED WITH [T] SHALL BE THERMOPLASTIC

11.) ALL DISTURBED AREAS NOT DESIGNATED TO BE PAVED SHALL HAVE LOAM PLACED AND SEEDED. THE LOAM SHALL HAVE A MINIMUM DEPTH OF 4 INCHES AND SHALL BE PLACED FLUSH WITH THE TOP OF THE ADJACENT CURB, EDGING, BERM OR PAVEMENT SURFACE.

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

INTERSECTION RE-ALIGNMENT FRANKLIN & PORTLAND
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 233, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

PORTLAND STREET

EXISTING E.O.P.

REVISE DRIVEWAY WITH TURN AROUND AS SHOWN

WHITE SPRUCE TREE 6' TALL WHEN PLANTED SPACED 20' APART 8' OFF THE EDGE OF SHOULDER

EXISTING HOUSE

LAMP (TYP.) STA: 0+23.51 (Lt. 20.80) (EVEYLN DRIVE)

18" STOP LINE SSWL [T]

STOP SIGN W/ "EVELYN DRIVE"

S.G.C. END STA.: 0+36.00

BIO-SWALE #2

STREET TREE TYP.

4" DSYL [T]

TAX MAP 111 LOT 82

TAX MAP 111 LOT 83

MOTT IRON BOUND ~FND~ -.1'

S.G.C. END STA.: 1+35.80

WETLAND IMPACT AREA #2

EDGE OF POORLY DRAINED JURISDICTIONAL WETLANDS

50' WETLANDS BUFFER

SEE RAIN GARDEN DETAIL FOR ADDITIONAL PLANTINGS

RAIN GARDEN #2 SEE R102 FOR PLANTING SPECIFICATIONS

25 LF WOOD FRAME GUARD RAIL

PROP. SIGN W3-1

SLOPED GRANITE CURB TIP DOWN STA: 2+71.66 TO START 1' GRAVEL SHOULDER

S.G.C. END STA.: 2+71.66

WHITE SPRUCE TREE 6' TALL WHEN PLANTED SPACED 20' APART 8' OFF THE EDGE OF SHOULDER

LAMP (TYP.) STA: 4+23.45 Lt. 15.47

1' CRUSHED GRAVEL SHOULDER

E.O.P.

OPEN SPACE AREA #1 LOT 21-53

4" DSYL [T]

SHEET 24 SHEET 25

TREATMENT SWALE #1

GRADING & DRAINAGE EASEMENT

EDGE OF POORLY DRAINED JURISDICTIONAL WETLANDS

EXISTING WELL TO BE ABANDONED

IRON BOUND TYP.

END WOOD FRAME GUARD RAIL STA: 2+71.00 (Rt. 14.5')

LAMP (TYP.) STA: 0+61.24 (Rt. 15.04)

V.G.C. END STA.: 0+57.92

INSTALL ADA RAMP W/ TRUNCATED DOMES FLUSH MOUNT CURB THROUGH ENTRANCE. TIP DOWNS ON BOTH EDGES. DOMES TO RUN PARALLEL TO TRAVEL PATH

START WOOD FRAME GUARD RAIL STA: 1+18.00 (Rt. 14.5')

LAMP (TYP.) STA: 2+28.37 Rt. 16.60

PROP. SIGN R2-1

S.G.C. END STA.: 1+18.31

SPEED LIMIT 25

R2-1

VERTICAL GRANITE CURB V.G.C. (TYP.)

5' WIDE CONC. SIDEWALK.

RE-LOCATED R.O.W.

4" SSWL [T] 1'OFF E.O.P

INSTALL ADA RAMP W/ TRUNCATED DOMES FLUSH MOUNT CURB THROUGH ENTRANCE. TIP DOWNS ON BOTH EDGES. DOMES TO RUN PARALLEL TO TRAVEL PATH

WETLAND IMPACT AREA #1

BIO-SWALE #1

PROP. SIGN "POSTED: THIS SUBDIVISION IS UNDER CONSTRUCTION. THESE STREETS HAVE NOT YET BEEN ACCEPTED BY THE CITY OF ROCHESTER AND ARE NOT ELIGIBLE FOR CITY SERVICES. TRAVEL AT YOUR OWN RISK. (PER ORDER OF THE PLANNING BOARD)".

SIGNS LOCATION AND DESIGN SHOULD BE AS STIPULATED BY THE PUBLIC WORKS DEPARTMENT, BUT IN NO CASE SHALL THEY BE LESS THAN 2' BY 4' AND SHALL BE ERECTED PRIOR TO THE ISSUANCE OF ANY BUILDING PERMITS.

STREET TREE (MIX) (TYP.) SPACED APPROX. 150' APART OR AS SHOWN.

AMUR MAPLE
ACER GINNALA (L.)

OR

GREEN ASH
FRAXINUS PENNSYLVANICA (L.)

OR

MAACKIA AMURENSIS STARBURST

RAIN GARDEN #1 SEE R101 FOR ADDITIONAL DETAILS

WETLANDS AND EDGES OF DISTURBANCE TO BE STAKED BY BS&E PRIOR TO CONSTRUCTION

T.B.M. PKSET 18" PINE ELEV.: 287.89

TAX MAP 111 LOT 84

OPEN SPACE AREA #2 LOT 21-54

START WOOD FRAME GUARD RAIL STA: 5+64.22 (Rt. 14.5')

PROPOSED TREE LINE

25' WETLAND BUFFER

GRADING AND DRAINAGE EASEMENT

50' WETLAND BUFFER

EVELYN DRIVE

FRANKLIN STREET

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

REVISION	DATE	DESCRIPTION
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EVELYN DRIVE ROAD DESIGN SITE PLAN 0+00 - 5+25
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

EXISTING HOUSE

EXISTING TREE LINE

EXISTING 15' R.O.W. S.C.R.D. BOOK 542, PAGE 42

OPEN SPACE AREA #1 LOT 21-53

N/F WEINBERG, LINDA & BURGESS, HAROLD
26 JEREMIAH LANE
ROCHESTER, NH 03867
TAX MAP 223, LOT 23
S.C.R.D. BOOK 2660, PAGE 716

EXISTING GARAGE

TAX MAP 223, LOT 23

INFILTRATION POND #2 (R110)

1' CRUSHED GRAVEL SHOULDER

SHEET 24 — SHEET 25

BERRY IRON BOUND ~FND~ +.8'

SLOPED GRANITE CURB TIP DOWN STA: 6+30.00 TO START 1' GRAVEL SHOULDER

PRIOR TO CONSTRUCTION BS&E IS TO STAKE OUT BOUNDARY LINE

WHITE SPRUCE TO BE PLANTED 2' OFF THE BOUNDARY LINE 12' OC

4" DSYL {T}

E.O.P.

R139.0'

STA: 6+39.74

STA: 6+51.96

S.C.C.

R.O.W.

STREET TREE (MIX) (TYP.) SPACED APPROX. 150' APART OR AS SHOWN.

AMUR MAPLE ACER GINNALA (L.)

OR

GREEN ASH FRAXINUS PENNSYLVANICA (L.)

OR

MAACKIA AMURENSIS STARBURST

BUILDING SETBACK (TYP.)

LOT 21-1 (S)

LOT 21-2 (S)

LOT 21-3 (S)

LOT 4 (S)

STREET TREE (TYP.).

15.0'

20.0'

R5.0'

SHEET 25

SHEET 26

6+00

7+00

8+00

9+00

10+00

S49°48'03"E 460.34'

EVELYN DRIVE

START WOOD FRAME GUARD RAIL STA: 5+64.22 (Rt. 14.5')

R162.0'

LAMP (TYP.) STA: 6+00.85 (Rt. 16.95)

GRADING & DRAINAGE EASEMENT (TYP.)

OPEN SPACE

START WOOD FRAME GUARD RAIL STA: 5+64.22 (Rt. 14.5')

GRANITE BOUND (TYP.)

STREET TREE (TYP.)

R2-1 SPEED LIMIT 25

STREET TREE (TYP.).

SLOPED GRANITE TIP-DOWN TO MEET DRIVEWAY TYP.

PROPOSED DRIVEWAY TYP.

STREET TREE (TYP.).

IRON BOUND (TYP.)

SLOPED GRANITE TIP-DOWN TO MEET DRIVEWAY TYP.

PROPOSED DRIVEWAY TYP.

STREET TREE (TYP.).

RAIN GARDEN #3
SEE R103 FOR PLANTING SPECIFICATIONS

50' WETLANDS BUFFER ROCHESTER BUFFER SIGNS TO BE INSTALLED EVERY 25'

LOT 21-52 (S)

LOT 21-51 (S)

LOT 21-50 (S)

LOT 21-49 (S)

LOT 21-48 (S)

10.0'

50' WETLANDS BUFFER TO BE STAKED BY BS&E PRIOR TO CONSTRUCTION (TYP.)

BUILDING SETBACK LINES (TYP.)

EDGE OF POORLY DRAINED JURISDICTIONAL WETLANDS

50.0'

25.0'

BUFFER & EDGE OF DISTURBANCE TO BE STAKED BY BS&E PRIOR TO CONSTRUCTION

PLANT HIGH BUSH BLUEBERRY (Vaccinium corymbosum) 10' O.C. WITH MULCH BERM. INSTALL BUFFER SIGNS ALONG 25' BUFFER LINE.

25' WETLANDS BUFFER

T.B.M. PKSET 10" OAK ELEV.: 295.34

OPEN SPACE AREA #2 LOT #54

TAX MAP 111 LOT 84

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

REVISION	DATE	DESCRIPTION
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#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

EVELYN DRIVE ROAD DESIGN SITE PLAN 5+25 – 10+75
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

LOT 21-16
(FOUR-PLEX)

INFILTRATION POND #2
(R110)

LOT 21-9
(D)

DETENTION POND #6
SEE P106 FOR FURTHER DETAILS

LOT 21-15
(FOUR-PLEX)

BUILDING SETBACK
(TYP.)

PROPOSED HOUSE
LOCATION (TYP.)

RAIN GARDEN #7
SEE R107 FOR FURTHER DETAILS

GRADING & DRAINAGE
EASEMENT (TYP.)

GRADING AND DRAINAGE
EASEMENT DETENTION AREA

NO STRUCTURES TO BE
BUILT IN EASEMENT

SEE TRAIL RECONSTRUCTION
PLANS

EXISTING
EASEMENT

T 21-3
(S)

LOT 21-4
(S)

LOT 21-5
(S)

LOT 21-6
(S)

LOT 21-7
(S)

LOT 21-8
(S)

STREET TREE (MIX) (TYP.)
AMUR MAPLE
ACER GINNALA (L.)
OR
GREEN ASH
FRAXINUS PENNSYLVANICA (L.)
OR
MAACKIA AMURENSIS STARDUST

4" DSYL
{T}

SPEED
LIMIT
25

PROP. SIGN
R2-1

PROP. DRIVEWAY
(TYP.)

S.G.C. TIP-DOWN TO
MEET DRIVEWAY
(TYP.)

IRON BOUND
(TYP.)

SHEET 25
SHEET 26

SHEET 26
SHEET 27

R.O.W.

S.G.C.

PC11+18.15
D = 9°59'40"
R = 150.00'
L = 26.17'

PT11+38.47

PC14+69.38

R138.0'

11+00
11+12.31
11+38.47
12+00
13+00
14+00
14+69.38
15+00

S59°47'43"E
330.90'

EVELYN DRIVE

R5.0'

15.0'

20.0'

10.0'

30.0'

R162.0'

R162.3'

SPEED
LIMIT
25

PROP. SIGN
R2-1

S.G.C. TIP-DOWN TO
MEET DRIVEWAY
(TYP.)

LAMP (TYP.)
STA: 15+10.89 (Rt. 17.32)

OT 21-48
(S)

LOT 21-47
(S)

LOT 21-46
(S)

LOT 21-45
(S)

LOT 21-44
(S)

LOT 21-43
(S)

LOT 21-42
(S)

LOT 21-41
(S)

LOT 21-40
(S)

BUILDING SETBACK
(TYP.)

STREET TREE (MIX) (TYP.)
SPACED APPROX. 150'
APART OR AS SHOWN.
AMUR MAPLE
ACER GINNALA (L.)
OR
GREEN ASH
FRAXINUS PENNSYLVANICA (L.)
OR
MAACKIA AMURENSIS STARDUST

PROP. DWELLING
(TYP.)

50' WETLANDS
BUFFER

IRON BOUND
(TYP.)

OPEN SPACE

PLANT HIGH BUSH BLUEBERRY
(Vaccinium corymbosum) 10' O.C.
WITH MULCH BERM. INSTALL BUFFER
SIGNS ALONG 25' BUFFER LINE.

25' WETLANDS
BUFFER

50.0'

25.0'

EDGE OF POORLY DRAINED
JURISDICTIONAL WETLANDS

GRADING AND DRAINAGE EASEMENT

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

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#3		07-28-17	REVISED DRAINAGE DESIGN FEATURES

EVELYN DRIVE ROAD DESIGN SITE PLAN 10+75 – 15+75
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

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EVELYN DRIVE ROAD DESIGN SITE PLAN 15+75 – 21+25
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
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SCALE : 1 IN. EQUALS 20 FT.
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

GRAPHIC SCALE
20 0 10 20 40 80
(IN FEET)
1 inch = 20 ft.

SHEET 27 OF 102

LOT 21-17 (D)
LOT 21-15 (FOUR-PLEX)
LOT 21-14 (S)
LOT 21-13 (S)
LOT 21-18 (S)
LOT 21-19 (S)
LOT 21-20 (S)
LOT 21-21 (D)
LOT 21-22 (D)
LOT 21-26 (D)
LOT 21-27 (S)
LOT 21-28 (S)
LOT 21-29 (S)
LOT 21-30 (D)
OPEN SPACE #2 LOT 21-54
EVELYN DRIVE
IRON BOUND (TYP.)
BUILDING SETBACK (TYP.)
PROPOSED TREELINE
PROPOSED DRIVEWAY TYP.
STREET TREE (MIX) (TYP.)
AMUR MAPLE ACER GINNALA (L.)
OR
GREEN ASH FRAXINUS PENNSYLVANICA (L.)
OR
MAACKIA AMURENSIS STARBURST
PROPOSED HOUSE LOCATION (TYP.)
LAMP (TYP.) STA: 25+13.16 (Lt. 19.07)
LAMP (TYP.) STA: 21+83.40 (Rt. 17.60)
4" DSYL [T]
S.G.C. TIP-DOWN TO MEET DRIVEWAY (TYP.)
NO CURB STA.: 24+37.34
1' CRUSHED GRAVEL SHOULDER
START S.G.C. STA.: 25+25.33
RAIN GARDEN #8 SEE RIO8 FOR FURTHER DETAILS
PLANT HIGH BUSH BLUEBERRY (Vaccinium corymbosum) 10' O.C. WITH MULCH BERM. INSTALL BUFFER SIGNS ALONG 25' BUFFER LINE.
50' BUFFER
50' WETLANDS BUFFER
25' WETLANDS BUFFER
PROPOSED TREELINE
EDGE OF POORLY DRAINED JURISDICTIONAL WETLANDS BY: JAMES P. GOVE CWS
R.O.W.
S.G.C.
P.L.
C.L.
20.0'
15.0'
10.0'
50.0'
25.0'
N52°18'03"E 158.51
D=33°50'28" R=300.00' L=177.19'
L=171.57' R=300.00' D=32°46'05"
21+00
22+00
23+00
24+00
25+00
26+00
PC21+44.34
PT22+18.07
PC23+89.68
PT24+27.78
PC25+27.78
PT25+74.69
SHEET 27
SHEET 28
SHEET 29
GRAPHIC SCALE
20 0 10 20 40 80
(IN FEET)
1 inch = 20 ft.
N

REVISION	DATE	DESCRIPTION
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EVELYN DRIVE ROAD DESIGN SITE PLAN 20+00 - 25+50
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

SHEET 28 OF 102

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

LOT 21 (S)

LOT 21-23 (S)

LOT 21-22 (D)

LOT 21-25 (S)

LOT 21-24 (S)

JEREMIAH LANE

EVELYN DRIVE

1 3/4" IRON PIPE ~FND~ +1.5'

RAIN GARDEN #9 SEE RH09 FOR FURTHER DETAILS

GRADING AND DRAINAGE EASEMENT

EDGE OF POORLY DRAINED JURISDICTIONAL WETLANDS BY: JAMES P. GOVE CWS

PROPOSED TREE LINE

EXISTING 18" CULVERT CROSSING AT JEREMIAH

TAX MAP 223 LOT 19
589 PORTLAND STREET

INSTALL WOOD FRAME GUARD RAIL 27+60-29+50 (Lt. 15')

STREET TREE (MIX) (TYP.)

AMUR MAPLE
ACER GINNALA (L.)

OR

GREEN ASH
FRAXINUS PENNSYLVANICA (L.)

OR

MAACKIA AMURENSIS STARDUST

EXISTING TREELINE

PLANT WHITE SPRUCE
12' OC (TYP.) (BETWEEN TREE LINE)
PLANTED AT 6' TALL

SPEED LIMIT 25

PROP. SIGN R2-1

PLANT WHITE SPRUCE
12' OC (TYP.) (BETWEEN TREE LINE)
PLANTED AT 6' TALL

S.G.C. TIP-DOWN TO MEET DRIVEWAY (TYP.)

4" DSYL

R.O.W.

S.G.C.

N51°13'40"W
729.97'

24' ±

SHEET 28

SHEET 29

SHEET 30

27+00

27+46.26

28+00

29+00

30+00

31+00

32+0

42" CULVERT 8" BURY DEPTH

PROPOSED DRIVEWAY LOCATION (TYP.)

END S.G.C.
STA.: 31+34.80 (Rt. 12.5')

1' CRUSHED GRAVEL SHOULDER

PROP. SIGN W3-1

OPEN

TAX MAP 223 LOT 18
597 PORTLAND STREET

EX. STRUCTURE

EX. STRUCTURE

EXISTING TREE LINE

WOODED

INSTALL WOOD FRAME GUARD RAIL 26+50-28+50 (Rt. 15')

WETLAND IMPACT AREA #3

PROPOSED HOUSE LOCATION (TYP.)

RAIN GARDEN #5 SEE RH05 FOR FURTHER DETAILS

BUILDING SETBACK LINES (TYP.)

DRIVEWAY EASEMENT

3/4" REBAR ~FND~ +.4

TAX MAP 223 LOT 17
603 PORTLAND STREET

BUFFER AS SHOWN ON SUBDIVISION PLAN

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EVELYN DRIVE ROAD DESIGN SITE PLAN 25+50 - 32+00
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED
PROFESSIONAL ENGINEER

TAX MAP 223 LOT 25
589 PORTLAND STREET

EX. DWELLING

U.P.
PSNH 2/97

BERRY IRON
BOUND ~FND~
FLUSH

U.P.
NET 97

E.O.P.

JEREMIAH LANE

E.O.P.

TO FRANKLIN
STREET

BERRY IRON
BOUND ~FND~
+.1'

EX. DRIVEWAY

TAX MAP 111 LOT 80
596 PORTLAND STREET

TIE INTO EXISTING
PAVEMENT

TAX MAP 223 LOT 19
597 PORTLAND STREET

EX. BARN

EX. DRIVEWAY

PROPOSED 10:1 TAPER

EX. DWELLING

EXISTING TREE LINE

END S.G.C.
STA.: 32+60.12

1" IRON PIPE
~FND~ +.75'
HELD FOR LINE.

U.P.
TO BE RELOCATED
COORDINATE W/ EVERSOURCE
INSTALL LAMP AS PROVIDED IN C7 ON SHEET C102

SAW CUT 1' OFF THE FOG LINE
& MILL 1' BEYOND THE 1' CUT

PLANT WHITE SPRUCE
12' OC (TYP.) (BETWEEN TREE LINE)
PLANTED AT 6' TALL

1' CRUSHED GRAVEL
SHOULDER
BIO.–SWALE #4

END S.G.C.
STA.: 34+30.24

PLANT WHITE SPRUCE
12' OC (TYP.) (BETWEEN TREE LINE)
PLANTED AT 6' TALL

50.0'

R.O.W.

R.O.W.

S.G.C.

S.G.C.

R24.0'

18" STOP LINE
SSWL [T]
4.5' OFF E.O.P.

PROPOSED SHOULDER
WIDENING

STOP

R1-1

STOP SIGN
W/ "EVELYN DRIVE"

APPLICANT TO WORK WITH DPW
AND LAND OWNER OF 600 PORTLAND STREET
TO INSTALL A ROW OF EVERGREEN SHRUBS
FOR THE PURPOSES OF REDUCING HEADLIGHT IMPACTS

TAX MAP 223 LOT 26
600 PORTLAND STREET

SHEET 29

SHEET 30

4" DSYL
[T]

32+00

33+00

DSYL

34+00

34+76.24

4.5'

EVELYN DRIVE

EX. DRIVEWAY TO BE
RELOCATED TO EVELYN
DRIVE AND RECLAIMED
W/ 4" LOAM & SEED

TIE INTO EXISTING
PAVEMENT

U.P.

R5.0'

S.G.C.

R24.0'

END S.G.C.
STA.: 31+34.80

PROP. SIGN
W3–1

1' CRUSHED GRAVEL
SHOULDER

1' CRUSHED GRAVEL
SHOULDER

BIO.–SWALE #3

PROP. DRIVEWAY
LOCATION

STREET TREE
(TYP.)

GRANITE BOUND
TO BE SET (TYP.)

TAX MAP 223 LOT 18
603 PORTLAND STREET

EX. DWELLING

OPEN

EXISTING TREE LINE

EX. GARAGE

END S.G.C.
STA.: 34+30.24

PORTLAND STREET

TAX MAP 223 LOT 27
604 PORTLAND STREET

EX. DWELLING

WOODED

U.P.
PSNH 2/69

1 1/2" IRON PIPE
~FND~ +.2'
SHOT AT BASE
HELD FOR LINE
DETAIL "B"

TAX MAP 223 LOT 17
607 PORTLAND STREET

TO SALMON
FALLS ROAD

EX. DWELLING

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

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EVELYN DRIVE ROAD DESIGN SITE PLAN 32+00 – END
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

BIO-SWALE #3
TAX MAP 223, LOT 18
CB# 47 & #47A
BIO-SWALE #4
DMH #115
CB#44 & #45
TAX MAP 223, LOT 19
DMH #113
CB#42 & 43
RAIN GARDEN #5 OUTLET STRUCTURE #5
LOT 21-24 (S)
LOT 21-25 (S)
EMBEDDED CULVERT
RAIN GARDEN #6 INFILTRATION BASIN
RAIN GARDEN #9 OUTLET STRUCTURE #9
JEREMIAH LANE
TAX MAP 223, LOT 25
LOT 21-23 (S)
LOT 21-22 (D)
LOT 21-26 (D)
LOT 21-27 (S)
LOT 21-28 (S)
PORTLAND STREET
TAX MAP 111, LOT 81
LOT 21-21 (D)
LOT 21-20 (S)
LOT 21-19 (S)
LOT 21-18 (S)
LOT 21-17 (D)
LOT 21-14 (S)
DIVERSION SWALE/BERM
CB#51B
TAX MAP 111, LOT 82
INFILTRATION POND #1 (POND 5fa)
PROPOSED TREE LINE
POND S1 RAIN GARDEN #2
OUTLET STRUCTURE #2
OPEN SPACE AREA #1 LOT 21-53
REFER TO THE GRADING & DRAINAGE PLAN & PROFILES FOR MORE DETAIL
TAX MAP 223, LOT 22
TAX MAP 223, LOT 23
INFILTRATION POND #2 (POND 54a)
LOT 21-15 (FOUR-PLEX)
BIO-SWALE #2 (POND 21A)
TAX MAP 111, LOT 83
DMH #100
CB #21+#21A
PRECAST HEADWALL
CB #20
CB #24
CB #22
CB #23
PRECAST HEADWALL
BOX CULVERT
RIP RAP OUTLET PROTECTION
RIP RAP OUTLET PROTECTION
POND S0 RAIN GARDEN #1
RIP RAP OUTLET PROTECTION
DMH #102
CB #25
DMH #103
CB #27
LOT 21-16 (FOUR-PLEX)
PROPOSED TREE LINE
LOT 21-1 (S)
LOT 21-2 (S)
LOT 21-3 (S)
LOT 21-4 (S)
LOT 21-5 (S)
LOT 21-6 (S)
LOT 21-7 (S)
LOT 21-8 (S)
BIO-SWALE #1 (POND 22A)
BOX CULVERT HEADWALL
OPEN SPACE AREA #2 LOT 21-54
CB #26
CB #29
CB #30
DMH #104
EVELYN DRIVE
OUTLET STRUCTURE #3
REFER TO THE RAIN GARDEN PLANS FOR MORE DETAIL
FRANKLIN STREET
HEADWALL
POND S3 RAIN GARDEN #3
CB #31
E-SPILL WAY
LOT 21-52 (S)
LOT 21-51 (S)
LOT 21-50 (S)
LOT 21-49 (S)
LOT 21-48 (S)
LOT 21-47 (S)
LOT 21-46 (S)
LOT 21-45 (S)
LOT 21-44 (S)
PROPOSED TREE LINE
TAX MAP 111, LOT 84

GRAPHIC SCALE
50 0 25 50 100 200
(IN FEET)
1 inch = 50 ft.

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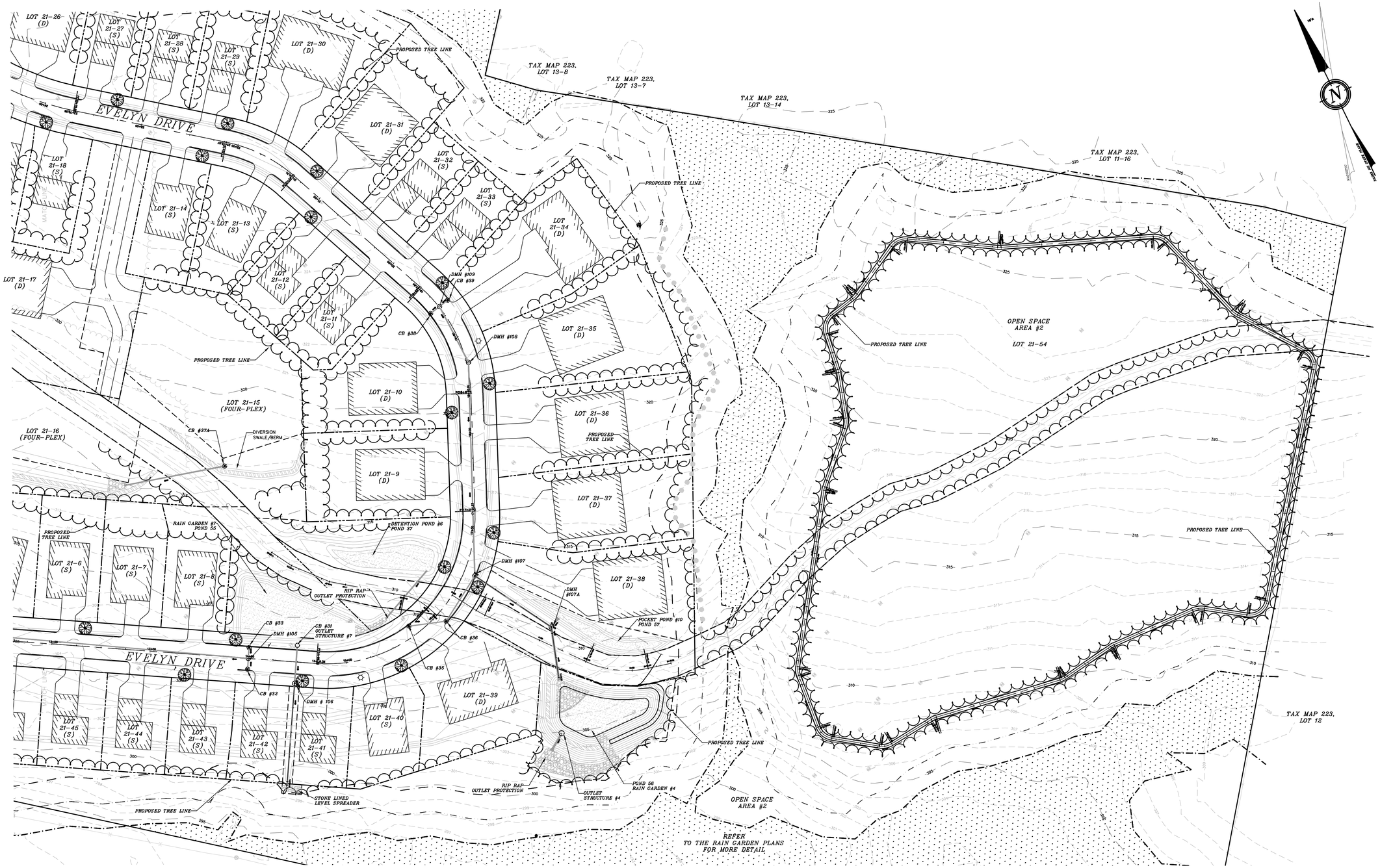
DRAINAGE OVERVIEW PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE :	1 IN. EQUALS 50 FT.
DATE :	APRIL 4, 2017
FILE NO. :	DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



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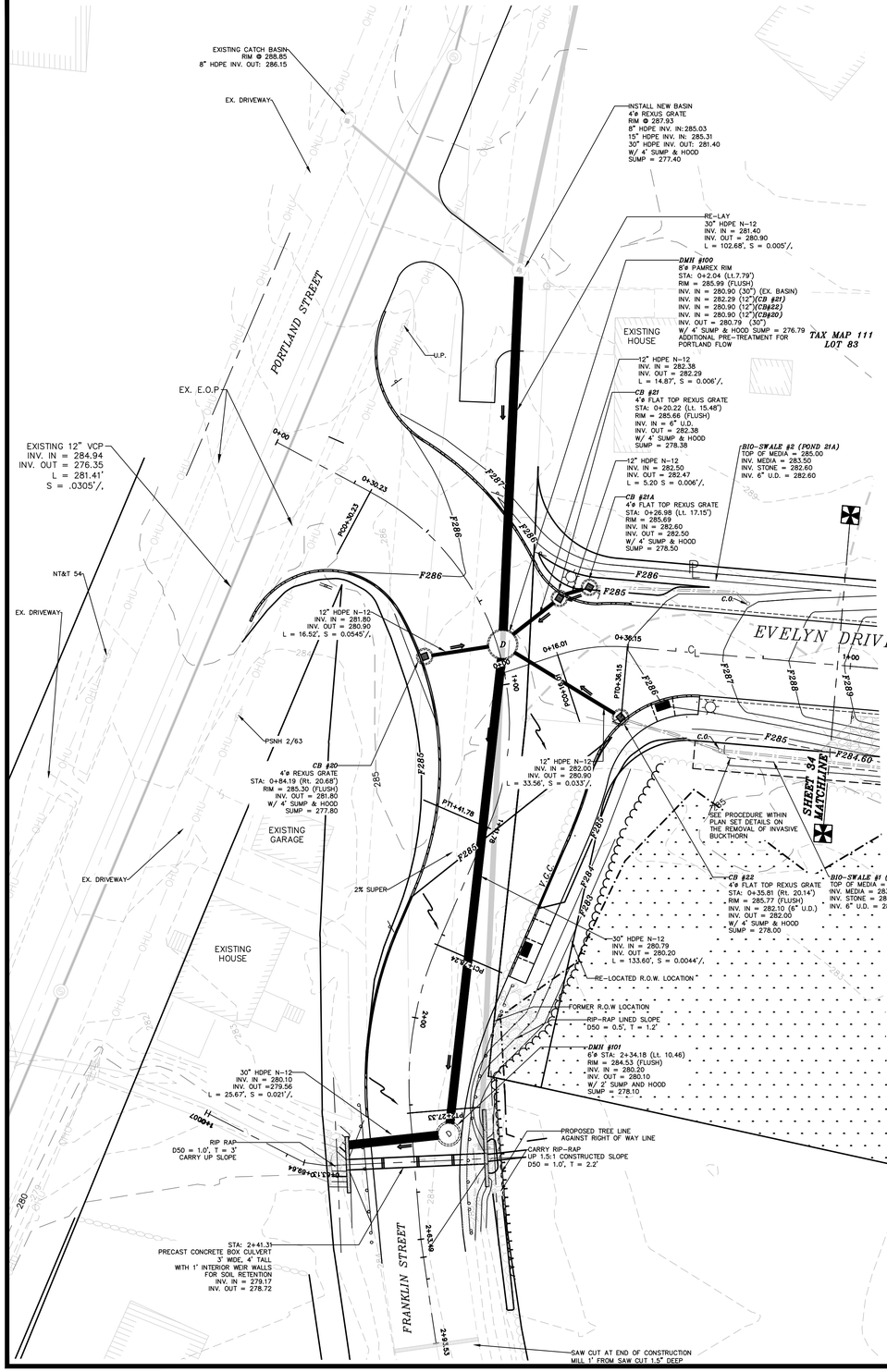
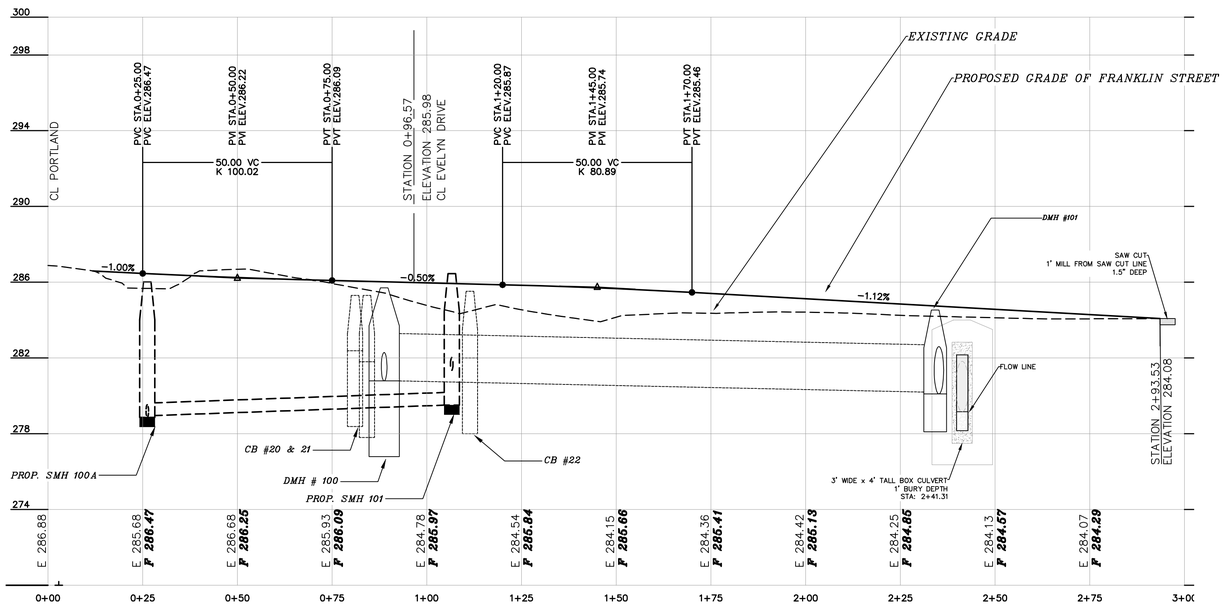
DRAINAGE OVERVIEW PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 50 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

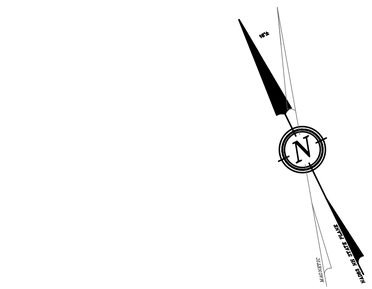
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER





NOTE:

SMH 101 IS LOCATED ON EVELYN DRIVE AND NOT ASSOCIATED WITH THE PROPOSED GRADING OF FRANKLIN STREET



NOTES:

1.) THE PURPOSE OF THIS PLAN IS TO DEMONSTRATE GRADING AND DRAINAGE SYSTEMS FOR THE PROPOSED ROADWAY

2.) UNDERGROUND UTILITY LOCATIONS ARE BASED UPON BEST AVAILABLE EVIDENCE AND ARE NOT FIELD VERIFIED. LOCATING AND PROTECTING ANY ABOVE AND BELOW GROUND UTILITIES IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR. ANY UTILITY CONFLICTS SHOULD BE REPORTED IMMEDIATELY TO THE DESIGN ENGINEER.

3.) THE CONTRACTOR SHALL CALL AND COORDINATE WITH DIGSAFE 1-888-344-7233 AT LEAST 72 HOURS PRIOR TO COMMENCING ANY EXCAVATION ON PUBLIC OR PRIVATE PROPERTY.

4.) SEE DETAILS CONCERNING SITE LAYOUT, DRAINAGE, UTILITY AND SEDIMENT AND EROSION CONTROLS.

5.) ALL CATCH BASINS SHALL BE PRE-CAST H-20 LOADING AND SHALL BE EQUIPPED WITH DEEP SUMPS (4' MIN.) AND HOODS (SEE DETAILS) HOODS ARE TO BE "THE ELIMINATOR" BY KLEANSTREAM. RIMS ARE TO BE REXUS STYLE AND SHALL BE SET FLUSH WITH FINISH GRADE, UNLESS OTHERMSE INSTRUCTED DURING CONSTRUCTION BY ROCHESTER DPW. RIMS ABOVE FINISH GRADE WILL BE NOT BE ACCEPTED. ALL RIMS, GRATES AND COVERS ARE TO BE U.S.A MADE.

6.) SEE SEDIMENT & EROSION CONTROL PLAN FOR INLET PROTECTION AND CONTROLS FOR THE ENTIRE SITE

7.) ALL DRAINAGE PIPE IS TO BE HDPE N-12 ASTM F2648. (GREEN PIPE) INDIVIDUAL PIPE SIZES ARE SPECIFIED

8.) ALL ELEVATIONS TO BE VERIFIED BY THE CONTRACTOR PRIOR TO CONSTRUCTION. THE DESIGN ENGINEER IS TO BE NOTIFIED IMMEDIATELY OF ANY DISCREPANCY. TEMPORARY BENCHMARKS (T.B.M.) ARE TO BE PROVIDED BY THE DESIGN ENGINEER.

9.) NOTE THAT THE PROJECT IS SUBJECT TO THE EPA NPDES PHASE II. THE NOTICE OF INTENT (NOI) MUST BE FILED ALONG WITH A STORMWATER POLUTION PREVENTION PLAN (SWPPP). WEEKLY INSPECTIONS WILL BE CONDUCTED BY THE DESIGN ENGINEER.

10.) UPON FINAL COMPLETION AND 85% STABALIZATION THE DRAINAGE SYSTEM IS TO BE CLEANED OF ALL DEBRIS TO INCLUDE THE PUMPING OF THE BASIN SUMPS.

11.) ALL UNPAVED AREAS ARE TO RECEIVE 4" QUALITY LOAM AND SEED

12.) ALL BASINS AND DRAINS ARE TO HAVE BOOTS INSTALLED ON ALL INLETS AND OUTLETS

13.) ALL CATCH BASINS TO BE LINED WITH A POLYETHYLENE LINER

14.) ALL PROPOSED CLEAN OUTS ARE TO BE VERTICAL 12" N-12 PIPE WITH CAST IRON COVERS SCREWED WITH STAINLESS SCREWS. THE COVER IS TO BE DEMARCATED WITH A "D"

15.) SEE SEPARATE SHEET FOR COMPLETE LOT GRADING. GRADING ON THE LOTS IS SCHEMATIC HOWEVER PROVIDES THE DESIGNERS INTENT FOR STORMWATER FLOW. IF THE DEVELOPER OF FUTURE OWNERS WHISH TO MODIFY THE GRADING PROVIDED, THERE MAY BE FURTHER ANALYSIS AND APPROVAL BY THE DPW UNDER THE CHAPTER 50 APPLICATION.

16.) RELOCATION AND REUSE OF THE EXISTING CATCH BASIN AND PIPING AT THE STREET NEEDS TO BE APPROVED IN THE FIELD BY THE ROCHESTER CITY ENGINEER OR UTILITIES FOREMAN. IF THE STRUCTURE OR PIPE ARE DEEMED INADEQUATE, NEW MATERIALS SHALL BE USED.

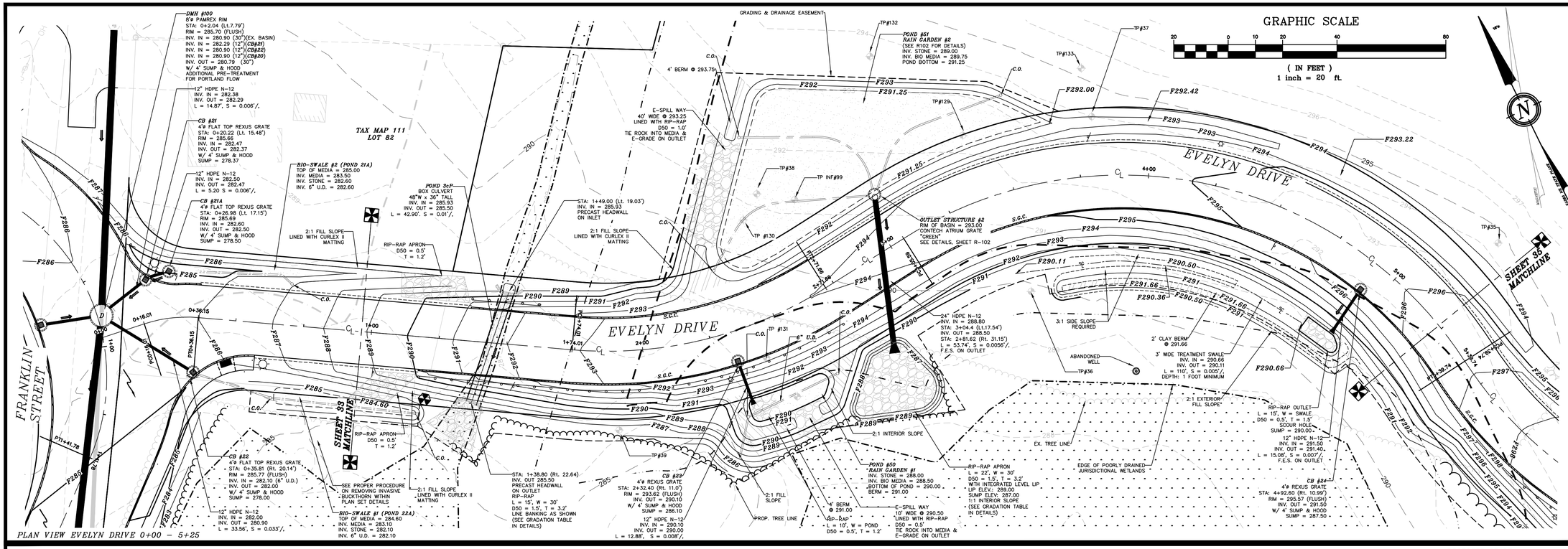
REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

GRADING & DRAINAGE PLAN AND PROFILE OF INTERSECTION
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



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#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

GRADING & DRAINAGE PLAN AND PROFILE OF EVELYN DRIVE 0+00 – 5+25
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

KENNETH A. BERRY No. 14243 LICENSED PROFESSIONAL ENGINEER - STATE OF NEW HAMPSHIRE

GRAPHIC SCALE

20 0 10 20 40 60

(IN FEET)
1 inch = 20 ft.

PLAN VIEW EVELYN DRIVE 5+25–10+75 CONTECH ATRIUM GRATE "GREEN"

PROFILE VIEW EVELYN DRIVE
5+25 – 10+75
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'

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GRADING & DRAINAGE PLAN AND PROFILE OF EVELYN DRIVE 5+25 – 10+75
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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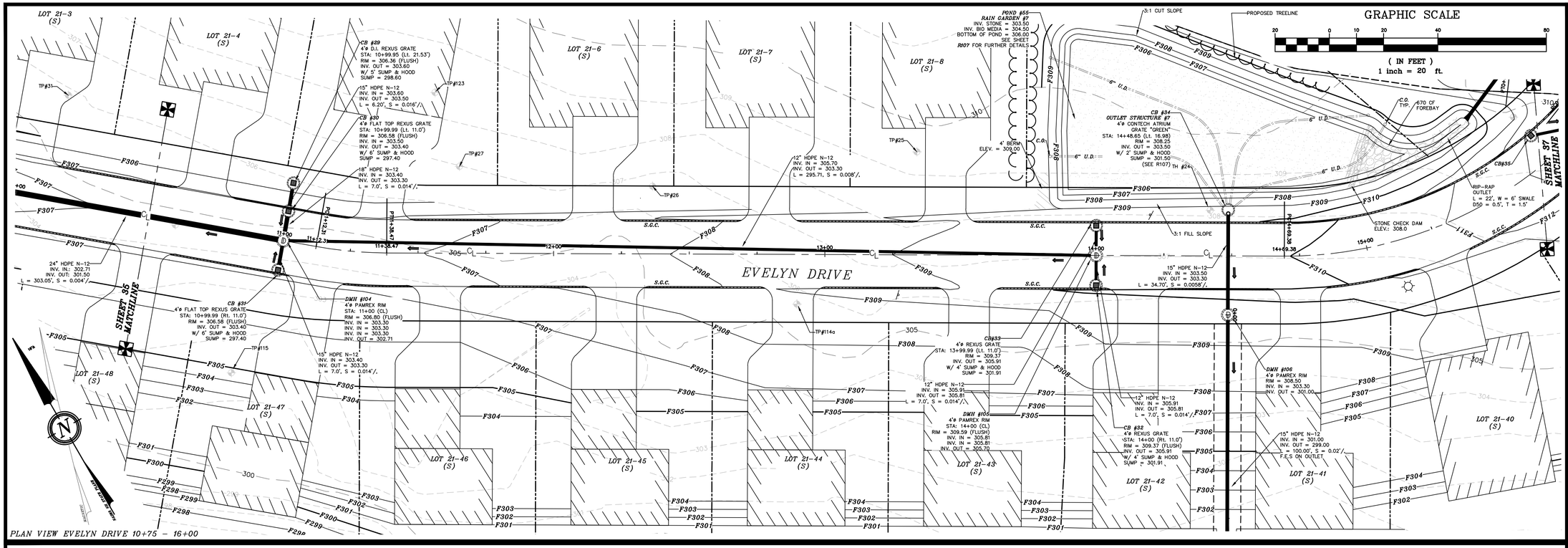
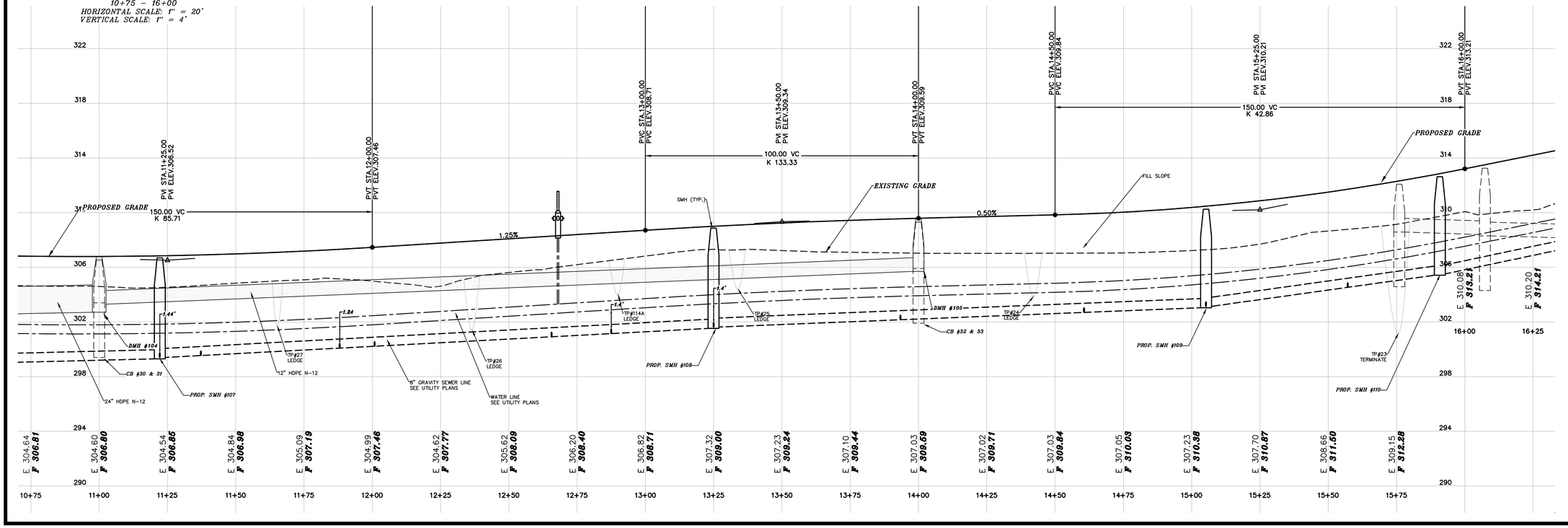
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY No. 14243 LICENSED PROFESSIONAL ENGINEER



PLAN VIEW EVELYN DRIVE 10+75 – 16+00

PROFILE VIEW EVELYN DRIVE
10+75 – 16+00
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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GRADING & DRAINAGE PLAN AND PROFILE OF EVELYN DRIVE 10+75 – 16+00
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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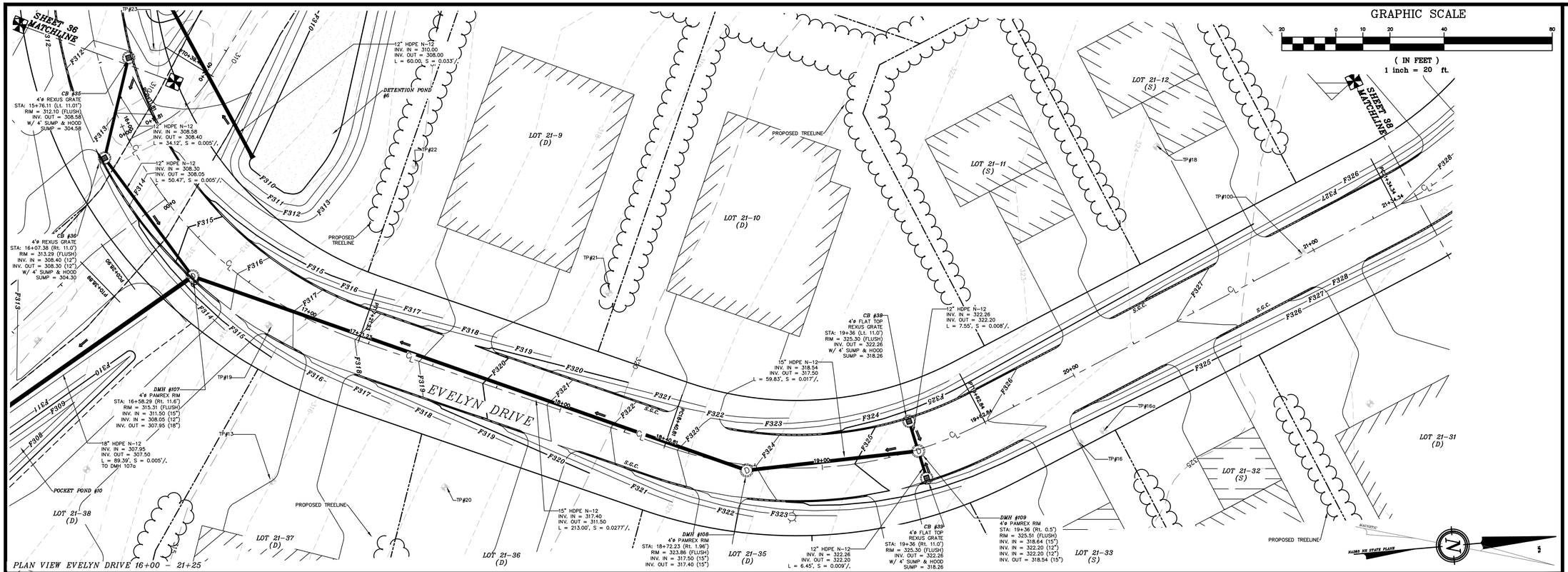
KENNETH A. BERRY No. 14243 LICENSED PROFESSIONAL ENGINEER - STATE OF NEW HAMPSHIRE



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GRADING & DRAINAGE PLAN AND PROFILE OF EVELYN DRIVE 16+00 – 21+50
FOR
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
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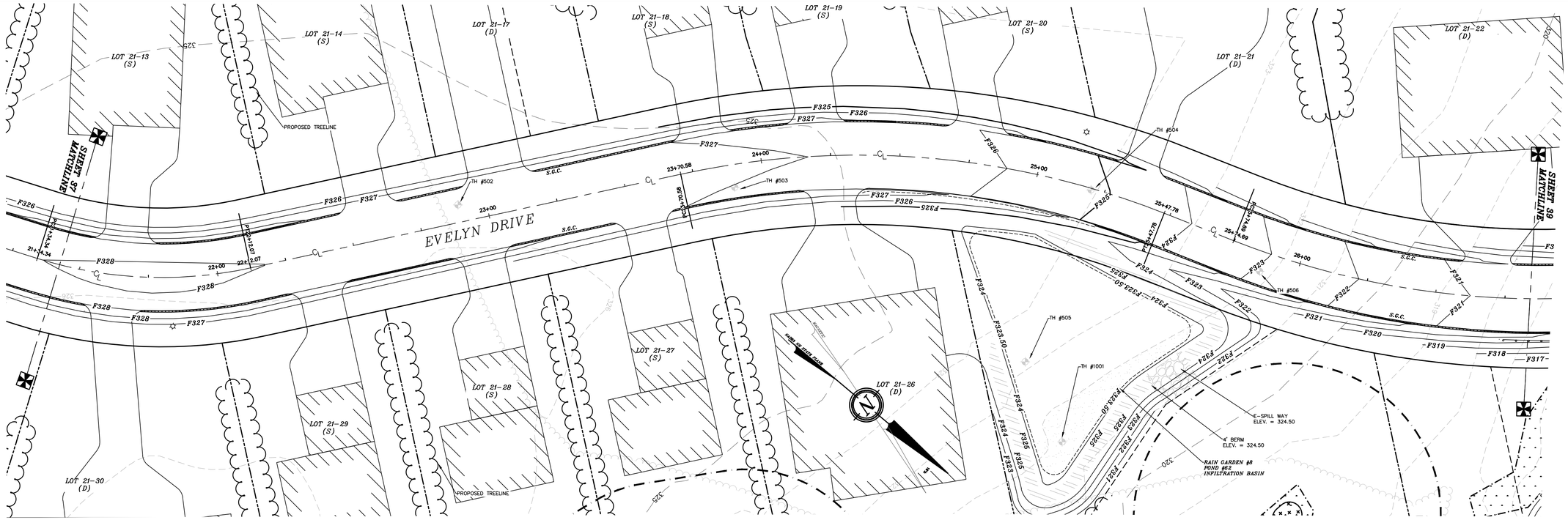
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



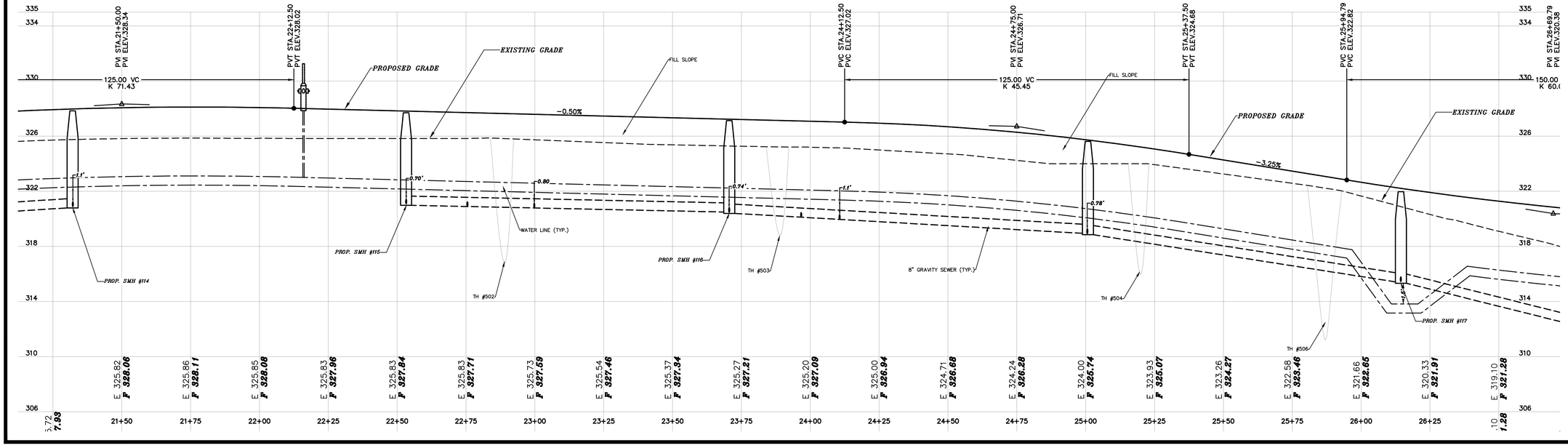
PLAN VIEW EVELYN DRIVE
21+25 – 26+50

PROFILE VIEW EVELYN DRIVE
21+25 – 26+50
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.



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GRADING & DRAINAGE PLAN AND PROFILE OF EVELYN DRIVE 21+25 – END
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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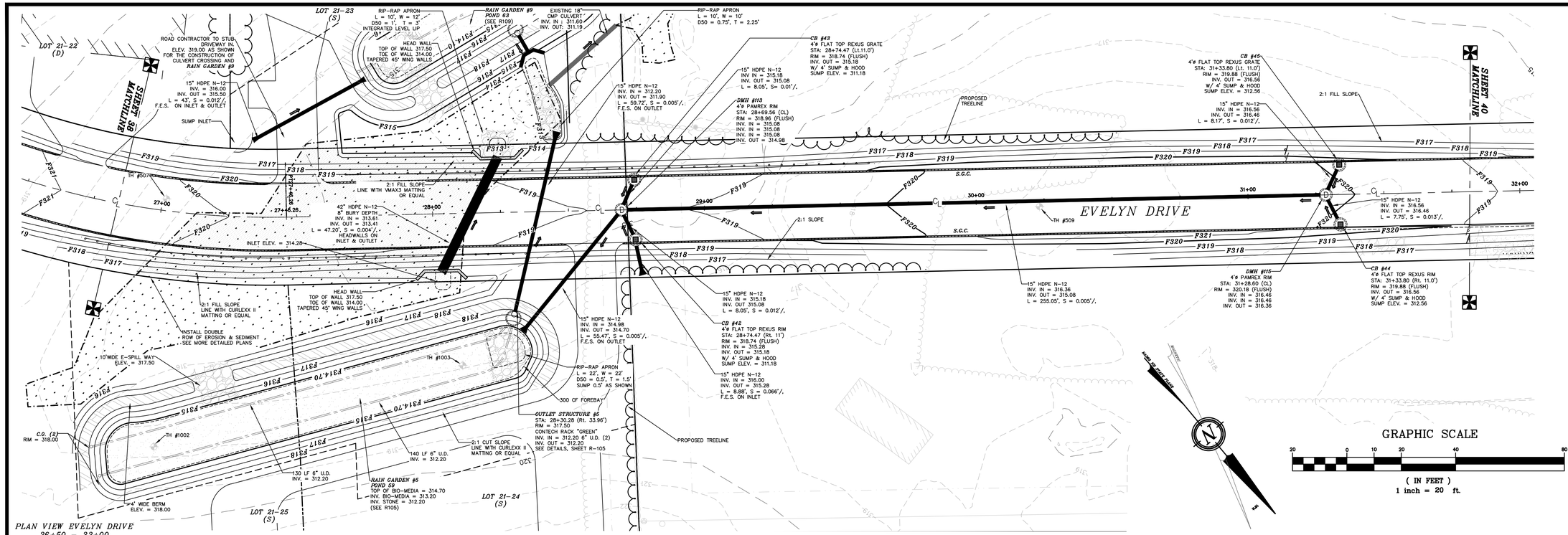
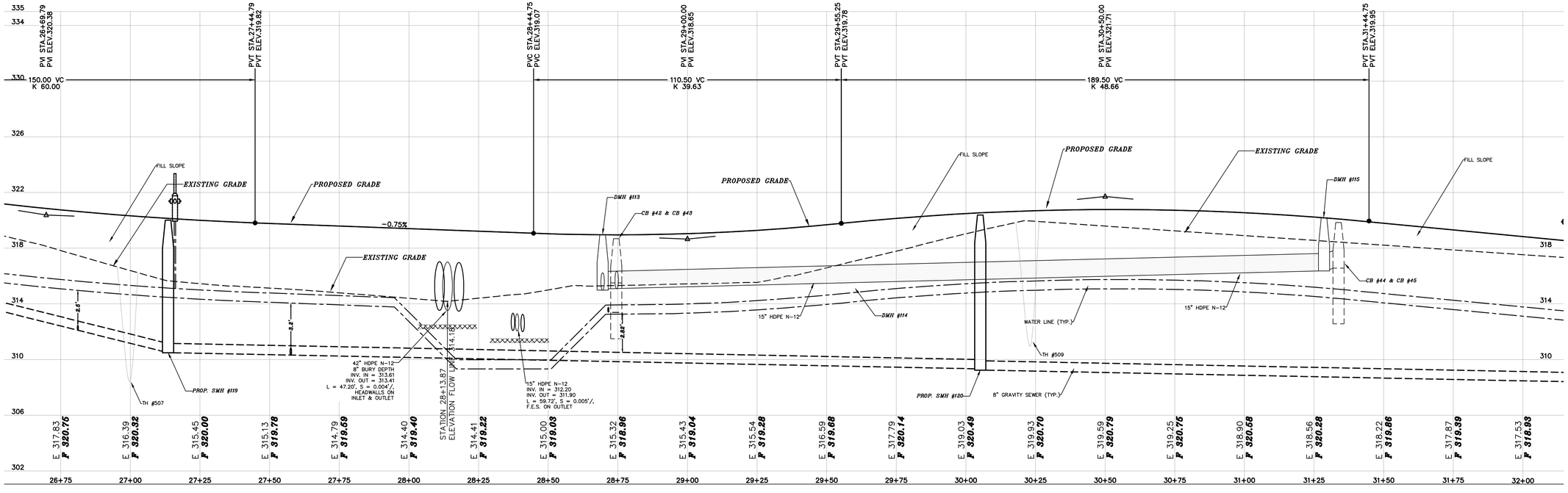
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



PLAN VIEW EVELYN DRIVE
26+50 – 32+00

PROFILE VIEW EVELYN DRIVE
26+50 – 32+00
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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GRADING & DRAINAGE PLAN AND PROFILE OF EVELYN DRIVE 26+50 – 32+00
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
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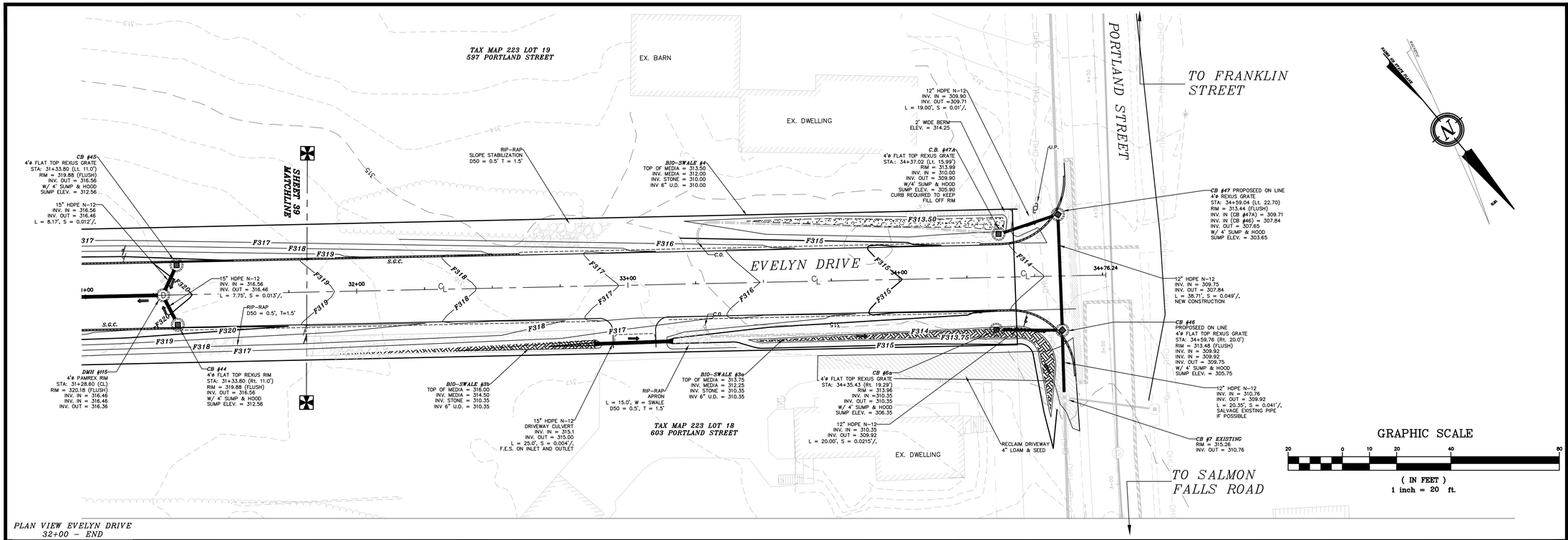
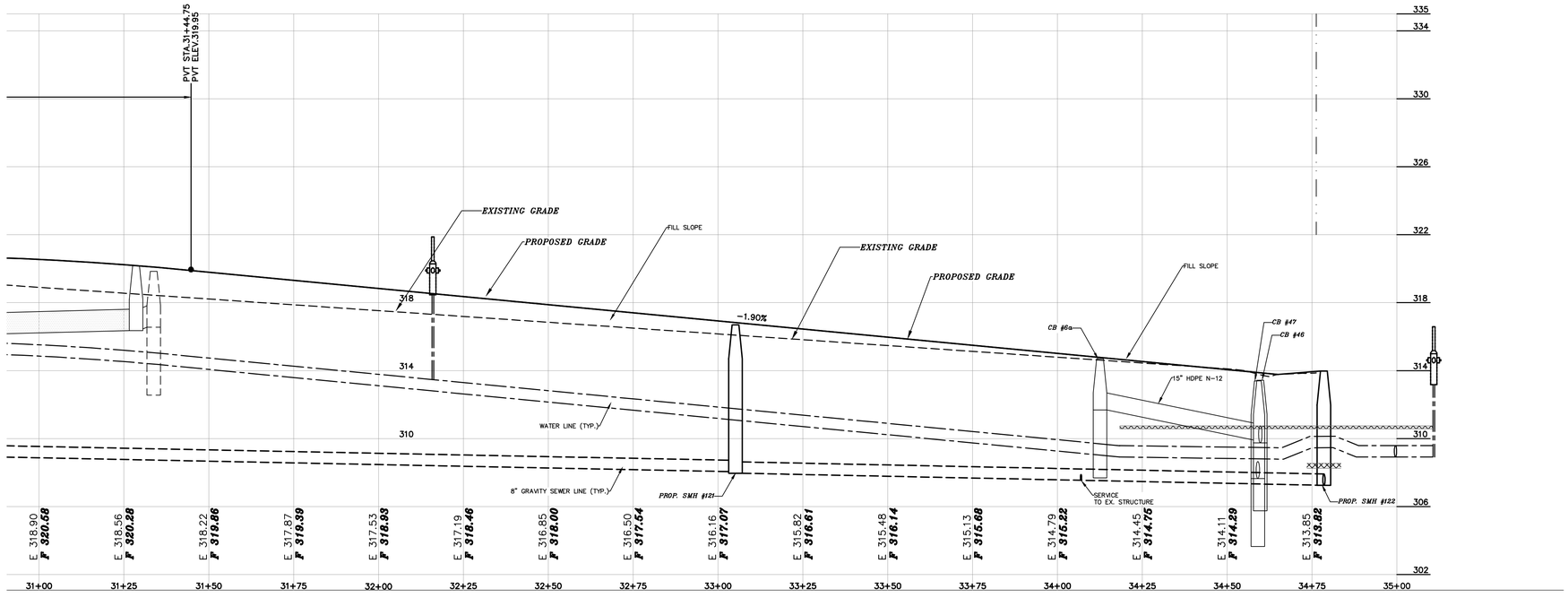
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY No. 14243
LICENSED PROFESSIONAL ENGINEER



PLAN VIEW EVELYN DRIVE
32+00 – END

PROFILE VIEW EVELYN DRIVE
32+00 – END
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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GRADING & DRAINAGE PLAN AND PROFILE OF EVELYN DRIVE 32+00 – END
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 20 FT.
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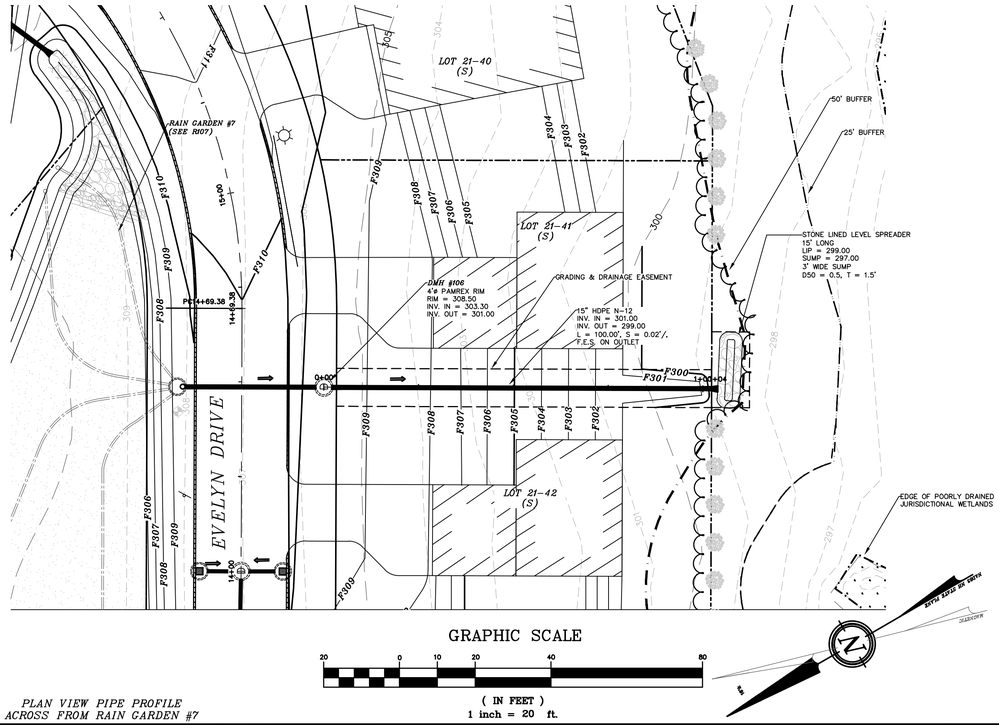
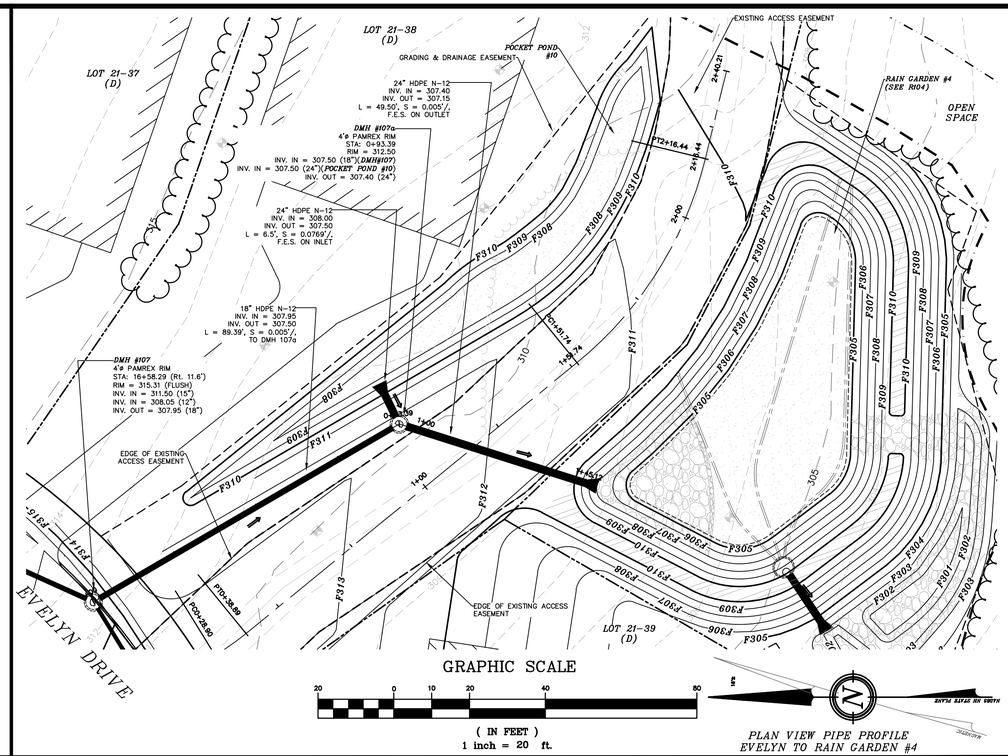
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

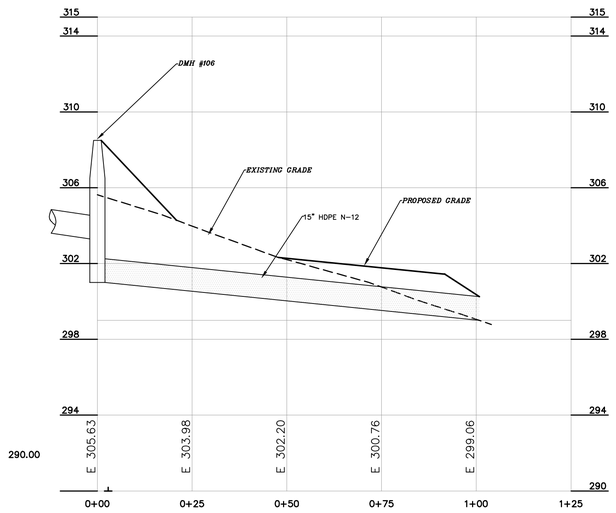


PLAN VIEW PIPE PROFILE
ACROSS FROM RAIN GARDEN #7

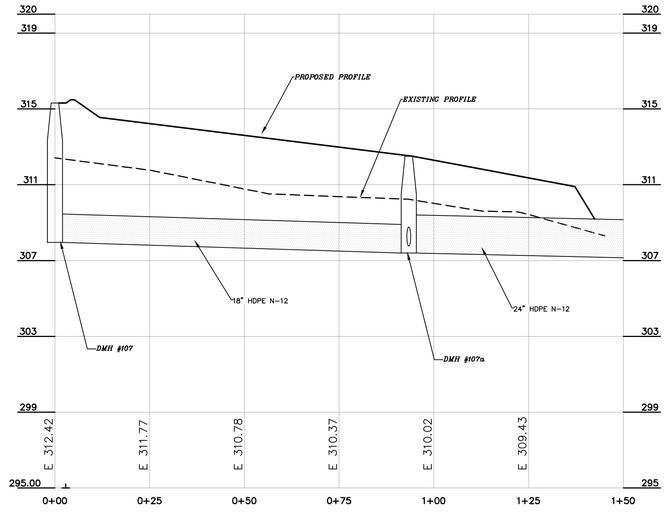


PLAN VIEW PIPE PROFILE
EVELYN TO RAIN GARDEN #4

PROFILE VIEW PIPE PROFILE
ACROSS FROM RAIN GARDEN #7
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



PROFILE VIEW PIPE PROFILE
EVELYN TO RAIN GARDEN #4
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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PIPE PROFILES
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS AS SHOWN FT.
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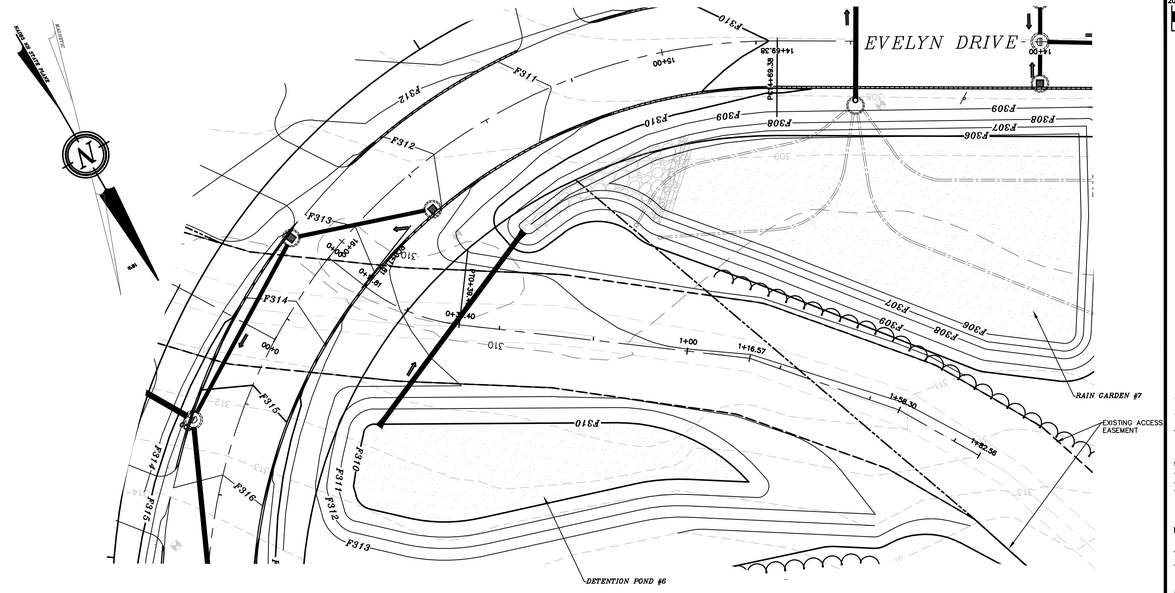
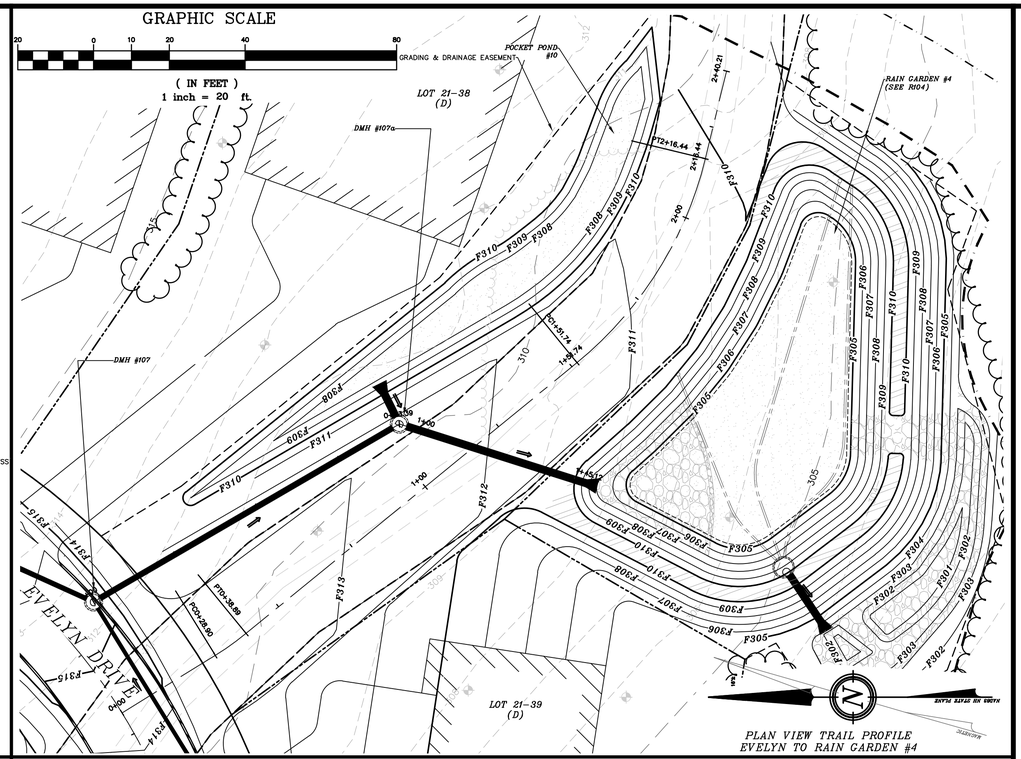
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

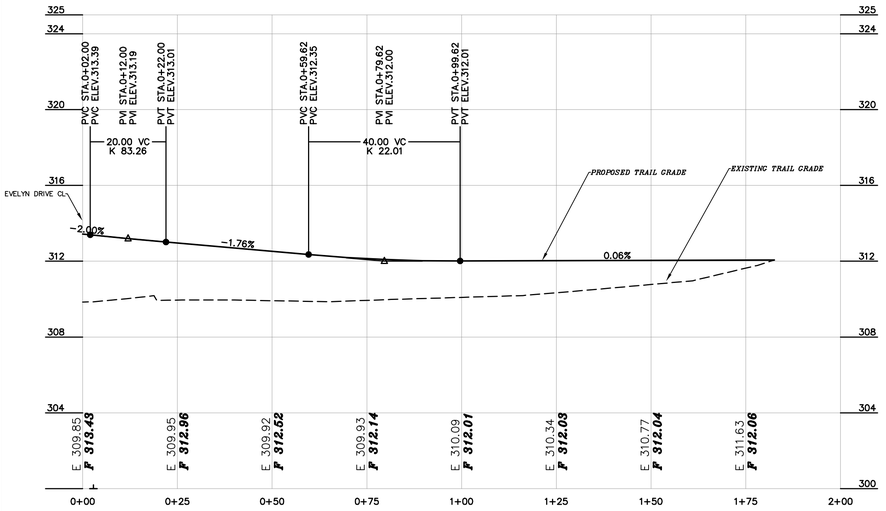


PLAN VIEW TRAIL PROFILE
BETWEEN RAIN GARDENS #6 & 7

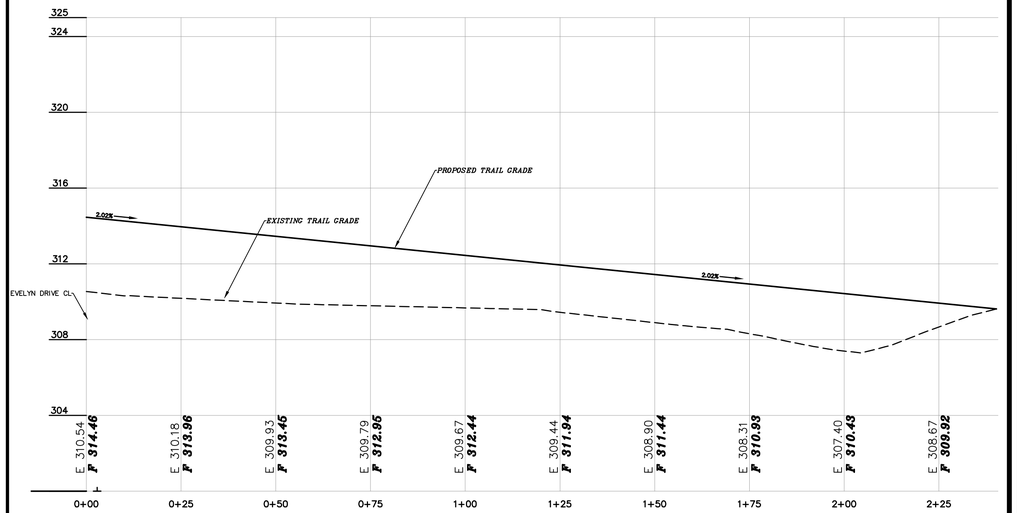


PLAN VIEW TRAIL PROFILE
EVELYN TO RAIN GARDEN #4

PROFILE VIEW TRAIL PROFILE
BETWEEN RAIN GARDENS #6 & #7
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



PROFILE VIEW TRAIL PROFILE
EVELYN TO RAIN GARDEN #4
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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TRAIL PROFILES
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY No. 14243 LICENSED PROFESSIONAL ENGINEER

FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
3/8"	90 – 100
#4"	20 – 55
# 8	5 –30
# 16	0 – 10
# 50	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #89 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
4. DO NOT PLACE THE BIORETENTION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
5. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF WATER FROM EXCAVATIONS) TO THE BIORETENTION AREA DURING ANY STAGE OF CONSTRUCTION.
6. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE PERFORM EXCAVATIONS WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.

MAINTENANCE REQUIREMENTS

1 SYSTEMS SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND FOLLOWING ANY RAINFALL EXCEEDING 2.5 INCHES IN A 24-HOUR PERIOD, WITH MAINTENANCE OR REHABILITATION CONDUCTED AS A WARRANTED BY SUCH INSPECTION.

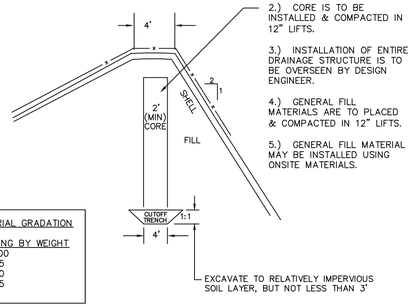
2 PRETREATMENT MEASURES SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND CLEANED OF ACCUMULATED SEDIMENT AS WARRANTED BY INSPECTION, BUT NO LESS THAN ONCE ANNUALLY.

3 AT LEAST ONCE ANNUALLY, SYSTEM SHOULD BE INSPECTED FOR DRAWDOWN TIME. IF BIORETENTION SYSTEM DOES NOT DRAIN WITHIN 72-HOURS FOLLOWING A RAINFALL EVENT, THEN A QUALIFIED PROFESSIONAL SHOULD ASSESS THE CONDITION OF THE FACILITY TO DETERMINE MEASURES REQUIRED TO RESTORE FILTRATION FUNCTION OR INFILTRATION FUNCTION (AS APPLICABLE), INCLUDING BUT NOT LIMITED TO REMOVAL OF ACCUMULATED SEDIMENTS OR RECONSTRUCTION OF THE FILTER MEDIA.

4 VEGETATION SHOULD BE INSPECTED AT LEAST ANNUALLY, AND MAINTAINED IN HEALTHY CONDITION, INCLUDING, PRUNING, REMOVAL, AND REPLACEMENT OF DEAD OR DISEASED VEGETATION, AND REMOVAL OF INVASIVE SPECIES.

DESIGN REFERENCES

1 UNH STORMWATER CENTER
2 NEW HAMPSHIRE STORMWATER MANAGEMENT MANUAL, VOLUME 2, DECEMBER 2008 AS AMENDED.



1.) 2' CORE IS TO BE CONSTRUCTED OF COMPACTED LOAM MATERIAL.

2.) CORE IS TO BE INSTALLED & COMPACTED IN 12" LIFTS.

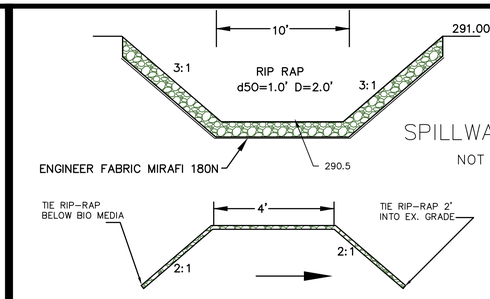
3.) INSTALLATION OF ENTIRE DRAINAGE STRUCTURE IS TO BE OVERSEEN BY DESIGN ENGINEER.

4.) GENERAL FILL MATERIALS ARE TO PLACED & COMPACTED IN 12" LIFTS.

5.) GENERAL FILL MATERIAL MAY BE INSTALLED USING ONSITE MATERIALS.

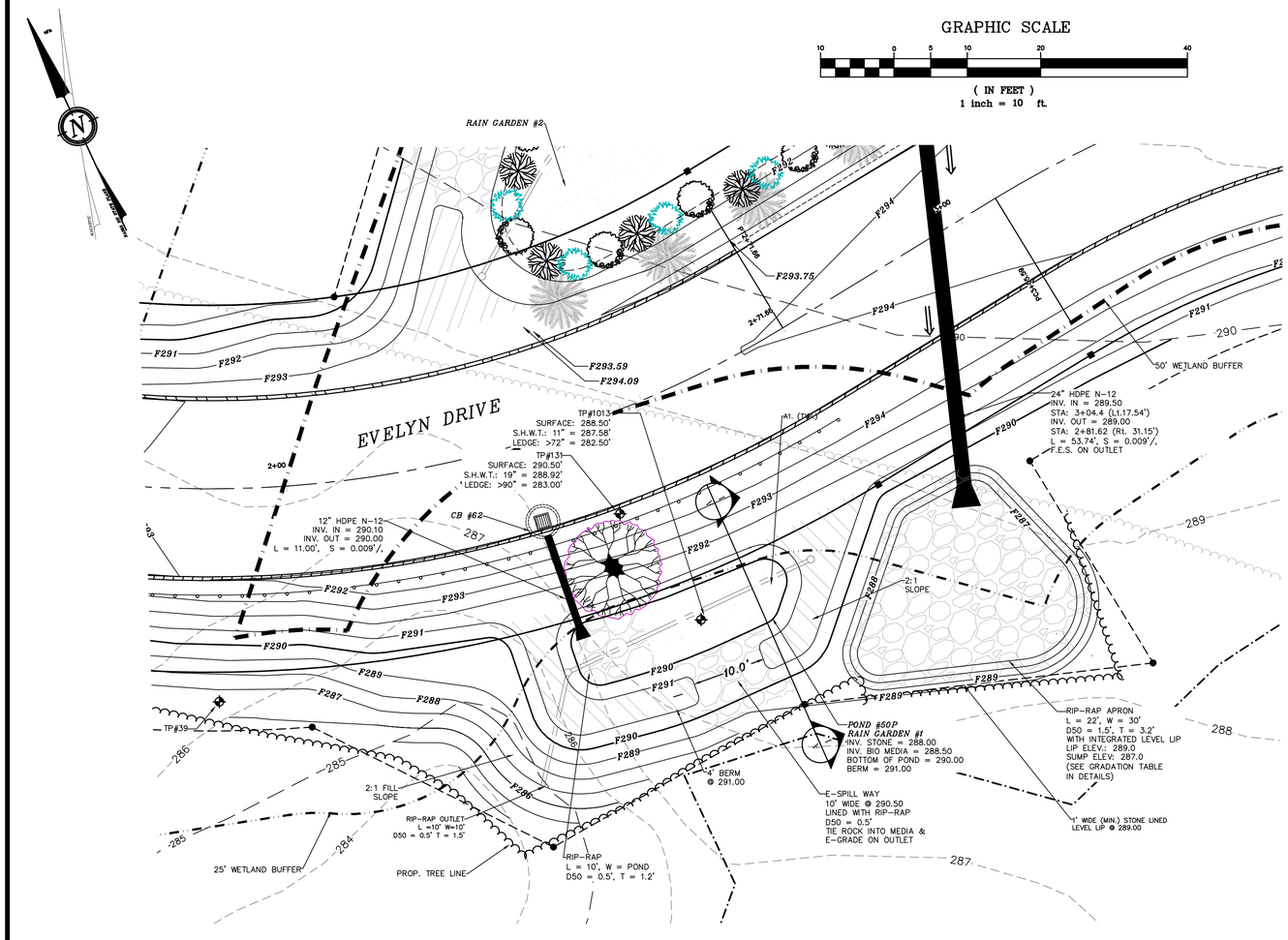
LOW PERMEABILITY MATERIAL GRADATION

SIEVE SIZE	% PASSING BY WEIGHT
#4	95 – 100
#40	60 – 95
#100	40 – 60
#200	25 – 45



EMERGENCY SPILLWAY PROFILE

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES



FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
3/8"	90 – 100
#4"	20 – 55
# 8	5 –30
# 16	0 – 10
# 50	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #89 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
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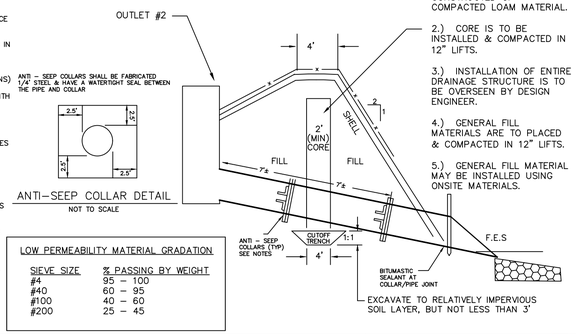
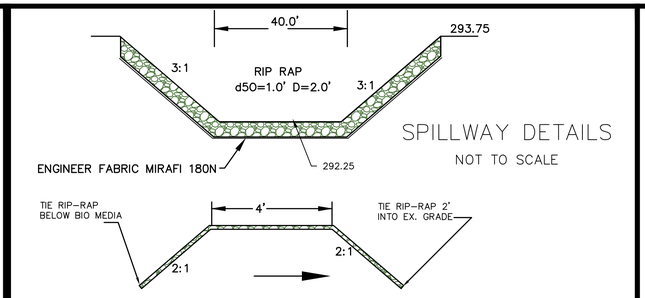


ANTI-SEEP COLLAR DETAIL
NOT TO SCALE

ANTI – SEEP COLLARS SHALL BE FABRICATED 1/4" STEEL & HAVE A WATERTIGHT SEAL BETWEEN THE PIPE AND COLLAR

LOW PERMEABILITY MATERIAL GRADATION

SIEVE SIZE	% PASSING BY WEIGHT
#4	95 – 100
#40	60 – 95
#100	40 – 60
#200	25 – 45



SPILLWAY DETAILS
NOT TO SCALE

EMERGENCY SPILLWAY PROFILE

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#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

TREES

Qty	Botanical Name / Common Name	Root	Sized
5	acer saccharum / Sugar Maple	Cont.	2"-2.5" Caliper, balled and burlapped
15	PICEA glauca / White SPRUCE	Cont.	6' WHEN PLANTED

SHRUBS

Sym	Qty	Botanical Name / Common Name	Root	Size
A	18	Cornus sericea dogwood / Dogwood	Cont.	2-3' Ht.
B	18	vaccinium corymbosum / Highbush blueberry	Cont.	5 Gal.
C	20	Ilex glabra 'Nordic' / Nordic Inkberry	Cont.	2"-2 1/2' Ht.

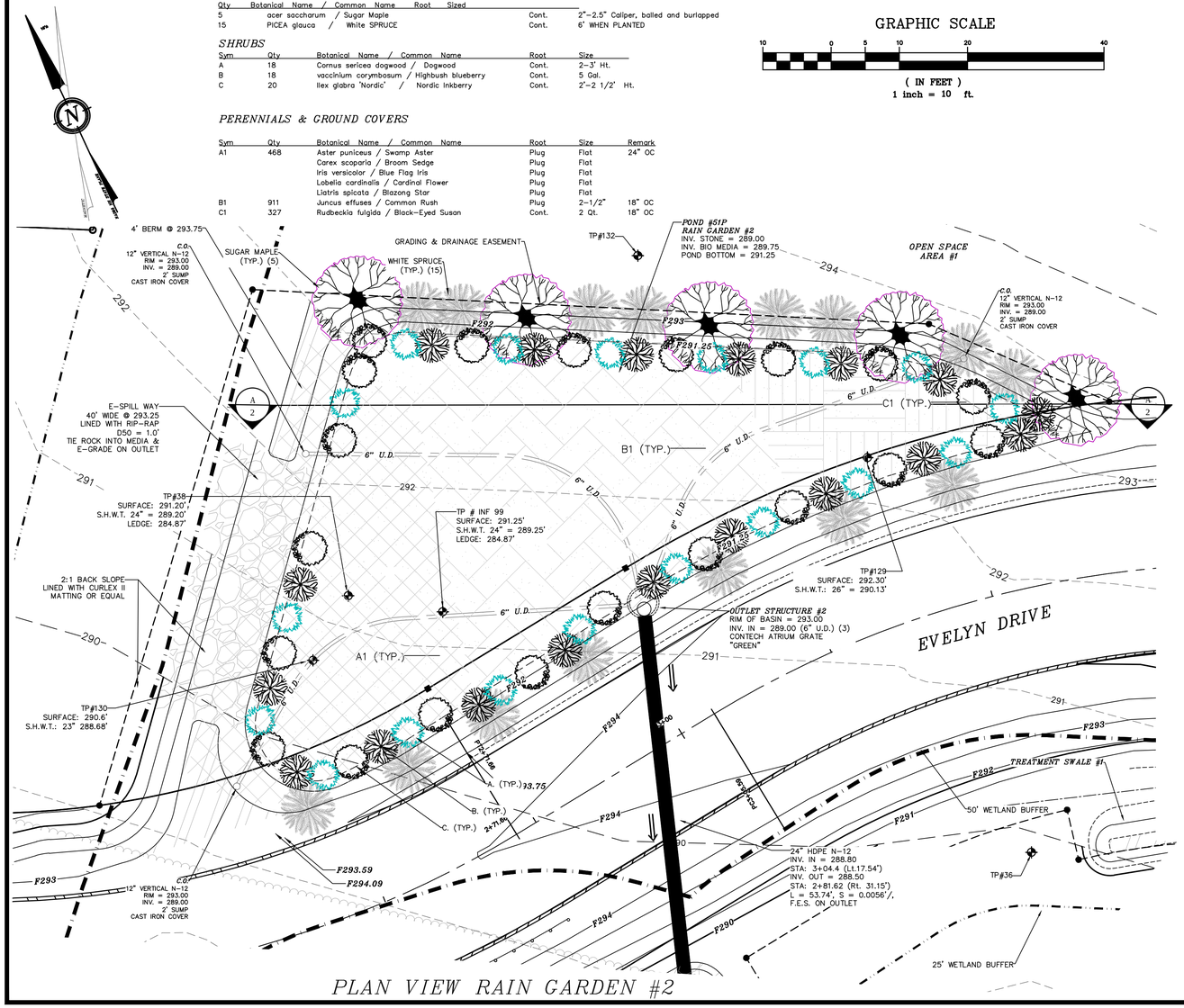
PERENNIALS & GROUND COVERS

Sym	Qty	Botanical Name / Common Name	Root	Size	Remark
A1	468	Aster puniceus / Swamp Aster	Plug	Flat	24" OC
		Carex scoparia / Broom Sedge	Plug	Flat	
		Iris versicolor / Blue Flag Iris	Plug	Flat	
		Lobelia cardinalis / Cardinal Flower	Plug	Flat	
		Liatris spicata / Blazong Star	Plug	Flat	
B1	911	Juncus effuses / Common Rush	Plug	2-1/2"	18" OC
C1	327	Rudbeckia fulgida / Black-Eyed Susan	Cont.	2 Qt.	18" OC

GRAPHIC SCALE

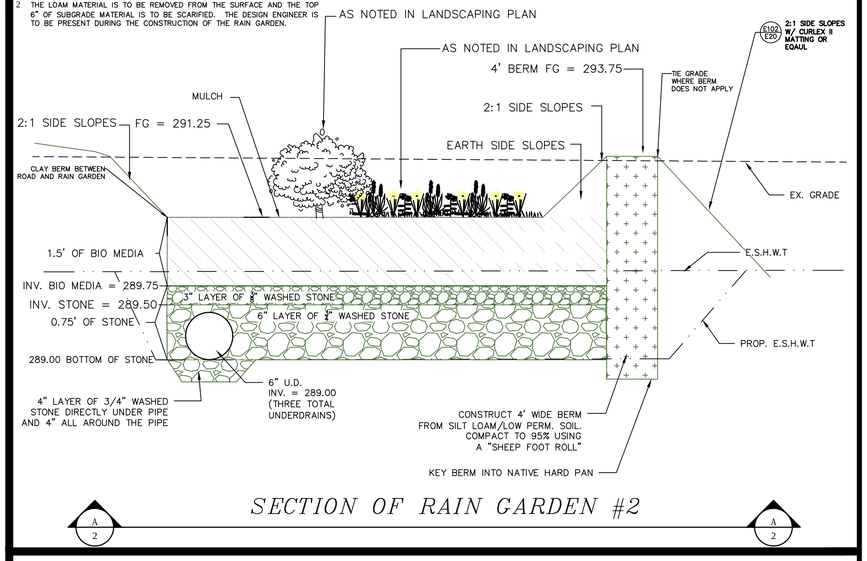
10 0 5 10 20 40

(IN FEET)
1 inch = 10 ft.

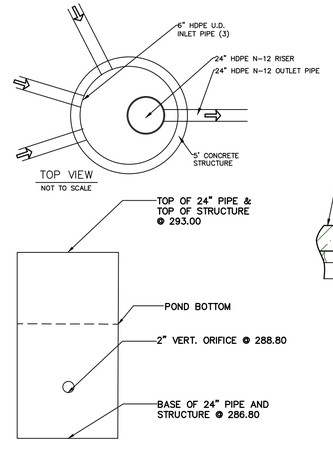


PLAN VIEW RAIN GARDEN #2

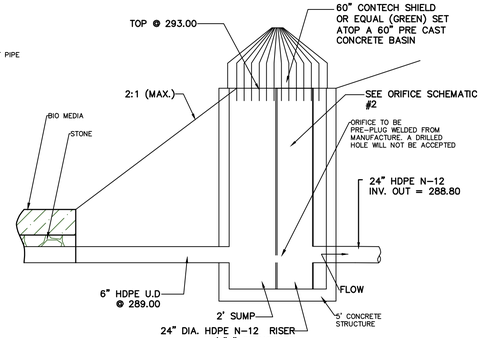
1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
2 THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE RAIN GARDEN.



SECTION OF RAIN GARDEN #2



ORIFICE SCHEMATIC #2
NOT TO SCALE



OUTLET STRUCTURE #2
NOT TO SCALE

R102

RAIN GARDEN #2 DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 10 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE – KENNETH A. BERRY No. 14243 (LICENSED) – PROFESSIONAL ENGINEER

SHEET 44 OF 102

FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
3/8"	90 – 100
#4"	20 – 55
# 8	5 –30
# 16	0 – 10
# 50	0 – 5

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NOTES

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3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
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MAINTENANCE REQUIREMENTS

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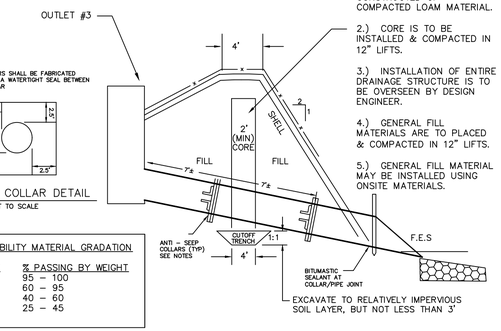
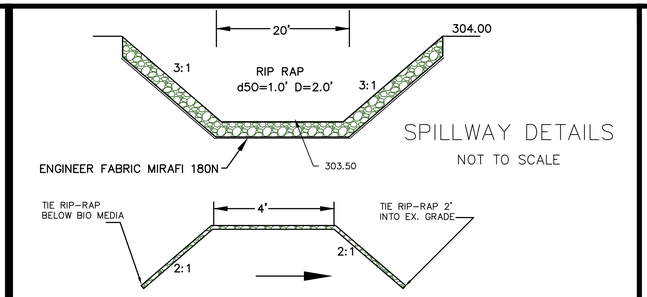


LOW PERMEABILITY MATERIAL GRADATION

SIEVE SIZE	% PASSING BY WEIGHT
#4	95 – 100
#40	60 – 95
#100	40 – 60
#200	25 – 45



EMERGENCY SPILLWAY PROFILE

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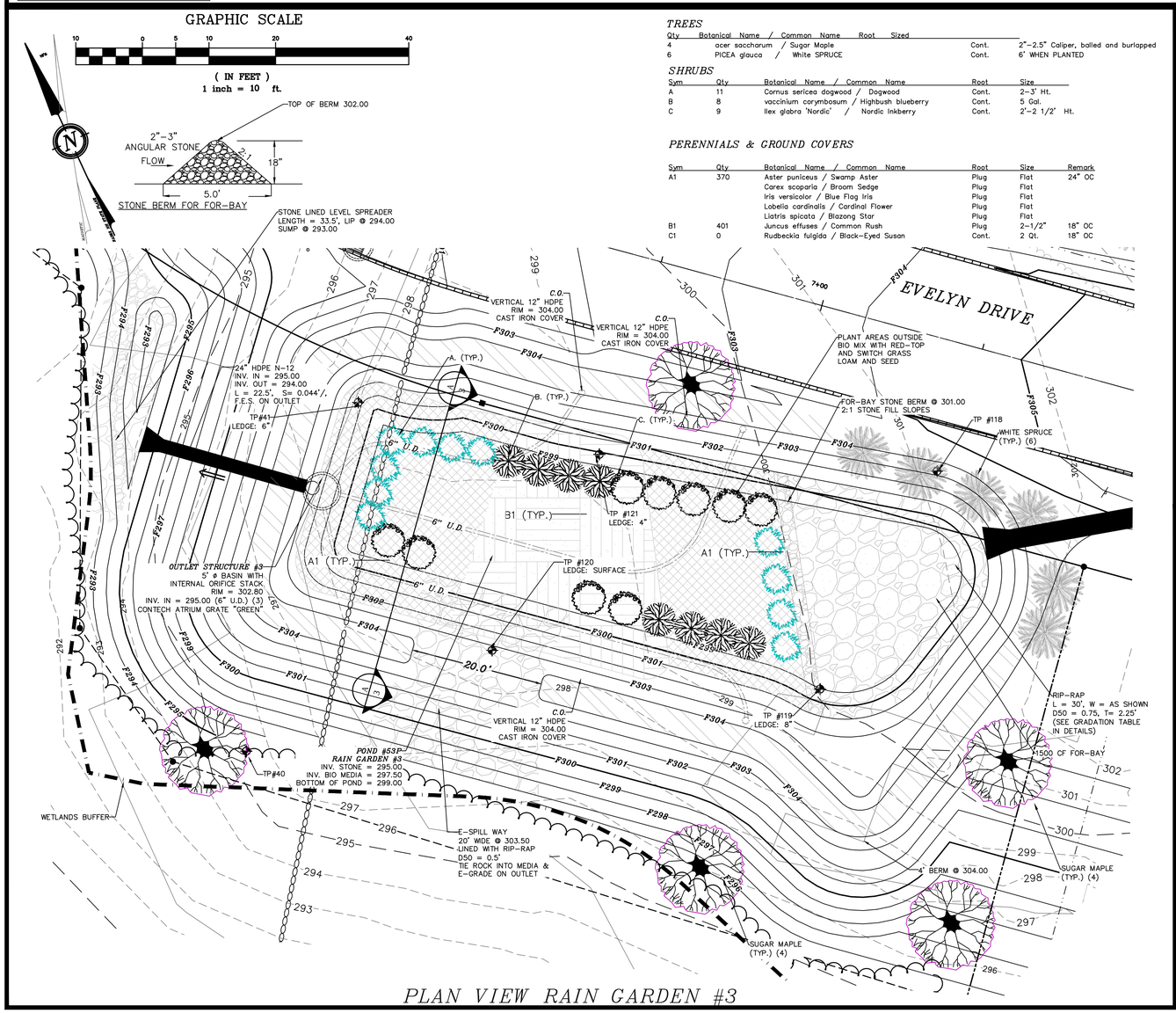
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

RAIN GARDEN #3 DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21



PLAN VIEW RAIN GARDEN #3

TREES

Qty	Botanical Name / Common Name	Root	Sized
4	acer saccharum / Sugar Maple	Cont.	2"–2.5" Caliper, balled and burlapped
6	PICEA glauca / White SPRUCE	Cont.	6' WHEN PLANTED

SHRUBS

Sym	Qty	Botanical Name / Common Name	Root	Size
A	11	Cornus sericea dogwood / Dogwood	Cont.	2–3' Ht.
B	8	vaccinium corymbosum / Highbush blueberry	Cont.	5 Gal.
C	9	Ilex glabra 'Nordic' / Nordic Inkberry	Cont.	2'–2 1/2' Ht.

PERENNIALS & GROUND COVERS

Sym	Qty	Botanical Name / Common Name	Root	Size	Remark
A1	370	Aster puniceus / Swamp Aster	Plug	Flat	24" OC
		Carex scoparia / Broom Sedge	Plug	Flat	
		Iris versicolor / Blue Flag Iris	Plug	Flat	
		Lobelia cardinalis / Cardinal Flower	Plug	Flat	
		Liatris spicata / Blazong Star	Plug	Flat	
B1	401	Juncus effuses / Common Rush	Plug	2–1/2"	18" OC
C1	0	Rudbeckia fulgida / Black-Eyed Susan	Cont.	2 Qt.	18" OC

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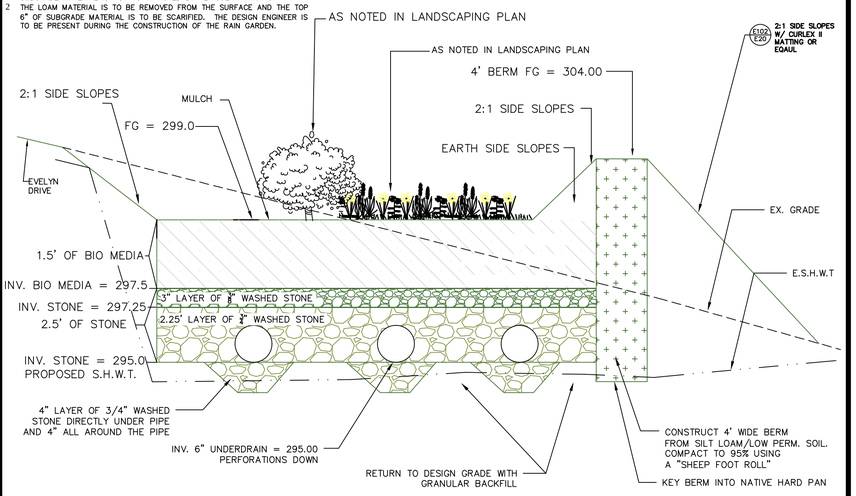
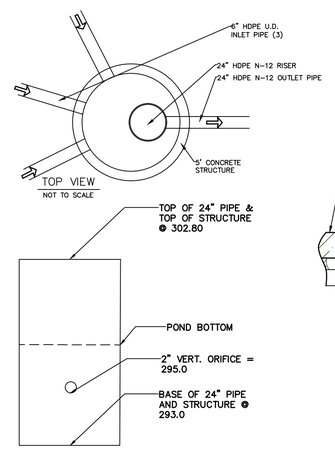
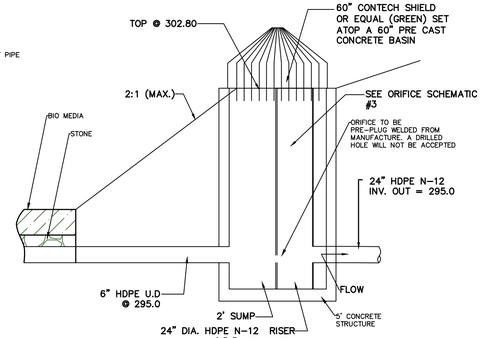


SECTION OF RAIN GARDEN #3



ORIFICE SCHEMATIC #3
NOT TO SCALE



OUTLET STRUCTURE #3
NOT TO SCALE

R103

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 10 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE – KENNETH A. BERRY No. 14243 – LICENSED PROFESSIONAL ENGINEER

FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
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Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
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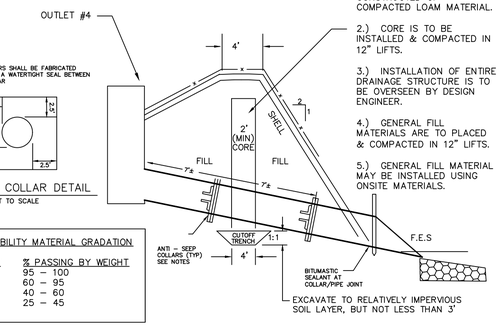


ANTI – SEEP COLLARS SHALL BE FABRICATED 1/4" STEEL & HAVE A WATERTIGHT SEAL BETWEEN THE PIPE AND COLLAR

ANTI – SEEP COLLAR DETAIL
NOT TO SCALE

LOW PERMEABILITY MATERIAL GRADATION

SIEVE SIZE	% PASSING BY WEIGHT
#4	95 – 100
#40	60 – 95
#100	40 – 60
#200	25 – 45

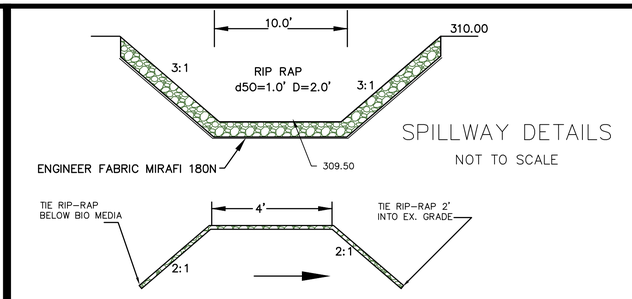
1.) 2' CORE IS TO BE CONSTRUCTED OF COMPACTED LOAM MATERIAL.

2.) CORE IS TO BE INSTALLED & COMPACTED IN 12" LIFTS.

3.) INSTALLATION OF ENTIRE DRAINAGE STRUCTURE IS TO BE OVERSEEN BY DESIGN ENGINEER.

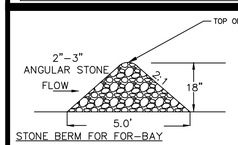
4.) GENERAL FILL MATERIALS ARE TO PLACED & COMPACTED IN 12" LIFTS.

5.) GENERAL FILL MATERIAL MAY BE INSTALLED USING ONSITE MATERIALS.



SPILLWAY DETAILS
NOT TO SCALE

EMERGENCY SPILLWAY PROFILE



STONE BERM FOR FOR-BAY

TREES

Qty	Botanical Name / Common Name	Root	Sized
4	acer saccharum / Sugar Maple	Cont.	2"–2.5" Caliper, balled and burlapped
11	PICEA glauca / White SPRUCE	Cont.	6' WHEN PLANTED

SHRUBS

Sym	Qty	Botanical Name / Common Name	Root	Size
A	14	Cornus sericea dogwood / Dogwood	Cont.	2–3' Ht.
B	14	vaccinium corymbosum / Highbush blueberry	Cont.	5 Gal.
C	14	Ilex glabra 'Nordic' / Nordic Inkberry	Cont.	2'–2 1/2' Ht.

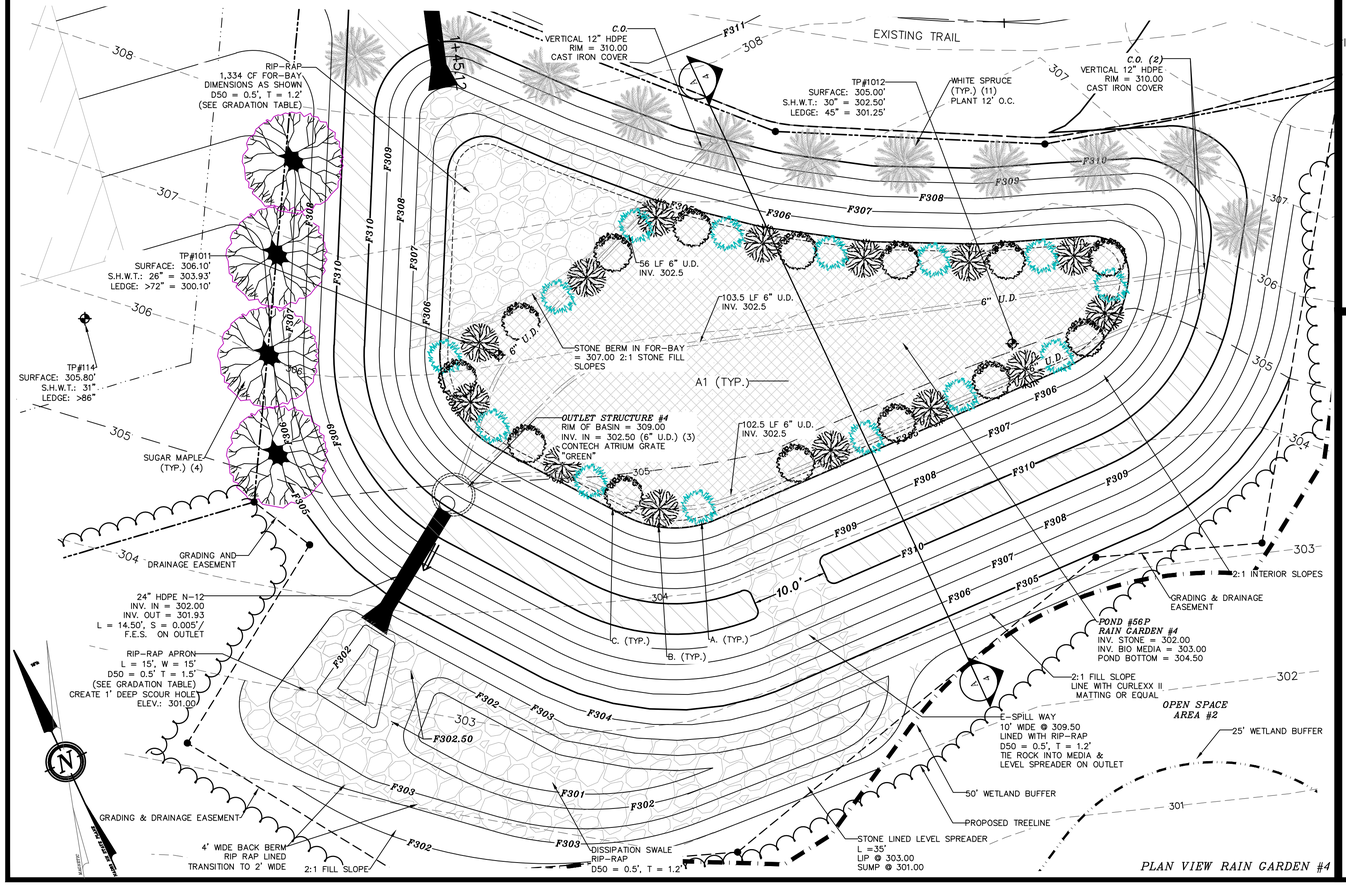
PERENNIALS & GROUND COVERS

Sym	Qty	Botanical Name / Common Name	Root	Size	Remark
A1	612	Aster puniceus / Swamp Aster	Plug	Flat	24" OC
		Carex scoparia / Broom Sedge	Plug	Flat	
		Iris versicolor / Blue Flag Iris	Plug	Flat	
		Lobelia cardinalis / Cardinal Flower	Plug	Flat	
		Liatris spicata / Blazong Star	Plug	Flat	
B1	0	Juncus effuses / Common Rush	Plug	2–1/2"	18" OC
C1	0	Rudbeckia fulgida / Black-Eyed Susan	Cont.	2 Qt.	18" OC

GRAPHIC SCALE

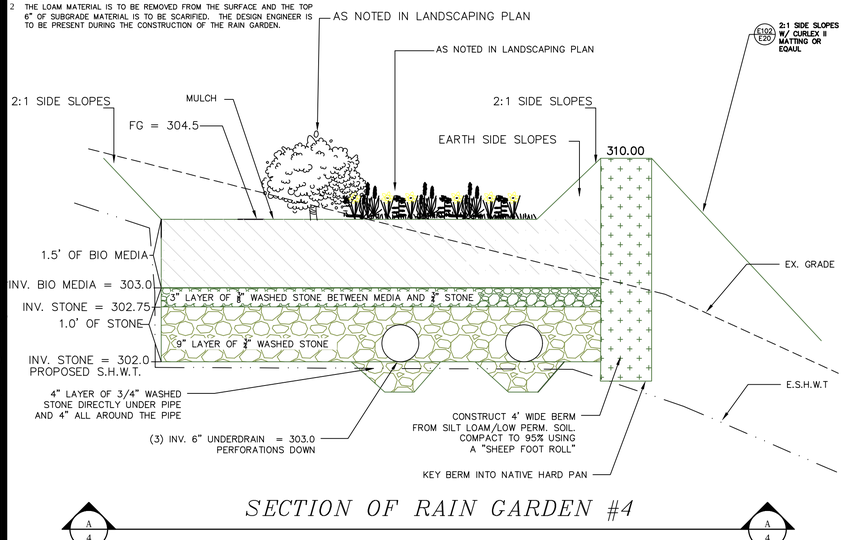
20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

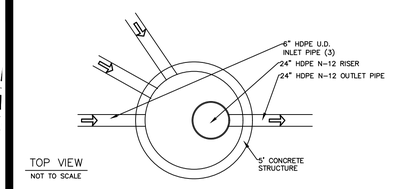


PLAN VIEW RAIN CARDEN #4

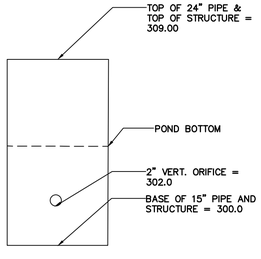
1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
2 THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE RAIN GARDEN.



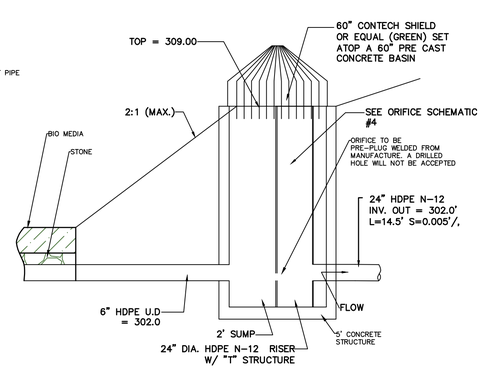
SECTION OF RAIN GARDEN #4



TOP VIEW
NOT TO SCALE



ORIFICE SCHEMATIC #4
NOT TO SCALE



OUTLET STRUCTURE #4
NOT TO SCALE

R104

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

RAIN GARDEN #4 DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

SHEET 46 OF 102

FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
3/8"	90 – 100
#4"	20 – 55
# 8	5 –30
# 16	0 – 10
# 50	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #89 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
4. DO NOT PLACE THE BIORETENTION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
5. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF WATER FROM EXCAVATIONS) TO THE BIORETENTION AREA DURING ANY STAGE OF CONSTRUCTION.
6. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE PERFORM EXCAVATIONS WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.

MAINTENANCE REQUIREMENTS

1 SYSTEMS SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND FOLLOWING ANY RAINFALL EXCEEDING 2.5 INCHES IN A 24-HOUR PERIOD, WITH MAINTENANCE OR REHABILITATION CONDUCTED AS A WARRANTED BY SUCH INSPECTION.

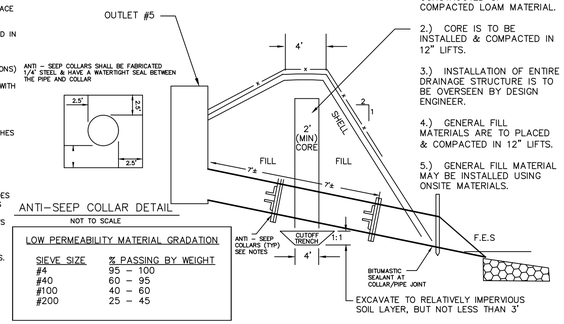
2 PRETREATMENT MEASURES SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND CLEANED OF ACCUMULATED SEDIMENT AS WARRANTED BY INSPECTION, BUT NO LESS THAN ONCE ANNUALLY.

3 AT LEAST ONCE ANNUALLY, SYSTEM SHOULD BE INSPECTED FOR DRAWDOWN TIME. IF BIORETENTION SYSTEM DOES NOT DRAIN WITHIN 72-HOURS FOLLOWING A RAINFALL EVENT, THEN A QUALIFIED PROFESSIONAL SHOULD ASSESS THE CONDITION OF THE FACILITY TO DETERMINE MEASURES REQUIRED TO RESTORE FILTRATION FUNCTION OR INFILTRATION FUNCTION (AS APPLICABLE), INCLUDING BUT NOT LIMITED TO REMOVAL OF ACCUMULATED SEDIMENTS OR RECONSTRUCTION OF THE FILTER MEDIA.

4 VEGETATION SHOULD BE INSPECTED AT LEAST ANNUALLY, AND MAINTAINED IN HEALTHY CONDITION, INCLUDING, PRUNING, REMOVAL, AND REPLACEMENT OF DEAD OR DISEASED VEGETATION, AND REMOVAL OF INVASIVE SPECIES.

DESIGN REFERENCES

1 UNH STORMWATER CENTER
2 NEW HAMPSHIRE STORMWATER MANAGEMENT MANUAL, VOLUME 2, DECEMBER 2008 AS AMENDED.



ANTI–SEEP COLLAR DETAIL
NOT TO SCALE

LOW PERMEABILITY MATERIAL GRADATION

SIEVE SIZE	% PASSING BY WEIGHT
#4	95 – 100
#40	60 – 95
#100	40 – 60
#200	25 – 45

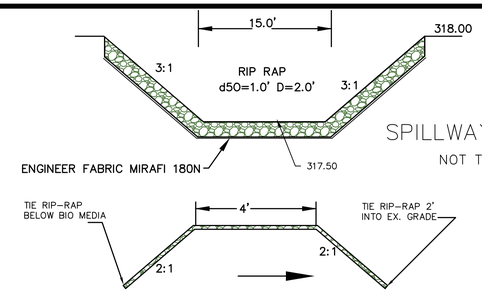
1.) 2' CORE IS TO BE CONSTRUCTED OF COMPACTED LOAM MATERIAL.

2.) CORE IS TO BE INSTALLED & COMPACTED IN 12" LIFTS.

3.) INSTALLATION OF ENTIRE DRAINAGE STRUCTURE IS TO BE OVERSEEN BY DESIGN ENGINEER.

4.) GENERAL FILL MATERIALS ARE TO PLACED & COMPACTED IN 12" LIFTS.

5.) GENERAL FILL MATERIAL MAY BE INSTALLED USING ONSITE MATERIALS.



SPILLWAY DETAILS
NOT TO SCALE

EMERGENCY SPILLWAY PROFILE

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

RAIN GARDEN #5 DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

TREES

Qty	Botanical Name / Common Name	Root	Sized
3	acer saccharum / Sugar Maple	Cont.	2"-2.5" Caliper, balled and burlapped
5	PICEA glauca / White SPRUCE	Cont.	6' WHEN PLANTED

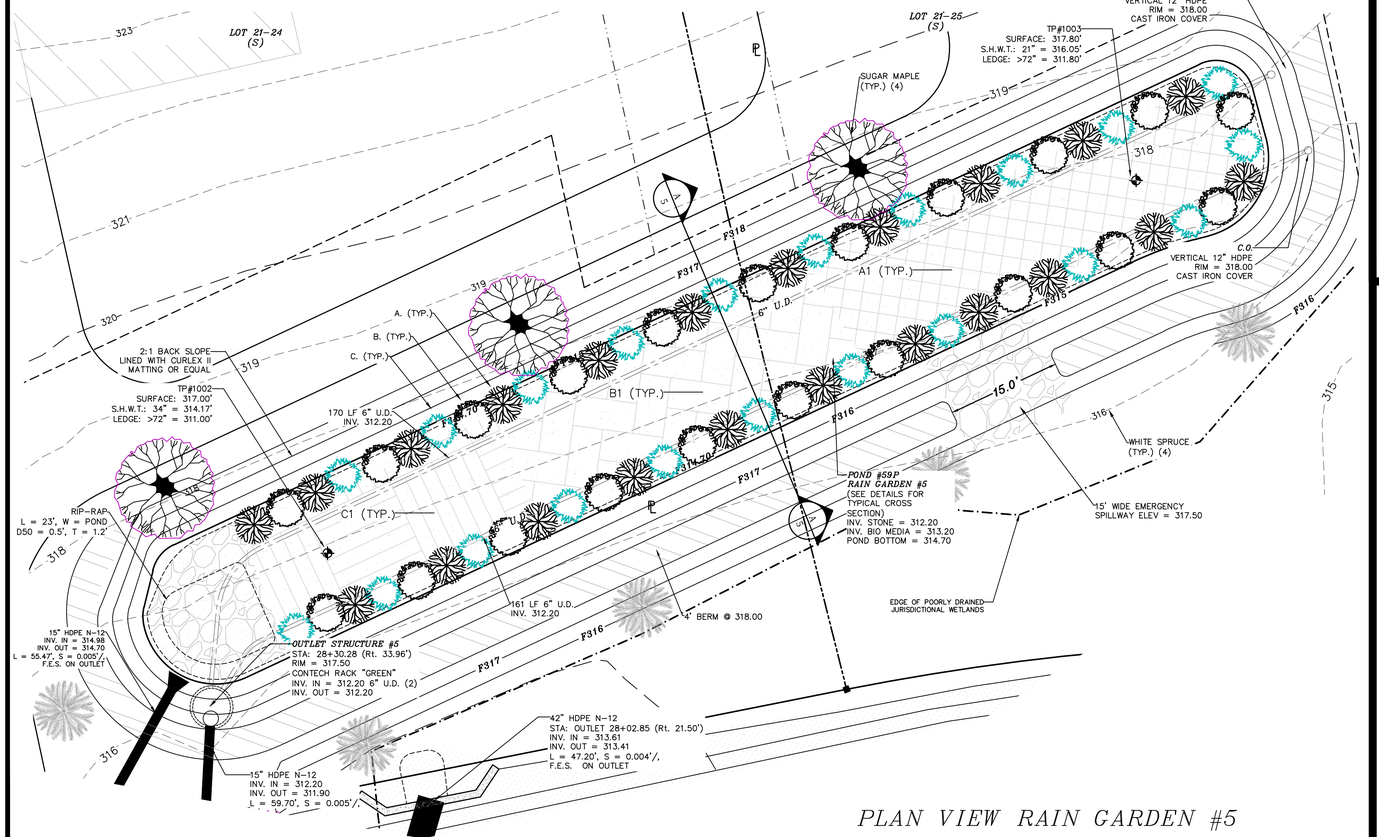
SHRUBS

Sym	Qty	Botanical Name / Common Name	Root	Size
A	22	Cornus sericea dogwood / Dogwood	Cont.	2–3' Ht.
B	21	vaccinium corymbosum / Highbush blueberry	Cont.	5 Gal.
C	21	Ilex glabra 'Nordic' / Nordic Inkberry	Cont.	2'–2 1/2' Ht.

PERENNIALS & GROUND COVERS

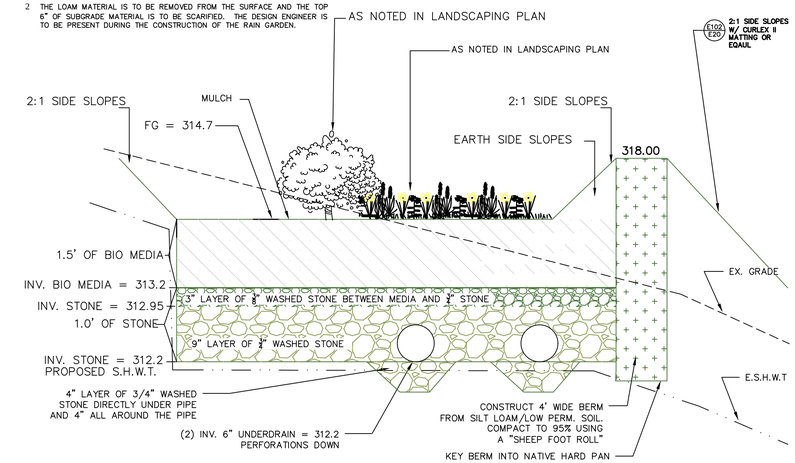
Sym	Qty	Botanical Name / Common Name	Root	Size	Remark
A1	220	Aster puniceus / Swamp Aster	Plug	Flat	24" OC
		Carex scoparia / Broom Sedge	Plug	Flat	
		Iris versicolor / Blue Flag Iris	Plug	Flat	
		Lobelia cardinalis / Cardinal Flower	Plug	Flat	
		Liatris spicata / Blazong Star	Plug	Flat	
B1	314	Juncus effuses / Common Rush	Plug	2–1/2"	18" OC
C1	229	Rudbeckia fulgida / Black-Eyed Susan	Cont.	2 Qt.	18" OC

GRAPHIC SCALE
10 0 5 10 20 40
(IN FEET)
1 inch = 10 ft.

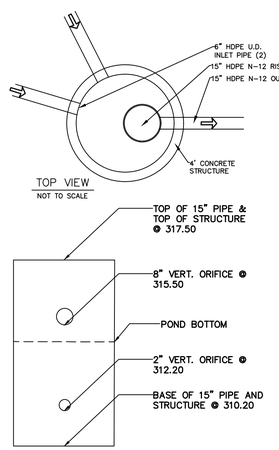


PLAN VIEW RAIN GARDEN #5

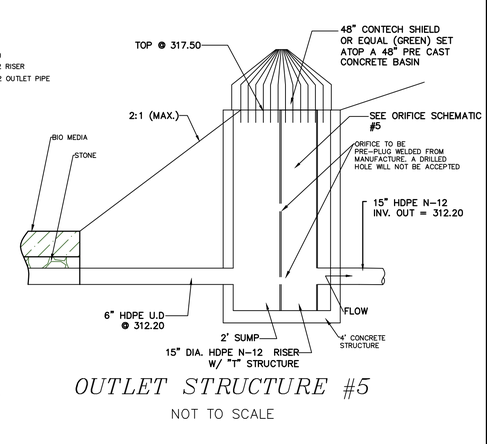
1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
2 THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE RAIN GARDEN.



SECTION OF RAIN GARDEN #5



ORIFICE SCHEMATIC #5
NOT TO SCALE



OUTLET STRUCTURE #5
NOT TO SCALE

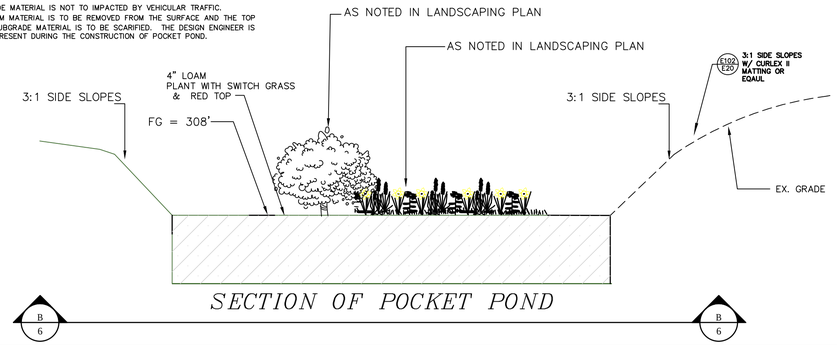
R105

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

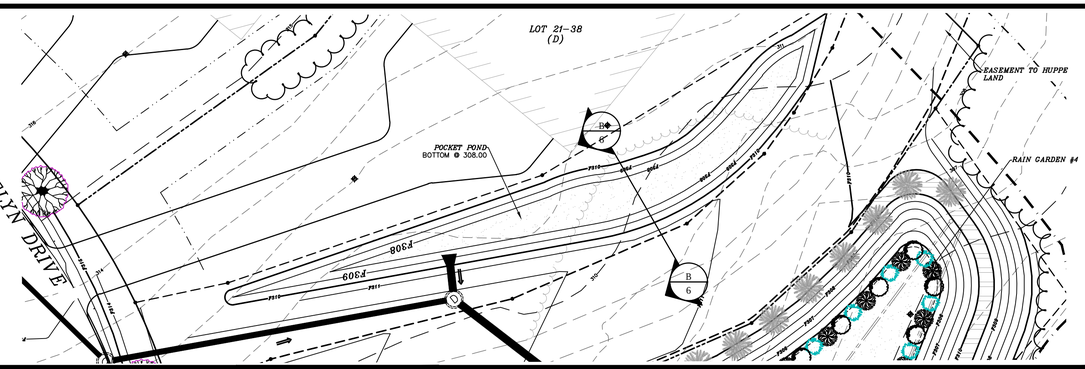
SCALE : 1 IN. EQUALS 10 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

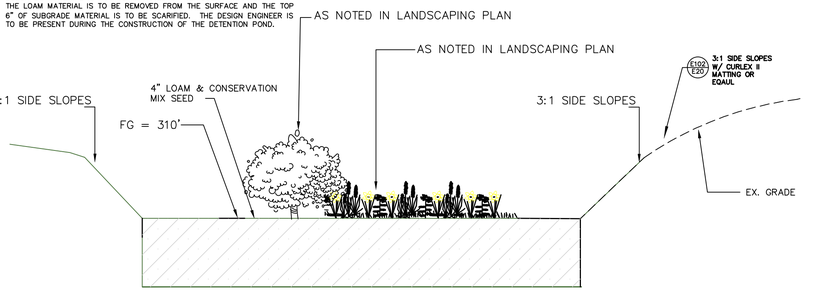
1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
2 THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF POCKET POND.



SECTION OF POCKET POND



1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
2 THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE DETENTION POND.



SECTION OF DETENTION POND #6

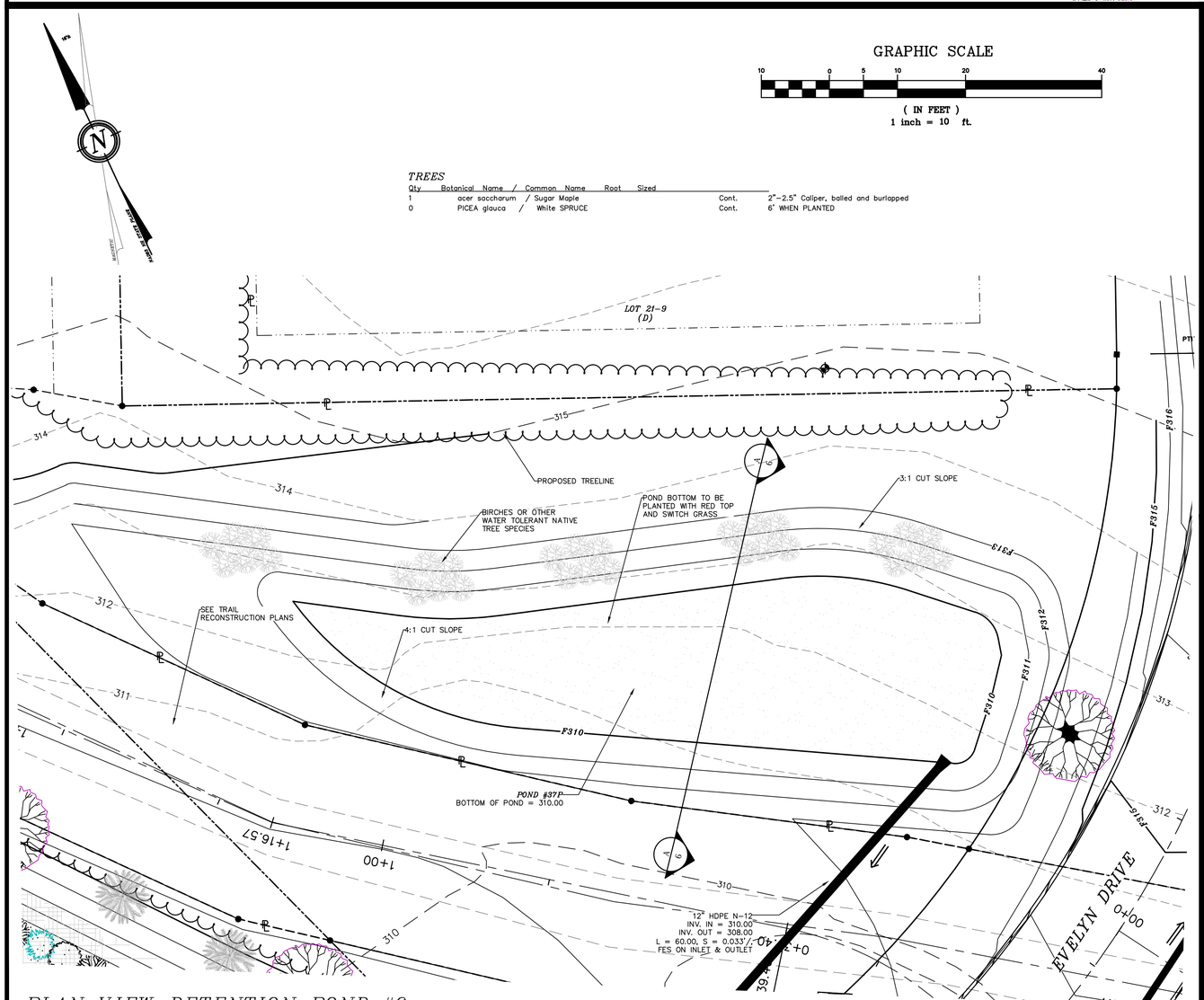
GRAPHIC SCALE

10 0 5 10 20 40

(IN FEET)
1 inch = 10 ft.

TREES

Qty	Botanical Name / Common Name	Root	Sized
1	acer saccharum / Sugar Maple	Cont.	2"-2.5" Caliper, balled and burlapped
0	PICEA glauca / White SPRUCE	Cont.	6' WHEN PLANTED



PLAN VIEW DETENTION POND #6

P106

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

DETENTION POND #6 & POCKET POND DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 10 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
3/8"	90 – 100
#4"	20 – 55
# 8	5 –30
# 16	0 – 10
# 50	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #89 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
4. DO NOT PLACE THE BIORETENTION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
5. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF WATER FROM EXCAVATIONS) TO THE BIORETENTION AREA DURING ANY STAGE OF CONSTRUCTION.
6. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE PERFORM EXCAVATIONS WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.

MAINTENANCE REQUIREMENTS

1 SYSTEMS SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND FOLLOWING ANY RAINFALL EXCEEDING 2.5 INCHES IN A 24-HOUR PERIOD, WITH MAINTENANCE OR REHABILITATION CONDUCTED AS A WARRANTED BY SUCH INSPECTION.

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DESIGN REFERENCES

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ANTI – SEEP COLLARS SHALL BE FABRICATED 1/4" STEEL & HAVE A WATERTIGHT SEAL BETWEEN THE PIPE AND COLLAR

ANTI-SEEP COLLAR DETAIL
NOT TO SCALE

LOW PERMEABILITY MATERIAL GRADATION

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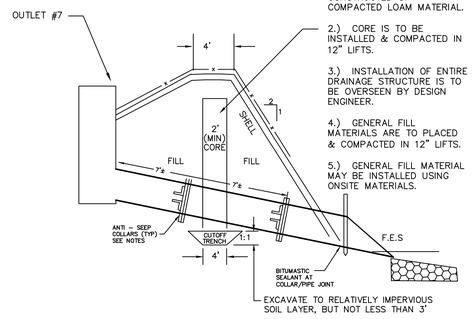

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#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

RAIN GARDEN #7 DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

TREES

Qty	Botanical Name / Common Name	Root	Sized
5	acer saccharum / Sugar Maple	Cont.	2"-2.5" Caliper, balled and burlapped
7	PICEA glauca / White SPRUCE	Cont.	6' WHEN PLANTED

SHRUBS

Sym	Qty	Botanical Name / Common Name	Root	Size
A	18	Cornus sericea dogwood / Dogwood	Cont.	2-3' Ht.
B	18	vaccinium corymbosum / Highbush blueberry	Cont.	5 Gal.
C	22	Ilex glabra 'Nordic' / Nordic Inkberry	Cont.	2'-2 1/2' Ht.

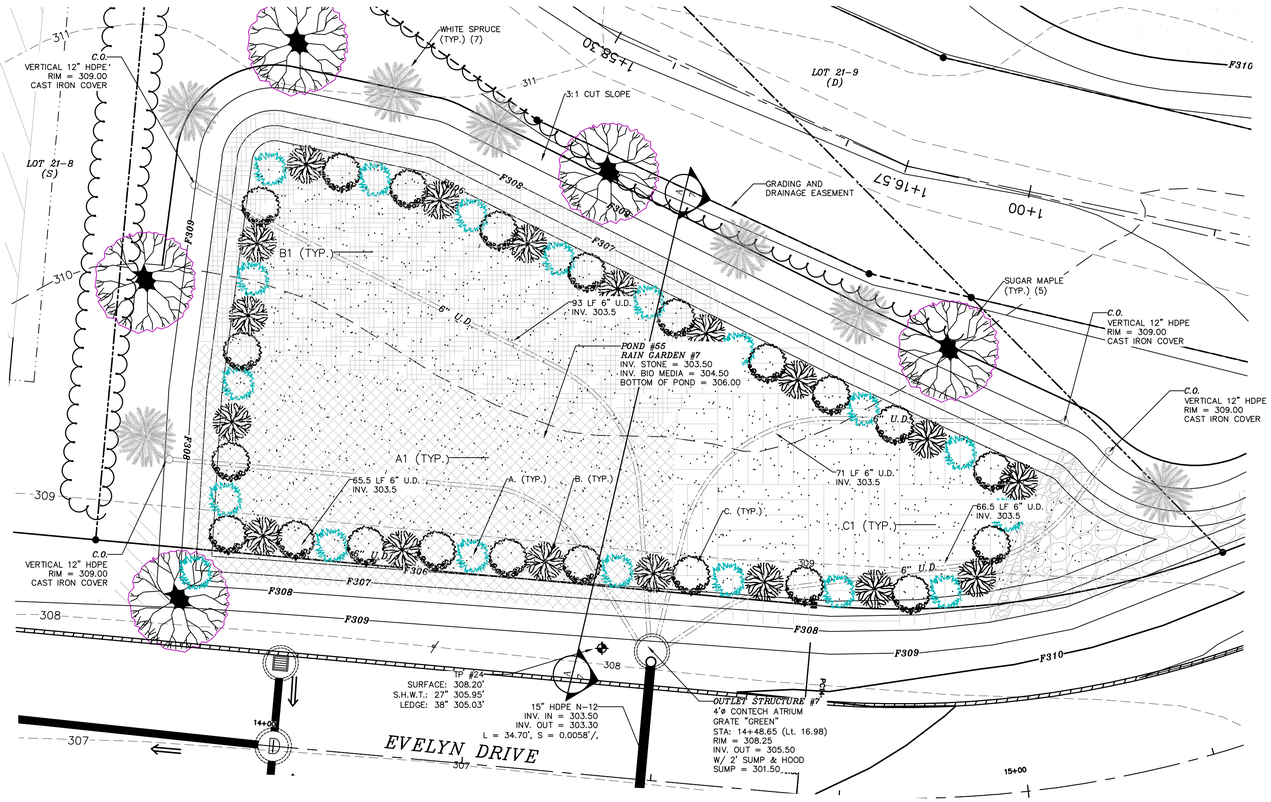
PERENNIALS & GROUND COVERS

Sym	Qty	Botanical Name / Common Name	Root	Size	Remark
A1	439	Aster puniceus / Swamp Aster	Plug	Flat	24" OC
		Carex scoparia / Broom Sedge	Plug	Flat	
		Iris versicolor / Blue Flag Iris	Plug	Flat	
		Labelia cardinalis / Cardinal Flower	Plug	Flat	
		Liatris spicata / Blazong Star	Plug	Flat	
B1	817	Juncus effuses / Common Rush	Plug	2-1/2"	18" OC
C1	817	Rudbeckia fulgida / Black-Eyed Susan	Cont.	2 Qt.	18" OC

GRAPHIC SCALE

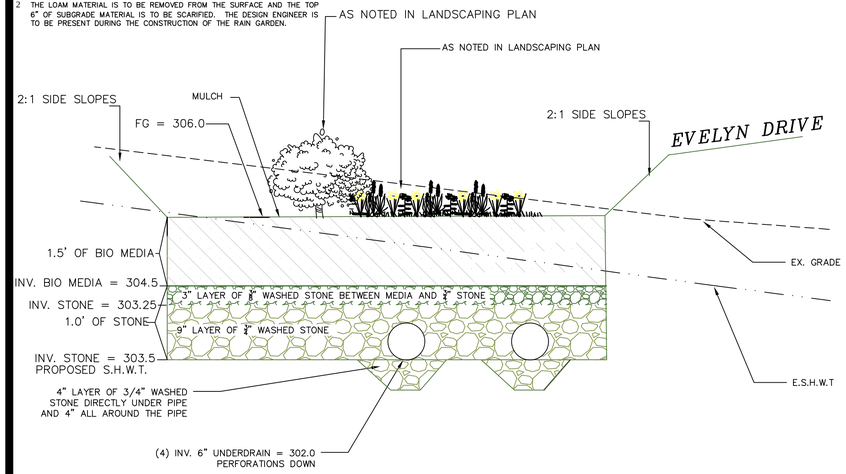
10 0 5 10 20 40

(IN FEET)
1 inch = 10 ft.



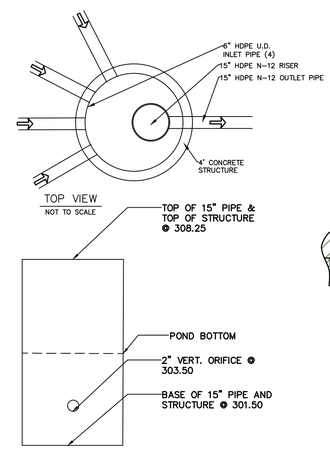
PLAN VIEW RAIN GARDEN #7

1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
2 THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE RAIN GARDEN.

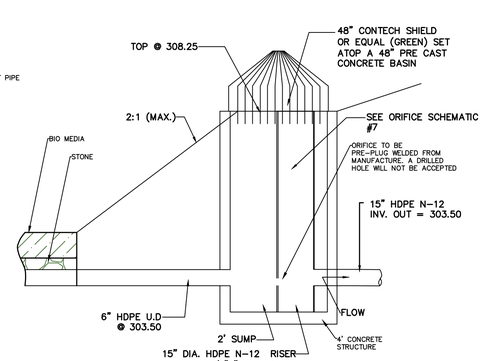


SECTION OF RAIN GARDEN #7

A 7 A 7



ORIFICE SCHEMATIC #7
NOT TO SCALE



OUTLET STRUCTURE #7
NOT TO SCALE

R107

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 10 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE – KENNETH A. BERRY No. 14243 LICENSED PROFESSIONAL ENGINEER

FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
3/8"	90 – 100
#4"	20 – 55
# 8	5 –30
# 16	0 – 10
# 50	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #89 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
4. DO NOT PLACE THE BIORETENTION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
5. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF WATER FROM EXCAVATIONS) TO THE BIORETENTION AREA DURING ANY STAGE OF CONSTRUCTION.
6. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE PERFORM EXCAVATIONS WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.

MAINTENANCE REQUIREMENTS

1 SYSTEMS SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND FOLLOWING ANY RAINFALL EXCEEDING 2.5 INCHES IN A 24-HOUR PERIOD, WITH MAINTENANCE OR REHABILITATION CONDUCTED AS A WARRANTED BY SUCH INSPECTION.

2 PRETREATMENT MEASURES SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND CLEANED OF ACCUMULATED SEDIMENT AS WARRANTED BY INSPECTION, BUT NO LESS THAN ONCE ANNUALLY.

3 AT LEAST ONCE ANNUALLY, SYSTEM SHOULD BE INSPECTED FOR DRAWDOWN TIME. IF BIORETENTION SYSTEM DOES NOT DRAIN WITHIN 72-HOURS FOLLOWING A RAINFALL EVENT, THEN A QUALIFIED PROFESSIONAL SHOULD ASSESS THE CONDITION OF THE FACILITY TO DETERMINE MEASURES REQUIRED TO RESTORE FILTRATION FUNCTION OR INFILTRATION FUNCTION (AS APPLICABLE), INCLUDING BUT NOT LIMITED TO REMOVAL OF ACCUMULATED SEDIMENTS OR RECONSTRUCTION OF THE FILTER MEDIA.

4 VEGETATION SHOULD BE INSPECTED AT LEAST ANNUALLY, AND MAINTAINED IN HEALTHY CONDITION, INCLUDING PRUNING, REMOVAL, AND REPLACEMENT OF DEAD OR DISEASED VEGETATION, AND REMOVAL OF INVASIVE SPECIES.

DESIGN REFERENCES

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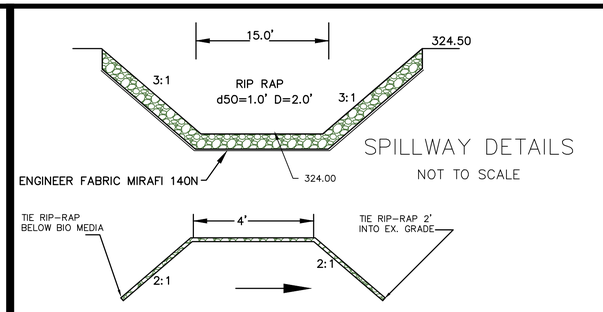


EMERGENCY SPILLWAY PROFILE

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

RAIN GARDEN #8 DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

TREES

Qty	Botanical Name / Common Name	Root	Sized
4	acer saccharum / Sugar Maple	Cont.	2"-2.5" Caliper, balled and burlapped
12	PICEA glauca / White SPRUCE	Cont.	6' WHEN PLANTED

SHRUBS

Sym	Qty	Botanical Name / Common Name	Root	Size
A	13	Cornus sericea dogwood / Dogwood	Cont.	2-3' Ht.
B	12	vaccinium corymbosum / Highbush blueberry	Cont.	5 Gal.
C	13	Ilex glabra 'Nordic' / Nordic Inkberry	Cont.	2'-2 1/2' Ht.

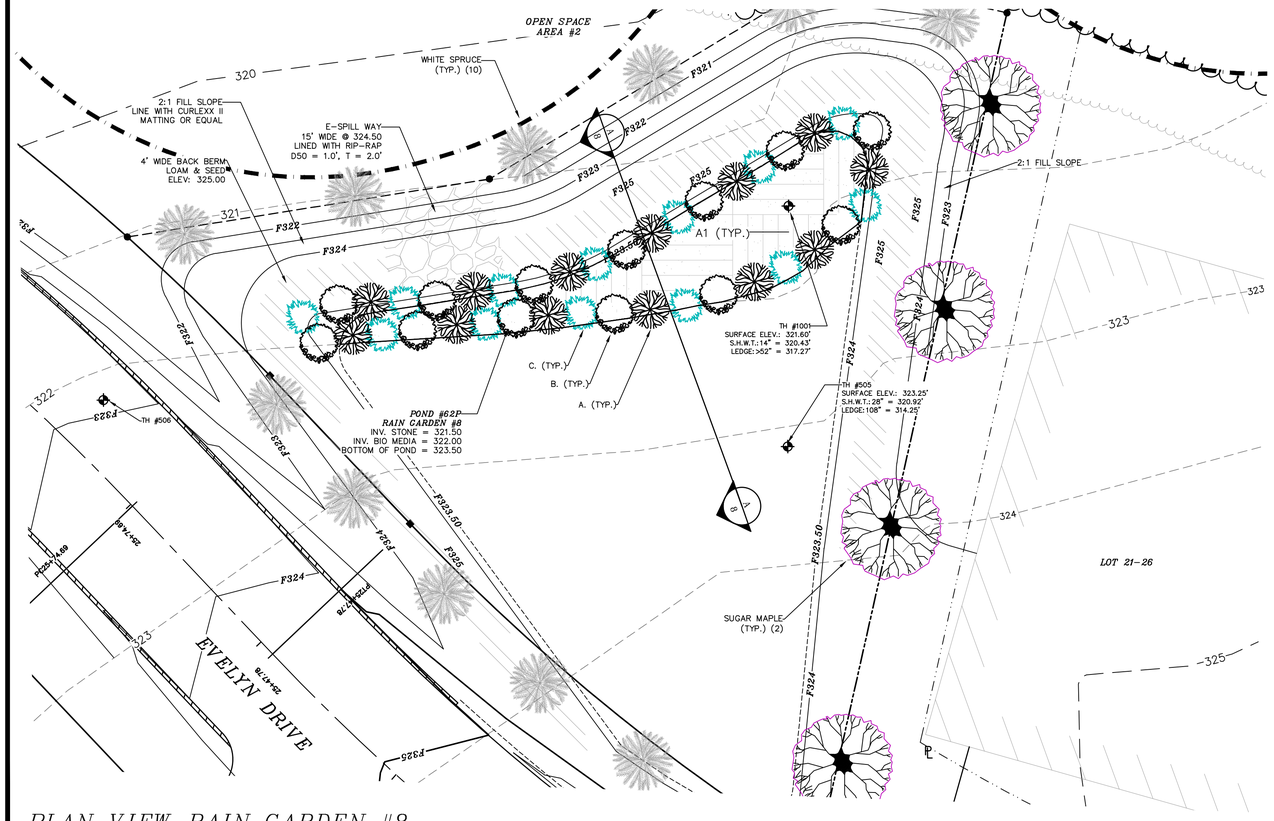
PERENNIALS & GROUND COVERS

Sym	Qty	Botanical Name / Common Name	Root	Size	Remark
A1	86	Aster puniceus / Swamp Aster	Plug	Flat	24" OC
		Carex scoparia / Broom Sedge	Plug	Flat	
		Iris versicolor / Blue Flag Iris	Plug	Flat	
		Lobelia cardinalis / Cardinal Flower	Plug	Flat	
		Liatris spicata / Blazong Star	Plug	Flat	

GRAPHIC SCALE

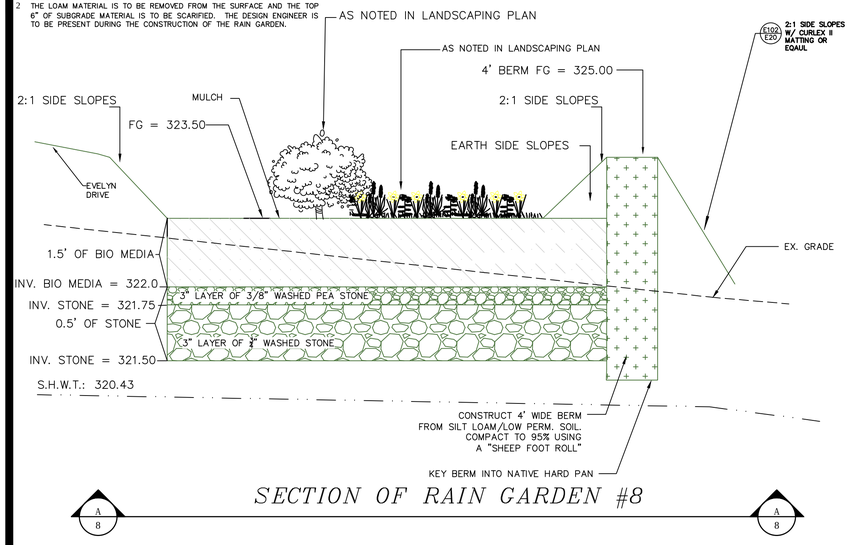
10 0 5 10 20 40

(IN FEET)
1 inch = 10 ft.



PLAN VIEW RAIN GARDEN #8

1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
2 THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE RAIN GARDEN.



SECTION OF RAIN GARDEN #8

R108

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 10 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
3/8"	90 – 100
#4"	20 – 55
# 8	5 –30
# 16	0 – 10
# 50	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #89 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
4. DO NOT PLACE THE BIORETENTION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
5. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF WATER FROM EXCAVATIONS) TO THE BIORETENTION AREA DURING ANY STAGE OF CONSTRUCTION.
6. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE PERFORM EXCAVATIONS WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.

MAINTENANCE REQUIREMENTS

1 SYSTEMS SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND FOLLOWING ANY RAINFALL EXCEEDING 2.5 INCHES IN A 24-HOUR PERIOD, WITH MAINTENANCE OR REHABILITATION CONDUCTED AS A WARRANTED BY SUCH INSPECTION.

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DESIGN REFERENCES

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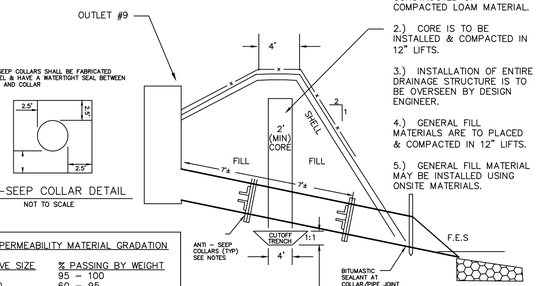


LOW PERMEABILITY MATERIAL GRADATION	
SIEVE SIZE	% PASSING BY WEIGHT
#4	95 – 100
#40	60 – 95
#100	40 – 60
#200	25 – 45

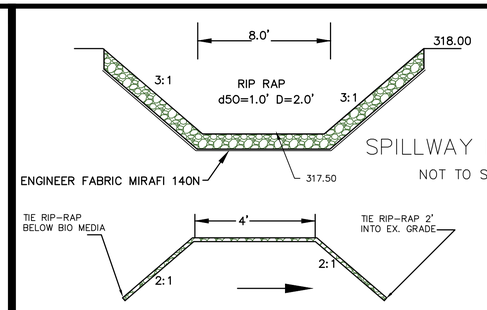
1.) 2' CORE IS TO BE CONSTRUCTED OF COMPACTED LOAM MATERIAL.

2.) CORE IS TO BE INSTALLED & COMPACTED IN 12" LIFTS.

3.) INSTALLATION OF ENTIRE DRAINAGE STRUCTURE IS TO BE OVERSEEN BY DESIGN ENGINEER.

4.) GENERAL FILL MATERIALS ARE TO PLACED & COMPACTED IN 12" LIFTS.

5.) GENERAL FILL MATERIAL MAY BE INSTALLED USING ONSITE MATERIALS.



SPILLWAY DETAILS
NOT TO SCALE

EMERGENCY SPILLWAY PROFILE

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

TREES

Qty	Botanical Name / Common Name	Root	Sized
10	acer saccharum / Sugar Maple	Cont.	2"-2.5" Caliper, balled and burlapped
7	PICEA glauca / White SPRUCE	Cont.	6' WHEN PLANTED

SHRUBS

Sym	Qty	Botanical Name / Common Name	Root	Size
A	12	Cornus sericea dogwood / Dogwood	Cont.	2–3' Ht.
B	11	vaccinium corymbosum / Highbush blueberry	Cont.	5 Gal.
C	12	Ilex glabra 'Nordic' / Nordic Inkberry	Cont.	2'-2 1/2' Ht.

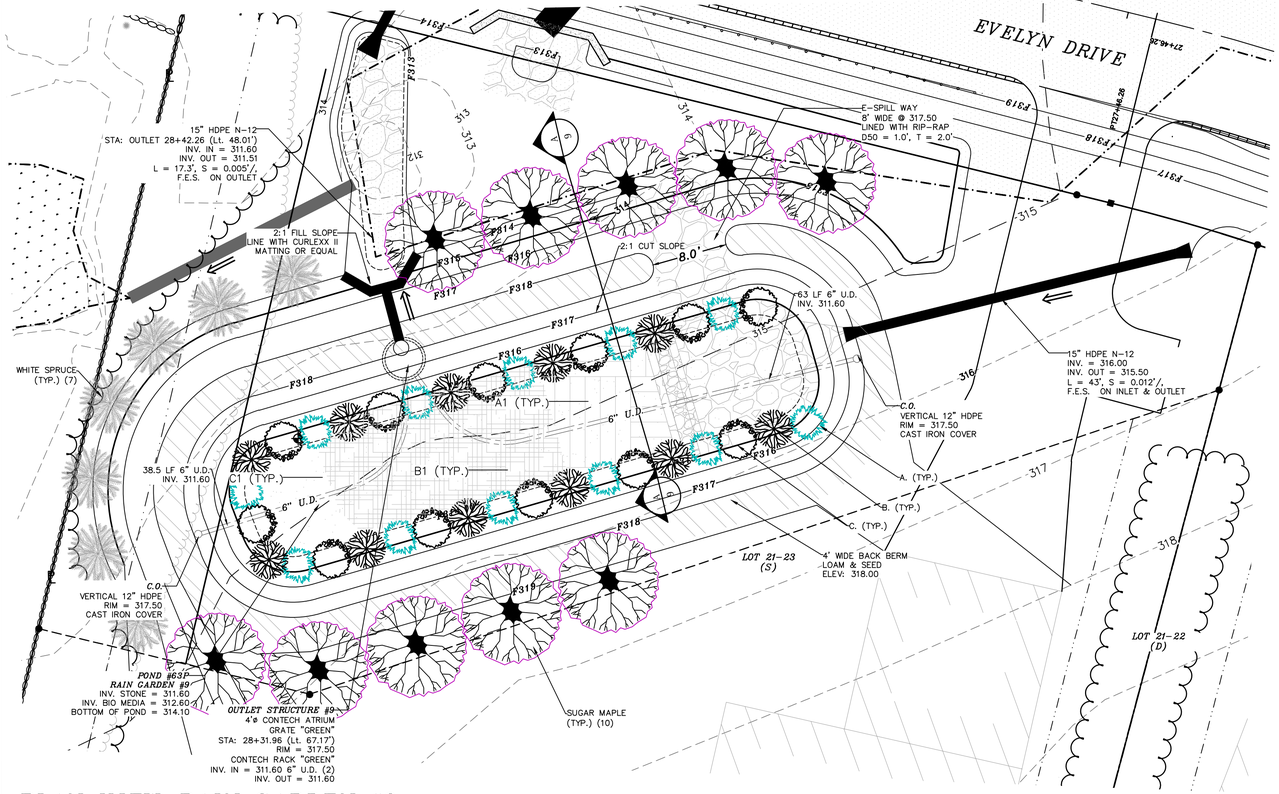
PERENNIALS & GROUND COVERS

Sym	Qty	Botanical Name / Common Name	Root	Size	Remark
A1	56	Aster puniceus / Swamp Aster	Plug	Flat	24" OC
		Carex scoparia / Broom Sedge	Plug	Flat	
		Iris versicolor / Blue Flag Iris	Plug	Flat	
		Labelia cardinalis / Cardinal Flower	Plug	Flat	
		Liatris spicata / Blazong Star	Plug	Flat	
B1	208	Juncus effuses / Common Rush	Plug	2–1/2"	18" OC
C1	104	Rudbeckia fulgida / Black-Eyed Susan	Cont.	2 Qt.	18" OC

GRAPHIC SCALE

10 0 5 10 20 40

(IN FEET)
1 inch = 10 ft.



PLAN VIEW RAIN GARDEN #9

1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
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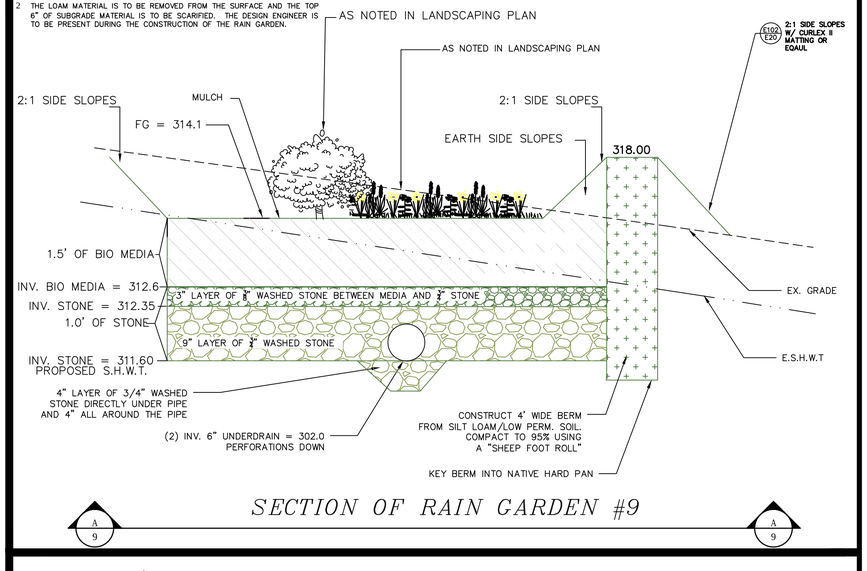
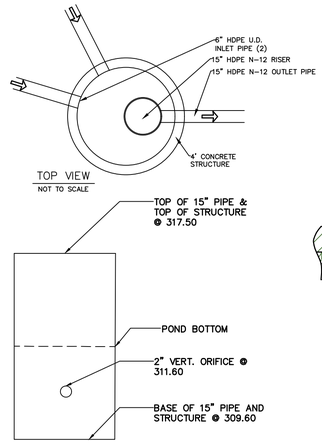
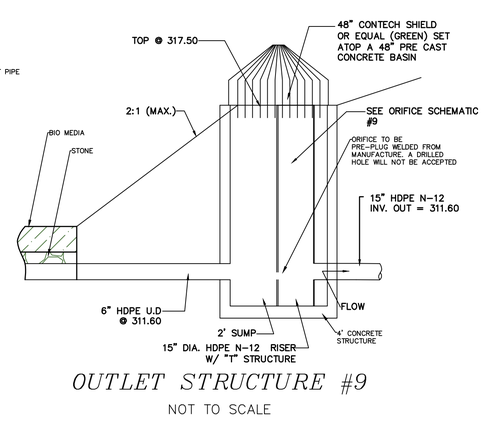


SECTION OF RAIN GARDEN #9



ORIFICE SCHEMATIC #9
NOT TO SCALE



OUTLET STRUCTURE #9
NOT TO SCALE

R109

RAIN GARDEN #9 DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE	: 1 IN. EQUALS 10 FT.
DATE	: APRIL 4, 2017
FILE NO.	: DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY No. 14243
LICENSED PROFESSIONAL ENGINEER

FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

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NOTES

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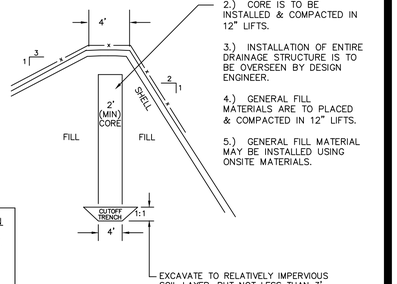

LOW PERMEABILITY MATERIAL GRADATION

SIEVE SIZE	% PASSING BY WEIGHT
#4	95 – 100
#40	60 – 95
#100	40 – 60
#200	25 – 45

1.) 2' CORE IS TO BE CONSTRUCTED OF COMPACTED LOAM MATERIAL.

2.) CORE IS TO BE INSTALLED & COMPACTED IN 12" LIFTS.

3.) INSTALLATION OF ENTIRE DRAINAGE STRUCTURE IS TO BE OVERSEEN BY DESIGN ENGINEER.

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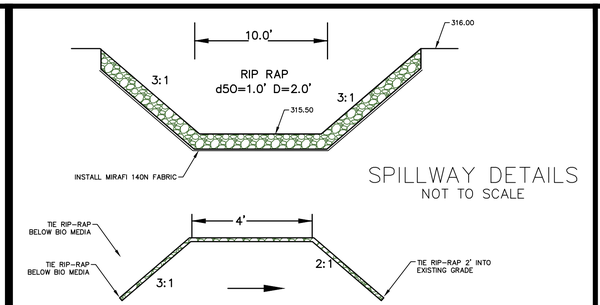

SPILLWAY DETAILS
NOT TO SCALE

EMERGENCY SPILLWAY PROFILE

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
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SHRUBS

Sym	Qty	Botanical Name / Common Name	Root	Size
A	23	Cornus sericea dogwood / Dogwood	Cont.	2–3' Ht.
B	23	vaccinium corymbosum / Highbush blueberry	Cont.	5 Gal.
C	23	Ilex glabra 'Nordic' / Nordic Inkberry	Cont.	2'–2 1/2' Ht.

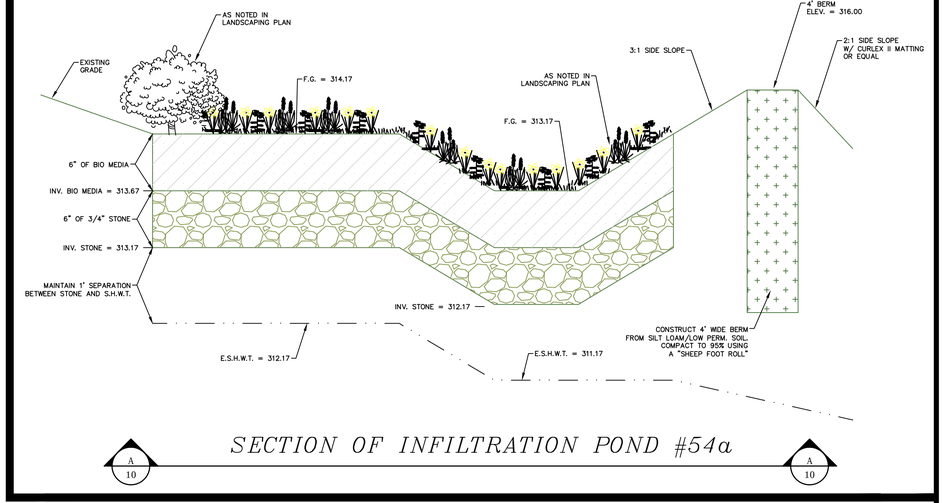
GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

1. SUBGRADE MATERIAL IS NOT TO BE IMPACTED BY VEHICULAR TRAFFIC. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE, PERFORM EXCAVATION WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.
2. THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE INFILTRATION POND.
3. DO NOT PLACE THE BIORETENTION / INFILTRATION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
4. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF, WATER FROM EXCAVATION) TO THE BIORETENTION / INFILTRATION AREA DURING ANY STAGE OF CONSTRUCTION.
5. AFTER THE BASIN IS EXCAVATED TO THE FINAL DESIGN ELEVATION; THE FLOOR SHOULD BE DEEPLY TILLED WITH A ROTARY TILLER OR DISC HARROW TO RESTORE INFILTRATION RATES, FOLLED BY A PASS WITH A LEVELING DRAG.
6. VEGETATION SHOULD BE ESTABLISHED IMMEDIATELY.

1. SUBGRADE MATERIAL IS NOT TO BE IMPACTED BY VEHICULAR TRAFFIC.
2. THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE INFILTRATION POND.



SECTION OF INFILTRATION POND #54a

A 10 A 10

INFILTRATION POND #54a DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

PLAN VIEW INFILTRATION POND #2 (POND 54a)

R110

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY No. 14243
LICENSED PROFESSIONAL ENGINEER

SHEET 52 OF 102

FILTER MEDIA MIXTURES			
Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
3/8"	90 – 100
#4"	20 – 55
# 8	5 –30
# 16	0 – 10
# 50	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #89 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
4. DO NOT PLACE THE BIORETENTION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
5. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF WATER FROM EXCAVATIONS) TO THE BIORETENTION AREA DURING ANY STAGE OF CONSTRUCTION.
6. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE PERFORM EXCAVATIONS WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.

MAINTENANCE REQUIREMENTS

1 SYSTEMS SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND FOLLOWING ANY RAINFALL EXCEEDING 2.5 INCHES IN A 24-HOUR PERIOD, WITH MAINTENANCE OR REHABILITATION CONDUCTED AS A WARRANTED BY SUCH INSPECTION.

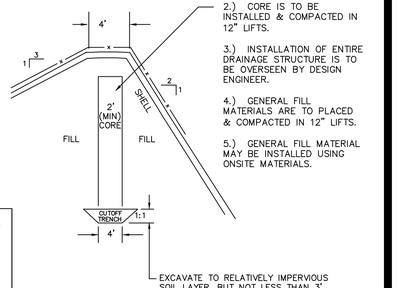
2 PRETREATMENT MEASURES SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND CLEANED OF ACCUMULATED SEDIMENT AS WARRANTED BY INSPECTION, BUT NO LESS THAN ONCE ANNUALLY.

3 AT LEAST ONCE ANNUALLY, SYSTEM SHOULD BE INSPECTED FOR DRAWDOWN TIME. IF BIORETENTION SYSTEM DOES NOT DRAIN WITHIN 72-HOURS FOLLOWING A RAINFALL EVENT, THEN A QUALIFIED PROFESSIONAL SHOULD ASSESS THE CONDITION OF THE FACILITY TO DETERMINE MEASURES REQUIRED TO RESTORE FILTRATION FUNCTION OR INFILTRATION FUNCTION (AS APPLICABLE), INCLUDING BUT NOT LIMITED TO REMOVAL OF ACCUMULATED SEDIMENTS OR RECONSTRUCTION OF THE FILTER MEDIA.

4 VEGETATION SHOULD BE INSPECTED AT LEAST ANNUALLY, AND MAINTAINED IN HEALTHY CONDITION, INCLUDING, PRUNING, REMOVAL, AND REPLACEMENT OF DEAD OR DISEASED VEGETATION, AND REMOVAL OF INVASIVE SPECIES.

DESIGN REFERENCES

1 UNH STORMWATER CENTER
2 NEW HAMPSHIRE STORMWATER MANAGEMENT MANUAL, VOLUME 2, DECEMBER 2008 AS AMENDED.



LOW PERMEABILITY MATERIAL GRADATION

SIEVE SIZE	% PASSING BY WEIGHT
#4	95 – 100
#40	60 – 95
#100	40 – 60
#200	25 – 45

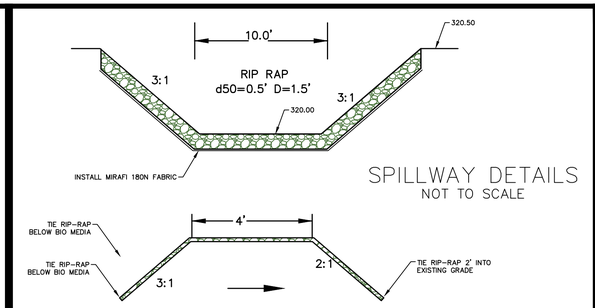
1.) 2' CORE IS TO BE CONSTRUCTED OF COMPACTED LOAM MATERIAL.

2.) CORE IS TO BE INSTALLED & COMPACTED IN 12" LIFTS.

3.) INSTALLATION OF ENTIRE DRAINAGE STRUCTURE IS TO BE OVERSEEN BY DESIGN ENGINEER.

4.) GENERAL FILL MATERIALS ARE TO PLACED & COMPACTED IN 12" LIFTS.

5.) GENERAL FILL MATERIAL MAY BE INSTALLED USING ONSITE MATERIALS.



REVISION	DATE	DESCRIPTION
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#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

INFILTRATION POND #54a DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

SHRUBS

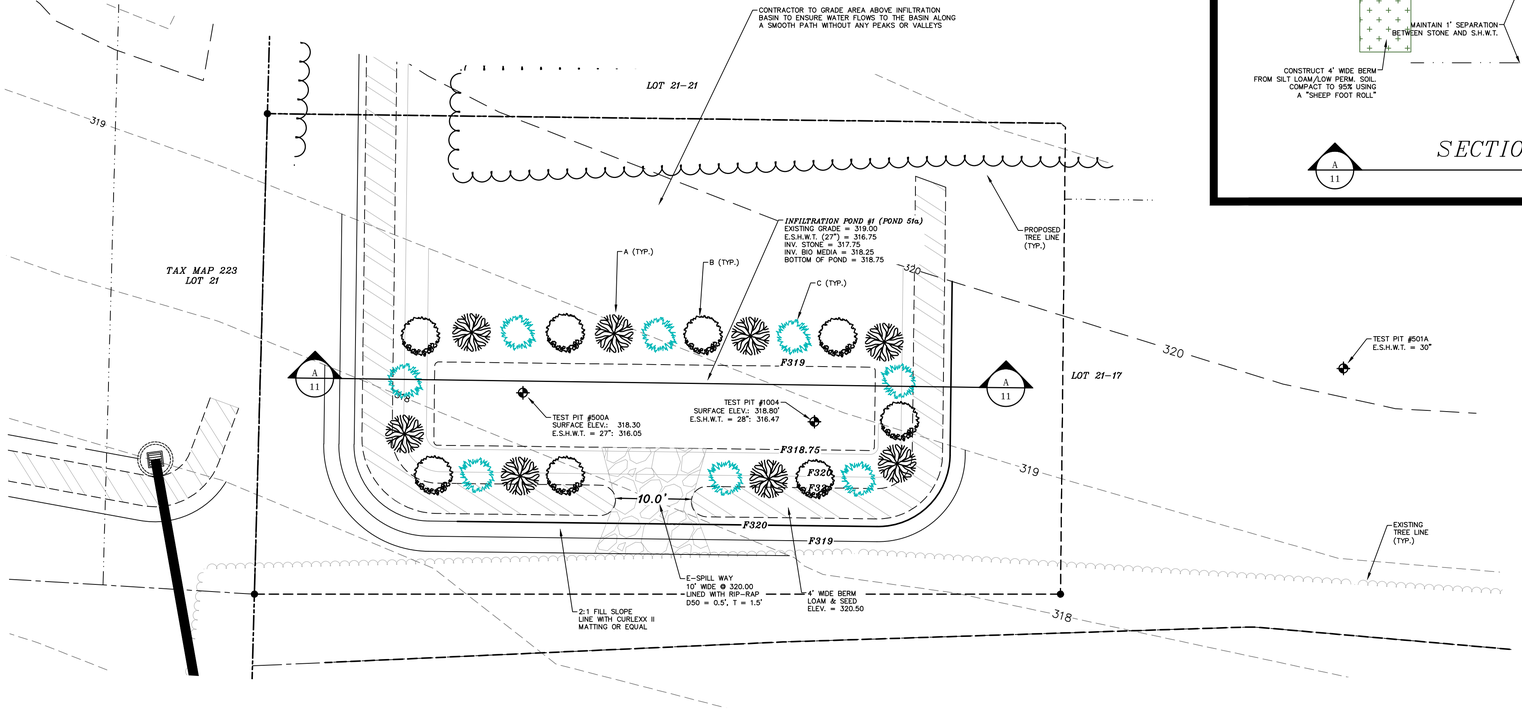
Sym	Qty	Botanical Name / Common Name	Root	Size
A	8	Cornus sericea dogwood / Dogwood	Cont.	2–3' Ht.
B	8	vaccinium corymbosum / Highbush blueberry	Cont.	5 Gal.
C	8	Ilex glabra 'Nordic' / Nordic Inkberry	Cont.	2'–2 1/2' Ht.

GRAPHIC SCALE

20 0 5 10 20 40

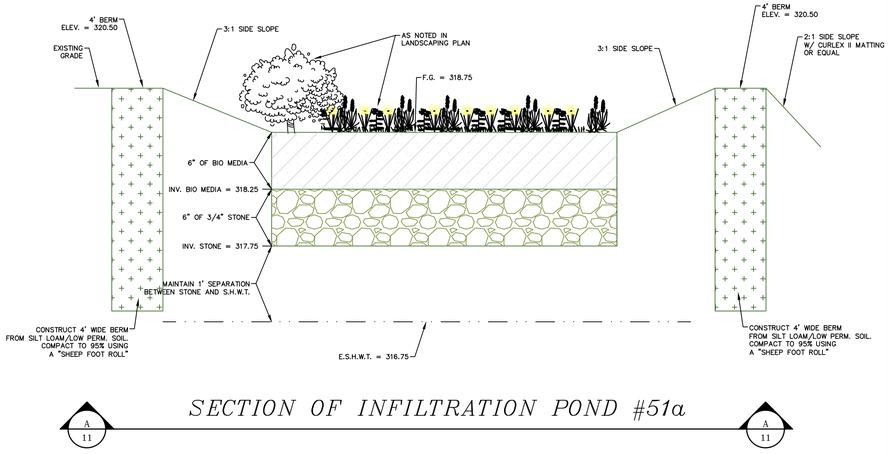
(IN FEET)
1 inch = 10 ft.

1. SUBGRADE MATERIAL IS NOT TO BE IMPACTED BY VEHICULAR TRAFFIC. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE, PERFORM EXCAVATION WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.
2. THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE INFILTRATION POND.
3. DO NOT PLACE THE BIORETENTION / INFILTRATION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
4. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF, WATER FROM EXCAVATION) TO THE BIORETENTION / INFILTRATION AREA DURING ANY STAGE OF CONSTRUCTION.
5. AFTER THE BASIN IS EXCAVATED TO THE FINAL DESIGN ELEVATION, THE FLOOR SHOULD BE DEEPLY TILLED WITH A ROTARY TILLER OR DISC HARROW TO RESTORE INFILTRATION RATES, FOLLED BY A PASS WITH A LEVELING DRAG.
6. VEGETATION SHOULD BE ESTABLISHED IMMEDIATELY.



PLAN VIEW INFILTRATION POND #1 (POND 51a)

1. SUBGRADE MATERIAL IS NOT TO BE IMPACTED BY VEHICULAR TRAFFIC.
2. THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE INFILTRATION POND.



SECTION OF INFILTRATION POND #51a

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 10 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

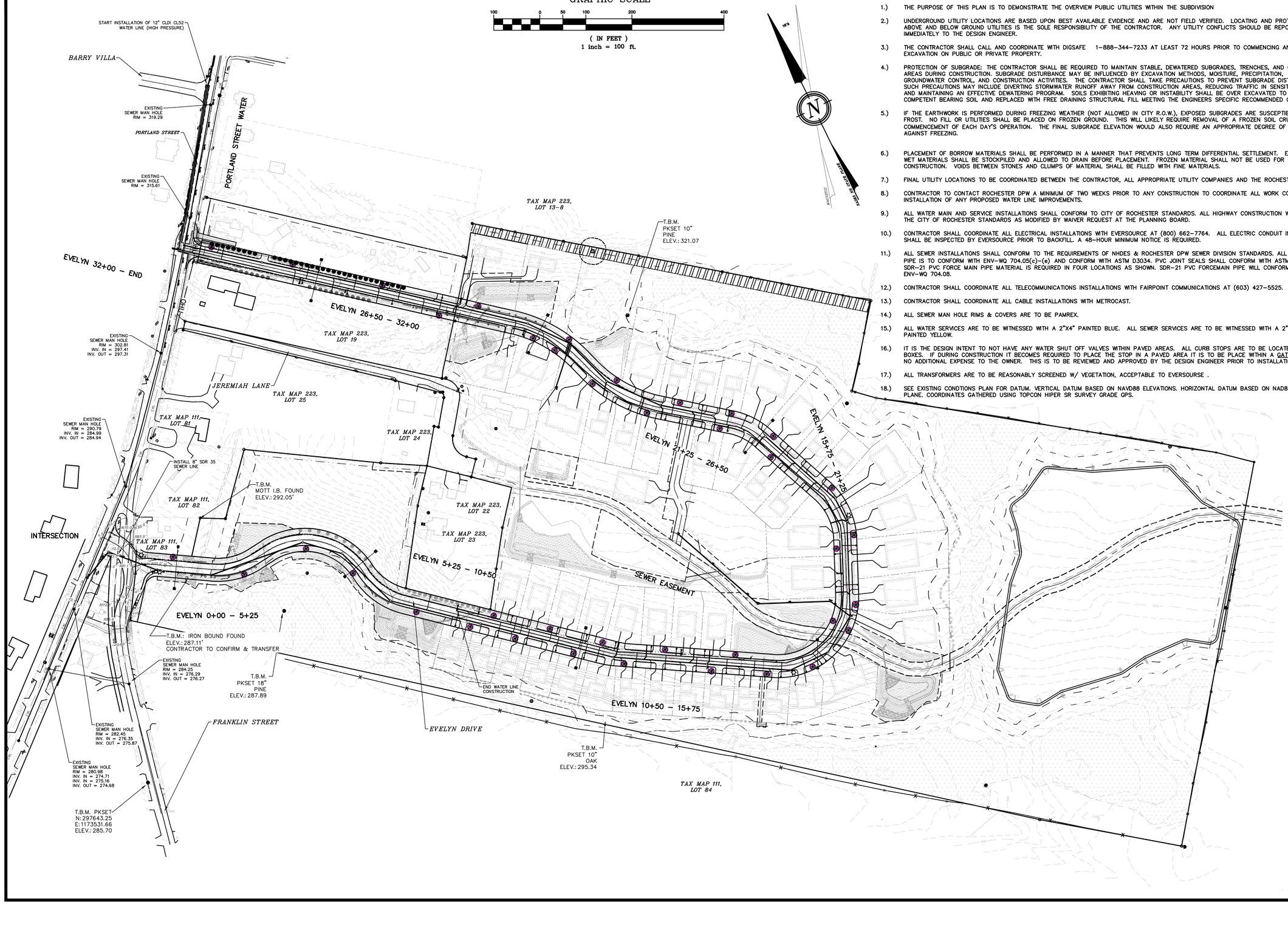
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

R111

GRAPHIC SCALE

100 0 50 100 200 400

(IN FEET)
1 inch = 100 ft.



NOTES:

1.) THE PURPOSE OF THIS PLAN IS TO DEMONSTRATE THE OVERVIEW PUBLIC UTILITIES WITHIN THE SUBDIVISION

2.) UNDERGROUND UTILITY LOCATIONS ARE BASED UPON BEST AVAILABLE EVIDENCE AND ARE NOT FIELD VERIFIED. LOCATING AND PROTECTING ANY ABOVE AND BELOW GROUND UTILITIES IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR. ANY UTILITY CONFLICTS SHOULD BE REPORTED IMMEDIATELY TO THE DESIGN ENGINEER.

3.) THE CONTRACTOR SHALL CALL AND COORDINATE WITH DIGSAFE 1-888-344-7233 AT LEAST 72 HOURS PRIOR TO COMMENCING ANY EXCAVATION ON PUBLIC OR PRIVATE PROPERTY.

4.) PROTECTION OF SUBGRADE: THE CONTRACTOR SHALL BE REQUIRED TO MAINTAIN STABLE, DEWATERED SUBGRADES, TRENCHES, AND OTHER AREAS DURING CONSTRUCTION. SUBGRADE DISTURBANCE MAY BE INFLUENCED BY EXCAVATION METHODS, MOISTURE, PRECIPITATION, GROUNDWATER CONTROL, AND CONSTRUCTION ACTIVITIES. THE CONTRACTOR SHALL TAKE PRECAUTIONS TO PREVENT SUBGRADE DISTURBANCE. SUCH PRECAUTIONS MAY INCLUDE DIVERTING STORMWATER RUNOFF AWAY FROM CONSTRUCTION AREAS, REDUCING TRAFFIC IN SENSITIVE AREAS, AND MAINTAINING AN EFFECTIVE DEWATERING PROGRAM. SOILS EXHIBITING HEAVING OR INSTABILITY SHALL BE OVER EXCAVATED TO MORE COMPETENT BEARING SOIL AND REPLACED WITH FREE DRAINING STRUCTURAL FILL MEETING THE ENGINEERS SPECIFIC RECOMMENDED CRITERIA.

5.) IF THE EARTHWORK IS PERFORMED DURING FREEZING WEATHER (NOT ALLOWED IN CITY R.O.W.), EXPOSED SUBGRADES ARE SUSCEPTIBLE TO FROST. NO FILL OR UTILITIES SHALL BE PLACED ON FROZEN GROUND. THIS WILL LIKELY REQUIRE REMOVAL OF A FROZEN SOIL CRUST AT THE COMMENCEMENT OF EACH DAY'S OPERATION. THE FINAL SUBGRADE ELEVATION WOULD ALSO REQUIRE AN APPROPRIATE DEGREE OF INSULATION AGAINST FREEZING.

6.) PLACEMENT OF BORROW MATERIALS SHALL BE PERFORMED IN A MANNER THAT PREVENTS LONG TERM DIFFERENTIAL SETTLEMENT. EXCESSIVELY WET MATERIALS SHALL BE STOCKPILED AND ALLOWED TO DRAIN BEFORE PLACEMENT. FROZEN MATERIAL SHALL NOT BE USED FOR CONSTRUCTION. VOIDS BETWEEN STONES AND CLUMPS OF MATERIAL SHALL BE FILLED WITH FINE MATERIALS.

7.) FINAL UTILITY LOCATIONS TO BE COORDINATED BETWEEN THE CONTRACTOR, ALL APPROPRIATE UTILITY COMPANIES AND THE ROCHESTER DPW.

8.) CONTRACTOR TO CONTACT ROCHESTER DPW A MINIMUM OF TWO WEEKS PRIOR TO ANY CONSTRUCTION TO COORDINATE ALL WORK CONCERNING INSTALLATION OF ANY PROPOSED WATER LINE IMPROVEMENTS.

9.) ALL WATER MAIN AND SERVICE INSTALLATIONS SHALL CONFORM TO CITY OF ROCHESTER STANDARDS. ALL HIGHWAY CONSTRUCTION WILL MEET THE CITY OF ROCHESTER STANDARDS AS MODIFIED BY WAIVER REQUEST AT THE PLANNING BOARD.

10.) CONTRACTOR SHALL COORDINATE ALL ELECTRICAL INSTALLATIONS WITH EVERSOURCE AT (800) 662-7764. ALL ELECTRIC CONDUIT INSTALLATION SHALL BE INSPECTED BY EVERSOURCE PRIOR TO BACKFILL. A 48-HOUR MINIMUM NOTICE IS REQUIRED.

11.) ALL SEWER INSTALLATIONS SHALL CONFORM TO THE REQUIREMENTS OF NHDES & ROCHESTER DPW SEWER DIVISION STANDARDS. ALL PVC SEWER PIPE IS TO CONFORM WITH ENV-WQ 704.05(c)-(e) AND CONFORM WITH ASTM D3034. PVC JOINT SEALS SHALL CONFORM WITH ASTM D3121. SDR-21 PVC FORCE MAIN PIPE MATERIAL IS REQUIRED IN FOUR LOCATIONS AS SHOWN. SDR-21 PVC FORCEMAIN PIPE WILL CONFORM TO ENV-WQ 704.08.

12.) CONTRACTOR SHALL COORDINATE ALL TELECOMMUNICATIONS INSTALLATIONS WITH FAIRPOINT COMMUNICATIONS AT (603) 427-5525.

13.) CONTRACTOR SHALL COORDINATE ALL CABLE INSTALLATIONS WITH METROCAST.

14.) ALL SEWER MAN HOLE RIMS & COVERS ARE TO BE PAMREX.

15.) ALL WATER SERVICES ARE TO BE WITNESSED WITH A 2"X4" PAINTED BLUE. ALL SEWER SERVICES ARE TO BE WITNESSED WITH A 2"X4" PAINTED YELLOW.

16.) IT IS THE DESIGN INTENT TO NOT HAVE ANY WATER SHUT OFF VALVES WITHIN PAVED AREAS. ALL CURB STOPS ARE TO BE LOCATED IN CURB BOXES. IF DURING CONSTRUCTION IT BECOMES REQUIRED TO PLACE THE STOP IN A PAVED AREA IT IS TO BE PLACE WITHIN A GATE BOX AT NO ADDITIONAL EXPENSE TO THE OWNER. THIS IS TO BE REVIEWED AND APPROVED BY THE DESIGN ENGINEER PRIOR TO INSTALLATION.

17.) ALL TRANSFORMERS ARE TO BE REASONABLY SCREENED W/ VEGETATION, ACCEPTABLE TO EVERSOURSE .

18.) SEE EXISTING CONDITIONS PLAN FOR DATUM. VERTICAL DATUM BASED ON NAVD88 ELEVATIONS. HORIZONTAL DATUM BASED ON NAD83 STATE PLANE. COORDINATES GATHERED USING TOPCON HIPER SR SURVEY GRADE GPS.

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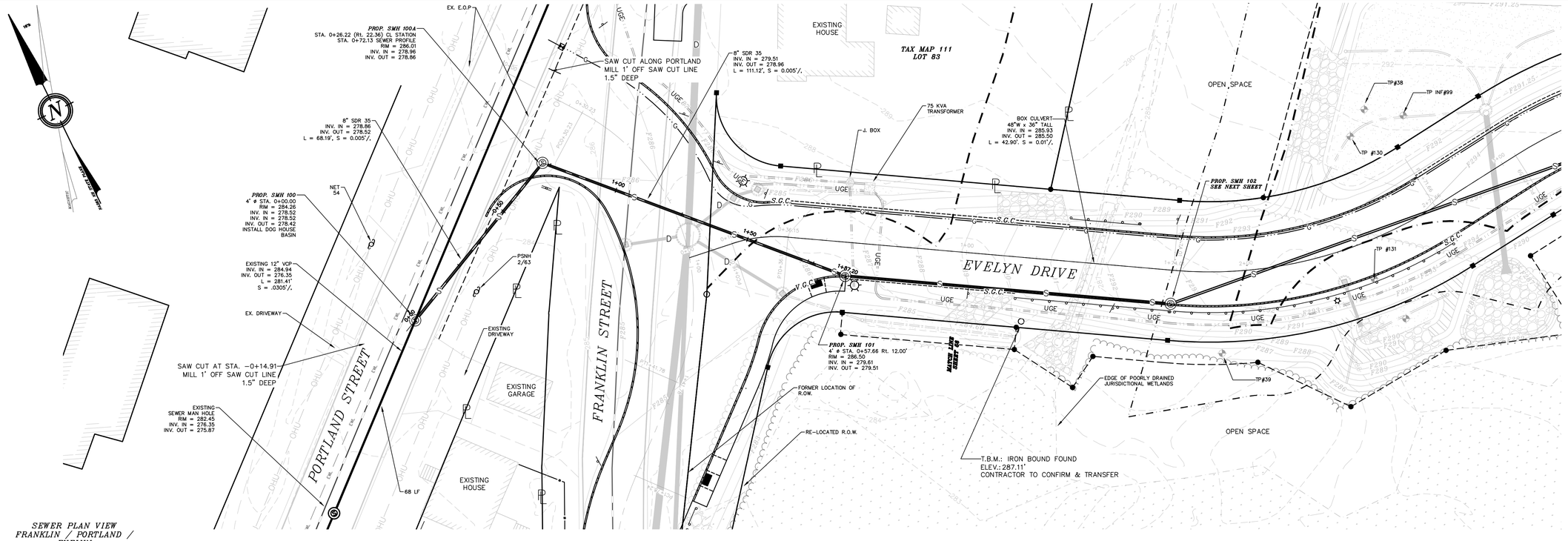
UTILITY OVERVIEW SHEET
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

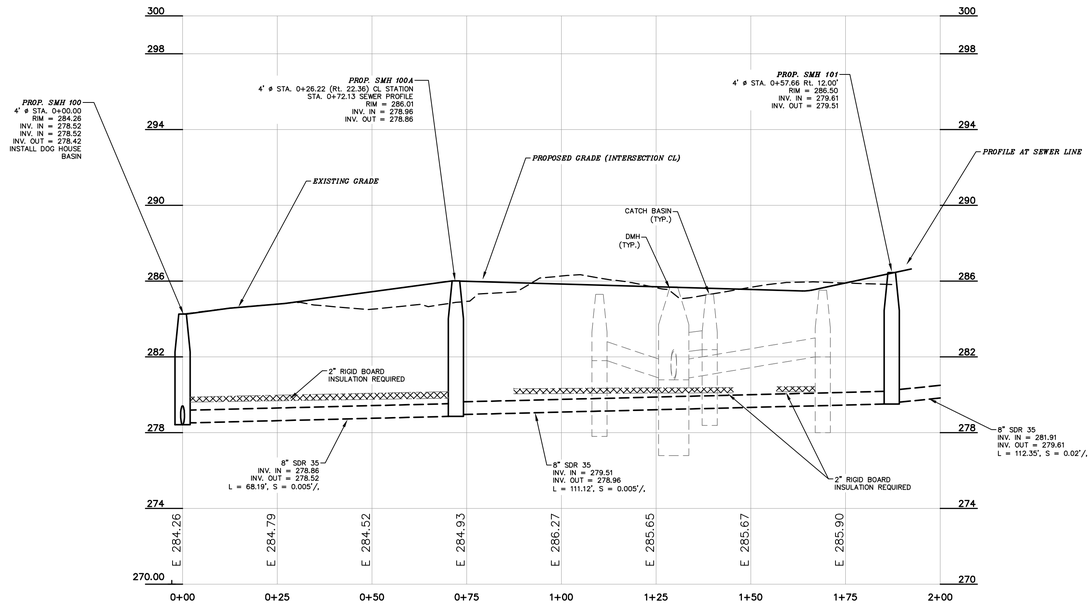
SCALE : 1 IN. EQUALS 100 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



SEWER PLAN VIEW
FRANKLIN / PORTLAND / EVELYN

SEWER PROFILE VIEW
FRANKLIN / PORTLAND / EVELYN
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



GRAPHIC SCALE

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(IN FEET)
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INTERSECTION SEWER DESIGN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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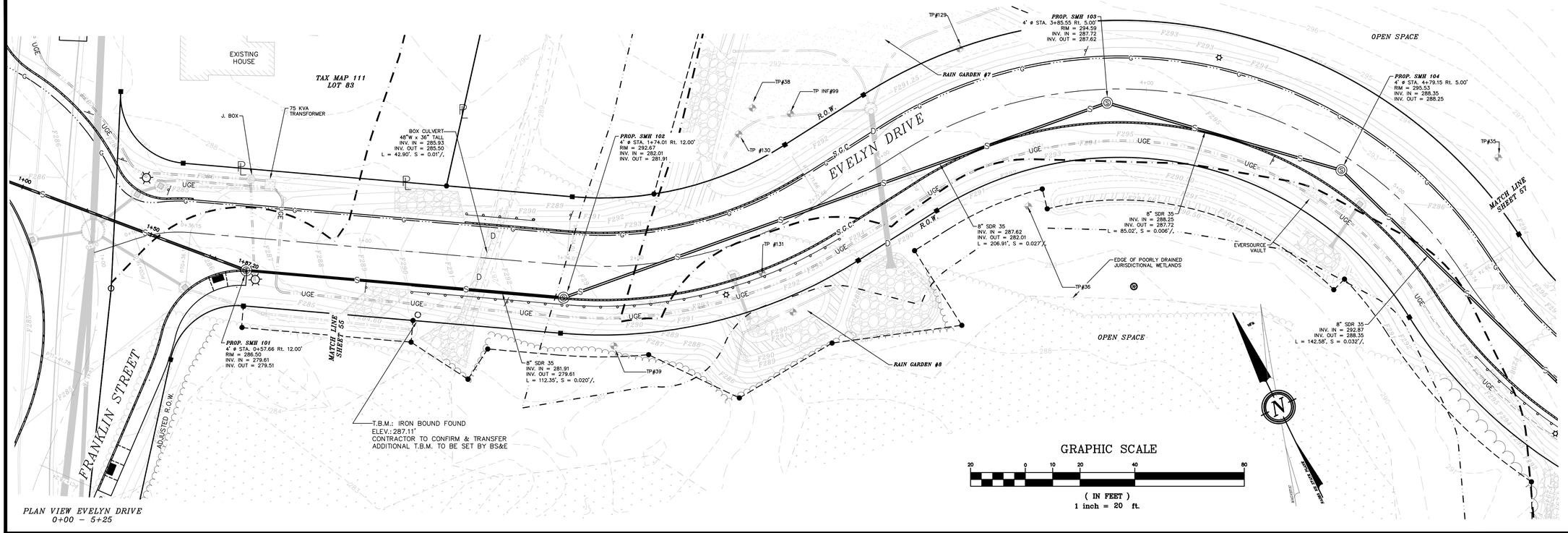
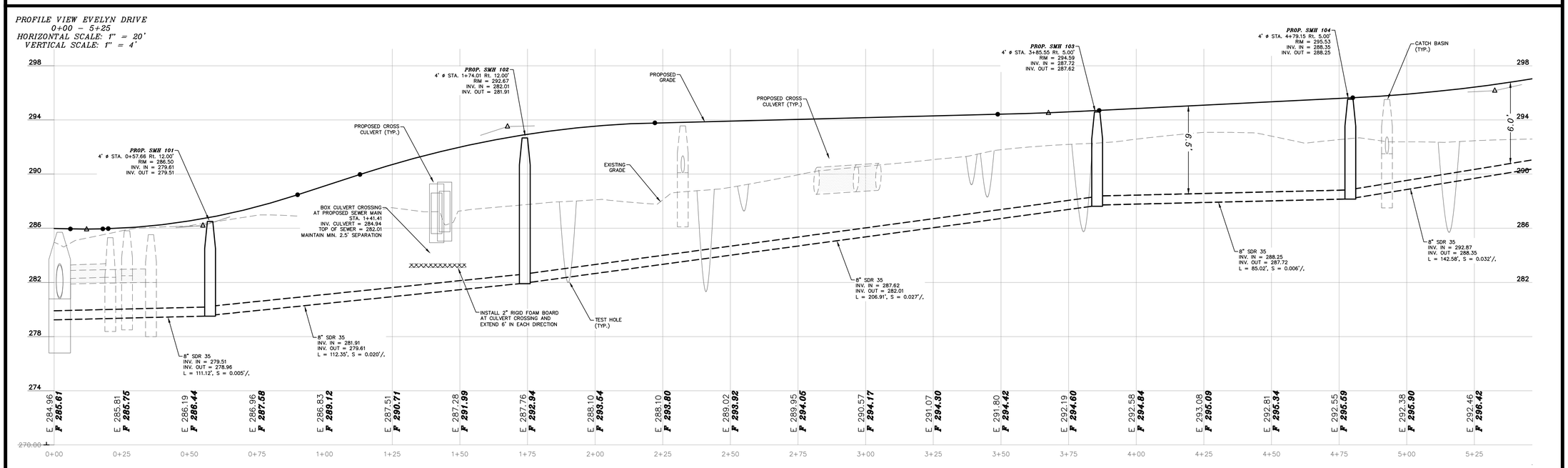
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



PLAN VIEW EVELYN DRIVE
0+00 – 5+25



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UTILITY DESIGN EVELYN DRIVE 0+00 – 5+25
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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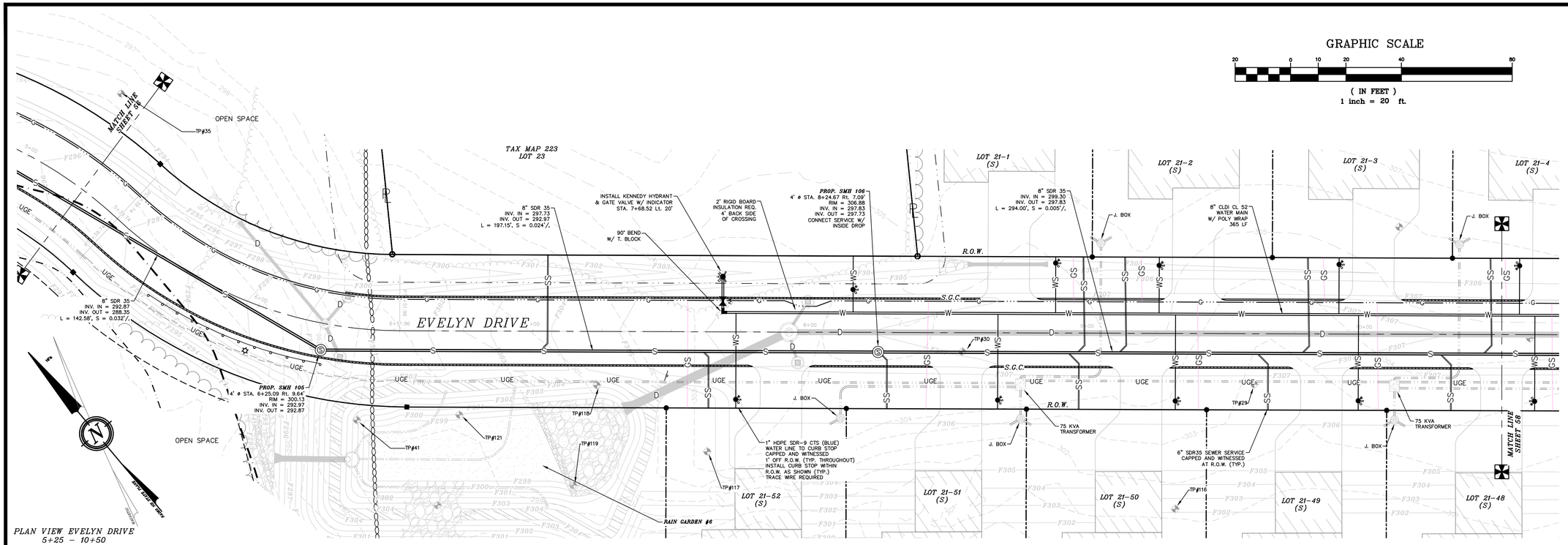
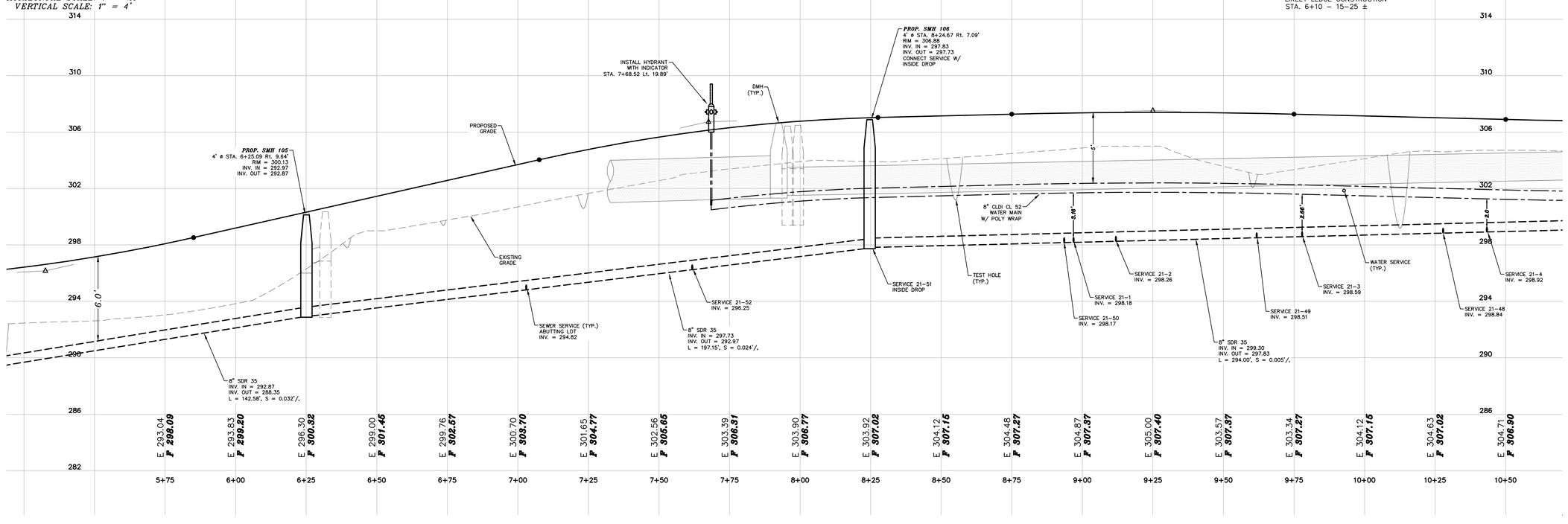
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



PLAN VIEW EVELYN DRIVE
5+25 – 10+50

PROFILE VIEW EVELYN DRIVE
5+25 – 10+50
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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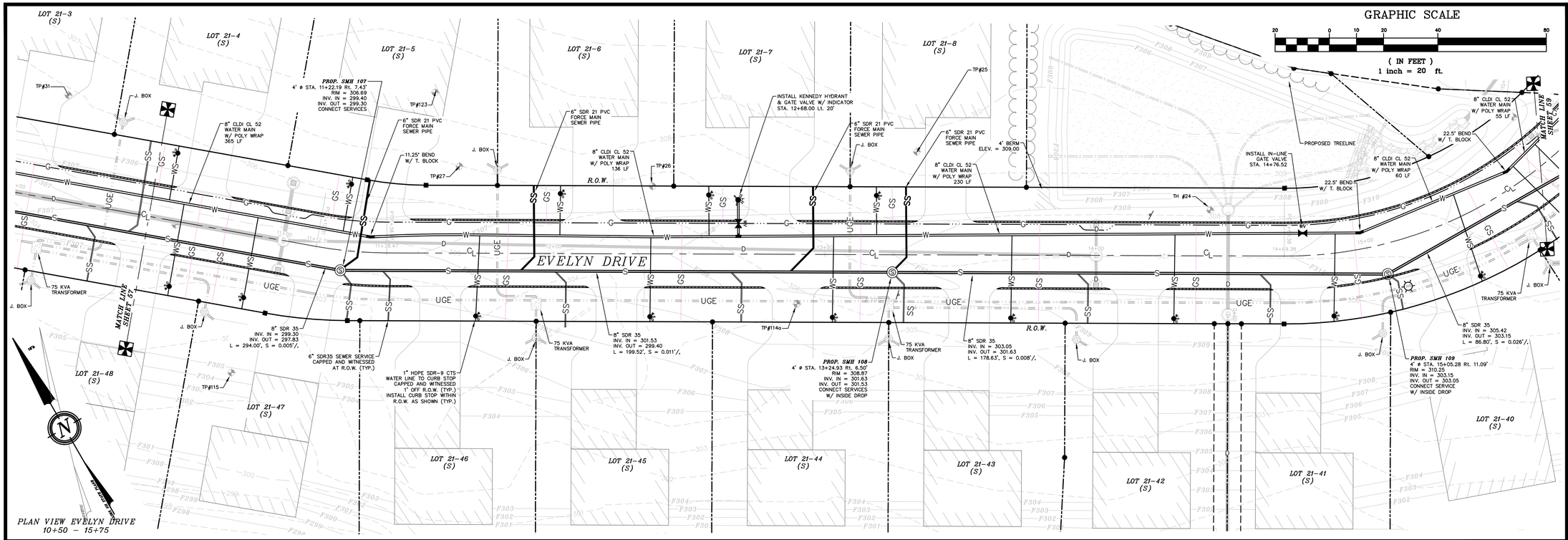
UTILITY DESIGN EVELYN DRIVE 5+25 – 10+50
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

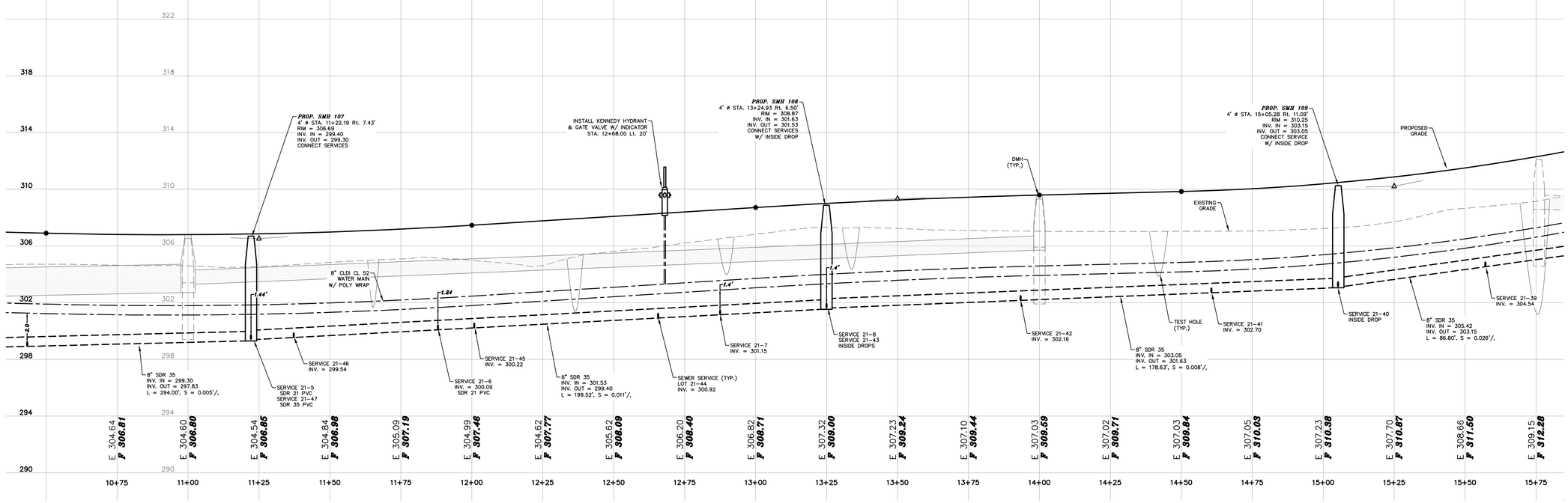
SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



PLAN VIEW EVELYN DRIVE
10+50 – 15+75

PROFILE VIEW EVELYN DRIVE
10+50 – 15+75
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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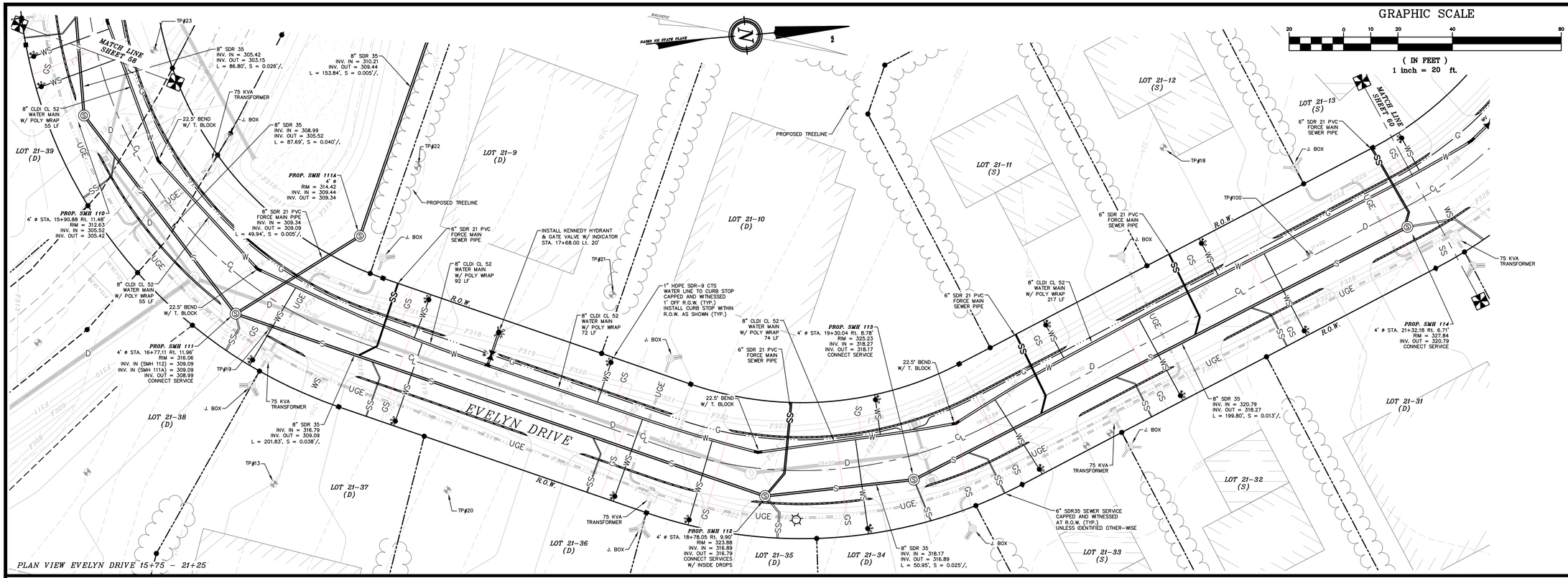
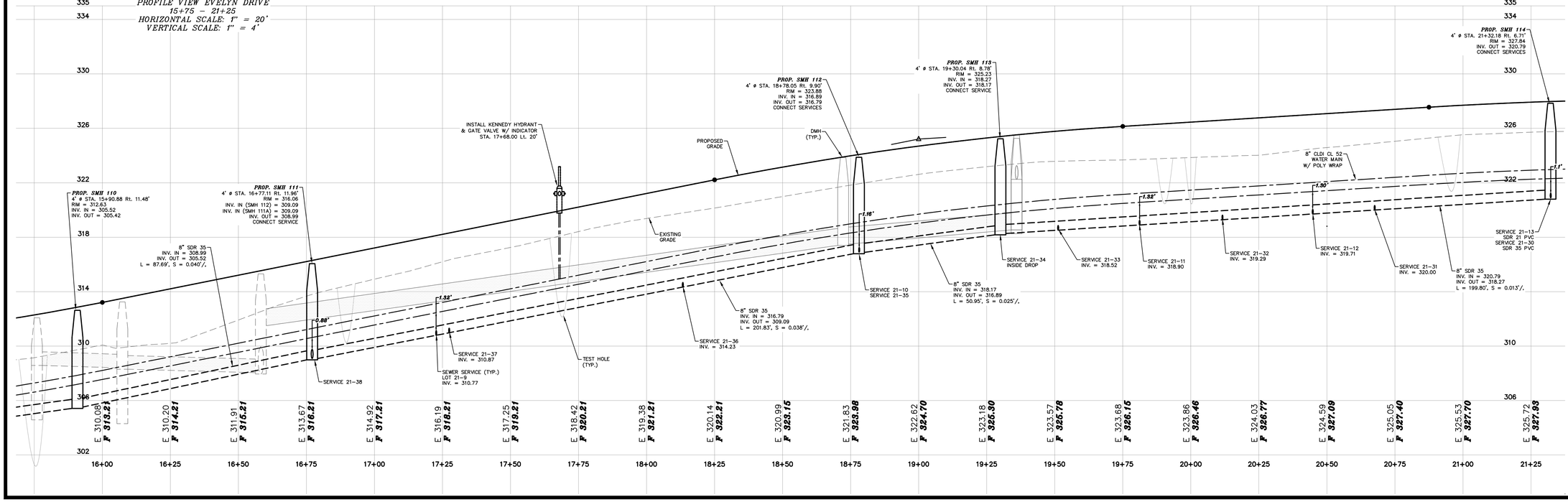
UTILITY DESIGN EVELYN DRIVE 10+50 – 15+75
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER





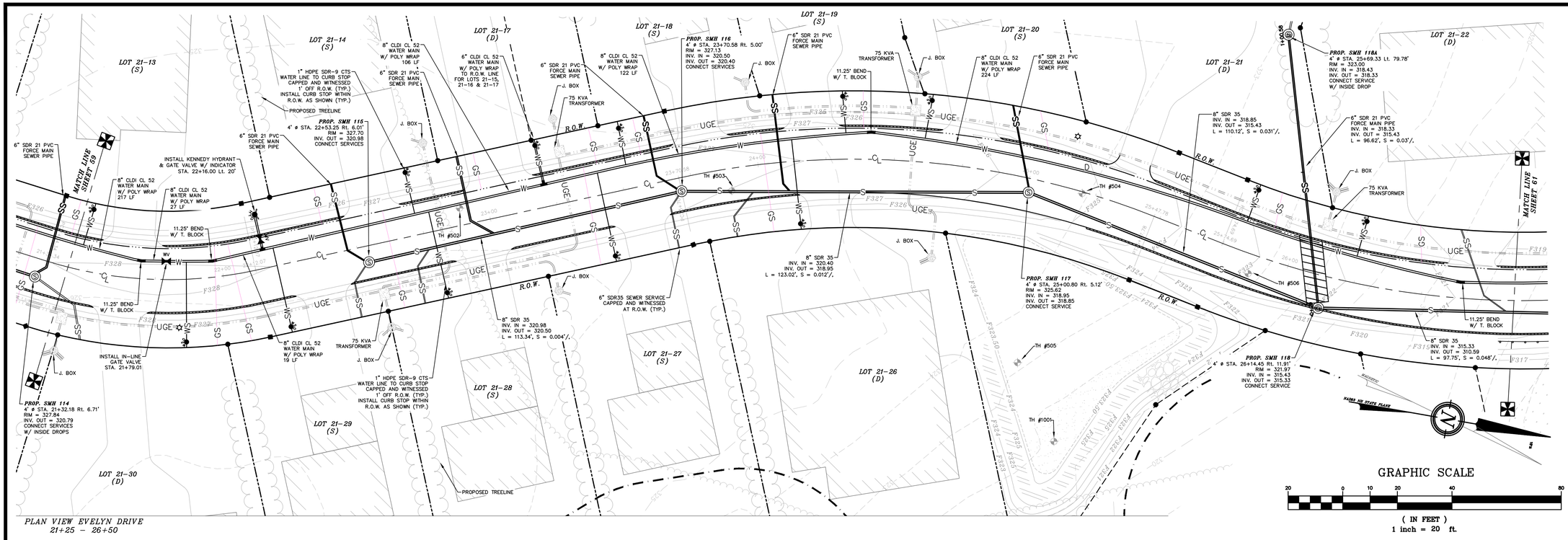
REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

UTILITY DESIGN EVELYN DRIVE 15+75 – 21+25
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

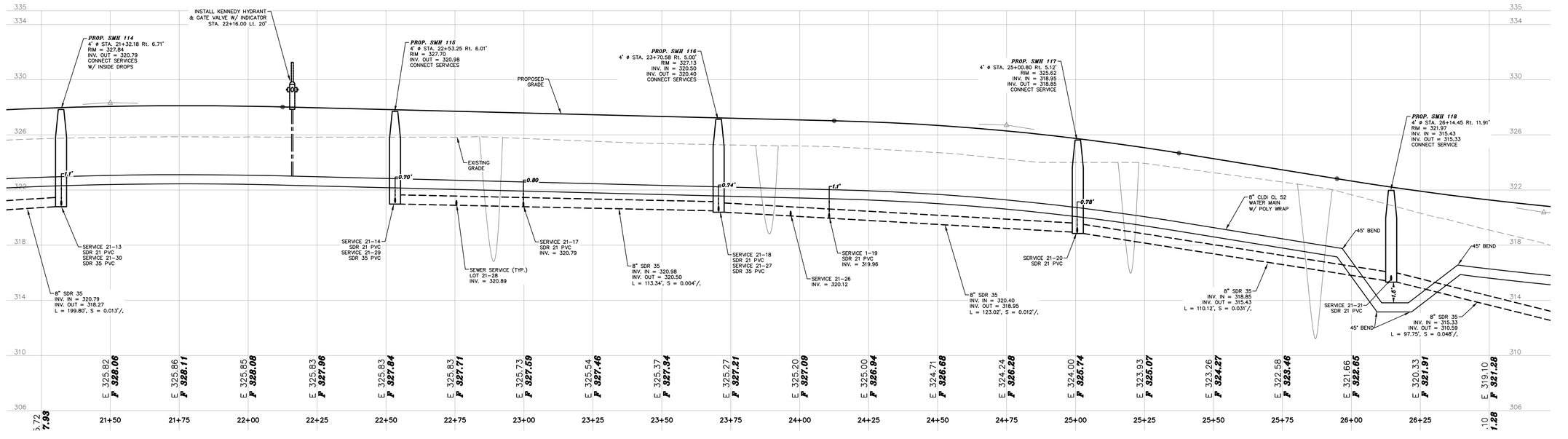
SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



PLAN VIEW EVELYN DRIVE
21+25 – 26+50

PROFILE VIEW EVELYN DRIVE
21+25 – 26+50
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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UTILITY DESIGN EVELYN DRIVE 21+25 – 26+50
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
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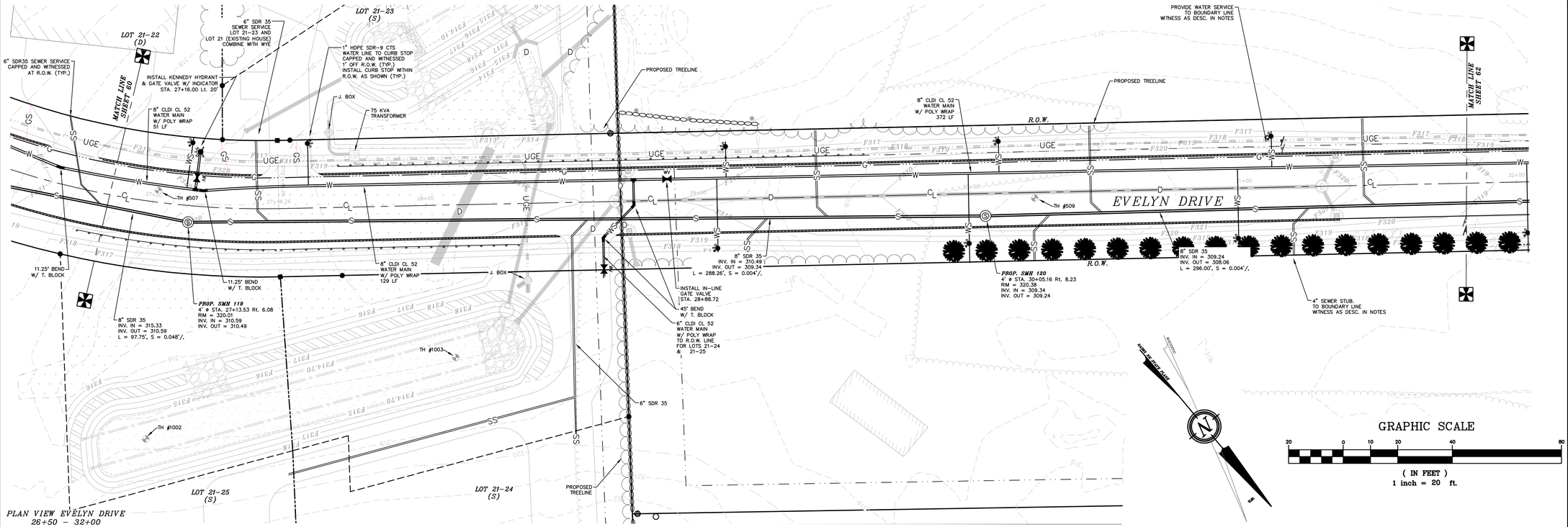
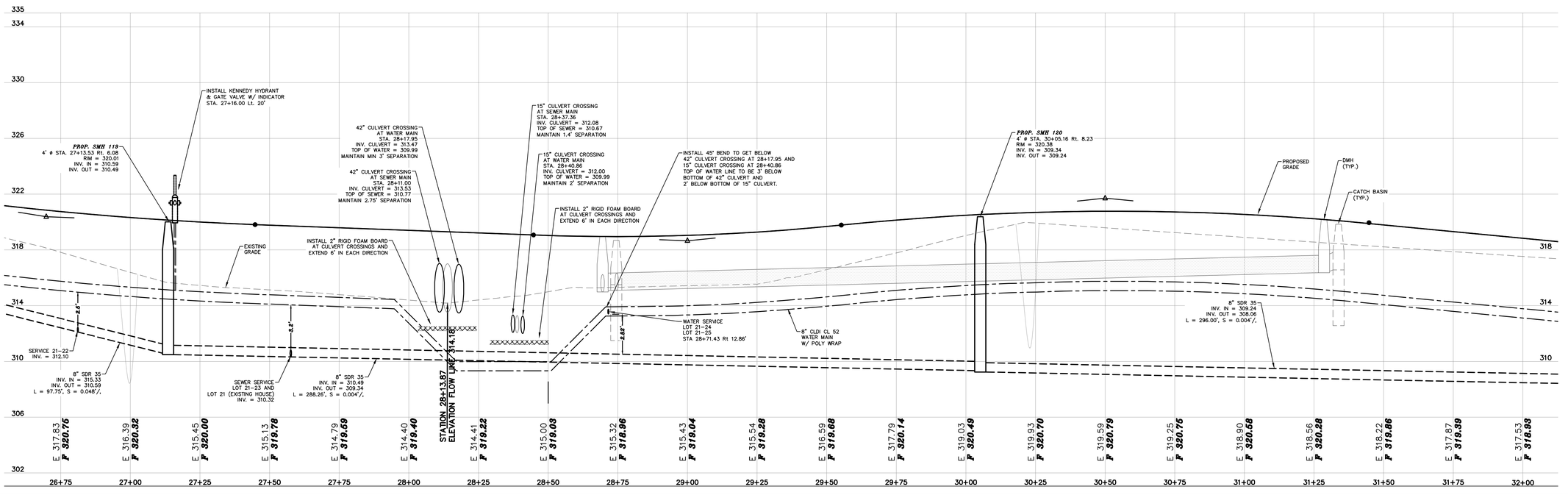
KENNETH A. BERRY No. 14243
LICENSED PROFESSIONAL ENGINEER



PLAN VIEW EVELYN DRIVE
26+50 – 32+00

PROFILE VIEW EVELYN DRIVE
26+50 – 32+00
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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UTILITY DESIGN EVELYN DRIVE 26+50 – 32+00
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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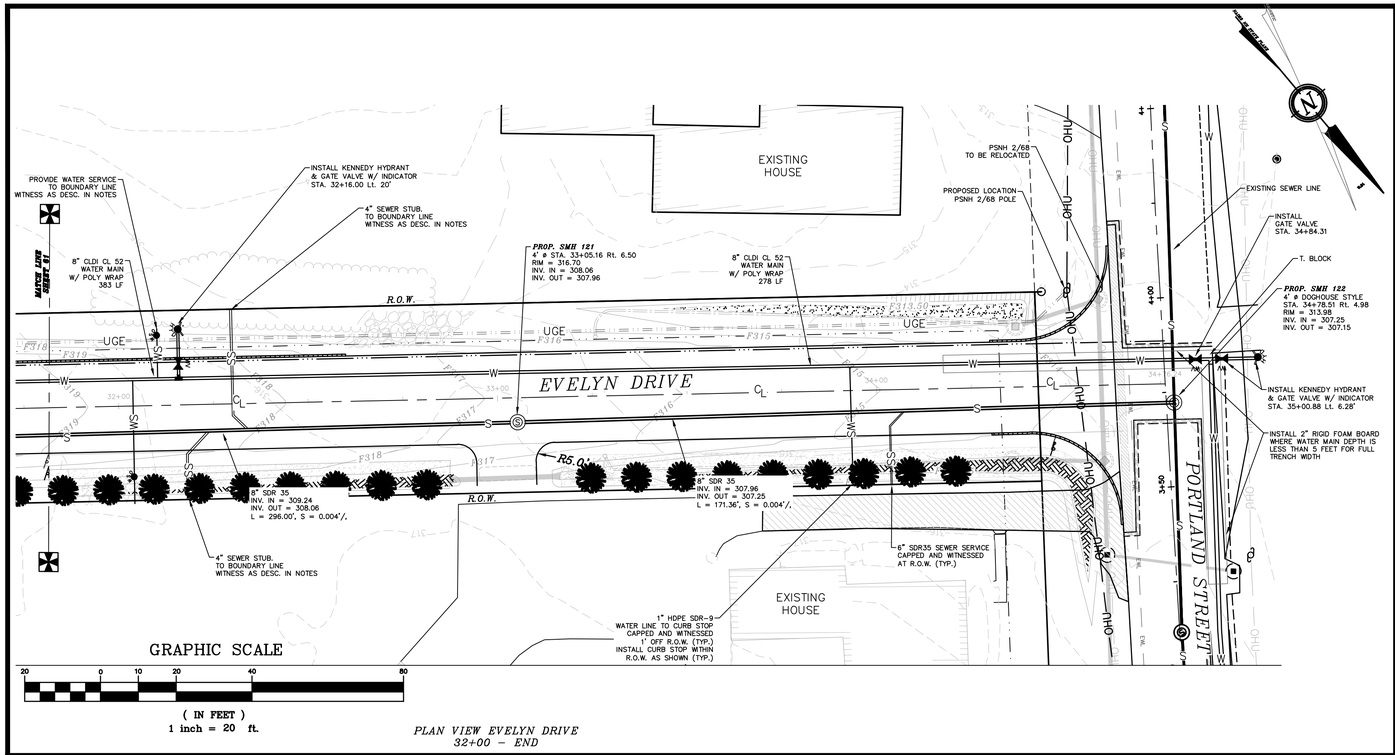
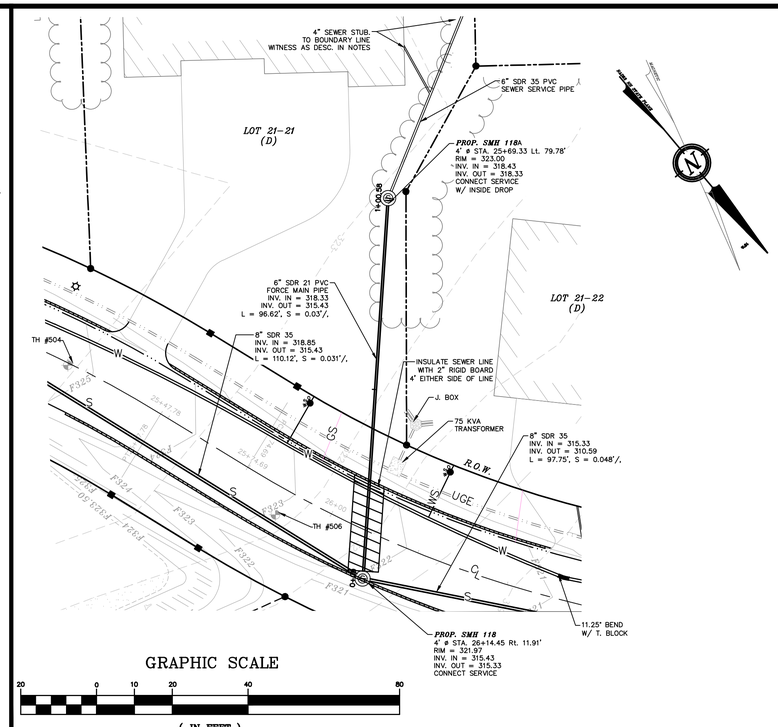
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14242
LICENSED PROFESSIONAL ENGINEER

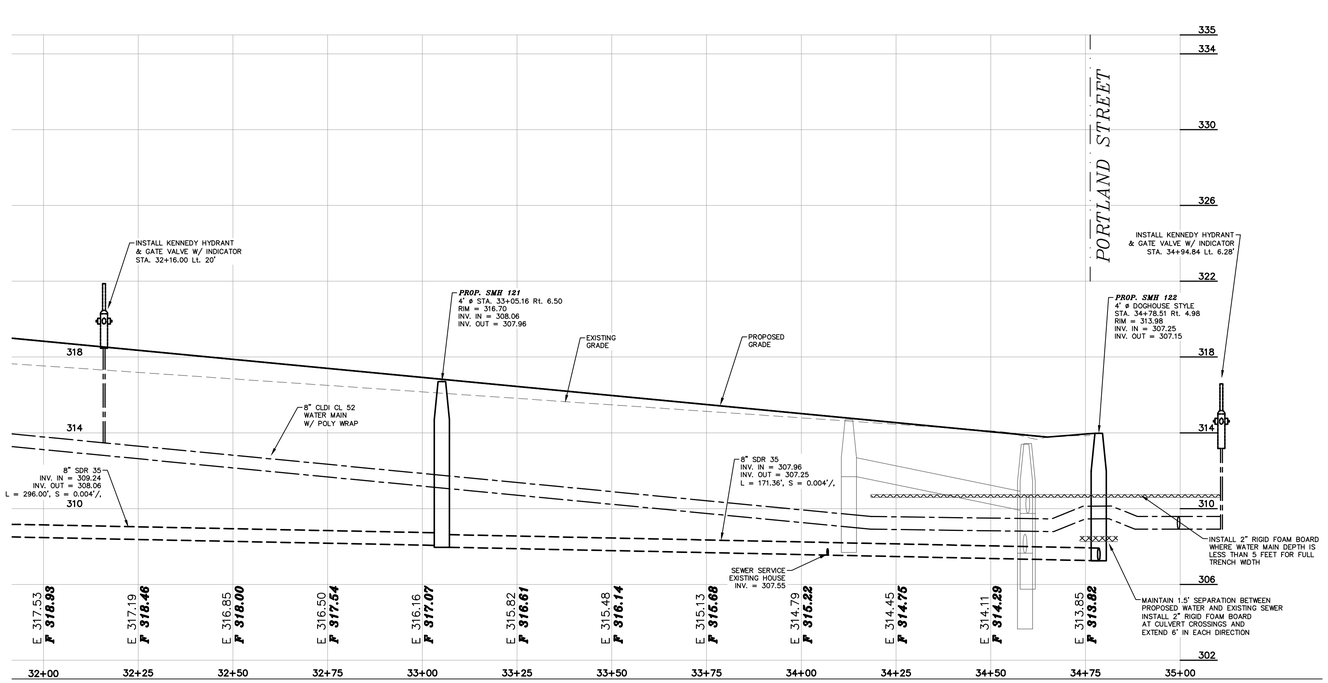


PLAN VIEW EVELYN DRIVE
32+00 – END

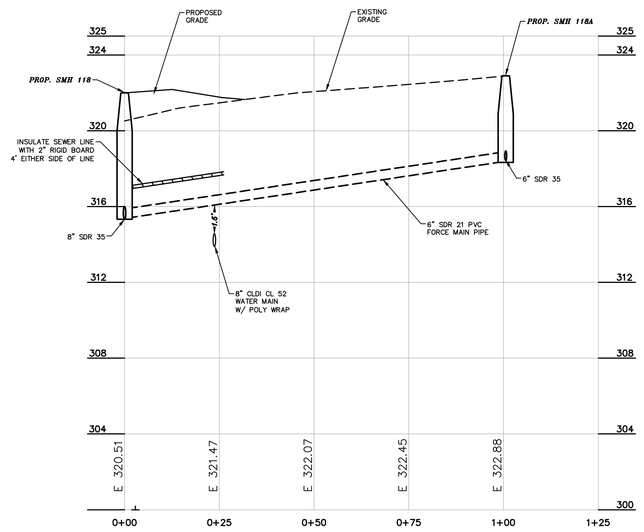


PLAN VIEW SEWER CONNECTION SMH 118 TO SMH 188A

PROFILE VIEW EVELYN DRIVE
32+00 – END
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



PROFILE VIEW SEWER CONNECTION SMH 118 TO SMH 188A
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4



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UTILITY DESIGN EVELYN DRIVE 32+00 – END
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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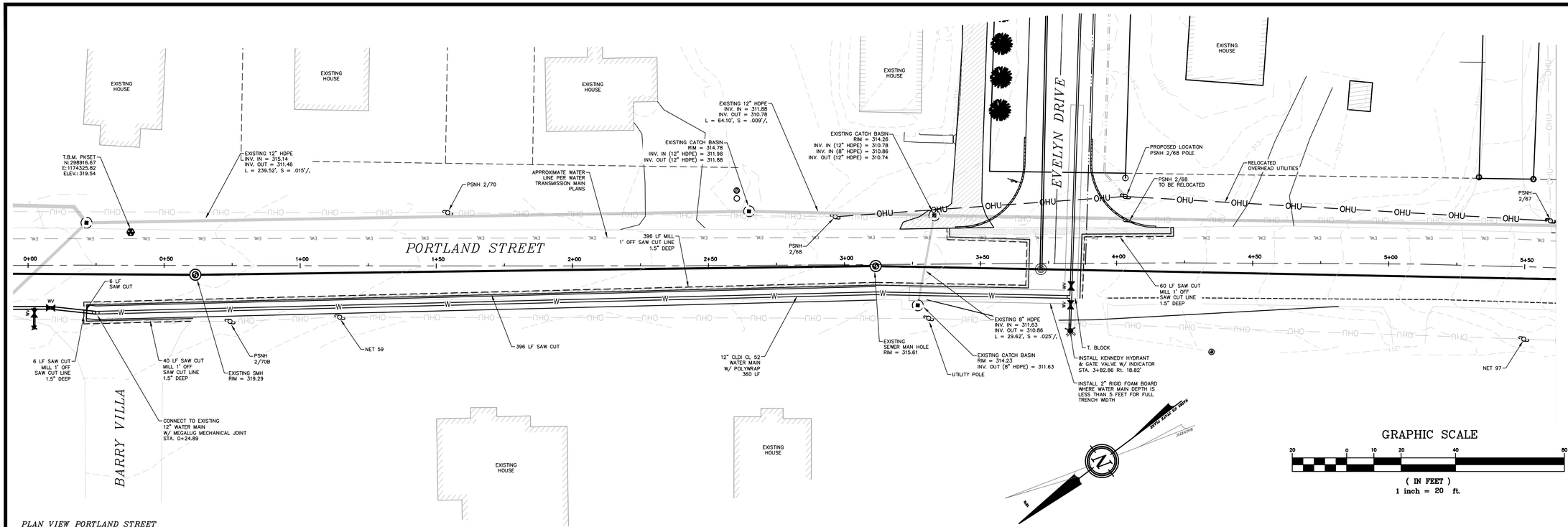
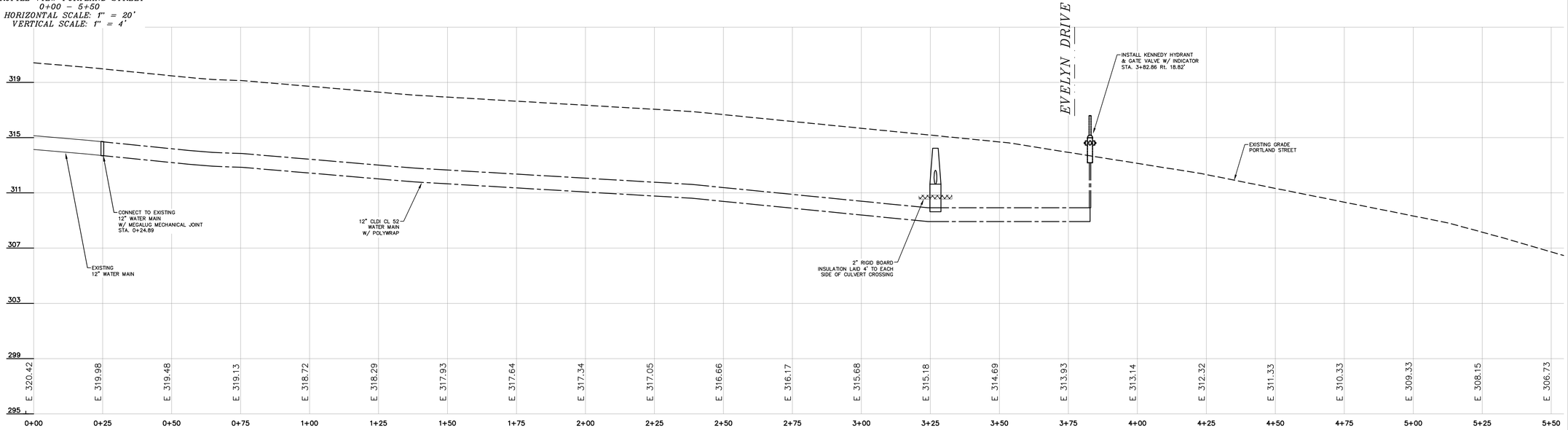
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



PLAN VIEW PORTLAND STREET
0+00 – 5+50



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PROPOSED WATER MAIN ON PORTLAND STREET
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 20 FT.
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
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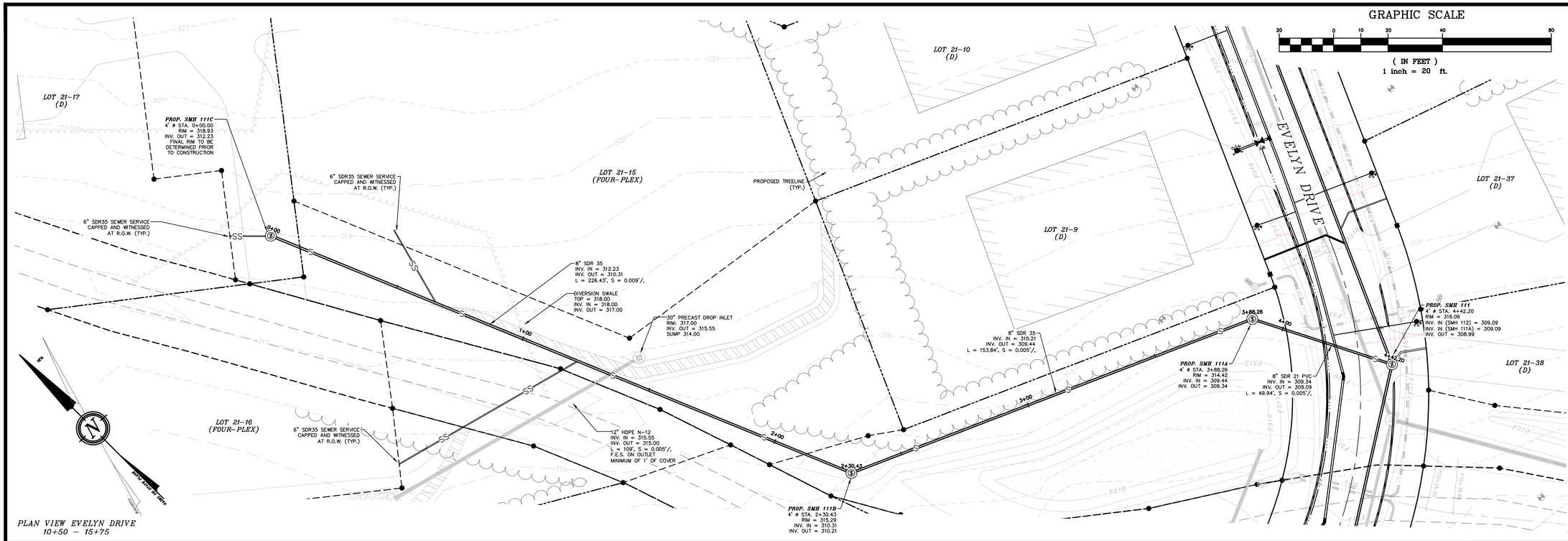
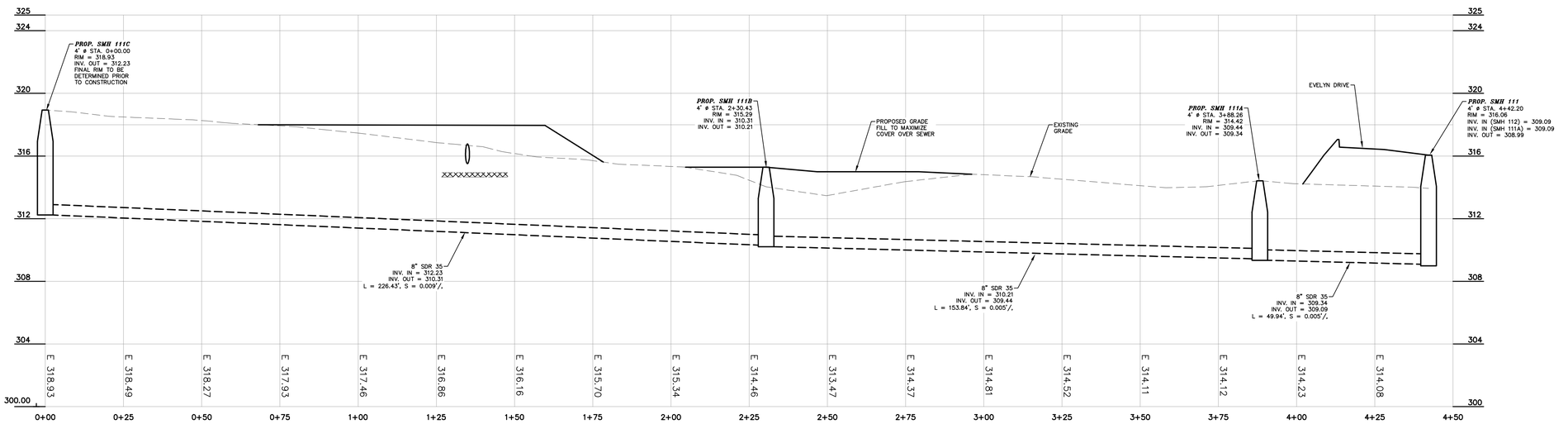


PLAN VIEW EVELYN DRIVE
10+50 – 15+75

PROFILE VIEW EVELYN DRIVE
10+50 – 15+75
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



GRAPHIC SCALE
20 0 10 20 40 80
(IN FEET)
1 inch = 20 ft.

REVISION	DATE	DESCRIPTION
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SEWER EASEMENT PLAN AND PROFILE
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

SOILS & DEWATERING:

GsB	*GLOUCESTER*	*VERY STONY FINE SANDY LOAM*	*K= .17*
LeB	*LEICESTER*	*VERY STONY FINE SANDY LOAM*	*K= .43*
SuB	*SUTTON*	*VERY STONY FINE SANDY LOAM*	*K= .43*
WgB	*WOODBRIDGE*	*FINE SANDY LOAM*	*K= .43*
RkB	*RIDGEBURY*	*VERY STONY FINE SANDY LOAM*	*K= .24*
CfB	*CUARLTON*	*FINE SANDY LOAM*	*K= .43*
446	*SCITUATE*	*COARSE LOAMY*	*K= .24*
446	*NEWFIELDS*	*COARSE LOAMY*	*K= .28*

SEE SITE SPECIFIC SOILS MAP (SSSM)
SEE WEBSOIL USDA–NRCS
ERODIBILITY FACTOR – K, CPESC MANUAL, ENVIROCERT INTERNATIONAL INC.

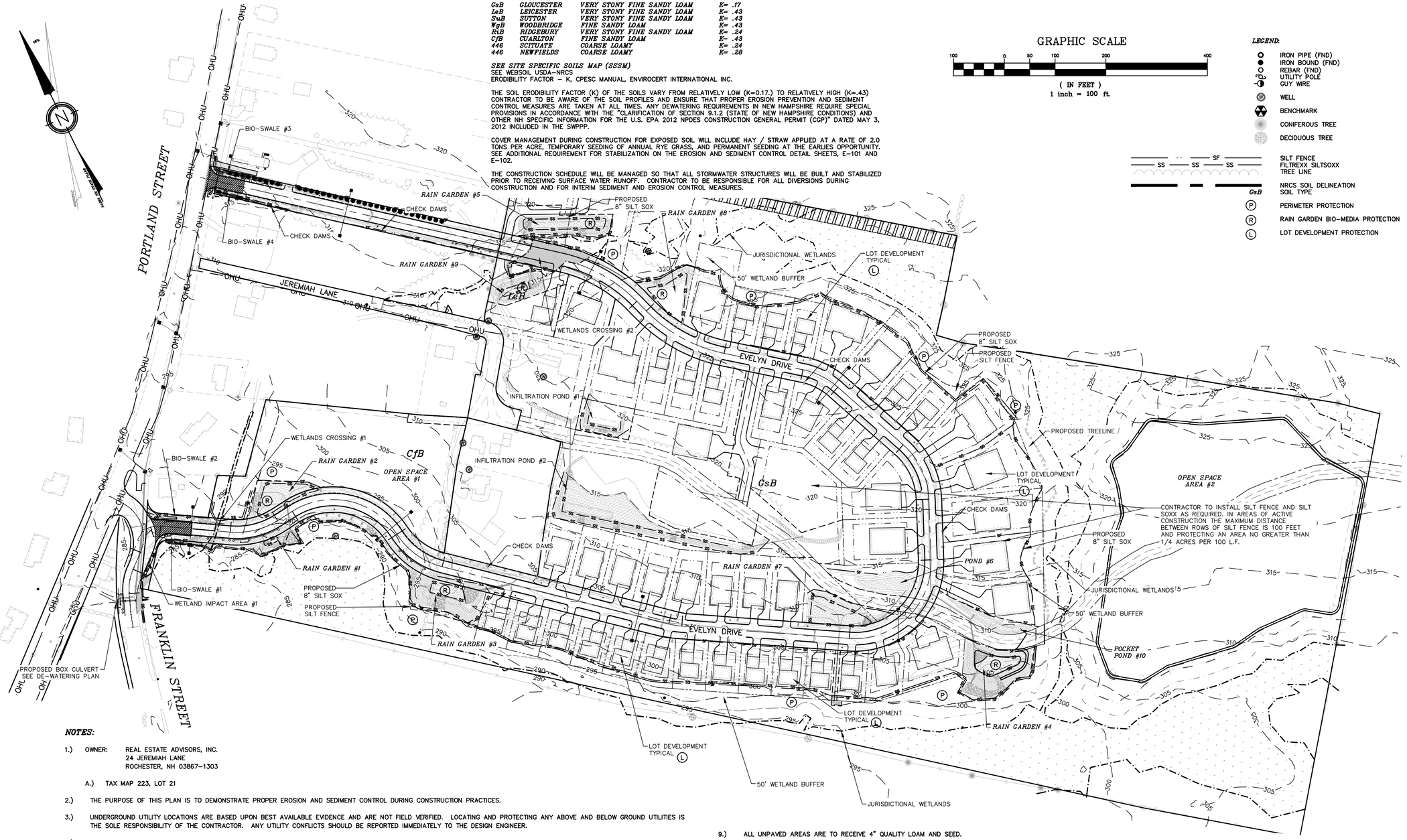
THE SOIL ERODIBILITY FACTOR (K) OF THE SOILS VARY FROM RELATIVELY LOW (K=0.17.) TO RELATIVELY HIGH (K=.43) CONTRACTOR TO BE AWARE OF THE SOIL PROFILES AND ENSURE THAT PROPER EROSION PREVENTION AND SEDIMENT CONTROL MEASURES ARE TAKEN AT ALL TIMES. ANY DEWATERING REQUIREMENTS IN NEW HAMPSHIRE REQUIRE SPECIAL PROVISIONS IN ACCORDANCE WITH THE "CLARIFICATION OF SECTION 9.1.2 (STATE OF NEW HAMPSHIRE CONDITIONS) AND OTHER NH SPECIFIC INFORMATION FOR THE U.S. EPA 2012 NPDES CONSTRUCTION GENERAL PERMIT (CGP)" DATED MAY 3, 2012 INCLUDED IN THE SWPPP.

COVER MANAGEMENT DURING CONSTRUCTION FOR EXPOSED SOIL WILL INCLUDE HAY / STRAW APPLIED AT A RATE OF 2.0 TONS PER ACRE, TEMPORARY SEEDING OF ANNUAL RYE GRASS, AND PERMANENT SEEDING AT THE EARLIES OPPORTUNITY. SEE ADDITIONAL REQUIREMENT FOR STABILIZATION ON THE EROSION AND SEDIMENT CONTROL DETAIL SHEETS, E–101 AND E–102.

THE CONSTRUCTION SCHEDULE WILL BE MANAGED SO THAT ALL STORMWATER STRUCTURES WILL BE BUILT AND STABILIZED PRIOR TO RECEIVING SURFACE WATER RUNOFF. CONTRACTOR TO BE RESPONSIBLE FOR ALL DIVERSIONS DURING CONSTRUCTION AND FOR INTERIM SEDIMENT AND EROSION CONTROL MEASURES.

GRAPHIC SCALE
100 0 50 100 200 400
(IN FEET)
1 inch = 100 ft.

LEGEND:
- IRON PIPE (FND)
- IRON BOUND (FND)
- REBAR (FND)
- UTILITY POLE
- GUY WIRE
- WELL
- BENCHMARK
- CONIFEROUS TREE
- DECIDUOUS TREE
- SILT FENCE
- FILTREXX SILTSOXX
- TREE LINE
- NRCS SOIL DELINEATION
- SOIL TYPE
- PERIMETER PROTECTION
- RAIN GARDEN BIO–MEDIA PROTECTION
- LOT DEVELOPMENT PROTECTION



NOTES:

1.) OWNER: REAL ESTATE ADVISORS, INC.
24 JEREMIAH LANE
ROCHESTER, NH 03867–1303

A.) TAX MAP 223, LOT 21

2.) THE PURPOSE OF THIS PLAN IS TO DEMONSTRATE PROPER EROSION AND SEDIMENT CONTROL DURING CONSTRUCTION PRACTICES.

3.) UNDERGROUND UTILITY LOCATIONS ARE BASED UPON BEST AVAILABLE EVIDENCE AND ARE NOT FIELD VERIFIED. LOCATING AND PROTECTING ANY ABOVE AND BELOW GROUND UTILITIES IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR. ANY UTILITY CONFLICTS SHOULD BE REPORTED IMMEDIATELY TO THE DESIGN ENGINEER.

4.) THE CONTRACTOR SHALL CALL AND COORDINATE WITH DIGSAFE 1–888–344–7233 AT LEAST 72 HOURS PRIOR TO COMMENCING ANY EXCAVATION ON PUBLIC OR PRIVATE PROPERTY.

5.) SEE DETAILS CONCERNING SITE LAYOUT, DRAINAGE, UTILITY AND SEDIMENT AND EROSION CONTROLS.

6.) ALL DRAINAGE PIPE IS TO BE HDPE N–12. INDIVIDUAL PIPE SIZES ARE SPECIFIED ON GRADING AND DETAIL PLAN SHEETS.

7.) ALL ELEVATIONS TO BE VERIFIED BY THE CONTRACTOR PRIOR TO CONSTRUCTION. THE DESIGN ENGINEER IS TO BE NOTIFIED IMMEDIATELY OF ANY DISCREPANCY. TEMPORARY BENCHMARKS (T.B.M.) ARE TO BE PROVIDED BY THE DESIGN ENGINEER.

8.) UPON FINAL COMPLETION AND 85% STABILIZATION, THE DRAINAGE SYSTEM IS TO BE CLEANED OF ALL DEBRIS. SEDIMENT CONTROL PRACTICES REMOVED AND DISPOSED OF PROPERLY, AND ANNUAL MAINTENANCE PREFORMED ON ALL DRAINAGE PRACTICES.

9.) ALL UNPAVED AREAS ARE TO RECEIVE 4" QUALITY LOAM AND SEED.

10.) INSPECTIONS TO BE CONDUCTED ONCE PER EVERY SEVEN DAYS AND AT AN INCREASED FREQUENCY INCLUDING WITHIN 24–HOURS OF A 0.25 INCH RAIN EVENT. INSPECTIONS TO BE CONDUCTED BY A "QUALIFIED PERSON" AS DEFINED BY EPA CGP 4.1.1 AND INSPECTION REPORTS SUBMITTED TO THE CITY OF ROCHESTER, NH, ENGINEERING DEPARTMENT WITHIN 24 HOURS IN ACCORDANCE WITH CGP 4.1.7 AND MAINTAINED BY THE OWNER FOR A PERIOD OF THREE YEARS AFTER THE NOTICE OF TERMINATION (NOT) IS SUBMITTED.

11.) SILT FENCE MAY BE SUBSTITUTED WITH SILT SOXX OR EROSION CONTROL MIX BERM. SILT FENCE IS NOT A SUBSTITUTE FOR SILT SOXX, OR APPROVED EQUAL.

12.) THE CONTRACTOR SHALL NOT COMPACT SOIL IN THE RAIN GARDEN AREAS.

13.) PER EPA CGP Z.1.2.2 (INSTALL PERIMETER CONTROL), "YOU MUST INSTALL SEDIMENT CONTROLS ALONG THOSE PERIMETER AREAS OF YOUR SITE THAT WILL RECEIVE STORMWATER FROM EARTH DISTURBING ACTIVITIES." AS A RESULT OF SWPPP INSPECTIONS, THE CONTRACTOR MAY HAVE TO EXPAND PERIMETER CONTROLS TO MEET THIS REQUIREMENT.

14.) DURING LOT DEVELOPMENT, THE BUILDERS ARE TO ENSURE NO TRACKING TAKES PLACES WITHIN EVELYN DRIVE, THAT RESIDENTIAL WASTE IS TAKEN CARE OF, AND GENERAL CLEAN UP & HOUSE KEEPING ITEMS FOUND WITHIN THE CHAPTER 50 DOCUMENT ARE ADHERED TO.

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EROSION & SEDIMENT CONTROL OVERVIEW PLAN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS 100 FT.
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

LEGEND (CONT.):

- (P) PERIMETER PROTECTION
- (R) RAIN GARDEN BIO–MEDIA PROTECTION
- (L) LOT DEVELOPMENT PROTECTION

LEGEND:

- IRON PIPE (FND)
- IRON BOUND (FND)
- REBAR (FND)
- UTILITY POLE
- GUY WIRE
- (W) WELL
- BENCHMARK
- CONIFEROUS TREE
- DECIDUOUS TREE
- SF / SS — SILT FENCE / FILTREXX SILTSOXX TREE LINE

INLET CONTROL

PORTLAND STREET

FRANKLIN STREET

EVELYN DRIVE
PROPOSED TO BE PUBLIC

OPEN SPACE
AREA #1
LOT 21–53

OPEN SPACE
AREA #2
LOT 21–54

PROPOSED RAIN GARDEN #2
SEE DETAILS

PROPOSED RAIN GARDEN #1
SEE DETAILS

EMERGENCY SPILLWAY

JURISDICTIONAL WETLANDS

50' WETLAND BUFFER

8" SILT SOXX
BIO–MEDIA PROTECTION

PROPOSED
CHECK DAM
SPACED – 30'

PROPOSED
8" SILT SOX

TEMPORARY STONE
LINES SUMP

BIO–SWALE #2 (POND 21a)

PROPOSED
SILT FENCE

8" SILT SOCK
ON INLET

INLET PROTECTION

BIO–SWALE #1 (POND 22a)

28' x 75' CONSTRUCTION ENTRANCE

INLET PROTECTION

8" SILT SOXX
BIO–MEDIA PROTECTION

TEMPORARY 12" SILT SOXX
TO BE INSTALLED DURING
RIP RAP INSTALLATION
UNTIL STABILIZED CONDITIONS
ARE OBTAINED.
SILT FENCE AND SILT SOXX
TO BE REMOVED UPON STABILIZATION

RIP RAP OUTLET

TWO ROWS OF SILT SOCK
ON OUTLET, 12"

PROPOSED
8" SILT SOX

PROPOSED
SILT FENCE

50' WETLAND BUFFER

TEMPORARY 12" SILT SOXX
TO BE INSTALLED DURING
RIP RAP INSTALLATION
UNTIL STABILIZED CONDITIONS
ARE OBTAINED.
SILT FENCE AND SILT SOXX
TO BE REMOVED UPON STABILIZATION

TEMPORARY 12" SILT SOXX
TO BE INSTALLED DURING
BOX CULVERT INSTALLATION
UNDER LOW–FLOW CONDITIONS

SEE DE–WATERING PLAN

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

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EROSION & SEDIMENT CONTROL PLAN – INTERSECTION
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

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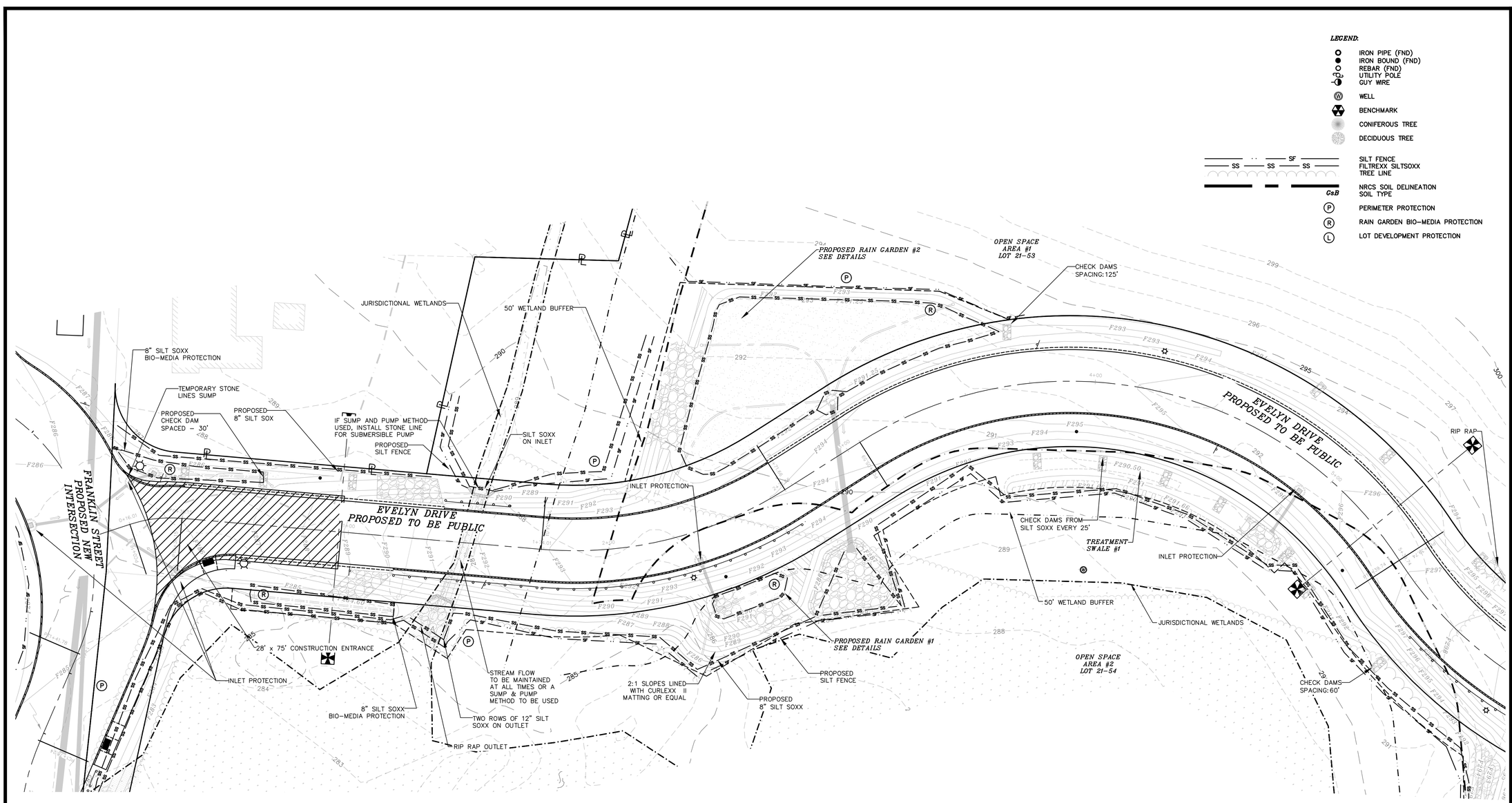

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EROSION & SEDIMENT CONTROL PLAN EVELYN DRIVE 0+00 - 5+25
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED
PROFESSIONAL ENGINEER

LEGEND:

- IRON PIPE (FND)
- IRON BOUND (FND)
- REBAR (FND)
- UTILITY POLE
- GUY WIRE
- WELL
- BENCHMARK
- CONIFEROUS TREE
- DECIDUOUS TREE
- SF — SILT FENCE
- SS — FILTREXX SILTSOXX TREE LINE
- NRCS SOIL DELINEATION
- GsB — SOIL TYPE
- (P) PERIMETER PROTECTION
- (R) RAIN GARDEN BIO-MEDIA PROTECTION
- (L) LOT DEVELOPMENT PROTECTION

RIP RAP OUTLET PROTECTION D50 = 0.5' T = 1.2'

OPEN SPACE AREA #1

INLET PROTECTION

CHECK DAMS SPACING: 33'

RIP RAP OUTLET PROTECTION D50 = 0.5' T = 1.2'

LOT 21-1

LOT 21-2

LOT 21-3

LOT 21-4

CHECK DAMS SPACING: 75'

EVELYN DRIVE
PROPOSED TO BE PUBLIC

PROPOSED RIP-RAP SEDIMENT FORE-BAY

INLET PROTECTION

PROPOSED RIP-RAP CHECK DAM / BERM

TOP OF SLOPE PROTECTION PRIOR TO CURB INSTALLATION

INLET PROTECTION

PROPOSED RAIN GARDEN #3 SEE DETAILS

PROPOSED SILT FENCE

CONTRACTOR TO INSTALL SILT SOXX AROUND THE TOE OF SLOPE TO KEEP SILT OUT OF BIO-MEDIA DURING CONSTRUCTION

RAIN GARDEN BERMS ARE TO BE CONSTRUCTED AND STABILIZED PRIOR TO THE ROUTING OF SURFACE WATER RUNOFF TO THE STRUCTURE. CONTRACTOR RESPONSIBLE FOR DIVERSION AND EROSION & SEDIMENT CONTROL DURING STABILIZATION.

2:1 SLOPES LINED WITH CURLEXX II MATTING OR EQUAL

PROPOSED 8" SILT SOXX

PROPOSED SILT FENCE

50' WETLAND BUFFER

LOT 21-52

LOT 21-51

LOT 21-50

LOT 21-49

LOT 21-48

PROPOSED 8" SILT SOXX

PROPOSED SILT FENCE

CHECK DAM SPACING BASED ON SLOPE

TYPICAL LOT DEVELOPMENT SEDIMENT PROTECTION

JURISDICTIONAL WETLANDS

PROPOSED TREELINE

OPEN SPACE AREA #2

50' WETLAND BUFFER

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

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#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

EROSION & SEDIMENT CONTROL PLAN EVELYN DRIVE 5+25 - 10+50

STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

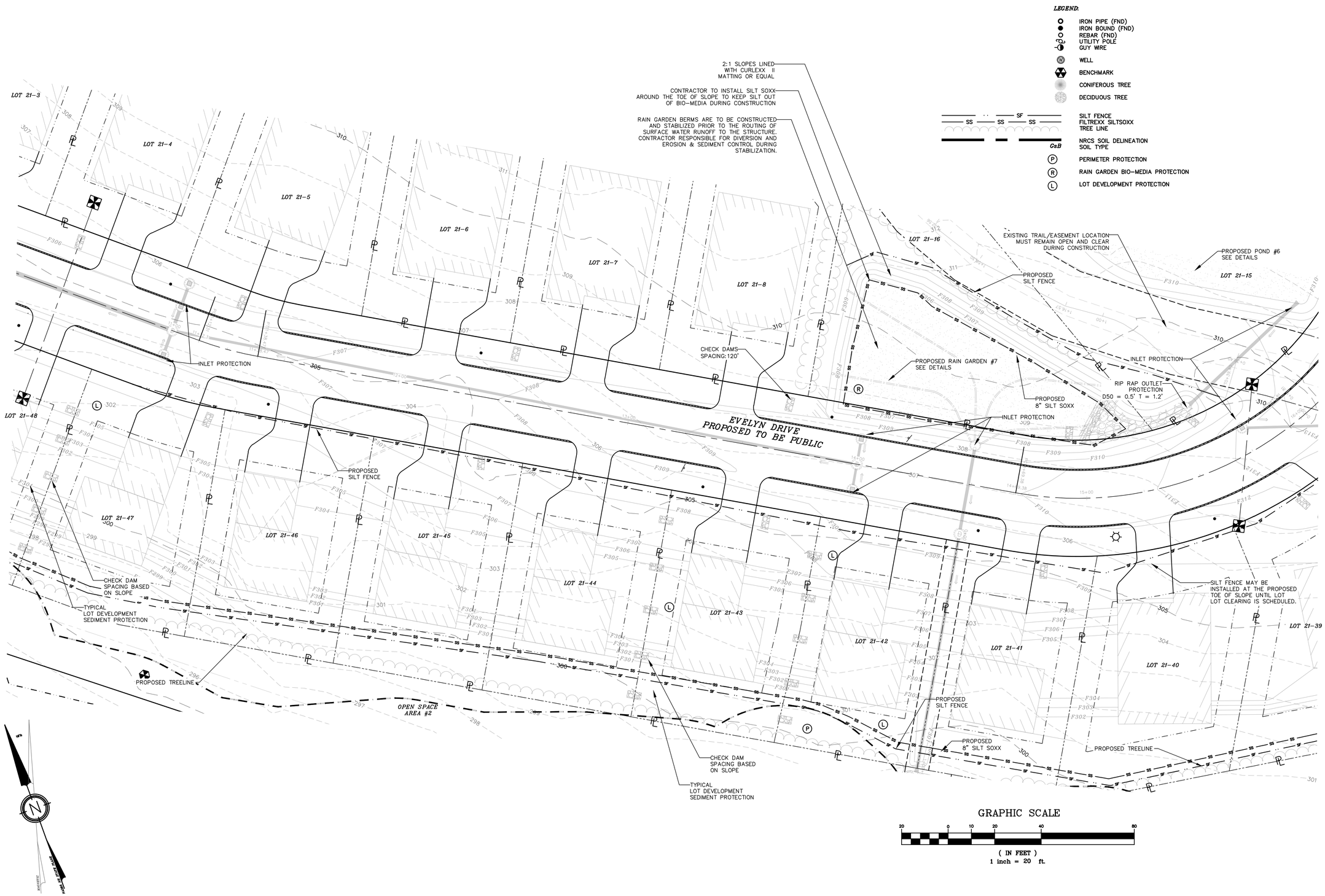
BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.

DATE : APRIL 4, 2017

FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14241
LICENSED PROFESSIONAL ENGINEER



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#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

EROSION & SEDIMENT CONTROL PLAN EVELYN DRIVE 10+50 – 15+75
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

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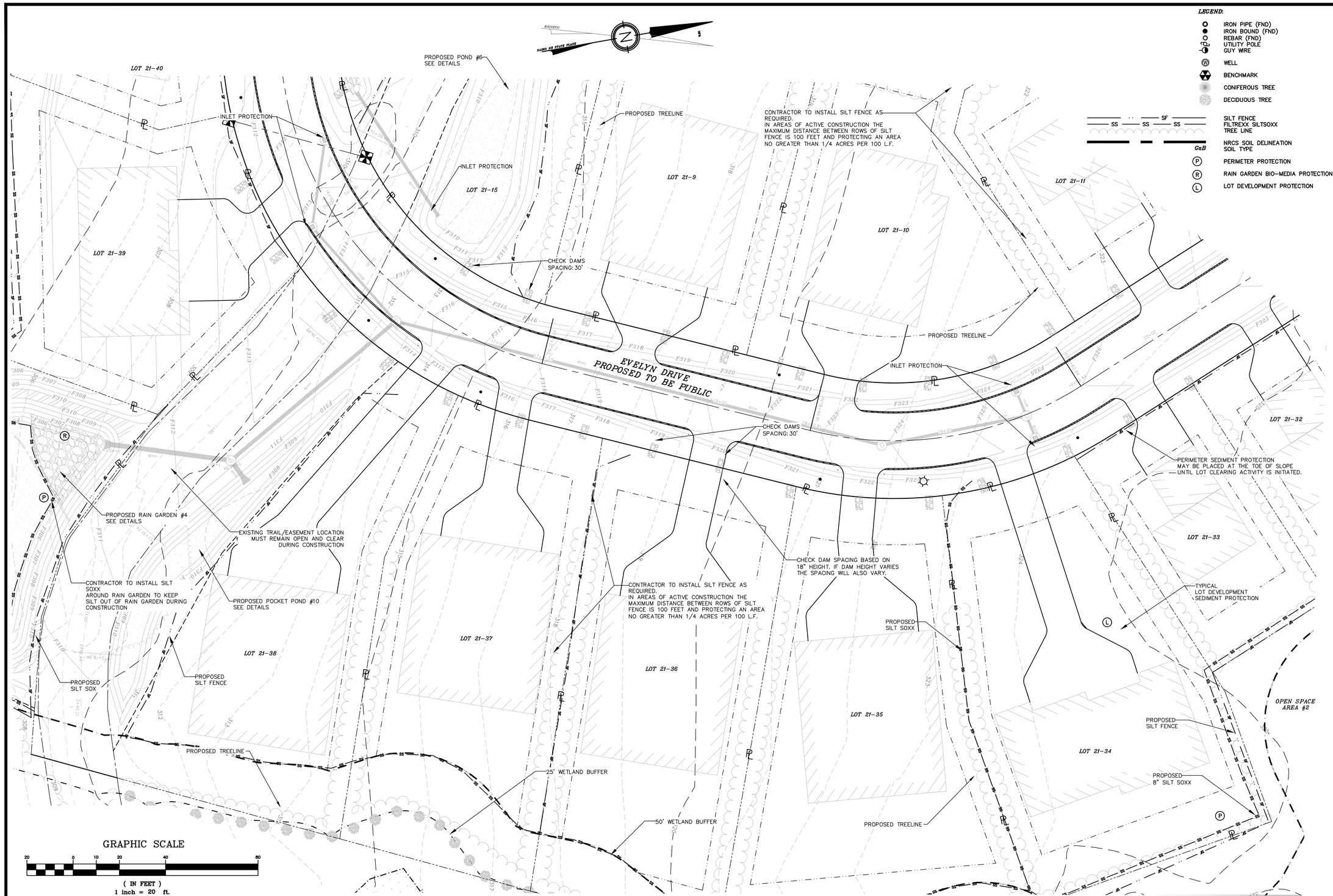
LICENSED PROFESSIONAL ENGINEER



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EROSION & SEDIMENT CONTROL PLAN EVELYN DRIVE 15+50 – 19+50
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

LOT 21-15

LOT 21-17

LOT 21-14

LOT 21-13

LOT 21-12

LOT 21-11

LOT 21-10

LOT 21-27

LOT 21-28

LOT 21-29

LOT 21-30

LOT 21-31

LOT 21-32

LOT 21-33

LOT 21-34

PROPOSED TREELINE

PROPOSED TREELINE

EVELYN DRIVE
PROPOSED TO BE PUBLIC

CHECK DAMS
SPACING: 100'

INLET PROTECTION

PROPOSED
SILT FENCE

PERIMETER SEDIMENT PROTECTION
MAY BE PLACED AT THE TOE OF SLOPE
UNTIL LOT CLEARING ACTIVITY IS INITIATED.

PROPOSED
8" SILT SOXX

PROPOSED SILT FENCE
NOTE: MAY BE SUBSTITUTED
WITH 12" SILT SOXX (TYP.)

PROPOSED TREELINE

50' WETLAND BUFFER

25' WETLAND BUFFER

OPEN SPACE
AREA #2

EDGE OF JURISDICTIONAL
WETLANDS

PROPOSED TREELINE

PROPOSED
SILT FENCE

PROPOSED
8" SILT SOXX

LEGEND:

- IRON PIPE (FND)
- IRON BOUND (FND)
- REBAR (FND)
- UTILITY POLE
- GUY WIRE
- WELL
- BENCHMARK
- CONIFEROUS TREE
- DECIDUOUS TREE
- SILT FENCE / FILTREXX SILTSOXX / TREE LINE
- NRCS SOIL DELINEATION / SOIL TYPE (GsB)
- (P) PERIMETER PROTECTION
- (R) RAIN GARDEN BIO-MEDIA PROTECTION
- (L) LOT DEVELOPMENT PROTECTION

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

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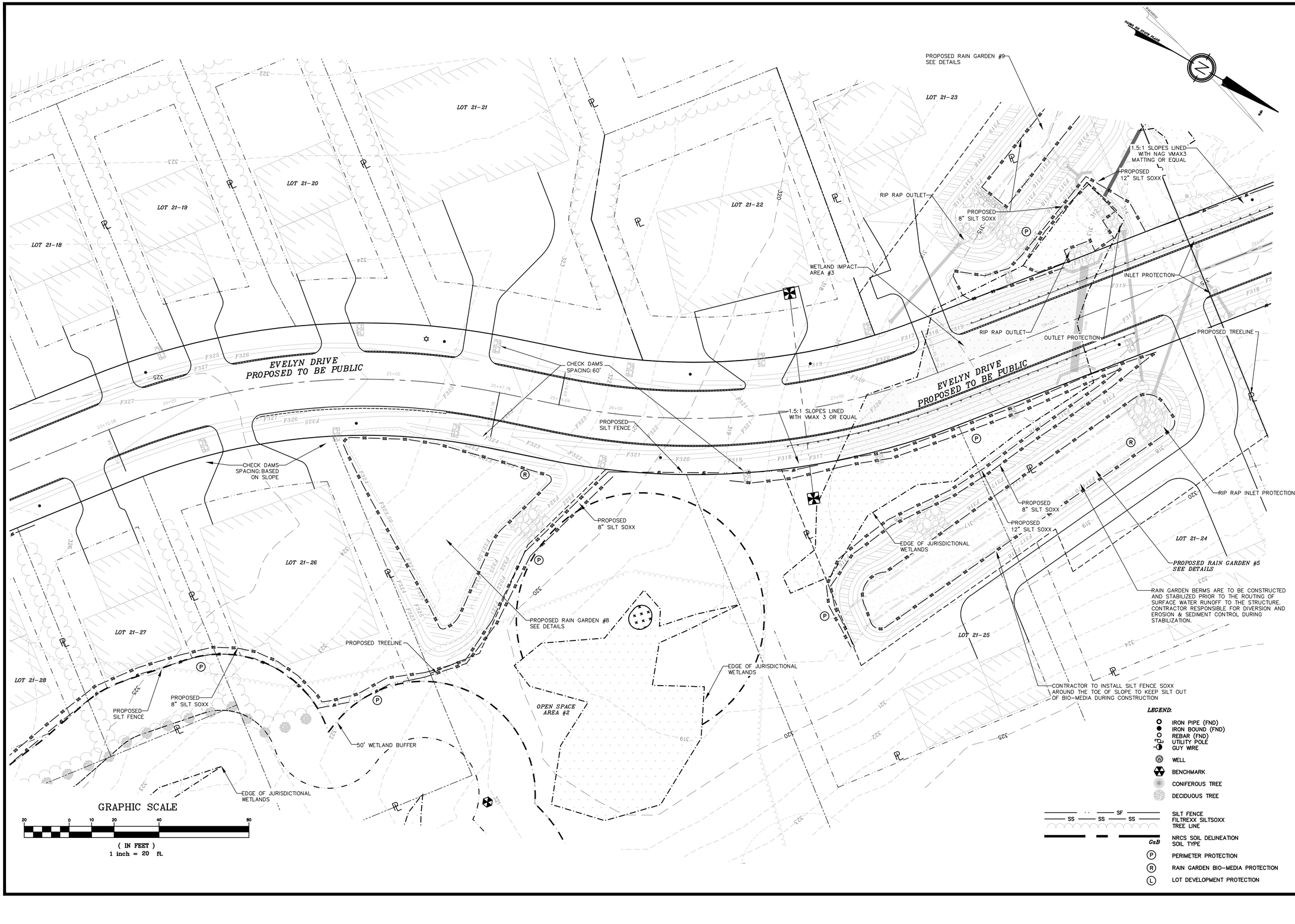
EROSION & SEDIMENT CONTROL PLAN EVELYN DRIVE 19+00 – 23+50
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



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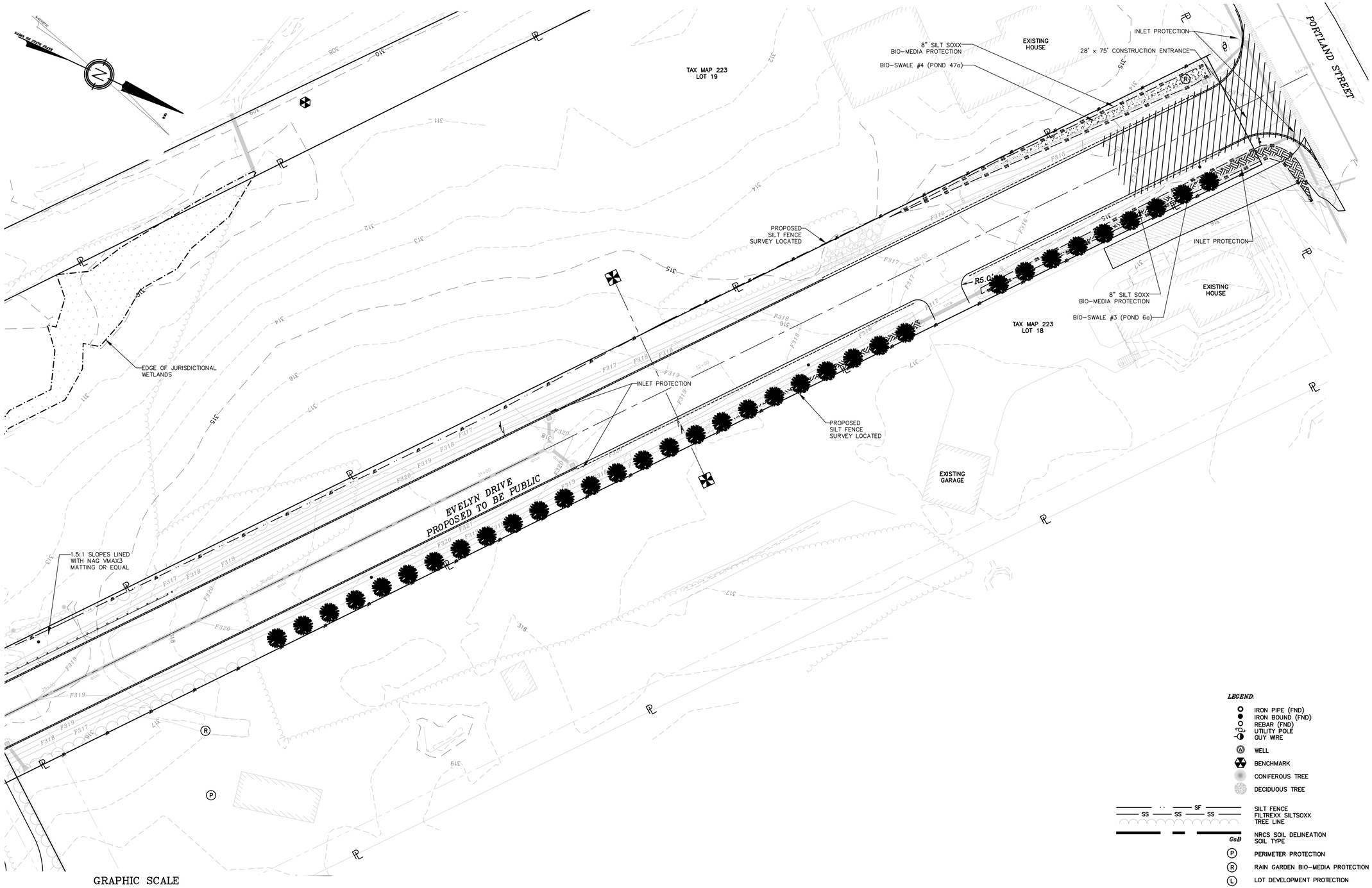
EROSION & SEDIMENT CONTROL PLAN EVELYN DRIVE 23+50 – 28+75
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



LEGEND:

- IRON PIPE (FND)
- IRON BOUND (FND)
- REBAR (FND)
- UTILITY POLE
- GUY WIRE
- WELL
- BENCHMARK
- CONIFEROUS TREE
- DECIDUOUS TREE
- SILT FENCE
- FILTREXX SILTSOXX
- TREE LINE
- NRCS SOIL DELINEATION
- SOIL TYPE (GsB)
- (P) PERIMETER PROTECTION
- (R) RAIN GARDEN BIO-MEDIA PROTECTION
- (L) LOT DEVELOPMENT PROTECTION

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EROSION & SEDIMENT CONTROL PLAN EVELYN DRIVE 28+75 – END
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

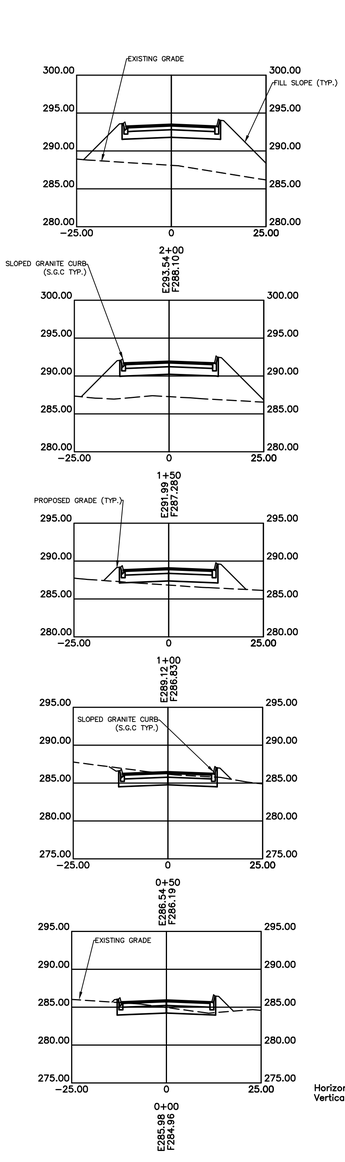
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 10'



Horizontal Scale 20
Vertical Scale 10

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SECTIONS OF EVELYN DRIVE 0+00 – 12+00
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS FT.
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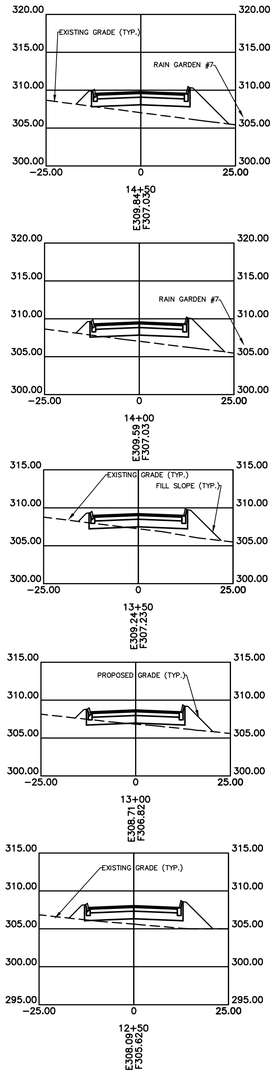
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

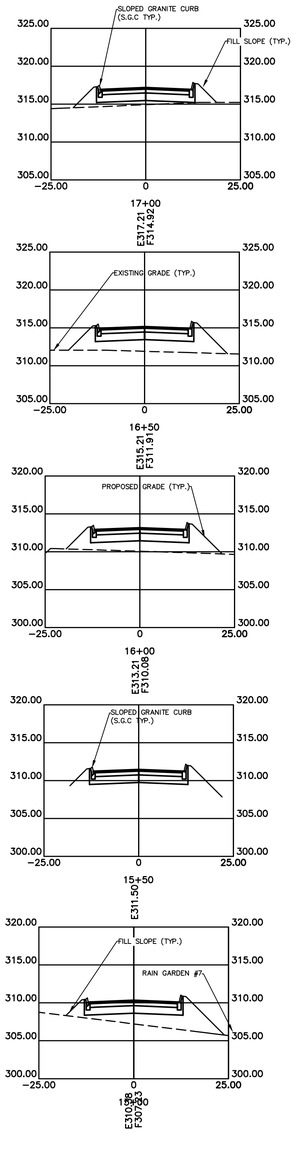
GRAPHIC SCALE

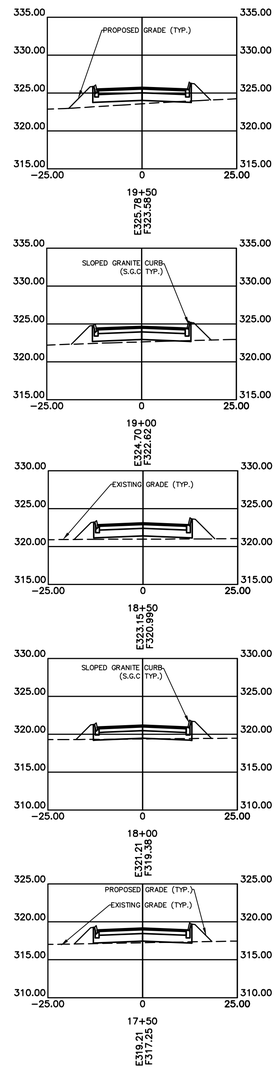
20 0 10 20 40 80

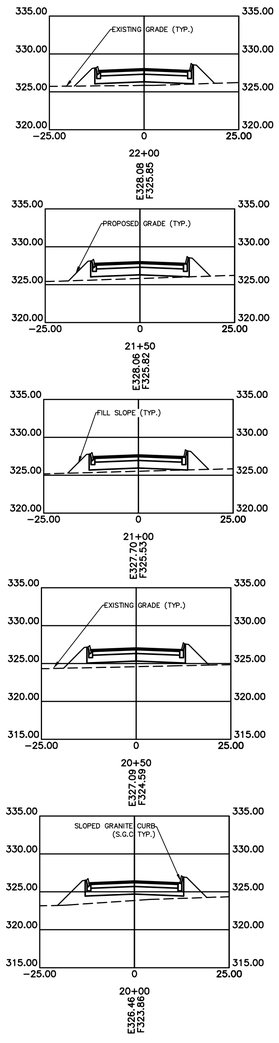
(IN FEET)
1 inch = 20 ft.

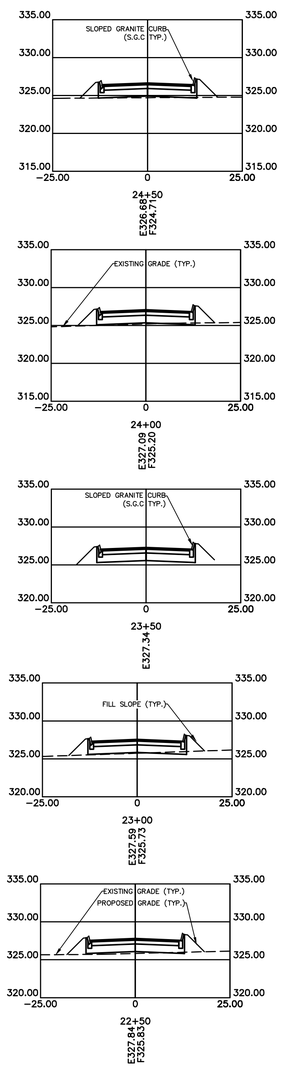
HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 10'











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SECTIONS OF EVELYN DRIVE 12+50 – 24+50
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS FT.
DATE : APRIL 4, 2017
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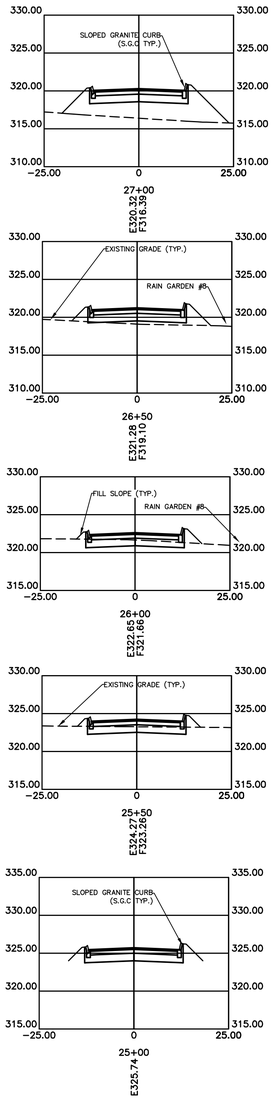
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

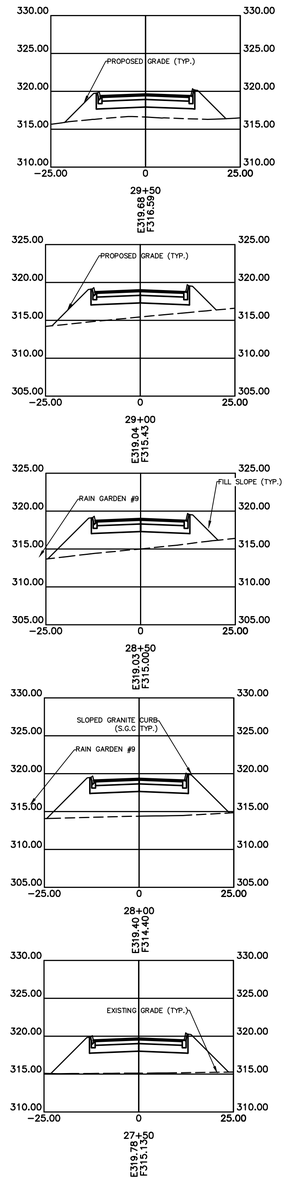
GRAPHIC SCALE

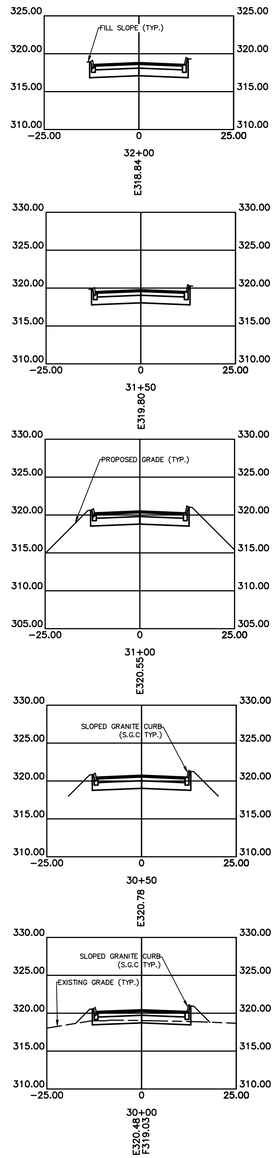
20 0 10 20 40 80

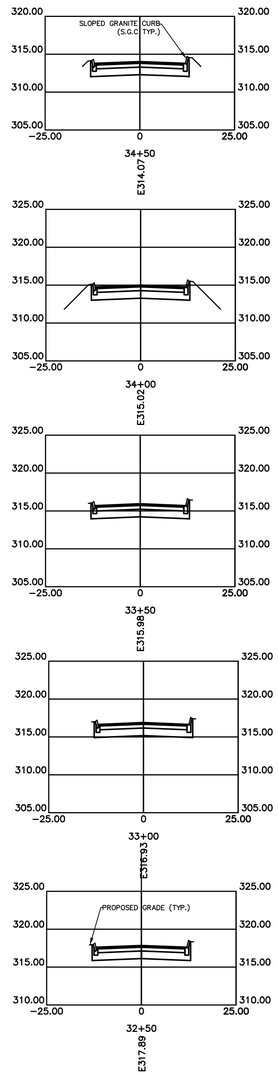
(IN FEET)
1 inch = 20 ft.

HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 10'









SECTIONS OF EVELYN DRIVE 25+00 – END
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

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BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS FT.
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STATE OF NEW HAMPSHIRE
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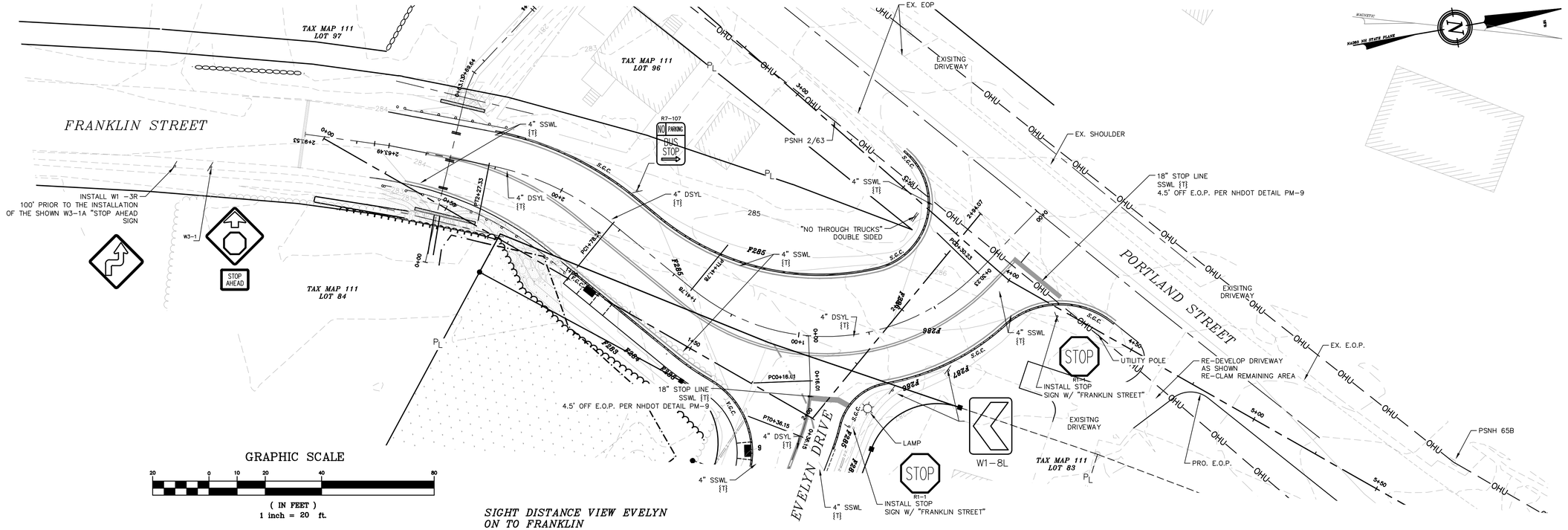
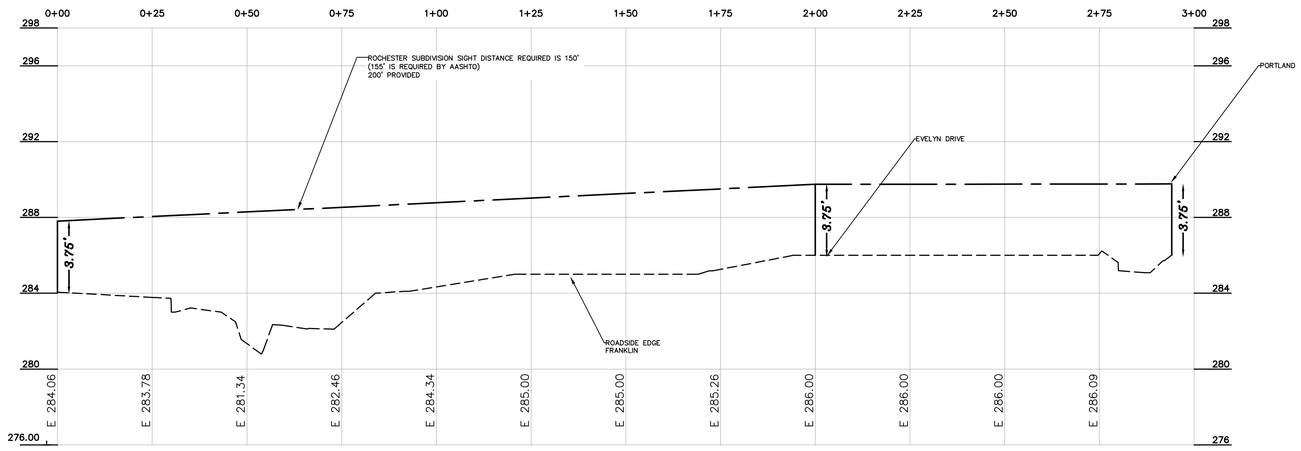
No. 14243
LICENSED PROFESSIONAL ENGINEER



PROFILE VIEW SIGHT LINE

HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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SIGHT DISTANCE PLAN EVELYN TO FRANKLIN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
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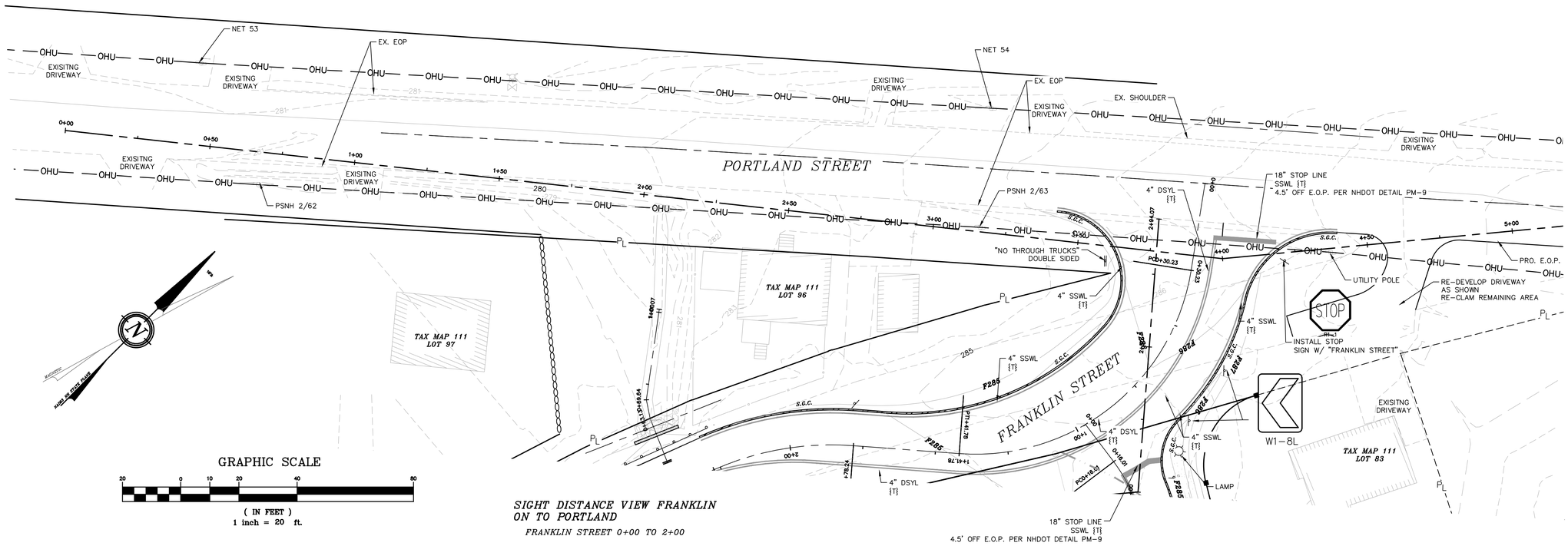
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

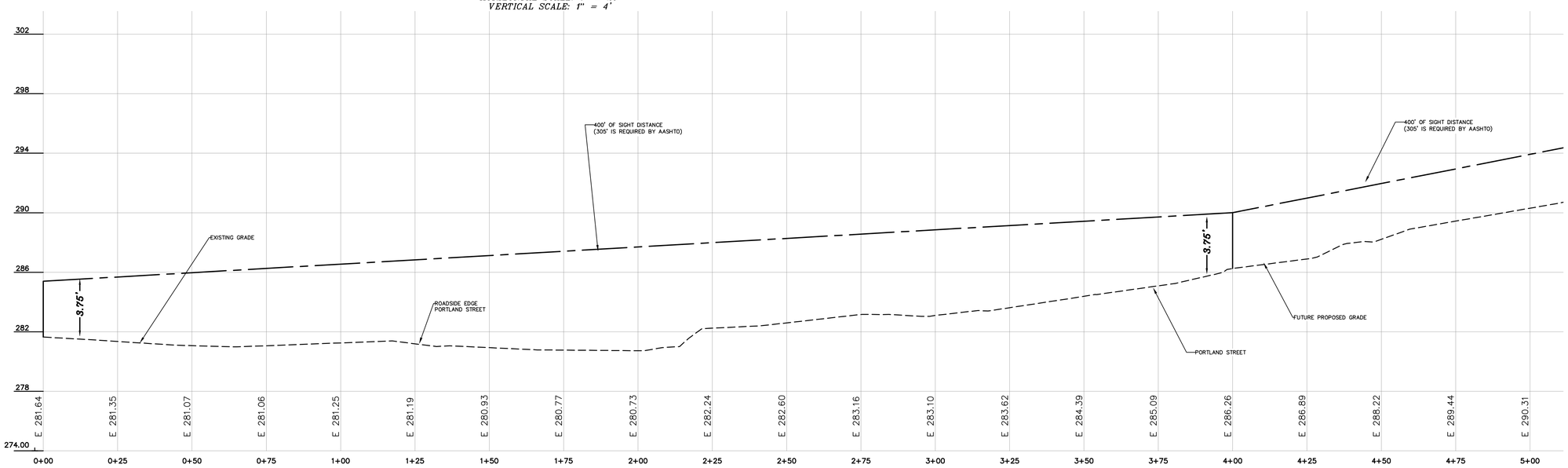


SIGHT DISTANCE VIEW FRANKLIN ON TO PORTLAND

FRANKLIN STREET 0+00 TO 2+00

PROFILE VIEW SIGHT LINE

HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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SIGHT DISTANCE PLAN FRANKLIN TO PORTLAND 0+00 – 4+00
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

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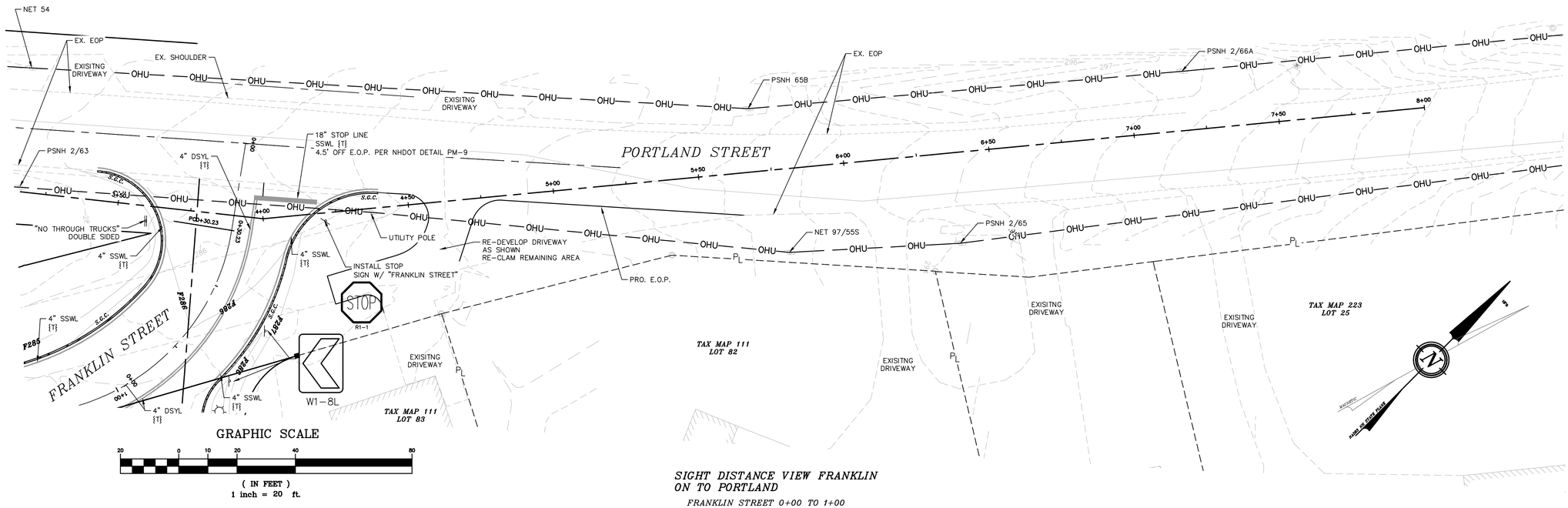
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



GRAPHIC SCALE

20 0 10 20 40 80

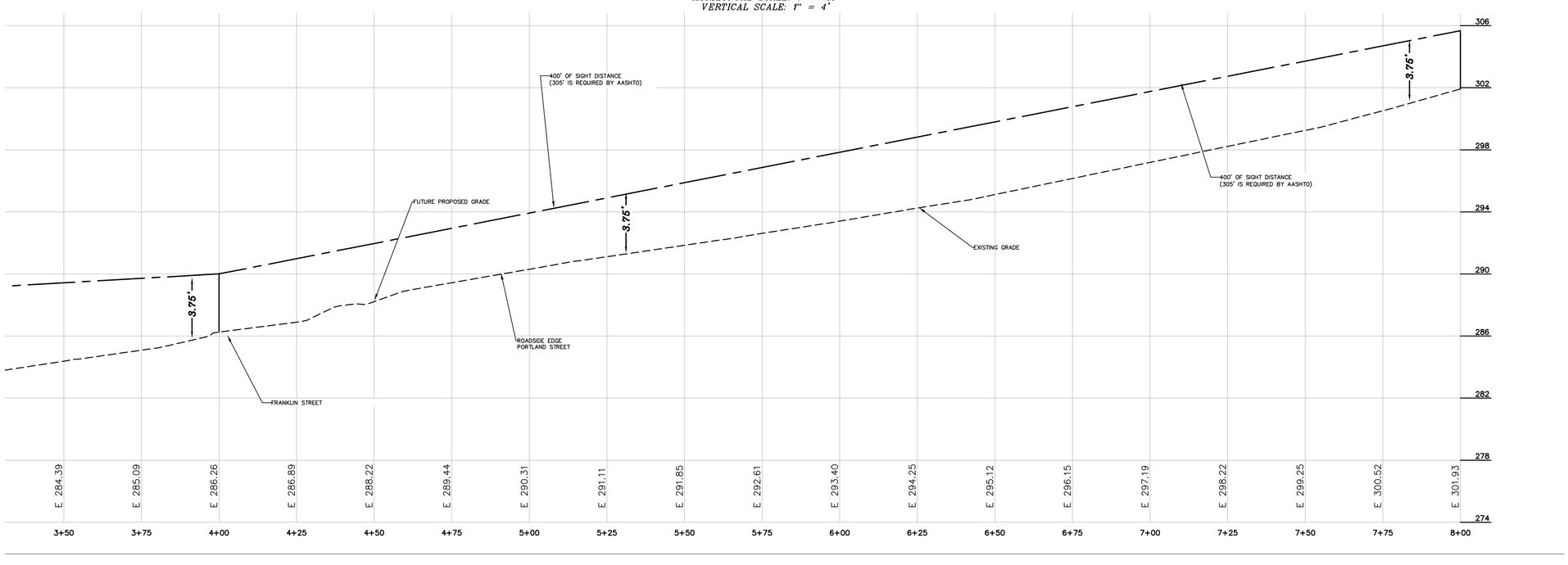
(IN FEET)
1 inch = 20 ft.

SIGHT DISTANCE VIEW FRANKLIN ON TO PORTLAND

FRANKLIN STREET 0+00 TO 1+00

PROFILE VIEW SIGHT LINE

HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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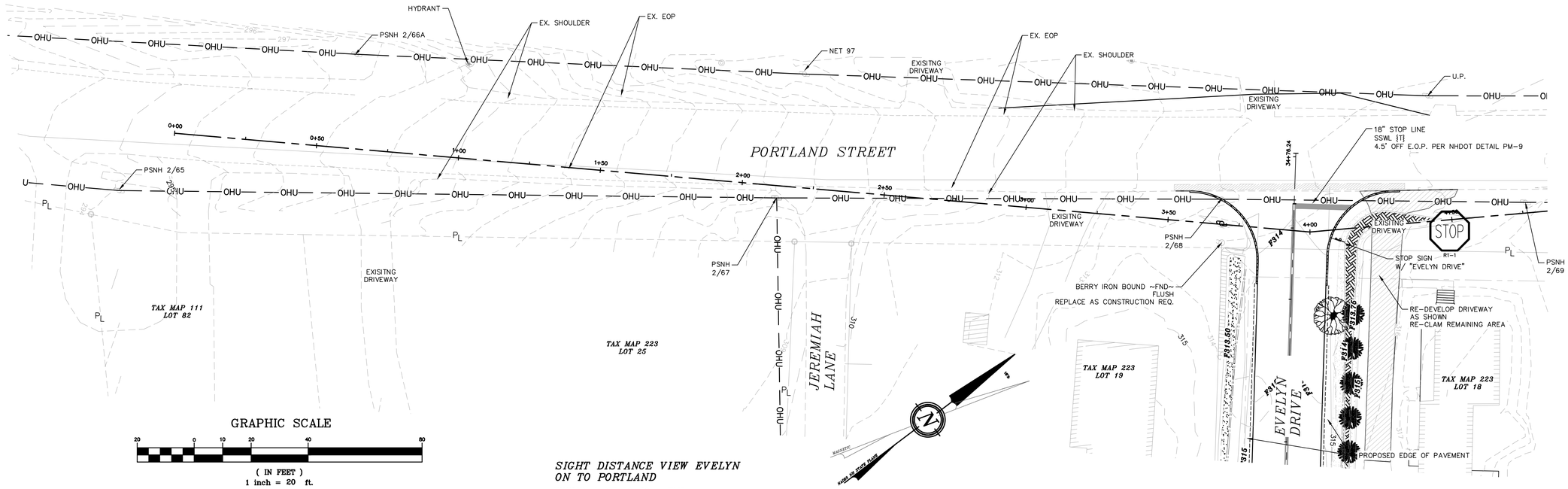
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

SIGHT DISTANCE PLAN FRANKLIN TO PORTLAND 4+00 – 8+00
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

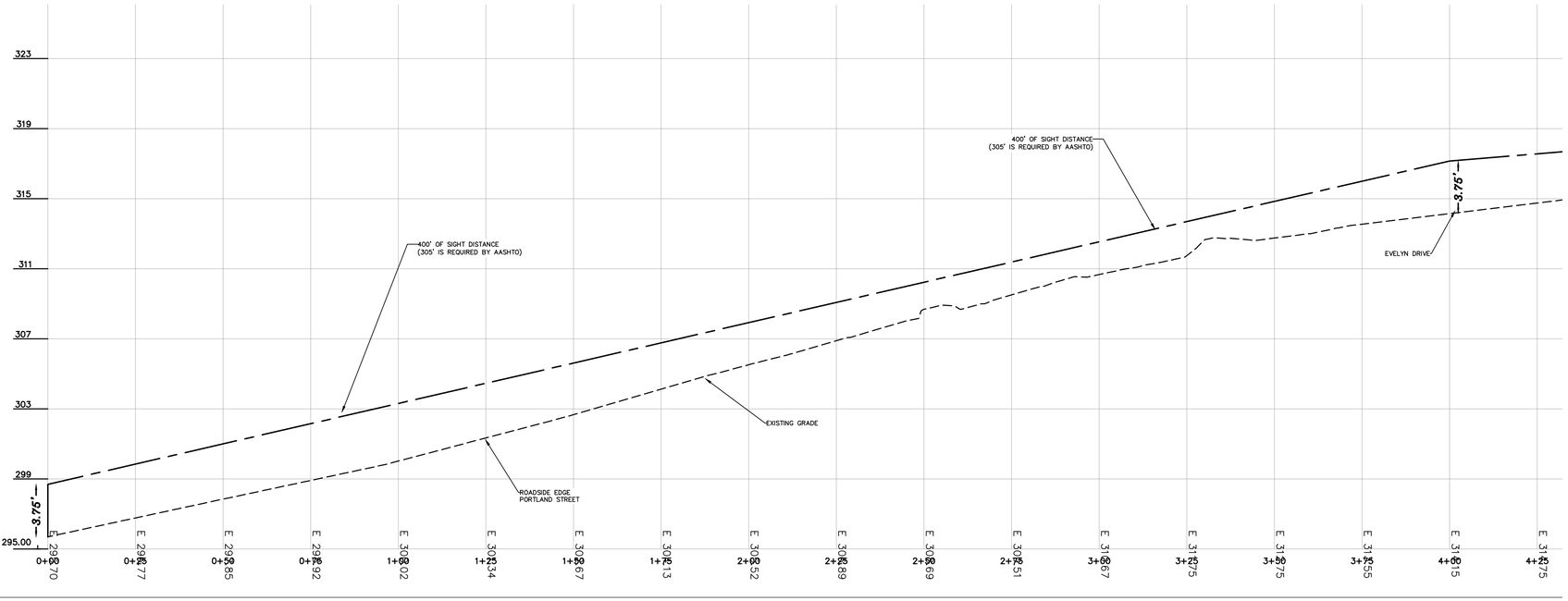


SIGHT DISTANCE VIEW EVELYN ON TO PORTLAND

EVELYN LANE 33+50 – END

PROFILE VIEW SIGHT LINE

HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



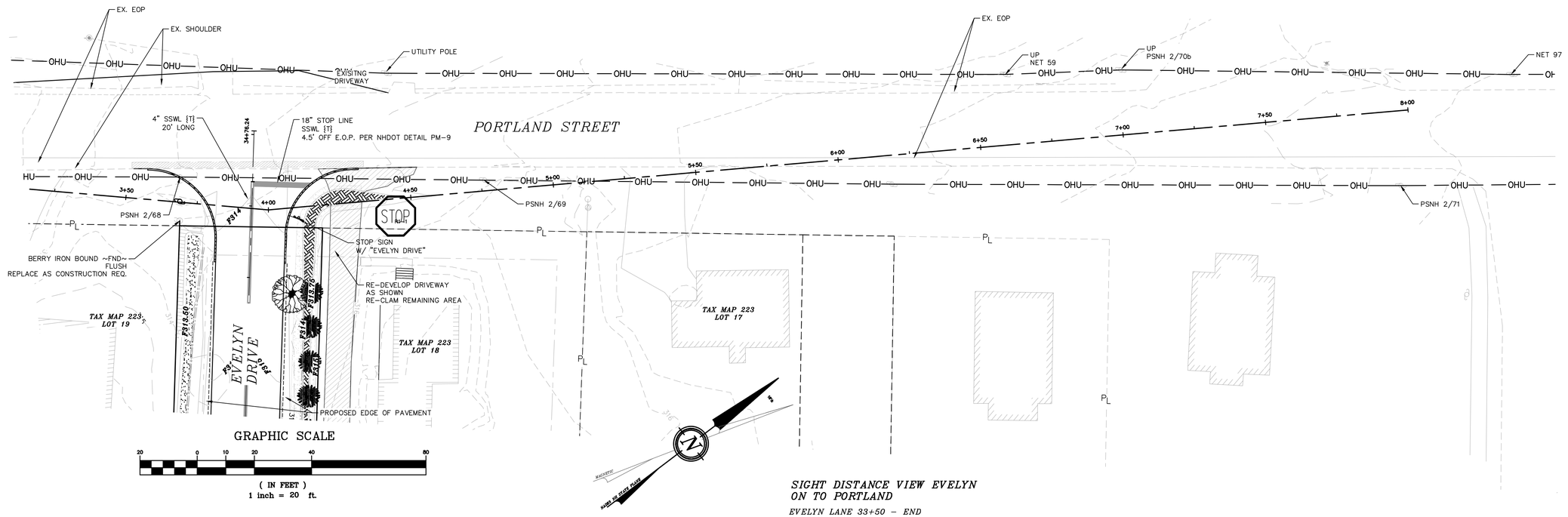
REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

SIGHT DISTANCE PLAN EVELYN TO PORTLAND 0+00 – 4+00
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

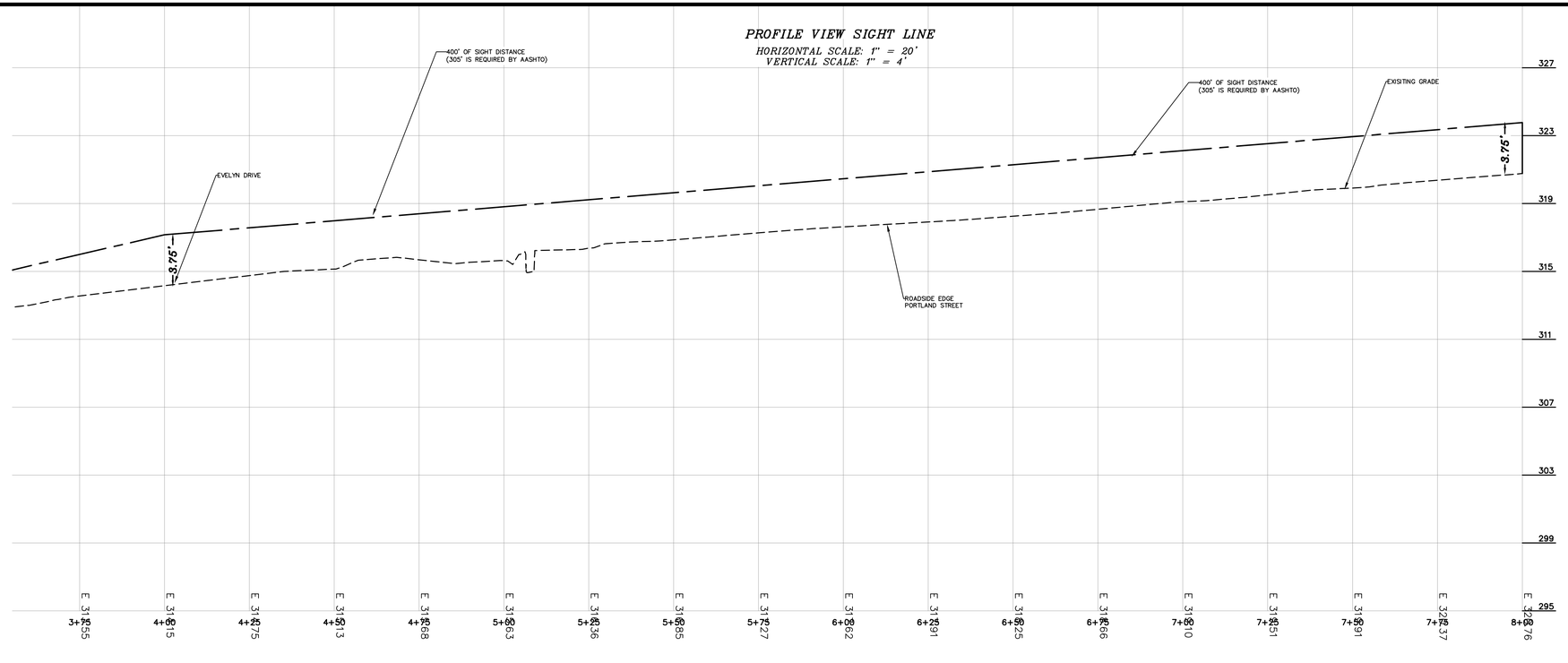
SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



SIGHT DISTANCE VIEW EVELYN ON TO PORTLAND

EVELYN LANE 33+50 – END



REVISION	DATE	DESCRIPTION
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SIGHT DISTANCE PLAN EVELYN TO PORTLAND 4+00 – 8+00
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
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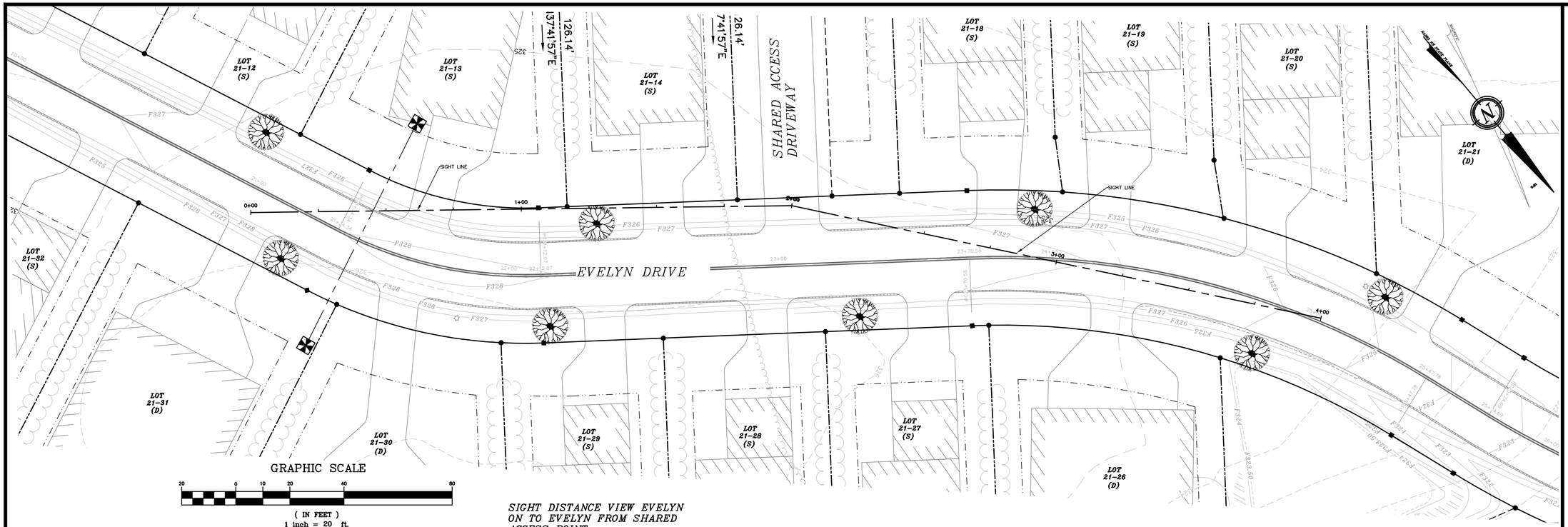
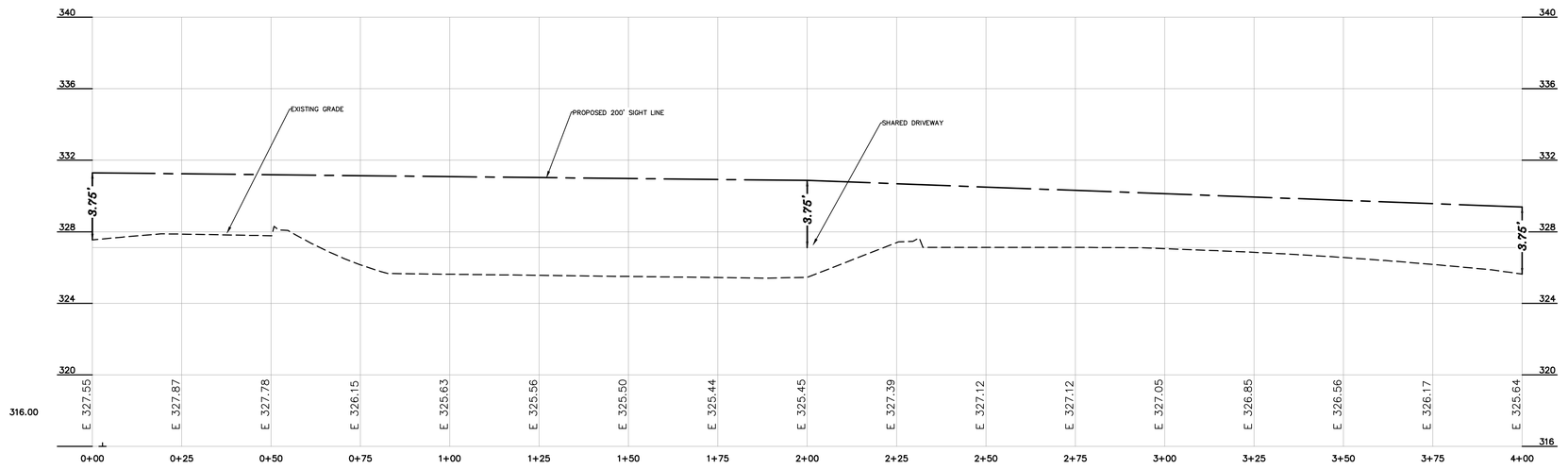
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER



SIGHT DISTANCE VIEW EVELYN ON TO EVELYN FROM SHARED ACCESS POINT

PROFILE VIEW SIGHT LINE

HORIZONTAL SCALE: 1" = 20'
VERTICAL SCALE: 1" = 4'



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SHARED DRIVEWAY ALONG EVELYN DRIVE
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
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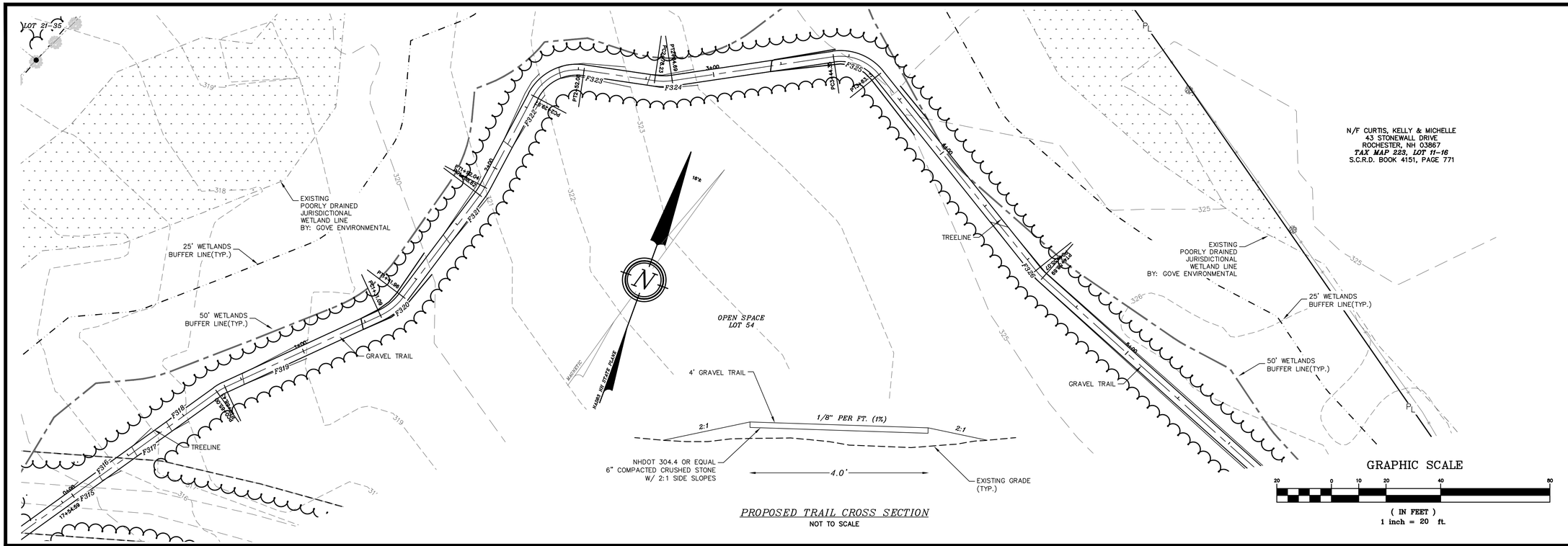
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

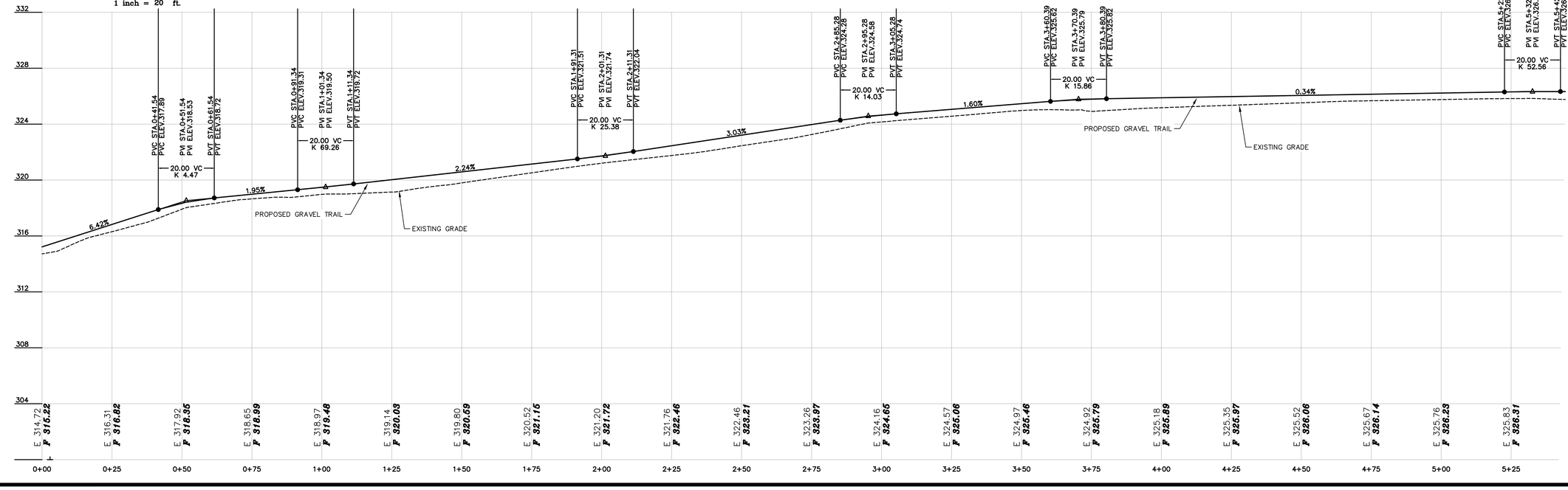


PROPOSED TRAIL CROSS SECTION
NOT TO SCALE

GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.



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TRAIL DESIGN 0+00 – 5+25
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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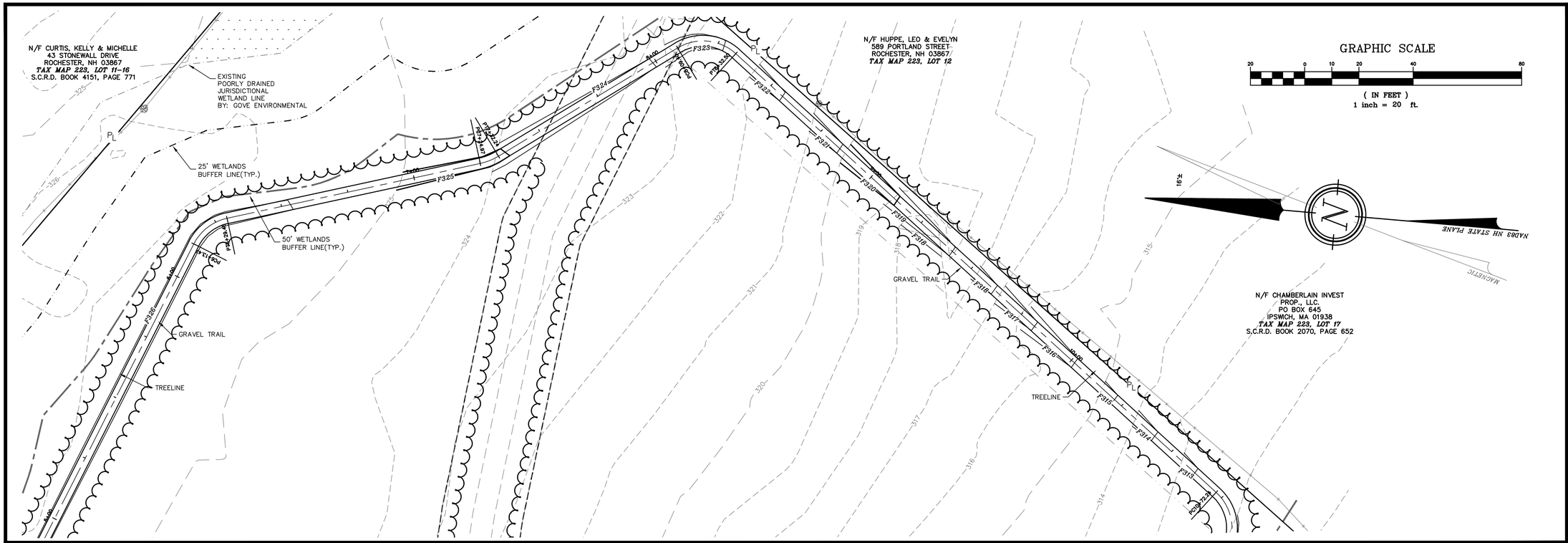
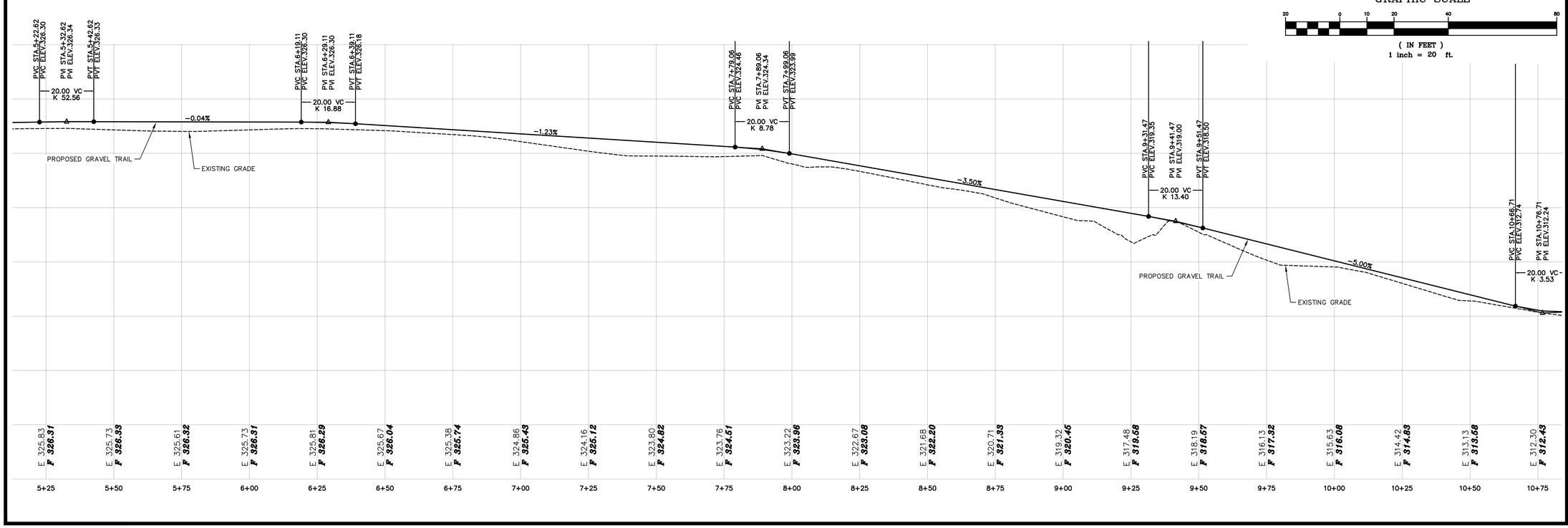
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER





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TRAIL DESIGN 5+25 – 10+75
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

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335 SECOND CROWN POINT ROAD
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STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
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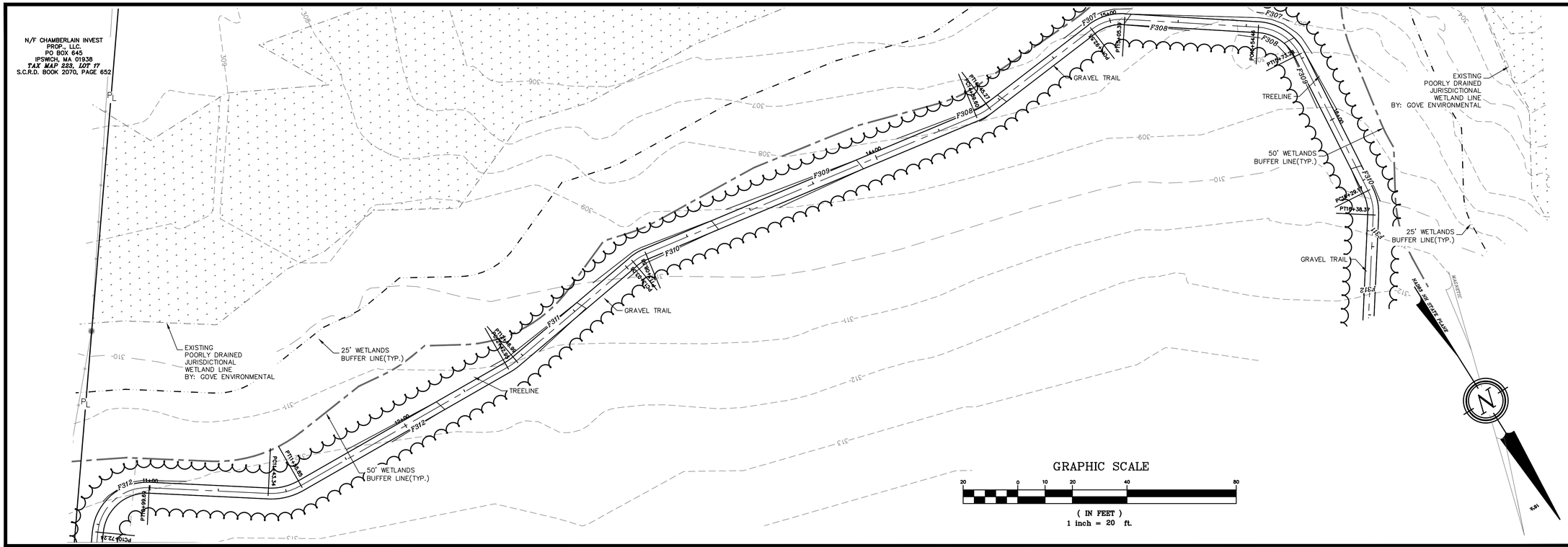

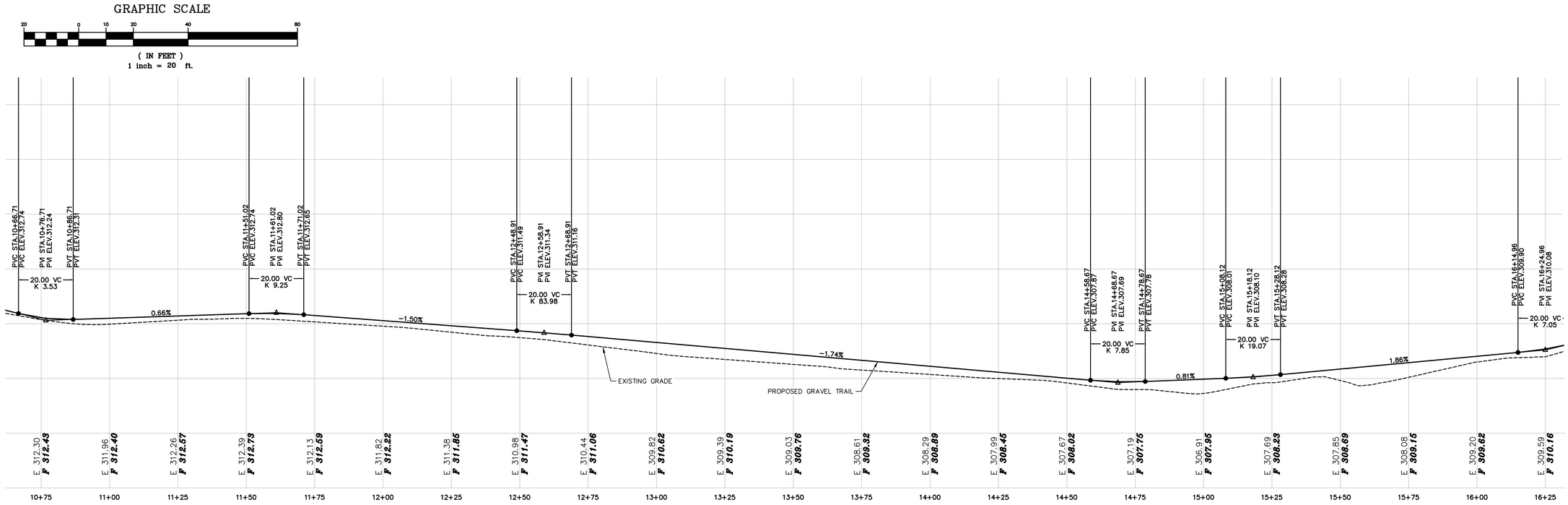

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TRAIL DESIGN 10+75 – 16+25
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
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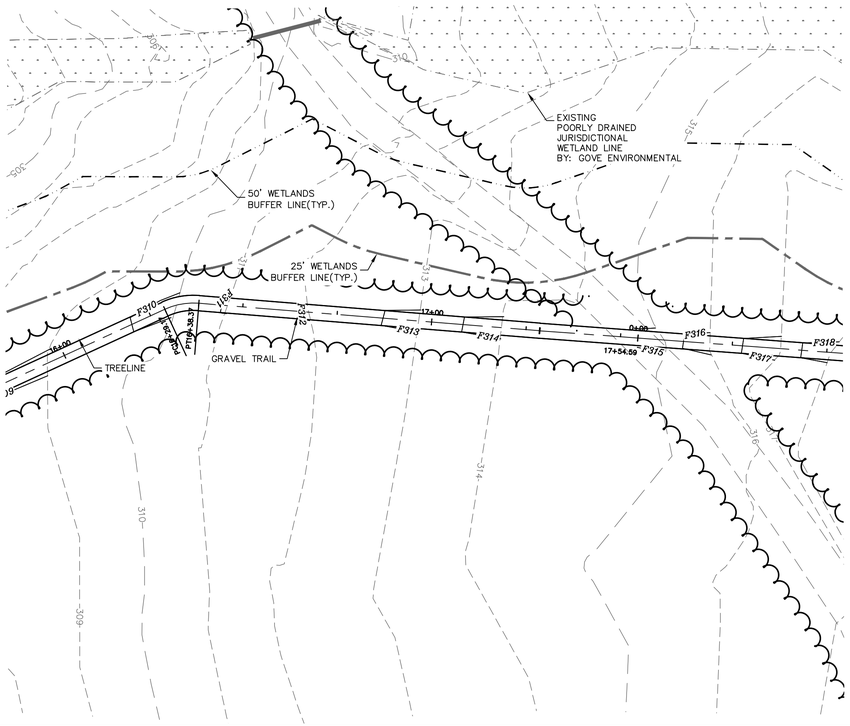
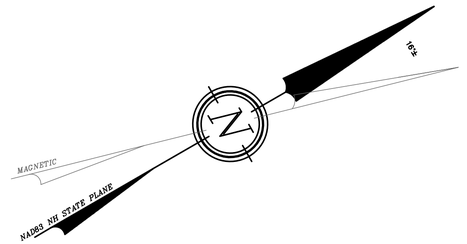
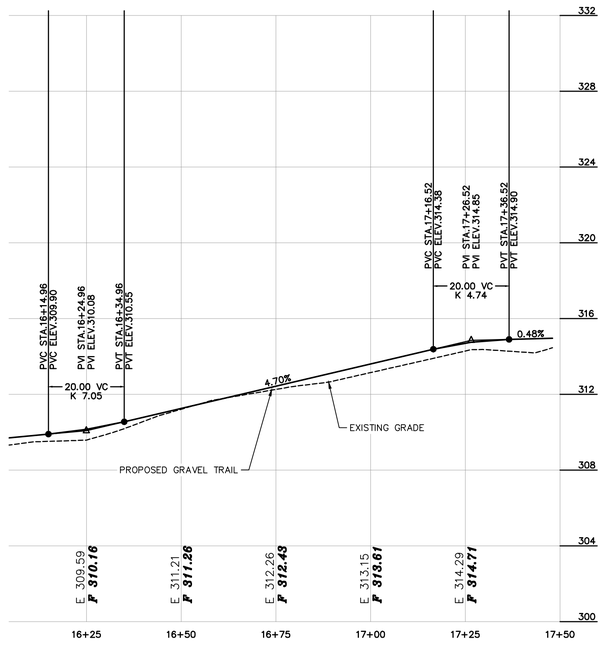




GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.



GRAPHIC SCALE

20 0 10 20 40 80

(IN FEET)
1 inch = 20 ft.

REVISION	DATE	DESCRIPTION
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TRAIL DESIGN 16+25 – END
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY & SURVEYING ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 20 FT.
DATE : APRIL 4, 2017
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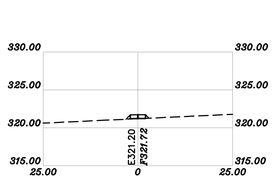
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

Horizontal Scale 1" = 20'
Vertical Scale 1" = 10'

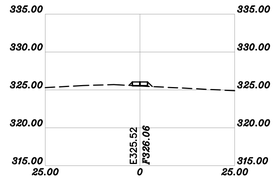
GRAPHIC SCALE

20 0 10 20 40 80

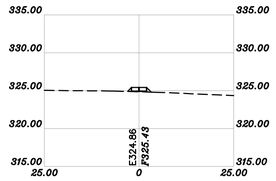
(IN FEET)
1 inch = 20 ft.



2+00



4+50



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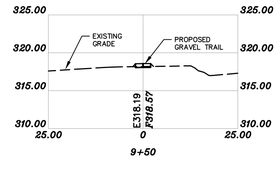
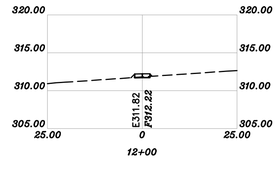
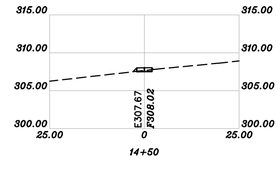


9+50



12+00



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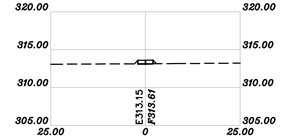
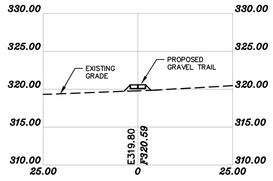
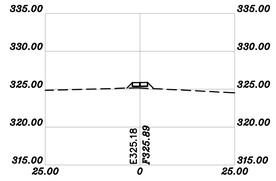


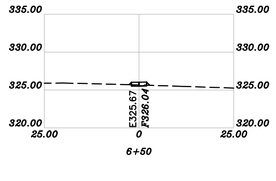
17+00



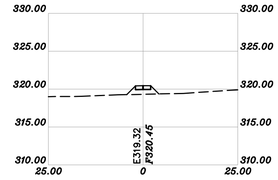
1+50



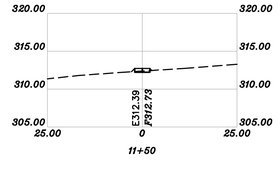
4+00



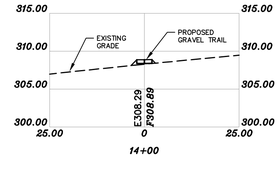
6+50



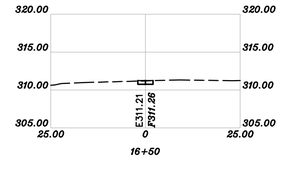
9+00



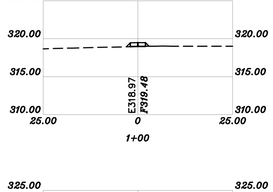
11+50



14+00



16+50



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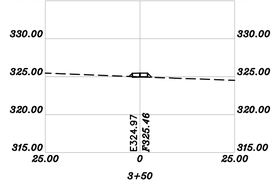
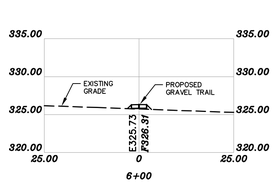


3+50



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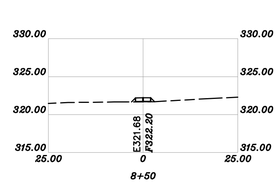
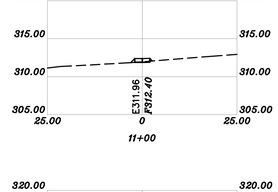
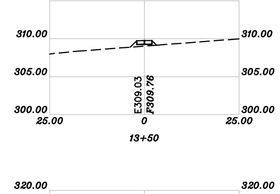


8+50



11+00



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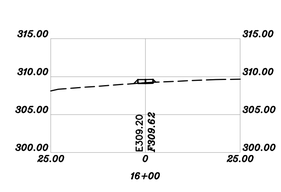
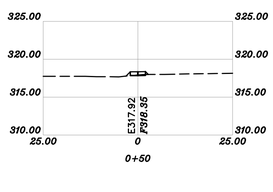


16+00



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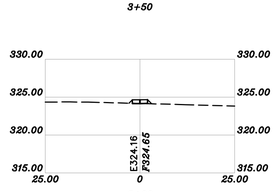
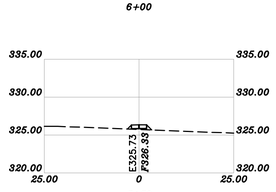


3+00



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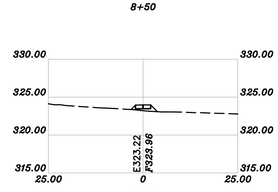

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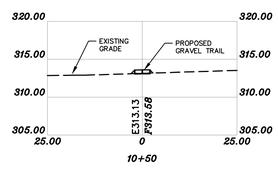

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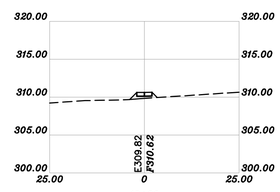

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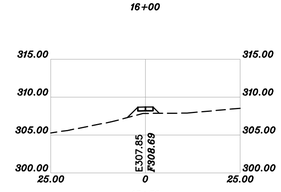

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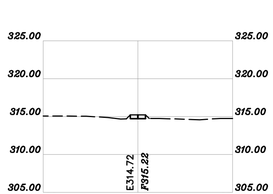

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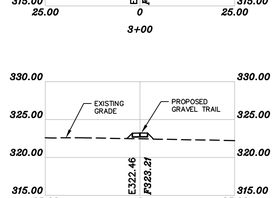

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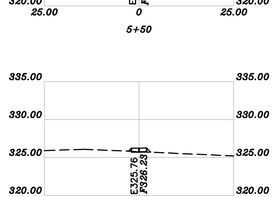

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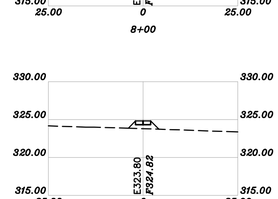

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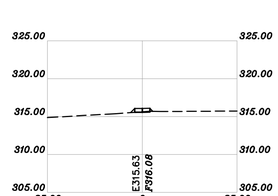

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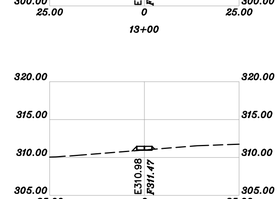

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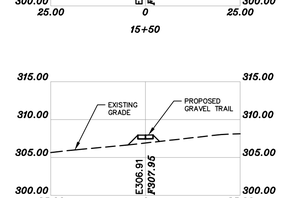


15+00

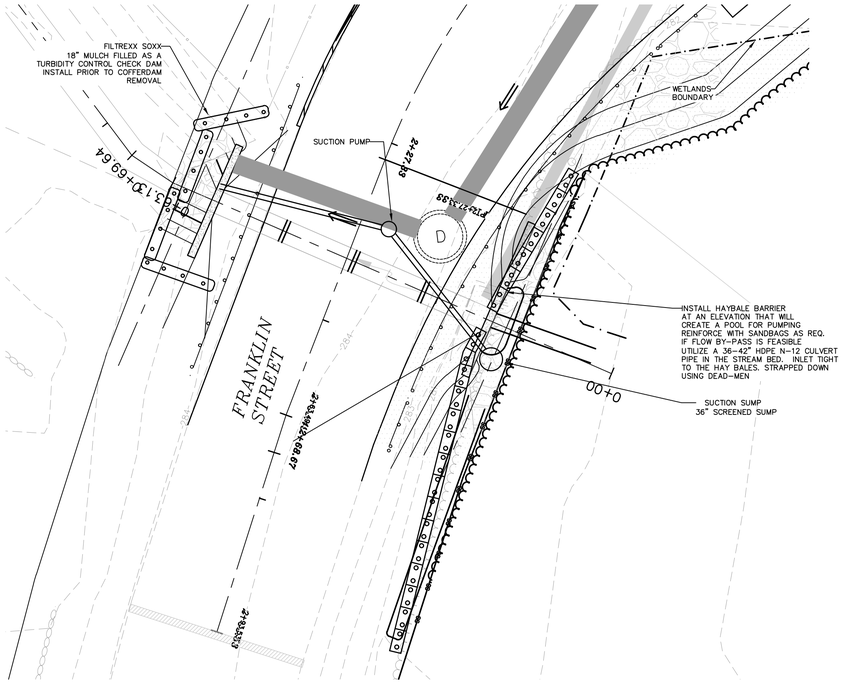
REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

TRAIL CROSS SECTIONS 0+00 – END
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

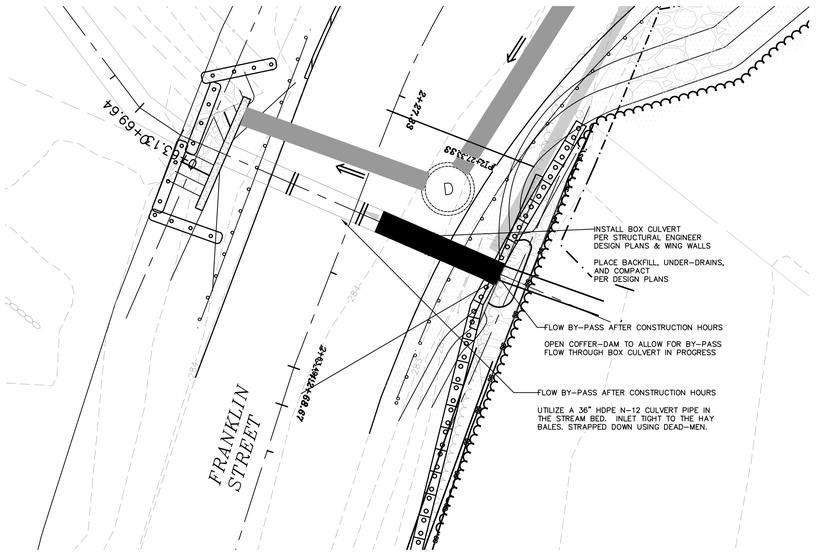
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED
PROFESSIONAL ENGINEER



GRAPHIC SCALE

20 0 5 10 20 40

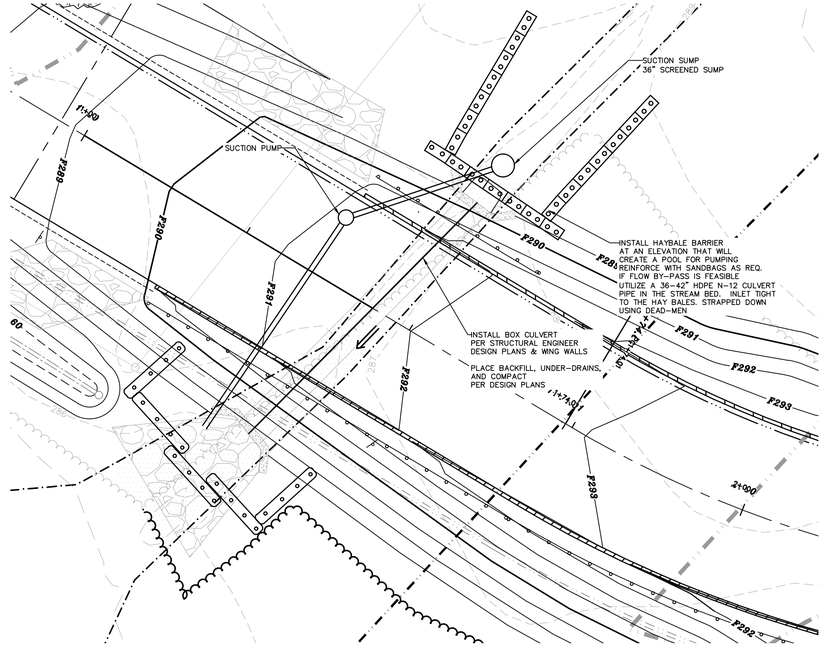
(IN FEET)
1 inch = 10 ft.



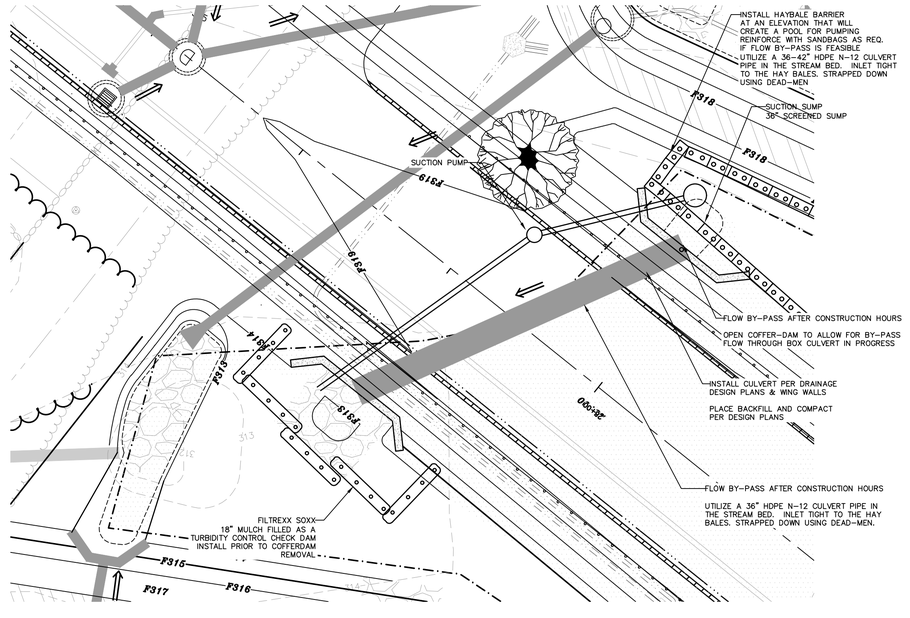
16°±

MAGNETIC

NADB3 NH STATE PLANE



PROPOSED CULVERT CROSSING 1+45



PROPOSED CULVERT CROSSING 28+13

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
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#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

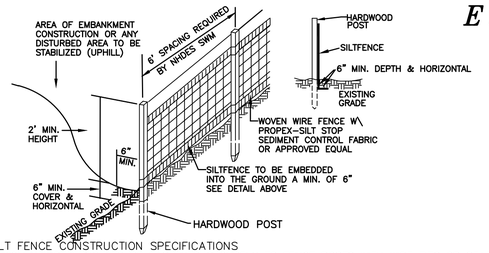
DE-WATERING DESIGN
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS 10 FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

E1



SILT FENCE CONSTRUCTION SPECIFICATIONS

1. WOVEN WIRE FENCE TO BE FASTENED SECURELY TO FENCE POSTS WITH WIRE TIES OR STAPLES AND FILTER CLOTH SHALL BE FASTENED TO WOVEN WIRE EVERY 24" AT TOP MID AND BOTTOM SECTIONS AND BE EMBEDDED INTO GROUND A MINIMUM OF 8" THE FENCE POSTS SHALL BE A MINIMUM 48" LONG, SPACED A MAXIMUM 10' APART, AND DRIVEN A MINIMUM OF 16" INTO THE GROUND
2. WHEN TWO SECTIONS OF FILTER CLOTH ADJOIN EACH OTHER, THE ENDS OF THE FABRIC SHALL BE OVERLAPPED BY SIX INCHES, FOLDED AND STAPLED TO PREVENT SEDIMENT FROM BY-PASSING
3. MAINTENANCE SHALL BE PERFORMED AS NEEDED AND SEDIMENT REMOVED WHEN "BULGES" DEVELOP IN THE SILT FENCE AND PROPERLY DISPOSED OF. SEE MAINTENANCE NOTE BELOW, REMOVAL OF SEDIMENT REQUIRED AT A DEPTH OF 6-INCHES.
4. PLACE THE ENDS OF THE SILT FENCE UP CONTOUR TO PROVIDE FOR SEDIMENT STORAGE.
5. SILT FENCES SHALL BE REMOVED WHEN NO LONGER NEEDED AND THE SEDIMENT COLLECTED SHALL BE DISPOSED AS DIRECTED BY THE ENGINEER.
6. THE AREA DISTURBED BY THE REMOVAL SHALL BE SMOOTHED AND RE-VEGETATED

SILT FENCE MAINTENANCE

1. SILT FENCES SHALL BE INSPECTED IMMEDIATELY AFTER EACH RAINFALL AND AT LEAST DAILY DURING PROLONGED RAINFALL. ANY REPAIRS THAT ARE REQUIRED SHALL BE MADE IMMEDIATELY.
2. IF THE FABRIC ON A SILT FENCE SHOULD DECOMPOSE OR BECOME INEFFECTIVE DURING THE EXPECTED LIFE OF THE FENCE, THE FABRIC SHALL BE REPLACED PROMPTLY.
3. SEDIMENT DEPOSITS SHOULD BE REMOVED WHEN THEY REACH SIX-INCHES IN DEPTH.
4. SEDIMENT DEPOSITS THAT ARE REMOVED OR LEFT IN PLACE AFTER THE FABRIC HAS BEEN REMOVED SHALL BE GRADED TO CONFORM WITH THE EXISTING TOPOGRAPHY AND VEGETATED.

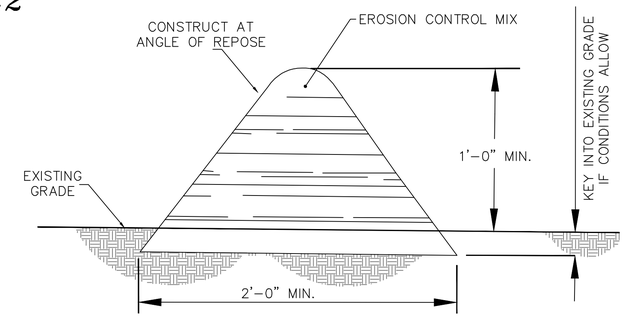
REFERENCE IS MADE TO NHDES SWM 4-2 SILT FENCE, PAGE 90

SILT FENCE DETAIL

NOT TO SCALE

E2

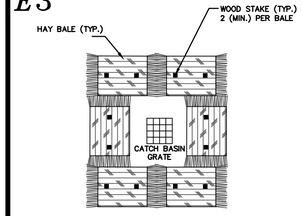
EROSION CONTROL MIX BERM



EROSION CONTROL MIX BERMS SHALL BE USED ONLY AS FOLLOWS:

(A) BERMS SHALL BE USED IN AREAS WHERE EROSION WILL OCCUR ONLY IN THE FORM OF SHEET EROSION AND THERE IS NO CONCENTRATION OF WATER IN A CHANNEL OR DRAINAGE WAY ABOVE THE BERM.
(B) THE BERMS SHALL BE INSTALLED FOLLOWING THE CONTOUR OF THE LAND AS CLOSELY AS POSSIBLE.
(C) THE BERMS SHALL BE INSTALLED ON SLOPES LESS THAN 5%.
(D) SUBJECT TO (E), BELOW, THE MIX SHALL HAVE AN ORGANIC PORTION BETWEEN 80 AND 100%, DRY WEIGHT BASIS, AND BE FIBROUS AND ELONGATED SUCH AS FROM SHREDDED BARK, STUMP GRINDINGS, COMPOSED BARK, OR EQUIVALENT MANUFACTURED PRODUCTS.
(E) WOOD AND BARK CHIPS, GROUND CONSTRUCTION DEBRIS, OR REPROCESSED WOOD PRODUCTS SHALL NOT BE USED AS ORGANIC MATERIAL.
(F) THE MIX SHALL NOT CONTAIN SILTS, CLAY, OR FINE SANDS.
(G) THE MIX SHALL HAVE A PARTICLE SIZE BY WEIGHT OF 70 TO 85% PASSING A 6-INCH SCREEN AND A MAXIMUM OF 85% PASSING THE 0.75-INCH SCREEN.
(H) THE MIX PH SHALL BE BETWEEN 5.0 AND 8.0.
(I) THE BERM SHALL BE AT LEAST 12 INCHES HIGH AND AT LEAST 2 FEET WIDE.

E3



NOTE:

BALES TO REMAIN UNTIL SUBBASE PREPARATION IS COMPLETE AND PAVING IS TO BEGIN OR UNTIL ALL UPSTREAM AREAS ARE STABILIZED WITH VEGETATION.

CONSTRUCTION SPECIFICATIONS

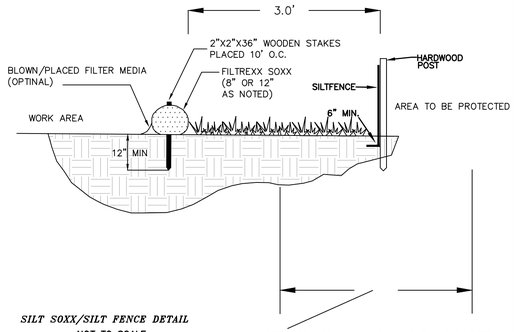
FOR STRAW OR HAY BALE BARRIERS

1. STRUCTURES SHALL BE INSTALLED ACCORDING TO THE DIMENSIONS SHOWN ON THE PLANS AT THE APPROPRIATE SPACING.
2. CONSTRUCTION OPERATIONS SHALL BE CARRIED OUT IN SUCH A MANNER SO THAT EROSION AND AIR AND WATER POLLUTION WILL BE MINIMIZED.
3. WHEN HAY BALES ARE USED, THE BALES SHALL BE EMBEDDED AT LEAST 4 INCHES INTO THE SOIL. WHEN TIMBER STRUCTURES ARE USED, THE TIMBER SHALL EXTEND AT LEAST 18 INCHES INTO THE SOIL.
4. HAY OR STRAW BALES SHALL BE ANCHORED INTO THE SOIL USING 2" X 2" STAKES DRIVEN THROUGH THE BALES AND AT LEAST 18 INCHES INTO THE SOIL.
5. SEEDING, FERTILIZING, AND MULCHING SHALL CONFORM TO THE RECOMMENDATIONS IN THE APPROPRIATE VEGETATIVE BMP.
6. STRUCTURES SHALL BE REMOVED FROM THE CHANNEL WHEN THEIR USEFUL LIFE HAS BEEN COMPLETED.

SEDIMENT CONTROL AT CATCH BASINS

NOT TO SCALE

E4



SILT SOXX/SILT FENCE DETAIL

NOT TO SCALE

NOTE: FOR AREAS REQUIRING DOUBLE PERIMETER CONTROL WITHIN 50' OF JURISDICTIONAL WETLANDS AND NOT FOR ALL SILT SOXX APPLICATIONS. THIS DUPLICATION MAY BE SPECIFIED AS 12" SILT SOXX.

REVISION	DATE	DESCRIPTION
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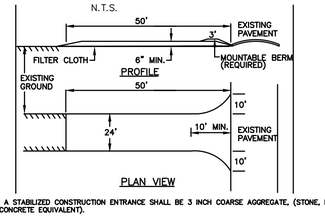
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

E5

STABILIZED CONSTRUCTION ENTRANCE

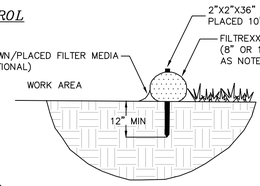


1. STONE FOR A STABILIZED CONSTRUCTION ENTRANCE SHALL BE 3 INCH COARSE AGGREGATE, (STONE, RECLAIMED STONE, OR RECYCLED CONCRETE EQUIVALENT).
2. THE LENGTH OF THE STABILIZED ENTRANCE SHALL NOT BE LESS THAN 50 FEET, WITH A DIVERSION RIDGE OR 75 FEET WITHOUT, EXCEPT FOR A SINGLE RESIDENTIAL LOT WHERE A 30 FOOT MINIMUM LENGTH WOULD APPLY.
3. THE THICKNESS OF THE STONE FOR THE STABILIZED ENTRANCE SHALL NOT BE LESS THAN 6 INCHES.
4. THE WIDTH OF THE ENTRANCE SHALL NOT BE LESS THAN THE FULL WIDTH OF THE ENTRANCE WHERE INGRESS OR EGRESS OCCURS OR 10 FEET, WHICH EVER IS GREATER.
5. GEOTEXTILE FILTER CLOTH SHALL BE PLACED OVER THE ENTIRE AREA PRIOR TO PLACING THE STONE. FILTER CLOTH IS NOT REQUIRED FOR A SINGLE FAMILY RESIDENCE LOT.
6. ALL SURFACE WATER THAT IS FLOWING TO OR DIVERTED TOWARD THE CONSTRUCTION ENTRANCE SHALL BE PIPED BENEATH THE ENTRANCE. IF PIPING IS IMPRACTICAL, A BERM WITH 5:1 SLOPES THAT CAN BE CROSSED BY VEHICLES MAY BE SUBSTITUTED FOR THE PIPE.
7. THE ENTRANCE SHALL BE MAINTAINED IN A CONDITION THAT WILL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO PUBLIC RIGHTS-OF-WAY. THIS MAY REQUIRE PERIODIC TOP DRESSING WITH ADDITIONAL STONE AS CONDITIONS DEMAND AND REPAIR AND/OR CLEAN OUT OF ANY MEASURES USED TO TRAP SEDIMENT. ALL SEDIMENT SPILLED, WASHED, OR TRACKED ONTO PUBLIC RIGHT-OF-WAY MUST BE REMOVED PROMPTLY.
8. REFERENCE IS MADE TO NHDES SWM VOL. 3, 4-2 TEMPORARY CONSTRUCTION EXIT, PAGE 124.

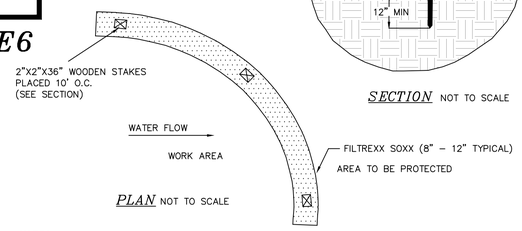
E6

FILTREXX SEDIMENT CONTROL

NOT TO SCALE



SECTION NOT TO SCALE

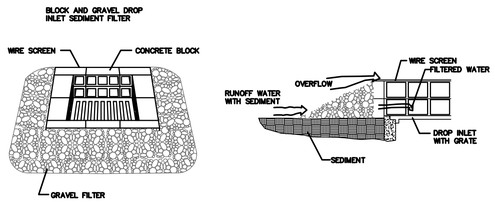


PLAN NOT TO SCALE

NOTES

1. ALL MATERIAL TO MEET FILTREXX SPECIFICATIONS.
2. FILTER MEDIA FILL TO MEET APPLICATION REQUIRMENTS.
3. COMPOST MATERIAL TO BE DISPERSED ON SITE, AS DETERMINED BY ENGINEER.
4. SILTSOXX MAY BE USED IN PLACE OF SILT FENCE OR OTHER SEDIMENT BARRIERS.
5. SILTSOXX COMPOST/SOIL/ROCK/SEED FILL MATERIAL SHALL BE ADJUSTED AS NECESSARY TO MEET THE REQUIRMENTS OF THE SPECIFIC APPLICATION.
6 FILTREXX SOXX IS A REGISTERED TRADEMARK OF FILTREXX INTERNATIONAL, LLC.
7. SILT FENCE IS NOT A SUBSTITUTION FOR SILT SOXX AND ANY EQUAL SUBSTITUTION TO BE APPROVED.

Filtrexx International, LLC
35481 Grafton Eastern Rd | Grafton, Oh 44044
440-926-2607 | fax: 440-926-4021
WWW.FILTREXX.COM
OR APPROVED EQUAL



MAINTENANCE

ALL STRUCTURES SHOULD BE INSPECTED AFTER EVERY RAIN STORM AND REPAIRS MADE AS NECESSARY. SEDIMENT SHOULD BE REMOVED FROM TRAPPING DEVICES AFTER THE SEDIMENT HAS REACHED A MAXIMUM OF ONE HALF THE DEPTH OF THE TRAP. THE SEDIMENT SHOULD BE DISPOSED OF IN A SUITABLE AREA AND PROTECTED FROM EROSION BY EITHER STRUCTURE OR VEGETATIVE MEANS. THE TEMPORARY TRAPS SHOULD BE REMOVED AND THE AREA REPAIRED AS SOON AS THE CONTRIBUTING DRAINAGE AREA TO THE INLET HAS BEEN COMPLETELY STABILIZED.

BLOCK & GRAVEL DROP INLET SEDIMENT FILTER

NOT TO SCALE

E7

E8

TEMPORARY EROSION CONTROL MEASURES

1. THE SMALLEST PRACTICAL AREA OF LAND SHALL BE EXPOSED AT ANY ONE TIME.
2. EROSION, SEDIMENT AND DETENTION MEASURES SHALL BE INSTALLED AS SHOWN ON THE PLANS AND AT LOCATIONS AS REQUIRED, DIRECTED BY THE ENGINEER.
3. ALL DISTURBED AREAS SHALL BE RETURNED TO ORIGINAL GRADES AND ELEVATIONS. DISTURBED AREAS SHALL BE LOAMED WITH A MINIMUM OF 4" OF LOAM AND SEEDED WITH NOT LESS THAN ONE POUND OF SEED PER 50 SQUARE YARDS OF AREA. (SEE SEED SPECIFICATIONS THIS SHEET)
4. ALL DISTURBED AREAS WILL BE RESTABILIZED WITHIN 45 DAYS. AT ANY ONE TIME, NO MORE THAN 5 ACRES, (217,800 Sq. Ft.) WILL BE DISTURBED.
5. SILT FENCES AND PERIMETER BARRIERS SHALL BE INSPECTED PERIODICALLY AND AFTER EVERY RAIN DURING THE LIFE OF THE PROJECT. ALL DAMAGED AREAS SHALL BE REPAIRED, SEDIMENT DEPOSITS SHALL PERIODICALLY BE REMOVED AND DISPOSED OF.
6. AFTER ALL DISTURBED AREAS HAVE BEEN STABILIZED, THE TEMPORARY EROSION CONTROL MEASURES ARE TO BE REMOVED AND THE AREA DISTURBED BY THE REMOVAL SMOOTHED AND RE-VEGETATED.
7. PER THE EPA CGP REQUIREMENTS THERE WILL BE REPORTS OF THE EROSION CONTROL INSPECTIONS IAW SWPPP PREPARED BY BS&E. ALL EROSION CONTROLS SHALL BE INSPECTED WEEKLY AND WITHIN 24 HOURS AFTER 0.5" OR GREATER RAIN EVENT.
8. DITCHES, SWALES, AND BASINS SHALL BE STABILIZED PRIOR TO DIRECTING RUNOFF TO THEM.
9. THE NHDES STORMWATER MANUAL, IN THREE VOLUMES, DATED DECEMBER 2008, IS A PART OF THIS PLAN SET AND THE MORE RESTRICTIVE WILL GOVERN.

SEDIMENT & EROSION CONTROL DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

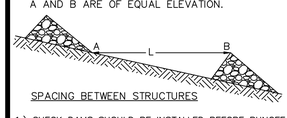
SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

E9

STONE CHECK DAM

L= THE DISTANCE SUCH THAT POINTS A AND B ARE OF EQUAL ELEVATION.



SPACING BETWEEN STRUCTURES

1.) CHECK DAMS SHOULD BE INSTALLED BEFORE RUNOFF IS DIRECTED TO THE SWALE OR DRAINAGE DITCH

2.) THE MAXIMUM CONTRIBUTING DRAINAGE AREA TO THE DAM SHOULD BE LESS THEN ONE ACRE.

3.) THE MAXIMUM HEIGHT OF THE DAM SHOULD BE TWO FEET.

4.) THE CENTER OF THE DAM SHOULD BE AT LEAST SIX INCHES LOWER THAN THE OUTER EDGES.

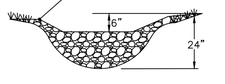
5.) THE MAXIMUM SPACING IS AS SHOWN ON THE PROJECT SITE PLANS.

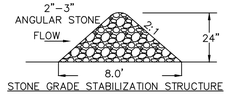
6.) CHECK DAMS WILL NOT BE USED IN A FLOWING STREAM.

7.) TEMPORARY CHECK DAMS WILL BE REMOVED ONCE THE SWALE OR DITCH IS DETERMINED STABLE.

REFERENCE IS MADE TO NHDES SWM VOL. 3, 4-2 CHECK DAMS, PAGE 114

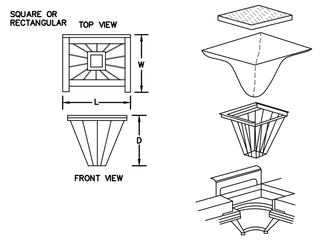
NOTE: KEY STONE INTO CHANNEL BANKS AND EXTEND IT BEYOND THE ABUTMENTS A MINIMUM OF 18" TO PREVENT FLOW AROUND THE DAM.





STONE GRADE STABILIZATION STRUCTURE

E10



INLET FILTER BASKET

NOT TO SCALE

FILTER BASKET NOTES:

1.) INLET BASKETS SHALL BE USED ON ALL CATCH BASINS WITHIN THE PROJECT LIMITS DURING CONSTRUCTION. INLET FILTER BASKETS SHALL BE "METAL-ERA" OR APPROVED EQUAL.

2.) FILTER FABRIC SHALL BE PUSHED DOWN AND FORMED TO THE SHAPE OF THE BASKET. THE SHEET OF FABRIC SHALL BE LARGE ENOUGH TO BE SUPPORTED BY THE BASKET FRAME WHEN HOLDING SEDIMENT AND EXTEND AT LEAST 6 INCHES PAST THE FRAME. THE INLET GRATE SHALL BE PLACED OVER THE BASKET/FRAME AND WILL SERVE AS THE FABRIC ANCHOR.

3.) THE FILTER FABRIC SHALL BE A GEO-TEXTILE FABRIC: POLYESTER, POLYPROPYLENE, STABILIZED NYLON, POLYETHYLENE OR POLYVINYLIDENE CHLORIDE MEETING THE FOLLOWING SPECIFICATIONS:

GRAB STRENGTH: 45 lb. MINIMUM IN ANY PRINCIPAL DIRECTION (ASTM D1682).

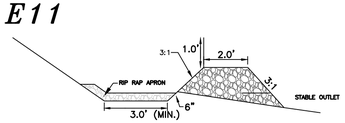
MULLEN BURST STRENGTH: MINIMUM 60 psi (ASTM D774).

4.) THE FABRIC SHALL HAVE AN OPENING NO GREATER THAN A NUMBER 20 U.S. STANDARD SIEVE AND MINIMUM PERMEABILITY OF 120 gpm/sq. ft.

5.) THE INLET BASKET SHALL BE INSPECTED WITHIN 24 HOURS AFTER EACH RAINFALL OR DAILY DURING EXTENDED PERIODS OF PRECIPITATION. REPAIRS SHALL BE MADE IMMEDIATELY, AS NECESSARY, TO PREVENT PARTICLES FROM ENTERING THE DRAINAGE PIPING SYSTEM AND/OR CAUSING SURFACE FLOODING.

6.) INLET BASKETS SHALL BE MAINTAINED IN PLACE UNTIL ALL PAVING IS COMPLETED AND ALL UNPAVED AREAS HAVE BEEN STABILIZED WITH VEGETATION.

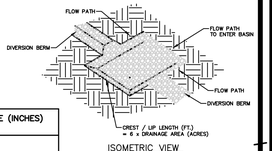
E11



CROSS SECTION

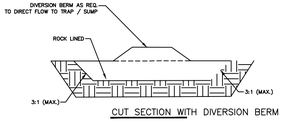
WIDTH AND LENGTH DEPENDANT ON CONTRIBUTING AREA EXCAVATION SECTION IS PERFFERED OVER A BERMED SECTION

SIEVE DESIGNATION	SIZE OF STONE (INCHES)
100%	12
84-100%	6
68-83%	3
42-55%	1
8-12%	NO. 4



ISOMETRIC VIEW

1. TRAP TO BE INSTALLED AS CLOSE TO THE DISTURBED AREA OR SOURCE OF SEDIMENT AS POSSIBLE.
2. THE MAXIMUM CONTRIBUTING DRAINAGE AREA TO THE TRAP SHALL BE LESS THAN 5 ACRES.
3. THE MINIMUM VOLUME OF THE TRAP SHALL BE 3,600 CUBIC FEET OF STORAGE FOR EACH ACRE OF DRAINAGE AREA.
4. THE SIDE SLOPES OF THE TRAP SHALL BE 3:1 OR FLATTER AND SHALL BE STABILIZED IMMEDIATELY AFTER THEIR CONSTRUCTION.
5. THE OUTLET OF THE TRAP SHALL BE A MINIMUM OF ONE FOOT BELOW THE CREST OF THE TRAP AND SHALL DISCHARGE TO A STABILIZED AREA.
6. THE TRAP SHALL BE CLEANED WHEN 50 PERCENT OF THE ORIGINAL VOLUME IS FILLED.
7. THE MATERIALS REMOVED FROM THE TRAP SHALL BE PROPERLY DISPOSED OF AND STABILIZED.



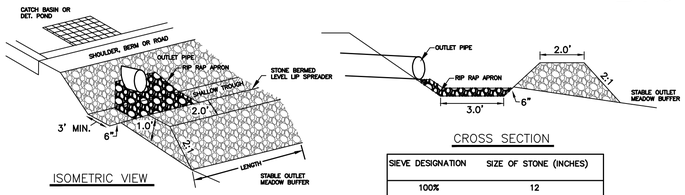
CUT SECTION WITH DIVERSION BERM

STONE LINED SEDIMENT TRAP

E-101

E12

STONE BERM LEVEL SPREADER

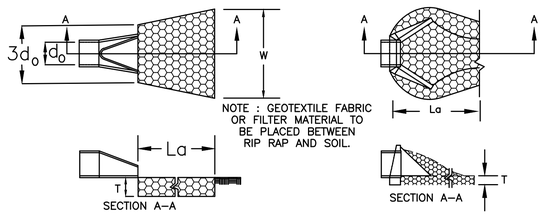


SIEVE DESIGNATION	SIZE OF STONE (INCHES)
100%	12
84–100%	6
68–83%	3
42–55%	1
8–12%	NO. 4

1. CONSTRUCT THE LEVEL SPREADER LIP ON A 0% GRADE TO INSURE UNIFORM SPREADING OF RUNOFF.
2. LEVEL SPREADER SHALL BE CONSTRUCTED ON UNDISTURBED SOIL AND NOT ON FILL.
3. THE ENTIRE LEVEL LIP AREA SHALL BE PROTECTED BY PLACING EXCELSIOR ENFORCER MATTING BENEATH THE STONE. EACH STRIP SHALL OVERLAP BY AT LEAST SIX INCHES.
4. THE FLOW FROM THE LEVEL SPREADER SHALL OUTLET ONTO STABILIZED AREAS. WATER SHOULD NOT RE–CONCENTRATE IMMEDIATELY BELOW THE SPREADER.
5. MAINTENANCE: THE LEVEL SPREADER SHOULD BE CHECKED PERIODICALLY AND AFTER EVERY MAJOR STORM TO DETERMINE IF THE LIP HAS BEEN DAMAGED AND THE DESIGN CONDITIONS HAVE NOT CHANGED. ANY DETRIMENTAL SEDIMENT ACCUMULATION SHOULD BE REMOVED. IF STONE REMOVAL HAS TAKEN PLACE ON THE LIP, THEN THE DAMAGE SHOULD BE REPAIRED.
6. REFERENCE IS MADE TO NHDES SWM VOL. 2, 4–6, STONE BERM LEVEL SPREADERS, PAGE 162

E13

PIPE OUTLET PROTECTION



PIPE OUTLET TO FLAT AREA WITH NO DEFINED CHANNEL

PIPE OUTLET TO WELL–DEFINED CHANNEL

PIPE OUTLET PROTECTION CONSTRUCTION SPECIFICATIONS

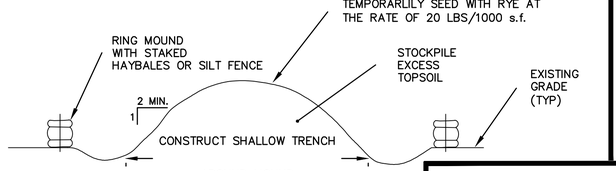
1. THE SUB GRADE FOR THE FILTER MATERIAL, GEOTEXTILE FABRIC, AND RIP RAP SHALL BE PREPARED TO THE LINES AND GRADES SHOWN ON THE PLANS.
2. THE ROCK OR GRAVEL USED FOR FILTER OF RIP RAP SHALL CONFORM TO THE SPECIFIED GRADATION.
3. GEOTEXTILE FABRICS SHALL BE PROTECTED FROM PUNCTURE OR TEARING DURING THE PLACEMENT OF THE ROCK RIP RAP DAMAGED AREAS IN THE FABRIC SHALL BE REPAIRED BY PLACING A PIECE OF FABRIC OVER THE DAMAGED AREA OR BY COMPLETE REPLACEMENT OF THE FABRIC. ALL OVERLAPS REQUIRED FOR REPAIRS OR JOINING TWO PIECES OF FABRIC SHALL BE A MINIMUM OF 12 INCHES.
4. STONE FOR THE RIP RAP MAY BE PLACED BY EQUIPMENT AND SHALL BE CONSTRUCTED TO THE FULL LAYER THICKNESS IN ONE OPERATION AND IN SUCH A MANNER AS TO PREVENT SEGREGATION OF THE STONE SIZES.

TABLE 7–24––RECOMMENDED RIP RAP GRADATION RANGES				
d50 SIZE=	0.5	FEET	6	INCHES
% OF WEIGHT SMALLER THAN THE GIVEN d50 SIZE		SIZE OF STONE (INCHES) FROM		TO
100%		9		12
85%		8		11
50%		6		9
15%		2		3

E14

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

E15



TOPSOIL STOCKPILE MOUND

NOT TO SCALE

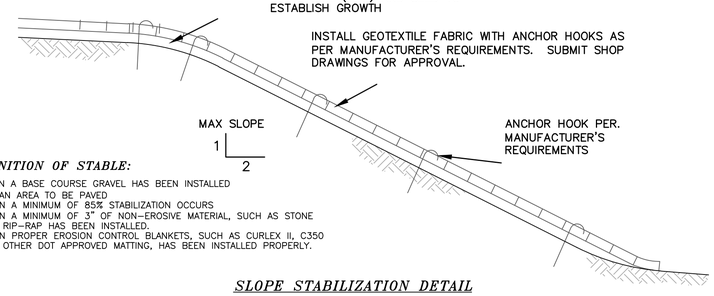
E16

WINTER STABILIZATION NOTES

1. ALL DISTURBED AREAS THAT DO NOT HAVE AT LEAST 85% VEGETATIVE COVERAGE PRIOR TO OCTOBER 15TH, SHALL BE STABILIZED BY APPLYING MULCH AT A RATE OF 3–4 TONS PER ACRE. ALL SIDE SLOPES, STEEPER THAN 4:1, THAT ARE NOT DIRECTED TO SWALES OR DETENTION BASINS, SHALL BE LINED WITH BIODEGRADABLE/PHOTODEGRADABLE "JUTE MATTING" (EXCELSIOR'S CURLEX II OR EQUAL). ALL OTHER SLOPES SHALL BE MULCHED AND TACKED AT A RATE OF 3–4 TONS PER ACRE. THE APPLICATION OF MULCH AND/OR JUTE MATTING SHALL NOT OCCUR OVER EXISTING SNOW COVER. IF THE SITE IS ACTIVE AFTER NOVEMBER 15TH, ANY SNOW THAT ACCUMULATES ON DISTURBED AREAS SHALL BE REMOVED. PRIOR TO SPRING THAW ALL AREAS WILL BE STABILIZED, AS DIRECTED ABOVE.
2. ALL SWALES THAT DO NOT HAVE FULLY ESTABLISHED VEGETATION SHALL BE EITHER LINED WITH TEMPORARY JUTE MATTING OR TEMPORARY STONE CHECK DAMS (APPROPRIATELY SPACED). STONE CHECK DAMS WILL BE MAINTAINED THROUGHOUT THE WINTER MONTHS. IF THE SWALES ARE TO BE MATTED WITH PERMANENT LINERS OR RIPRAP WITH ENGINEERING FABRIC, THIS SHALL BE COMPLETED PRIOR TO WINTER SHUTDOWN OR AS SOON AS THEY ARE PROPERLY GRADED AND SHAPED.
3. PRIOR TO NOV. 15TH ALL ROADWAY AND PARKING AREAS SHALL BE BROUGHT UP TO AND THROUGH THE BANK RUN GRAVEL APPLICATION. IF THESE AREAS' ELEVATIONS ARE PROPOSED TO REMAIN BELOW THE PROPOSED SUBGRADE ELEVATION, THE SUBGRADE MATERIAL SHALL BE ROUGHLY CROWNED AND A 3" LAYER OF CRUSHED GRAVEL SHALL BE PLACED AND COMPACTED. THIS WILL ALLOW THE SUBGRADE TO SHED RUNOFF AND WILL REDUCE ROADWAY EROSION. THIS CRUSHED GRAVEL DOES NOT HAVE TO CONFORM TO NH DOT 304.3, BUT SHALL HAVE BETWEEN 15–25% PASSING THE #200 SIEVE AND THE LARGEST STONE SIZE SHALL BE 2". IF THE SITE IS ACTIVE AFTER NOVEMBER 15TH, ANY ACCUMULATED SNOW SHALL BE REMOVED FROM ALL ROADWAY AND PARKING AREAS.
4. AFTER OCTOBER 15TH, THE END OF NEW HAMPSHIRE'S AVERAGE GROWING SEASON, NO ADDITIONAL LOAM SHALL BE SPREAD ON SIDE SLOPES AND SWALES. THE STOCKPILES THAT WILL BE LEFT UNDISTURBED UNTIL SPRING SHALL BE SEEDED BY THIS DATE. AFTER OCTOBER 15TH, ANY NEW OR DISTURBED PILES SHALL BE MULCHED AT A RATE OF 3–4 TONS PER ACRE. ALL STOCKPILES THAT WILL REMAIN THROUGHOUT THE WINTER SHALL BE SURROUNDED WITH SILT FENCING.

E17

NOT TO SCALE



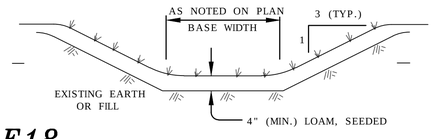
DEFINITION OF STABLE:

1. WHEN A BASE COURSE GRAVEL HAS BEEN INSTALLED IN AN AREA TO BE PAVED
2. WHEN A MINIMUM OF 85% STABILIZATION OCCURS
3. WHEN A MINIMUM OF 3" OF NON–EROSIVE MATERIAL, SUCH AS STONE OR RIP–RAP HAS BEEN INSTALLED.
4. WHEN PROPER EROSION CONTROL BLANKETS, SUCH AS CURLEX II, C350 OR OTHER DOT APPROVED MATTING, HAS BEEN INSTALLED PROPERLY.

SLOPE STABILIZATION DETAIL

NOT TO SCALE

E18



GRASS TREATMENT SWALE

NOT TO SCALE

INSPECT ANNUALLY FOR EROSION, SEDIMENT ACCUMULATIONS, VEGETATION LOSS, & INVASIVE SPECIES. REPAIR AS NECESSARY.

MOW GRASS ANNUALLY TO A DEPTH OF 4".

NOTE: Temporary seed mix for stabilization of turf shall be winter rye or oats at a rate of 2.5 lbs. per 1000 s.f. and shall be placed prior to OCT. 15, if permanent seeding not yet complete.

SEEDING GUIDE

USE	SEEDING MIXTURE 1/	DROUGHTY	WELL DRAINED	MODERATELY WELL DRAINED	POORLY DRAINED
STEEP CUTS AND FILLS, BORROW AND DISPOSAL AREAS	A	FAIR	GOOD	GOOD	FAIR
	B	POOR	GOOD	FAIR	FAIR
	C	POOR	GOOD	EXCELLENT	GOOD
	D	FAIR	FAIR	GOOD	EXCELLENT
	E	FAIR	EXCELLENT	EXCELLENT	POOR
WATERWAYS, EMERGENCY SPILLWAYS; AND OTHER CHANNELS WITH FLOWING WATER.	A	GOOD	GOOD	GOOD	FAIR
	C	GOOD	EXCELLENT	EXCELLENT	FAIR
	D	GOOD	EXCELLENT	EXCELLENT	FAIR
LIGHTLY USED PARKING LOTS, ODD AREAS, UNUSED LANDS, AND LOW INTENSITY USE RECREATION SITES.	A	GOOD	GOOD	GOOD	FAIR
	B	GOOD	GOOD	FAIR	FAIR
	C	GOOD	EXCELLENT	EXCELLENT	FAIR
	D	FAIR	GOOD	GOOD	EXCELLENT
PLAY AREAS AND ATHLETIC FIELDS (TOPSOIL IS ESSENTIAL FOR GOOD TURF.)	F	FAIR	EXCELLENT	EXCELLENT	2/
	G	FAIR	EXCELLENT	EXCELLENT	2/

GRAVEL PIT, SEE NH–PM–24 IN APPENDIX FOR RECOMMENDATION REGARDING RECLAMATION OF SAND AND GRAVEL PITS.

1/ REFER TO SEEDING MIXTURES AND RATES IN TABLE 7–36.
2/ POORLY DRAINED SOILS ARE NOT DESIRABLE FOR USE AS PLAYING AREA AND ATHLETIC FIELDS.

RECOMMENDED *

SEEDING RATES

MIXTURE	POUNDS PER ACRE	POUNDS PER 1,000 Sq. Ft.
A. TALL FESCUE	20	0.45
CREEPING RED FESCUE	20	0.45
RED TOP	2	0.05
TOTAL	42	0.95
B. TALL FESCUE	15	0.35
CREEPING RED FESCUE	10	0.25
CROWN VETCH OR FLAT PEA	15	0.35
	30	0.75
TOTAL	40 OR 55	0.95 OR 1.35
C. TALL FESCUE	24	0.55
CREEPING RED FESCUE	24	0.55
BIRDS FOOT TREFOIL	REMOVED	REMOVED
TOTAL	48	1.10
D. TALL FESCUE	20	0.45
FLAT PEA	30	0.70
TOTAL	50	1.20
E. CREEPING RED FESCUE 1/	50	1.15
KENTUCKY BLUEGRASS 1/	50	1.15
TOTAL	100	2.30
F. TALL FESCUE 1	150	3.60

E19

SEEDING SPECIFICATIONS

1. Grading and Shaping
   a. Slopes shall not be steeper than 2:1;3:1 slopes or flatter are preferred. Where mowing will be done, 3:1 slopes or flatter are recommended.
2. Seedbed Preparation
   a. Surface and seepage water should be drained or diverted from the site to prevent drowning or winter killing of the plants.
   b. Stones larger than 4 inches and trash should be removed because they interfere with seeding and future maintenance of the area. Where feasible, the soil should be tilled to a depth of about 4 inches to prepare a seedbed and mix fertilizer and lime into the soil. The seedbed should be left in reasonably firm and smooth condition. The last tillage operation should be performed across the slope wherever practical.
3. Establishing a Stand
   a. Lime and fertilizer should be applied prior to or at the time of seeding and incorporated into the soil kinds and amounts of lime and fertilizer should be based on an evaluation of soil tests. When a soil test is not available, the following minimum amounts should be applied:

   Agricultural limestone, 2 tons per acre or 100lbs. per 1,000 sq.ft.

   Nitrogen(N), 50lbs. per acre or 1.1lbs. per 1,000 sq.ft.

   Phosphate(P205), 100lbs. per acre or 2.2lbs. per 1,000 sq.ft.

   Potash(K20), 100lbs. per acre or 2.2lbs. per 1,000 sq.ft.

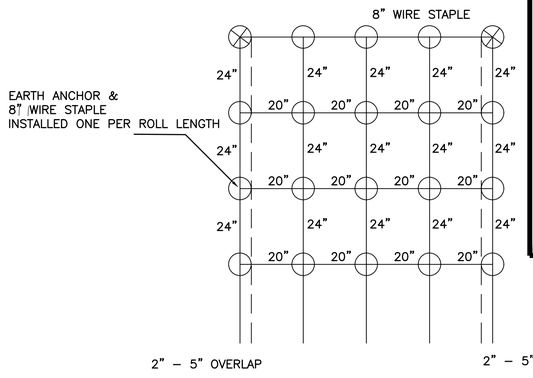
   (Note: This is the equivalent of 500lbs. per acre of 10–20–20 fertilizer or 1,000lbs. per acre of 5–10–10.)

   b. Seed should be spread uniformly by the method most appropriate for the site. Methods include broadcasting, drilling and hydroseeding. Where broadcasting is used, cover seed with .25 inch of soil or less, by cultipacking or raking.
   C. Refer to Table(G–E1 this sheet) for appropriate seed mixtures and Table(H–E1 this sheet) for rates of seeding. All legumes (crownvetch, birdsfoot trefoil, and flatpea) must be inoculated with their specific inoculant.
   d. When seeded areas are mulched, plantings may be made from early spring to early October. When seeded areas are not mulched, plantings should be made from early spring to May 20 or from August 10 to September 1.

   4.Mulch
   a. Hay, straw, or other mulch, when needed, should be applied immediately after seeding.
   b. Mulch will be held in place using appropriate techniques from the Best Management Practice for mulching. Hay or straw mulch shall be placed at a rate of 90lbs per 1000 s.f.

   5. Maintenance to Establish a Stand
   a. Planted area should be protected from damage by fire, grazing, traffic, and dense weed growth.
   b. Fertilization needs should be determined by onsite inspections. Supplemental fertilizer is usually the key to fully complete the establishment of the stand because most perennial stake 2 to 3 years to become established.
   c. In waterways, channels, or swales where uniform flow conditions are anticipated, occasional mowing may be necessary to control growth of woody vegetation.

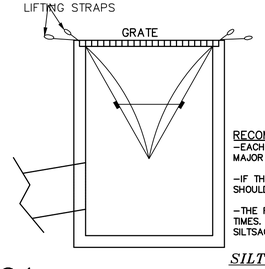
E20



3.4 STAPLES PER SQ YD
TOTAL WIDTH: 6' 8"

VMAX3 MATTING STAPLE PATTERN GUIDE

E21



RECOMMENDED MAINTENANCE SCHEDULE
–EACH SILTSACK SHOULD BE INSPECTED AFTER EVERY MAJOR RAIN EVENT

–IF THERE HAVE BEEN NO MAJOR EVENTS, SILTSACK SHOULD BE INSPECTED EVERY 2–3 WEEKS

–THE RESTRAINT CORD SHOULD BE VISIBLE AT ALL TIMES. IF CORD IS COVERED WITH SEDIMENT, THE SILTSACK SHOULD BE EMPTIED.

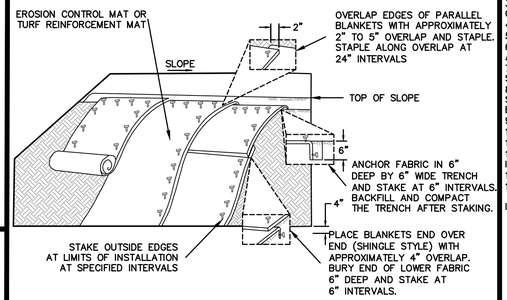
SILTSACK DETAIL

NOT TO SCALE

1.) THE BEGINNING AND END OF EACH ROW OF NAG C350 WILL BE BURIED SIX TO 12 INCHES DEEP.
2.) AT THE TOP OF EACH ROW WHERE THE ROWS OVERLAP, AN EARTH ANCHOR WILL BE INSTALLED TO A MINIMUM DEPTH OF 30 INCHES.
3.) STAPLES WILL BE INSTALLED AT A RATE OF 3.4 STAPLES PER SQUARE YARD AS DEMONSTRATED.
4.) STAPLES WILL BE INSTALLED TO A MINIMUM DEPTH OF 8 INCHES.
5.) ROWS OF NAG ROLLMAX WILL BE INSTALLED PARALLEL WITH AN AVERAGE OF THREE AND ONE–HALF INCHES OF OVERLAP. STAPLES WILL BE INSTALLED ALONG THE OVERLAP SEAM, AS SHOWN.
6.) MATTING TO BE USED ON ALL SLOPES GREATER THAN 3:1

E22

VMAX3 MATTING & CURLEX II



NOTE : STAKING PATTERNS SHALL FOLLOW MANUFACTURERS RECOMMENDATIONS. MINIMUM SPACING ACROSS FABRIC AS SHOWN.

INSTALLATION OF EROSION CONTROL FABRICS

NOT TO SCALE

CONSTRUCTION SEQUENCE:

1.) ALL SEDIMENT & EROSION CONTROLS ARE TO BE INSTALLED PRIOR TO ANY EARTH DISTURBANCE (STUMPING) CUT AND REMOVE TREES IN CONSTRUCTION AREA ONLY AS REQUIRED AFTER INSTALLATION OF SEDIMENT & ERISON CONTROLS.
2.) CONSTRUCT AND/OR INSTALL TEMPORARY AND PERMANENT SEDIMENT EROSION AND DETENTION CONTROL FACILITIES AS REQUIRED.
3.) EROSION, SEDIMENT AND DETENTION CONTROL FACILITY SHALL BE INSTALLED & STABILIZED PRIOR TO ANY EARTH MOVING OPERATION & OR DIRECTING RUNOFF TO THEM.
4.) CLEAR, CUT AND DISPOSE OF DEBRIS IN APPROVED FACILITY
5.) CONSTRUCT TEMPORARY CULVERTS AS REQUIRED, OR DIRECTED
6.) CONSTRUCT ROADWAYS FOR ACCESS TO DESIRED CONSTRUCTION AREAS. ALL ROADS SHALL BE STABILIZED IMMEDIATELY AFTER GRADING
7.) INSTALL PIPE AND CONSTRUCTION ASSOCIATED APPURTENANCES AS REQUIRED OR DIRECTED. ALL DISTURBED AREAS SHALL STABILIZED IMMEDIATELY AFTER GRADING.
8.) BEGIN PERMANENT AND TEMPORARY SEEDING AND MULCHING. ALL CUT AND FILL SLOPES AND DISTURBED AREAS SHALL BE SEEDED OR MULCHED AS REQUIRED, OR DIRECTED. NO AREA IS ALLOWED TO BE DISTURBED FOR A LENGTH OF TIME THAT EXCEEDS 45 DAYS BEFORE BEING STABILIZED. DAILY, OR AS REQUIRED.
9.) CONSTRUCT TEMPORARY BERMS, DRAINS DITCHES, SILT FENCES, SEDIMENT TRAPS, ETC. MULCH AND SEED AS REQUIRED.
10.) INSPECT AND MAINTAIN ALL EROSION AND SEDIMENT CONTROL MEASURES DURING CONSTRUCTION
11.) COMPLETE PERMANENT SEEDING AND LANDSCAPING.
12.) REMOVE TEMPORARY EROSION CONTROL MEASURES AFTER SEEDING AREAS HAVE ESTABLISHED THEMSELVES AND SITE IMPROVEMENTS ARE COMPLETE.
13.) SMOOTH AND REVEGETATE ALL DISTURBED AREAS.
14.) FINISH PAVING ALL ROADWAYS

INVASIVE SPECIES MANAGEMENT NOTES:
1. GLOSSY BUCKTHORN (RHAMNUS FRANGULA) EXISTS IN THIS AREA. CONTRACTOR SHALL IDENTIFY THE LIMITS OF THIS SPECIES BEFORE ANY CLEARING OR DISTURBANCE IN THIS AREA.
2. THE PRIMARY MANAGEMENT GOAL FOR THIS SPECIES IS TO PREVENT ITS SPREAD INTO OTHER AREAS OF THE SITE THROUGH CONSTRUCTION DISTURBANCE.
3. GLOSSY BUCKTHORN EXISTING WITHIN OR DIRECTLY ADJACENT TO ANY AREAS TO BE DISTURBED SHALL BE CUT AND APPROPRIATELY DISPOSED. BEFORE BERRY AND SEED MATURATION IN LATE AUGUST, CUT MATERIAL MAY BE BURNED, BRUSH PILED, OR CHIPPED. FOLLOWING SEED MATURATION MATERIAL MUST BE BURNED OR REMOVED FROM THE SITE.
4. TOPSOIL WITHIN 10 FEET OF WHERE GLOSSY BUCKTHORN HAS BEEN REMOVED MAY CONTAIN VIABLE SEED AND MUST NOT BE USED OR STOCKPILED ANYWHERE ELSE ON THE SITE. THIS MATERIAL SHALL BE BURIED AT LEAST THREE (3) FEET BELOW GRADE IN A LOCATION PREPARED IN ADVANCE OF THE WORK.

E23

E–102

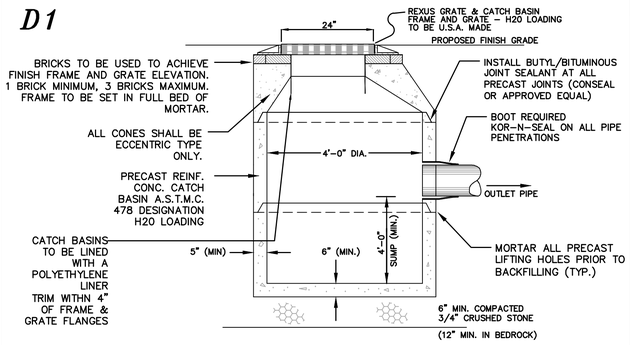
SEDIMENT & EROSION CONTROL DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE – KENNETH A. BERRY No. 14243 – LICENSED PROFESSIONAL ENGINEER

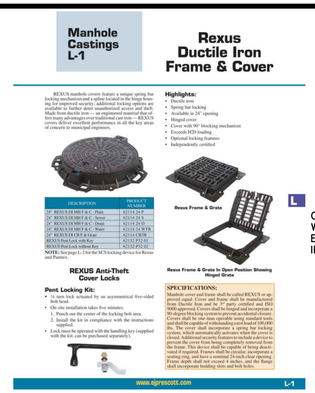
D1



CATCH BASIN DETAIL

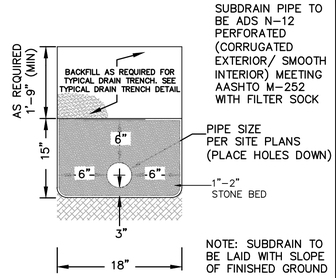
NOT TO SCALE

D2



CATCH BASIN FRAME AND GRATE WILL BE REXUS, OR APPROVED EQUAL, 24 INCH OPENING, DUCTILE IRON, H20 LOADING.

D3



SUBDRAIN PIPE TO BE ADS N-12 PERFORATED (CORRUGATED EXTERIOR/ SMOOTH INTERIOR) MEETING AASHTO M-252 WITH FILTER SOCK

PIPE SIZE PER SITE PLANS (PLACE HOLES DOWN)

NOTE: SUBDRAIN TO BE LAID WITH SLOPE OF FINISHED GROUND

TYPICAL CROSS SECTION

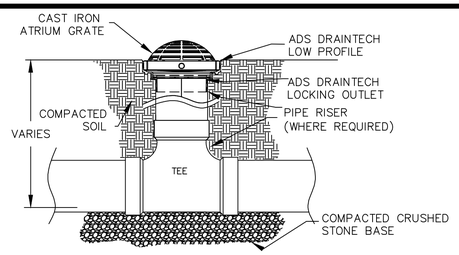
NOTES:

1. CROWN OF 6" SUBDRAIN PIPES TO MATCH CROWN OF DRAIN PIPES IN CATCH BASINS
2. SUBDRAIN TO BE INSTALLED AS INDICATED ON THE DRAWINGS AND AS DIRECTED BY THE ENGINEER.
3. SHORING AND STABILIZING OF TRENCH SIDEWALLS DURING EXCAVATION SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR. NO ADDITIONAL COMPENSATION WILL BE ALLOWED FOR ANY TRENCH EXCAVATION BEYOND THE LIMITS OF PAY EXCAVATION INDICATED.

SUBDRAIN DETAIL TYPICAL

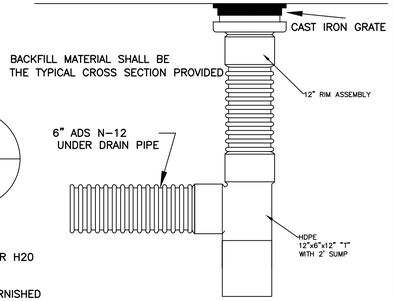
NOT TO SCALE

D4



12" CAST IRON GRATE

NOT TO SCALE



CASTINGS ARE RATED FOR H20 WHEEL LOAD TRAFFIC

PAINT: CASTINGS ARE FURNISHED WITH A BLACK PAINT

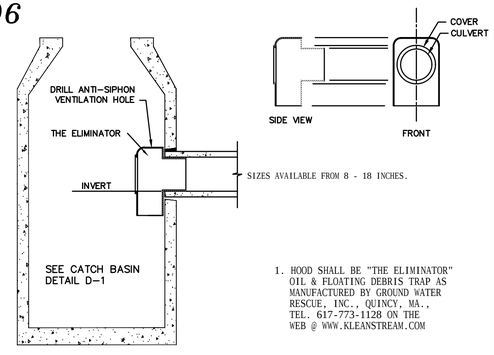
ADS N-12 INLINE DRAIN

NOT TO SCALE USED FOR CLEANOUTS

D5

DRAIN MAN HOLE FRAME AND GRATE WILL BE PAMREX, OR APPROVED EQUAL, 24 INCH OPENING, DUCTILE IRON, H20 LOADING.

D6

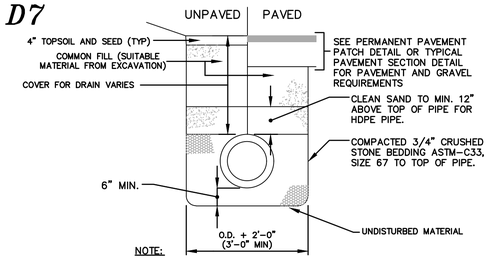


1. HOOD SHALL BE "THE ELIMINATOR" OIL & FLOATING DEBRIS TRAP AS MANUFACTURED BY GROUND WATER RESCUE, INC., QUINCY, MA., TEL. 617-773-1128 ON THE WEB @ WWW.KLEANSTREAM.COM

CATCH BASIN HOOD DETAIL

NOT TO SCALE

D7



NOTE:

PLASTIC DRAIN PIPE (HDPE) SHALL BE ADS N-12 (CORRUGATED EXTERIOR/SMOOTH INTERIOR) OR EQUAL MEETING AASHTO M-252 AND H-20 LOADING.

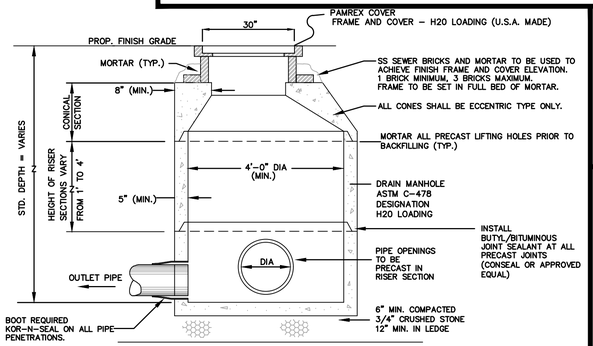
DI DRAIN PIPE SHALL BE CL. 50.

RC DRAIN PIPE SHALL BE CLASS III UNLESS OTHERWISE NOTED.

TYPICAL DRAIN AND SEWER PIPE TRENCH

NOT TO SCALE

D8

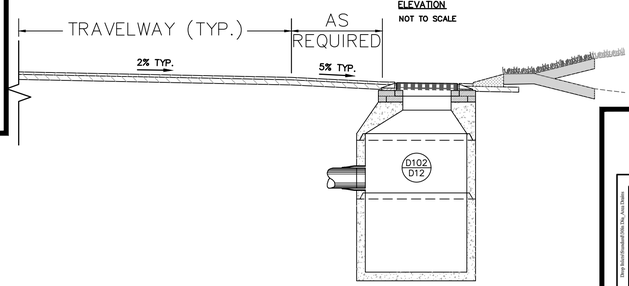


PRECAST DRAIN MANHOLE DETAIL

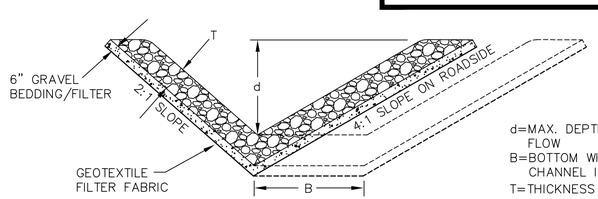
NOT TO SCALE

D9

DETAIL FOR DRAINAGE STRUCTURES NOT LOCATED AT EDGE OF TRAVEL WAY

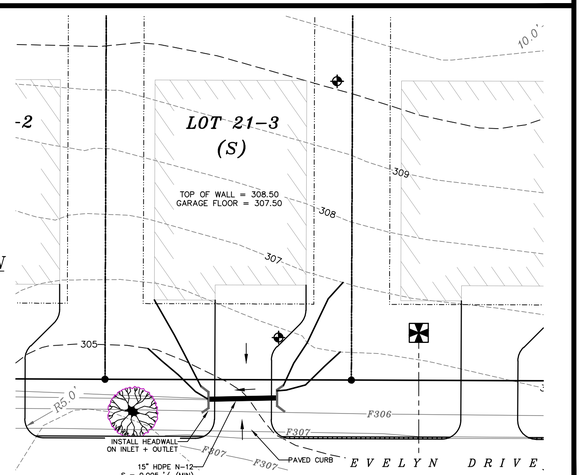


D10



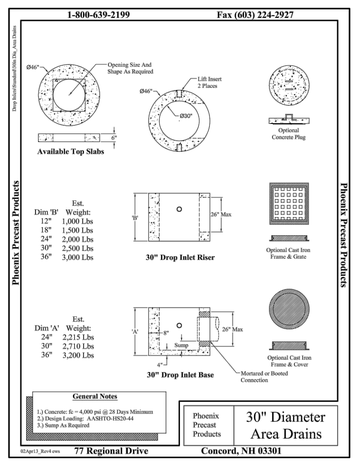
TYPICAL SECTION FOR A RIPRAP LINED CHANNEL

D11



TYPICAL LOT GRADING PLAN

D12



REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

DRAINAGE CONSTRUCTION DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
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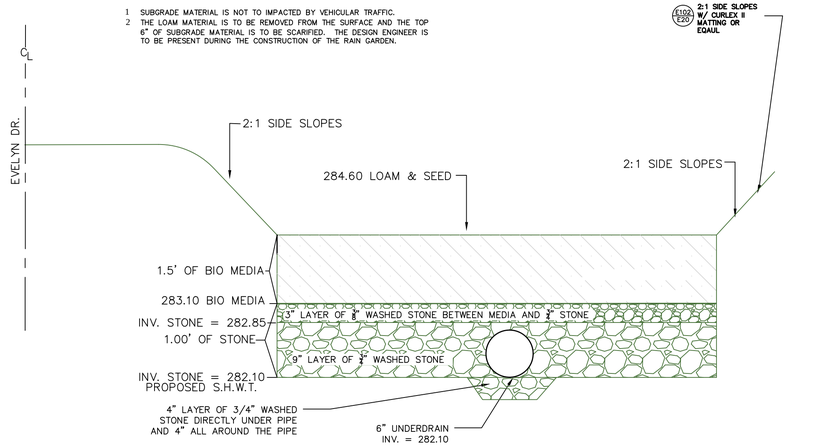
STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

D–101

BIO-SWALE #1

1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
2 THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE RAIN GARDEN.

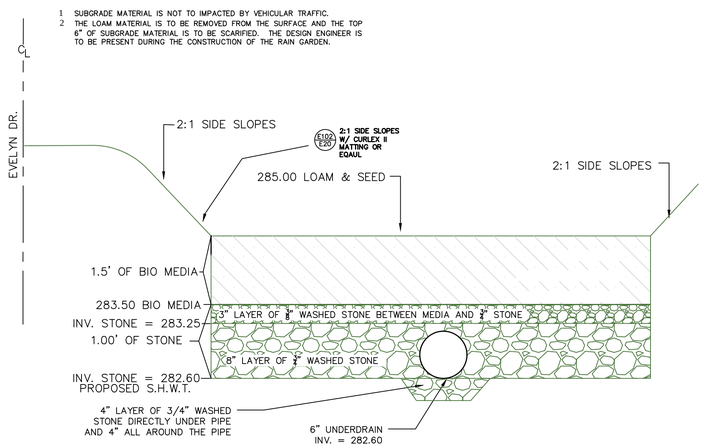


SECTION OF BIO-SWALE #1
NOT TO SCALE

A 12 — A 12

BIO-SWALE #2

1 SUBGRADE MATERIAL IS NOT TO IMPACTED BY VEHICULAR TRAFFIC.
2 THE LOAM MATERIAL IS TO BE REMOVED FROM THE SURFACE AND THE TOP 6" OF SUBGRADE MATERIAL IS TO BE SCARIFIED. THE DESIGN ENGINEER IS TO BE PRESENT DURING THE CONSTRUCTION OF THE RAIN GARDEN.



SECTION OF BIO-SWALE #2
NOT TO SCALE

A 13 — A 13

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
4. DO NOT PLACE THE BIORETENTION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
5. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF WATER FROM EXCAVATIONS) TO THE BIORETENTION AREA DURING ANY STAGE OF CONSTRUCTION.
6. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE PERFORM EXCAVATIONS WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.

MAINTENANCE REQUIREMENTS

1 SYSTEMS SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND FOLLOWING ANY RAINFALL EXCEEDING 2.5 INCHES IN A 24-HOUR PERIOD, WITH MAINTENANCE OR REHABILITATION CONDUCTED AS A WARRANTED BY SUCH INSPECTION.

2 PRETREATMENT MEASURES SHOULD BE INSPECTED AT LEAST TWICE ANNUALLY, AND CLEANED OF ACCUMULATED SEDIMENT AS WARRANTED BY INSPECTION, BUT NO LESS THAN ONCE ANNUALLY.

3 AT LEAST ONCE ANNUALLY, SYSTEM SHOULD BE INSPECTED FOR DRAWDOWN TIME. IF BIORETENTION SYSTEM DOES NOT DRAIN WITHIN 72-HOURS FOLLOWING A RAINFALL EVENT, THEN A QUALIFIED PROFESSIONAL SHOULD ASSESS THE CONDITION OF THE FACILITY TO DETERMINE MEASURES REQUIRED TO RESTORE FILTRATION FUNCTION OR INFILTRATION FUNCTION (AS APPLICABLE), INCLUDING BUT NOT LIMITED TO REMOVAL OF ACCUMULATED SEDIMENTS OR RECONSTRUCTION OF THE FILTER MEDIA.

4 VEGETATION SHOULD BE INSPECTED AT LEAST ANNUALLY, AND MAINTAINED IN HEALTHY CONDITION, INCLUDING, PRUNING, REMOVAL, AND REPLACEMENT OF DEAD OR DISEASED VEGETATION, AND REMOVAL OF INVASIVE SPECIES.

DESIGN REFERENCES

1 UNH STORMWATER CENTER
2 NEW HAMPSHIRE STORMWATER MANAGEMENT MANUAL, VOLUME 2, DECEMBER 2008 AS AMENDED.

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1"	100
3/4"	90 – 100
3/8"	20 – 55
# 4	0 –10
# 8	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #67 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

CRUSHED STONE BEDDING *

SIEVE SIZE	% PASSING BY WEIGHT
1/2"	100
3/8"	90 – 100
#4"	20 – 55
# 8	5 –30
# 16	0 – 10
# 50	0 – 5

* EQUIVALENT TO STANDARD STONE SIZE #89 – SECTION 702 OF NHDOT NHDOT STANDARD SPECIFICATIONS

FILTER MEDIA MIXTURES

Component Material	Percent of Mixture by Volume	Gradation of material	
		Sieve No.	Percent by Weight Passing Standard Sieve
Filter Media Option A			
ASTM C-33 concrete sand	50 to 55		
Loamy sand topsoil, with fines as indicated	20 to 30	200	15 to 25
Moderately fine shredded bark or wood fiber mulch, with fines as indicated	20 to 30	200	< 5

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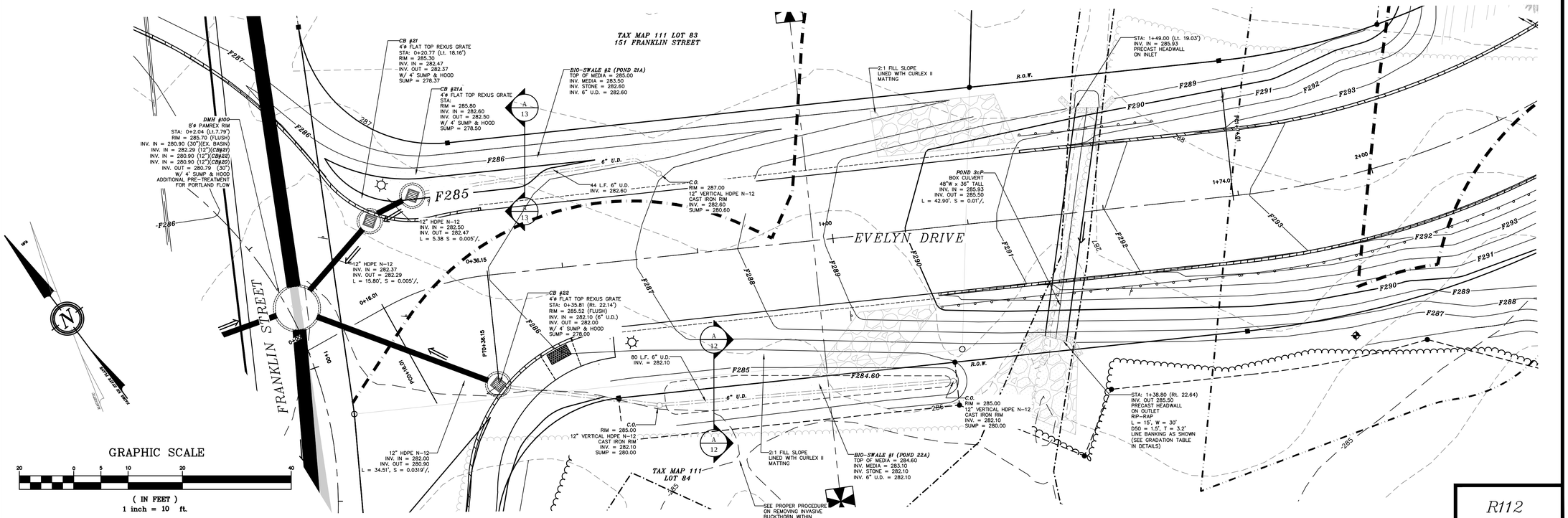

BIO-SWALE # 1+2
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
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STATE OF NEW HAMPSHIRE – KENNETH A. BERRY No. 14243 – LICENSED PROFESSIONAL ENGINEER

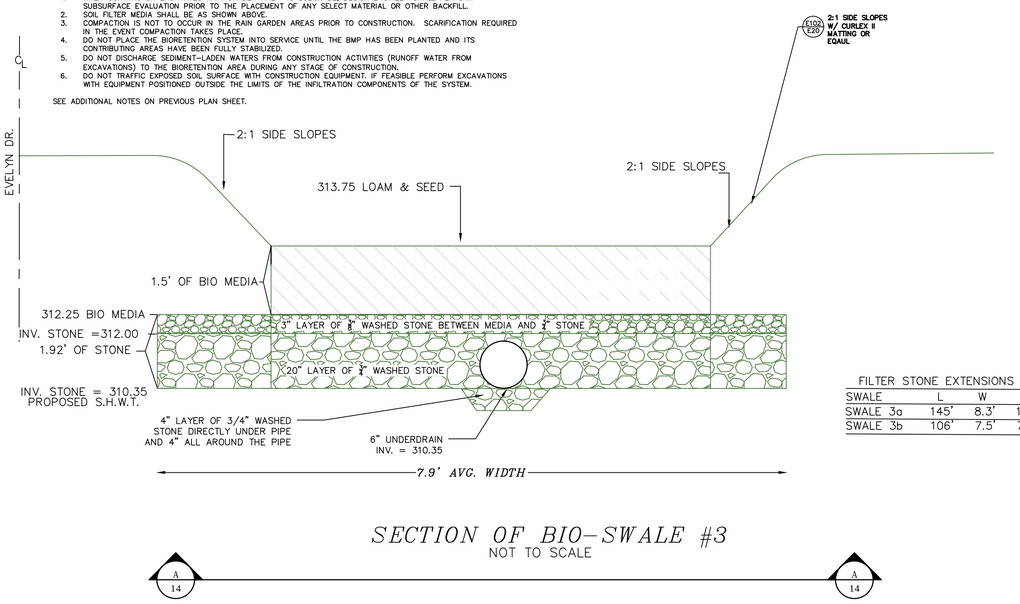
R112

BIO-SWALE #3

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
3. COMPACTION IS NOT TO OCCUR IN THE RAIN GARDEN AREAS PRIOR TO CONSTRUCTION. SCARIFICATION REQUIRED IN THE EVENT COMPACTION TAKES PLACE.
4. DO NOT PLACE THE BIORETENTION SYSTEM INTO SERVICE UNTIL THE BMP HAS BEEN PLANTED AND ITS CONTRIBUTING AREAS HAVE BEEN FULLY STABILIZED.
5. DO NOT DISCHARGE SEDIMENT-LADEN WATERS FROM CONSTRUCTION ACTIVITIES (RUNOFF WATER FROM EXCAVATIONS) TO THE BIORETENTION AREA DURING ANY STAGE OF CONSTRUCTION.
6. DO NOT TRAFFIC EXPOSED SOIL SURFACE WITH CONSTRUCTION EQUIPMENT. IF FEASIBLE PERFORM EXCAVATIONS WITH EQUIPMENT POSITIONED OUTSIDE THE LIMITS OF THE INFILTRATION COMPONENTS OF THE SYSTEM.

SEE ADDITIONAL NOTES ON PREVIOUS PLAN SHEET.



FILTER STONE EXTENSIONS SWALE #3

SWALE	L	W	AREA
SWALE 3a	145'	8.3'	1203.5 Sq.Ft.
SWALE 3b	106'	7.5'	795 Sq.Ft.

SECTION OF BIO-SWALE #3

NOT TO SCALE

A 14 — A 14

BIO-SWALE #4

NOTES

1. WHEN CONTRACTOR EXCAVATES RAIN GARDEN AREA TO SUBGRADE, DESIGN ENGINEER SHALL PERFORM SUBSURFACE EVALUATION PRIOR TO THE PLACEMENT OF ANY SELECT MATERIAL OR OTHER BACKFILL.
2. SOIL FILTER MEDIA SHALL BE AS SHOWN ABOVE.
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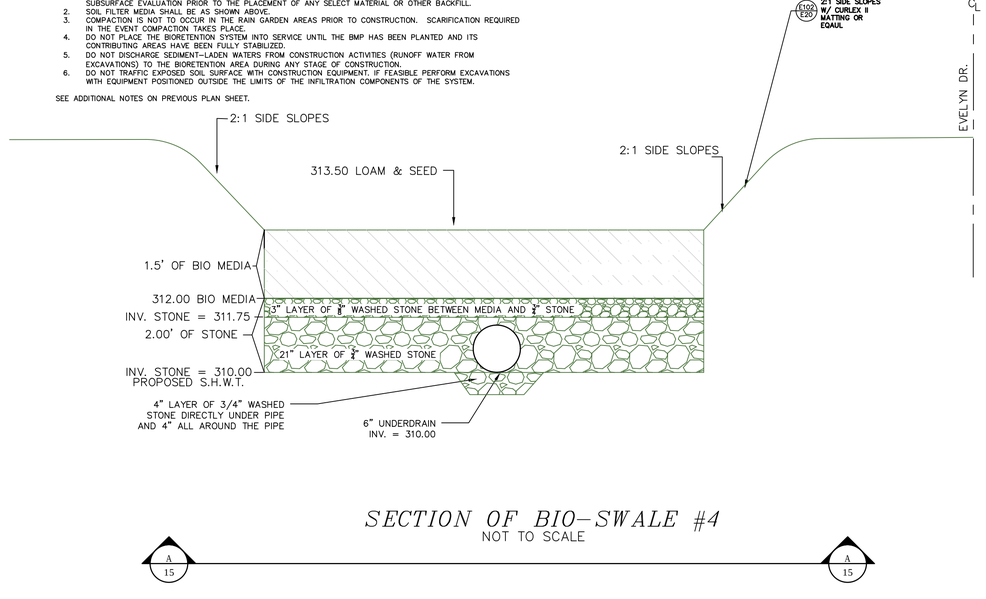

SECTION OF BIO-SWALE #4

NOT TO SCALE

A 15 — A 15

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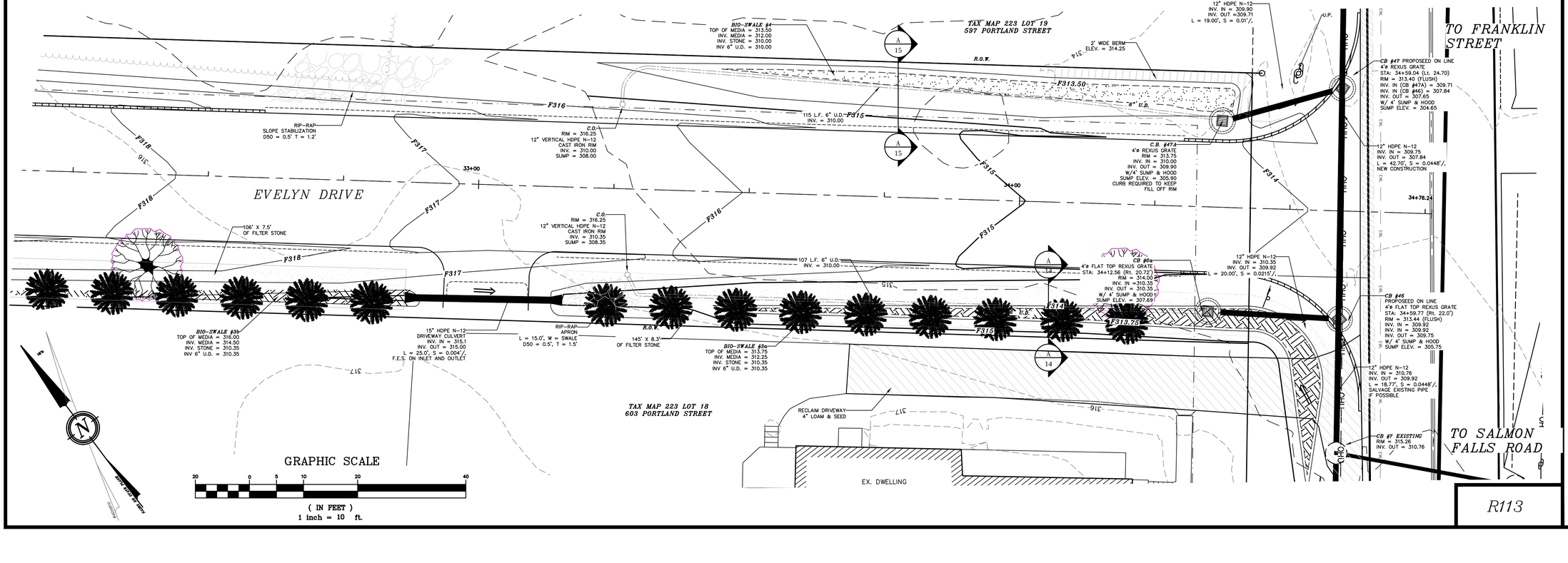
BIO-SWALES # 3+4
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21



R113

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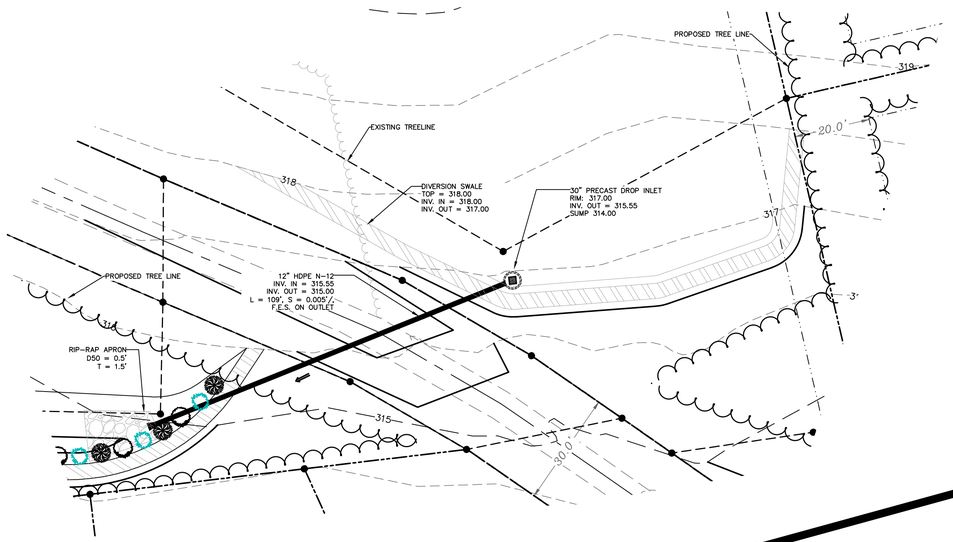
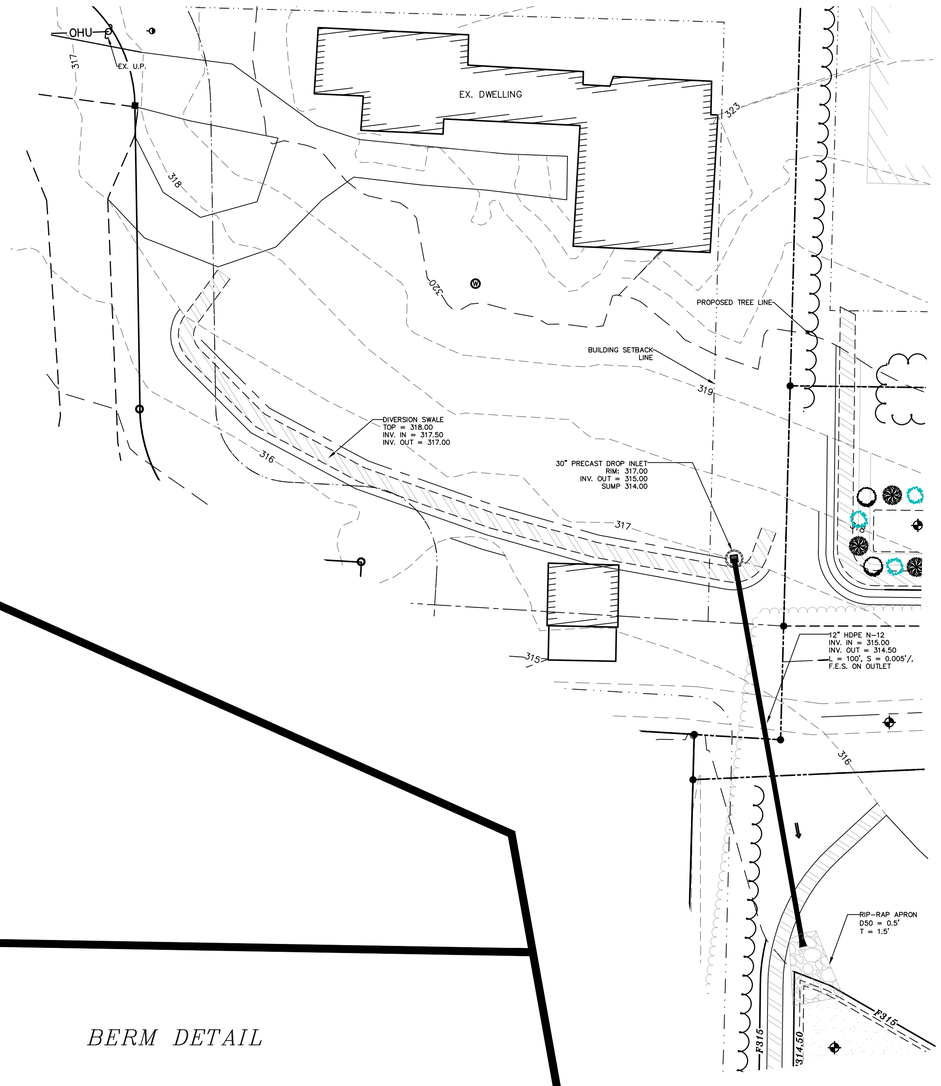
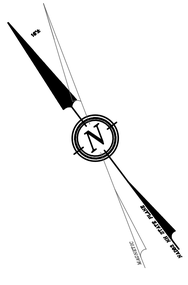




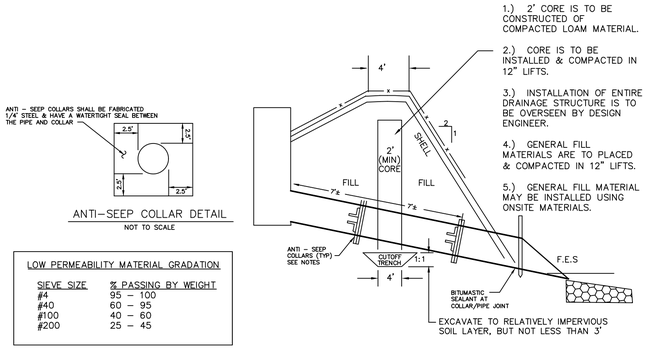


GRAPHIC SCALE

20 0 5 10 20 40

(IN FEET)
1 inch = 10 ft.

BERM DETAIL



ANTI–SEEP COLLAR DETAIL
NOT TO SCALE

1.) 2' CORE IS TO BE CONSTRUCTED OF COMPACTED LOAM MATERIAL.

2.) CORE IS TO BE INSTALLED & COMPACTED IN 12" LIFTS.

3.) INSTALLATION OF ENTIRE DRAINAGE STRUCTURE IS TO BE OVERSEEN BY DESIGN ENGINEER.

4.) GENERAL FILL MATERIALS ARE TO PLACED & COMPACTED IN 12" LIFTS.

5.) GENERAL FILL MATERIAL MAY BE INSTALLED USING ONSITE MATERIALS.

LOW PERMEABILITY MATERIAL GRADATION

SIEVE SIZE	% PASSING BY WEIGHT
#4	95 – 100
#40	60 – 95
#100	40 – 60
#200	25 – 45

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DIVERSION BERM DETAILS
STUART ACRES
FOR
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ROCHESTER, N.H.
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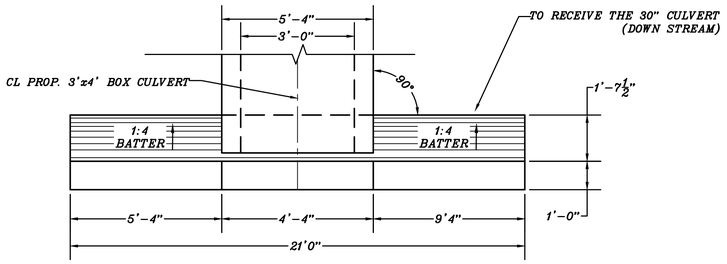
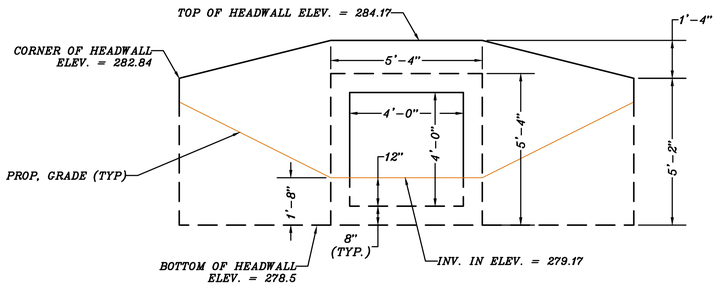
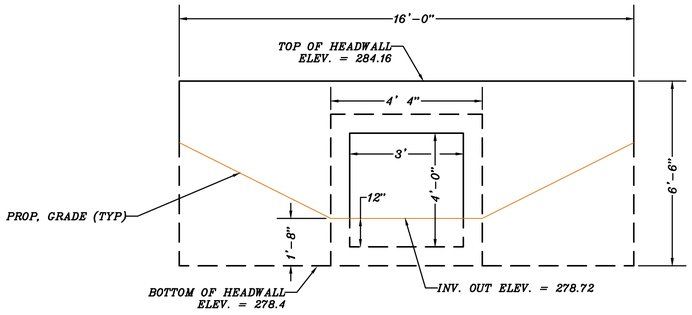


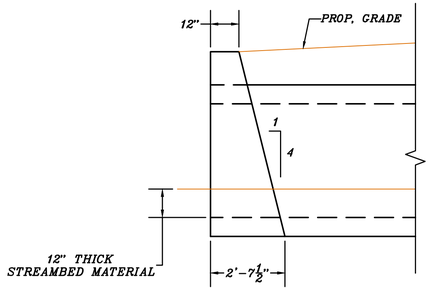
PLAN VIEW – UPSTREAM END



FRONT ELEVATION VIEW – UPSTREAM END



FRONT ELEVATION VIEW – DOWNSTREAM END



SIDE ELEVATION VIEW

HEADWALL DETAILS
FRANKLIN STREET BOX CULVERT
SCALE: 1/4" = 1'-0"

DIMENSIONS SHOWN ARE TO PAYMENT LINES. MORTAR RUBBLE MASONRY TO BE STEPPED OUTSIDE PAYMENT LINES ON SLOPING FACES.

2:1 SLOPE

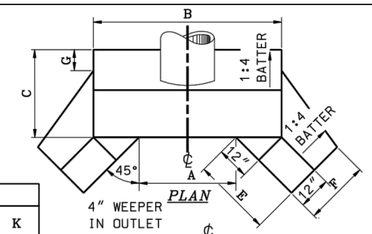
DIAMETER D INCHES	QUANTITIES PER HEADER M.R.M. CU. YD.	QUANTITIES PER HEADER EXC. FOR 1' DEPTH CU. YD.	DIMENSIONS A	B	C	E	F	G	H	I	J	K
24	2.45	1.89	2'-6"	5'-4"	2'-3"	2'-11"	1'-11"	0'-6"	5'-0"	4'-6"	3'-10"	1'-6"
30	3.19	2.28	3-1	5-11	2-5	3-6	2-0	0-5	5-6	5-0	4-1	1-6
36	4.03	2.57	3-8	6-6	2-6	4-1	2-1	0-4	6-0	5-6	4-4	1-6
42	5.50	3.09	4-3	7-1	2-8	5-0	2-2	0-3	6-9	6-3	4-10	1-9
48	6.68	3.53	4-10	7-8	2-10	5-8	2-3	0-2	7-3	6-9	5-1	1-9
54	7.92	3.95	5-5	8-3	2-11	6-3	2-4	0-1	7-9	7-3	5-4	1-9
60	9.39	4.40	6-0	8-10	3-1	6-10	2-5	0-1	8-3	7-9	5-8	1-9
66	10.90	4.81	6-7	9-5	3-2	7-5	2-6	0-0	8-9	8-3	5-11	1-9
72	12.66	5.22	7'-2"	10'-0"	3'-4"	8'-1"	2'-7"	0'-1"	9'-3"	8'-9"	6'-3"	1'-9"

3:1 SLOPE

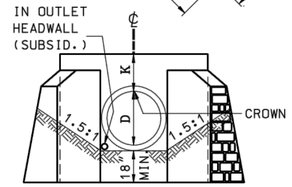
24	2.81	2.09	2'-6"	5'-4"	2'-3"	3'-6"	2'-0"	0'-6"	5'-0"	4'-8"	4'-1"	1'-6"
30	3.73	2.51	3-1	5-11	2-5	4-3	2-1	0-6	5-6	5-2	4-5	1-6
36	4.69	2.90	3-8	6-6	2-6	4-11	2-2	0-4	6-0	5-8	4-9	1-6
42	6.47	3.46	4-3	7-1	2-8	6-0	2-4	0-3	6-9	6-5	5-3	1-9
48	7.85	3.93	4-10	7-8	2-10	6-8	2-5	0-3	7-3	6-11	5-7	1-9
54	9.37	4.37	5-5	8-3	2-11	7-5	2-6	0-2	7-9	7-5	5-11	1-9
60	11.10	4.85	6-0	8-10	3-1	8-1	2-7	0-1	8-3	7-11	6-3	1-9
66	12.95	5.36	6-7	9-5	3-2	8-10	2-8	0-0	8-9	8-5	6-7	1-9
72	15.03	5.86	7'-2"	10'-0"	3'-4"	9'-6"	2'-9"	0'-0"	9'-3"	8'-11"	6'-11"	1'-9"

4:1 SLOPE

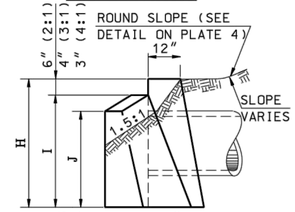
24	3.05	2.21	2'-6"	5'-4"	2'-3"	3'-10"	2'-1"	0'-6"	5'-0"	4'-9"	4'-3"	1'-6"
30	4.02	2.62	3-1	5-11	2-5	4-7	2-2	0-6	5-6	5-3	4-7	1-6
36	5.10	3.03	3-8	6-6	2-6	5-4	2-3	0-4	6-0	5-9	5-0	1-6
42	7.03	3.65	4-3	7-1	2-8	6-6	2-5	0-3	6-9	6-6	5-6	1-9
48	8.60	4.14	4-10	7-8	2-10	7-3	2-6	0-3	7-3	7-0	5-11	1-9
54	10.28	4.62	5-5	8-3	2-11	8-1	2-7	0-2	7-9	7-6	6-3	1-9
60	12.18	5.16	6-0	8-10	3-1	8-10	2-8	0-1	8-3	8-0	6-7	1-9
66	14.24	5.67	6-7	9-5	3-2	9-7	2-9	0-1	8-9	8-6	7-0	1-9
72	16.54	6.21	7'-2"	10'-0"	3'-4"	10'-5"	2'-10"	0'-0"	9'-3"	9'-0"	7'-4"	1'-9"



PLAN



END ELEVATION

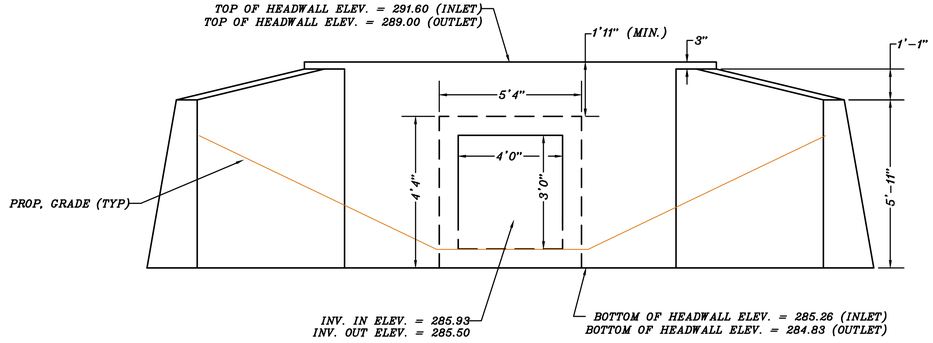


SIDE ELEVATION

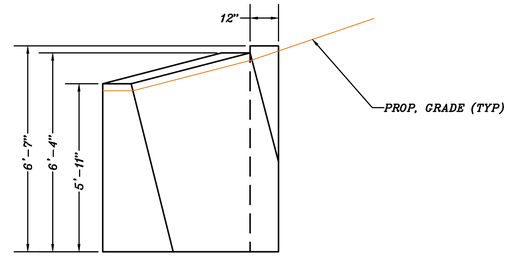
NHDOT STANDARD PLANS

MORTAR RUBBLE MASONRY HEADWALLS WITH 45° WINGS FOR R.C. PIPE P.C.-8

REV. DATE	PLATE
06-16-2010	2
	STANDARD
	HW-1



FRONT ELEVATION VIEW



SIDE ELEVATION VIEW

HEADWALL DETAILS
EVELYN DRIVE BOX CULVERT
SCALE: 1/4" = 1'-0"

GENERAL NOTES:

1. HEADWALL DESIGNS FOR THESE BOX CULVERTS HAVE BEEN ADAPTED FROM NHDOT STANDARD PLANS FOR CONCRETE HEADWALLS FOR CONCRETE PIPE. REFER TO NHDOT STANDARD PLANS AND NHDOT STANDARD SPECIFICATIONS FOR ADDITIONAL DESIGN INFORMATION, INCLUDING REINFORCING STEEL REQUIREMENTS:

   FRANKLIN STREET CULVERT:
   STANDARD PLANS HW-1, PLATE 1. HEADWALL DESIGN FOR SINGLE 48" DIA. PIPE.

   EVELYN DRIVE CULVERT:
   STANDARD PLANS HW-2, PLATE 4. HEADWALL DESIGN FOR TWIN 48" DIA. PIPES WITH 4:1 SLOPE.

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

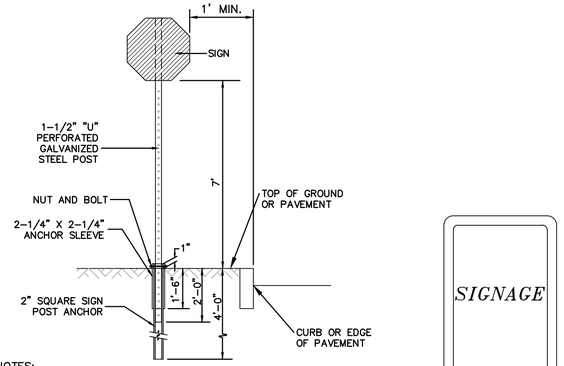
CAST IN PLACE HEADWALL DETAILS FRANKLIN BOX CULVERT & EVELYN BOX CULVERT
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

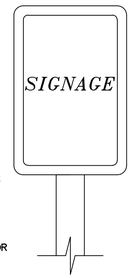
C1



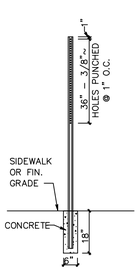
NOTES:

1. ALL SIGNAGE SHALL BE TO THE MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES (MUTCD) STANDARDS AND NHDOT STANDARDS.
2. THE CONTRACTOR SHALL PROVIDE SHOP DRAWNGS/CATALOG CUTS TO THE ENGINEER FOR REVIEW AND APPROVAL PRIOR TO ERECTING SIGNS.
3. THE LOCATION OF THE SIGNS SHALL BE AS INDICATED ON THE DRAWINGS AND/OR AS DIRECTED BY THE CITY OF ROCHESTER DEPARTMENT OF PUBLIC WORKS.

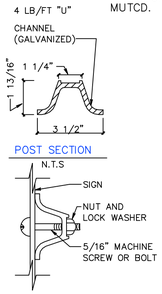
TYPICAL SIGN POST
(NOT TO SCALE)



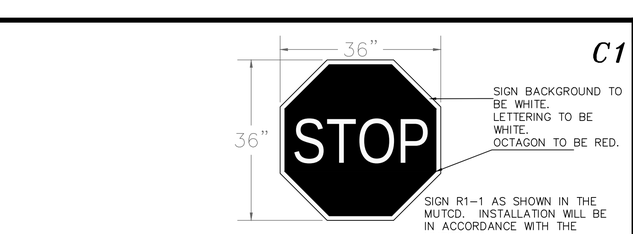
PARTIAL ELEVATION
N.T.S.



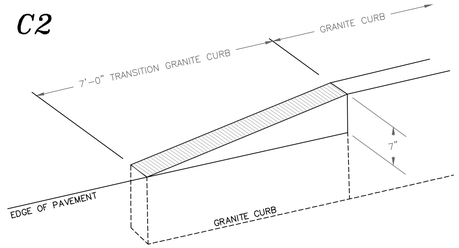
POST
N.T.S.



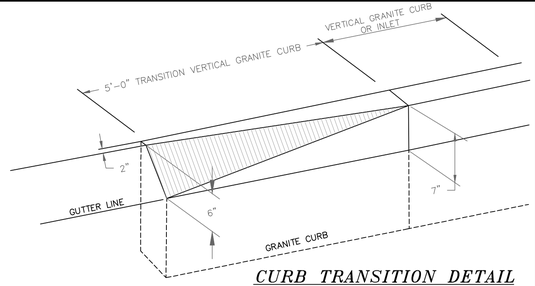
MOUNTING
N.T.S.



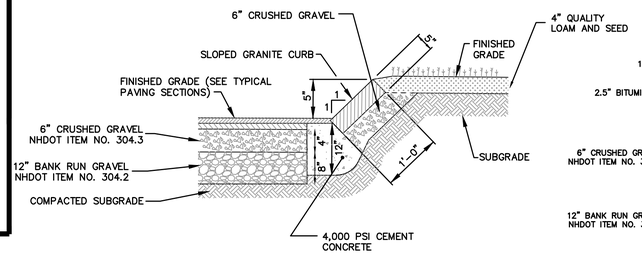
C2



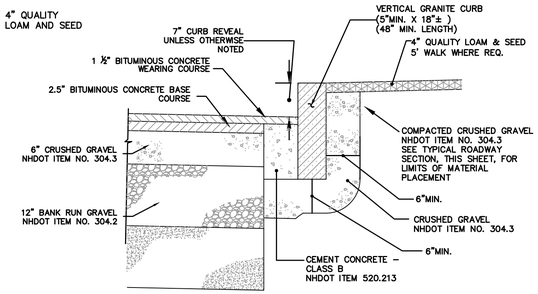
CURB TRANSITION DETAIL
NOT TO SCALE
TO BE USED FOR TRANSITION FROM GRANITE CURB TO EDGE OF PAVEMENT



CURB TRANSITION DETAIL
NOT TO SCALE
TO BE USED FOR TRANSITION FROM VERTICAL GRANITE CURB TO SLOPED GRANITE CURB

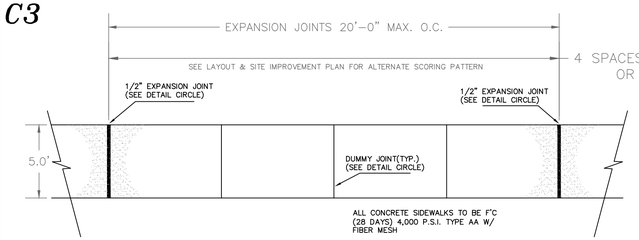


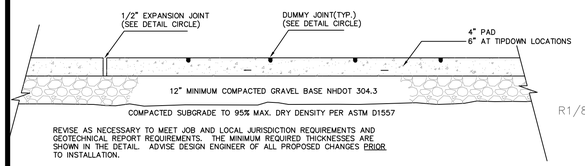
SLOPE GRANITE CURB DETAIL
NOT TO SCALE



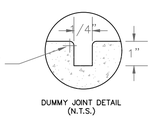
VERTICAL GRANITE CURB DETAIL
NOT TO SCALE

C3



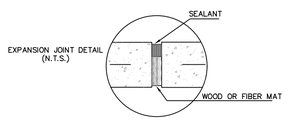


REVISE AS NECESSARY TO MEET JOB AND LOCAL JURISDICTION REQUIREMENTS AND GEOTECHNICAL REPORT REQUIREMENTS. THE MINIMUM REQUIRED THICKNESSES ARE SHOWN IN THE DETAIL. ADVISE DESIGN ENGINEER OF ALL PROPOSED CHANGES PRIOR TO INSTALLATION.

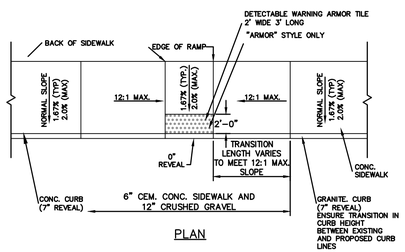


DUMMY JOINT DETAIL
(N.T.S.)

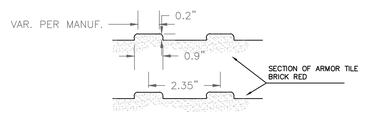
CONCRETE SIDEWALK
NOT TO SCALE

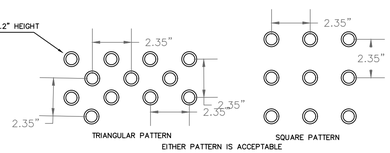


EXPANSION JOINT DETAIL
(N.T.S.)



PLAN



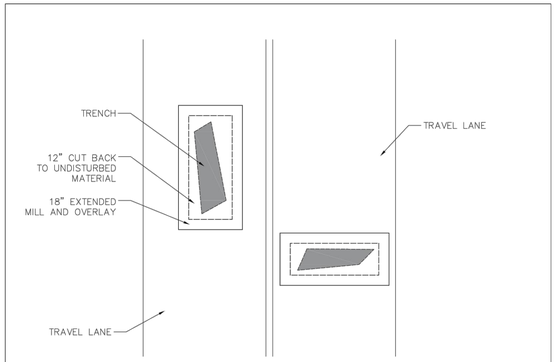


DETECTABLE WARNING SURFACE
NOT TO SCALE

NOTES:

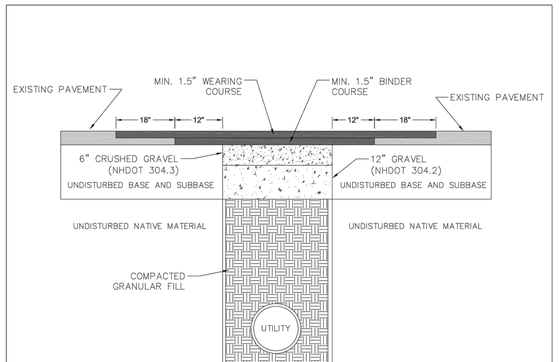
1.) PROVIDE EXPANSION JOINT MATERIAL WHERE CURB RAMP ADJOINS ANY RIGID PAVEMENT, SIDEWALK OR STRUCTURE WITH THE TOP OF JOINT FILLER PLUS SEALANT FLUSH WITH ADJACENT CONCRETE SURFACE.
2.) SEAL JOINTS WITH AN APPROVED SEALING MATERIAL.
3.) PROVIDE SLIP RESISTANT TEXTURE ON CURB RAMP BY COARSE BROOMING TRANSVERSE TO THE SLOPE OF THE RAMP. EXTEND TEXTURE THE FULL WIDTH AND LENGTH OF THE CURB RAMP INCLUDING FLARED SIDE RAMPS.
4.) CURB RAMP AND SIDE FLARE LENGTHS ARE VARIABLE AND BASED ON CURB HEIGHT AND THE SIDEWALK PITCH.
5.) WHENEVER POSSIBLE, CONSTRUCT THE TRANSITION SLOPE FROM THE CURB RAMP AND FLARE SIDES TO ADJOINING SURFACES WITH A GRADUAL CURVE RATHER THAN AN ABRUPT ANGLE.

C4



NOTES:

1. PAVEMENT EDGES SHALL BE DEFINED BY A STRAIGHT EDGE FORMED BY A MACHINED SAW CUT.
2. ALL VERTICAL AND HORIZONTAL JOINTS BETWEEN PAVEMENTS SHALL BE TACK COATED.
3. PAVEMENT THICKNESS SHALL MATCH EXISTING BUT IN NOT CASE SHALL BE LESS THAN 3" TOTAL THICKNESS.
4. PAVEMENT SHALL BE PLACED IN TWO PHASES:
   4.1. THE FIRST PHASE SHALL CONSIST OF CUTTING BACK THE FULL DEPTH OF PAVEMENT 12" BEYOND THE EDGES OF THE DISTURBED TRENCH AND PAVING A BINDER COURSE THE FULL DEPTH OF THE PAVEMENT AS TO BRING THE PATCH FLUSH WITH THE EXISTING ROAD SURFACE.
   4.2. THE SECOND PHASE SHALL BE CONDUCTED THE FOLLOWING YEAR AND SHALL CONSIST OF MILLING OVER THE EDGES OF THE PREVIOUS PATCH BY A MINIMUM OF 18" IN ALL DIRECTIONS TO A DEPTH OF 1.5". WEARING COURSE PAVEMENT SHALL BE USED TO CREATE A SMOOTH SURFACE WITH THE ROADWAY OVER THE EXTENTS OF THE MILLED AREA.
5. ANY TRENCH PATCH REQUIRES PRE-APPROVAL BY DPW AND IS SUBJECT TO INSPECTION TO ENSURE COMPLIANCE WITH CITY STANDARDS.



NOTES:

1. PAVEMENT EDGES SHALL BE DEFINED BY A STRAIGHT EDGE FORMED BY A MACHINED SAW CUT.
2. TRENCH SUBGRADE MATERIAL SHALL BE BACKFILLED WITH GRANULAR FILL AND COMPACTED TO 95% OF ITS MAXIMUM DRY DENSITY
3. TOP 18" OF BACKFILL SHALL BE 6" OF COMPACTED ¾" CRUSHED GRAVEL (NHDOT 304.3) SUPPORTED BY 12" OF COMPACTED GRAVEL (NHDOT 304.2).
4. ALL VERTICAL AND HORIZONTAL JOINTS BETWEEN PAVEMENTS SHALL BE TACK COATED.
5. PAVEMENT THICKNESS SHALL MATCH EXISTING BUT IN NOT CASE SHALL BE LESS THAN 3" THICK TOTAL.
6. PAVEMENT SHALL BE PLACED IN TWO PHASES:
   6.1. THE FIRST PHASE SHALL CONSIST OF CUTTING BACK THE FULL DEPTH OF PAVEMENT 12" BEYOND THE EDGES OF THE DISTURBED TRENCH AND PAVING A BINDER COURSE THE FULL DEPTH OF THE PAVEMENT AS TO BRING THE PATCH FLUSH WITH THE EXISTING ROAD SURFACE.
   6.2. THE SECOND PHASE SHALL BE CONDUCTED THE FOLLOWING YEAR AND SHALL CONSIST OF MILLING OVER THE EDGES OF THE PREVIOUS PATCH BY A MINIMUM OF 18" IN ALL DIRECTIONS TO A DEPTH OF 1.5". WEARING COURSE PAVEMENT SHALL BE USED TO CREATE A SMOOTH SURFACE WITH THE ROADWAY OVER THE EXTENTS OF THE MILLED AREA.
7. ANY TRENCH PATCH REQUIRES PRE-APPROVAL BY DPW AND IS SUBJECT TO INSPECTION TO ENSURE COMPLIANCE WITH CITY STANDARDS.

C-101

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

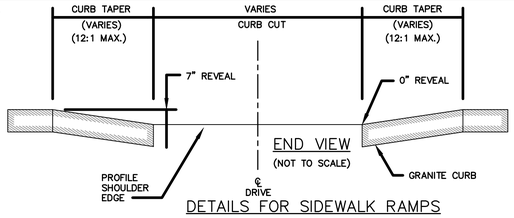
CONSTRUCTION DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

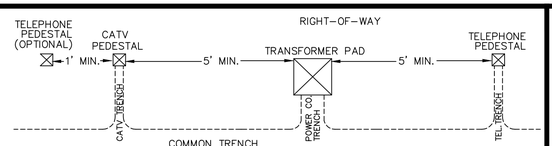
C5



DETAILS FOR SIDEWALK RAMPS

(NOT TO SCALE)

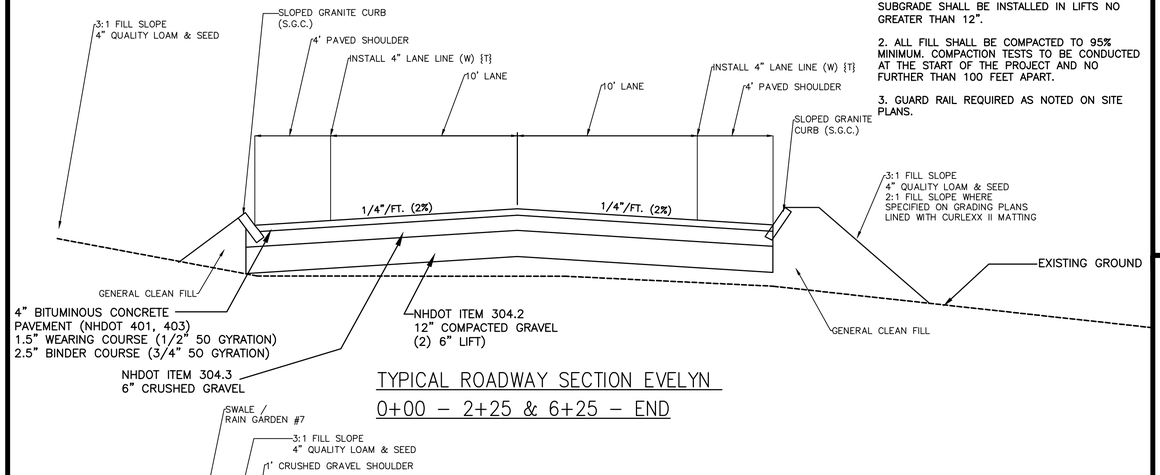
C6



PEDESTAL PLACEMENT

C9

NOT TO SCALE



TYPICAL ROADWAY SECTION EVELYN

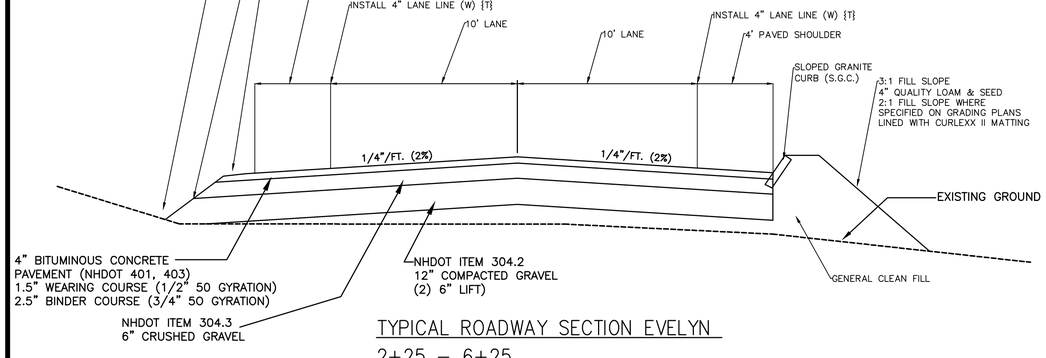
0+00 – 2+25 & 6+25 – END

CROSS SECTION NOTES

1. ALL ROADWAY FILL TO BRING ROAD TO SUBGRADE SHALL BE INSTALLED IN LIFTS NO GREATER THAN 12".

2. ALL FILL SHALL BE COMPACTED TO 95% MINIMUM. COMPACTION TESTS TO BE CONDUCTED AT THE START OF THE PROJECT AND NO FURTHER THAN 100 FEET APART.

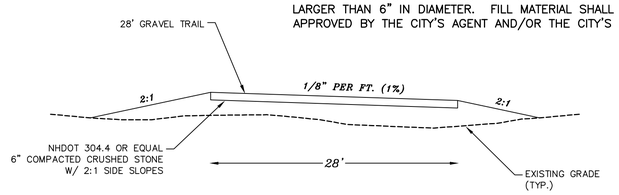
3. GUARD RAIL REQUIRED AS NOTED ON SITE PLANS.



TYPICAL ROADWAY SECTION EVELYN

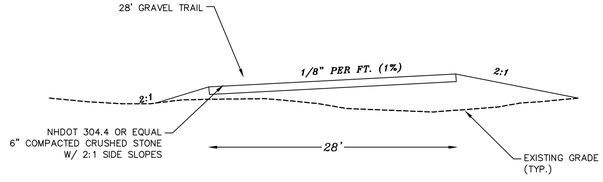
2+25 – 6+25

COMPACTED SUBGRADE – CONTRACTOR SHALL SCARIFY SUBGRADE TO A DEPTH OF 30 INCHES BELOW F–GRADE. ALL STONES GREATER THAN 6" IN DIAMETER SHALL BE REMOVED FROM THE SCARIFIED LAYER. ANY IMPORTED FILL SHALL BE FREE OF ORGANICS AND FROST AND SHALL HAVE NO ROCKS LARGER THAN 6" IN DIAMETER. FILL MATERIAL SHALL BE APPROVED BY THE CITY'S AGENT AND/OR THE CITY'S ENGINEER.



PROPOSED TRAIL CROSS SECTION TO RAIN GARDEN #4

NOT TO SCALE



PROPOSED TRAIL CROSS SECTION TO BETWEEN POND 6 AND RAIN GARDEN 7

NOT TO SCALE

C7

affinit led lighting

AMERICAN BUILT — ASSEMBLED WITH PRIDE BY VETERANS — EE SOMER, NEW HAMPSHIRE

S800 Series Roadway Luminaire

LED Street & Area Lighting

The S800 Series distills the benefits of combining industry-leading components and LED technology with pragmatic design and American-Built reliability. The outstanding photometric performance results in sites with excellent uniformity, allowing greater pole spacing and lower power density. The S800 Series is the best alternative available for traditional street and area lighting with quick payback and improved performance.

Standard Features

- Night Sky Friendly (zero uplight) with integrated backlight-shield
- Reduced-glare optical lenses standard in Type II, Type III and Type V photometric distributions
- Available in 3000K, 4000K and 5000K Correlated Color Temperatures
- Tool-Less Entry with Connect-Safe™ for Lineman Friendly installation
- Die-Cast Aluminum Housing and Housing Door with Ultra-durable powder-coat finish that resists corrosion, abrasion and UV-degradation
- Integrated Tilt Adjustment ±5°
- Built-in Bird-Guard
- Input Voltage: 120-277V or 347-480V, 50/60Hz
- Ambient Operating Temperatures -40°C to +50°C
- Smart Ready with 7-pin Photocontrol Receptacle (per ANSI C136.41) and 0-10V Dimming Capability
- LED Lifetime Rating >120,000 hours L70 @55°C (per IESNA TM-21-11)
- 10-Year Limited Warranty

Product Specifications

EXAMPLE: S80X-XXW-XXK-TX-10-XX-M — S800-65W-40K-T2-10-GR-M

MODEL	POWER	COLOR	DISTRIBUTION	CONTROL OPTION	FINISH	DRIVER
S800	25W 40W 65W	30K: 3000K 40K: 4000K 50K: 5000K 57K: 5700K	T2: Type II T3: Type III T5: Type V	10: 0-10V Dimming	BR: Bronze BL: Black GR: Gray WH: White	M: Meanwell
S801	80W 100W					

affinit led lighting

Sun Valley Lighting

440 Mcgaf Avenue Ct,Palmdale, CA 93551
Phone (661) 233-0300 Fax (661) 233-0301
www.us4fg.com

2016019

SUN VALLEY LIGHTING

C8

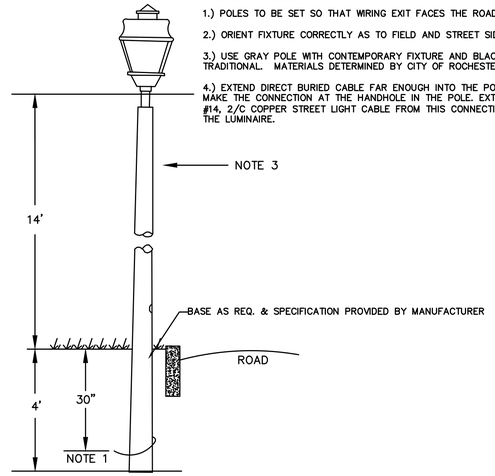
LIGHTING NOTES:

1.) POLES TO BE SET SO THAT WIRING EXIT FACES THE ROAD.

2.) ORIENT FIXTURE CORRECTLY AS TO FIELD AND STREET SIDE.

3.) USE GRAY POLE WITH CONTEMPORARY FIXTURE AND BLACK WITH TRADITIONAL. MATERIALS DETERMINED BY CITY OF ROCHESTER DPW

4.) EXTEND DIRECT BURIED CABLE FAR ENOUGH INTO THE POLE TO MAKE THE CONNECTION AT THE HANDHOLE IN THE POLE. EXTEND #14, 2/C COPPER STREET LIGHT CABLE FROM THIS CONNECTION TO THE LUMINAIRE.



REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

CONSTRUCTION DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 UEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

KENNETH A. BERRY No. 14243 LICENSED PROFESSIONAL ENGINEER – STATE OF NEW HAMPSHIRE

SHEET 97 OF 102

SOLID STATE AREA LIGHTING

SIGMA SERIES-LED

SPECIFICATIONS

PROJECT NAME:

FIXTURE TYPE:

HOUSING
Heavy cast low copper aluminum assembly (A356 alloy, <0.2% copper). Minimum wall thickness is .188". Traditional styling of the housing provided with cast aluminum housing top hinges for easy access.

V-LED® OPTICAL MODULE
Low copper A356 alloy (<.2% copper) cast aluminum housing. Integrated clear, tempered 3/16" glass lens sealed with a continuous silicone gasket protects emitters (LED's) and emitter Reflector-Prism optics, and seals the module from water intrusion and environmental contaminants. LED's are available in standard Neutral White (4000K), or optional Cool White (5000K) or Warm White (3000K). Each emitter is optically controlled by a Reflector-Prism injection molded from H12 acrylic (3 types per module; one from 0° - 50°; one from 50° - 65°; one from 65° - 72°). Each Reflector-Prism has indexing pins for aiming and is secured to an optical plate made of matte black anodized aluminum. The optical plate locates every Reflector-Prism over an emitter. Reflector-Prisms are secured to the optical plate with a UV curing adhesive. The Reflector-Prisms are arrayed to produce IES Type II, III, IV, and V-SQ distributions. The entire Optical Module is field rotatable in 90° increments. Both module and drivers are factory wired using water resistant, insulated cord. Lens, module and drivers are field replaceable.

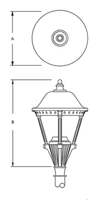
LED EMITTERS
High Output LED's are driven at 350mA for nominal 1 Watt output each. LED's are available in standard Neutral White (4000K), or optional Cool White (5000K) or Warm White (3000K). Consult Factory for other LED options.

LED DRIVER
UL and CUL recognized High Power Factor, Constant Current LED drivers operate on input voltages from 120-277VAC, 50/60hz. Consult Factory for 347-480VAC. Driver is mechanically fastened to a retaining bracket. Main power quick disconnect provided. Driver has a minimum 4KV of internal surge protection, 10KV & 20KV Surge Protector optional. Dimming and High-Low Driver options available.

FINISH
Electrostatically applied TGIC Polyester Powder Coat on substrate prepared with 20 PSI power wash at 140°F. Four step iron phosphate pretreatment for protection and paint adhesion. 400°F bake for maximum hardness and durability. Texture finish is standard.

SIGMA

PATENT PENDING



Fitter supplied to fit over 2 ⅛" X 3"
(73mm X 76mm) tenon.

FIXTURE	A	B
SIG1	24" 610mm	37" 940mm
SIG2	18.5" 470mm	28" 711mm

UL Listed for wet locations

2016019

Sun Valley Lighting

440 Mcgaf Avenue Ct,Palmdale, CA 93551
Phone (661) 233-0300 Fax (661) 233-0301
www.us4fg.com

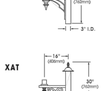
SUN VALLEY LIGHTING

SIGMA SERIES - LED

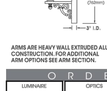
SPECIFICATIONS

MOUNTING STYLES

XAC



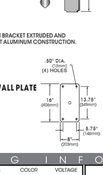
XAZ



XAT

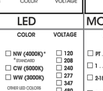
ARMS ARE HEAVY WALL EXTRUDED ALUMINUM CONSTRUCTION. FOR ADDITIONAL ARM OPTIONS SEE ARM SECTION.

WALL MOUNT



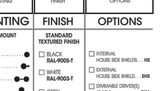
ARM BRACKET EXTRUDED AND CAST ALUMINUM CONSTRUCTION.

WALL PLATE



V-LED® MODULES

SIG1 E.P.A.= 1.65
Available in:
100, 80, & 64
LED Module



SIG2 E.P.A.= 1.05
Available in:
64 & 48
LED Module

ORDERING INFORMATION

LUMINAIRE	OPTICS	# of LED's	COLOR	VOLTAGE	MOUNTING	FINISH	OPTIONS

LUMINAIRE

LUMINAIRE
- ☐ SIG1
- ☐ SIG2

OPTICS

V-LED IES DISTRIBUTION TYPE
- ☐ VLED - II ... (Type II)
- ☐ VLED - III ... (Type III)
- ☐ VLED - IV ... (Type IV)
- ☐ VLED - VSQ ... (Type VSQ)

LED

No. LEDs
- SIG1
  - ☐ 100LED (100 Watts)
  - ☐ 80LED (80 Watts)
  - ☐ 64LED (64 Watts)
- SIG2
  - ☐ 64LED (64 Watts)
  - ☐ 48LED (48 Watts)

COLOR
- ☐ NW (4000K)* *Standard
- ☐ CW (5000K)
- ☐ WW (3000K)

OTHER LED COLOR OPTIONS AVAILABLE. CONSULT FACTORY.

VOLTAGE
- ☐ 120
- ☐ 208
- ☐ 240
- ☐ 277
- ☐ 347
- ☐ 480

MOUNTING

ARM MOUNT
- ☐ PT ... ●
- ☐ 1 ... ●
- ☐ 3-180 ... ●
- ☐ 2-90 ... ●
- ☐ 3-90 ... ●
- ☐ 3-120 ... ●
- ☐ 4-90 ... ●

WALL MOUNT
- ☐ WM ... ●

SEE BACK PAGE OF CATALOG FOR ADDITIONAL ARMS

FINISH

STANDARD TEXTURED FINISH
- ☐ BLACK RAL-9005-T
- ☐ WHITE RAL-9003-T
- ☐ GREY RAL-7004-T
- ☐ DARK BRONZE RAL-8019-T
- ☐ GREEN RAL-6005-T

FOR SMOOTH FINISH REMOVE SUFFIX "T" (EXAMPLE: RAL-9005)

SEE BACK COVER FOR ADDITIONAL COLORS

OPTIONS
- ☐ INTERNAL HOUSE SIDE SHIELDS ... HS
- ☐ EXTERNAL HOUSE SIDE SHIELDS ... EHS
- ☐ DIMMABLE DRIVER(S) (0-10V) ... DIM
- ☐ HIGH/LOW DIMMING FOR HARDWIRED SWITCHING OR NON-PHOTOSENSED MOTION SENSOR ... HLDW
- ☐ PHOTO CELL + VOLTAGE (EXAMPLE: PC120V) ... PC+V
- ☐ 10KV SURGE PROTECTOR ... 10SP
- ☐ 20KV SURGE PROTECTOR (DTV & 480V Only) ... 20SP

Sun Valley Lighting

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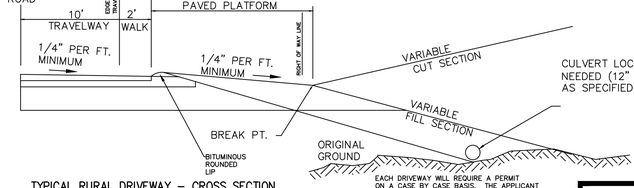
www.us4fg.com

SUN VALLEY LIGHTING

C10



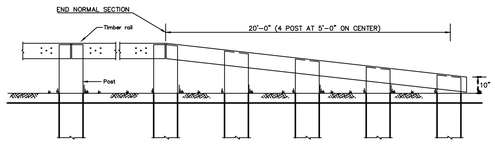
TYPICAL RURAL DRIVEWAY – CROSS SECTION

NOT TO SCALE

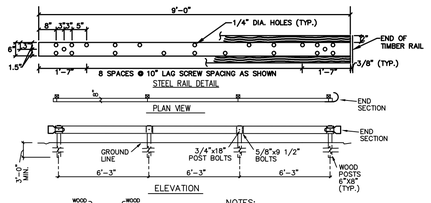
EACH DRIVEWAY WILL REQUIRE A PERMIT ON A CASE BY CASE BASIS. THE APPLICANT AT THAT TIME IS TO WORK WITH DPW TO DETERMINE THE MOST APPROPRIATE PLATFORM AND DRIVEWAY SLOPE / GRADING. THE APPLICANT SHOULD SUBMIT A DETAILED DRAWING FOR REVIEW AS PART OF THE DRIVEWAY PERMIT APPLICATION PROCESS.

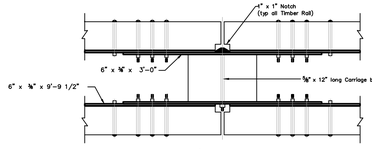
C–102

C11

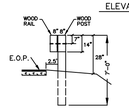


STEEL BACKED WOOD GUARD RAIL
TERMINAL UNIT DETAIL





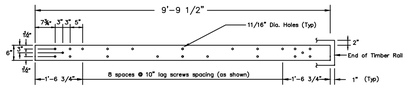
POST/RAIL CONNECTION DETAIL



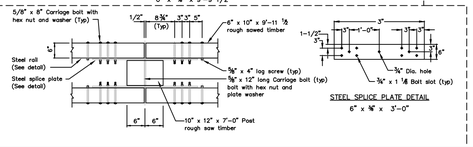
NOTES:
1. USE IN HEAVY TRAFFIC AREAS.
2. USE 6'-0" POSTS WHEN FILL SLOPE IS 4:1 OR FLATTER
3. ALL RAILS & POSTS TO BE TREATED WITH PRESERVATIVE MATERIAL CONFORMING TO AASHTO M133

NOTES:
1. POST TYPE : 10" x 12" WOOD
2. BEAM TYPE : 6" x 10" WOOD WITH STEEL PLATE BACKING
3. POST SPACING : 5'-0" O.C.
4. NOMINAL BARRIER HEIGHT : 27"

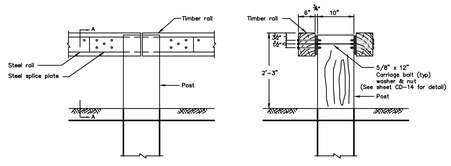
GUARD RAIL (STEEL BACKED WOODEN RAIL)
NOT TO SCALE



STEEL RAIL DETAIL
6" x 9/16" x 9'-9 1/2"

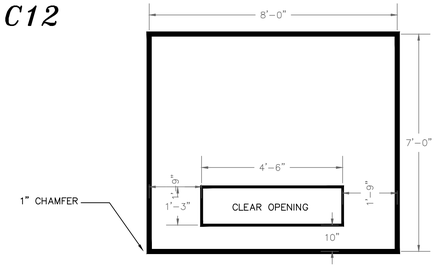


STEEL SPLICE PLATE DETAIL
6" x 9/16" x 3'-0"

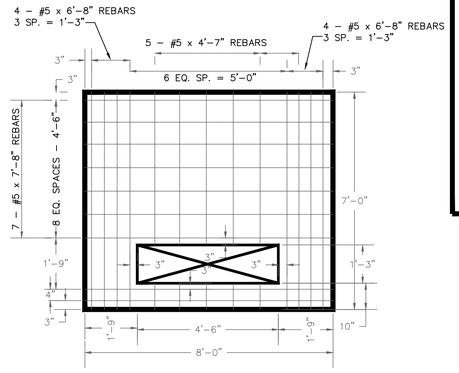


NOTES:
1. POST TYPE : 10" x 12" WOOD
2. BEAM TYPE : 6" x 10" WOOD WITH STEEL PLATE BACKING
3. POST SPACING : 10'-0" O.C.
4. NOMINAL BARRIER HEIGHT : 27"
5. STEEL PLATE BACKING AND SPLICE PLATE – A36 GALVANIZED STEEL
6. ALL BOLTS & WASHERS TO BE GALVANIZED

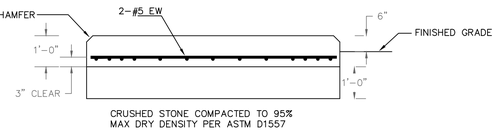
C12



PLAN VIEW



PLAN OF REINFORCING



CRUSHED STONE COMPACTED TO 95% MAX DRY DENSITY PER ASTM D1557

SECTION VIEW

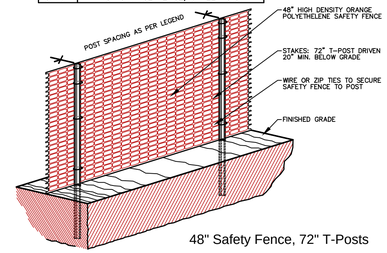
NOTES:
1.) CONFIRM SIZE WITH ELECTRIC COMPANY BEFORE CONSTRUCTION.
2.) USE LOCAL ELECTRIC COMPANY DETAILS AS REQUIRED.

TRANSFORMER PAD DETAIL
NOT TO SCALE

C13

LEGEND

SAF12	48" ORANGE FENCE, 12 FEET O.C.
SAF11	48" ORANGE FENCE, 11 FEET O.C..
SAF10	48" ORANGE FENCE, 10 FEET O.C.
SAF9	48" ORANGE FENCE, 9 FEET O.C.
SAF8	48" ORANGE FENCE, 8 FEET O.C..
SAF7	48" ORANGE FENCE, 7 FEET O.C.
SAF6	48" ORANGE FENCE, 6 FEET O.C.



48" Safety Fence, 72" T-Posts

1. ALL SENSITIVE AREAS SHALL BE PROTECTED AS PER PLAN.
2. ALL TREES IN THE CONSTRUCTION AREA NOT SPECIFICALLY DESIGNATED FOR REMOVAL SHALL BE PRESERVED AND PROTECTED WITH HIGH VISIBILITY FENCE AS PER PLAN.
3. WHEN PRACTICABLE, INSTALL HIGH VISIBILITY 3 FEET OUTSIDE OF THE DRIP LINE OF THE TREE.
4. SAFETY FENCE SHOULD BE FASTENED SECURELY TO THE T-POSTS.
5. THE FENCING MUST REMAIN IN PLACE DURING ALL PHASES OF CONSTRUCTION; ANY CHANGE OF THE PROTECTIVE FENCING MUST BE APPROVED.

CONSTRUCTION SAFETY FENCE
NOT TO SCALE

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
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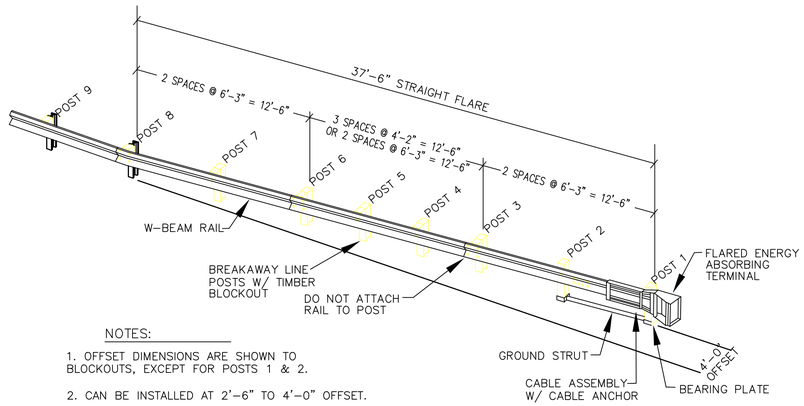
CONSTRUCTION DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223 LOT 21

C14



NOTES:

1. OFFSET DIMENSIONS ARE SHOWN TO BLOCKOUTS, EXCEPT FOR POSTS 1 & 2.

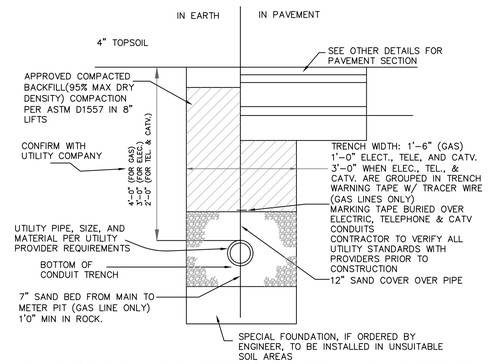
2. CAN BE INSTALLED AT 2'–6" TO 4'–0" OFFSET.

3. WOOD OR STEEL BREAKAWAY POSTS MUST BE USED FOR THIS SYSTEM.

4. NCHRP 350 TEST LEVEL 3 (37'6") LONG SYSTEM IS SHOWN. A REDUCED SPEED TEST LEVEL 2 (25'–0" LONG) SYSTEM IS ALSO AVAILABLE.

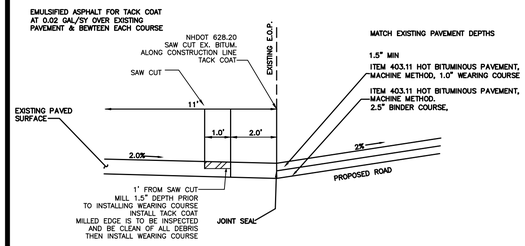
NHDOT GUARD RAIL DETAIL
NOT TO SCALE

C15



ELECTRICAL, TELEPHONE, AND GAS TRENCH
NOT TO SCALE

C16



TYPICAL EDGE LINE CONSTRUCTION
NOT TO SCALE

C-103

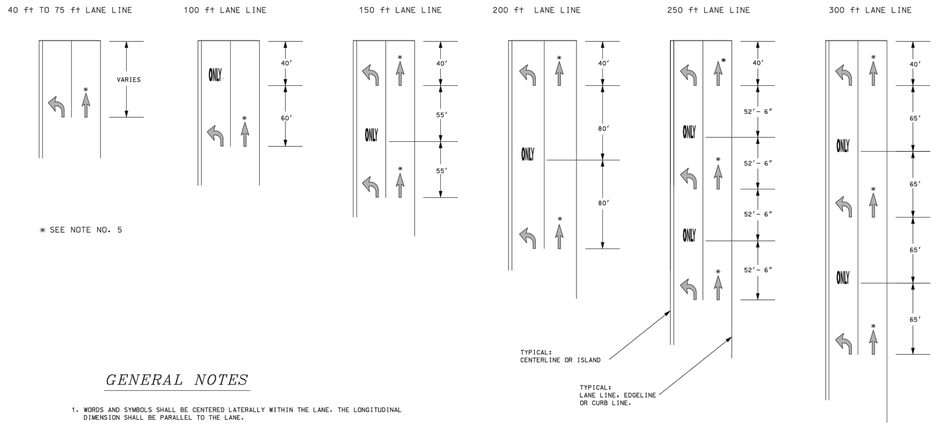
BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

C17

WORD AND SYMBOL LAYOUT



GENERAL NOTES

1. WORDS AND SYMBOLS SHALL BE CENTERED LATERALLY WITHIN THE LANE. THE LONGITUDINAL DIMENSION SHALL BE PARALLEL TO THE LANE.
2. LONGITUDINAL SPACING BETWEEN SUCCESSIVE WORDS AND/OR SYMBOLS IN TURN LANES SHOULD BE AT LEAST 4 TIMES AND NO GREATER THAN 10 TIMES THE HEIGHT OF THE LARGEST CHARACTER.
3. THE STOP LINE MAY NOT BE PRESENT.
4. SEE WORDS AND SYMBOLS, PM-10A, FOR WORDS AND SYMBOL DETAILS.
5. STRAIGHT THROUGH ARROWS AS REQUIRED. SEE THE PAVEMENT MARKING PLANS FOR THE APPROPRIATE LAYOUT.
6. TO COMPLETE ARROW AND "ONLY" LAYOUT FOR LANE LENGTHS NOT SHOWN: (LENGTH OF LANE LINE -40') / NUMBER OF INCREMENTS.
7. WORDS, LANE LINES AND SYMBOLS SHALL BE THERMOPLASTIC (T).

STANDARD NO. PM-8
REVISION DATE: 07-13-2001, 02-26-2010
* DGN FILE NAME: PM-8

STANDARD PLANS

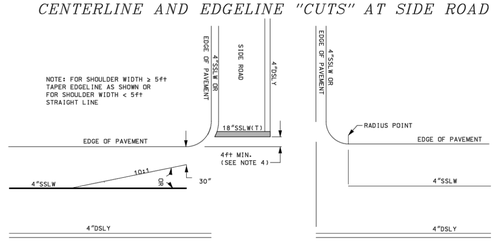
New Hampshire DOT Department of Transportation

PAVEMENT MARKING STANDARD

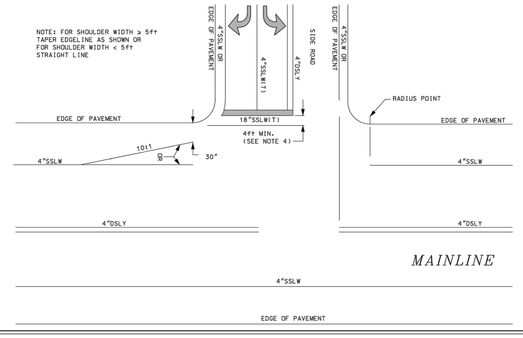
WORD AND SYMBOL LAYOUT

STANDARD NO. PM-8

CENTERLINE AND EDGELINE "CUTS" AT SIDE ROAD



CENTERLINE AND EDGELINE "CUTS" AT SIDE ROAD W/ TURN LANES



GENERAL NOTES

1. EDGELINE DETAILS SHOWN ARE FOR MAINLINE ROADWAYS WITHOUT TURN LANES. THE PRESENCE OF TURN LANES MAY REQUIRE DIFFERENT EDGELINE TREATMENTS.
2. EDGELINES ON SIDE ROADS, WHEN CALLED FOR, SHALL FOLLOW THE ABOVE MAINLINE TYPICALS. EDGELINES SHALL NOT BE CONTINUOUS AROUND THE MAINLINE/SIDE ROAD RADIUS. EDGELINES SHALL END AT STOP BARS.
3. CENTERLINE AND EDGELINE SHALL BE CONTINUOUS PAST RESIDENTIAL DRIVEWAYS. CENTERLINE AND EDGELINE SHALL BREAK FOR COMMERCIAL DRIVES W/TRAFFIC CONTROLS. MINOR SIDE ROADS OR PRIVATE ROAD INTERSECTIONS.
4. LOCATION OF THE STOP LINE MAY VARY DUE TO INTERSECTION SIGHT DISTANCE AND VEHICLE TURNING RADIUS, AND MAY NOT ALWAYS COINCIDE WITH THE LOCATION OF THE STOP SIGN.
5. IF THERE IS NO EDGELINE, END STOP BAR 12" FROM EDGE OF PAVEMENT.
6. STOP BARS, WORDS, LANE LINES, SYMBOLS AND ARROWS SHALL BE THERMOPLASTIC (T).

STANDARD NO. PM-9
REVISION DATE: 07-13-2001, 02-26-2010
* DGN FILE NAME: PM-9

STANDARD PLANS

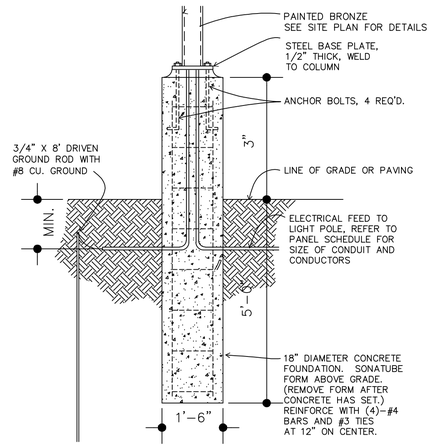
New Hampshire DOT Department of Transportation

PAVEMENT MARKING STANDARD

PAVEMENT MARKINGS AT MINOR INTERSECTIONS

STANDARD NO. PM-9

C18



POLE FOUNDATION

LIGHT BASE DETAIL

SCALE: NONE

REVISION	DATE	DESCRIPTION
#9	08-15-18	PER NHDES WWEB REVIEW
#8A	07-26-18	CONDITIONS OF APPROVAL
#7	03-01-18	REVISED PER AoT
#6	1-11-18	REVISED PER AOT & TRG (12-19-17 LETTER)
#5	12-2-17	CLARIFY IMPACTS FOR NHDES
#3	07-28-17	REVISED DRAINAGE DESIGN FEATURES

NHDOT PAVEMENT MARKING DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

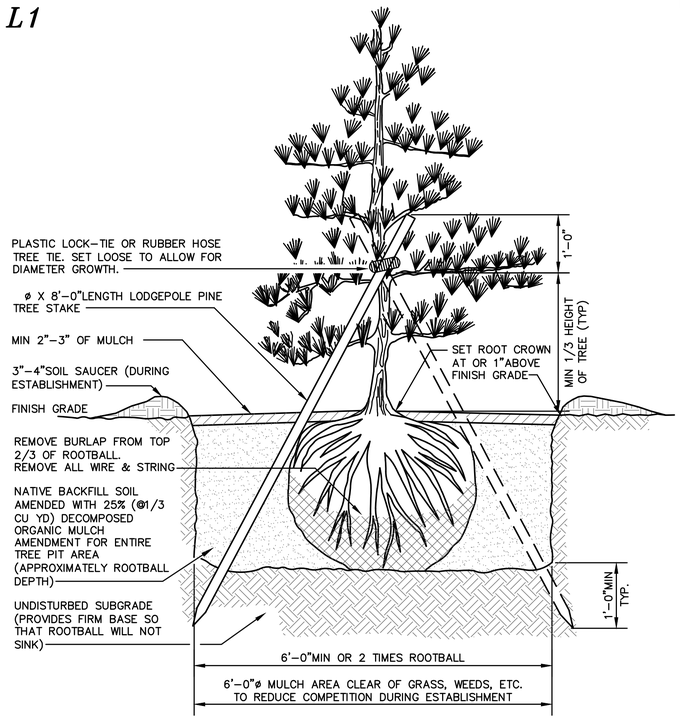
BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 - 114

STATE OF NEW HAMPSHIRE
KENNETH A. BERRY
No. 14243
LICENSED PROFESSIONAL ENGINEER

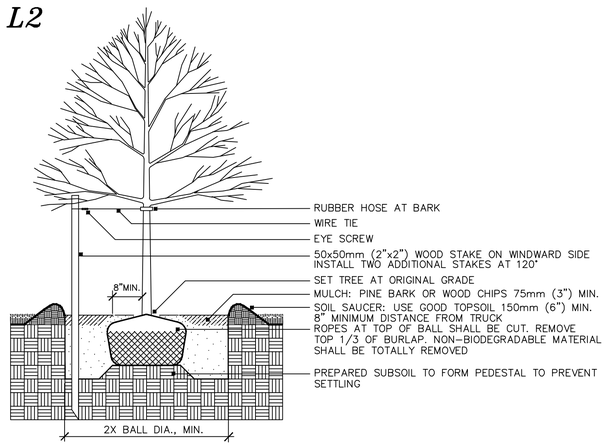
C-104

L1



CONIFERIOUS TREE PLANTING

L2



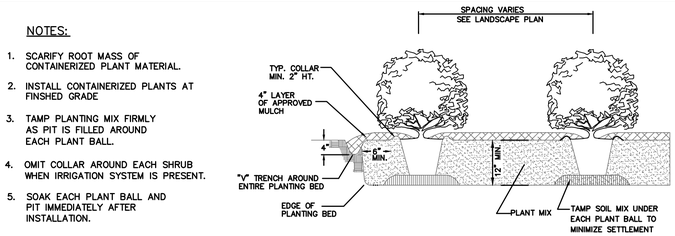
DECIDUOUS TREE PLANTING

NOTE: STAKING TO BE USED IN PARKING ISLANDS AND OTHER CONFINED AREAS AS NECESSARY TO AVOID CONFLICTS WITH PEDESTRIANS

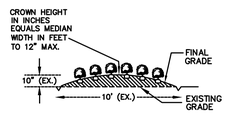
L3

NOTES:

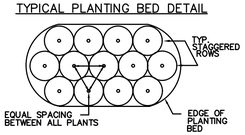
1. SCARIFY ROOT MASS OF CONTAINERIZED PLANT MATERIAL.
2. INSTALL CONTAINERIZED PLANTS AT FINSHED GRADE
3. TAMP PLANTING MIX FIRMLY AS PIT IS FILLED AROUND EACH PLANT BALL.
4. OMIT COLLAR AROUND EACH SHRUB WHEN IRRIGATION SYSTEM IS PRESENT.
5. SOAK EACH PLANT BALL AND PIT IMMEDIATELY AFTER INSTALLATION.



TYPICAL PLANTING BED DETAIL



TYPICAL BED CROWNING

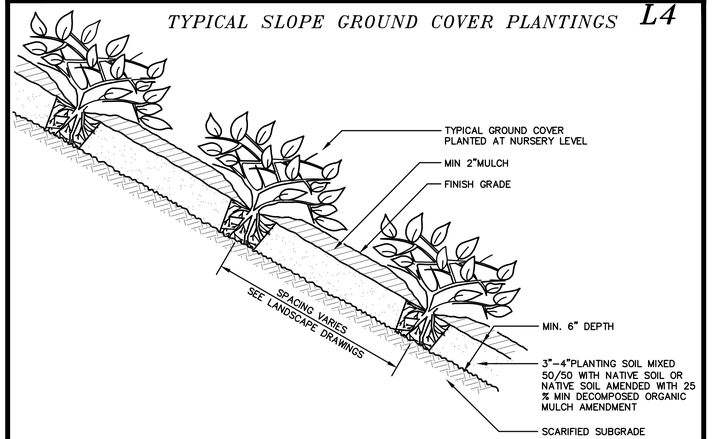


TYPICAL PLANTING BED PLAN

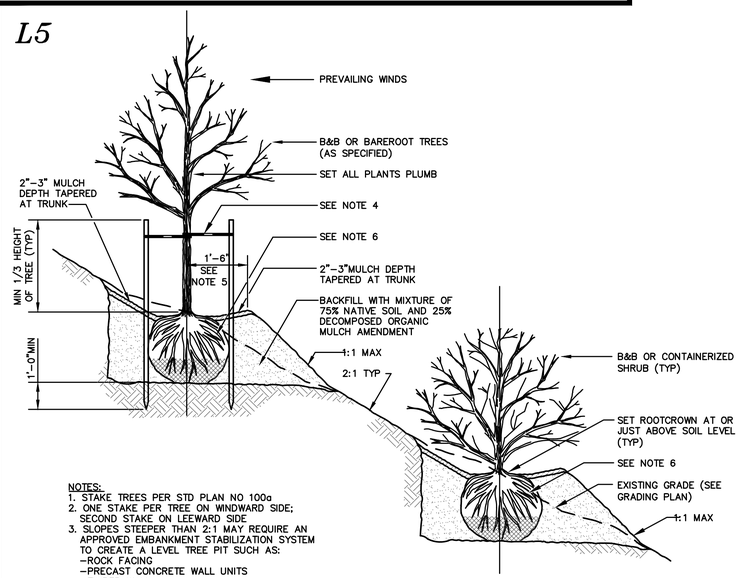
SHRUB & HEDGE PLANTING

L4

TYPICAL SLOPE GROUND COVER PLANTINGS



L5



NOTES:
1. STAKE TREES PER STD PLAN NO 100a
2. ONE STAKE PER TREE ON WINDWARD SIDE; SECOND STAKE ON LEEWARD SIDE
3. SLOPES STEEPER THAN 2:1 MAY REQUIRE AN APPROVED EMBANKMENT STABILIZATION SYSTEM TO CREATE A LEVEL TREE PIT SUCH AS:
   –ROCK FACING
   –PRECAST CONCRETE WALL UNITS
   –TIMBER WALL
   –MANUFACTURED SLOPE RETENTION UNITS
4. CHAINLOCK TREE TIE. LOOP EACH TIE AROUND TREE LOOSELY TO PROVIDE 1" SLACK FOR DIAMETER GROWTH.
5. SHAPE SOIL TO PROVIDE 3' DIAMETER OR ROOTBALL DIAMETER, WHICHEVER IS GREATER, WATERING RING.
6. REMOVE ALL WIRE AND STRING. REMOVE TOP 2/3 OF BURLAP.

TREE PLANTING ON SLOPES

L6

NOTES:

1.) CALL DIG SAFE PRIOR TO BEGINNING WORK. (1–888–344–7233). THE LANDSCAPE CONTRACTOR IS ADVISED OF THE PRESENCE OF UNDERGROUND UTILITIES AND SHALL VERIFY THE EXISTENCE AND LOCATION OF THE SAME BEFORE COMMENCING AND DIGGING OPERATIONS. THE LANDSCAPE CONTRACTOR SHALL REPLACE OR REPAIR UTILITIES, PAVING, WALKS, CURBING, ETC DAMAGED IN PERFORMANCE OF THIS JOB AT NO ADDITIONAL COST TO THE OWNER OR GENERAL CONTRACTOR.

2.) CONTRACTOR SHALL THOROUGHLY FAMILIARIZE THEMSELVES WITH ALL SITE CONDITIONS PRIOR TO CONSTRUCTION BIDDING. SEE NOTE B ON OVERALL SITE PLAN.

3.) PROVIDED SMOOTH TRANSITION WHERE NEW WORK MEETS EXISTING CONDITIONS.

4.) ALL PLANT MATERIAL INSTALLED SHALL MEET THE SPECIFICATIONS OF "AMERICAN STANDARD FOR NURSERY STOCK" BY THE AMERICAN ASSOCIATION OF NURSERYMEN

5.) ALL PLANT MATERIALS SHALL BE FREE FROM INSECTS AND DISEASE.

6.) ALL PLANTINGS SHALL BE DONE IN ACCORDANCE WITH ACCEPTABLE HORTICULTURAL PRACTICES. THIS IS TO INCLUDE PROPER PLANTING MIX, PLANT BED AND TREE PIT PREPARATION, PRUNING STAKING OR GUYING, WRAPPING, SPRAYING, FERTILIZATION, PLANTING AND ADEQUATE MAINTENANCE UNTIL ACCEPTANCE FROM OWNER.

7.) ALL GRASS, OTHER VEGETATION AND DEBRIS SHALL BE REMOVED FROM ALL PLANTING AREAS PRIOR TO PLANTING.

8.) THE GENERAL CONTRACTOR SHALL BE RESPONSIBLE FOR THE PROTECTION OF EXISTING AND NEWLY PLANTED TREES AND SHRUBS DURING THE CONSTRUCTION PROCESS. WHERE REQUIRED, THE CONTRACTOR SHALL INSTALL TEMPORARY FENCING (SNOW OR EQUAL) AROUND EXISTING TREES AND SHRUBS THAT COULD BE IMPACTED BY THE CONSTRUCTION PROCESS. STORAGE OF CONSTRUCTION EQUIPMENT, CONSTRUCTION MATERIALS, SNOW STORAGE AND OR VEHICLE PARKING SHALL NOT BE PERMITTED WITHIN THE DRIP LINE OF TREES OR TWENTY FEET WHICH EVER IS GREATER.

9.) NEW PLANTINGS SHALL BE INSTALLED PER PROJECT DRAWINGS AND SPECIFICATION THAT INCLUDE FERTILIZATION AND MULCHING AS REQUIRED.

10.) ALL SHRUB BEDS AND TREE PITS SHALL BE MULCHED WITH 3" CLEAN SHREDDED BLACK MULCH

11.) WHERE INDICATED ON PLAN, PLANTING SOIL MIXTURE FOR GROUND COVER AND PERENNIAL BED AREAS SHALL CONSIST OF FOUR PARTS TOPSOIL, TWO PARTS SPHAGNUM PEAT MOSS, AND ONE PART HORTICULTURAL PERLITE BY VOLUME. PEAT MOSS MAY BE SUBSTITUTED WITH WELL–ROTTED OR DEHYDRATED MANURE OR COMPOST. ROTOTILL BEDS TO A DEPTH OF 8 INCHES.

12.) MAINTENANCE OF NEW PLANTINGS AND LAWNS SHALL BE THE RESPONSIBILITY OF THE GENERAL CONTRACTOR AND OR LANDSCAPE SUBCONTRACTOR UNTIL ACCEPTANCE BY THE OWNER. RESPONSIBILITIES SHALL INCLUDE WATERING WEEDING AND MOWNG AS NECESSARY. ALL PLANT MATERIAL SHALL BE GUARANTEED FOR A PERIOD OF ONE YEAR FROM THE DATE OF ACCEPTANCE, REPLACEMENT MATERIAL SHALL BE GUARANTEED FOR AND ADDITIONAL YEAR FROM TIME OF INSTALLATION.

13.) THE GENERAL CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTAINING ALL TEMPORARY EROSION CONTROL MEASURES DURING THE CONSTRUCTION PHASE AND UNTIL ALL AREAS HAVE BEEN STABILIZED AND ACCEPTED BY THE OWNER. THE GENERAL CONTRACTOR SHALL PROVIDE WEEKLY INSPECTIONS OF EROSION MEASURE AND IMMEDIATELY AFTER STORM EVENTS AND REPAIR AS NECESSARY.

14.) THE GENERAL CONTRACTOR AND OR THE LANDSCAPE SUBCONTRACTOR SHALL BE RESPONSIBLE FOR THE REMOVAL OF ALL THREE GUYING MATERIAL ONCE PLANT MATERIAL HAS BEEN ESTABLISHED. (MINIMUM OF ONE GROWING SEASON). ALL TEMPORARY EROSION CONTROL MEASURE SHALL BE REMOVED ONCE STABILIZATION OF DISTURBANCE HAS BEEN ACCEPTED BY OWNER.

15.) THE GENERAL CONTRACTOR SHALL BE RESPONSIBLE FOR A MINIMUM OF TWO MOWINGS FOR ALL TURF AREAS OR UNTIL ACCEPTANCE BY THE OWNER. A MINIMUM UNIFORM 75% CATCH OF TURF IS REQUIRED FOR ACCEPTANCE.

16.) ALL PLANTINGS SHALL BE WATERED REGULARLY DURING THEIR FIRST YEAR AND MAINTAINED PERMANENTLY IN GOOD GROWING CONDITION AS AN EFFECTIVE VISUAL SCREEN.

17.) SHRUBS OR TREES WHICH DIE SHALL BE REPLACED WITHIN ONE GROWING SEASON WITH NEW SHRUBS OR TREES TO ENSURE CONTINUED COMPLIANCE WITH APPLICABLE LANDSCAPING REQUIREMENTS.

18.) ALL REQUIRED LANDSCAPING SHALL BE INSTALLED BEFORE OCCUPANCY, OR WITHIN SIX MONTHS IF OCCUPANCY OCCURS DURING WINTER CONDITIONS.

19.) TREES ARE TO BE 2–2.5" CALIPER.

20.) ALL PLANT STOCK SHALL CONFORM TO ANSI Z260.1 – NURSERY STOCK, LATEST EDITIONS (AMERICAN ASSOCIATION OF NURSERYMEN, INC.)

21.) 4" AGED PINEBARK MULCH AND A WEED BARRIER (TY–PAR FABRIC OR APPROVED EQUAL) SHALL BE APPLIED TO ALL SHRUB AND GROUND COVER BEDS. INSTALL WEED BARRIER AS PER MANUFACTURERS RECOMMENDATIONS.

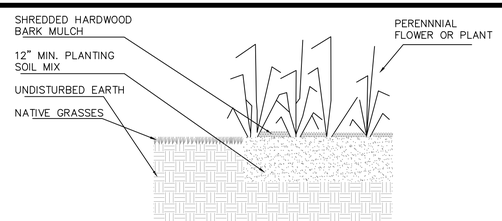
22.) PLANT–PIT BACK–FILL SHALL BE MIXED AT A RATE OF 7 PARTS OF TOPSOIL TO 2 PARTS OF DEHYDRATED COW MANURE. SLOW RELEASE FERTILIZER SHALL BE APPLIED AS PER MANUFACTURERS RECOMMENDATIONS. USE EXISTING ON–SITE TOPSOIL AS PART OF BACK FILL WHEN AVAILABLE.

23.) ALL LANDSCAPED AREAS NOT PLANTED WITH TREES, SHRUBS OR GROUNDCOVER SHALL BE RESTORED WITH SEED OR SOD AS INDICATED ON PLANS.

24.) THE REQUIRED STREET TREES MUST BE PLANTED BY OCTOBER 15 ON ANY LOT FOR WHICH A CERTIFICATE OF OCCUPANCY HAS BEEN ISSUED ON OR PRIOR TO AUGUST 31 OF THAT SAME YEAR. NO ADDITIONAL CERTIFICATES OF OCCUPANCY WILL BE ISSUED IF THIS REQUIREMENT IS NOT MET.

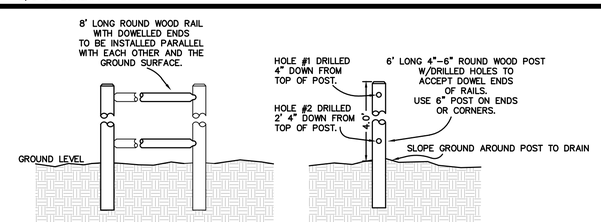
25.) STREET TREES TO BE CHOSEN FROM THE LIST OF APPROVED TREES WITHIN THE CITY OF ROCHESTER AND ARE TO HAVE A MINIMUM OF TWO SPECIES ALTERNATING DOWN THE STREET TO DISCOURAGE A MONO–CULTURE

L8



PERENNIAL PLANTING DETAIL

L7



TYPICAL POST & RAIL FENCE DETAIL

N.T.S.

REVISION	DATE	DESCRIPTION
#9	08–15–18	PER NHDES WWEB REVIEW
#8A	07–26–18	CONDITIONS OF APPROVAL
#7	03–01–18	REVISED PER AoT
#6	1–11–18	REVISED PER AOT & TRG (12–19–17 LETTER)
#5	12–2–17	CLARIFY IMPACTS FOR NHDES
#3	07–28–17	REVISED DRAINAGE DESIGN FEATURES

LANDSCAPING CONSTRUCTION DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603–332–2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

STATE OF NEW HAMPSHIRE – KENNETH A. BERRY No. 14243 – LICENSED PROFESSIONAL ENGINEER

L–101

U1

1.) SEE DETAILS FOR SERVICE CONNECTION REQUIREMENTS

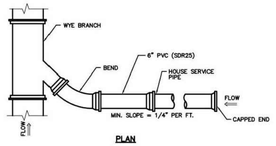
2.) SERVICE CONNECTION SHALL BE INSTALLED BELOW WATER MAIN WHERE POSSIBLE.

3.) CLEANOUTS SHALL BE INSTALLED AT EACH SERVICE CONNECTION.

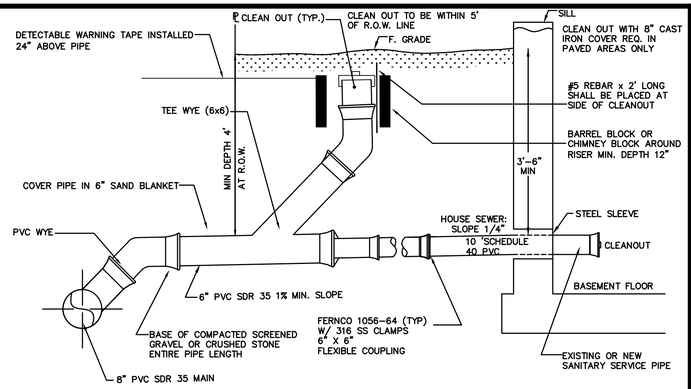
4.) REBAR SHALL BE PLACED AT SIDE OF CLEANOUT.

5.) CLEANOUT SHALL BE USED TO PLUG AND TEST ALL NEW LATERALS WITH MINIMAL INTERRUPTION TO OPERATION OF HOMEOWNER SANITARY SYSTEM

6.) CLEANOUT RISER PIPE AND FITTINGS SHALL BE INSTALLED AT THE TIME OF RESIDENTIAL CONNECTION, AND IS NOT PART OF ROAD CONSTRUCTION.



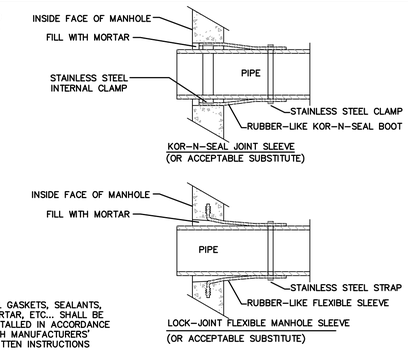
PLAN



DETAIL OF UNIT SEWER SERVICE

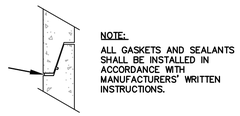
NOT TO SCALE

U2



DETAIL "A" – PIPE TO MANHOLE JOINTS

NOT TO SCALE

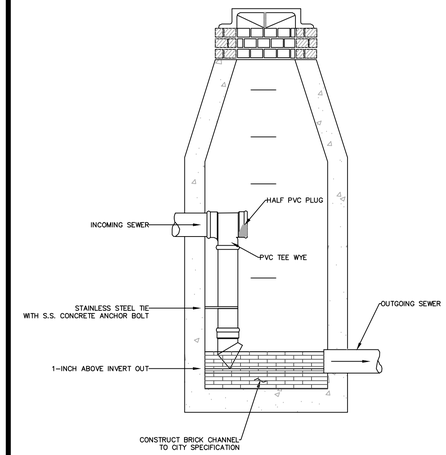


IN THE CASE OF PROPOSED SMH 1A THE CONTRACTOR IS TO FERNCO THE EXISTING V.C. PIPE TO THE PROPOSED SDR 35 STUBS WITHIN THE BASIN.

DETAIL "B" HORIZONTAL JOINTS

NOT TO SCALE

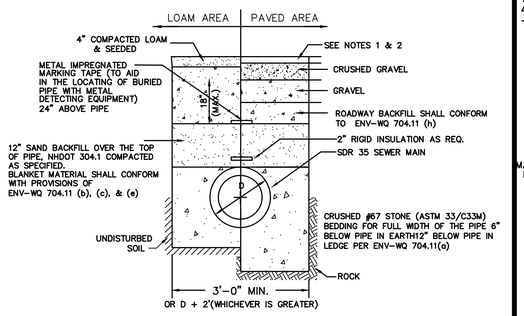
U3



SEWER DROP INLET

NOT TO SCALE

U4

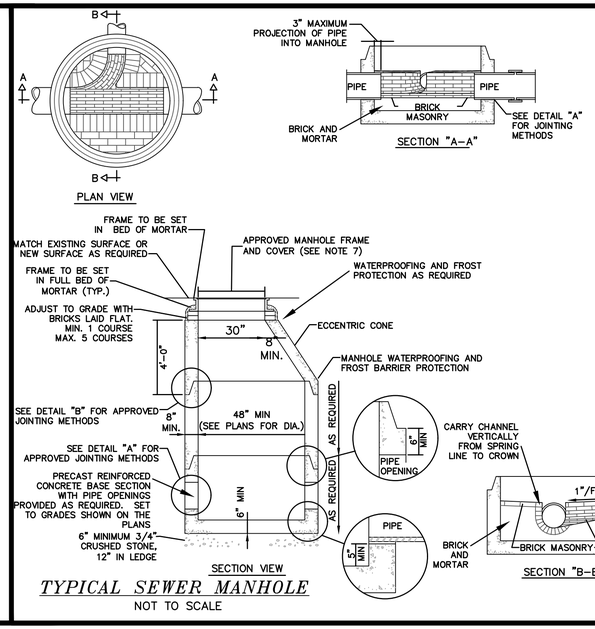


NOTE:

1. PAVEMENT REPAIR IN EXISTING ROADWAYS SHALL CONFORM TO STREET OPENING REGULATIONS.
2. NEW ROADWAY CONSTRUCTION SHALL CONFORM TO SUBDIVISION SPEC'S.
3. ANTI-SEEP COLLARS OR CLAY CHECK DAMS ON STEEP RUNS IN WET CONDITIONS.
4. ALL SEWER INSTALLATIONS SHALL CONFORM TO THE REQUIREMENTS OF NHDES & MUNICIPAL DPW SEWER DIVISION STANDARDS. ALL PVC SEWER PIPE IS TO CONFORM WITH ENV-WQ 704.05 (c)-(e) AND CONFORM WITH ASTM D3034. PVC JOINT SEALS SHALL CONFORM WITH ASTM D3121. SDR-21 PVC FORCE MAIN PIPE MATERIAL IS REQUIRED IN LOCATIONS AS SHOWN. SDR-21 PVC FORCEMAIN PIPE WILL CONFORM TO ENV-WQ 704.08.
5. SEE DETAIL U6 BELOW FOR INSULATION DETAILS.

TYPICAL DRAIN AND SEWER PIPE TRENCH

NOT TO SCALE



TYPICAL SEWER MANHOLE

NOT TO SCALE

U5

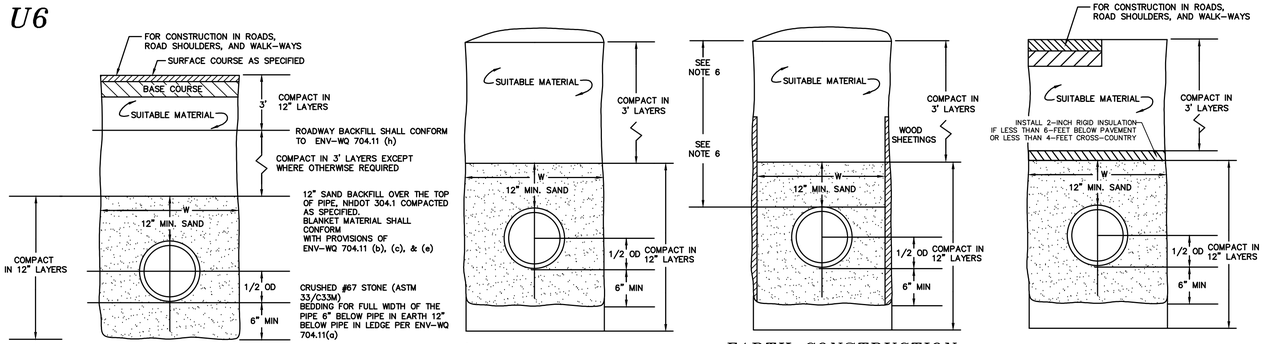
NOTES ON MANHOLE CONSTRUCTION

1) IT IS THE INTENTION THAT THE MANHOLE, INCLUDING ALL COMPONENT PARTS, HAVE ADEQUATE SPACE, STRENGTH AND LEAKPROOF QUALITIES CONSIDERED NECESSARY FOR THE INTENDED SERVICE. SPACE REQUIREMENTS AND CONFIGURATIONS, SHALL BE AS SHOWN ON THE DRAWING. MANHOLES SHALL BE AN ASSEMBLY OF PRECAST SECTIONS, WITH STEEL REINFORCEMENT AND ADEQUATE JOINTING. THE COMPLETE STRUCTURE SHALL BE OF SUCH MATERIAL AND QUALITY AS TO WITHSTAND HS-20-44 LOADING, INCLUDING THE COVER. ALL SMH CONSTRUCTION AND MATERIALS WILL BE IAW ENV.-WQ 704.13 ADOPTED OCTOBER 15, 2014
2) BARRELS AND CONE SECTIONS SHALL BE PRECAST REINFORCED CONCRETE. (IAW ENV.-WQ 704(I))
3) SEWER MANHOLE DIAMETER SHALL BE AS INDICATED ON THE PLANS.
4) PRECAST CONCRETE BARREL SECTIONS, CONES AND BASES SHALL CONFORM TO ASTM C478.
5) GRAVITY SEWER PIPE TESTING WILL BE IN ACCORDANCE WITH ENV.-WQ 704.06 AND MAN HOLE TESTING IAW ENV.-WQ 704.17 DATED OCTOBER 15, 2014.
6) INVERTS AND SHELVES: MANHOLES SHALL HAVE A BRICK PAVED SHELF AND INVERT, CONSTRUCTED TO CONFORM TO THE SIZE OF THE PIPE AND FLOW. INVERT BRICKS SHALL BE LAID ON EDGE AND THE BASE SECTION SHALL BE FULL. AT CHANGES IN DIRECTIONS, THE INVERTS SHALL BE LAID OUT IN CURVES OF THE LONGEST RADIUS POSSIBLE TANGENT TO THE CENTER LINE OF THE SEWER PIPES. CARE SHALL BE TAKEN TO ENSURE THAT THE BRICK INVERT IS A SMOOTH CONTINUATION OF THE SEWER INVERT. SHELVES SHALL BE CONSTRUCTED TO THE ELEVATION OF THE HIGHEST PIPE CROWN AND SLOPE TO DRAIN TOWARD THE FLOWING THROUGH CHANNEL. UNDERLAYMENT OF INVERT AND SHELF SHALL CONSIST OF BRICK MASONRY. (IAW ENV.-WQ 704.13 (a), (9), (c).
7) FRAMES AND COVERS: MANHOLES FRAMES AND COVERS SHALL BE OF HEAVY DUTY DESIGN AND PROVIDE A 30-INCH CLEAR OPENING. 3-INCH (MINIMUM HEIGHT) LETTERS WITH THE WORD "SEWER" SHALL BE PLAINLY CAST INTO THE CENTER OF EACH MANHOLE COVER. (IAW ENV.-WQ 704.13 (a) (4-6)) SEWER MAN HOLE COVERS ARE TO PAMRCK.
8) SHALLOW MANHOLE: IN LIEU OF A CONE SECTION, WHEN MANHOLE DEPTH IS LESS THAN 6 FEET, A REINFORCED CONCRETE SLAB COVER MAY BE USED HAVING AN ECCENTRIC ENTRANCE OPENING AND CAPABLE OF SUPPORTING H-20 LOADS.
9) HORIZONTAL JOINTS BETWEEN SECTIONS OF PRECAST CONCRETE BARRELS SHALL BE OF A TYPE APPROVED BY THE ROCHESTER DPW, WHICH TYPE SHALL, IN GENERAL, DEPEND FOR WATERTIGHTNESS UPON A DOUBLE ROW OF AN OVERLAPPING TYPE ELASTOMERIC OR MASTIC-LIKE GASKET. APPROVED ELASTOMERIC SEALANTS ARE: RAM-NEK, KENT SEAL NO. 2, EZ, OR EQUAL.
10) IN CROSS COUNTRY AREAS OUTSIDE OF THE PAVED ROADWAY SURFACE, THE MANHOLE FRAME ELEVATION SHALL BE A MINIMUM OF 6" ABOVE FINISHED GRADE. GRADE TO PROVIDE POSITIVE DRAINAGE AWAY FROM THE MANHOLE.
11.) ALL FRAMES AND GRATES ARE TO BE U.S.A. MADE. MANHOLE STEPS ARE PROHIBITED IN THIS MUNICIPALITY AND MUST CONFORM TO THE REQUIREMENTS OF ENV-WQ 704.14.
12.) THE CONTRACTOR TO WORK WITH CITY OF ROCHESTER REVIEW ENGINEER AND SEWER DEPARTMENT ON THE MEANS AND METHODS USED TO INSTALL ALL SEWER STRUCTURES. SPECIFIC ATTENTION IS TO BE PAID TO THE INSTALLATION OF SMH 1A, WHEREAS THE EXISTING PIPE SLOPE IS UNKNOWN. DURING LOW FLOW CONDITIONS, CUT AND TEMPORARILY CAP THE EXISTING 8" VC LINE, OR INSTALL TEMPORARY BY-PASS LINE (OF EQUAL SIZE). AFTER INSTALLATION OF NEW BASIN, FERNCO THE NEW SDR 35 PIPES TO THE EXISTING VC LINES. THIS INSTALLATION IS TO BE COORDINATED WITH THE CITY OF ROCHESTER SEWER DEPARTMENT.

NOTES ON SANITARY SEWER DOGHOUSE MANHOLE:

1) MINIMUM 4' DIAMETER MANHOLE.
2) DOGHOUSE STYLE MANHOLE BASE SHALL ONLY BE USED WHERE SPECIFIED ON THE PLANS AND APPROVED BY WAIVER FROM NHDES. OTHERWISE, CONSTRUCTION OF THE MANHOLE SHALL COMPLY ENTIRELY ACCORDING TO THE STANDARD SEWER MANHOLE DETAIL. CONTRACTOR SHALL NOTIFY NHDES IN ADVANCE OF ANY CONSTRUCTION OR TESTING OF THIS STYLE OF MANHOLE TO CONFIRM ANY INTENTIONS TO WITNESS WORK.
3) DOGHOUSE OPENINGS IN PRECAST UNITS ARE TO BE 4" MINIMUM TO 8" MAXIMUM LARGER THAN THE OUTSIDE DIAMETER OF THE EXISTING PIPE.
4) BITUMINOUS WATERPROOF COATING TO BE APPLIED TO ENTIRE EXTERIOR OF MANHOLE.
5) SEE SANITARY MANHOLE DETAIL FOR ADDITIONAL INFORMATION.
6) MANHOLE BASE SECTION SHOWN IN DETAIL, ALL OTHER SECTION AND CONSTRUCTION DETAILS SHALL COMPLY WITH THE SEWER MANHOLE DETAIL.
7) BARREL AND SLAB SECTIONS SHALL BE PRECAST REINFORCED CONCRETE DESIGNED FOR H20 LOADING, AND CONFORMING TO ASTM C478-06 AND AASHTO M-199.
8) INVERT BRICKS SHALL BE LAID ON EDGE.
9) INVERT AND SHELF OF NEW CHANNEL(S) SHALL BE CONSTRUCTED ENTIRELY OF BRICK AND MORTAR. BRICK SHELF SHALL BE CONSTRUCTED TO THE ELEVATION OF THE HIGHEST PIPE CROWN AND SLOPED TO DRAIN TOWARD THE OUTLET.
10) REMOVE MATERIAL BELOW THE PIPE. INSTALL CRUSHED STONE BEDDING AND SET DOGHOUSE STYLE MANHOLE BASE OVER EXISTING PIPE.
11) DOGHOUSE OPENINGS SHALL BE FILLED WITH BRICK AND MORTAR BULKHEADS AND NON-SHRINK GROUT. PARGE EXTERIOR OF THE BRICK BULKHEADS AND WATERPROOF WITH BITUMINOUS COATING. AFTER BULKHEADS ARE CONSTRUCTED, AREA BELOW THE PIPE IS TO BE FILLED WITH CONCRETE.
12) CIRCUMFERENTIAL REINFORCEMENT SHALL CONFORM TO ASTM A-185.
13) BOTTOM REINFORCEMENT SHALL CONFORM TO ASTM A-615 GRADE 60 AND PLACED PER ASTM C-478.
14) BRICK AND MORTAR INVERT AND SHELF TO BE PLACED ONLY AFTER PASSING VACUUM TEST OF THE MANHOLE. CUTTING AND REMOVING TOP SECTION OF EXISTING PIPE WILL ONLY BE DONE AFTER VERIFYING TIGHTNESS VIA A PASSING VACUUM TEST.
15) CARE SHALL BE TAKEN TO ENSURE THAT THE BRICK INVERT IS A SMOOTH CONTINUATION OF THE SEWER INVERT.
16) CONTRACTOR TO VERIFY NUMBER AND LOCATION OF OPENINGS WITH THE UTILITY PLANS.

U6



LEDGE CONSTRUCTION

NOT TO SCALE

EARTH CONSTRUCTION

NOT TO SCALE

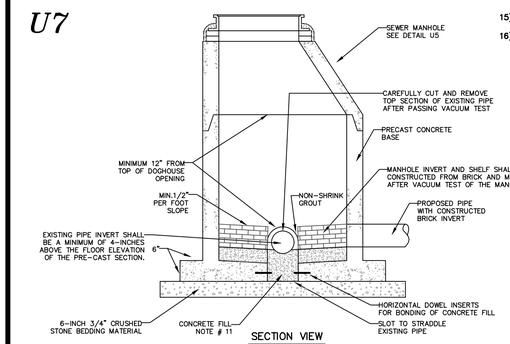
EARTH CONSTRUCTION WITH SHEETING

NOT TO SCALE

TRENCH INSULATION

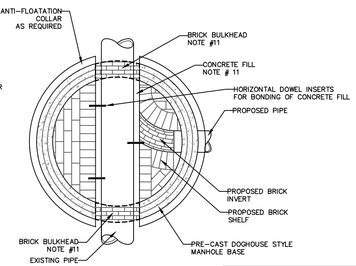
NOT TO SCALE

U7



TYPICAL DOGHOUSE STYLE SEWER MANHOLE

NOT TO SCALE



REVISION	DATE	DESCRIPTION
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UTILITY DETAILS
STUART ACRES
FOR
REAL ESTATE ADVISORS INC.
24 JEREMIAH LANE
ROCHESTER, N.H.
TAX MAP 223, LOT 21

BERRY SURVEYING & ENGINEERING
335 SECOND CROWN POINT ROAD
BARRINGTON, NH 03825 603-332-2863

SCALE : 1 IN. EQUALS AS NOTED FT.
DATE : APRIL 4, 2017
FILE NO. : DB 2015 – 114

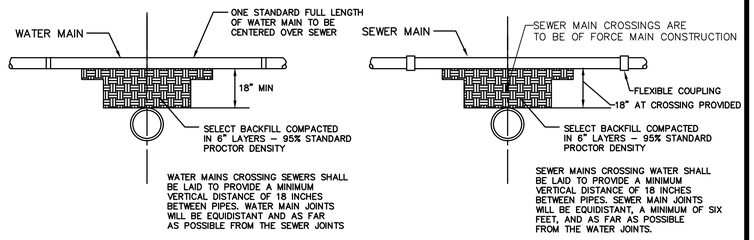
STATE OF NEW HAMPSHIRE – KENNETH A. BERRY No. 14243 – LICENSED PROFESSIONAL ENGINEER

U–101

U8

SEPERATION NOTES:

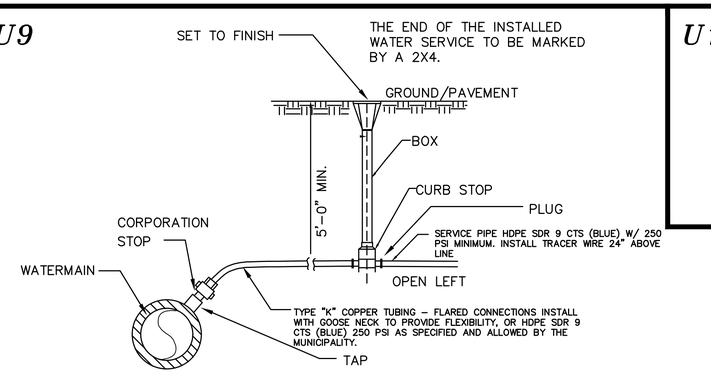
1. WATER MAIN SHALL BE IN ACCORDANCE WITH THE "RECOMMENDED STANDARDS FOR WATER WORKS" SO-CALLED TEN STATE STANDARDS AND NEW HAMPSHIRE WATER SUPPLY AND POLLUTION CONTROL DESIGN STANDARDS, ENV-WQ 700 ADOPTED OCTOBER 14, 2014.
2. WATER MAINS SHALL BE LAID AT LEAST 10 FEET HORIZONTALLY FROM ANY EXISTING OR PROPOSED SEWERS. THE DISTANCE SHALL BE MEASURED EDGE TO EDGE. IF THIS DISTANCE CANNOT BE OBTAINED, THEN THE PIPES SHALL BE INSTALLED IN A SEPARATE TRENCH AT AN ELEVATION SO THE BOTTOM OF THE WATER MAIN IS AT LEAST 18 INCHES ABOVE THE TOP OF THE SEWER.
3. VERTICAL SEPARATION REQUIREMENTS APPLY TO WATER AND SEWER MAINS AND SERVICE LINES. WHERE SEWER CROSSES WATER MAIN AND WATER SERVICE CROSSES SEWER MAIN, 18 INCH VERTICAL CLEARANCE SHALL BE PROVIDED WITH WATER OVER SEWER.



TYPICAL WATER/SEWER SEPERATION DETAILS

NOT TO SCALE

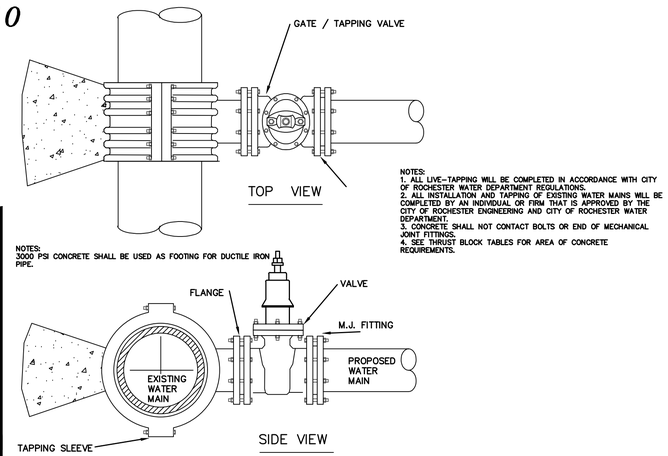
U9



TYPICAL WATER SERVICE CONNECTION

NOT TO SCALE

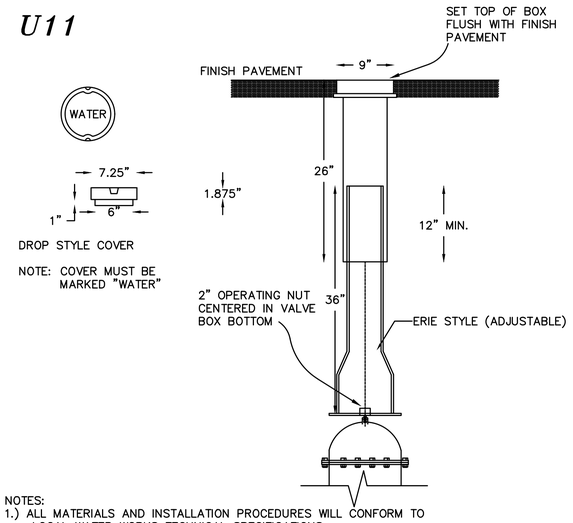
U10



DETAIL FOR STANDARD TAPPING SLEEVE AND VALVE ASSEMBLY

NOT TO SCALE

U11



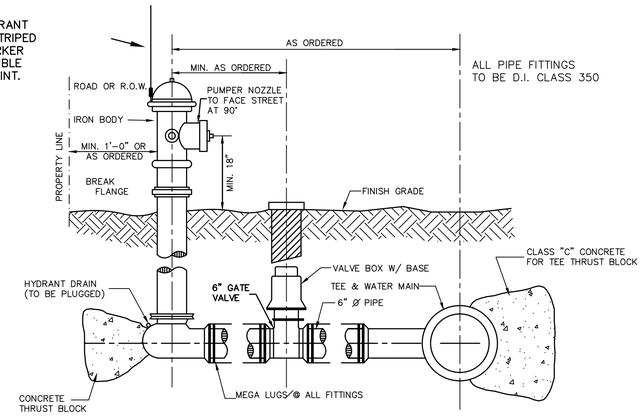
NOTES:
1.) ALL MATERIALS AND INSTALLATION PROCEDURES WILL CONFORM TO LOCAL WATER WORKS TECHNICAL SPECIFICATIONS.

2.) ALL PIPE SHOULD HAVE A MINIMUM DEPTH OF 6' FROM TOP OF PIPE TO FINISH GRADE.

VALVE BOX DETAIL

NOT TO SCALE

U12



NOTES :

1.) THE FIRE HYDRANT IS TO BE PAINTED CITY OF ROCHESTER STANDARD COLORS AND BE EQUIPPED WITH A HYDRANT LOCATOR.
2.) THE FIRE HYDRANT SHALL BE THE "KENNEDY" TYPE OR APPROVED EQUAL.
3.) K81A HYDRANTS AND GATE VALVES OPEN RIGHT

HYDRANT INSTALLATION DETAIL

NOT TO SCALE

U13

TYPICAL THRUST BLOCKS

NOT TO SCALE

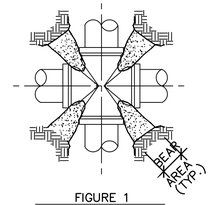


FIGURE 1
CROSS
(ONLY REQ'D IF ANY LEG IS LESS THAN 60 FT. LONG)

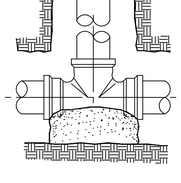


FIGURE 2
TEE, PLUG OR CAP

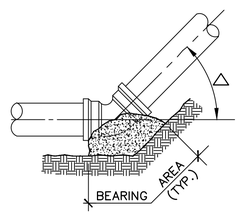


FIGURE 3
HORIZONTAL OR UPWARD VERTICAL BEND

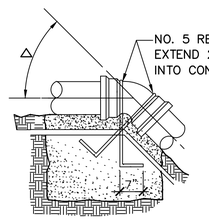


FIGURE 4
DOWNWARD VERTICAL BEND

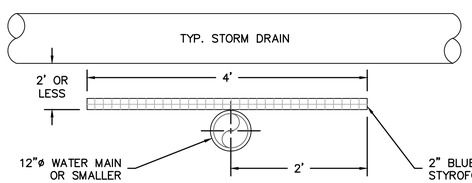
GENERAL NOTES:

1. ALL FITTINGS & EXPOSED REBAR TO BE WRAPPED W/ TWO LAYERS OF 6 MIL. POLYETHYLENE WHERE COVERED WITH CONCRETE.
2. ALL CONCRETE SHALL BE CLASS C 3000 P.S.I. MINIMUM 28 DAYS COMPRESSIVE STRENGTH.
3. PLACE CONCRETE AGAINST UNDISTURBED EARTH.
4. TABLE DENOTES MINIMUM BEARING AREA OR VOLUME OF THRUST BLOCK. SPECIAL DESIGN FOR EACH INSTALLATION IS REQUIRED IF ALLOWABLE SOIL BEARING CAPACITY IS LESS THAN 3000 P.S.F.
5. VERTICAL SURFACES NOT BEARING AGAINST UNDISTURBED EARTH SHALL BE FORMED.
6. KEEP CONCRETE AWAY FROM FLANGE BOLTS AND FITTINGS.

PIPE I.D.	BEARING AREA, SQUARE FEET						VOLUME OF CONC. CU.YD		
	FIGURE 1	FIGURE 2	FIGURE 3, △				FIGURE 4, △		
			90°	45°	22-1/2°	11-1/4°	45°	22-1/2°	11-1/4°
4"	2	2	2	1	1	1	1.0	.5	.5
6"	2	3	3	2	1	1	1.5	1.0	.5
8"	2	5	6	3	2	1	2.0	1.0	.5
10"	3	7	10	5	3	1	4.0	2.0	1.0
12"	3	10	14	8	4	2			
14"	4	14	20	10	5	3			
16"	4	20	24	12	7	4			
18"	5	24	30	16	10	5			
20"	5	28	40	20	12	6			

NOTE:
MECHANICAL JOINTS AT ALL FITTINGS IE: BENDS, TEES, CROSSES, AND VALVES SHALL BE THRUST RESTRAINT. (MEGA-LUG OR APPROVED EQUAL).

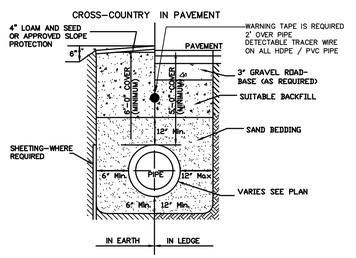
U14



INSULATE WATER PIPE WHERE CROSSING UNDER CULVERT

NOT TO SCALE

U15



TYPICAL TRENCH DETAIL FOR WATER SYSTEM

NOT TO SCALE

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U-102

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