DIXVILLE CAPITAL, LLC

DIX - HAMPSHIRE RENOVATION

DIXVILLE, NEW HAMPSHIRE

MAY 2016

PLANNER:

SE GROUP

131 CHURCH STREET, SUITE 204
BURLINGTON, VT 05401

STRUCTURAL ENGINEER:

SUMMIT ENGINEERING

10822 W. TOLLER DR. SUITE 330
LITTLETON, CO 80127

ELECTRICAL/MECHANICAL ENGINEER:

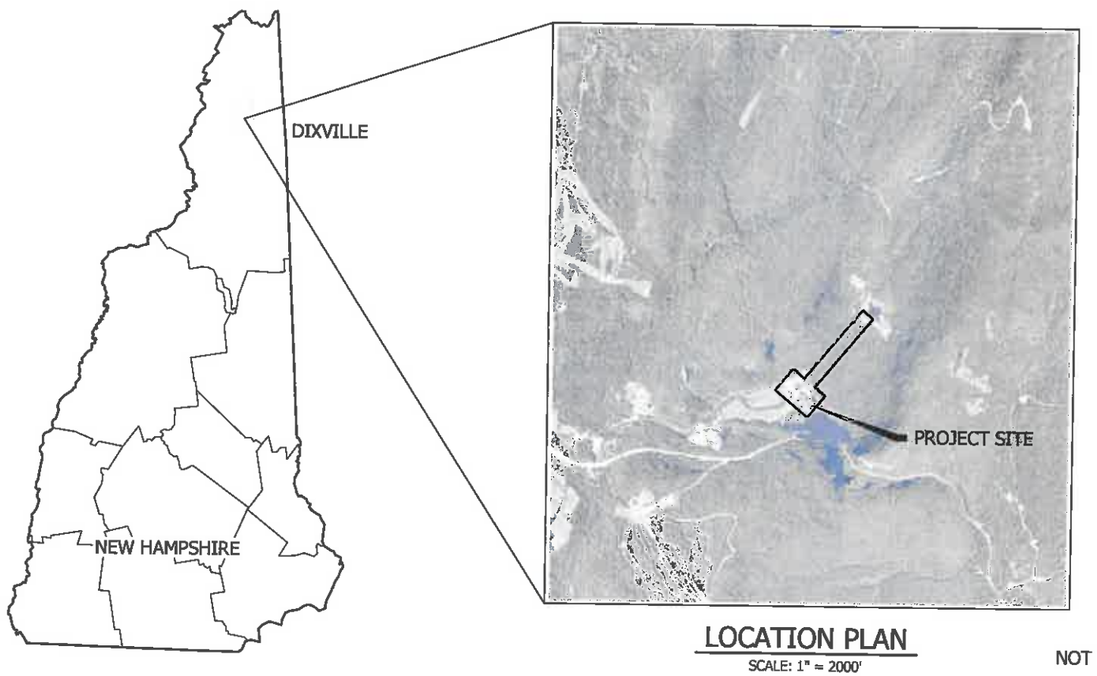
YEATON ASSOCIATES, INC.

66 JACKSON STREET
LITTLETON, NH 03561

WETLAND SCIENTIST:

NORMANDEAU ASSOCIATES INC.
ENVIRONMENTAL CONSULTANTS

25 NASHUA ROAD
BEDFORD, NH 03110



LOCATION PLAN

SCALE: 1" = 2000'

OWNER:

THE BALSAMS

BALSAMS VIEW, LLC
12 PLEASANT ST
COLEBROOK, NH 03576

ENGINEER AND SURVEYOR:

horizons Engineering Inc.

34 SCHOOL STREET
LITTLETON, NH 03561
(603) 444-4111

ARCHITECT:

TMS architects

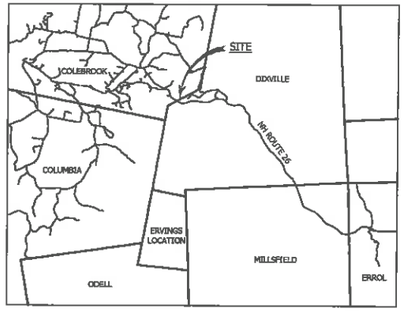
ONE CATE STREET
ELDRIDGE PARK
PORTSMOUTH, NH 03801

NOT FOR CONSTRUCTION
FOR APPROVAL

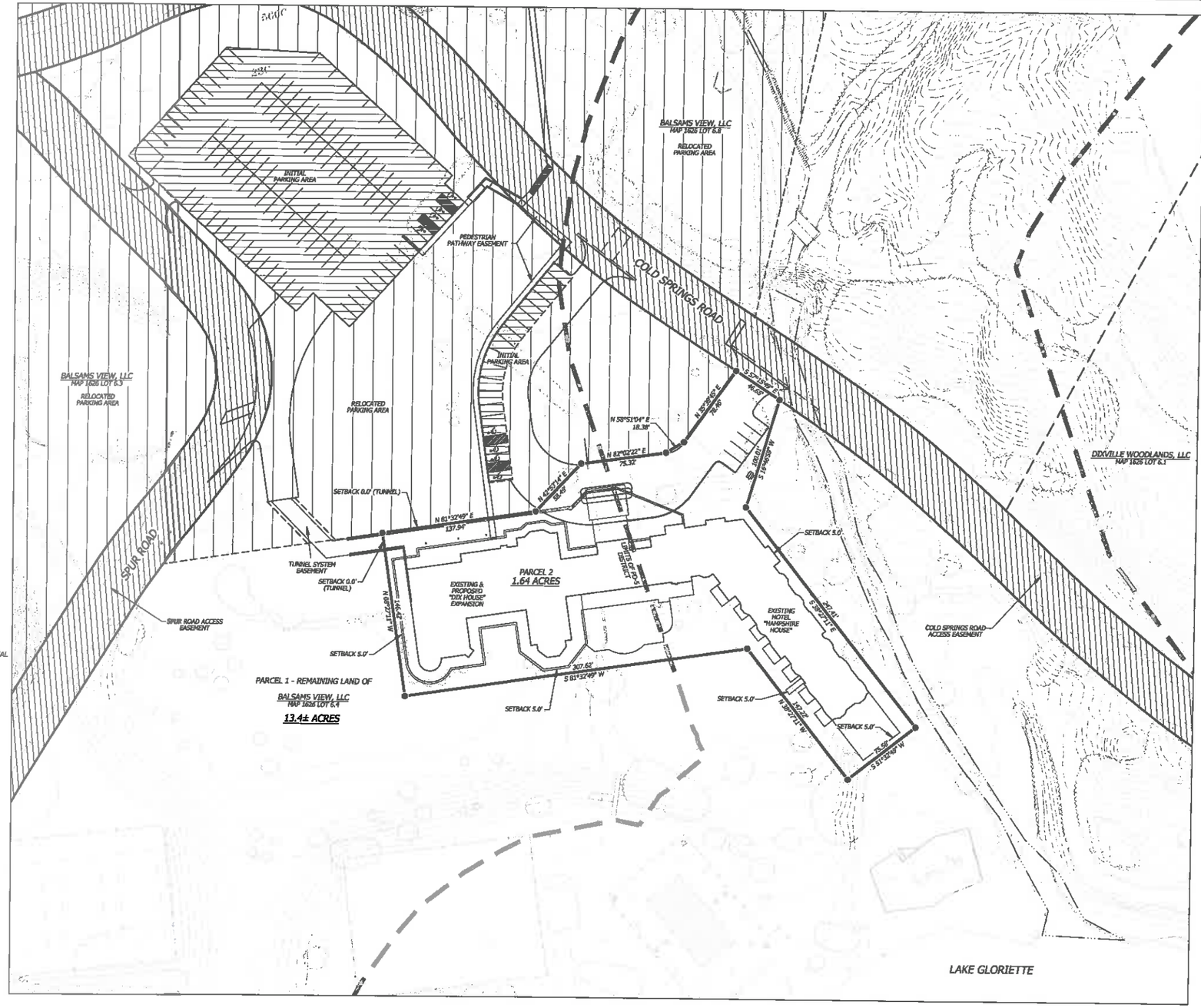
INDEX OF SHEETS

DATE OF PRINT
MAY 18 2016
HORIZONS ENGINEERING

Q:\15247 Dixville Capital, LLC - Phase 1 Village Area\DWGS\Final\15247_COVER-DETAILS-05.dwg, Cover24x36, 5/18/2016 1:50:22 PM, SBoutin



VICINITY MAP



GRID NORTH

GENERAL NOTES

1. OWNER OF RECORD:
   BALSAMS VIEW, LLC
   12 PLEASANT STREET
   COLEBROOK, NH 03576
2. APPLICANT:
   DIXVILLE CAPITAL, LLC
   8 AIRPORT ROAD, P.O. BOX 547
   BETHEL, ME 04217
3. REFERENCE DEEDS:
   A. COOS COUNTY REGISTRY OF DEEDS BOOK 1339 PAGE 915.
4. THIS PLAN IS BASED ON PLANS OF RECORD, A PRECISION GPS SURVEY COMPLETED BY HORIZONS ENGINEERING, INC AND AERIAL PHOTOGRAMMETRIC MAPPING COMPLETED BY AERIAL SURVEY AND PHOTO, INC.
5. THE BEARINGS SHOWN HEREON REFER TO GRID NORTH AND ARE BASED ON THE NEW HAMPSHIRE COORDINATE SYSTEM.
6. PREMISES ARE LOCATED WITHIN THE DD-G (GENERAL DEVELOPMENT DISTRICT) AND PD-5 (BOARD IDENTIFIED SHORELINES).
7. PREMISES ARE NOT LOCATED WITHIN A DEFINED FLOOD HAZARD ZONE.

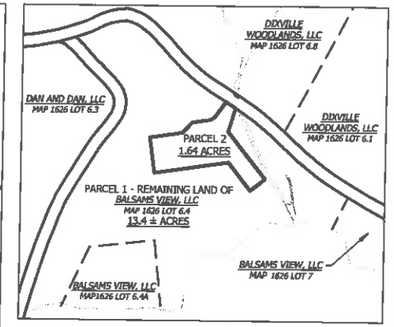
ABUTTERS

MAP/LOT	NAME	ADDRESS
1626/6.1	DIXVILLE WOODLANDS, LLC	12 PLEASANT STREET, COLEBROOK, NH 03576
1626/6.3	BALSAMS VIEW, LLC	12 PLEASANT STREET, COLEBROOK, NH 03576
1626/6.4A	BALSAMS VIEW, LLC	12 PLEASANT STREET, COLEBROOK, NH 03576
1626/6.8	DIXVILLE WOODLANDS, LLC	12 PLEASANT STREET, COLEBROOK, NH 03576
1626/7	BALSAMS VIEW, LLC	12 PLEASANT STREET, COLEBROOK, NH 03576

LEGEND

- CORNER TO BE MONUMENTED WITH 5/8-INCH DIAMETER IRON ROD WITH PLASTIC ID CAP
- BOUNDARY LINE
- ABUTTING PROPERTY BOUNDARY (APPROXIMATE)
- EASEMENT
- WETLAND AS DELINEATED BY OTHERS
- PD-5 ZONING DISTRICT BOUNDARY

0 25 50 100 200
SCALE IN FEET



OVERALL PARCEL MAP
SCALE 1" = 300'

THIS MAP IS HEREBY APPROVED BY THE COOS COUNTY PLANNING BOARD AT AN OFFICIAL MEETING HELD ON_____
AND SHALL BE FILED ON OR BEFORE_____
WITH THE COOS COUNTY REGISTER OF DEEDS.

DATE CHAIRMAN OR CLERK

THE SUBDIVISION REGULATIONS OF COOS COUNTY UNINCORPORATED PLACES, NEW HAMPSHIRE ARE A PART OF THIS PLAT, AND APPROVAL OF THIS PLAT IS CONTINGENT UPON COMPLETION OF ALL REQUIREMENTS OF SAID SUBDIVISION REGULATIONS, EXCEPTING ONLY ANY VARIANCES OR MODIFICATIONS MADE IN WRITING BY THE BOARD AND ATTACHED HERETO.

REQUESTED WAIVERS FROM COOS COUNTY UNINCORPORATED SUBDIVISION REGULATIONS, SECTION 5, PLAN REQUIREMENTS:

- ITEM d.9, LOCATION OF SOILS, GROUND WATER AND PERC TESTS USING SITE SPECIFIC INFORMATION
- ITEM d.16, SOIL TYPES
- ITEM d.17, SEASONAL HIGH WATER.
- ITEM d.18, TEST PITS
- ITEM d.20, SCALE OF 1" FOR 100'.

CERTIFICATION

I HEREBY CERTIFY THAT THIS SURVEY IS CLASSIFIED RURAL (R). BOUNDARIES DEPICTED HEREON ARE COMPILED IN PART FROM REFERENCE PLANS AND FROM FIELD SURVEY BASED ON PRECISION GRADE RTK/GPS OBSERVATIONS AND TOTAL STATION SURVEY WITH A RAW CLOSURE BETTER THAN ONE PART IN 10,000.

I HEREBY CERTIFY THAT THIS MAP AND SURVEY HAS BEEN MADE UNDER MY SUPERVISION. THE DATE OF THE SURVEY WAS MARCH & APRIL, 2012.

ANDREW J. NADEAU, LLS 947 — 5/18/2016 DATE

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PLAN SHOWING A SUBDIVISION FOR

DIXVILLE CAPITAL, LLC

OF LAND OF
BALSAMS VIEW, LLC
COLD SPRINGS ROAD & SPUR ROAD
DIXVILLE, COOS COUNTY
NEW HAMPSHIRE
COOS COUNTY MAP 1626 LOT 6.4
DEED BOOK 1339 PAGE 915

SUBDIVISION PLAN

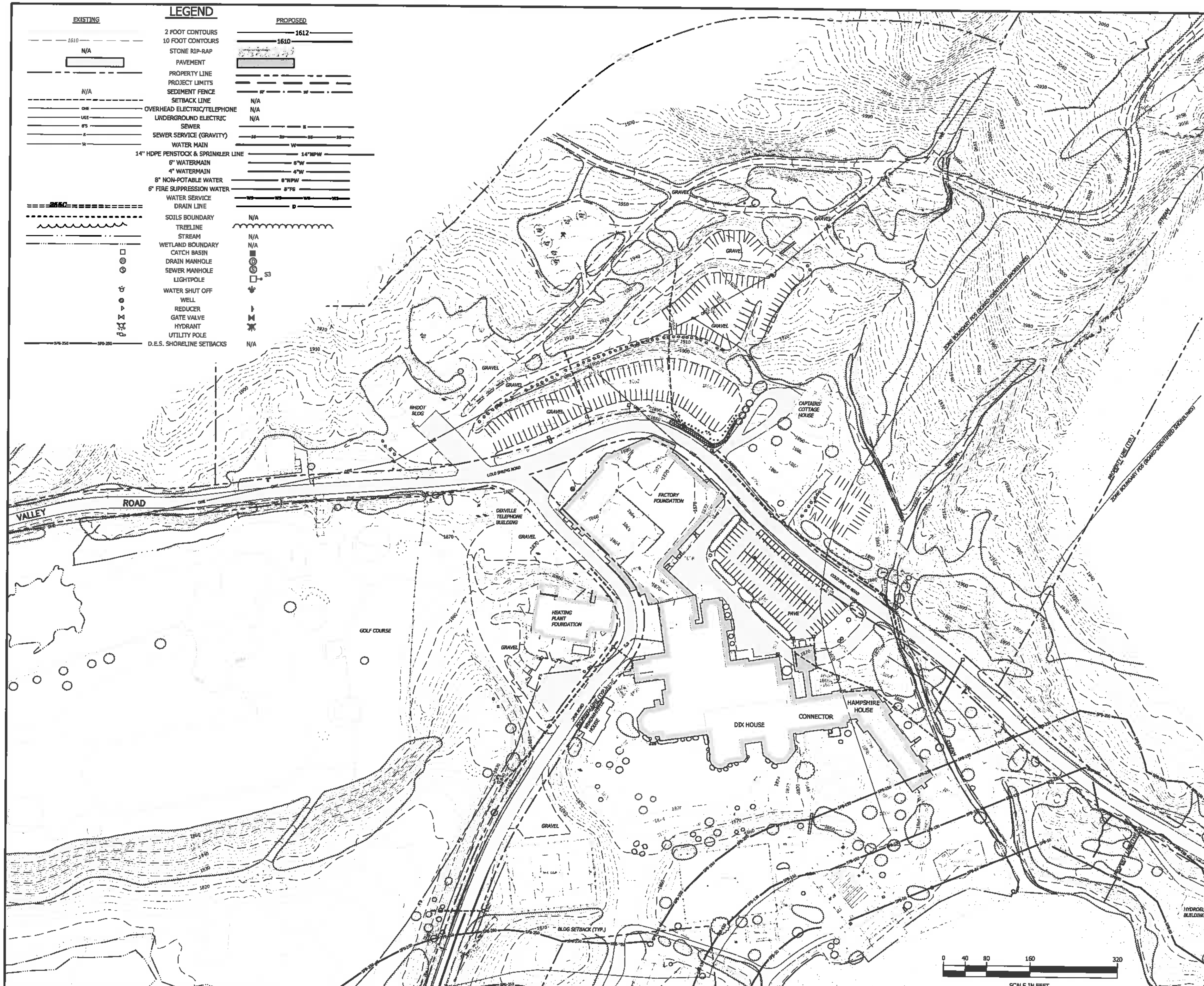
NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1.	5/18	REVISED FOR 2ND SUBMITTAL	AJN	AJN

STATE OF NEW HAMPSHIRE — No. 947 — ANDREW J. NADEAU — SURVEYOR

DATE: 4/22/2016	PROJECT #: 15247
ENGIN'D BY: ---	DRAWN BY: AJN
CHECK'D BY: AJN	ARCHIVE #: H-___

SHEET C-1.1

Q:\15247 Dixville Capital, LLC - Phase 1 Village Area\DWGS\Final\15247_SUB_Hotel Parcel-02.dwg, SUBDIVISION LOT 6.4 Site Plan, 5/18/2016 11:51:30 AM, SBoutin



LEGEND

EXISTING		PROPOSED
	2 FOOT CONTOURS	1612
1610	10 FOOT CONTOURS	1610
N/A	STONE RIP-RAP	
	PAVEMENT	
	PROPERTY LINE	
	PROJECT LIMITS	
N/A	SEDIMENT FENCE	SF
	SETBACK LINE	N/A
OHE	OVERHEAD ELECTRIC/TELEPHONE	N/A
UGE	UNDERGROUND ELECTRIC	N/A
8"S	SEWER	S
S	SEWER SERVICE (GRAVITY)	SS
W	WATER MAIN	W
	14" HDPE PENSTOCK & SPRINKLER LINE	14"NPW
	6" WATERMAIN	6"W
	4" WATERMAIN	4"W
	8" NON-POTABLE WATER	8"NPW
	6" FIRE SUPPRESSION WATER	6"FS
	WATER SERVICE	WS
	DRAIN LINE	D
	SOILS BOUNDARY	N/A
	TREELINE	
	STREAM	N/A
	WETLAND BOUNDARY	N/A
	CATCH BASIN	
	DRAIN MANHOLE	
	SEWER MANHOLE	
	LIGHTPOLE	S3
	WATER SHUT OFF	
	WELL	
	REDUCER	
	GATE VALVE	
	HYDRANT	
	UTILITY POLE	
SPB-250	D.E.S. SHORELINE SETBACKS	N/A

GENERAL NOTES

1. ALL NON ROAD RELATED WORK SHALL BE CONSTRUCTED IN ACCORDANCE WITH THESE PLANS AND "TECHNICAL SPECIFICATIONS FOR DIXVILLE CAPITAL, LLC., DIX-HAMPSHRE RENOVATIONS, DIXVILLE, NEW HAMPSHIRE", DATED APRIL 2016."
2. NO EXISTING MONUMENTS, BOUNDS, OR BENCHMARKS SHALL BE DISTURBED WITHOUT FIRST MAKING PROVISIONS FOR RELOCATION.
3. ALL WORK SHALL BE PERFORMED WITHIN THE PROPERTY OF, AND EASEMENTS SECURED BY, THE OWNER.
4. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE DATA COLLECTION AND PREPARATION OF RECORD DRAWINGS.
5. THE CONTRACTOR IS SOLELY RESPONSIBLE FOR CONTROLLING EROSION IN ALL AREAS DISTURBED BY HIS ACTIONS. COSTS FOR REQUIRED EROSION CONTROL, REGARDLESS OF WHETHER OR NOT SUCH MEASURES ARE SHOWN ON THE ENGINEERING DRAWINGS, SHALL BE BORNE BY HIM.
6. UTILITY LOCATIONS ARE BASED ON THE BEST AVAILABLE INFORMATION. THE CONTRACTOR IS RESPONSIBLE FOR LOCATION AND PROTECTION OF EXISTING UTILITIES AND SHALL REPAIR ANY DAMAGE AS QUICKLY AS POSSIBLE AT HIS OWN EXPENSE. ALL UTILITIES ENCOUNTERED SHALL BE LOCATED BY DEPTH AND TIES AND SHOWN BY THE CONTRACTOR ON HIS "AS BUILT" DRAWINGS. HAND EXCAVATION SHALL BE DONE WHEREVER UNDERGROUND UTILITIES ARE SHOWN OR ANTICIPATED. THE CONTRACTOR SHALL CONTACT DIG SAFE AND THE APPROPRIATE AUTHORITIES PRIOR TO ANY CONSTRUCTION IN ORDER TO VERIFY EXISTING CONDITIONS AND UTILITY LOCATIONS.
7. BASE MAP INFORMATION INCLUDING BOUNDARY AND TOPOGRAPHY ON THESE PLANS IS FROM PLANS PREPARED BY HORIZONS ENGINEERING, INC.
8. WETLAND DELINEATION BY RAY LOBDELL CERTIFIED WETLAND SCIENTIST, AND NORMANDEAU ASSOCIATES, INC..
9. PROJECT VERTICAL DATUM-NAVD 88. PROJECT BENCHMARK IS A 5/8" REBAR (CAP 947), SET BETWEEN TWO BOULDERS ADJACENT TO THE PARKING LOT ON THE NORTH SIDE OF COLD SPRING ROAD.
10. ALL ROADWORK SHALL BE DONE IN ACCORDANCE WITH THE NHDOT HIGHWAY DESIGN MANUAL, AND NHDOT STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, DATED2010.
11. NO BLASTING SHALL OCCUR BETWEEN APRIL 1st THROUGH MEMORIAL DAY IN ORDER TO ENSURE SUCCESSFUL NESTING OPPORTUNITIES FOR ENDANGERED SPECIES (PEREGRINE FALCONS) ON THE ADJACENT CLIFFS.

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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

EXISTING CONDITIONS PLAN

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

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FOR APPROVAL

STATE OF NEW HAMPSHIRE Stephen M. LaFrance No. 8148 LICENSED PROFESSIONAL ENGINEER

DATE: APRIL 2016	PROJECT #: 15247
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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

EXISTING CONDITIONS / PROPOSED VILLAGE AREA AERIAL PLAN

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

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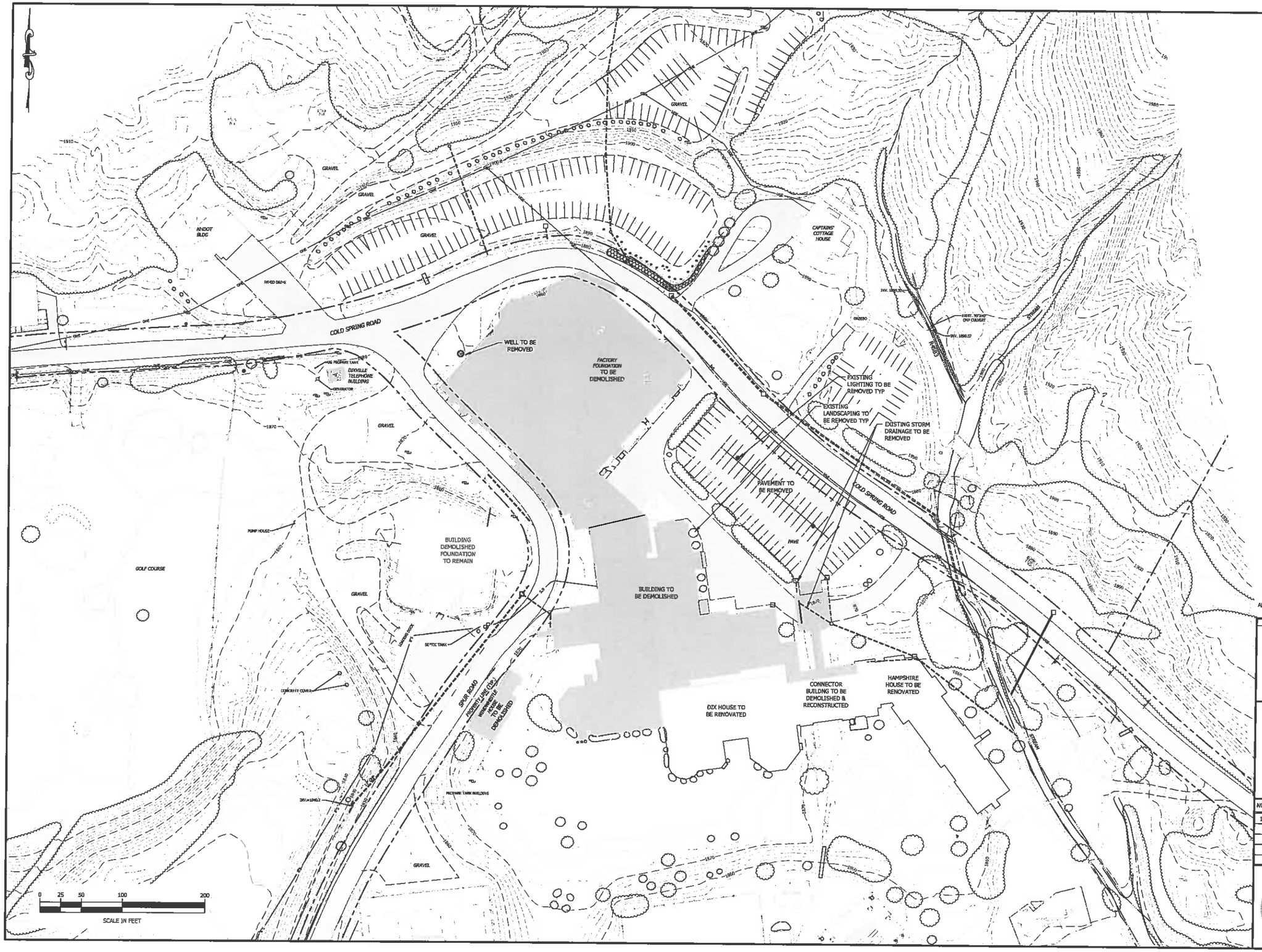

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DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

DEMOLITION PLAN

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

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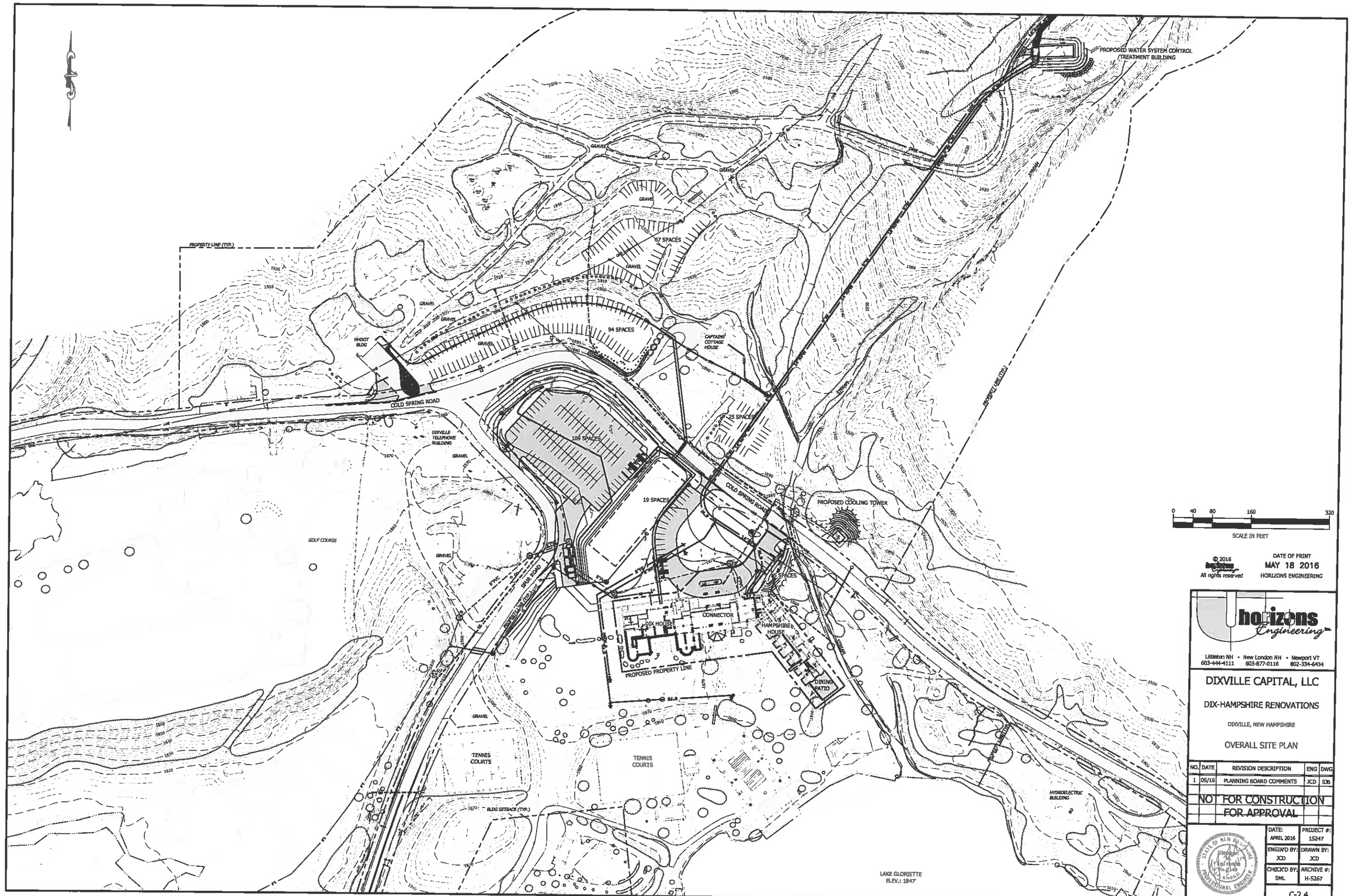

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DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

OVERALL SITE PLAN

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

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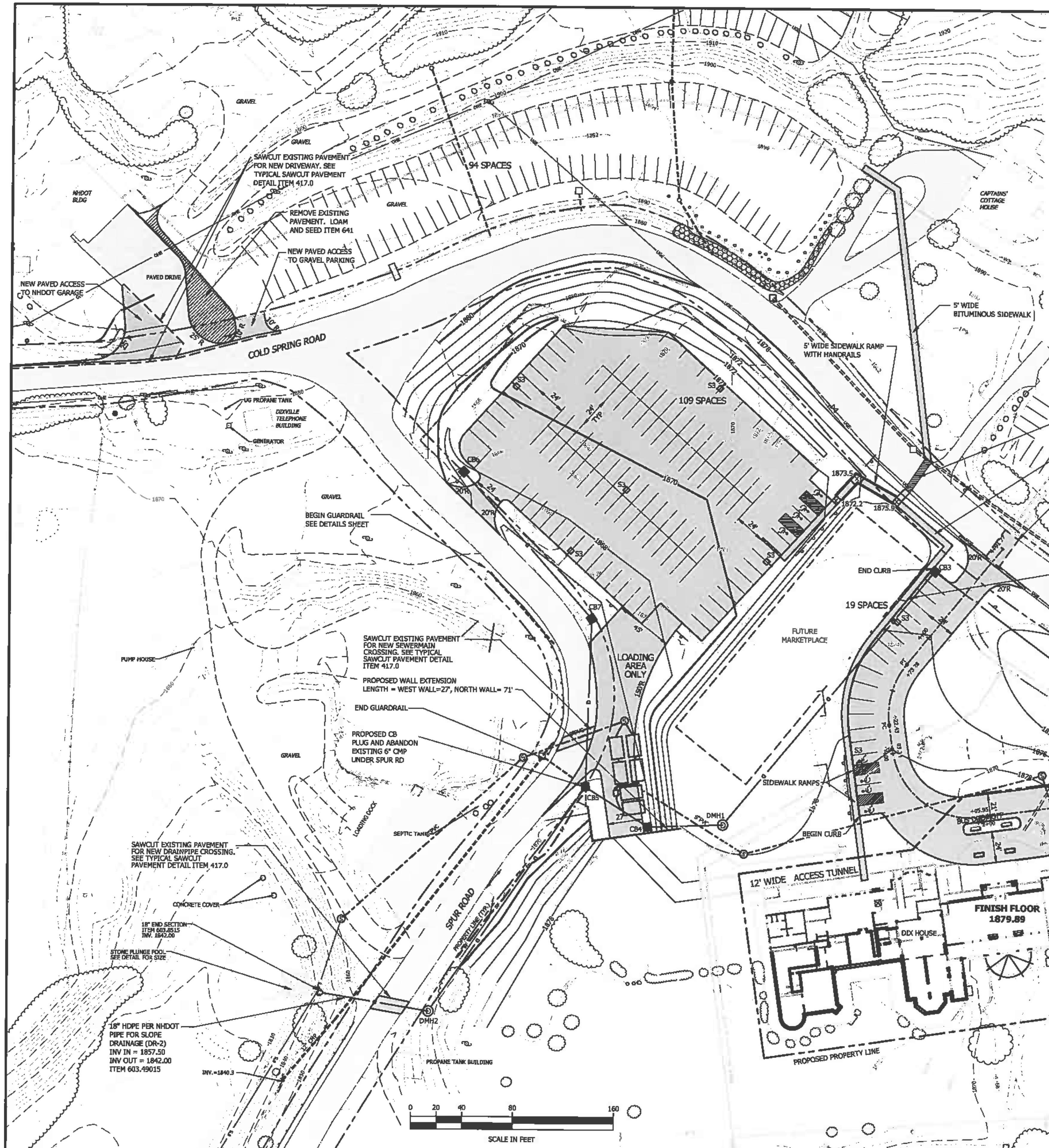

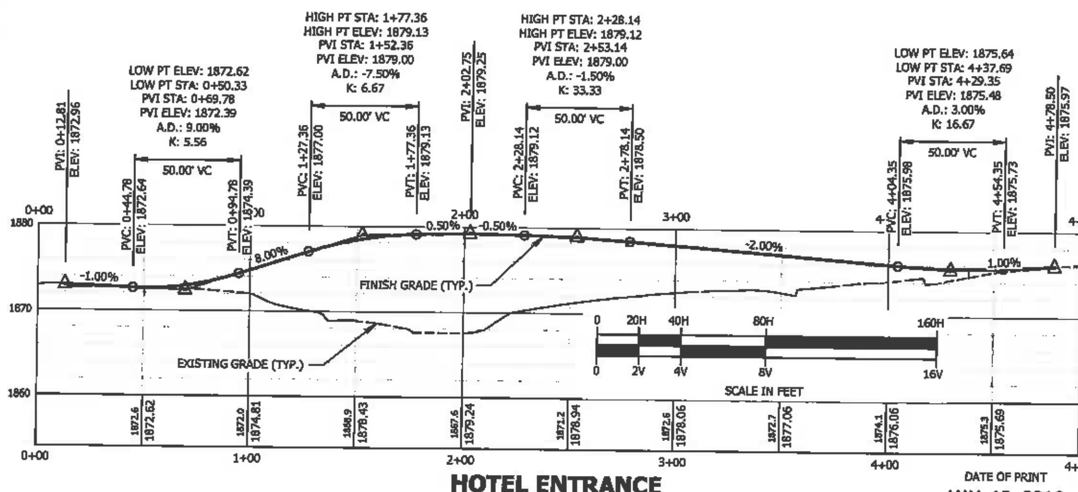

HOTEL ENTRANCE
STA: 0+00 to STA: 4+91

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STORM DRAINAGE SUMMARY

BASIN	PIPE	RIM ELEV.	PIPE SIZE	INLET	OUTLET	LENGTH(FT)	SLOPE
CB1		1875.00		―	1870.50		
	CB1-CB2		18" HDPE			72.0	0.035
CB2		1871.75		1868.00	1868.00		
	CB2-CB3		18" HDPE			161	0.005
CB3		1875.00		1867.19	1867.19		
	CB3-DMH1		18" HDPE			255	0.005
DMH1		1877.00		1865.92	1865.92		
	DMH1-CB4		18" HDPE			56	0.088
CB4		1865.75		1861.00	1861.00		
	CB4-CB5		18" HDPE			50	0.005
CB5		1875.00		1860.75	1860.75		
	CB5-DMH2		18" HDPE			211	0.006
CB6		1867.50		―	1862.75		
	CB6-CB7		18" HDPE			149	0.005
CB7		1865.00		1862.00	1862.00		
	CB7-CB5		18" HDPE			128	0.019
DMH2		1867.00		1859.50	1857.50		
DMH2-OUTLET			18" HDPE		82		SLOPE DRAIN PIPE

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DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

SITE GRADING, DRAINAGE & EROSION CONTROL SITE PLAN

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

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STATE OF NEW HAMPSHIRE Stephan M. LaFrance No. 8148 LICENSED PROFESSIONAL ENGINEER

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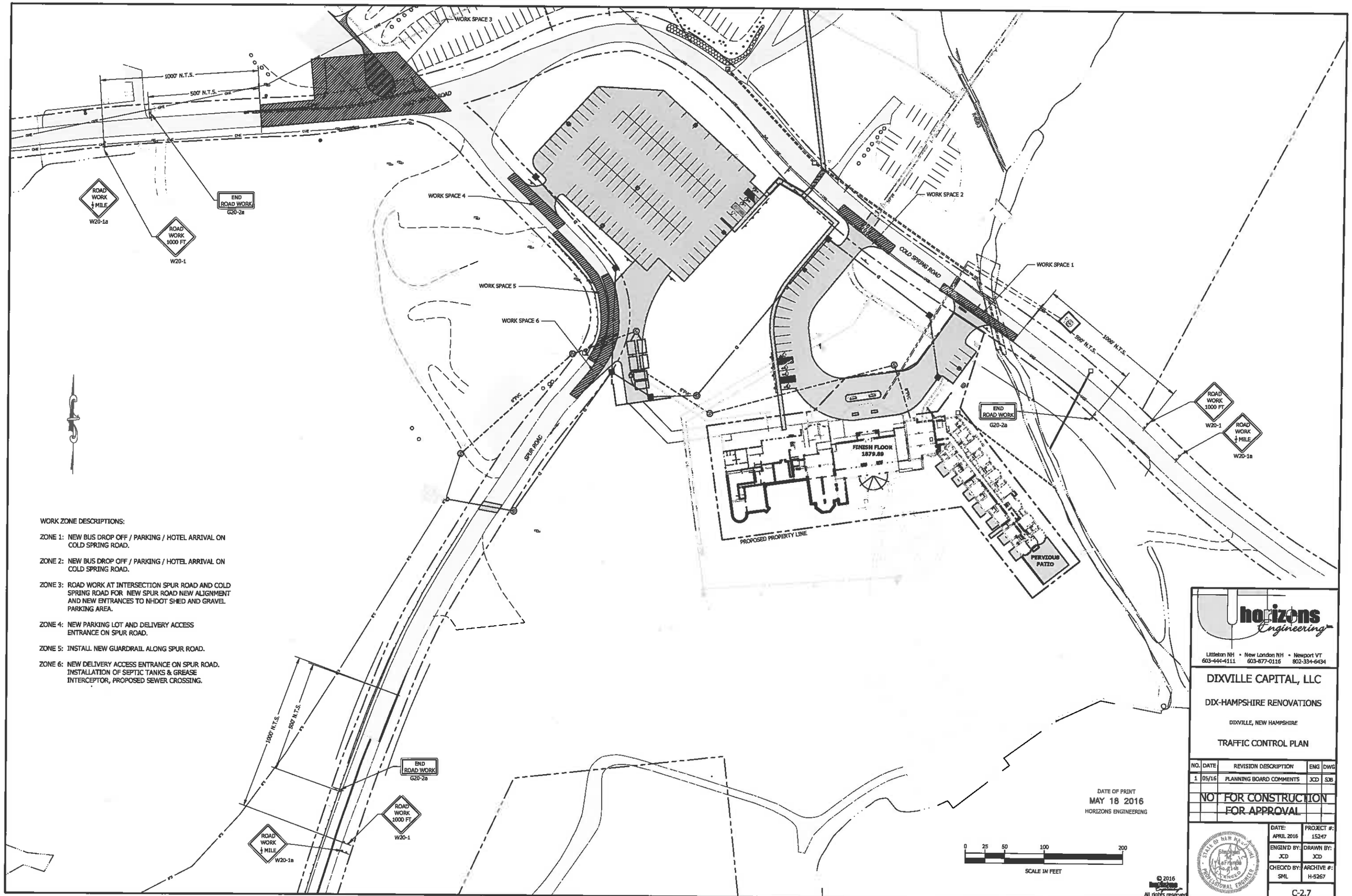

WORK ZONE DESCRIPTIONS:

ZONE 1: NEW BUS DROP OFF / PARKING / HOTEL ARRIVAL ON COLD SPRING ROAD.

ZONE 2: NEW BUS DROP OFF / PARKING / HOTEL ARRIVAL ON COLD SPRING ROAD.

ZONE 3: ROAD WORK AT INTERSECTION SPUR ROAD AND COLD SPRING ROAD FOR NEW SPUR ROAD NEW ALIGNMENT AND NEW ENTRANCES TO NHDOT SHED AND GRAVEL PARKING AREA.

ZONE 4: NEW PARKING LOT AND DELIVERY ACCESS ENTRANCE ON SPUR ROAD.

ZONE 5: INSTALL NEW GUARDRAIL ALONG SPUR ROAD.

ZONE 6: NEW DELIVERY ACCESS ENTRANCE ON SPUR ROAD. INSTALLATION OF SEPTIC TANKS & GREASE INTERCEPTOR, PROPOSED SEWER CROSSING.

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DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

TRAFFIC CONTROL PLAN

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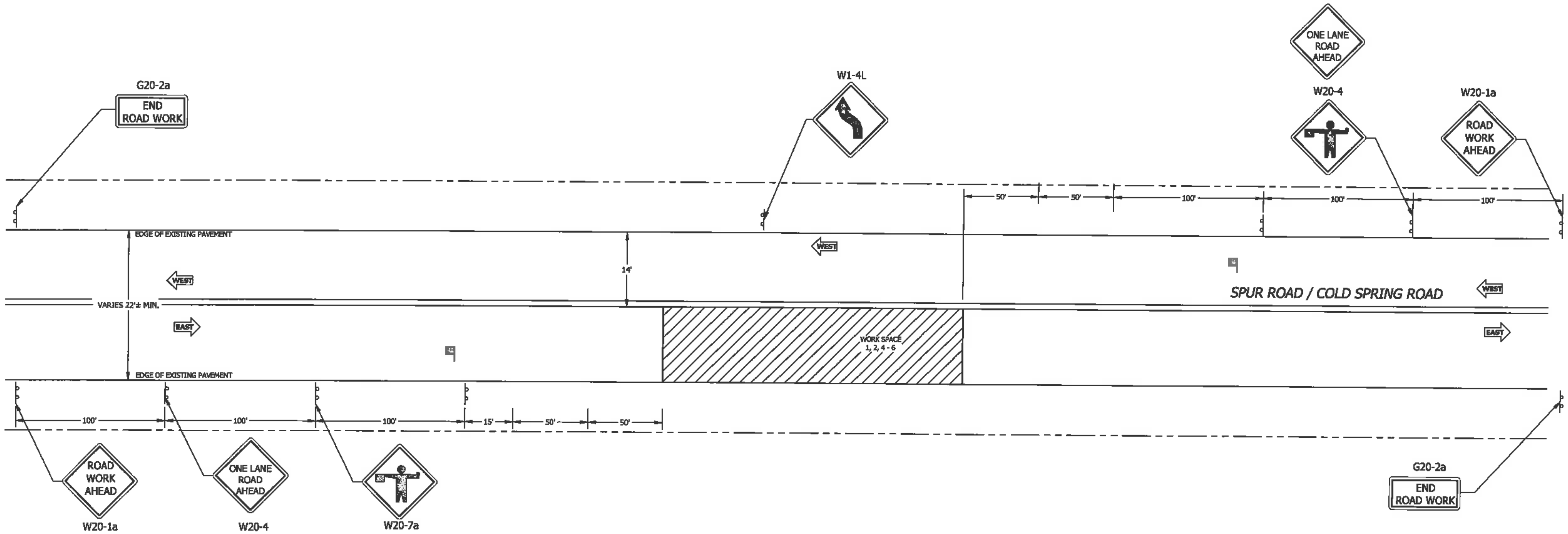

LANE CLOSURE ON LOW VOLUME TWO-LANE ROAD

(MUTCD FIG. 6H-11)
NOT TO SCALE

NOTES:

1. CONTRACTOR TO NOTIFY LOCAL EMERGENCY SERVICES, NHDOT DISTRICT ONE OFFICE AND ROAD FORMAN 24 TO 48 HOURS PRIOR TO CONSTRUCTION OF WORK WITHIN THE RIGHT OF WAY.
2. MAINTAIN TWO WAY TRAFFIC WITH A MINIMUM 11 FOOT CLEAR WIDTH LANES.

LEGEND

SIGN

FLAGGER

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DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

TRAFFIC CONTROL PLAN
WORK SPACE 1-5
LOW VOLUME ROAD

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

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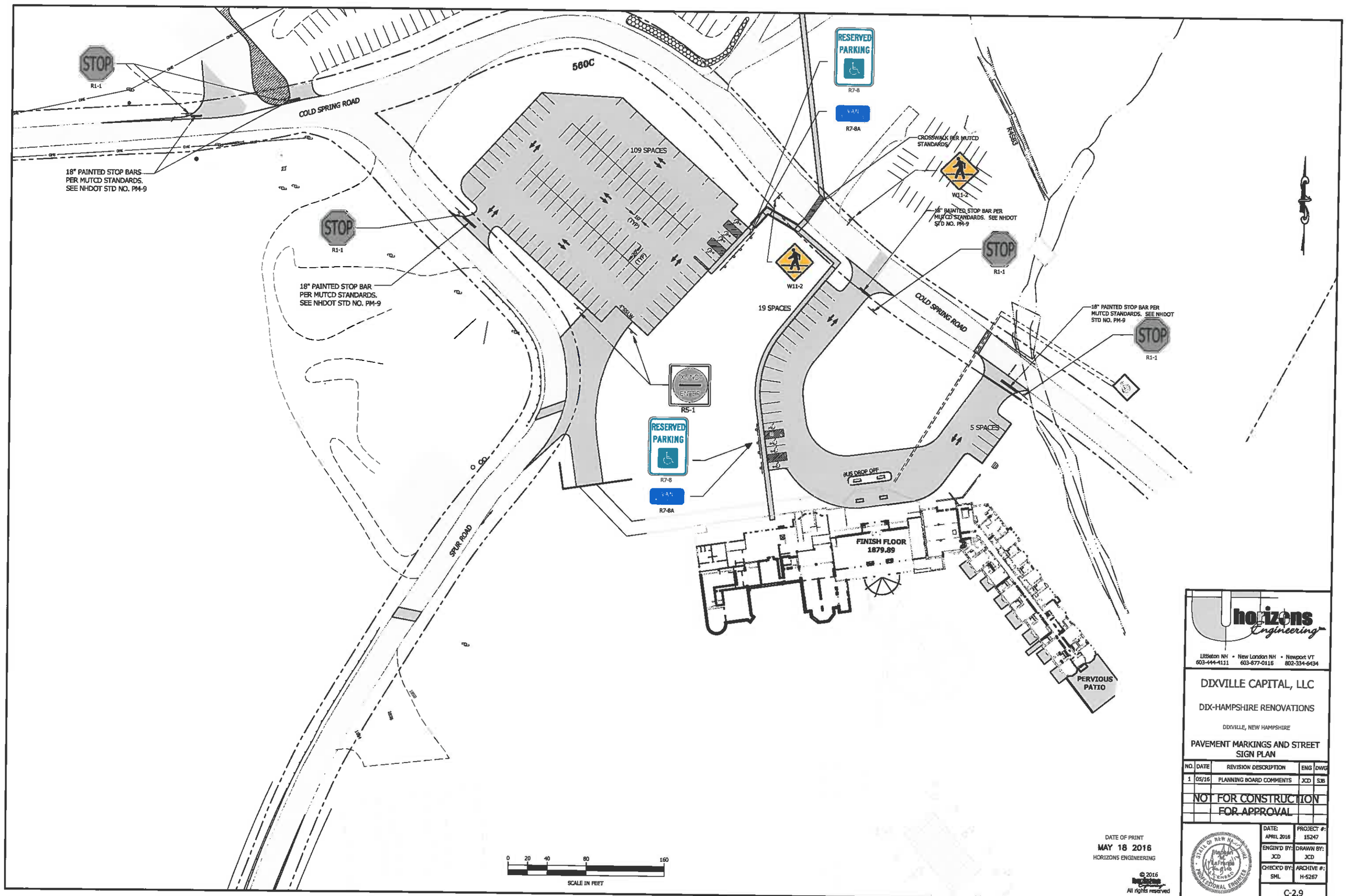

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DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

PAVEMENT MARKINGS AND STREET SIGN PLAN

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

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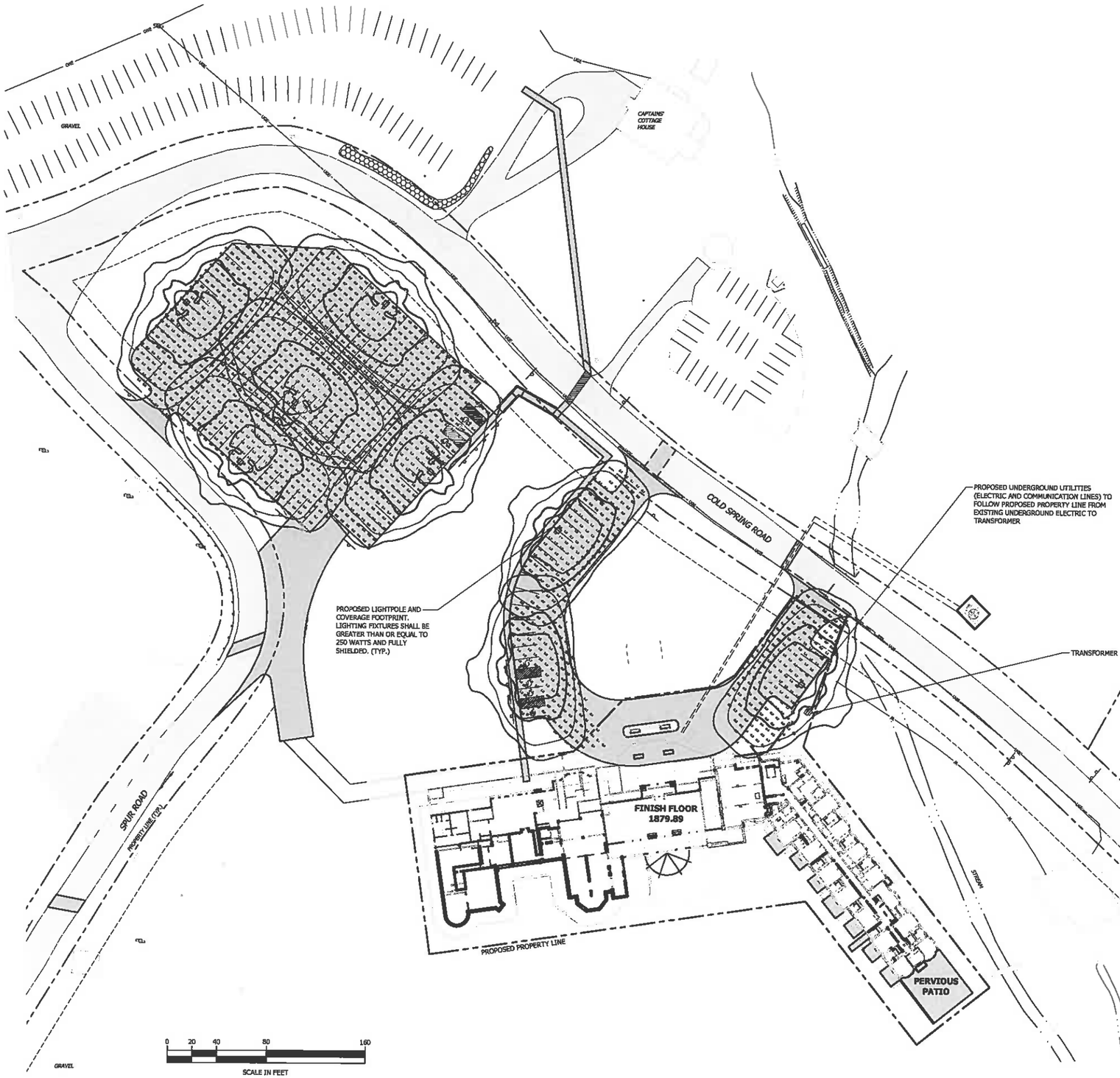

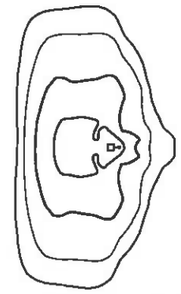

TYPICAL LIGHTPOLE AND COVERAGE FOOTPRINT
SCALE 1" = 40'

GENERAL PHOTOMETRIC SCHEDULE	
AVERAGE FOOTCANDLES	.8
MAXIMUM FOOTCANDLES	5.8
MINIMUM FOOTCANDLES	.1
MINIMUM TO MAXIMUM FC RATIO	.1
MAXIMUM TO MINIMUM FC RATIO	12.0
AVERAGE TO MINIMUM FC RATIO	4.3

REFERENCE: LIGHTING LAYOUT AND COVERAGE PROJECTIONS BY YEATON ASSOCIATES

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DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

DRY UTILITIES PLAN

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

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STATE OF NEW HAMPSHIRE Stephen M. LaFrance 13148 LICENSED PROFESSIONAL ENGINEER

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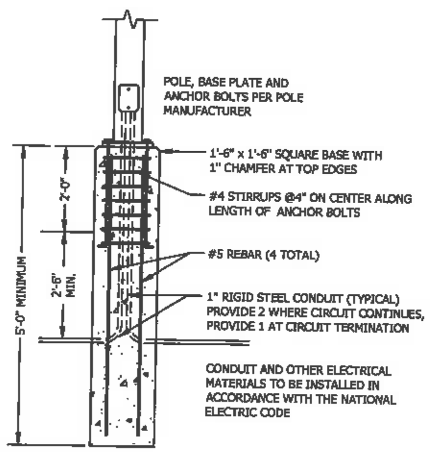
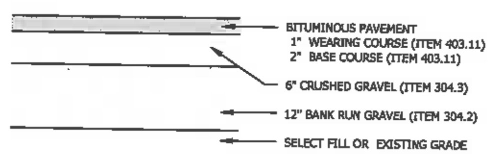
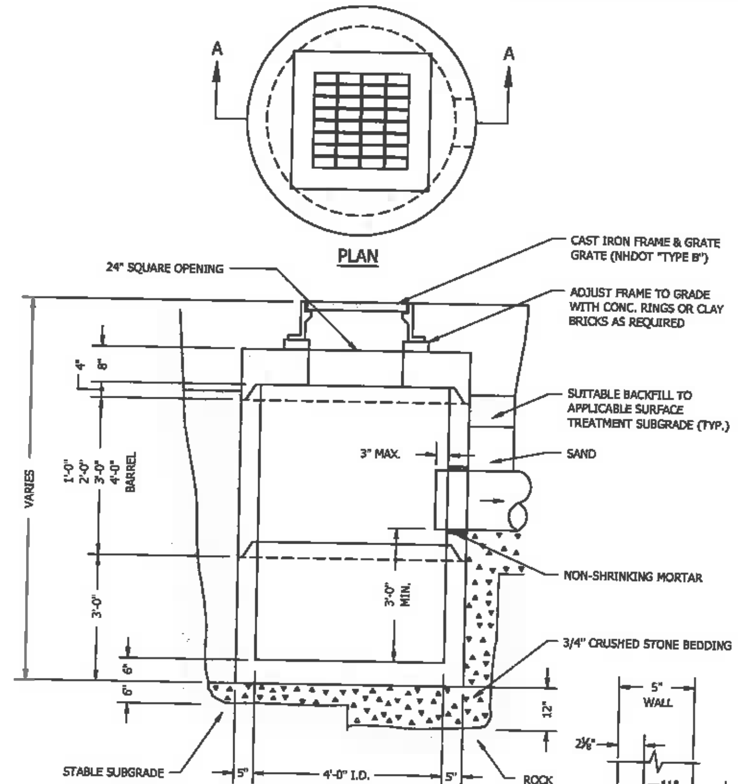


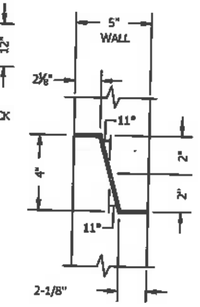
CONCRETE LIGHT BASE DETAIL
NOT TO SCALE



TYPICAL PARKING LOT PAVEMENT SECTION
NOT TO SCALE



SECTION A - A

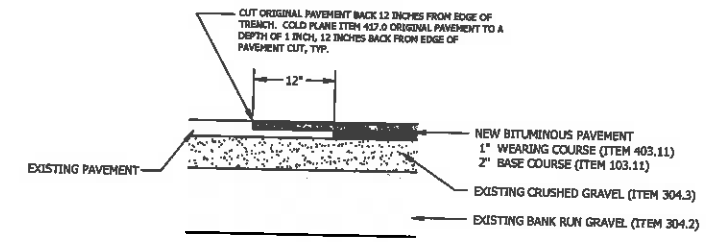


DETAIL OF SHIP LAP JOINT

NOTES:

1. CONCRETE SHALL BE 4,000 P.S.I. AFTER 28 DAYS.
2. REINFORCING H-20 LOADING 4 x 4/4 x 4 W.W.M.
3. SHIP LAP JOINT SHALL CONTAIN ONE LINE OF CIRCUMFERENTIAL REINFORCEMENT EQUAL TO 0.12 SQ. IN. PER LINEAR FT. AND SHALL BE SEALED WITH 1 STRIP OF 1" DIA. BUTYL RUBBER SEALANT.
4. EACH CASTING TO HAVE LIFTING HOLES CAST IN.

TYPICAL CATCH BASIN DETAIL ITEM 604.12
NOT TO SCALE



TYPICAL CUT PAVEMENT SECTION
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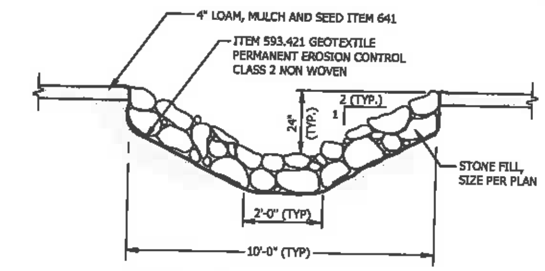
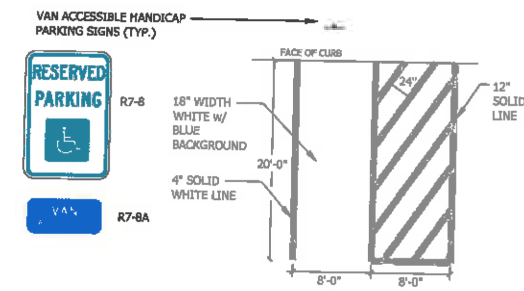
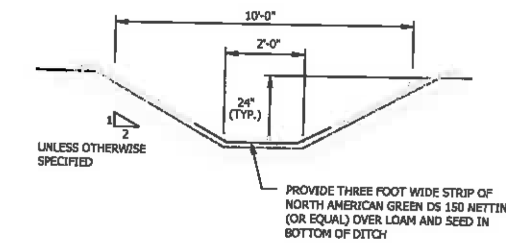


STONE LINED DITCH DETAIL
NOT TO SCALE

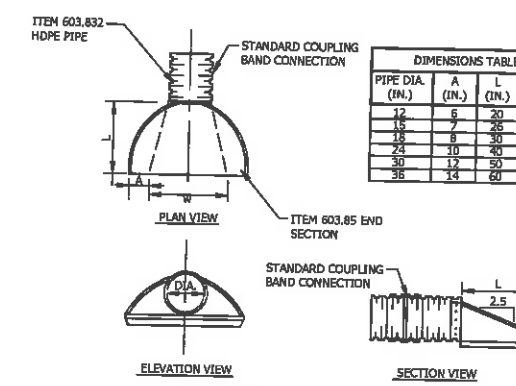


HANDICAP PARKING DETAIL
NOT TO SCALE

ALL PAVEMENT MARKINGS SHALL BE OF LATEX, REFLECTIVE TRAFFIC PAINT WITH A MINIMUM LINE WIDTH OF FOUR INCHES AND A MINIMUM DRY FILM THICKNESS OF FIFTEEN MILS.



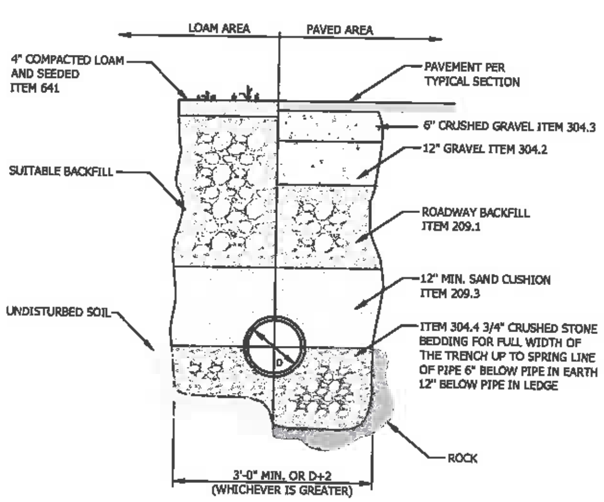
GRASS LINED DITCH DETAIL
NOT TO SCALE



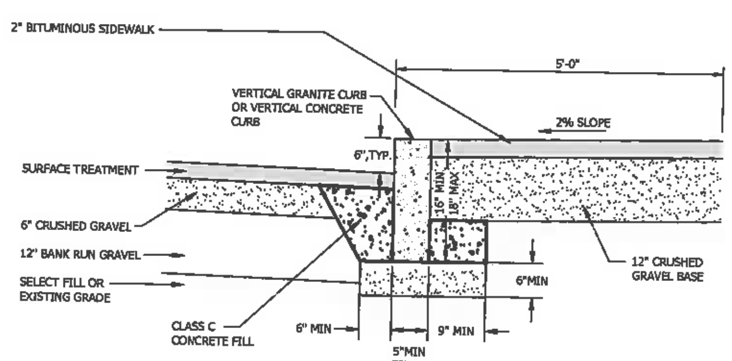
DIMENSIONS TABLE

PIPE DIA. (IN.)	A (IN.)	L (IN.)	W (IN.)
12	6	20	24
15	7	26	30
18	8	30	36
24	10	40	48
30	12	50	60
36	14	60	72

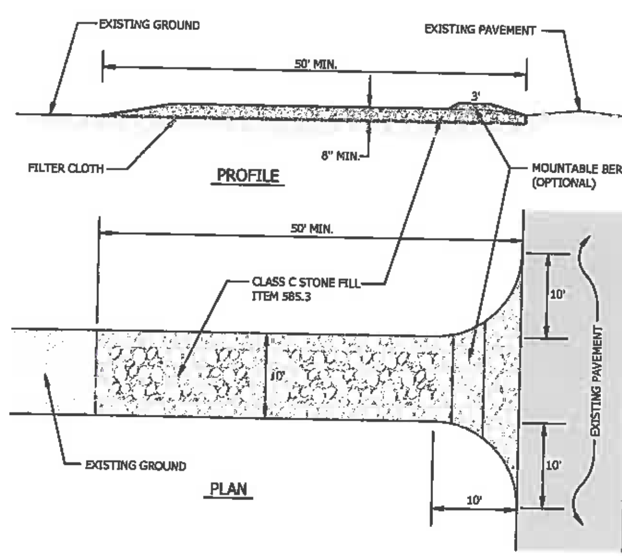
FLARED END SECTION DETAIL
NO SCALE



TYPICAL DRAINAGE TRENCH DETAIL
NOT TO SCALE



SIDEWALK WITH VERTICAL CURB DETAIL
NOT TO SCALE



STABILIZED CONSTRUCTION ENTRANCE
NOT TO SCALE

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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATION

DIXVILLE, NEW HAMPSHIRE

DRAINAGE & MISCELLANEOUS DETAILS

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

NOT FOR CONSTRUCTION
FOR APPROVAL

DATE: APRIL 2016	PROJECT #: 15247
ENGIN'D BY: JCD	DRAWN BY: JCD
CHECK'D BY: SML	ARCHIVE #: H-5267

STATE OF NEW HAMPSHIRE Stephen M. LaFrance No. 8148 LICENSED PROFESSIONAL ENGINEER

C-5.1

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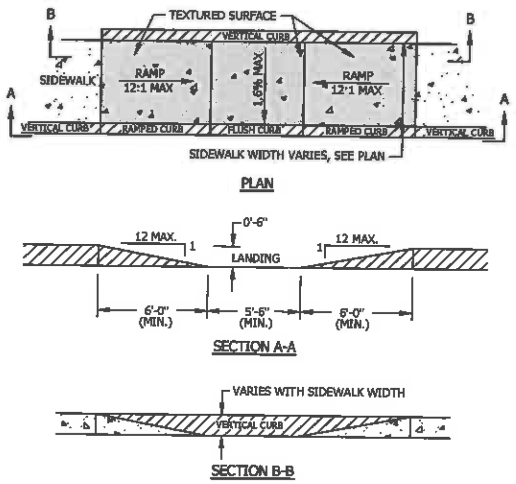
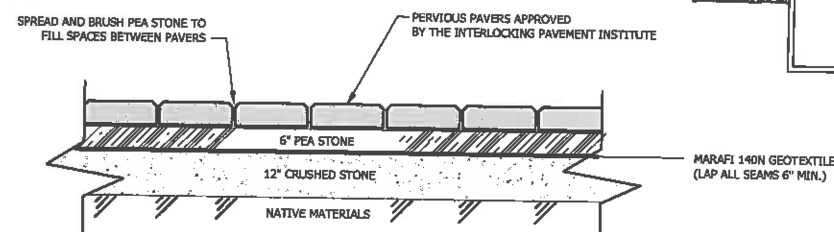


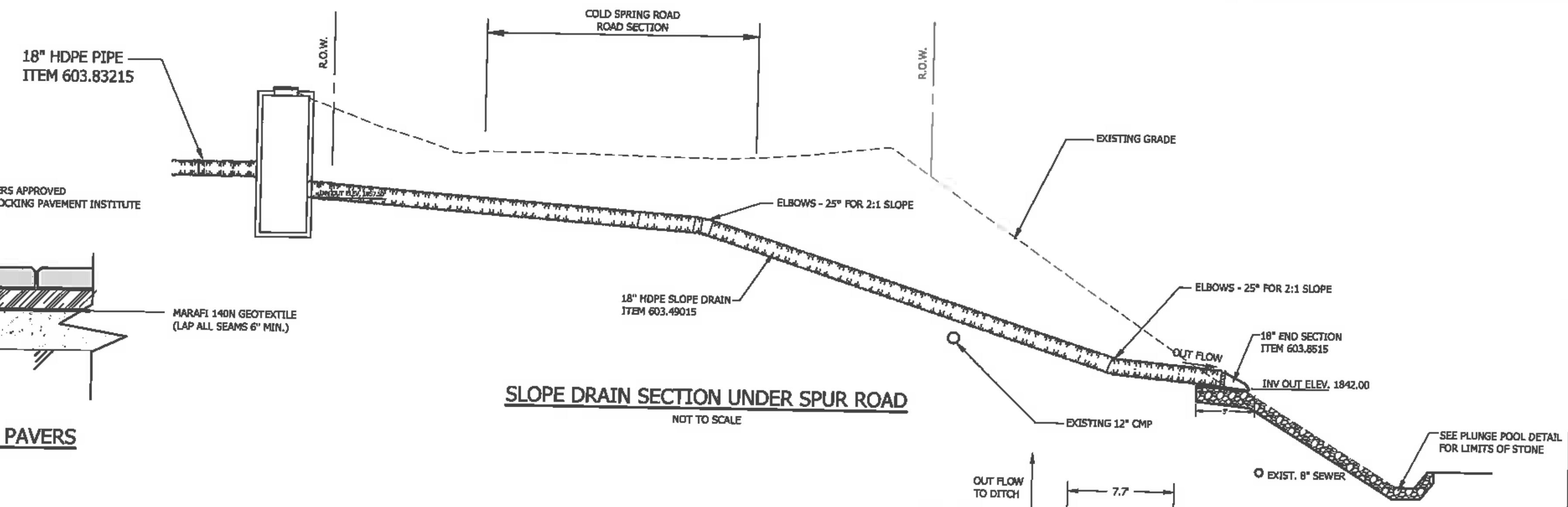
SIDEWALK RAMP DETAIL

NOT TO SCALE



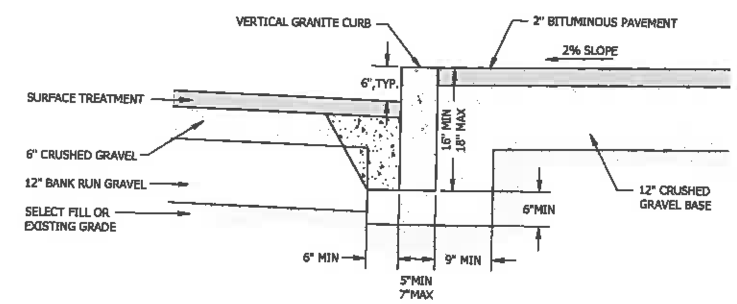
TYPICAL PATIO SECTION - PERVIOUS PAVERS

NOT TO SCALE



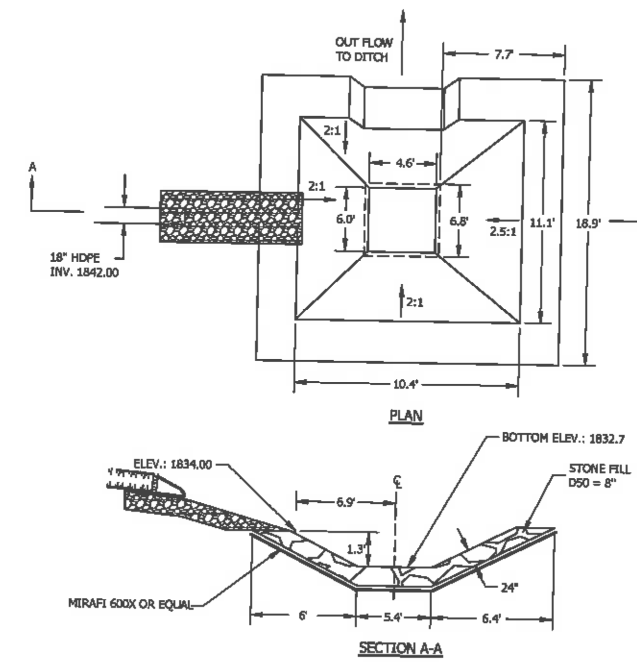
SLOPE DRAIN SECTION UNDER SPUR ROAD

NOT TO SCALE



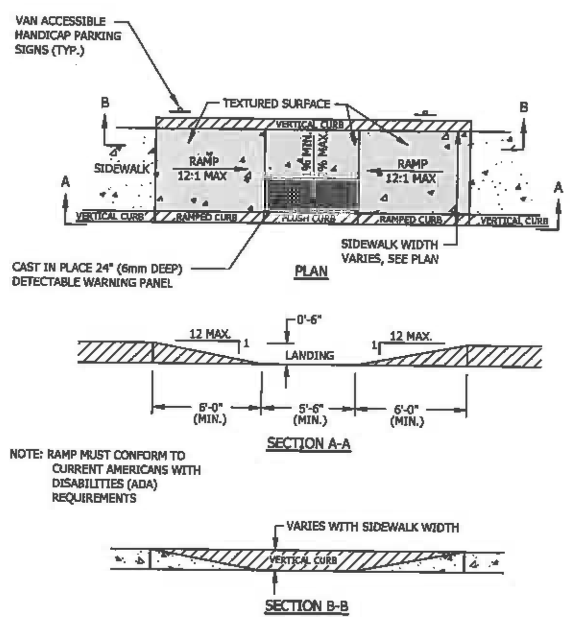
BITUMINOUS CONCRETE SIDEWALK WITH VERTICAL CURB DETAIL

NOT TO SCALE



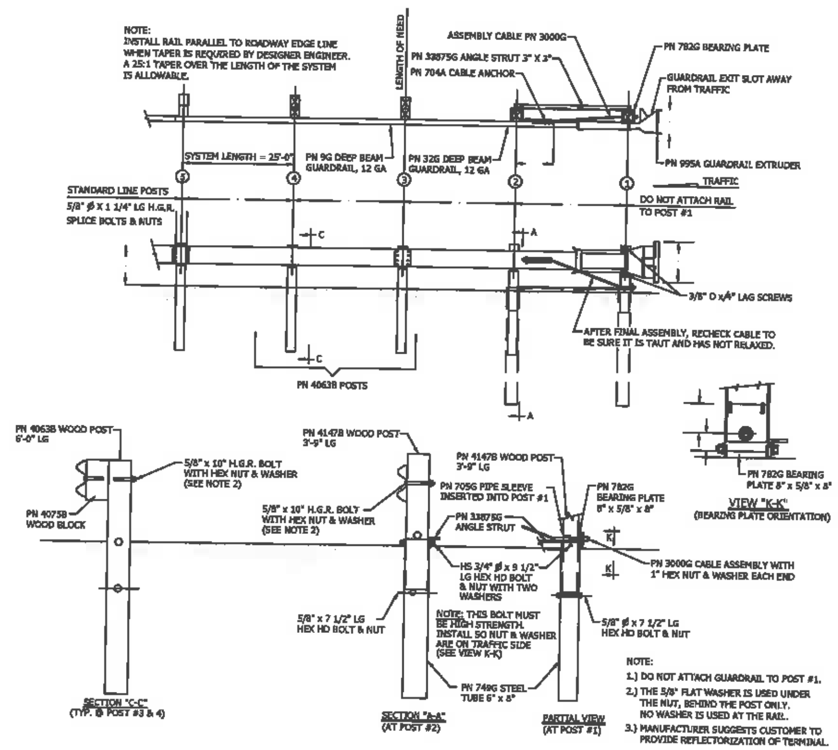
DR-2 OUTLET PLUNGE POOL

NOT TO SCALE



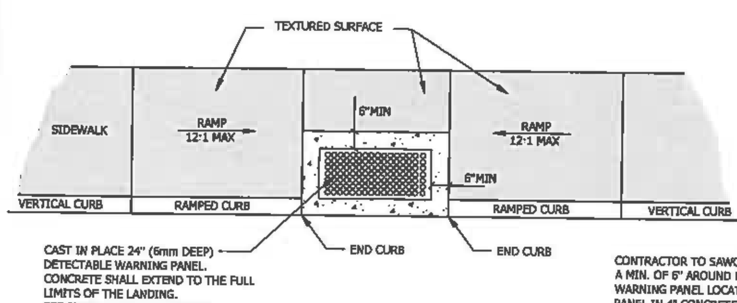
SIDEWALK RAMP DETAIL WITH WARNING PANEL

NOT TO SCALE



ET-PLUS ENERGY ABSORBING GUARDRAIL TERMINAL (EAGRT)
TRINITY HIGHWAY SAFETY PRODUCTS, INC.

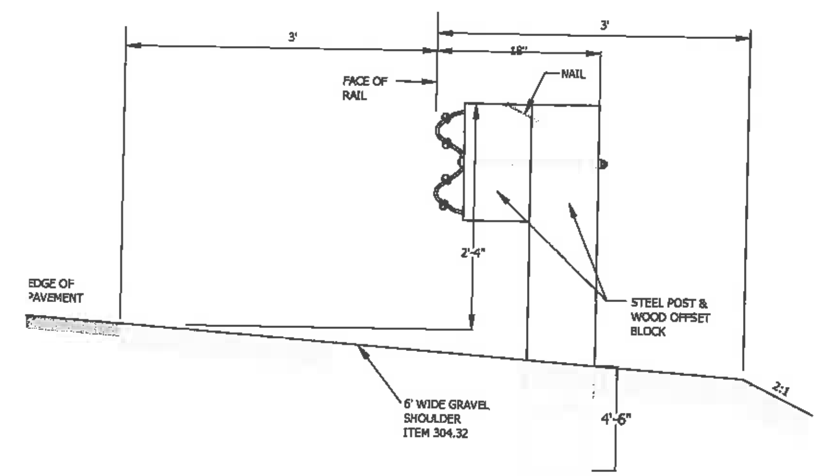
PER NHDOT SPECIFICATIONS
NOT TO SCALE



CONTRACTOR TO SAWCUT BIT. LANDING A MIN. OF 6" AROUND PERIMETER OF WARNING PANEL LOCATION. INSTALL PANEL IN 4" CONCRETE BASE. LEAVE 1/4" EXPANSION JOINT BETWEEN CONCRETE POUR AND BIT. SIDEWALK. JOINT TO BE SEALED WITH SONNEBORN SEALANT OR EQUIVALENT.

DETECTABLE WARNING PANEL INSTALLED IN BITUMINOUS SIDEWALK

NOT TO SCALE



BEAM GUARDRAIL / STEEL POSTS

PER NHDOT SPECIFICATIONS PLAN GR-2

DATE OF PRINT
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SEEDING RECOMMENDATIONS

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 THOROUGHLY INTO THE SOIL. THE SEEDBED SHOULD BE LEFT IN A REASONABLY FIRM AND SMOOTH CONDITION. THE LAST TILLAGE OPERATION SHOULD BE PERFORMED ACROSS THE SLOPE WHEREVER PRACTICAL.

3. **ESTABLISHING VEGETATION**
   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 100 LBS. PER 1,000 SQ. FT.
   -NITROGEN (N), 50 LBS., PER ACRE OR 1.1 LBS. PER 1,000 SQ. FT.
   -PHOSPHATE (P_2O_5), 100 LBS. PER ACRE OR 2.2 LBS. PER 1,000 SQ. FT.
   -POTASH (K_2O), 100 LBS. PER ACRE OR 2.2 LBS. PER 1,000 SQ. FT.

   (NOTE: THIS IS THE EQUIVALENT OF 500 LBS. PER ACRE OF 10-20-20 FERTILIZER OR 1,000 LBS. 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. SEEDING GUIDE:

USE	SEEDING MIXTURE (SEE 3D)	SOIL TYPE: DROUGHTY	WELL DRAINED	MOD. WELL DRAINED	POORLY DRAINED
STEEP CUTS AND FILLS, BORROW AND DISPOSAL AREAS	A	FAIR	GOOD	GOOD	FAIR
	B	POOR	GOOD	FAIR	FAIR
	C	FAIR	EXCELLENT	EXCELLENT	POOR
WATERWAYS, EMERGENCY SPILLWAYS, AND OTHER CHANNELS WITH FLOWING WATER	A	GOOD	GOOD	GOOD	FAIR
LIGHTLY USED PARKING LOTS, ODD AREAS, UNUSED LANDS, AND LOW INTENSITY USE RECREATION SITES	A	GOOD	GOOD	GOOD	FAIR
	B	GOOD	GOOD	FAIR	POOR

   D. SEEDING RATES:

MIXTURE:	POUNDS PER ACRE	POUNDS PER 1,000 SQ. FT.
A TALL FESCUE	20	0.45
CREEPING RED FESCUE	20	0.46
REDTOP	2	0.05
TOTAL:	42	0.95
B TALL FESCUE	15	0.35
CREEPING RED FESCUE	10	0.25
CROWN VETCH OR	15 OR	0.35 OR
FLATPEA	30	0.75
TOTAL:	40 OR 55	0.95 OR 1.35
C TALL FESCUE	20	0.45
FLATPEA	30	0.75
TOTAL:	50	1.20

   E. WHEN SEEDED AREAS ARE MULCHED, PLANTINGS MAY BE MADE FROM EARLY SPRING TO SEPTEMBER 15. WHEN SEEDED AREAS ARE NOT MULCHED, PLANTINGS SHOULD BE MADE FROM EARLY SPRING TO MAY 20 OR FROM AUGUST 10 TO SEPTEMBER 1.

   F. TEMPORARY SEEDING RATES:

SPECIES	POUNDS PER ACRE	POUNDS PER 1,000 SQ. FT.	REMARKS
WINTER RYE	112	2.5	BEST FOR FALL SEEDING. SEED FROM AUGUST TO SEPTEMBER 5TH FOR BEST COVER. SEED TO A DEPTH OF 1 INCH.
OATS	80	2.0	BEST FOR SPRING SEEDING. SEED NO LATER THAN MAY 15TH FOR SUMMER PROTECTION. SEED TO A DEPTH OF 1 INCH.
ANNUAL RYEGRASS	40	1.0	GROWS QUICKLY, BUT IS OF SHORT DURATION. USE WHERE APPEARANCES ARE IMPORTANT. SEED EARLY SPRING AND/OR BETWEEN AUGUST 15TH AND SEPTEMBER 15TH. COVER SEED WITH NO MORE THAN 0.25 INCH OF SOIL.
PERENNIAL RYEGRASS	30	0.7	GOOD COVER WHICH IS LONGER LASTING THAN ANNUAL RYEGRASS. SEED BETWEEN APRIL 1ST AND JUNE 1ST AND/OR BETWEEN AUGUST 15TH AND SEPTEMBER 15TH. MULCHING WILL ALLOW SEEDING THROUGHOUT THE GROWING SEASON. SEED TO A DEPTH OF APPROXIMATELY 0.5 INCH.

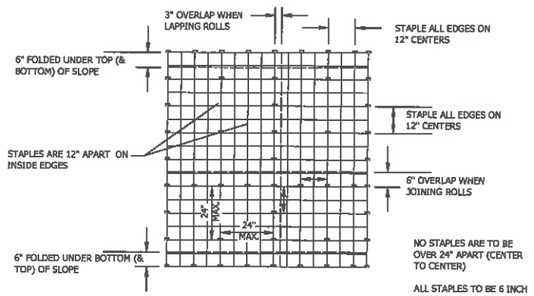
4. **MULCH**
   A. HAY, STRAW, OR OTHER MULCH, WHEN NEEDED, SHOULD BE APPLIED IMMEDIATELY AFTER SEEDING.

   B. MULCH WILL BE HELD IN PLACE USING APPROPRIATE TECHNIQUES FROM THE BEST MANAGEMENT PRACTICE FOR MULCHING.

5. **MAINTENANCE TO ESTABLISH A STAND**
   A. PLANTED AREAS SHOULD BE PROTECTED FROM DAMAGE BY FIRE, GRAZING, TRAFFIC, AND DENSE WEED GROWTH.

   B. FERTILIZATION NEEDS SHOULD BE DETERMINED BY ON SITE INSPECTIONS. SUPPLEMENTAL FERTILIZER IS USUALLY THE KEY TO FULLY COMPLETE THE ESTABLISHMENT OF THE STAND BECAUSE MOST PERENNIALS TAKE 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.



MULCH NETTING DETAIL

NO SCALE SOURCE: USDA SOIL CONSERVATION SERVICE

EROSION CONTROL GENERAL NOTES

A. KEEP SITE MODIFICATION TO A MINIMUM

1. CONSIDER FITTING THE BUILDINGS AND STREETS TO THE NATURAL TOPOGRAPHY. THIS REDUCES THE NEED FOR CUTS AND FILLS. AVOID EXTENSIVE GRADING THAT WOULD ALTER DRAINAGE PATTERNS OR CREATE VERY STEEP SLOPES.
2. EXPOSE AREAS OF BARE SOIL TO EROSIVE ELEMENTS FOR THE SHORTEST TIME POSSIBLE.
3. SAVE AND PROTECT DESIRABLE EXISTING VEGETATION WHERE POSSIBLE. ERECT BARRIERS TO PREVENT DAMAGE FROM CONSTRUCTION EQUIPMENT.
4. LIMIT THE GRADES OF SLOPES SO VEGETATION CAN BE EASILY ESTABLISHED AND MAINTAINED.
5. AVOID SUBSTANTIAL INCREASE IN RUNOFF LEAVING THE SITE.

B. MINIMIZE POLLUTION OF WATER DURING CONSTRUCTION ACTIVITIES

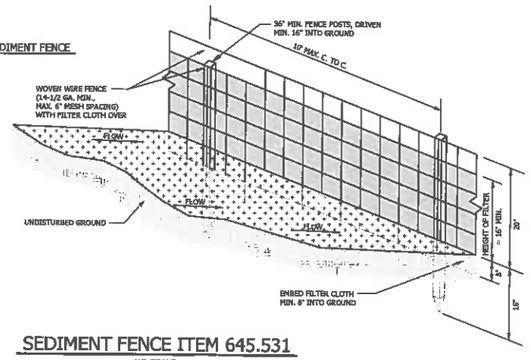
1. STOCKPILE TOPSOIL REMOVED FROM CONSTRUCTION AREA AND SPREAD OVER ANY DISTURBED AREAS PRIOR TO REVEGETATION. TOPSOIL STOCKPILES MUST BE PROTECTED FROM EROSION.
2. PROTECT BARE SOIL AREAS EXPOSED BY GRADING ACTIVITIES WITH TEMPORARY VEGETATION OR MULCHES.
3. USE SEDIMENT BASINS TO TRAP DEBRIS AND SEDIMENT WHICH WILL PREVENT THESE MATERIALS FROM MOVING OFF SITE.
4. USE DIVERSIONS TO DIRECT WATER AROUND THE CONSTRUCTION AREA AND AWAY FROM EROSION PRONE AREAS TO POINTS OF SAFE DISPOSAL.
5. USE TEMPORARY CULVERTS OR BRIDGES WHEN CROSSING STREAMS WITH EQUIPMENT.
6. PLACE CONSTRUCTION FACILITIES, MATERIALS, AND EQUIPMENT STORAGE AND MAINTENANCE AREAS AWAY FROM DRAINAGE WAYS.

C. PROTECT AREA AFTER CONSTRUCTION.

1. ESTABLISH GRASS OR OTHER SUITABLE VEGETATION ON ALL DISTURBED AREAS. SELECT SPECIES ADAPTED TO THE SITE CONDITIONS AND THE FUTURE USE OF THE AREA. FINAL GRADES SHALL BE SEEDED WITHIN 72 HOURS. STABILIZATION SHALL BE DEFINED AS 85% VEGETATIVE COVER.
2. MAINTAIN VEGETATED AREAS USING PROPER VEGETATIVE 'BEST MANAGEMENT PRACTICES' DURING THE CONSTRUCTION PERIOD.
3. MAINTAIN NEEDED STRUCTURAL 'BEST MANAGEMENT PRACTICES' AND REMOVE SEDIMENT FROM DETENTION PONDS AND SEDIMENT BASINS AS NEEDED.
4. DETERMINE RESPONSIBILITY FOR LONG TERM MAINTENANCE OF PERMANENT 'BEST MANAGEMENT PRACTICES'.
5. IF CONSTRUCTION IS ANTICIPATED DURING WINTER MONTHS, GRADED AREAS ARE TO BE STABILIZED WITH NORTH AMERICAN GREEN DS150 MATTING OR EQUAL.

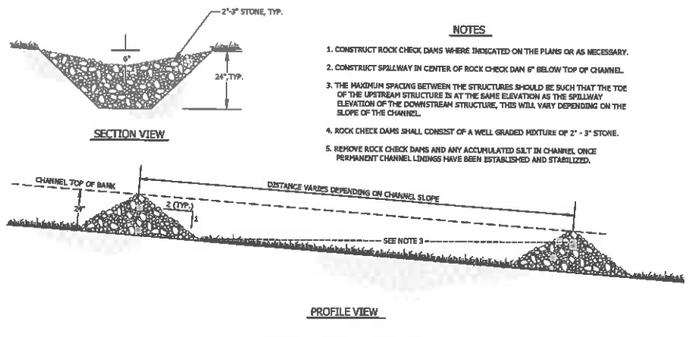
CONSTRUCTION NOTES FOR SEDIMENT FENCE

1. WOVEN WIRE FENCE TO BE FASTENED SECURELY TO FENCE POSTS WITH WIRE TIES OR STAPLES.
2. FILTER CLOTH TO BE FASTENED SECURELY TO WOVEN WIRE FENCE WITH TIES SPACED EVERY 24" AT TOP, MID SECTION, AND BOTTOM.
3. WHEN TWO SECTIONS OF FILTER CLOTH ADJOIN EACH OTHER, THEY SHALL BE OVERLAPPED BY 6 INCHES, FOLDED AND STAPLED.
4. MAINTENANCE SHALL BE PERFORMED AS NEEDED AND MATERIAL REMOVED WHEN "BULGES" DEVELOP IN THE SILT FENCE, OR 50% OF ITS STORAGE IS USED.



SEDIMENT FENCE ITEM 645.531

NO SCALE



NOTES

1. CONSTRUCT ROCK CHECK DAMS WHERE INDICATED ON THE PLANS OR AS NECESSARY.
2. CONSTRUCT SPILLWAY IN CENTER OF ROCK CHECK DAM 6" BELOW TOP OF CHANNEL.
3. THE MAXIMUM SPACING BETWEEN THE STRUCTURES SHOULD BE SUCH THAT THE TOE OF THE UPSTREAM STRUCTURE IS AT THE SAME ELEVATION AS THE SPILLWAY ELEVATION OF THE DOWNSTREAM STRUCTURE, THIS WILL VARY DEPENDING ON THE SLOPE OF THE CHANNEL.
4. ROCK CHECK DAMS SHALL CONSIST OF A WELL GRADED MIXTURE OF 2" - 3" STONE.
5. REMOVE ROCK CHECK DAMS AND ANY ACCUMULATED SILT IN CHANNEL ONCE PERMANENT CHANNEL LININGS HAVE BEEN ESTABLISHED AND STABILIZED.

ROCK CHECK DAM DETAIL

NO SCALE

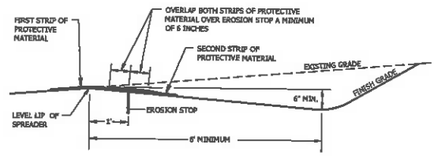
COLD WEATHER SITE STABILIZATION REQUIREMENTS

TO ADEQUATELY PROTECT WATER QUALITY DURING COLD WEATHER AND DURING SPRING RUNOFF, THE FOLLOWING ADDITIONAL STABILIZATION TECHNIQUES SHALL BE EMPLOYED DURING THE PERIOD FROM NOVEMBER 30 THROUGH MAY 1:

1. THE AREA OF EXPOSED, UNSTABILIZED SOIL SHALL BE LIMITED TO ONE ACRE AND SHALL BE PROTECTED AGAINST EROSION BY THE METHODS DESCRIBED IN THIS SECTION PRIOR TO ANY THAW OR SPRING MELT EVENT. THE ALLOWABLE AREA OF EXPOSED SOIL MAY BE INCREASED IF A WINTER CONSTRUCTION PLAN, DEVELOPED BY A QUALIFIED ENGINEER OR A CPESC SPECIALIST, IS REVIEWED AND APPROVED BY NHDES.
2. ALL PROPOSED VEGETATED AREAS HAVING A SLOPE OF LESS THAN 15% WHICH DO NOT EXHIBIT A MINIMUM OF 85% VEGETATIVE GROWTH BY NOVEMBER 30, OR WHICH ARE DISTURBED AFTER NOVEMBER 30, SHALL BE SEEDED AND COVERED WITH 3 TO 4 TONS OF HAY OR STRAW MULCH PER ACRE SECURED WITH ANCHORED NETTING OR TACKIFIER, OR 2 INCHES OF EROSION CONTROL MIX MEETING THE CRITERIA OF ENV-WQ 1506.05(D) THROUGH (H).
3. ALL PROPOSED VEGETATED AREAS HAVING A SLOPE OF GREATER THAN 15% WHICH DO NOT EXHIBIT A MINIMUM OF 85% VEGETATIVE GROWTH BY NOVEMBER 30, OR WHICH ARE DISTURBED AFTER NOVEMBER 30, SHALL BE SEEDED AND COVERED WITH A PROPERLY INSTALLED AND ANCHORED EROSION CONTROL BLANKET OR WITH A MINIMUM 4 INCH THICKNESS OF EROSION CONTROL MIX MEETING THE CRITERIA OF ENV-WQ 1506.05(D) THROUGH (H).
4. INSTALLATION OF ANCHORED HAY MULCH OR EROSION CONTROL MIX, MEETING THE CRITERIA OF ENV-WQ 1506.05(D) THROUGH (H), SHALL NOT OCCUR OVER SNOW OF GREATER THAN ONE INCH IN DEPTH.
5. INSTALLATION OF EROSION CONTROL BLANKETS SHALL NOT OCCUR OVER SNOW OF GREATER THAN ONE INCH IN DEPTH OR ON FROZEN GROUND.
6. ALL PROPOSED STABILIZATION IN ACCORDANCE WITH NOTES 2 OR 3 ABOVE, SHALL BE COMPLETED WITHIN A DAY OF ESTABLISHING THE GRADE THAT IS FINAL OR THAT OTHERWISE WILL EXIST FOR MORE THAN 5 DAYS.
7. ALL DITCHES OR SWALES WHICH DO NOT EXHIBIT A MINIMUM OF 85% VEGETATIVE GROWTH BY NOVEMBER 30, OR WHICH ARE DISTURBED AFTER NOVEMBER 30, SHALL BE STABILIZED TEMPORARILY WITH STONE OR EROSION CONTROL BLANKETS APPROPRIATE FOR THE DESIGN FLOW CONDITIONS, AS DETERMINED BY THE OWNER'S ENGINEERING CONSULTANT.
8. AFTER NOVEMBER 30, INCOMPLETE ROAD OR PARKING AREAS WHERE ACTIVE CONSTRUCTION OF THE ROAD OR PARKING AREA HAS STOPPED FOR THE WINTER SEASON SHALL BE PROTECTED WITH A MINIMUM 3 INCH LAYER OF BASE COURSE GRAVELS MEETING THE GRADATION REQUIREMENTS OF NHDOT STANDARD SPECIFICATION FOR ROAD AND BRIDGE CONSTRUCTION, 2006, ITEM NO. 304.1 OR 304.2.

LEVEL LIP SPREADER INSTALLATION

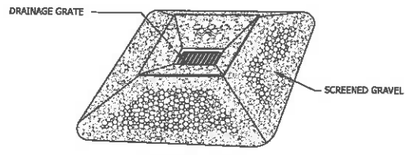
1. CONSTRUCT THE LEVEL SPREADER LIP ON A ZERO PERCENT GRADE TO INSURE UNIFORM SPREADING OF RUNOFF.
2. LEVEL SPREADER SHALL BE CONSTRUCTED ON UNDISTURBED SOIL AND NOT ON FILL.
3. AN EROSION STOP SHALL BE PLACED VERTICALLY A MINIMUM OF SIX INCHES DEEP IN A SLIT TRENCH ONE FOOT BACK OF THE LEVEL LIP AND PARALLEL TO THE LIP. THE EROSION STOP SHALL EXTEND THE ENTIRE LENGTH OF THE LEVEL LIP.
4. THE ENTIRE LEVEL LIP AREA SHALL BE PROTECTED BY PLACING TWO STRIPS OF JUTE OR EXCELSIOR MATTING ALONG THE LIP. EACH STRIP SHALL OVERLAP THE EROSION STOP BY AT LEAST SIX INCHES.
5. THE ENTRANCE CHANNEL TO THE LEVEL SPREADER SHALL NOT EXCEED A 1 PERCENT GRADE FOR AT LEAST 50 FEET BEFORE ENTERING INTO THE SPREADER.
6. THE FLOW FROM THE LEVEL SPREADER SHALL OUTLET ONTO STABILIZED AREAS. WATER SHOULD NOT RE-CONCENTRATE IMMEDIATELY BELOW THE SPREADER.
7. PERIODIC INSPECTION AND REQUIRED MAINTENANCE SHALL BE PERFORMED.
8. PROTECTIVE MATERIAL AND EROSION STOP SHALL BE NORTH AMERICAN GREEN C125 EROSION CONTROL BLANKET OR APPROVED EQUAL.



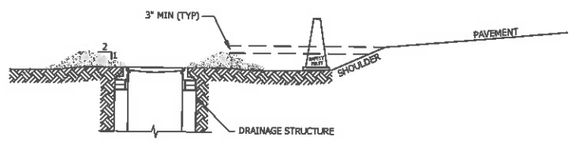
LEVEL SPREADER DETAIL

NO SCALE

SOURCE: ROCKINGHAM COUNTY CONSERVATION SERVICE



PERSPECTIVE VIEW



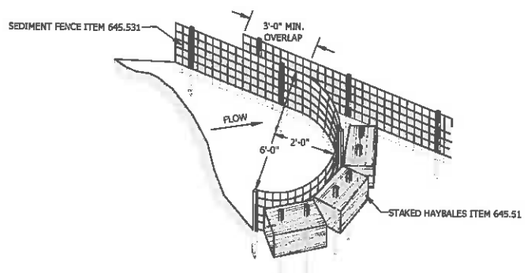
SECTION

MATERIALS SPECIFICATIONS:
1. SCREENED GRAVEL: UNIFORMLY GRADED 1" TO 4" DIA. STONE.

CONSTRUCTION SPECIFICATIONS:
1. INSTALL GRAVEL INLET PROTECTION WHERE INDICATED OR WARRANTED.
2. FOR ALL INSTALLATIONS WHERE INLET PROTECTION IS WITHIN 8' OF EDGE OF PAVEMENT, A ROADWAY CONE SHALL BE USED BETWEEN CATCH BASIN AND SHOULDER.
3. ENSURE CREST OF GRAVEL PLACED AROUND CATCH BASIN IS AT LEAST 3" BELOW ELEVATION OF EDGE OF PAVEMENT.

CATCH BASIN INLET PROTECTION DETAIL

NO SCALE



SEDIMENT FENCE POCKET

NO SCALE

CONSTRUCTION SEQUENCE

1. PREPARE AN EROSION CONTROL PLAN OR A STORMWATER POLLUTION PREVENTION PLAN (SWPPP) IN ACCORDANCE WITH LOCAL, STATE, AND FEDERAL REQUIREMENTS.
2. INSTALL CONSTRUCTION ENTRANCE, SEE DETAIL.
3. CUT AND CLEAR TREES WITHIN THE CLEARING LIMITS.
4. INSTALL SILT FENCES, ROCK CHECK DAMS, AND OTHER APPROPRIATE EROSIONS CONTROL MEASURES AT LOCATIONS SHOWN ON THE PLANS AND AS NEEDED.
5. GRUB SITE WITHIN GRADING LIMITS.
6. STRIP AND STOCKPILE TOPSOIL AND INSTALL EROSION CONTROL MEASURES.
7. INSTALL SILT FENCE, CHECK DAMS, AND HAYBALES, AS REQUIRED.
8. CONSTRUCT PERMANENT STORMWATER CONTROLS AS SOON AS PRACTICAL. DO NOT DIRECT STORMWATER TOWARD TREATMENT SWALES, DITCHES AND LEVEL SPREADERS UNTIL THEY HAVE BEEN STABILIZED.
9. PROCEED WITH WORK, LIMITING THE DURATION OF DISTURBANCE. THE MAXIMUM WORK UNIT AREA SHALL BE FIVE ACRE IN SIZE. THE MAXIMUM LENGTH OF TIME THAT A WORK UNIT MAY BE LEFT UNSTABILIZED IS 30 DAYS.
10. BEGIN SEEDING AND MULCHING IMMEDIATELY AFTER GRADING. ALL DISTURBED AREAS SHALL BE STABILIZED WITH APPROVED METHODS WITHIN 72 HOURS OF ACHIEVING FINISHED GRADE.

    AN AREA SHALL BE CONSIDERED STABLE IF ONE OF THE FOLLOWING HAS OCCURRED:
    A) BASE COURSE GRAVELS HAVE BEEN INSTALLED IN AREAS TO BE PAVED;
    B) A MINIMUM OF 85% VEGETATED GROWTH HAS BEEN ESTABLISHED;
    C) A MINIMUM OF 3" OF NON-EROSIVE MATERIAL SUCH AS STONE OR RIPRAP HAS BEEN INSTALLED; OR
    D) EROSION CONTROL BLANKETS HAVE BEEN PROPERLY INSTALLED.
11. INSPECT ALL EROSION CONTROL MEASURES ON A DAILY BASIS AND AFTER EVERY 0.5 INCHES OF PRECIPITATION. MAINTAIN SILT FENCE, SEDIMENT TRAPS, HAY BALES, ETC., AS NECESSARY.
12. PAVE ROADWAYS AND/OR PARKING AREAS.
13. PLACE TOPSOIL, SEED AND MULCH.
14. COMPLETE ALL REMAINING PERMANENT EROSION CONTROL STRUCTURES.
15. MONITOR THE SITE AND MAINTAIN STRUCTURES AS NEEDED UNTIL FULL VEGETATION IS ESTABLISHED.

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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATION

DIXVILLE, NEW HAMPSHIRE

EROSION CONTROL NOTES AND DETAILS

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
1	05/16	PLANNING BOARD COMMENTS	JCD	SJB

NOT FOR CONSTRUCTION FOR APPROVAL

DATE: APRIL 2016	PROJECT #: 15247
ENGIN'D BY: JCD	DRAWN BY: JCD
CHECK'D BY: SML	ARCHIVE #: H-5267

C-5.4

DATE OF PRINT
MAY 18 2016
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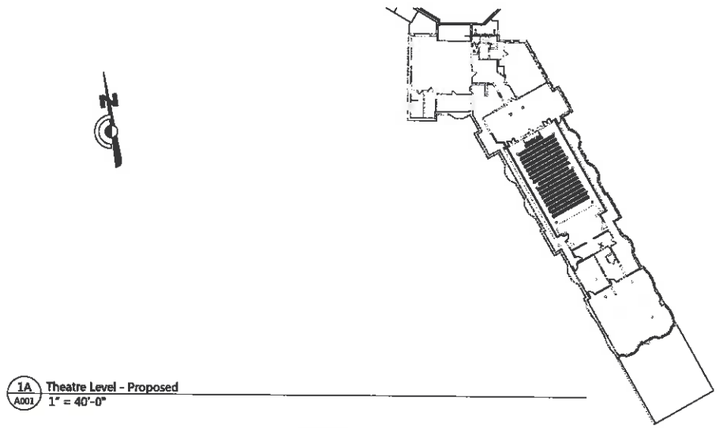
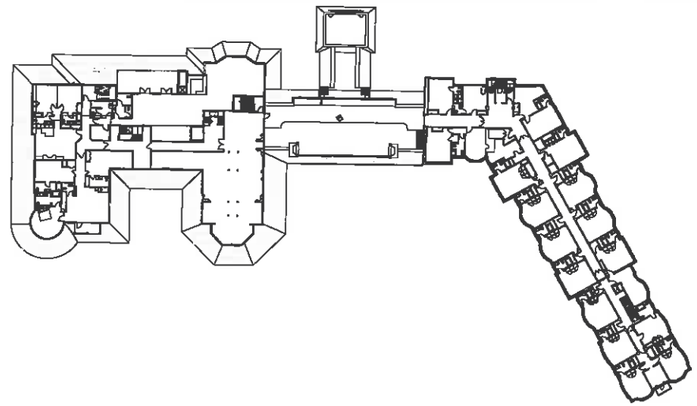
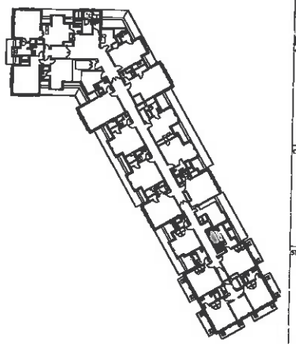
last revised: 2011 OCT 28



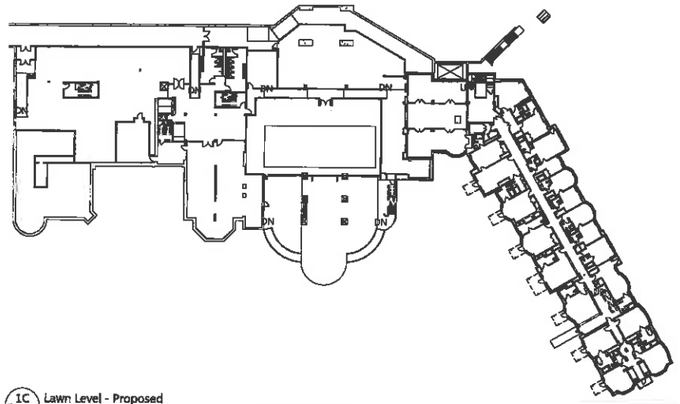
1A A001 Theatre Level - Proposed
1" = 40'-0"



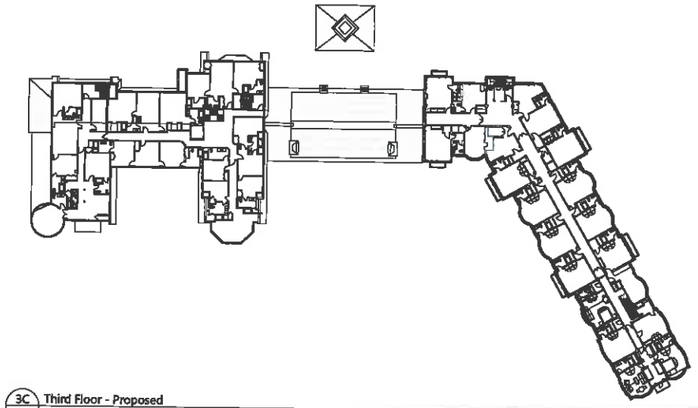
3A A001 Second Floor - Proposed
1" = 40'-0"



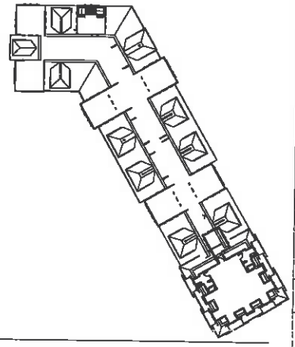
5A A001 Fifth Floor - Proposed
1" = 40'-0"



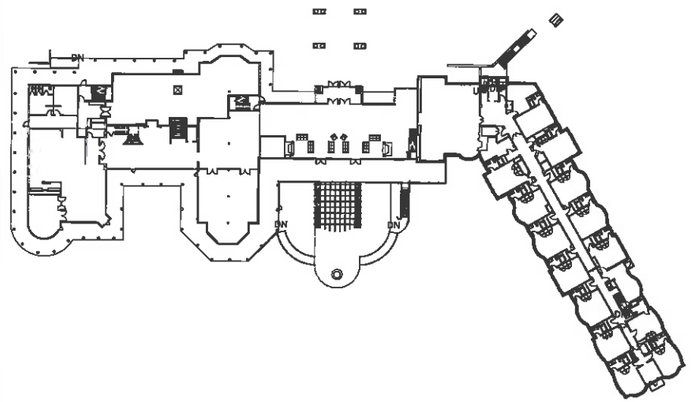
1C A001 Lawn Level - Proposed
1" = 40'-0"



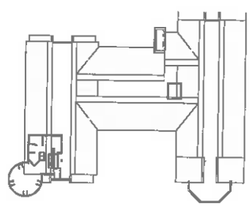
3C A001 Third Floor - Proposed
1" = 40'-0"

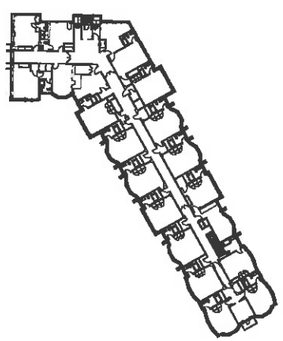


5C A001 Sixth Floor - Proposed
1" = 40'-0"



1D A001 First Floor - Proposed
1" = 40'-0"





3D A001 Fourth Floor - Proposed
1" = 40'-0"

Gross Building Heated SF		
Area	Level	Name
Theatre Level		
10,794 SF	Theatre Level	Hampshire House Existing
439 SF	Theatre Level	Hampshire House New
1,744 SF	Theatre Level	Patio New
12,978 SF		
Lawn Level		
8,829 SF	Lawn Level	Connector New
7,765 SF	Lawn Level	Dixville House Existing
5,563 SF	Lawn Level	Dixville House New
11,171 SF	Lawn Level	Hampshire House Existing
2,982 SF	Lawn Level	Patio New
3,816 SF	Lawn Level	Tunnel New
40,125 SF		
First Floor		
3,589 SF	First Floor	Connector New
7,207 SF	First Floor	Covered Porch New
6,771 SF	First Floor	Dixville House Existing
4,221 SF	First Floor	Dixville House New
10,708 SF	First Floor	Hampshire House Existing
92 SF	First Floor	Hampshire House New
32,588 SF		
Second Floor		
101 SF	Second Floor	Balcony Existing
468 SF	Second Floor	Balcony New
1,094 SF	Second Floor	Connector New
6,389 SF	Second Floor	Dixville House Existing
4,065 SF	Second Floor	Dixville House New
10,708 SF	Second Floor	Hampshire House Existing
92 SF	Second Floor	Hampshire House New
22,916 SF		
Third Floor		
5,936 SF	Third Floor	Dixville House Existing
3,707 SF	Third Floor	Dixville House New
10,708 SF	Third Floor	Hampshire House Existing

Gross Building Heated SF		
Area	Level	Name
92 SF	Third Floor	Hampshire House New
20,443 SF		
Fourth Floor		
755 SF	Fourth Floor	Dixville House Existing
10,708 SF	Fourth Floor	Hampshire House Existing
92 SF	Fourth Floor	Hampshire House New
11,555 SF		
Fifth Floor		
9,732 SF	Fifth Floor	Hampshire House Existing
9,732 SF		
Sixth Floor		
1,409 SF	Sixth Floor	Hampshire House Existing
1,409 SF		
151,747 SF		

Building Areas		
Area Use	Area	Comments
Business/Retail	2,671 SF	
Common	59,245 SF	
Kitchen	8,027 SF	
Outdoor Seating	6,912 SF	
Residential	50,648 SF	
Restaurant/Bar	12,470 SF	
Theatre & Bar	7,937 SF	

Key Commercial Spaces		
Name	Area	Occupancy
Theatre Level		
Speakeasy Bar	1,533 SF	50
Theatre	2,182 SF	206
Speakeasy Patio	1,743 SF	50
Lawn Level		
Gift Shop	502 SF	
Salon	515 SF	
Sports Bar	2,077 SF	60
First Floor		
Ballot Bar	1,362 SF	40
Ballot Room Restaurant	2,674 SF	100
Second Floor		
Century Club	4,548 SF	120
Room	578 SF	

1:40 0' 20' 40' 80' 160'
1/16" 0' 8' 16' 32' 64'
1/8" 0' 4' 8' 16' 32'
1/4" 0' 2' 4' 8' 16'
1/2" 0' 6" 1' 2' 4'

TMS architects
commercial division
One Cate Street
Eldredge Park
Portsmouth, NH
P 603 436 4274
F 603 431 1826
www.tmsarchitects.co

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YEATON ASSOCIATES, INC.

Revision & Reissue Notes

Rev. No.	Date	Description

SITE PLAN REVIEW APPLICATION

PROJECT NUMBER
2016015

Hampshire House/Dix House Site Plan Review

The Balsams Grand Resort
1000 Cold Spring Road
Dixville Notch, NH

Key Plans

A001

DRAWN BY JMW
CHECKED BY SA
SHEET SCALE 1" = 40'-0"
SHEET DATE 5.13.2016

C:\Users\jmw\Documents\2016015 - Hampshire House-Dix House-CURRENT 2017_jwhite715.rvt

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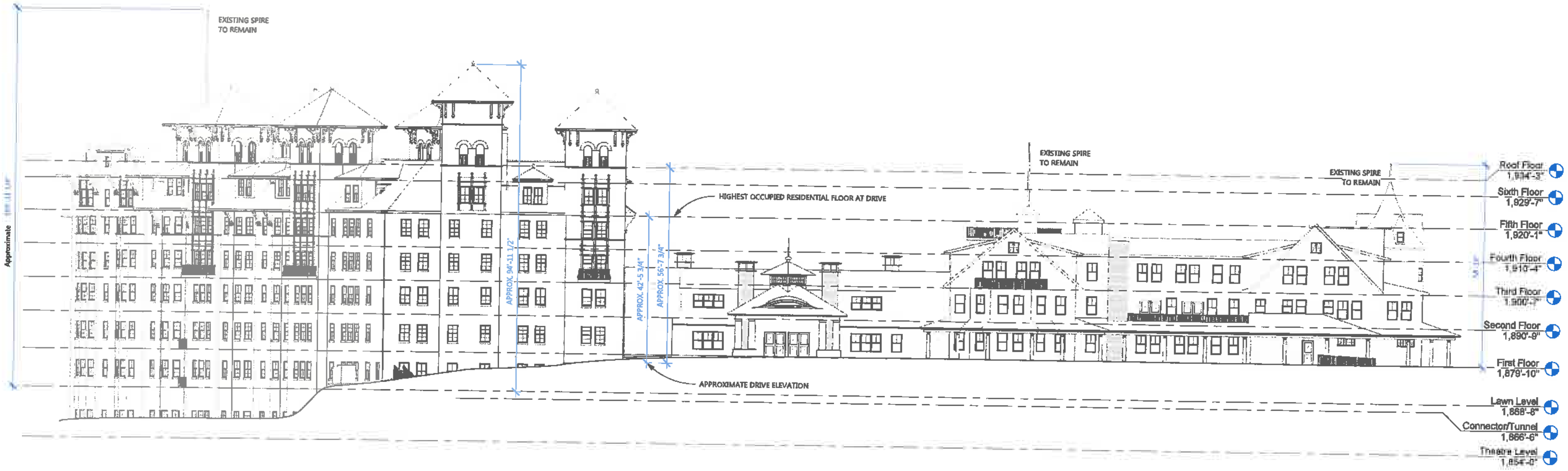
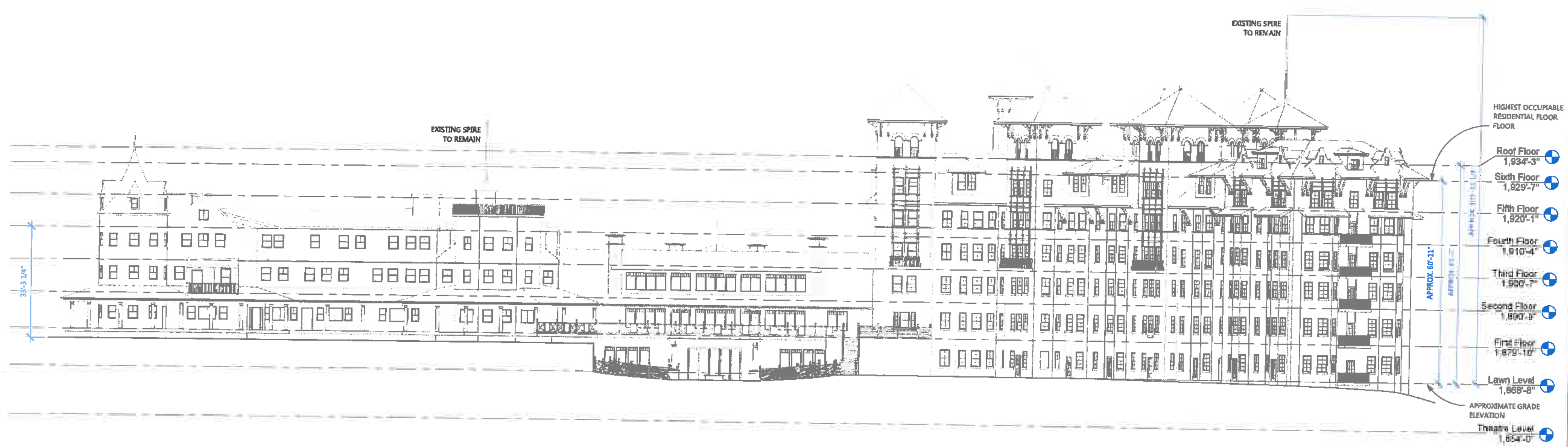


1B / A200 **Overall North Elevation**
1/16" = 1'-0"



1D / A200 **Overall South Elevation**
1/16" = 1'-0"

1:40 0' 20' 40' 80' 160'
1/16" 0' 8' 16' 32' 64'
1/8" 0' 4' 8' 16' 32'
1/4" 0' 2' 4' 8' 16'
1/2" 0' 6" 1' 2' 4'

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Rev. No.	Date	Description

SITE PLAN REVIEW APPLICATION

Hampshire House/Dix House Site Plan Review

The Balsams Grand Resort
1000 Cold Spring Road
Dixville Notch, NH

Overall Building Elevations

A200

MW
SA
1/16" = 1'-0"

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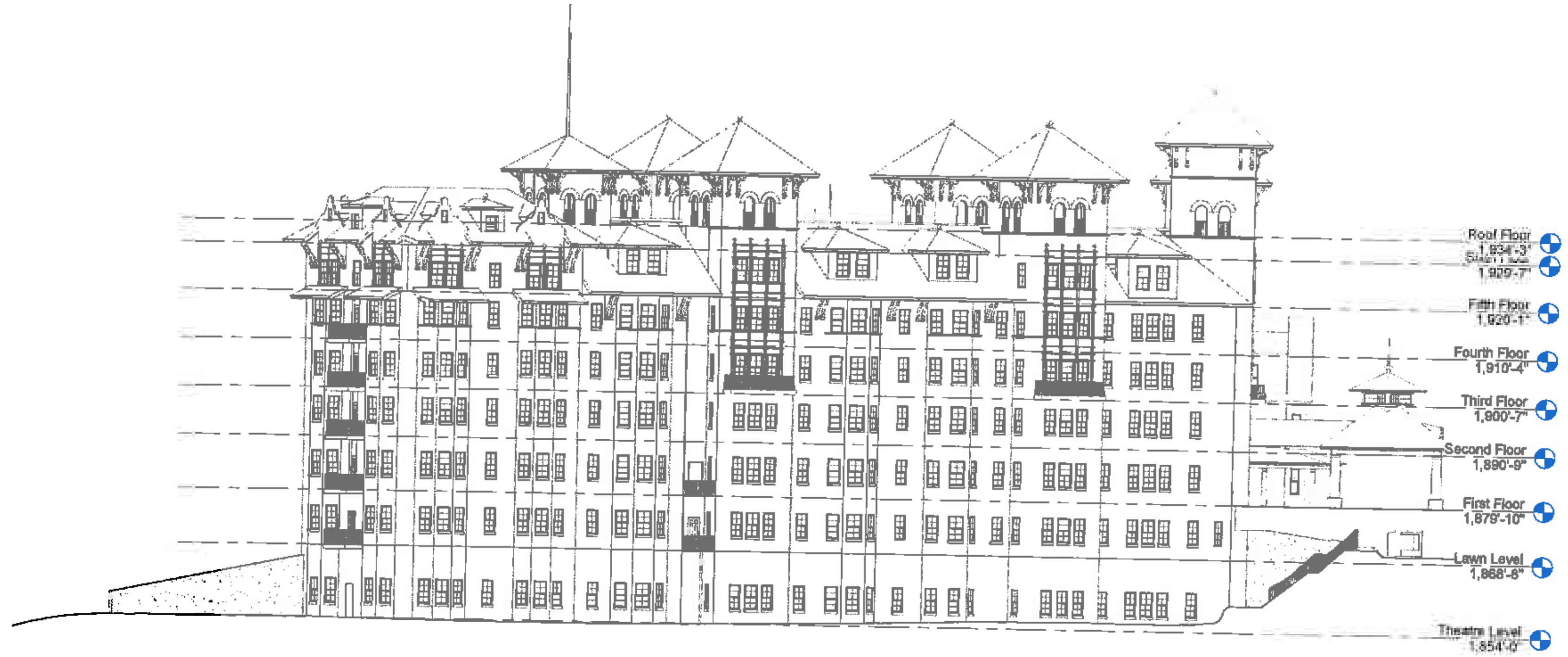
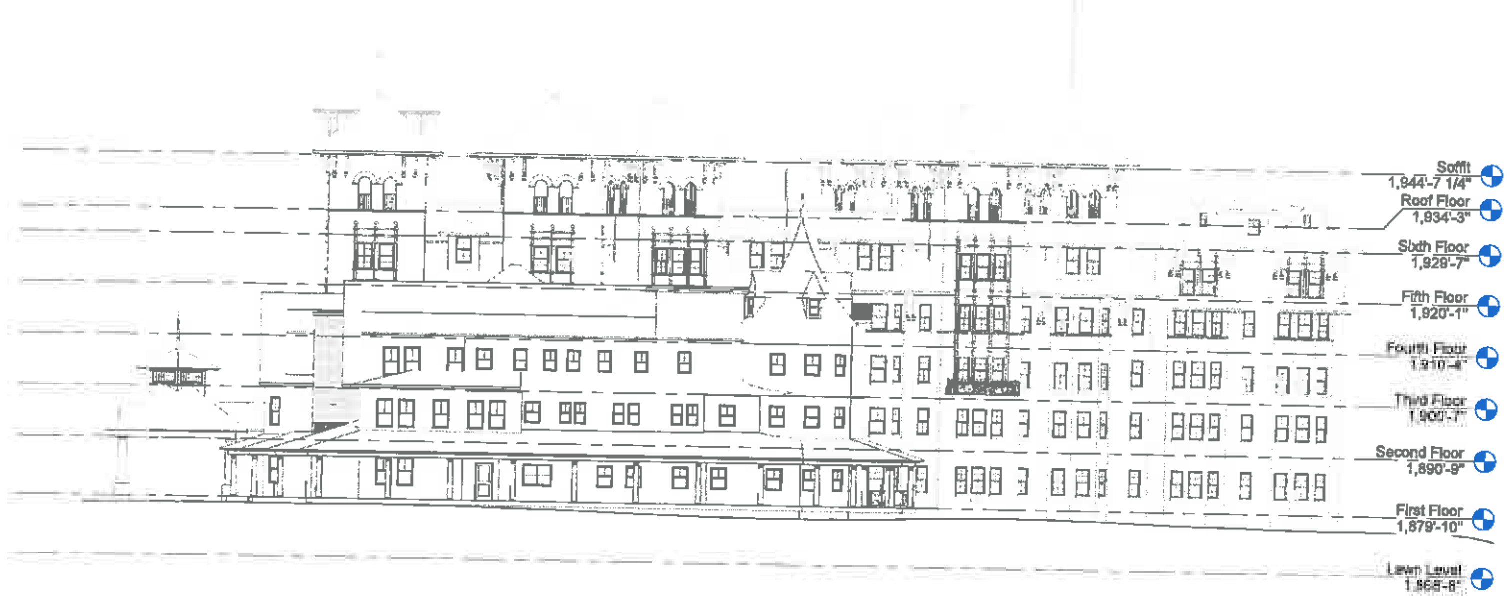


2B / A201 **Overall East Elevation**
1/16" = 1'-0"



2D / A201 **Overall West Building Elevation**
1/16" = 1'-0"

1:40 0' 20' 40' 80' 160'
1/16" 0' 8' 16' 32' 64'
1/8" 0' 4' 8' 16' 32'
1/4" 0' 2' 4' 8' 16'
1/2" 0' 6" 1' 2' 4'

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VEATON ASSOCIATES, INC

Revision & Release Notes

Rev No.	Date	Description

SITE PLAN REVIEW APPLICATION

2016015

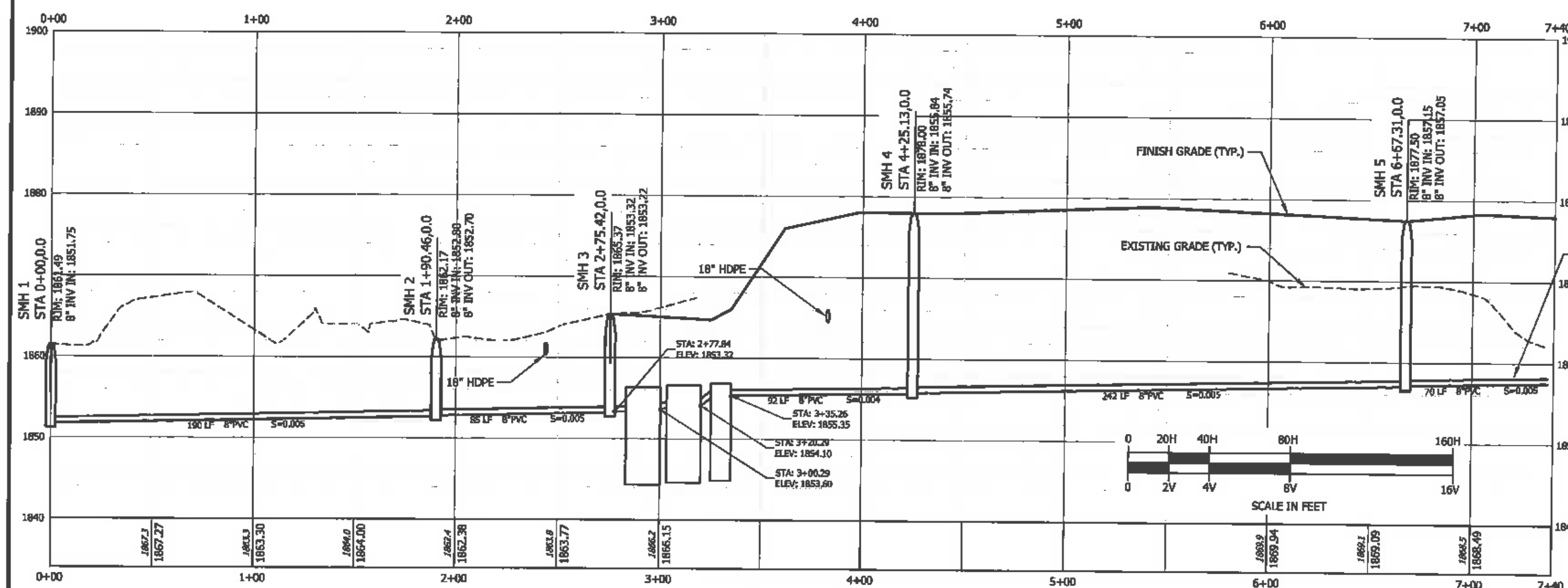
Hampshire House/Dix House Site Plan Review

The Balsams Grand Resort
1000 Cold Spring Road
Dixville Notch, NH

Overall Building Elevations

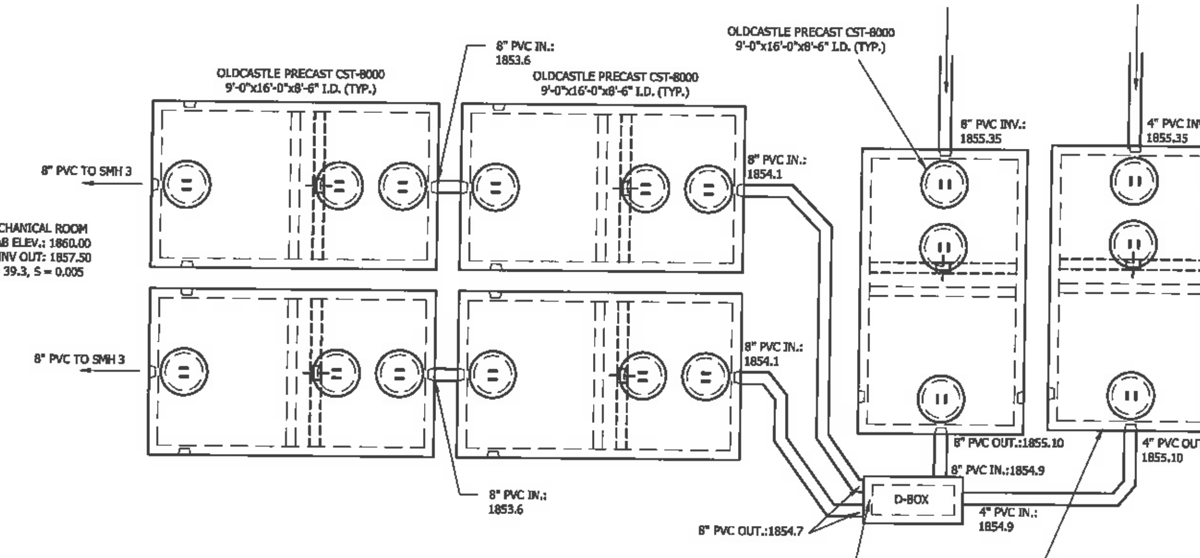
A201

MW
SA
1/16" = 1'-0"



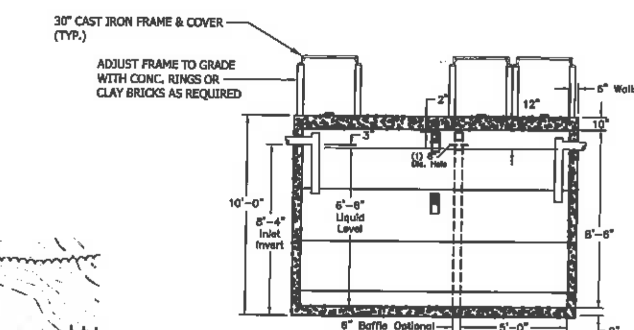
Sewermain

STA: 0+00 to STA: 7+40

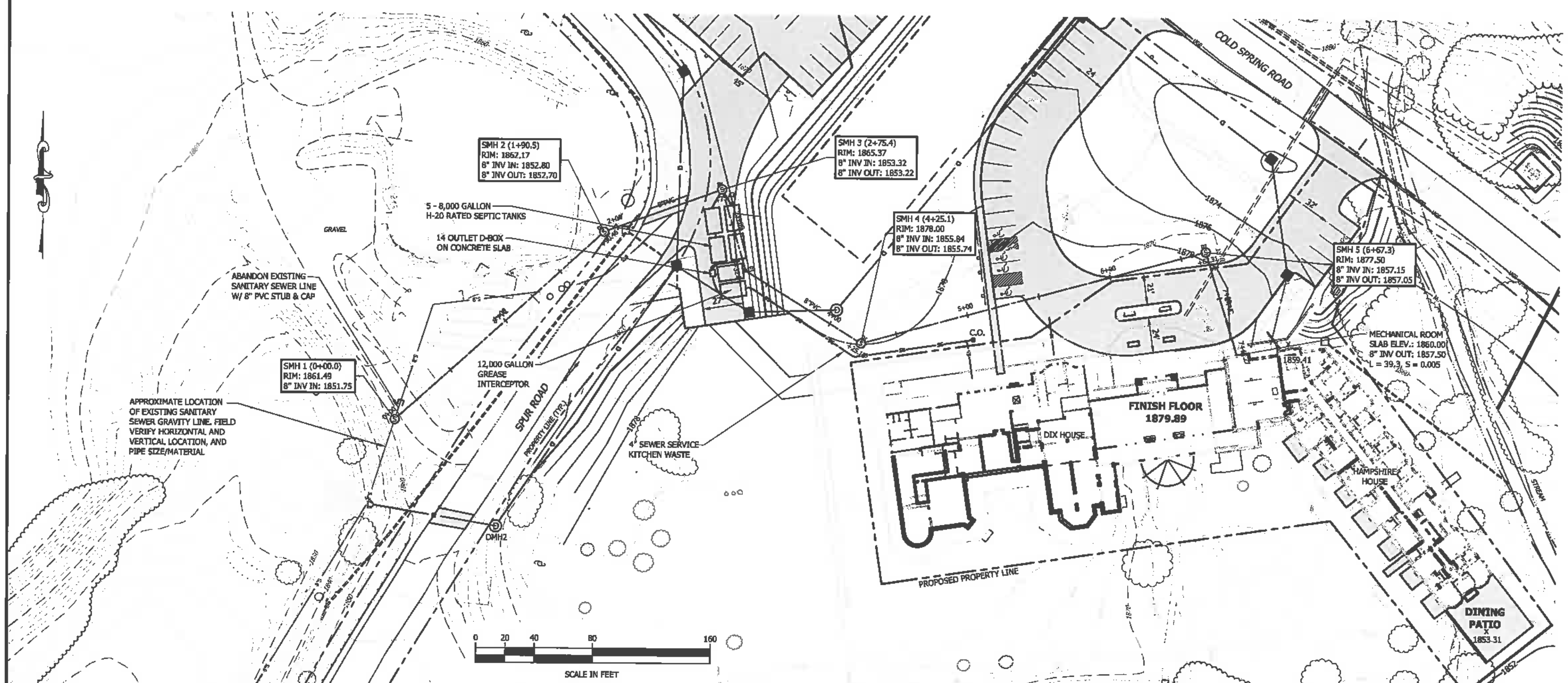


PLAN VIEW TANK LAYOUT

NOT TO SCALE



OLDCASTLE PRECAST CST-8000
9'-0"x16'-0"x8'-6" I.D. (TYP.)
SEPTIC TANK
SECTION VIEW



DATE OF PRINT
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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

GRAVITY SEWER SITE PLAN & DETAIL SHEET

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
		FOR NHDES APPROVAL		

DATE: MAY 2016	PROJECT #: 15247
ENGIN'D BY: JCD	DRAWN BY: JCD
CHECK'D BY: DBL	ARCHIVE #: H-5267

C-2.6

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SEWER NOTES

1. GENERAL

CONSTRUCTION OF ALL COMPONENTS OF THE SANITARY SEWER SYSTEM SHALL CONFORM TO THE MOST CURRENT VERSION OF THE NEW HAMPSHIRE CODE OF ADMINISTRATIVE RULES ENV-WQ 700 AND TECHNICAL SPECIFICATIONS ENTITLED *Highway Design Manual, NHDOT Standard Plans for Construction, dated 2010*.

2. TYPES OF SEWERS

A. THERE SHALL BE NO CONNECTION BETWEEN SANITARY SEWERS AND STORM SEWERS.
B. RUNOFF FROM ROOFS, STREETS, AND OTHER AREAS AND GROUNDWATER FROM FOUNDATION DRAINS, SUMP PUMPS, OR OTHER SUBSURFACE DRAINS SHALL BE EXCLUDED FROM SANITARY SEWERS.

3. SEWER SIZE AND COVER

A. MINIMUM PIPE SIZE FOR GRAVITY SEWER MAINS SHALL BE 8 INCHES.
B. MINIMUM PIPE SIZE FOR GRAVITY SEWER SERVICES SHALL BE 4 INCHES.
C. MINIMUM PIPE SIZE FOR FORCE MAIN SEWER SERVICES SHALL BE 2 INCHES.
D. SANITARY SEWERS SHALL HAVE 6 FEET MINIMUM COVER IN ALL ROADWAY LOCATIONS AND 4 FEET MINIMUM COVER IN ALL CROSS-COUNTRY LOCATIONS.

4. PIPE AND FITTING MATERIALS:

A. DUCTILE IRON PIPE (ITEM 612.43)

DUCTILE IRON PIPE AND FITTINGS SHALL CONFORM TO THE FOLLOWING STANDARDS OF THE AMERICAN WATER WORKS ASSOCIATION:
(1) AWWA C151 FOR DUCTILE IRON PIPE, CENTRIFUGALLY CAST IN METAL OR SAND LINED MOLDS, FOR WATER OR OTHER LIQUIDS;
(2) AWWA C150 FOR THICKNESS DESIGN OF DUCTILE IRON PIPE AND WITH ASTM A 536 IRON CASTINGS; AND
(3) JOINTS SHALL BE MECHANICAL TYPE, PUSH-ON TYPE, OR BALL-AND-SOCKET TYPE;

B. PVC (POLY VINYL CHLORIDE) PIPE

PVC PIPE AND FITTINGS SHALL BE APPROVED FOR SEWAGE SERVICE AND CONFORM TO THE FOLLOWING:
(1) PVC PIPE USED FOR GRAVITY SEWERS SHALL BE TYPE SDR 35 CONFORMING TO ASTM D3034;
(2) PVC PIPE USED FOR FORCE MAINS SHALL BE TYPE SDR 26 CONFORMING TO ASTM D2241 OR ASTM D1785;
(3) JOINTS SHALL BE PUSH-ON, BELL-AND-SPIGOT TYPE HAVING OIL RESISTANT COMPRESSION RINGS OF ELASTOMERIC MATERIAL CONFORMING TO ASTM D3212.

5. BEDDING

PIPE BEDDING SHALL BE SCREENED GRAVEL AND/OR CRUSHED STONE FREE FROM ORGANIC MATTER, CLAY, AND/OR LOAM MEETING ASTM C33 STONE SIZE NO. 67. BEDDING SHALL EXTEND FROM THE SPRING LINE OF THE PIPE TO A MINIMUM DEPTH OF 6" BELOW THE BOTTOM OF THE PIPE OUTSIDE SURFACE.

100% PASSING	1 INCH SCREEN
90-100% PASSING	¾ INCH SCREEN
20-55% PASSING	⅜ INCH SCREEN
0-10% PASSING	#4 SIEVE
0-5% PASSING	#8 SIEVE

6. MANHOLES (ITEM 604.314)

A. PRECAST CONCRETE BARREL SECTIONS, CONES, AND BASES SHALL CONFORM TO ASTM C478.
B. MANHOLES SHALL BE DESIGNED FOR H-20 LOADING.
C. HORIZONTAL JOINTS BETWEEN BARREL SECTIONS SHALL BE OF AN OVERLAPPING TYPE WHICH SHALL DEPEND UPON A DOUBLE ROW OF ELASTOMERIC OR MASTIC-LIKE SEALANT FOR WATER TIGHTNESS.
D. PIPE TO MANHOLE JOINTS SHALL BE AS FOLLOWS:
(1) ELASTOMERIC, RUBBER SLEEVE WITH WATERTIGHT JOINTS AT THE MANHOLE OPENING AND PIPE SURFACES;
(2) CAST INTO THE WALL OR SECURED WITH STAINLESS STEEL CLAMPS;
(3) ELASTOMERIC SEALING RING CAST IN THE MANHOLE OPENING WITH SEAL FORMED ON THE SURFACE OF THE PIPE BY COMPRESSION OF THE RING; AND
(4) NON-SHRINK GROUTED JOINTS WHERE WATERTIGHT BONDING TO THE MANHOLE AND PIPE CAN BE OBTAINED.

E. MANHOLES SHALL HAVE A BRICK PAVED SHELF AND INVERT CONSTRUCTED TO CONFORM TO THE SIZE OF PIPE AND FLOW. AT CHANGES IN DIRECTION, THE INVERTS SHALL BE LAID OUT IN CURVES OF THE LONGEST RADIUS POSSIBLE TANGENT TO THE CENTER LINE OF THE SEWER PIPES. SHELVES SHALL BE CONSTRUCTED TO THE ELEVATION OF THE HIGHEST PIPE CROWN AND SLOPED TO DRAIN TOWARD THE FLOWING THROUGH CHANNEL. UNDERLAYMENT OF INVERT AND SHELF SHALL CONSIST OF BRICK MASONRY. INVERTS AND SHELVES SHALL BE PLACED AFTER TESTING.

F. MORTAR AND PARGING SHALL CONFORM TO ASTM C 270, TYPE S, USING ASTM C 150, TYPE II PORTLAND CEMENT

G. SANITARY SEWER LINE ABANDONMENT-ALL ABANDONED PIPES SHALL BE CONCRETE CAPPED TO PREVENT MIGRATION OF SOIL AND WATER. ABANDONED MANHOLES SHALL BE FILLED WITH CONCRETE.

7. PROTECTION OF WATER SUPPLIES

A. THERE SHALL BE NO PHYSICAL CONNECTION BETWEEN A PUBLIC OR PRIVATE WATER SUPPLY SYSTEM AND A SEWER OR SEWER APPURTENANCE WHICH WOULD PERMIT THE PASSAGE OF SEWAGE OR POLLUTED WATER INTO THE POTABLE SUPPLY. NO WATER PIPE SHALL PASS THROUGH OR COME IN CONTACT WITH ANY PART OF A SEWER OR SEWER MANHOLE.

B. NO SEWER SHALL BE LOCATED WITHIN THE WELL PROTECTIVE RADII ESTABLISHED IN ENV-WS 300 FOR ANY PUBLIC WATER SUPPLY WELLS OR WITHIN 100 FEET OF ANY PRIVATE WATER SUPPLY WELL.

C. SEWERS SHALL BE LOCATED AT LEAST 10 FEET HORIZONTALLY FROM ANY EXISTING OR PROPOSED WATER MAIN.

D. A DEVIATION FROM THE SEPARATION REQUIREMENTS OF (B) OR (C) ABOVE SHALL BE ALLOWED WHERE NECESSARY TO AVOID CONFLICT WITH SUBSURFACE STRUCTURES, UTILITY CHAMBERS, AND BUILDING FOUNDATIONS, PROVIDED THAT THE SEWER IS CONSTRUCTED IN ACCORDANCE WITH THE FORCE MAIN CONSTRUCTION REQUIREMENTS SPECIFIED IN ENV-WQ 704.06.

E. WHENEVER SEWERS MUST CROSS WATER MAINS, THE SEWER SHALL BE CONSTRUCTED AS FOLLOWS:
(1) VERTICAL SEPARATION OF THE SEWER AND WATER MAIN SHALL BE NOT LESS THAN 18 INCHES, WITH WATER ABOVE SEWER; AND
(2) SEWER PIPE JOINTS SHALL BE LOCATED AT LEASE 6 FEET HORIZONTALLY FROM THE WATER MAIN.

STANDARD TRENCH NOTES - SEWER

1. ORDERED EXCAVATION OF UNSUITABLE MATERIAL BELOW GRADE SHALL BE REPLACED WITH BEDDING MATERIAL. SEE ALSO NOTE 4.

2. BEDDING: SCREENED GRAVEL AND/OR CRUSHED STONE FREE FROM ORGANIC MATTER, CLAY, AND/OR LOAM MEETING ASTM C33 STONE SIZE NO. 67.

100% PASSING	1 INCH SCREEN
90-100% PASSING	¾ INCH SCREEN
20-55% PASSING	⅜ INCH SCREEN
0-10% PASSING	#4 SIEVE
0-5% PASSING	#8 SIEVE

3. SAND BLANKET: CLEAN SAND FREE FROM ORGANIC MATTER, SO GRADED THAT 100% PASSES A ½ INCH SIEVE AND NOT MORE THAN 15% PASSES A #200 SIEVE.

4. SUITABLE MATERIAL: IN ROADS, ROAD SHOULDERS, WALKWAYS, AND TRAVELED WAYS, SUITABLE MATERIAL FOR TRENCH BACKFILL SHALL BE THE NATURAL MATERIAL EXCAVATED FROM THE TRENCH DURING THE COURSE OF CONSTRUCTION, BUT SHALL EXCLUDE DEBRIS, PIECES OF PAVEMENT, ORGANIC MATTER, TOP SOIL, WET OR SOFT MUCK, PEAT OR CLAY, EXCAVATED LEDGE MATERIAL, AND ALL ROCKS OVER SIX INCHES IN LARGEST DIMENSION, OR ANY MATERIAL NOT APPROVED BY THE ENGINEER.

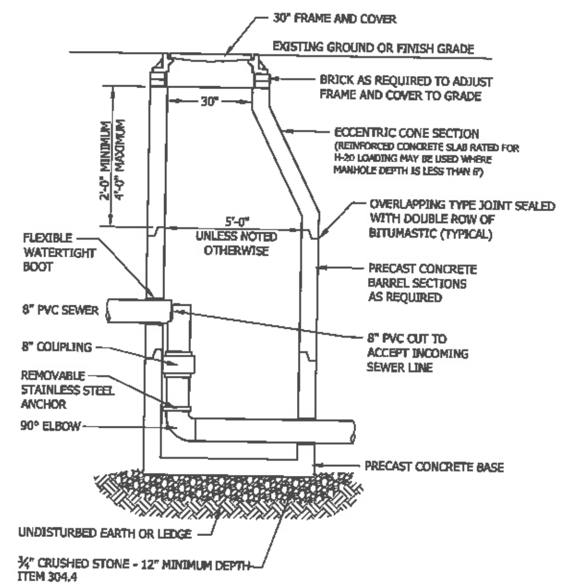
TRENCH BACKFILL IN CROSS-COUNTRY LOCATIONS SHALL BE SUITABLE MATERIAL AS DESCRIBED ABOVE, EXCEPT THAT TOP SOIL, LOAM, MUCK, OR PEAT MAY BE USED PROVIDED THAT THE COMPLETED CONSTRUCTION WILL BE STABLE AND ACCESS TO THE PIPE FOR MAINTENANCE AND RECONSTRUCTION IS PRESERVED. BACKFILL SHALL BE MOUNDED TO A HEIGHT OF SIX INCHES ABOVE THE ORIGINAL GROUND SURFACE

5. BASE COURSE FOR TRENCH REPAIR SHALL MEET THE REQUIREMENTS OF SECTION 300 OF THE LATEST EDITION OF THE STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION OF THE STATE OF NEW HAMPSHIRE DEPARTMENT OF TRANSPORTATION.

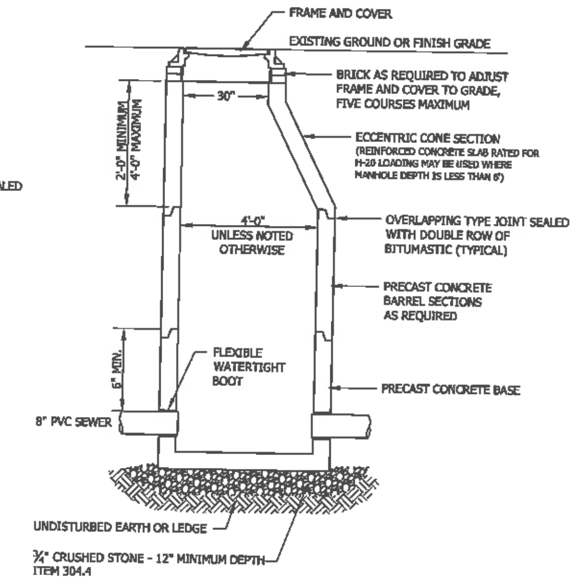
6. SHEETING: WHERE SHEETING IS PLACED ALONGSIDE THE PIPE AND EXTENDS BELOW MID-DIAMETER, IT SHALL BE CUT OFF AND LEFT IN PLACE TO AN ELEVATION NOT LESS THAN ONE FOOT ABOVE THE TOP OF THE PIPE. WHERE SHEETING IS TO BE LEFT IN PLACE, IT SHALL BE CUT OFF AT LEAST 3 FEET BELOW FINISHED GRADE, BUT NOT LESS THAN ONE FOOT ABOVE THE TOP OF THE PIPE.

7. TRENCH DIMENSIONS: W = MAXIMUM ALLOWABLE TRENCH WIDTH MEASURED 12 INCHES ABOVE THE PIPE. FOR PIPES 15 INCHES NOMINAL DIAMETER (D) OR LESS, W SHALL BE NO MORE THAN 36 INCHES; FOR PIPES GREATER THAN 15 INCHES NOMINAL DIAMETER, W SHALL BE 24 INCHES PLUS THE PIPE OUTSIDE DIAMETER. W SHALL ALSO BE THE PAYMENT WIDTH FOR LEDGE EXCAVATION AND FOR ORDERED EXCAVATION BELOW GRADE. THE MAXIMUM ALLOWABLE TRENCH PAVEMENT PAYMENT WIDTH SHALL BE 8 FEET CENTERED OVER PIPE.

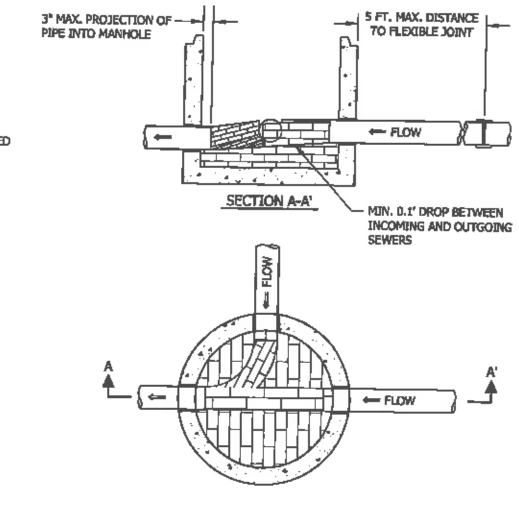
8. PIPE INSULATION AT STORM DRAIN CROSSING: INSTALL 2" THICK RIGID FOAM INSULATION OVER SEWER AT STORM DRAIN CROSSINGS, EXTEND INSULATION 4 FEET EITHER SIDE OF STORM DRAIN ALONG SEWER.



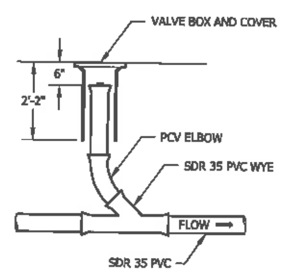
INSIDE DROP MANHOLE DETAIL
NOT TO SCALE
PER NHDOT SPECIFICATIONS
ITEM NO. 604.224



SANITARY SEWER MANHOLE DETAIL
NOT TO SCALE
PER NHDOT SPECIFICATIONS
ITEM NO. 604.314



MANHOLE INVERT DETAILS
NOT TO SCALE



SEWER CLEANOUT DETAIL
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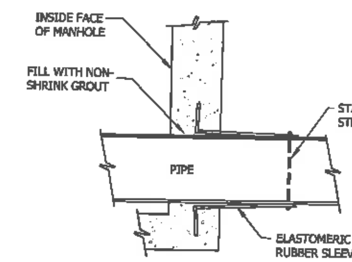
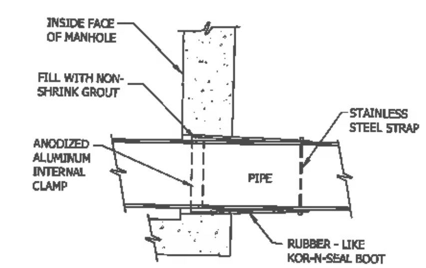
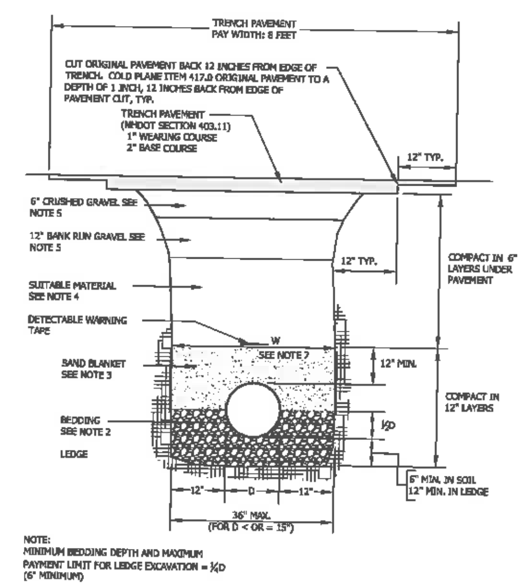


LOCK-JOINT FLEXIBLE MANHOLE SLEEVE

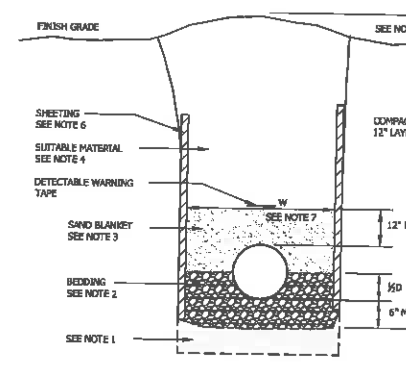


KOR-N-SEAL JOINT SLEEVE

JOINTING DETAILS
NOT TO SCALE

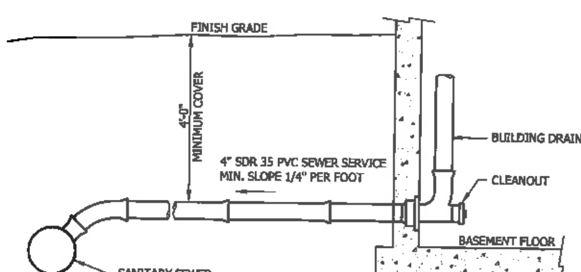


LEDGE/SUB PAVEMENT CONSTRUCTION



EARTH CONSTRUCTION
WITH OR WITHOUT SHEETING

STANDARD TRENCH SECTIONS
NOT TO SCALE



SEWER SERVICE DETAIL
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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATION

DIXVILLE, NEW HAMPSHIRE

STANDARD SANITARY SEWER NOTES AND DETAILS

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
		FOR NHDES APPROVAL		

DATE: MAY 2016	PROJECT #: 15247
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CHECK'D BY: DBL	ARCHIVE #: H-5267
C-5.3	

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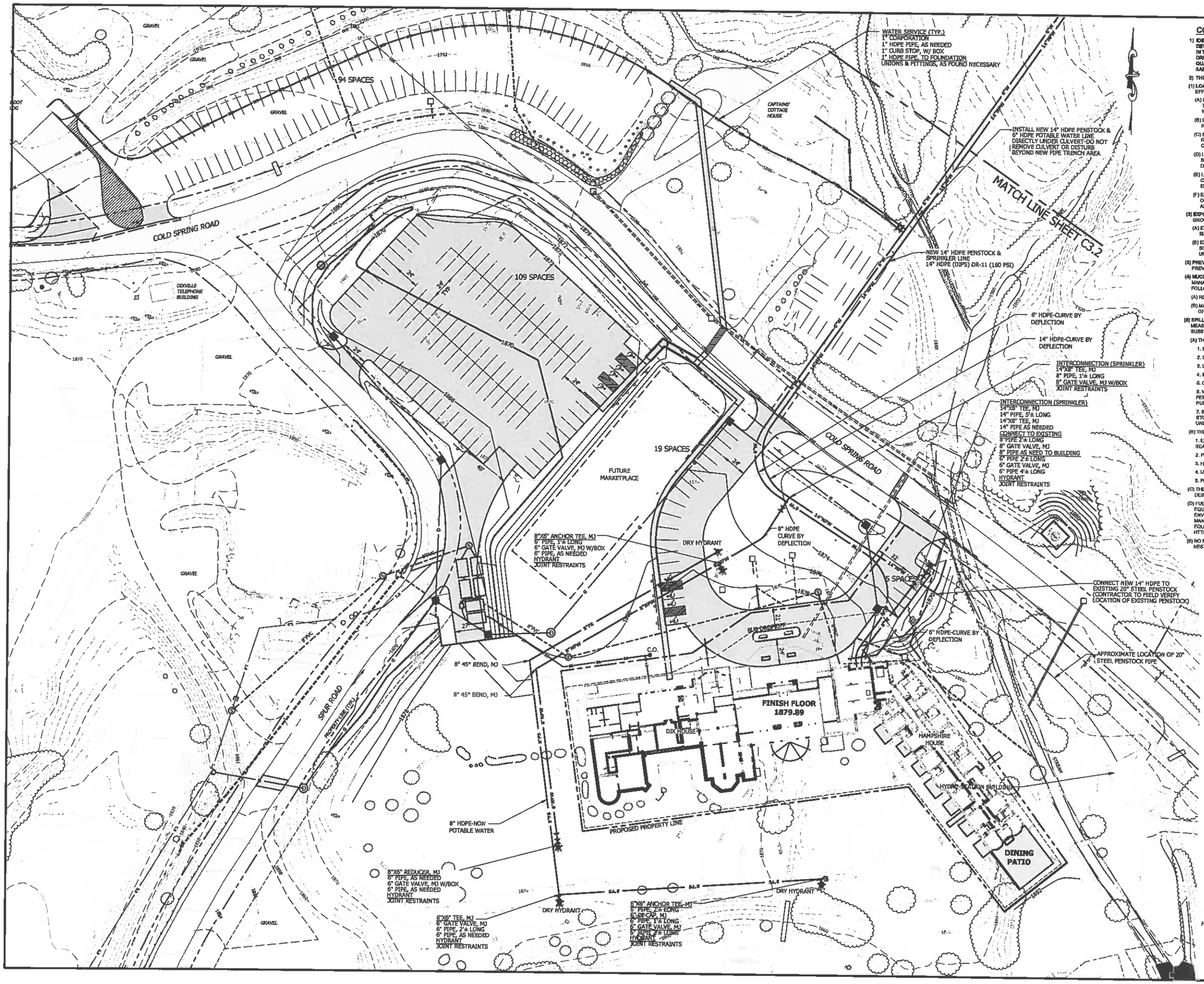

CONTRACTOR NOTE BLASTING REQUIREMENTS

1) IDENTIFY DRINKING WATER WELLS LOCATED WITHIN 2000 FEET OF THE PROPOSED BLASTING ACTIVITIES. DEVELOP A GROUNDWATER QUALITY SAMPLING PROGRAM TO MONITOR FOR NITRATE AND NITRITE EITHER IN THE DRINKING WATER SUPPLY WELLS OR IN OTHER WELLS THAT ARE REPRESENTATIVE OF THE DRINKING WATER SUPPLY WELLS IN THE AREA. THE PLAN MUST INCLUDE PRE AND POST BLAST WATER QUALITY MONITORING AND BE APPROVED BY NHDES PRIOR TO INITIATING BLASTING. THE GROUNDWATER SAMPLING PROGRAM MUST BE IMPLEMENTED ONCE APPROVED BY NHDES.

2) THE FOLLOWING BEST MANAGEMENT PROCEDURES FOR BLASTING SHALL BE COMPLIED WITH:

(1) LOADING PRACTICES. THE FOLLOWING BLASTHOLE LOADING PRACTICES TO MINIMIZE ENVIRONMENTAL EFFECTS SHALL BE FOLLOWED:

(A) DRILLING LOGS SHALL BE MAINTAINED BY THE DRILLER AND COMMUNICATED DIRECTLY TO THE BLASTER. THE LOGS SHALL INDICATE DEPTHS AND LENGTHS OF VOIDS, CAVITIES, AND FAULT ZONES OR OTHER WEAK ZONES ENCOUNTERED AS WELL AS GROUNDWATER CONDITIONS.

(B) EXPLOSIVE PRODUCTS SHALL BE MANAGED ON-SITE SO THAT THEY ARE EITHER USED IN THE BOREHOLE, RETURNED TO THE DELIVERY VEHICLE, OR PLACED IN SECURE CONTAINERS FOR OFF-SITE DISPOSAL.

(C) SPILLAGE AROUND THE BOREHOLE SHALL EITHER BE PLACED IN THE BOREHOLE OR CLEANED UP AND RETURNED TO AN APPROPRIATE VEHICLE FOR HANDLING OR PLACEMENT IN SECURED CONTAINERS FOR OFF-SITE DISPOSAL.

(D) LOADED EXPLOSIVES SHALL BE DETONATED AS SOON AS POSSIBLE AND SHALL NOT BE LEFT IN THE BLASTHOLES OVERNIGHT, UNLESS WEATHER OR OTHER SAFETY CONCERNS REASONABLY DICTATE THAT DETONATION SHOULD BE POSTPONED.

(E) LOADING EQUIPMENT SHALL BE CLEANED IN AN AREA WHERE WASTEWATER CAN BE PROPERLY CONTAINED AND HANDLED IN A MANNER THAT PREVENTS RELEASE OF CONTAMINANTS TO THE ENVIRONMENT.

(F) EXPLOSIVES SHALL BE LOADED TO MAINTAIN GOOD CONTINUITY IN THE COLUMN LOAD TO PROMOTE COMPLETE DETONATION. INDUSTRY ACCEPTED LOADING PRACTICES FOR PRIMING, STEMMING, DECKING AND COLUMN RISE NEED TO BE ATTENDED TO.

(2) EXPLOSIVE SELECTION. THE FOLLOWING BMPS SHALL BE FOLLOWED TO REDUCE THE POTENTIAL FOR GROUNDWATER CONTAMINATION WHEN EXPLOSIVES ARE USED:

(A) EXPLOSIVE PRODUCTS SHALL BE SELECTED THAT ARE APPROPRIATE FOR SITE CONDITIONS AND SAFE BLAST EXECUTION.

(B) EXPLOSIVE PRODUCTS SHALL BE SELECTED THAT HAVE THE APPROPRIATE WATER RESISTANCE FOR THE SITE CONDITIONS PRESENT TO MINIMIZE THE POTENTIAL FOR HAZARDOUS EFFECT OF THE PRODUCT UPON GROUNDWATER.

(3) PREVENTION OF MISFIRES. APPROPRIATE PRACTICES SHALL BE DEVELOPED AND IMPLEMENTED TO PREVENT MISFIRES.

(4) MUCK PILE MANAGEMENT. MUCK PILES (THE BLASTED PIECES OF ROCK) AND ROCK PILES SHALL BE MANAGED IN A MANNER TO REDUCE THE POTENTIAL FOR CONTAMINATION BY IMPLEMENTING THE FOLLOWING MEASURES:

(A) REMOVE THE MUCK PILE FROM THE BLAST AREA AS SOON AS REASONABLY POSSIBLE.

(B) MANAGE THE INTERACTION OF BLASTED ROCK PILES AND STORMWATER TO PREVENT CONTAMINATION OF WATER SUPPLY WELLS OR SURFACE WATER.

(5) SPILL PREVENTION MEASURES AND SPILL MITIGATION. SPILL PREVENTION AND SPILL MITIGATION MEASURES SHALL BE IMPLEMENTED TO PREVENT THE RELEASE OF FUEL AND OTHER RELATED SUBSTANCES TO THE ENVIRONMENT. THE MEASURES SHALL INCLUDE AT A MINIMUM:

(A) THE FUEL STORAGE REQUIREMENTS SHALL INCLUDE:

1. STORAGE OF REGULATED SUBSTANCES ON AN IMPERVIOUS SURFACE;
2. SECURE STORAGE AREAS AGAINST UNAUTHORIZED ENTRY;
3. LABEL REGULATED CONTAINERS CLEARLY AND VISIBLY;
4. INSPECT STORAGE AREAS WEEKLY;
5. COVER REGULATED CONTAINERS IN OUTSIDE STORAGE AREAS;
6. WHEREVER POSSIBLE, KEEP REGULATED CONTAINERS THAT ARE STORED OUTSIDE MORE THAN 50 FEET FROM SURFACE WATER AND STORM DRAINS, 75 FEET FROM PRIVATE WELLS, AND 400 FEET FROM PUBLIC WELLS; AND
7. SECONDARY CONTAINMENT IS REQUIRED FOR CONTAINERS CONTAINING REGULATED SUBSTANCES STORED OUTSIDE, EXCEPT FOR ON PREMISE USE HEATING FUEL TANKS, OR ABOVEGROUND OR UNDERGROUND STORAGE TANKS OTHERWISE REGULATED.

(B) THE FUEL HANDLING REQUIREMENTS SHALL INCLUDE:

1. EXCEPT WHEN IN USE, KEEP CONTAINERS CONTAINING REGULATED SUBSTANCES CLOSED AND SEALED;
2. PLACE DRIP PANS UNDER SPIGOTS, VALVES, AND PUMPS;
3. HAVE SPILL CONTROL AND CONTAINMENT EQUIPMENT READILY AVAILABLE IN ALL WORK AREAS;
4. USE FUNNELS AND DRIP PANS WHEN TRANSFERRING REGULATED SUBSTANCES; AND
5. PERFORM TRANSFERS OF REGULATED SUBSTANCES OVER AN IMPERVIOUS SURFACE.

(C) THE TRAINING OF ON-SITE EMPLOYEES AND THE ON-SITE POSTING OF RELEASE RESPONSE INFORMATION DESCRIBING WHAT TO DO IN THE EVENT OF A SPILL OF REGULATED SUBSTANCES.

(D) FUELING AND MAINTENANCE OF EXCAVATION, EARTHMOVING AND OTHER CONSTRUCTION RELATED EQUIPMENT WILL COMPLY WITH THE REGULATIONS OF THE NEW HAMPSHIRE DEPARTMENT OF ENVIRONMENTAL SERVICES [NOTE THESE REQUIREMENTS ARE SUMMARIZED IN WD-DWGB-22-6 BEST MANAGEMENT PRACTICES FOR FUELING AND MAINTENANCE OF EXCAVATION AND EARTHMOVING EQUIPMENT OR ITS SUCCESSOR DOCUMENT. (SEE HTTP://DES.NH.GOV/ORGANIZATION/COMMISSIONER/PIP/FACTSHEETS/DWGB/DOCUMENTS/DWGB-22-6.PDF)

(6) NO BLASTING WILL OCCUR BETWEEN APRIL 1 ST THRU MEMORIAL DAY TO ENSURE SUCCESSFUL NESTING OPPORTUNITIES FOR THE ENDANGER PEREGRINE FALCON ON THE ADJACENT CLIFFS.

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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

WATER SYSTEM IMPROVEMENTS

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
		FOR NHDES APPROVAL		

DATE: APRIL 2016	PROJECT #: 15247
ENGIN'D BY: JCD	DRAWN BY: JCD
CHECK'D BY: BDL	ARCHIVE #: H-5267

C-3.1

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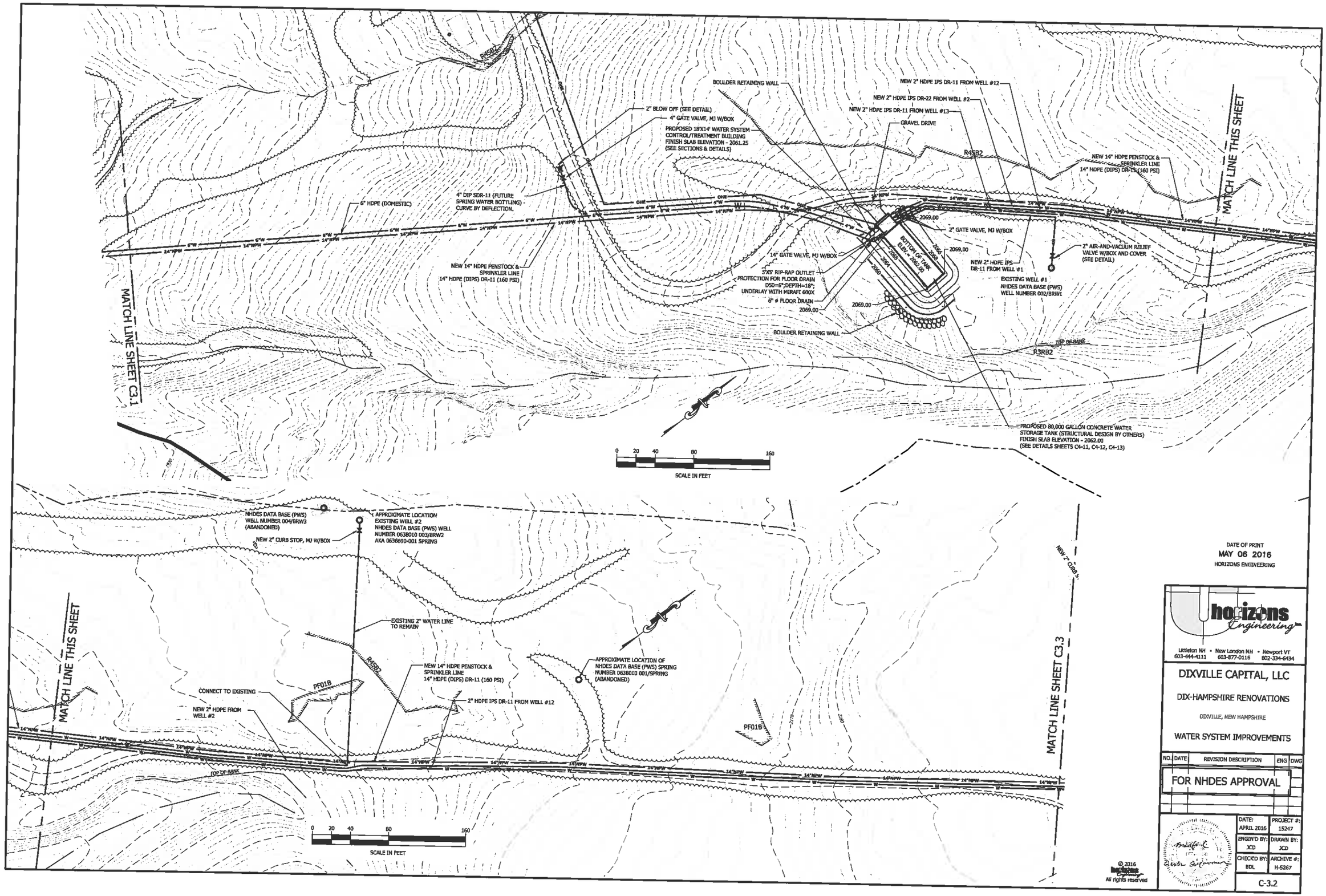

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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

WATER SYSTEM IMPROVEMENTS

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
		FOR NHDES APPROVAL		

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C-3.2

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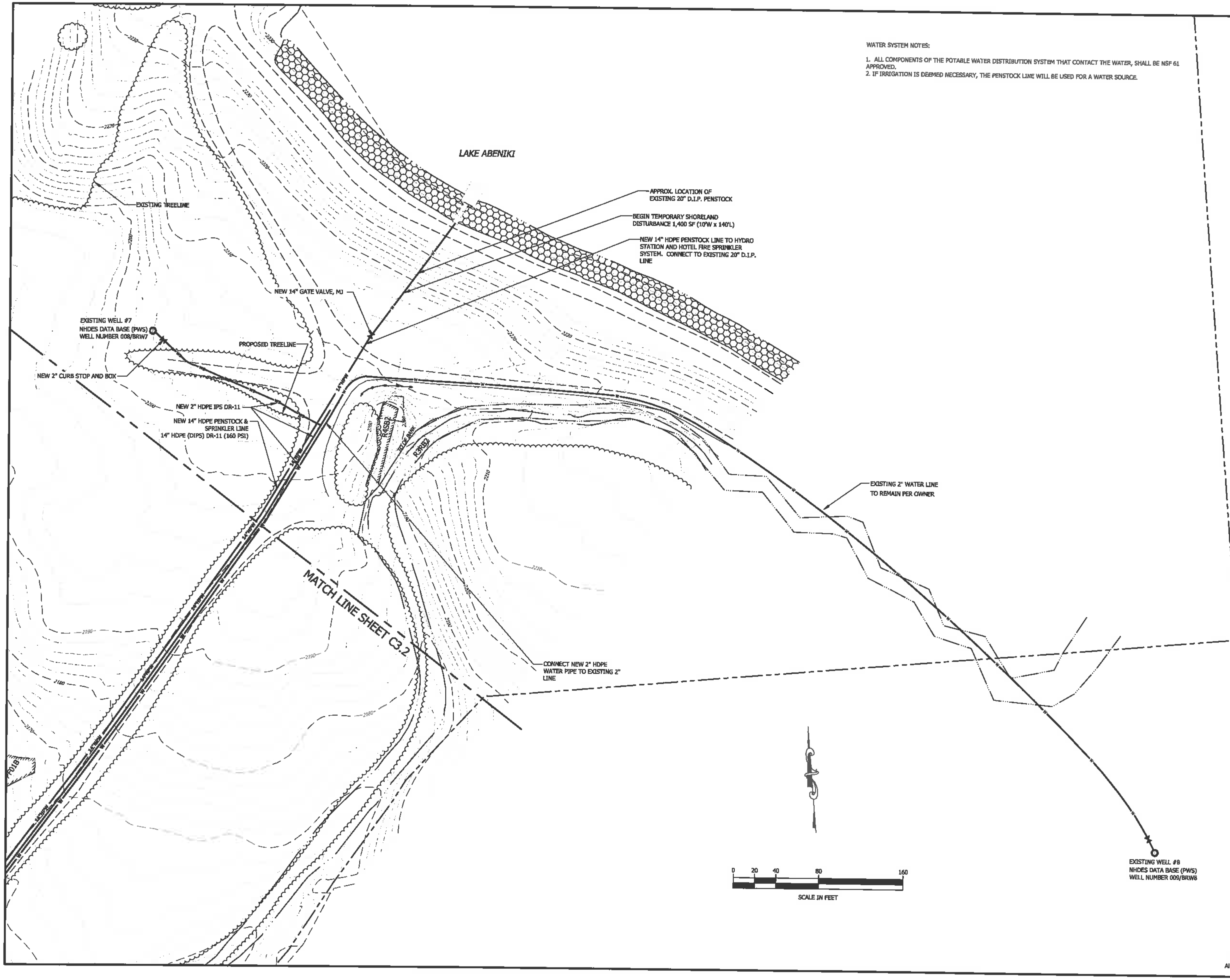
WATER SYSTEM NOTES:

1. ALL COMPONENTS OF THE POTABLE WATER DISTRIBUTION SYSTEM THAT CONTACT THE WATER, SHALL BE NSF 61 APPROVED.
2. IF IRRIGATION IS DEEMED NECESSARY, THE PENSTOCK LINE WILL BE USED FOR A WATER SOURCE.



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DIX-HAMPSHIRE RENOVATIONS

DIXVILLE, NEW HAMPSHIRE

WATER SYSTEM IMPROVEMENTS

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
		FOR NHDES APPROVAL		

DATE: APRIL 2016	PROJECT #: 15247
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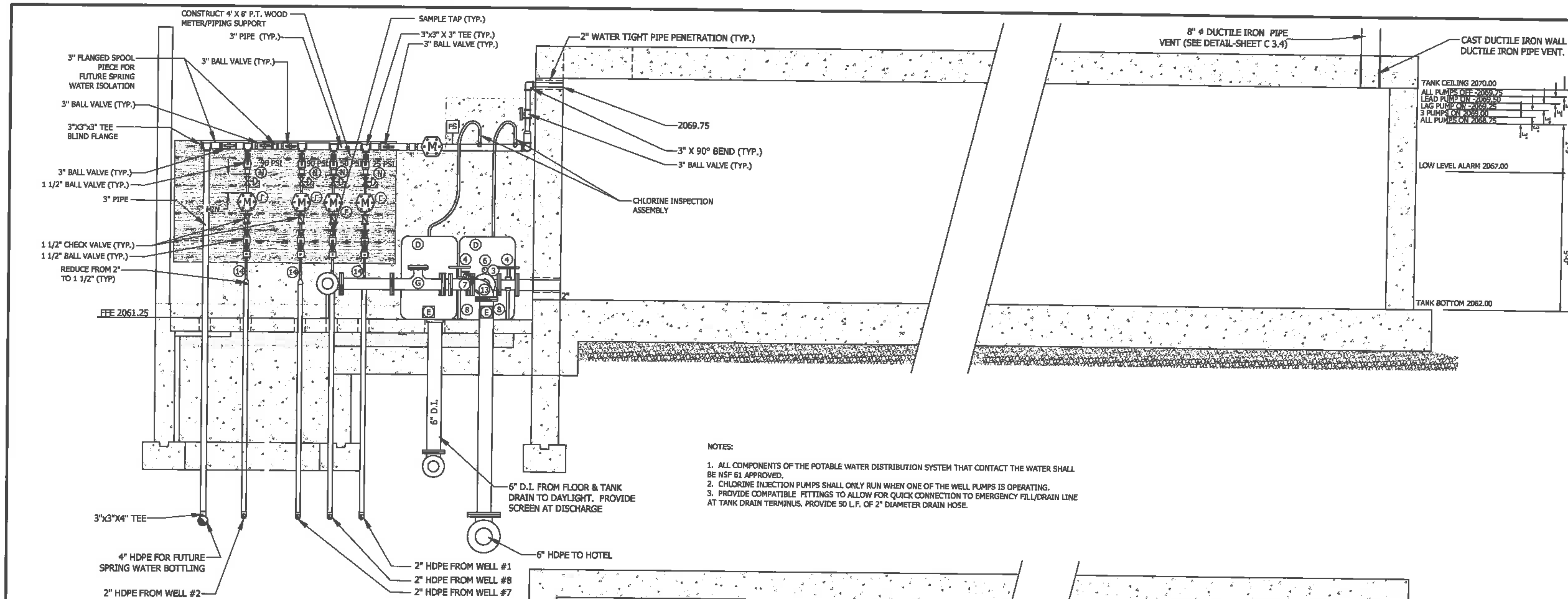
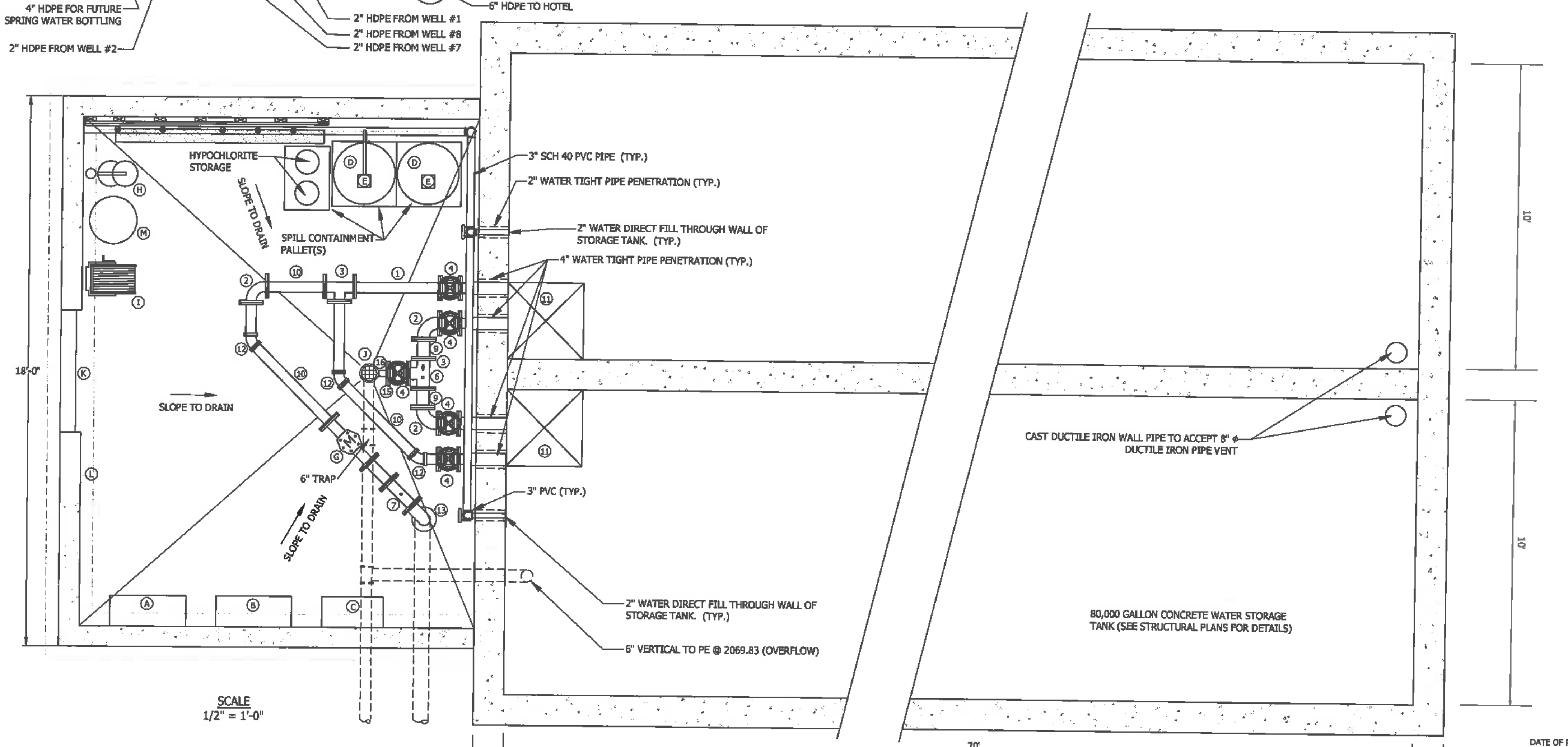


NOTES:

1. ALL COMPONENTS OF THE POTABLE WATER DISTRIBUTION SYSTEM THAT CONTACT THE WATER SHALL BE NSF 61 APPROVED.
2. CHLORINE INJECTION PUMPS SHALL ONLY RUN WHEN ONE OF THE WELL PUMPS IS OPERATING.
3. PROVIDE COMPATIBLE FITTINGS TO ALLOW FOR QUICK CONNECTION TO EMERGENCY FILL/DRAIN LINE AT TANK DRAIN TERMINUS. PROVIDE 50 L.F. OF 2" DIAMETER DRAIN HOSE.



SCALE
1/2" = 1'-0"

MECHANICAL EQUIPMENT SCHEDULE

ITEM	DESCRIPTION
Ⓐ	SERVICE PANEL
Ⓑ	CONTROL PANEL-BOTTOM OF PANEL TO SLAB-42" MINIMUM
Ⓒ	WALL MOUNTED ELECTRIC HEATER, TYPE TBD
Ⓓ	LMI 35 GALLON POLYETHELYNE CHEMICAL FEED TANK
Ⓔ	LMI CHEMICAL FEED PUMP. MODEL AD249 (0.5 GPH)
Ⓕ	WELL METER, SENSUS-SR ECR METER 1 1/2" METER OR EQUAL
Ⓖ	TANK DISCHARGE WATER FLOW METER, SENSUS-OMNI 4"
Ⓗ	EYE WASH STATION-BRADLEY MOD. # 519-310
Ⓘ	WALL MOUNTED HOSE AND REAL
Ⓙ	4" FLOOR DRAIN TO DAYLIGHT
Ⓚ	4'0" X 6'8" HOLLOW METAL INSULATED DOOR WITH LOCKSET, PANIC BAR AND CLOSER
Ⓛ	LIGHT FIXTURE
Ⓜ	PRESSURE TANK-FOR HOSE AND EYE WASH STATION
Ⓝ	1 1/2" PRESSURE REDUCING VALVE (BACKPRESSURE)
Ⓞ	3" FLOW SWITCH
Ⓟ	3" SENSUS FLOW METER FOR PACING HYPOCHLORITE FEED

PIPING AND VALVE SCHEDULE

ITEM	DESCRIPTION
①	4" D.I. PIPE ABOVE SLAB
②	4"X90" FLANGED BEND
③	4"X4"X4" FLANGED TEE
④	4" RESILIENT WEDGE GATE VALVE
⑤	6X4" TEE (BLIND FLANGE)
⑥	3/4" HOSE BIB SAMPLE TAP WITH DIAL-TYPE PRESSURE GAUGE AND PRESSURE SENSOR, SEE DETAIL SHEET C3.5
⑦	3/4" SAMPLE TAP
⑧	PIPE SUPPORT, AS NEEDED
⑨	6" LONG 4" D.I. FLANGED SPOOL PIECE
⑩	4" D.I. FLANGED SPOOL PIECE
⑪	30" WATER TIGHT HATCH, SEE STRUCTURAL PLANS
⑫	4"X45° FLANGED BEND
⑬	6"X4" 90° FLANGED REDUCING BEND
⑭	STAINLESS STEEL REINFORCED SOCKET WELD TO THREADED
⑮	4"X2" TAP FLANGE
⑯	QUICK CONNECT TANK DRAIN/EMERGENCY FILL LINE FITTING

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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATION

DIXVILLE, NEW HAMPSHIRE

PUMP/TREATMENT BUILDING
PIPING & EQUIPMENT LAYOUT

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
		FOR NHDES APPROVAL		

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	C-4.1

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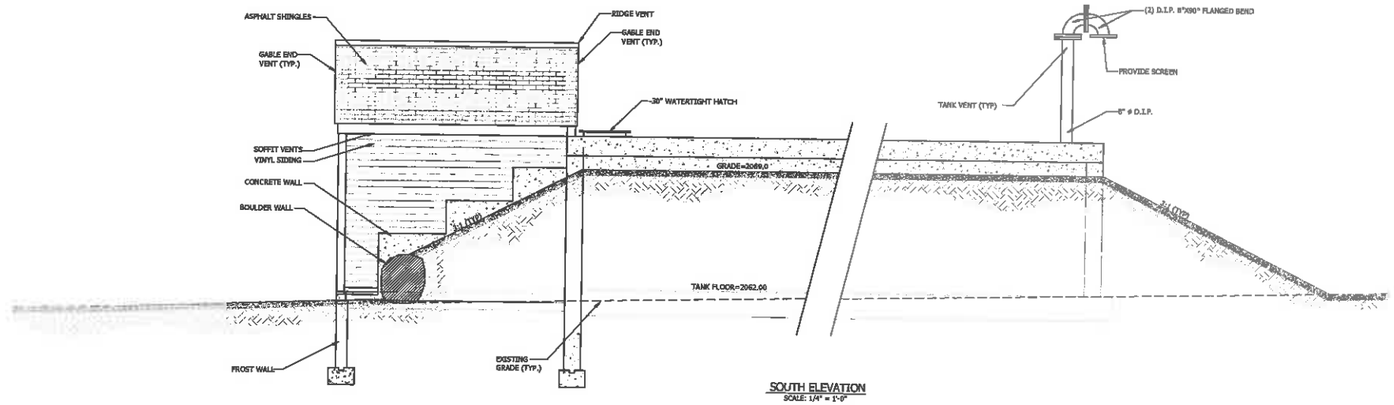

SOUTH ELEVATION
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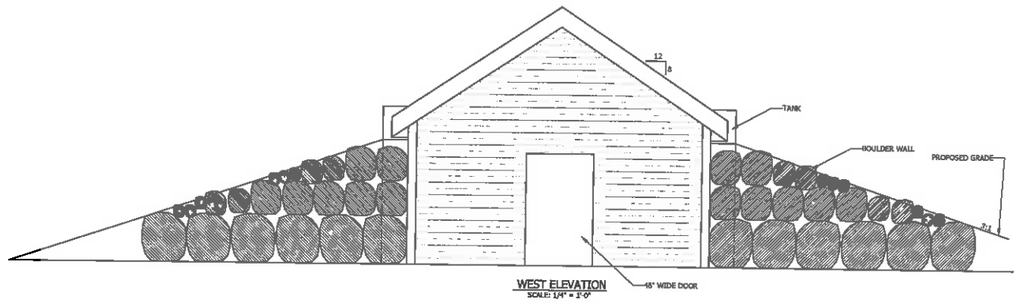

WEST ELEVATION
SCALE: 1/4" = 1'-0"

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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATION

DIXVILLE, NEW HAMPSHIRE

PUMP/TREATMENT BUILDING
SECTIONS & DETAILS

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
		FOR NHDES APPROVAL		

DATE: APRIL 2016	PROJECT #: 15247
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CHECK'D BY: BDL	ARCHIVE #: H-5267

C-4.2

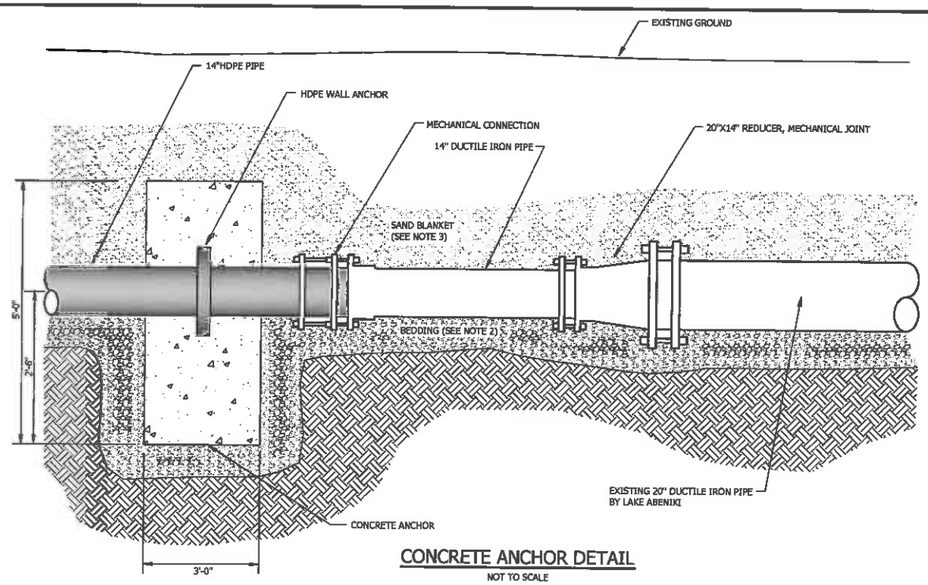
STANDARD TRENCH NOTES - WATER

1. ORDERED EXCAVATION OF UNSUITABLE MATERIAL BELOW GRADE SHALL BE REPLACED WITH BEDDING MATERIAL. SEE ALSO NOTE 4.
2. BEDDING: SCREENED GRAVEL AND/OR CRUSHED STONE FREE FROM ORGANIC MATTER, CLAY, AND/OR LOAM MEETING ASTM C33 STONE SIZE NO. 67.

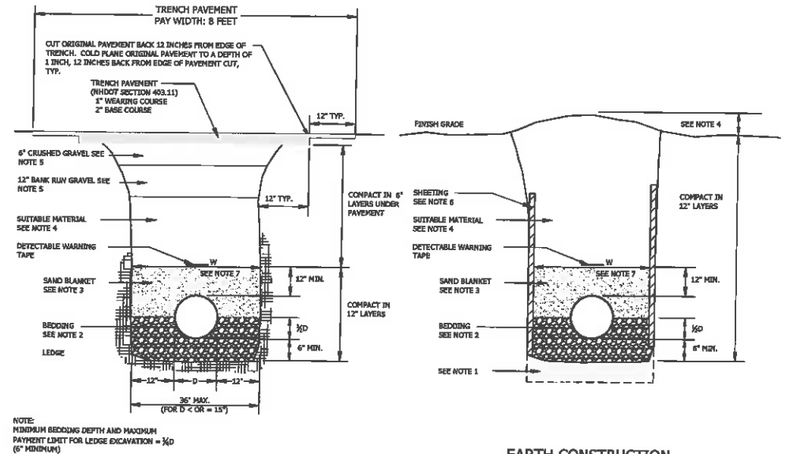
100% PASSING	1 INCH SCREEN
90-100% PASSING	¾ INCH SCREEN
20-55% PASSING	⅜ INCH SCREEN
0-10% PASSING	#4 SIEVE
0-5% PASSING	#8 SIEVE

3. SAND BLANKET: CLEAN SAND FREE FROM ORGANIC MATTER, SO GRADED THAT 100% PASSES A ½ INCH SIEVE AND NOT MORE THAN 15% PASSES A #200 SIEVE.
4. SUITABLE MATERIAL: IN ROADS, ROAD SHOULDERS, WALKWAYS, AND TRAVELED WAYS, SUITABLE MATERIAL FOR TRENCH BACKFILL SHALL BE THE NATURAL MATERIAL EXCAVATED FROM THE TRENCH DURING THE COURSE OF CONSTRUCTION, BUT SHALL EXCLUDE DEBRIS, PIECES OF PAVEMENT, ORGANIC MATTER, TOP SOIL, WET OR SOFT MUCK, PEAT OR CLAY, EXCAVATED LEDGE MATERIAL, AND ALL ROCKS OVER SIX INCHES IN LARGEST DIMENSION, OR ANY MATERIAL NOT APPROVED BY THE ENGINEER.

   TRENCH BACKFILL IN CROSS-COUNTRY LOCATIONS SHALL BE SUITABLE MATERIAL AS DESCRIBED ABOVE, EXCEPT THAT TOP SOIL, LOAM, MUCK, OR PEAT MAY BE USED PROVIDED THAT THE COMPLETED CONSTRUCTION WILL BE STABLE AND ACCESS TO THE PIPE FOR MAINTENANCE AND RECONSTRUCTION IS PRESERVED. BACKFILL SHALL BE MOUNDED TO A HEIGHT OF SIX INCHES ABOVE THE ORIGINAL GROUND SURFACE
5. BASE COURSE FOR TRENCH REPAIR SHALL MEET THE REQUIREMENTS OF SECTION 300 OF THE LATEST EDITION OF THE STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION OF THE STATE OF NEW HAMPSHIRE DEPARTMENT OF TRANSPORTATION.
6. SHEETING: WHERE SHEETING IS PLACED ALONGSIDE THE PIPE AND EXTENDS BELOW MID-DIAMETER, IT SHALL BE CUT OFF AND LEFT IN PLACE TO AN ELEVATION NOT LESS THAN ONE FOOT ABOVE THE TOP OF THE PIPE. WHERE SHEETING IS TO BE LEFT IN PLACE, IT SHALL BE CUT OFF AT LEAST 3 FEET BELOW FINISHED GRADE, BUT NOT LESS THAN ONE FOOT ABOVE THE TOP OF THE PIPE.
7. TRENCH DIMENSIONS: W = MAXIMUM ALLOWABLE TRENCH WIDTH MEASURED 12 INCHES ABOVE THE PIPE. FOR PIPES 15 INCHES NOMINAL DIAMETER (D) OR LESS, W SHALL BE NO MORE THAN 36 INCHES; FOR PIPES GREATER THAN 15 INCHES NOMINAL DIAMETER, W SHALL BE 24 INCHES PLUS THE PIPE OUTSIDE DIAMETER. W SHALL ALSO BE THE PAYMENT WIDTH FOR LEDGE EXCAVATION AND FOR ORDERED EXCAVATION BELOW GRADE. THE MAXIMUM ALLOWABLE TRENCH PAVEMENT PAYMENT WIDTH SHALL BE 8 FEET CENTERED OVER PIPE.
8. WATER/SEWER SEPARATION: WATER MAINS SHALL BE SEPARATED FROM SANITARY SEWER BY A MINIMUM OF 10 FEET HORIZONTALLY AND A MINIMUM OF 18 INCHES VERTICALLY, WITH THE WATER MAIN ABOVE THE SEWER.
9. PIPE COVER:
   COVER OVER WATER SHALL BE 6 FEET MINIMUM IN ALL LOCATIONS.



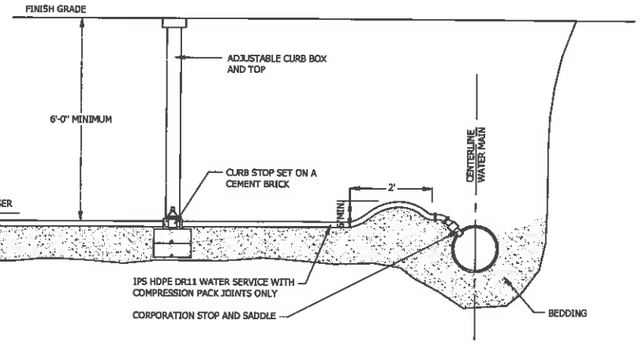
CONCRETE ANCHOR DETAIL
NOT TO SCALE



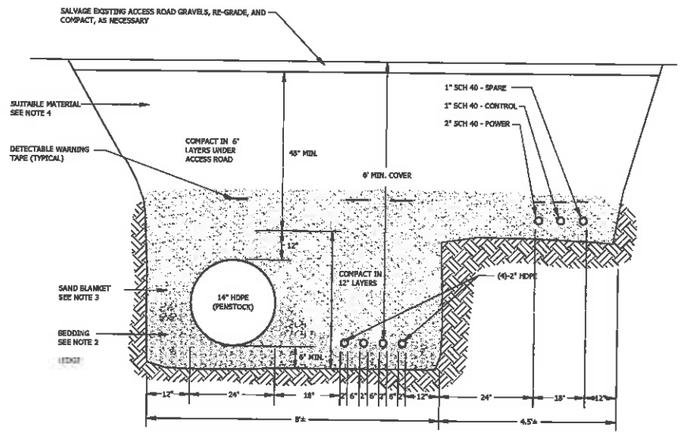
LEDGE/SUB PAVEMENT CONSTRUCTION

EARTH CONSTRUCTION WITH OR WITHOUT SHEETING

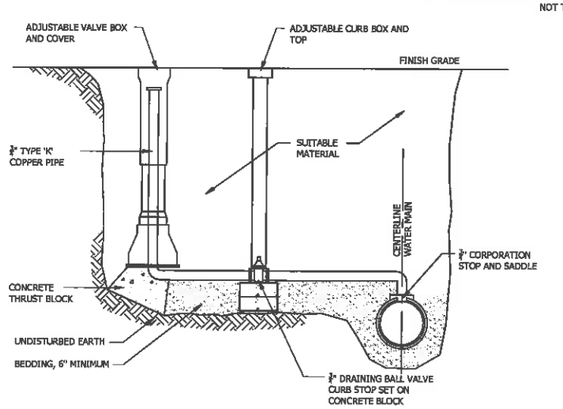
STANDARD TRENCH SECTIONS
NOT TO SCALE



WATER SERVICE CONNECTION
NOT TO SCALE



STANDARD TRENCH SECTION ABOVE STORAGE TANK
NOT TO SCALE



AIR RELEASE DETAIL
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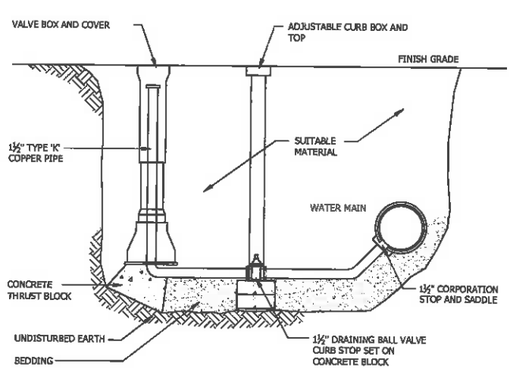

BLOWOFF DETAIL
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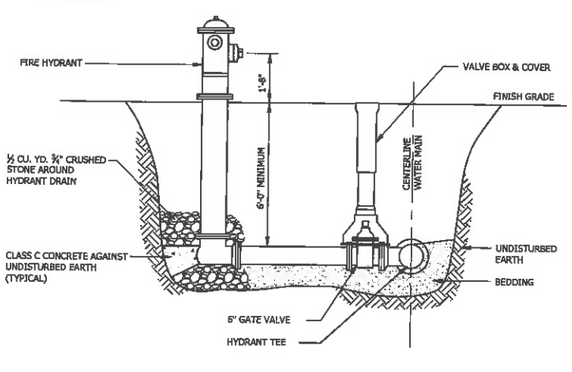

FIRE HYDRANT DETAIL
NOT TO SCALE

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DIXVILLE CAPITAL, LLC

DIX-HAMPSHIRE RENOVATION

DIXVILLE, NEW HAMPSHIRE

STANDARD WATER SYSTEM DETAILS AND NOTES

NO.	DATE	REVISION DESCRIPTION	ENG	DWG
		FOR NHDES APPROVAL		

DATE: APRIL 2016	PROJECT #: 15247
ENGIN'D BY: JLW	DRAWN BY: MDN/AJC
CHECK'D BY: BDL	ARCHIVE #: H-5267

C-4.3

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- BLOCKS MUST BE POURED AGAINST UNDISTURBED SOIL
- THE PIPE JOINT AND BOLTS MUST BE ACCESSIBLE.
- CONCRETE SHOULD BE CURED FOR AT LEAST 5 DAYS AND SHOULD HAVE A COMPRESSION STRENGTH OF 3,000 LBS. AT 28 DAYS.
- BLOCKS MUST BE POSITIONED TO COUNTERACT THE DIRECTION OF THE RESULTANT THRUST FORCE.

RESTRAINED JOINTS MAY BE USED FOR RESISTING THRUST FORCES WHERE THERE IS A SHORTAGE OF SPACE OR WHERE THE SOIL BEHIND A FITTING WILL NOT PROVIDE ADEQUATE SUPPORT. THIS RESTRAINING METHOD INVOLVES PLACEMENT OF THESE SPECIAL JOINTS AT APPROPRIATE FITTINGS AND FOR A PREDETERMINED NUMBER OF PIPE LENGTHS ON EACH SIDE, (MINIMUM 15 FEET).

RESULTANT THRUST AT FITTINGS AT 100 PSI WATER PRESSURE

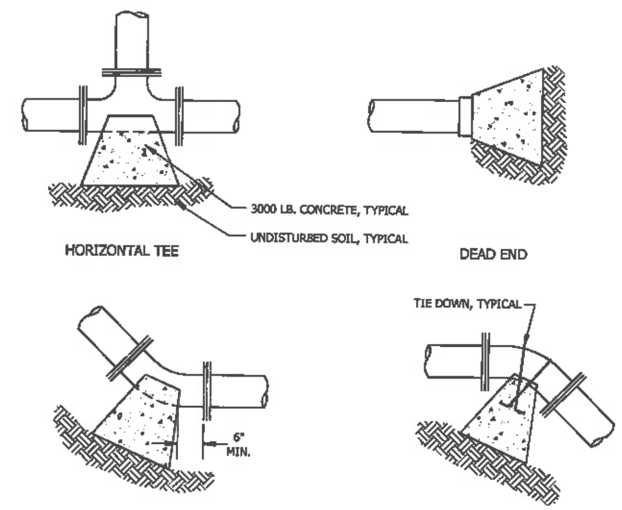
NOMINAL PIPE DIA. (INCHES)	TOTAL THRUST (POUNDS)				
	DEAD END	90° BEND	45° BEND	22½° BEND	11¼° BEND
4	1,810	2,559	1,385	706	355
6	3,739	5,288	2,862	1,459	733
8	6,433	9,097	4,923	2,510	1,261
10	9,677	13,685	7,406	3,776	1,897
12	13,685	19,353	10,474	5,340	2,683
14	18,385	26,001	14,072	7,174	3,604
16	23,779	33,628	18,199	9,278	4,661
18	29,865	42,235	22,858	11,653	5,855
20	36,644	51,822	28,046	14,298	7,183
24	52,279	73,934	40,013	20,398	10,249

NOTE:
TO DETERMINE THRUST AT PRESSURES OTHER THAN 100 PSI, MULTIPLY THE THRUST OBTAINED IN THE TABLE BY THE RATIO OF THE PRESSURE TO 100. FOR EXAMPLE, THE THRUST ON A 12 INCH, 90° BEND AT 125 PSI IS:

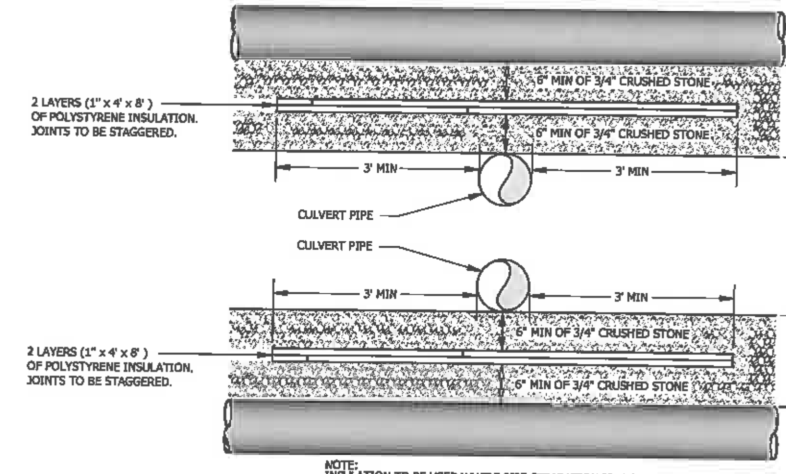
$$\frac{19,353 \times 125}{100} = 24,191 \text{ POUNDS}$$

TO DETERMINE THE SIZE OF A CONCRETE THRUST BLOCK, DIVIDE THE TOTAL FORCE BY THE BEARING VALUE OF THE SOIL. THE QUOTIENT WILL BE THE SIZE OF THE BEARING AREA OF THE THRUST BLOCK IN SQUARE FEET. APPROXIMATE VALUES FOR VARIOUS TYPES OF SOIL ARE LISTED BELOW.

SOIL	BEARING LOAD (LBS./SQ. FT.)
MUCK	0
SOFT CLAY	1,000
SILT	1,500
SANDY SILT	3,000
SAND	4,000
SANDY CLAY	6,000

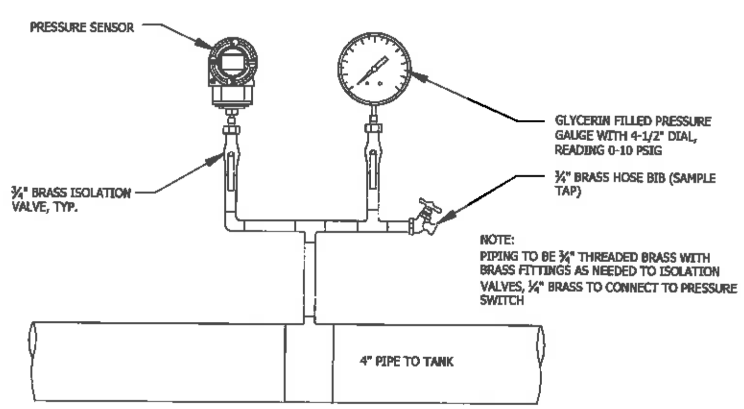


THRUST BLOCK NOTES & DETAILS
NOT TO SCALE



NOTE:
INSULATION TO BE USED WHERE PIPE SEPARATION IS 4' OR LESS.

CULVERT CROSSING DETAIL
NOT TO SCALE



NOTE:
PIPING TO BE ¾" THREADED BRASS WITH BRASS FITTINGS AS NEEDED TO ISOLATION VALVES, ¼" BRASS TO CONNECT TO PRESSURE SWITCH

PRESSURE TRANSMITTER / GAUGE CONNECTION DETAIL
NOT TO SCALE

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