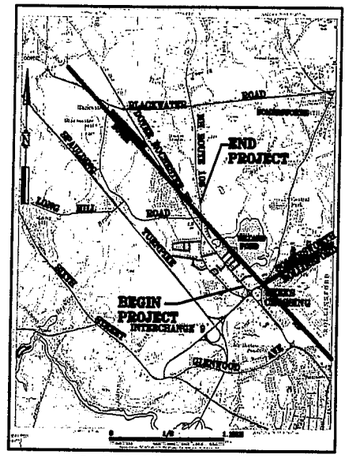
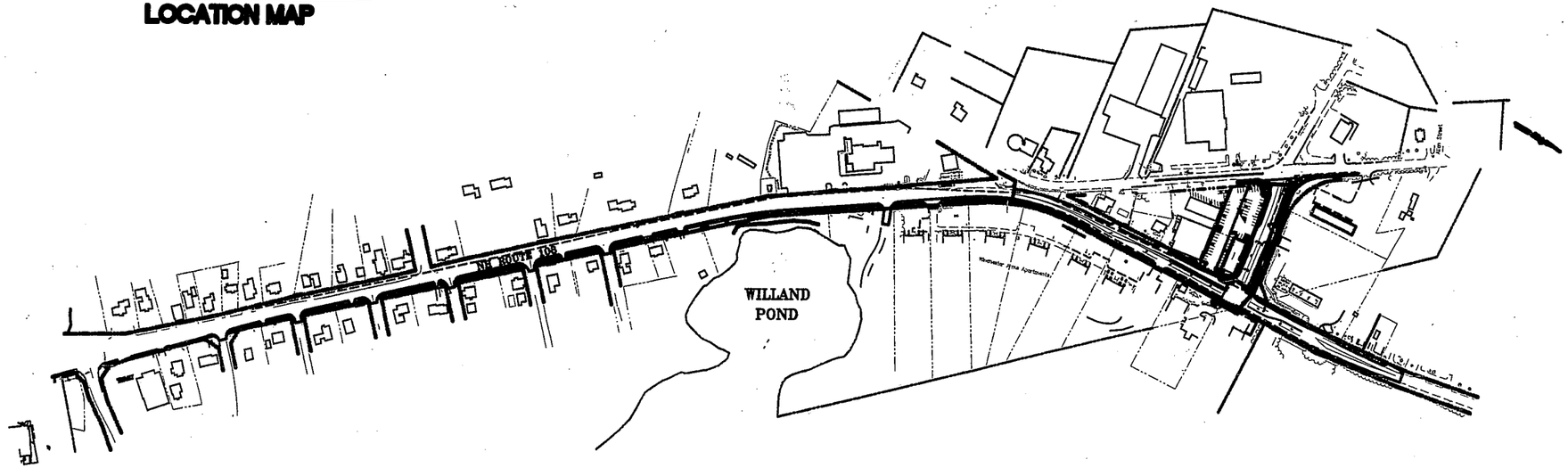
NEW ROCHESTER ROAD/ LONG HILL ROAD IMPROVEMENTS

NEW ROCHESTER ROAD AND LONG HILL ROAD

DOVER, NEW HAMPSHIRE



LOCATION MAP



PLAN

200 0 200 400
SCALE: 1 INCH = 200 FT.

CITY OF DOVER INC. 1855 — INDUSTRIA ET COPIA — TOWN SETTLED 1623

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DRAWN: DMD	MF	MF

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CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

COVER SHEET

STATE PROJ. NO. 15814/13808
FED. PROJ. NO. STP-[illegible]
FED. PROJ. NO. STP-X-[illegible]
NEW ROCHESTER (RD)/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
-	060172
DATE:	DWG.
DEC 2007	1

INDEX OF SHEETS

THE FOLLOWING GENERAL NOTES WILL BE USED ON THIS PROJECT:

①	②	③	○	○	⑥	⑦	⑧	⑨	⑩	○	○
○	○	○	○	○	○	○	○	○	○	○	○

GENERAL NOTES

① FOR STANDARD PLANS, SEE "STANDARD PLANS FOR ROAD AND BRIDGE CONSTRUCTION" DATED 2001 (A BOUND BOOK).

② HIGH TENSION OVERHEAD TRANSMISSION LINES ARE LOCATED THROUGHOUT THE PROJECT WITH CROSSINGS AT VARIOUS LOCATIONS AND RUNNING ALONG THE ROAD THROUGHOUT THE PROJECT EVEN ON REGULAR POLES. THE CONTRACTOR IS ADVISED THAT EXTREME CAUTION WILL BE REQUIRED IN THE OPERATION OF EQUIPMENT, ESPECIALLY CRANES AND PILE DRIVING EQUIPMENT.

③ REMOVE TOPSOIL FOR ITS TOTAL DEPTH WITHIN THE LIMITS OF THE SLOPE LINES. UNLESS OTHERWISE DIRECTED, STOCKPILE TOPSOIL AND USE IT ON THIS PROJECT AS NEEDED UNDER SECTION 641 – LOAM AND/OR SECTION 647 – HUMUS.

④ NOT APPLICABLE

⑤ NOT APPLICABLE

⑥ EXISTING DELINEATORS AND WITNESS MARKERS THAT ARE REMOVED AND DETERMINED BY THE ENGINEER TO BE IN ACCEPTABLE CONDITION SHALL BE RESET (SUBSIDIARY). ADDITIONAL DELINEATORS AND WITNESS MARKERS ORDERED WILL BE PAID UNDER THE APPROPRIATE ITEMS OF THE CONTRACT.

⑦ NO EXISTING MONUMENTS, BOUNDS, OR BENCHMARKS SHALL BE DISTURBED WITHOUT FIRST MAKING PROVISIONS FOR RELOCATION.

⑧ PERFORM ALL WORK WITHIN THE EXISTING RIGHT–OF–WAY, UNLESS OTHERWISE SHOWN ON THE PLANS OR AS ORDERED BY THE ENGINEER.

⑨ REMOVE UNPROTECTED PROJECT MARKERS (SUBSIDIARY).

⑩ SURVEY DATA FOR THIS PROJECT WAS COLLECTED BY NHDOT AND CLD CONSULTING ENGINEERS. COORDINATES ARE NEW HAMPSHIRE STATE PLANE COORDINATES OF N.A.D. 1983 AND THE BEARINGS ARE GRID. ELEVATIONS ARE REFERENCED TO N.G.V.D. 1929.

CONSTRUCTION NOTES

1. CONTRACTOR SHALL BE ADVISED OF SOIL CONDITIONS AS NOTED IN GEOTECHNICAL REPORT IN CONTRACT DOCUMENTS. TRENCH SHORING IS RECOMMENDED FOR DRAINAGE INSTALLATION. CONTRACTOR SHALL TAKE ALL NECESSARY PRECAUTIONS TO PROTECT AND SUPPORT EXISTING UTILITY POLES AND BURIED UTILITIES ADJACENT TO EXCAVATION OPERATIONS.

2. TEST PITS AS SHOWN ON PLANS OR ORDERED (IN WRITING) SHALL BE PAID UNDER CONTRACT ITEM "TEST PITS". ADDITIONAL EXCAVATION REQUIRED ADJACENT TO ACTIVE EXCAVATION OPERATIONS TO UNCOVER UTILITIES SHALL NOT BE ELIGIBLE FOR PAYMENT AS A TEST PIT AND SHALL BE SUBSIDIARY. PRIOR TO ORDERING OF DRAINAGE STRUCTURES, TEST PITS SHALL BE REQUIRED AT THE FOLLOWING LOCATIONS (AS A MINIMUM) TO DETERMINE LOCATIONS OF EXISTING UNDERGROUND UTILITIES AND POTENTIAL CONFLICTS WITH THE PROPOSED WORK (MULTIPLE PITS AT EACH LOCATION MAY BE REQUIRED TO EXPOSE ALL EXISTING UNDERGROUND UTILITIES):

AUBURN STREET INTERSECTION
SHERMAN STREET INTERSECTION
LAKE STREET INTERSECTION
GAGE STREET INTERSECTION
EARLE STREET INTERSECTION

STA. 132+25 RT.	2+75 (℄ ± – GAS MAIN)
STA. 133+25 RT.	4+50 (℄ ± – GAS MAIN)
STA. 134+25 RT.	STA. 45+90, RT. –EXISTING CB
STA. 35+15 RT.	
STA. 35+55 RT.	
STA. 35+80 RT.	
STA. 36+80 RT.	
STA. 37+60 RT.	
STA. 38+50 RT.	
STA. 39+50 RT.	
STA. 40+00 RT.	

TEST PITS SHALL BE COMPLETED AND DEPTHS PROVIDED TO ENGINEER. UPON REVIEW OF UTILITIES AND ADJUSTMENTS TO DRAINAGE TO ADDRESS CONFLICTS, ENGINEER WILL ISSUE APPROVALS TO ORDER STRUCTURES. ANY PRIOR ORDERING/DELIVERY OF STRUCTURES SHALL BE AT THE CONTRACTOR'S RISK. SPOT RELOCATION OF WATER MAINS MAY BE REQUIRED TO ACCOMPLISH DRAINAGE INSTALLATION, IF ORDERED BY THE ENGINEER. SEE SPECIAL PROVISION 611 AND MISCELLANEOUS DETAILS SHEET 39.

3. ITEM 603.00312, 12" RCP, 3000D MAY BE USED FOR POTENTIAL DRAINAGE CROSSING AT AUBURN STREET OR OTHER LOCATIONS IF REQUIRED DUE TO UTILITY CONFLICTS AND COVER REQUIREMENTS, AS DIRECTED BY THE ENGINEER. ITEM 604.4, RECONSTRUCT EXISTING CATCH BASIN AND DROP INLET WILL INCLUDE CORING A NEW PIPE INVERT INTO THE EXISTING STRUCTURE ON THE SOUTH SIDE OF AUBURN STREET, IF DIRECTED BY THE ENGINEER.

4. PROPOSED MEDIAN, STA. 44+00 TO 45+84, SHALL BE CONSTRUCTED ON EXISTING CONCRETE ROADWAY SLAB AND/OR PAVEMENT. CURBING SHALL BE INSTALLED AS SHOWN ON TYPICAL SECTION, SHEET 8 AND PAID FOR UNDER ITEMS 609.311 STRAIGHT GRANITE CURB (BRIDGE), MODIFIED AND ITEM 609.351 CURVED GRANITE CURB (BRIDGE), MODIFIED. MEDIAN CONCRETE SHALL BE PAID UNDER ITEM 608.26 6" CONCRETE SIDEWALK, REGARDLESS OF ACTUAL DEPTH.

5. BASE BID FOR PROJECT SHALL INCLUDE ITEM 608.125 2½" (2 LIFTS) BITUMINOUS SIDEWALKS, WITH 4" CONCRETE SIDEWALKS (ITEM 608.24) AND ITEM 608.52 DETECTABLE WARNING PANELS AT ADA STREET/COMMERCIAL DRIVEWAY CROSSINGS (SEE DETAILS, SHEET 9). ALTERNATE BID SHALL INCLUDE ALL SIDEWALKS AS 4" CONCRETE, ITEM 608.24, (REMOVE ITEM 608.125) WITH ITEM 608.52 AT ADA STREET/COMMERCIAL DRIVEWAY CROSSINGS.

5A. RECONSTRUCTION OF PRIVATE WALKWAYS AS SHOWN ON THE PLANS SHALL BE PAID UNDER ITEMS 403.12 HOT BITUMINOUS PAVEMENT (HAND METHOD), 203.1 COMMON EXCAVATION, AND 304.3 CRUSHED GRAVEL.

NHDOT WORK ZONE TRAFFIC CONTROL STANDARD PLANS AND NHDOT STANDARD PLANS ARE INCORPORATED BY REFERENCE.

6. TREE TRIMMING AS NOTED ON THE PLANS SHALL BE SUBSIDIARY. TREE REMOVAL SHALL BE PAID UNDER APPROPRIATE CONTRACT ITEMS. CLEARING AND GRUBBING SHALL BE SUBSIDIARY PER NHDOT STANDARD SPECIFICATIONS, SECTION 201.5.1.1.

7. CHAIN LINK FENCE ALONG WILLAND POND AND SHELL GAS STATION SHALL CONFORM TO NHDOT STANDARD PLANS, FN–2 AND SHALL BE BLACK VINYL–COATED.

8. RECONSTRUCTION OF ADJACENT SIDESTREETS ALONG THE SIDEWALK PROJECT WILL BE REQUIRED FOR DRAINAGE (SEE GENERAL PLANS AND PAVEMENT LAYOUT PLANS FOR LOCATIONS). EXACT LIMITS OF RECONSTRUCTION ARE TO BE DETERMINED IN THE FIELD, SEE DETAILS SHEET 37. REMOVAL OF EXISTING PAVEMENT AND ANY ROUGH GRADING REQUIRED TO ESTABLISH GRADES WILL BE PAID UNDER COMMON EXCAVATION.

9. ALL EXISTING UTILITIES SHOWN ON THE PLANS ARE APPROXIMATE. CONTRACTOR SHALL FIELD VERIFY LOCATIONS AND ELEVATIONS.

10. REMOVAL OF EXISTING TRAFFIC SIGNS SHALL BE SUBSIDIARY PER NHDOT STANDARD SPECIFICATIONS SECTION 115.4.2.2.

11. CONTRACTOR SHALL TAKE CARE TO LOCATE EXISTING LOOP DETECTORS AT WILLAND DRIVE PRIOR TO ANY SAWCUTTING OPERATIONS. CONTRACTOR SHALL CONDUCT OPERATIONS TO AVOID ANY DAMAGE TO LOOP DECTECTORS. ANY DAMAGED CAUSED AS A RESULT OF CONTRACTOR'S OPERATIONS SHALL BE REPAIRED OR REPLACED PER THE DIRECTION OF THE ENGINEER AT CONTRACTOR'S SOLE COST.

12. CITY OF DOVER HAS SECURED EASEMENTS FOR THE PROJECT. SEE EASEMENT EXHIBITS IN THE CONTRACT DOCUMENTS FOR LIMITS OF EASEMENTS.

13. QUALITY CONTROL TESTING SHALL BE AT THE CONTRACTOR'S EXPENSE, SUBSIDIARY TO RELATED CONTRACT ITEMS. SEE GENERAL CONDITIONS SECTION F, PAGE 00300–04 AND TECHNICAL REQUIREMENTS, SECTION 01400.

14. DUE TO DIFFICULTY SECURING EASEMENTS, SIDEWALK CONSTRUCTION FROM STA. 111+34± TO 112+14± IS REMOVED FROM THE BASE CONTRACT BID. IT IS INCLUDED AS BID ALTERNATIVE #3 IN THE CONTRACT DOCUMENTS WHICH MAY BE ADDED TO THE CONTRACT PENDING NEGOTIATIONS.

15. SUBSEQUENT TO PROJECT DESIGN AND PRIOR TO ADVERTISING, THE EXISTING GAS MAIN AS DEPICTED ON THE PLANS WAS ABANDONED FROM APPROXIMATELY STA. 16+50± TO STA. 35+50±. A NEW MAIN (NOT SHOWN) WAS PLACED ON THE WEST SIDE OF NEW ROCHESTER ROAD ALONG THE SHOULDER.

NO.	DATE	REVISION	DESIGNED: DAD/MLO	CHECKED: MF	APPROVED: MF
			DRAWN: DAD		

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Maine • New Hampshire • Vermont

OWNER:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

GENERAL NOTES
STATE PROJ. NO. 13414/13809
FED. PROJ. NO. STP–E–X–0022(000)
FED. PROJ. NO. STP–X–0003(358)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	020172
DATE:	DWG.
DEC 2007	2

GENERAL CULTURE

EDGE OF PAVEMENT — PROPOSED ROADWAY
TRAVELED WAY — existing roadway

(pavement removed outside slope lines)

DRIVEWAYS — (label surface type)

BUILDINGS — (porch); (building to be removed); (label house or type of building)

GUARDRAIL (LABEL TYPE) — (PROPOSED); (existing) bgr cgr

CURB — (PROPOSED); (existing); (label type)

STEPS AND WALK — (label type)

SHORE LINE — river/stream; pond; (label name of water body)

BRUSH OR WOODS LINE

TREES (PLANS) — (deciduous) (coniferous) (stump)

TREES (CROSS-SECTIONS) — (show circumference in mm or feet & type)

HEDGE — (label type)

WELL

FLAG POLE — fp

LEACH FIELD — leach field

GAS PUMP — gp

FUEL TANK (ABOVE GROUND) — ft (label size & type)

SEPTIC TANK — S

GRAVE — gr

BRIDGE CROSSING STREAM

HIGHWAY OVERPASS

ROCK OUTCROP

ORIGINAL GROUND (TYPICALS)

STONE WALL — (existing); (PROPOSED)

RETAINING WALL (LABEL TYPE) — (existing); (PROPOSED) — (points toward retained ground)

FENCE (BARBED WIRE)

FENCE (OTHER) — (existing); (PROPOSED) — (label fence type)

SIGNS — (single post); (double post)

MAILBOX — mb

SATELLITE DISH ANTENNA — da

WETLANDS

WETLAND DESIGNATION NUMBER — 17 PUBGE

DELINEATED WETLAND — DW

POTENTIAL WET AREA SYMBOL

ENGINEERING

CONSTRUCTION BASELINE — 30 31 32

PC, PT, POT (ON CONST BASELINE)

PI (IN CONSTRUCTION BASELINES)

INTERSECTION OR EQUATION OF TWO LINES

ORIGINAL GROUND LINE (PROFILES AND CROSS-SECTIONS)

PROFILE GRADE LINE (PROFILES AND CROSS-SECTIONS)

SLOPE LINE CLEARING LINE — SLOPE LINE; CLEARING LINE

SLOPE LINE (FILL)

SLOPE LINE (CUT)

PROFILES AND CROSS SECTIONS:
ORIGINAL GROUND ELEVATION (LEFT)
FINISHED GRADE ELEVATION (RIGHT) — 22.10 / 24.123 (metric); 72.5 / 78.14 (english)

INTERSTATE NUMBERED HIGHWAY — 93

UNITED STATES NUMBERED HIGHWAY — 4

STATE NUMBERED HIGHWAY — 175

BORING LOCATION — B1

TEST PIT — TP1

NO.	DATE	REVISION	DESIGNED: DAD/MLO	CHECKED: MF	APPROVED: MF
			DRAWN: DAD		

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CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

STANDARD SYMBOLS

STATE PROJ. NO. 12644/12806
FED. PROJ. NO. STP-T2-X-0122(010)
FED. PROJ. NO. STP-X-0006(232)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
NONE	050172
DATE: JULY 2007	DWG. 3

DRAINAGE

MANHOLE (existing) — MANHOLE (PROPOSED)

CATCH BASIN (existing) — CATCH BASIN (PROPOSED)

DROP INLET (existing) — DROP INLET (PROPOSED)

DRAINAGE PIPE (existing) — D — (label size & type)

DRAINAGE PIPE (PROPOSED) — PD — PD — PD

END SECTION (existing & PROPOSED) — METAL / RCP

OPEN DITCH (PROPOSED)

EROSION CONTROL/ STONE SLOPE PROTECTION

FLOODPLAIN / FLOODWAY

500 YEAR FLOODPLAIN BOUNDARY — FP500

100 YEAR FLOODPLAIN BOUNDARY — FP100

FLOODWAY — FW

BOUNDARIES / RIGHT-OF-WAY

RIGHT-OF-WAY LINE (label type)

PROPERTY LINE

TOWN LINE — BOW / CONCORD

BOUND — Bnd — NH BND

STATE LINE/ TOWN LINE MONUMENT — S/L — T/L

NHDOT PROJECT MARKER

IRON PIPE OR PIN — ip — IP

DRILL HOLE IN ROCK — dh

UTILITIES

TELEPHONE POLE

POWER POLE

JOINT OCCUPANCY

MISCELLANEOUS/UNKNOWN POLE

GUY POLE OR STUB

(plot point at face not center of symbol)

LIGHT POLE

LIGHT ON POWER POLE

LIGHT ON JOINT POLE

existing — (PROPOSED)

GROUND LIGHT/LAMP POST — gl — lp

UNDERGROUND UTILITIES

WATER (existing) — W — W

WATER (PROPOSED) — W — W

SEWER (existing) — S — S

SEWER (PROPOSED) — PS — PS — PS

TELEPHONE (existing) — UU

TELEPHONE (PROPOSED) — PUT — PUT — PUT

ELECTRIC (existing) — UU

ELECTRIC (PROPOSED) — PUE — PUE — PUE

GAS (existing) — G

GAS (PROPOSED) — G

(label size, type and, on existing lines, note if abandoned)

OVERHEAD ELECTRIC TRANSMISSION LINE — OHU — OHU

UTILITY JUNCTION BOX — jb (existing) — JB (PROPOSED)

WATER GATE — WV

WATER SHUT OFF — WSO

GAS SHUT OFF — GSO

MANHOLE

SEWER — S

TELEPHONE — T — MH-T

ELECTRICAL — E — MH-E

GAS — G — MH-G

(existing) — (PROPOSED)

HYDRANT — HYD

TRAFFIC SIGNALS

	(existing)	(PROPOSED)
SIGNAL CONDUIT		
2-DUCT CONDUIT		
JUNCTION BOX		
CONTROLLER CABINET		
PEDESTRIAN PUSH BUTTON		
SIGNAL POLE (W/ PEDESTAL BASE)		
SIGNAL HEAD		
MAST ARM WITH SIGNAL STANDARD		
PRE-EMPTION RECEIVERS		
STROBE LIGHT		
MOUNTED SIGN		
LUMINAIRE		
STANDARD QUADRUPOLE LOOP DETECTOR 2-4-2 TURNS		

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DAD/MKO	MF	MF
			DRAWN: DAD		

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CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

STANDARD SYMBOLS

STATE PROJ. NO. 13444/13808
FED. PROJ. NO. STP-TE-X-5122(019)
FED. PROJ. NO. STP-X-0004(232)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
NONE	050172
DATE: JULY 2007	DWG. 4

CURBING - 1

ITEM NO.			609.01	609.0124	609.02
ITEM	MARK NUMBER	RADIUS	STRAIGHT GRANITE CURB	STRAIGHT GRANITE CURB (24" HIGH)	CURVED GRANITE CURB
UNIT		LF	LF	LF	LF
LOCATION STATION TO STATION					
110+28.91, RT 24.54 – 110+34.01, RT 19.63	A1	30.83	7.02		
110+44.56, RT 14.27 – 110+88.21, RT 13.00	A2		44.68		
(LEFT INTENTIONALLY BLANK)	A3				
110+44.74, RT 19.77 – 110+88.25, RT 18.51	A4		43.53 BACK		
112+47.12, RT 10.38 – 112+54.12, RT 10.22	A8		7.00		
113+82.79, RT 7.15 – 113+89.86, RT 6.95	A9		7.00		
114+48.54, RT 6.26 – 115+44.57, RT 4.71	A10		95.96		
115+69.42, RT 4.41 – 116+34.73, RT 3.72	A11		65.32		
116+92.82, RT 3.25 – 118+21.35, RT 3.25	A12		128.53		
118+46.13, RT 3.25 – 118+67.66, RT 3.25	A13		21.53		
119+31.65, RT 3.25 – 120+87.31, RT 3.25	A14		155.66		
121+03.59, RT 7.75 – 121+04.43, RT 5.28	A15		2.61		
121+04.43, RT 5.28 – 121+07.27, RT 3.25	A16	3.00			3.73
121+07.27, RT 3.25 – 121+12.48, RT 3.25	A17		5.22		
121+12.48, RT 3.25 – 121+13.91, RT 3.70	A18	2.50			1.51
121+13.91, RT 3.70 – 121+19.76, RT 7.75	A19		7.12		
121+71.85, RT 3.25 – 123+56.56, RT 3.25	A20		181.71		
124+15.67, RT 3.25 – 124+77.00, RT 3.25	A21		61.33		
125+00.48, RT 3.25 – 125+93.23, RT 3.25	A22		92.75		
125+53.56, RT 3.25 – 127+33.31, RT 3.25	A23		79.75		
127+73.30, RT 3.25 – 128+40.83, RT 3.25	A24		67.53		
128+40.83, RT 3.25 – 128+43.52, RT 4.93	A25	3.00			3.35
128+43.52, RT 4.93 – 128+47.34, RT 12.75	A26		8.70		
128+74.68, RT 3.25 – 129+59.22, RT 3.25	A27		84.55		
129+59.22, RT 3.25 – 131+74.95, RT 3.25	A28	1484.00	215.25		
131+74.95, RT 3.25 – 134+59.28, RT 3.25	A29		284.34		
SUBTOTAL =			1667.09		8.59

SEE BID ALTERNATIVE #3

CURBING - BID ALTERNATIVE #3
(SEE GENERAL NOTE 14, SHEET 2)

ITEM NO.			609.01	609.0124	609.50
ITEM	MARK NUMBER	RADIUS	STRAIGHT GRANITE CURB	STRAIGHT GRANITE CURB (24" HIGH)	RESET GRANITE CURB
UNIT		LF	LF	LF	LF
111+34.42, RT 12.40 – 112+14.46, RT 11.00	A5				80.05
111+34.54, RT 17.55 – 112+17.58, RT 15.60	A6			83.17	
(LEFT INTENTIONALLY BLANK)	A7				
ROUNDING =				4.83	3.95
SUBTOTAL =				88.00	84.00

CURB REMOVAL FOR STORAGE & EXISTING GRANITE CURB AVAILABLE FOR RESET

ITEM 202.6 & 609.50

DESCRIPTION	STRAIGHT GRANITE CURB	CURVED GRANITE CURB	COMMENTS
UNIT	LF	LF	
LOCATION STATION TO STATION			
110+28.91 RT 24.54 – 110+88.21 RT 13.00	63.0		
110+88.21 RT – 110+88.25 RT		10.06	APPROXIMATE RADIUS = 2.5'
111+34.42 RT – 111+34.54 RT		10.06	APPROXIMATE RADIUS = 2.5'
114+62.91 RT – 115+35.95 RT	73.0		
CURB REMOVAL TOTAL	136.0	20.12	
(STRAIGHT CURB) LESS 10% BREAKAGE	13		
EXISTING CURB AVAILABLE FOR RESET	123	20.12	
USED (SEE PROPOSED CURB SUMMARY)	123		
ITEM 202.6 - CURB REMOVAL FOR STORAGE	0	20.12	
ITEM 609.50 RESET GRANITE CURB	123		NOTE: SEE PROPOSED CURB SUMMARY

CURBING - 2

ITEM NO.			609.01	609.0124	609.0128	609.02	609.311	609.351
ITEM	MARK NUMBER	RADIUS	STRAIGHT GRANITE CURB	STRAIGHT GRANITE CURB (24" HIGH)	STRAIGHT GRANITE CURB (28" HIGH)	CURVED GRANITE CURB	STRAIGHT GRANITE CURB BRIDGE MODIFIED, (4")	CURVED GRANITE CURB BRIDGE MODIFIED (4" HIGH)
UNIT		LF	LF	LF	LF	LF	LF	LF
LOCATION STATION TO STATION								
35+12.89, RT 16.00 – 35+89.36, RT 16.00	B1		76.96					
36+75.09, RT 16.00 – 37+30.18, RT 16.00	B2		55.10					
37+30.18, RT 16.00 – 38+82.24, RT 15.00	B3	773.29	148.85					
38+82.24, RT 15.00 – 41+22.32, RT 21.86	B4	676.29	233.56					
41+22.32, RT 21.86 – 42+14.79, RT 24.50	B5		92.50					
42+14.79, RT 24.50 – 43+63.54, RT 24.50	B6		148.76					
43+98.43, RT 24.50 – 45+92.91, RT 24.50	B7		194.48					
43+82.46, LT 33.62 – 43+83.38, LT 27.08	C1		6.60					
43+83.38, LT 27.08 – 43+87.71, RT 24.50	C2	3.00				4.29		
43+87.71, RT 24.50 – 44+87.24, RT 24.50	C3		99.53					
44+87.24, RT 24.50 – 45+00.70, RT 36.32	C4	15.00				20.36		
45+00.70, LT 36.32 – 45+03.47, LT 49.13	C5		13.10					
45+03.47, LT 49.13 – 45+01.28, LT 51.54	C6	2.00				3.81		
45+01.28, LT 51.54 – 44+80.38, LT 49.04	C7		21.17					
44+02.00, LT 3.50 – 45+82.56, LT 3.50	D1						180.56	
45+82.56, LT 3.50 – 45+82.56, LT 7.50	D2	2.00						6.28
45+82.56, LT 7.50 – 44+02.00, LT 7.50	D3						180.56	
44+02.00, LT 7.50 – 44+02.00, LT 3.50	D4	2.00						6.28
45+49.08, LT 52.98 – 45+33.80, LT 51.47	E1		15.36					
45+33.80, LT 51.47 – 45+32.06, LT 48.97	E2	2.00				3.46		
45+32.06, LT 48.97 – 45+59.56, LT 28.10	E3	28.00	37.20					
45+59.56, LT 28.10 – 45+61.25, LT 28.10	E4		1.70					
45+61.25, LT 28.10 – 45+88.28, LT 37.11	E5	45.00	29.00					
45+97.36, LT 46.23 – 46+06.07, LT 77.18	E6	45.00	32.87					
1+49.25, RT 24.06 – 1+59.70, RT 21.85	F1	45.28	10.66					
1+59.70, RT 21.85 – 2+39.99, RT 15.00	F2		80.58					
2+39.99, RT 15.00 – 2+72.65, RT 15.00	F3		32.67					
2+72.65, RT 15.00 – 2+93.64, RT 26.42	F4	25.00	24.92					
2+96.42, RT 32.24 – 2+97.64, RT 40.70	F5	25.00	8.6					
1+60.16, RT 27.33 – 2+00.00, RT 24.00	F6	40.00		17.53				
1+43.40, RT 32.70 – 1+60.16, RT 27.33	F7			40.00				
3+26.99, RT 27.00 – 3+33.00, RT 31.50	F8	22.00	10.50					
3+45.80, RT 26.00 – 4+23.68, RT 26.00	F9	776.00	80.94					
4+23.68, RT 26.00 – 4+63.12, RT 26.00	F10		38.31					
4+63.12, RT 26.00 – 5+04.85, RT 42.89	F11	60.00	46.16					
5+08.33, RT 46.55 – 5+19.46, RT 65.37	F12	60.00	22.00					
5+19.46, RT 65.37 – 5+55.08, RT 162.67	F13		103.91					
4+43.03, LT 138.46 – 4+64.42, LT 80.55	G1		61.73					
4+64.42, LT 80.55 – 4+24.80, LT 26.86	G2	40.00	78.91					
4+24.80, LT 26.86 – 3+46.04, LT 26.21	G3		85.80					
2+71.01, LT 26.00 – 1+79.87, LT 26.00	G4		91.14					
4+28.02, LT 132.92 – 4+53.58, LT 65.43	P1		72.00					
4+53.58, LT 65.43 – 4+18.63, LT 52.16	P2		36.97					
4+18.63, LT 52.16 – 4+17.82, LT 34.18	P3		18.00					
4+17.82, LT 34.18 – 3+22.99., LT 32.49	P4		91.50					
SUBTOTAL (CURB - 2) =			2202.04		57.53	31.92	361.12	12.56
SUBTOTAL (CURB - 1) =			1667.09			8.59		
SUBTOTAL (CURB - 1 + CURB - 2) =			3889.13		57.53	40.51	361.12	12.56
LESS CURB AVAILABLE FOR RESET			123					
(SEE CURB REMOVAL SUMMARY)								
PROJECT SUBTOTAL =			3746.13		57.53	40.51	361.12	12.56
ROUNDING			193.87		4.47	4.49	18.88	2.44
PROJECT TOTAL =			3940		62	45	380	15

SEE BID ALTERNATIVE #3

NO.	DATE	REVISION	DRAWN: DAD	DESIGNED: DAD/MLO	CHECKED: JLF	APPROVED: JLF

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Manchester, New Hampshire, Maryland

CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

SUMMARY OF QUANTITIES
STATE PROJ. NO. 12644/13606
FED. PROJ. NO. STP-TE-X-0122(019)
FED. PROJ. NO. STP-X-0008(202)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO. 032172
DATE: DEC 2007	DWG. 5

DRAINAGE

DRAIN REF. NO.	ITEM NUMBER	202.41	202.5	206.1	209.1	585.3		603.82212	603.82215	603.82218	603.82230	603.33112		604.12		604.125		604.126		604.127		604.324		604.325						604.242	COMMENTS
	ITEM	REMOVAL OF EX. PIPE 0-24 in. DIA.	REMOVAL OF CATCH BASINS,DROP INLETS, AND MH'S	COMMON STRUCTURE EXCAVATION	GRANULAR BACKFILL	STONE OUTLET PROTECTION - CLASS C		HIGH DENSITY POLYETHYLENE PIPE 12"	HIGH DENSITY POLYETHYLENE PIPE 15"	HIGH DENSITY POLYETHYLENE PIPE 18"	HIGH DENSITY POLYETHYLENE PIPE 30"	HDPE FLARED END SECTIONS 12"		CB-TYPE B 4' DIA.		CB-TYPE B 5' DIA.		CB-TYPE B 6' DIA.		CB-TYPE B 7' DIA.		DMH 4' DIA.		DMH 5' DIA.						2' DROP INLET TYPE D-B	
														EST.	ACT.	EST.	ACT.	EST.	ACT.	EST.	ACT.	EST.	ACT.	EST.	ACT.	EST.	ACT.	EST.	ACT.	EST.	ACT.	
	UNIT	LF	EA	CY	CY	CY		LF	LF		LF	EA		U	U	U	U	U	U			U	U	U	U	U	U	U	U	EA	
	LOCATION																														
1	STA 130+03.24, RT 24.36 TO 129+89.59, RT 12.55			2.2	1.7	10			16.0													1.3	1								
2A	STA 129+89.59, RT 12.55 TO 128+53.80, RT 12.24			0.8	0.7				34.0																						
2B	STA 129+53.80, RT 12.24 TO 129+05.19, RT 11.08			5.5	5.4				48.0																						
2C	STA 129+05.19, RT 11.08 TO 128+47.15, RT 9.92			4.7	3.5			57.0						1.4	1																
3	STA 128+47.15, RT 9.92 TO 126+34.65, RT 13.88			35.0	30.5			211.5						1.7	1																
4	STA 126+34.65, RT 13.88 TO 126+06.33, RT 14.36			11.8	9.0			24.0						1.7	1																
5	STA 126+06.33, RT 14.36 TO 124+00.28, RT 13.00			61.8	53.3			205.0						1.8	1																
6	STA 124+00.28, RT 13.00 TO 123+69.50, RT 13.50			14.2	11.2			27.0						1.7	1																
7	STA 123+69.50, RT 13.50 TO 121+52.33, RT 13.58			63.2	54.7			215						1.7	1																
8	STA 121+52.33, RT 13.58 TO 121+25.25, RT 13.40			10.3	7.7			23.2						1.5	1																
9	STA 121+25.25, RT 13.40 TO 119+12.20, RT 11.80			22.8	21.3			211.5						1.3	1																
10	STA 119+12.20, RT 11.80 TO 118+82.00, RT 11.00			2.4	1.9			26.5						1.2	1																
11	STA 118+82.00, RT 11.00 TO 116+73.40, RT 14.00							206.5						1.0	1																
12	STA 34+81.23, RT 140.20 TO 34+91.06, RT 81.62	120									57.5																				
13	STA 34+91.06, RT 81.62		1															1.0	1												
14	STA 34+91.06, RT 81.62 TO 35+01.06, RT 81.62							5																							
15	STA 35+01.06, RT 81.62																							1.0	1						
16	STA 34+91.06, RT 81.62 TO 134+25.00, RT 15.66			0.8	1.1			80.0														1.1	1								
17	STA 134+25.00, RT 15.66 TO 134+25.00, RT 2.25							10.5																						1	
18	STA 134+25.00, RT 15.66 TO 133+25.00, RT 13.67			0.3	0.3			97.0														1.0	1								
19	STA 133+25.00, RT 13.67 TO 133+25.00, RT 2.25							9.0																						1	
20	STA 133+25.00, RT 13.67 TO 132+25.00, RT 11.75							97.0														1.0	1								
21	STA 132+25.00, RT 11.75 TO 132+25.00, RT 2.25							6.5																						1	
22	STA 35+01.06, RT 81.62 TO 35+15.00, RT 15.00							65.0						1.0	1																
23	STA 35+15.00, RT 15.00 TO 35+83.45, RT 15.00							65.0						1.0	1																
24	STA 35+83.45, RT 15.00 TO 36+80.00, RT 15.00							93.5						1.0	1																
25	STA 36+80.00, RT 15.00 TO 37+62.00, RT 15.00							78.0						1.0	1																
26	STA 37+62.00, RT 15.00 TO 38+50.00, RT 15.00							83.0						1.0	1																
27A	STA 40+95.80, RT 50.83 TO 40+96.30, RT 34.20			1.0	0.8				16 w/tee																						
27B	STA 40+96.30, RT 34.20 TO 41+50.00, RT 29.40			0.8	0.5				54.0																						
28	STA 41+50.00, RT 34.20 TO 41+50.00, RT 21.65			2.7	2.0				5					1.3	1																
29	STA 41+50.00, RT 21.65 TO 40+50.00, RT 18.80			1.7	1.5				94.5					1.2	1																
30	STA 40+50.00, RT 18.80 TO 39+50.00, RT 15.93								94.5					1.1	1																
31	STA 41+50.00, RT 21.65 TO 42+50.00, RT 23.50			1.1	1.1				97.0					1.2	1																
32	STA 42+50.00, RT 23.50 TO 43+50.00, RT 23.50			1.5	1.5				96.0							1.2	1														
33	STA 43+50.00, RT 23.50 TO 44+50.00, RT 23.50			0.2	0.2				96.0					1.0	1																
34	STA 44+50.00, RT 23.50 TO 45+50.00, RT 23.50			0.1	0.1				97.0					1.0	1																
35	STA 45+50.00, RT 23.50 TO 45+77.00, RT 45.20		1			15		33.3				1																			REGRADE AREA AT FLARE FOR DRAINAGE
36	STA 43+50.00, RT 23.50 TO 43+82.28, LT 27.45								57.0					1.0	1																
37	STA 43+82.28, LT 27.45 TO 45+49.15, LT 28.82								164.5					1.0	1																
38A	STA 5+00.69, RT 94.15			3.1	2.2																	1.3	1								
38B	STA 5+00.69, RT 94.15 TO 4+83.72, RT 48.58								47.0																						
39	STA 4+83.72, RT 48.58 TO 4+75.28, RT 26.16								22.0							1.1	1														
40	STA 4+75.28, RT 26.16 TO 4+60.46, LT 43.35								67.5					1.0	1																
41	STA 4+75.28, RT 26.16 TO 2+75.00, RT 14.00								200.5					1.0	1																
42	STA 2+75.00, RT 14.00 TO 2+75.00, LT 25.30								36.0					1.0	1																
43	STA 35+85.00, RT 38.00 TO 36+75.00, RT 38.00	90		20				90.0																							
	PROJECT SUBTOTAL =	210	2	268	212.2	25		2020.0	1342.5		57.5	1		31.8	26	2.3	2	1	1			5.7	5	1	1					3	
	ROUNDING =	–	–	10	8.8			100	67.5		2.5	–		1.2	–	0.7	–	–	–			1.3	–	–	–			–	–	–	
	PROJECT TOTAL =	210	2	278	221	25		2120	1410		60	1		33	28	3	2	1	1			7.0	5	1	1					3	

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DRAWN: DAD	JF	JF

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CITY OF DOVER
CITY HALL
DOVER, NH 03820

SUMMARY OF QUANTITIES
STATE PROJ. NO. 12644/12606
FED. PROJ. NO. STP-TE-X-5123(019)
FED. PROJ. NO. STP-X-0006(222)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO. 060172
DATE: DEC 2007	DWG. 6

SUMMARY OF QUANTITIES

Item No.	Description	Quantity	Unit
201.21	SMALL TREE REMOVAL	23	EA
201.22	LARGE TREE REMOVAL	4	EA
202.41	REMOVAL OF EXISTING PIPE 0 – 24" DIAMETER	210	LF
202.5	REMOVAL OF CATCH BASINS	2	EA
203.10	COMMON EXCAVATION	6325	CY
203.60	EMBANKMENT–IN–PLACE	715	CY
206.10	COMMON STRUCTURE EXCAVATION	278	CY
206.5	TEST PITS	25	EA
209.1	GRANULAR BACKFILL	221	CY
214.01	FINE GRADING (PROJECT 12644)	1	U
214.02	FINE GRADING (PROJECT 12608)	1	U
304.2	GRAVEL	3095	CY
304.3	CRUSHED GRAVEL	1980	CY
403.11	HOT BITUMINOUS PAVEMENT (MACHINE METHOD)	2357	T
403.12	HOT BITUMINOUS PAVEMENT (HAND METHOD)	423	T
403.99	TEMPORARY BITUMINOUS PAVEMENT	57	T
417	COLD PLANING BITUMINOUS SURFACES	2680	SY
520.1	CONCRETE CLASS A	2	CY
544	REINFORCING STEEL	16	LB
585.3	STONE FILL, CLASS C	25	CY
593.412	PERMANENT EROSION CONTROL GEOTEXTILE, CL. 1, WOVEN	54	SY
603.00312	12" REINFORCED CONCRETE PIPE, 3000D (CLASS IV)	25	LF
603.33212	12" DIAMETER FLARED END SECTION – HDPE	1	EA
603.82212	12" PLASTIC PIPE (SMOOTH INTERIOR)	2120	LF
603.82215	15" PLASTIC PIPE (SMOOTH INTERIOR)	1410	LF
603.82230	30" PLASTIC PIPE (SMOOTH INTERIOR)	60	LF
603.89	STORMWATER TREATMENT SYSTEM	3	U
603.91	WINCHESTER ARMS INFILTRATION BASIN	1	U
603.92	TAMARACK INFILTRATION BASIN	1	U
604.12	CATCH BASIN TYPE B – 4' DIA.	33	U
604.125	CATCH BASIN TYPE B – 5' DIA	3	U
604.126	CATCH BASIN TYPE B – 6' DIA	1	U
604.242	DROP INLET – 2' DIA, TYPE DB	3	U
604.324	DRAINAGE MANHOLE – 4' DIA	7	U
604.325	DRAINAGE MANHOLE – 5' DIA	1	U
604.4	RECONSTRUCTING EXISTING CB/DI	2	EA
604.51	RECONSTRUCTING/ADJUSTING SEWER MANHOLES	5	LF
607.645	CHAIN LINK FENCE – VINYL COATED 4' HIGH	390	LF
607.9	RESETTING RAILING AND FENCING	35	LF
608.125	2.5" BITUMINOUS SIDEWALK	2045	SY
608.24	4" CONCRETE SIDEWALK	249	SY
608.26	6" CONCRETE SIDEWALK	62	SY
608.52	DETECTABLE WARNING PANELS	276	SF
609.01	STRAIGHT GRANITE CURB	3940	LF
609.0128	STRAIGHT GRANITE CURB (28" HIGH)	62	LF
609.02	CURVED GRANITE CURB	45	LF
609.311	STRAIGHT GRANITE CURB (BRIDGE), MODIFIED	380	LF
609.351	CURVED GRANITE CURB (BRIDGE), MODIFIED	15	LF
609.5	RESET GRANITE CURB	123	LF
611.05	WATER MAIN RELOCATION	1	U
611.52	RELOCATE CURB STOP AND BOX	6	EA
611.811	RELOCATE HYDRANT	2	EA
611.90001	ADJUSTING WATER GATES & SHUTOFFS SET BY OTHERS	10	EA
614.511	CONCRETE PULL BOX – 14 in	8	EA
614.523	MOLDED PULL BOX, 17"x30"	3	EA
614.7314	3" PVC PLASTIC CONDUIT, SCHEDULE 40	345	LF
614.7318	3" PVC PLASTIC CONDUIT, SCHEDULE 80	235	LF
614.7324	3" 2–DUCT PVC PLASTIC CONDUIT, SCHEDULE 40	5	LF
614.7328	3" 2–DUCT PVC PLASTIC CONDUIT, SCHEDULE 80	160	LF
615.00401	RELOCATING COMMERCIAL SIGN @ NEXTEL	1	U
615.00402	RELOCATING COMMERCIAL SIGN @ THAI SWEET PEPPER RESTAURANT	1	U
615.00403	RELOCATING COMMERCIAL SIGN @ PORTLAND GLASS	1	U
615.03	TRAFFIC SIGN TYPE C (F)	36	SF
615.05	TRAFFIC SIGN TYPE BB (F)	24	SF
615.06	TRAFFIC SIGN TYPE CC (F)	37	SF
615.034	RELOCATING TRAFFIC SIGNS	12	EA
616.101	TRAFFIC SIGNALS	1	LS
618.61	UNIFORMED OFFICERS WITH VEHICLE	1	$
618.7	FLAGGERS	850	HR
619.1	MAINTENANCE OF TRAFFIC	1	LS
628.2	SAWED BITUMINOUS PAVEMENT	6940	LF
632.0104	REFLECTIVE PAINT PAVE. MARKING, 4" LINE	13655	LF
632.0118	REFLECTIVE PAINT PAVE. MARKING, 18" LINE	111	LF
632.02	REFLECTIVE PAINT PAVE. MARKING, SYM. OR WORD	170	SF
632.9104	OBLITERATE PAVEMENT MARKING LINE	5109	LF
632.92	OBLITERATE PAVEMENT MARKING, SYM. OR WORD	100	SF
641	LOAM	510	CY
645.7	STORMWATER POLLUTION PREVENTION PLAN	1	LS
645.71	MONITORING SWPPP AND EROSION/SEDIMENT CONTROL	55	HR
646.31	TURF ESTABLISHMENT WITH MULCH & TACKIFIERS	3970	SY
650	LANDSCAPING	1	$
670.066	MAILBOX SUPPORT ASSEMBLIES	5	EA
699	MISCELLANEOUS TEMPORARY EROSION & SEDIMENT CONTROL	1	$
692	MOBILIZATION	1	LS
1000.1	ALTERATIONS AND ADDITIONS	1	$

NOTE:
CURBING AND DRAINAGE SUMMARY SHEETS
SHOW BREAKDOWN OF THE ITEMS SUMMARIZED HERE.
(SEE SHEETS 5 & 6)

NOTE:
FOR BID ALTERNATE #1/#2 – SEE BID FORM.

BID ALTERNATE #2
(ROCHESTER AVENUE TO CHESTNUT ST)

Item No.	Description	Quantity	Unit
608.125	2.5" BITUMINOUS SIDEWALK	34	SY
608.24	4" CONCRETE SIDEWALK	4	SY
608.52	DETECTABLE WARNING PANELS	9	SF
609.0124	STRAIGHT GRANITE CURB (24" HIGH)	88	LF
609.5	RESET GRANITE CURB	84	LF
615.034	RELOCATING TRAFFIC SIGNS	1	EA

NO.	DATE	REVISION	DESIGNED: DAD/RMW	CHECKED: MF	APPROVED: MF
			DRAWN: DAD		

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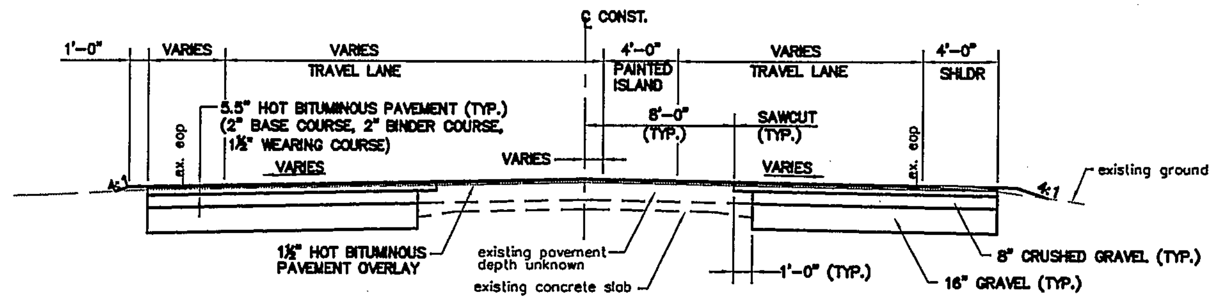
CITY OF DOVER
CITY HALL
DOVER, NH 03820

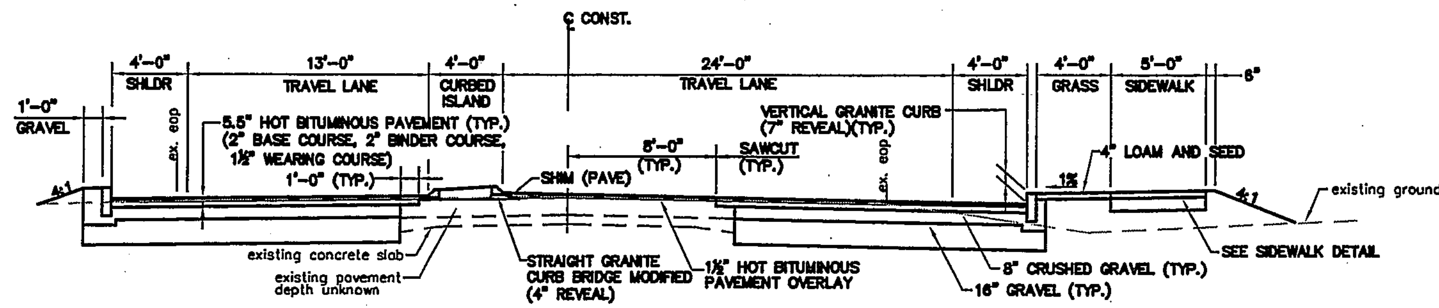
SUMMARY OF QUANTITIES
STATE PROJ. NO. 12644/12608
FED. PROJ. NO. STP–TE–X–0122(010)
FED. PROJ. NO. STP–X–0005(232)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
DEC 2007	7



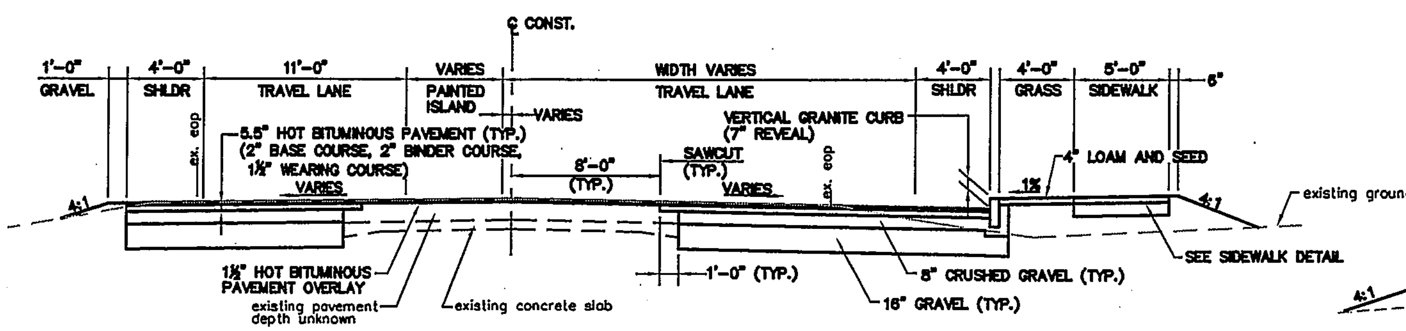
TYPICAL SECTION – NEW ROCHESTER ROAD

STA. 46+75 TO STA. 52+00
SCALE: 1" = 5'



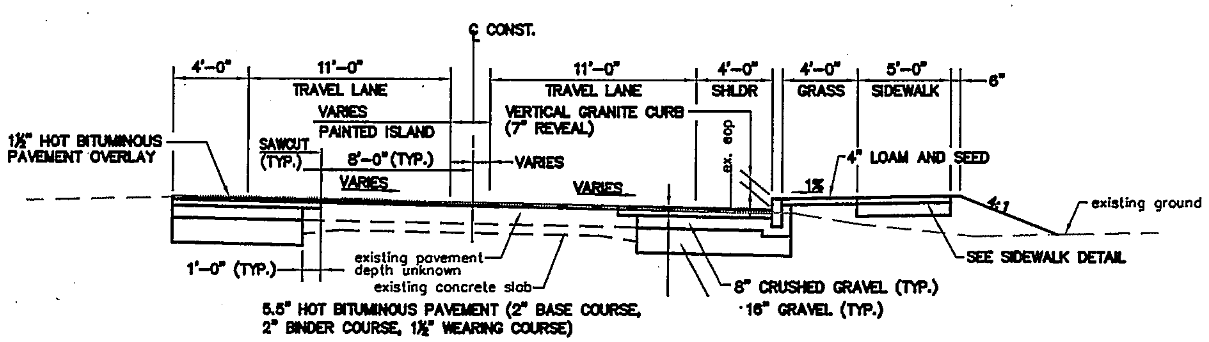
TYPICAL SECTION – NEW ROCHESTER ROAD

STA. 44+00 TO STA. 45+84
SCALE: 1" = 5'



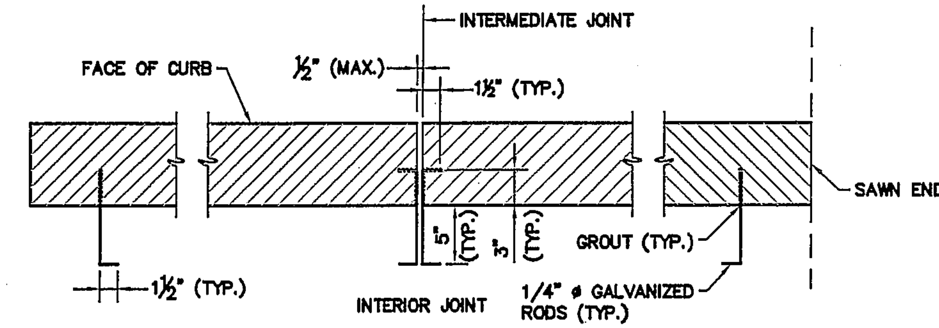
TYPICAL SECTION – NEW ROCHESTER ROAD

STA. 40+19± TO STA. 44+00
SCALE: 1" = 5'



TYPICAL SECTION – NEW ROCHESTER ROAD

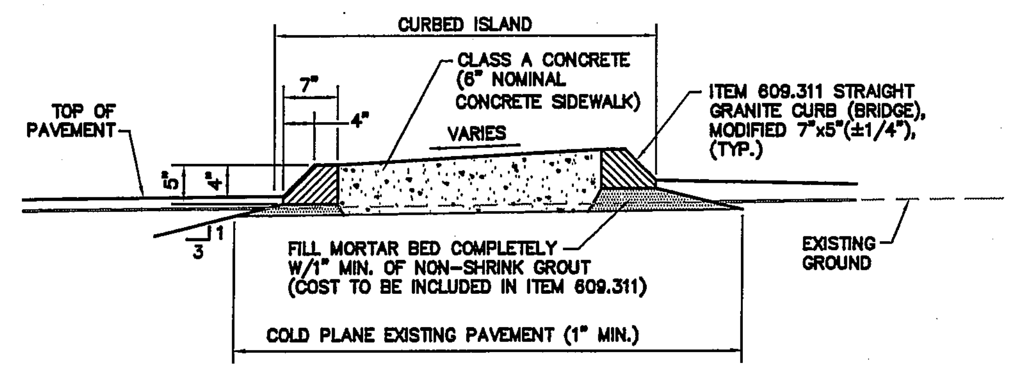
STA. 38+62.50 TO STA. 40+19±
SCALE: 1" = 5'



MEDIAN CURB ANCHOR DETAIL

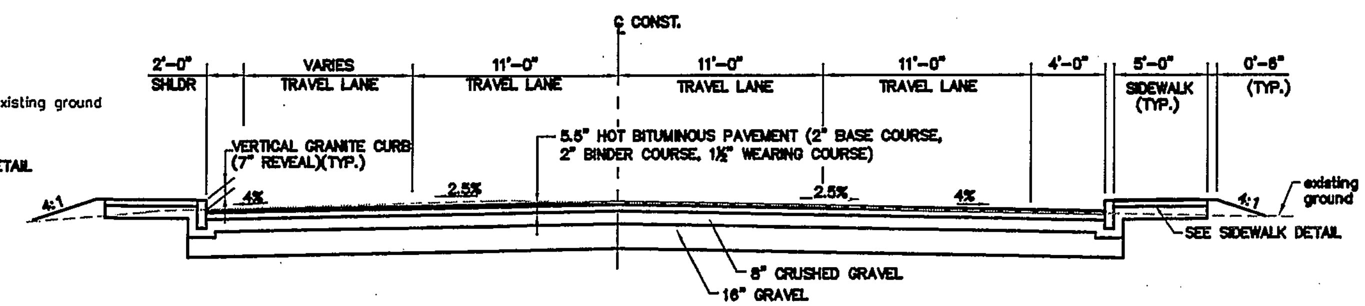
SCALE: 1½" = 1'-0"

NOTE:
CURB ANCHORS SHALL BE 1/4"⌀ RODS, TWO PER STONE, STAGGERED IN ADJACENT STONES AND COUNTERSUNK (COST SHALL BE INCLUDED IN ITEMS 609.3 OR 609.311).



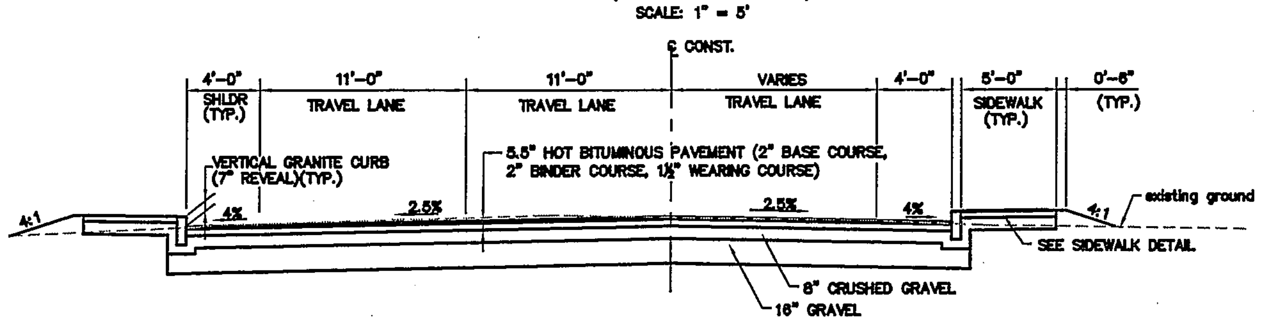
MEDIAN CURB DETAIL

SCALE: 1" = 1'-0"



TYPICAL SECTION – LONG HILL ROAD

(STATION 3+25± TO 4+96)
SCALE: 1" = 5'



TYPICAL SECTION – LONG HILL ROAD

(STATION 1+75 TO 3+25±)
SCALE: 1" = 5'

NO.	DATE	REVISION

DRAWN: DAD | DESIGNED: DAD/MLO | CHECKED: JLF | APPROVED: JLF

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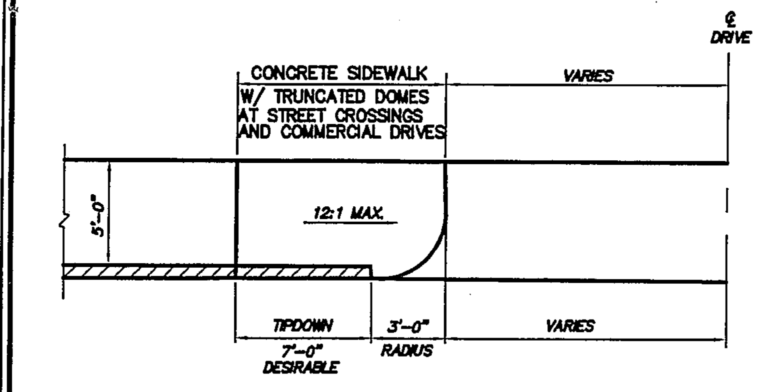
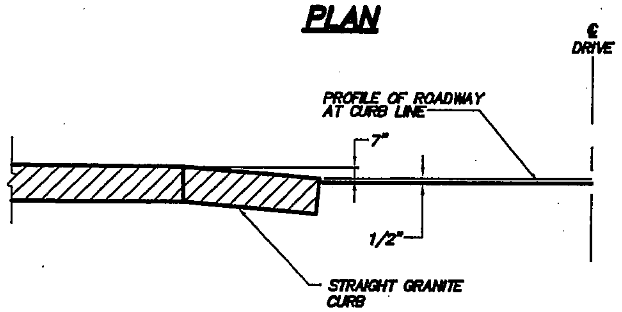
CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

TYPICAL SECTIONS
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
JULY 2007	8



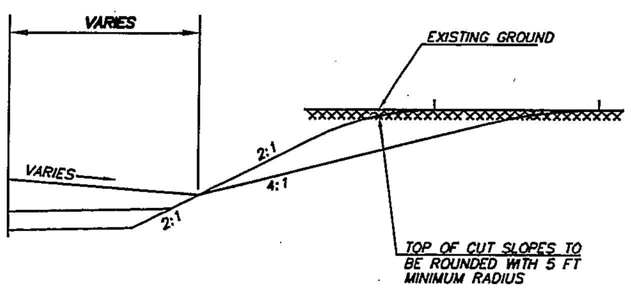
PLAN



PROFILE

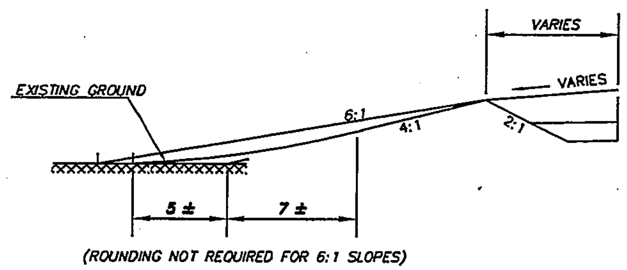
Transition Curb and Driveway

N.T.S.



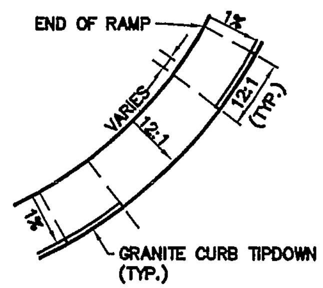
Up Slope Rounding Detail

N.T.S.



Down Slope Rounding Detail

N.T.S.

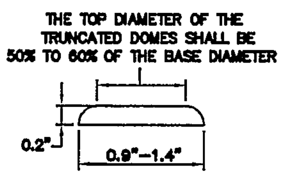


NOTES:

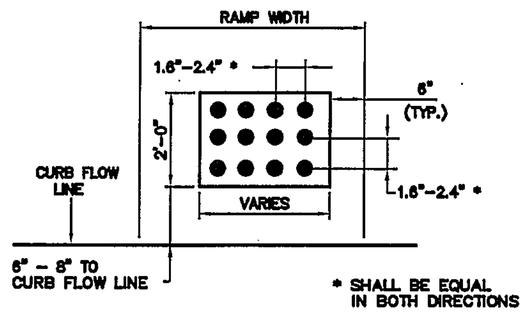
1. *MAINTAIN THE NORMAL GUTTER PROFILE THROUGHOUT THE RAMP AREA.*
2. *INTERCEPT DRAINAGE ALONG THE CURB IN ADVANCE OF THE RAMP.*

CORNER SIDEWALK RAMP

STATION 45+90± LEFT *N.T.S.*



ELEVATION VIEW

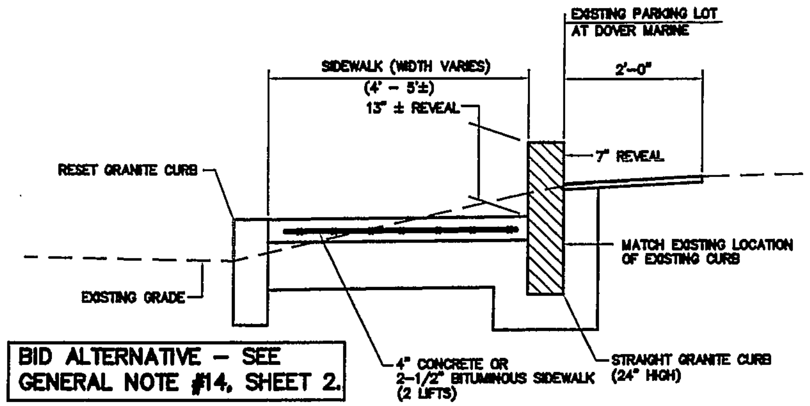


PLAN VIEW

NOTE: THE ROWS OF DOMES SHALL BE ALIGNED TO BE PERPENDICULAR OR RADIAL TO THE GRADE BREAK BETWEEN THE RAMP LANDING OR CURB RAMP AND THE STREET. DETECTABLE WARNING PANEL LOCATION, LENGTH AND ORIENTATION SHALL BE REVIEWED WITH ENGINEER IN THE FIELD PRIOR TO ORDERING MATERIALS.

DOME AND DETECTABLE WARNING DETAILS

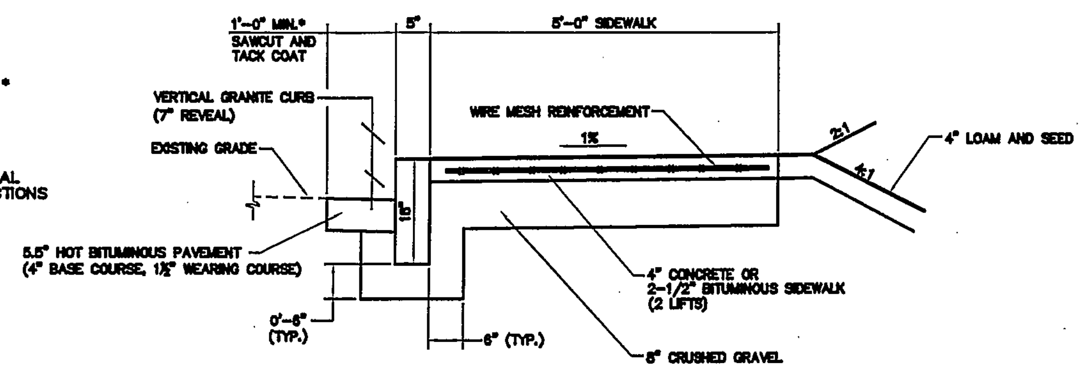
(NOT TO SCALE)



BID ALTERNATIVE – SEE GENERAL NOTE #14, SHEET 2.

TYPICAL SIDEWALK SECTION– DOVER MARINE

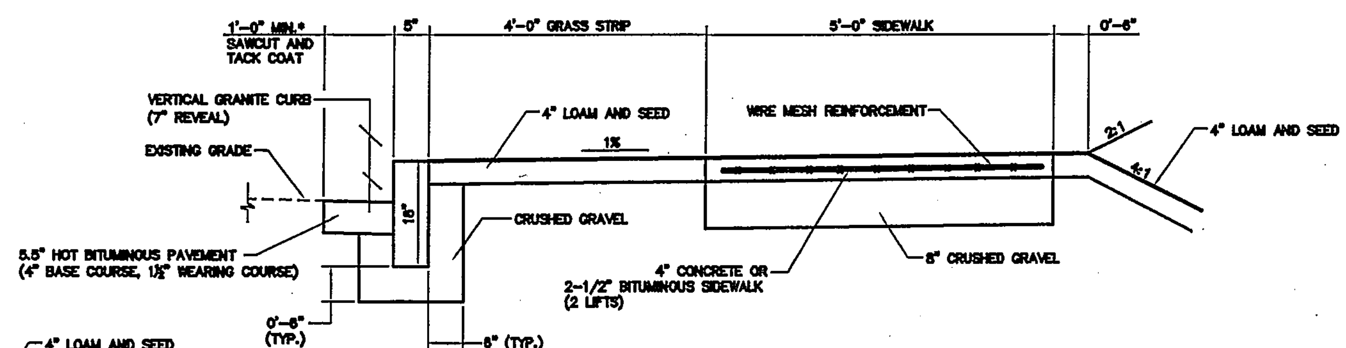
(STATION 111+34.54 TO 112+17.58)
SCALE: 1" = 1'-0"



TYPICAL SIDEWALK SECTION

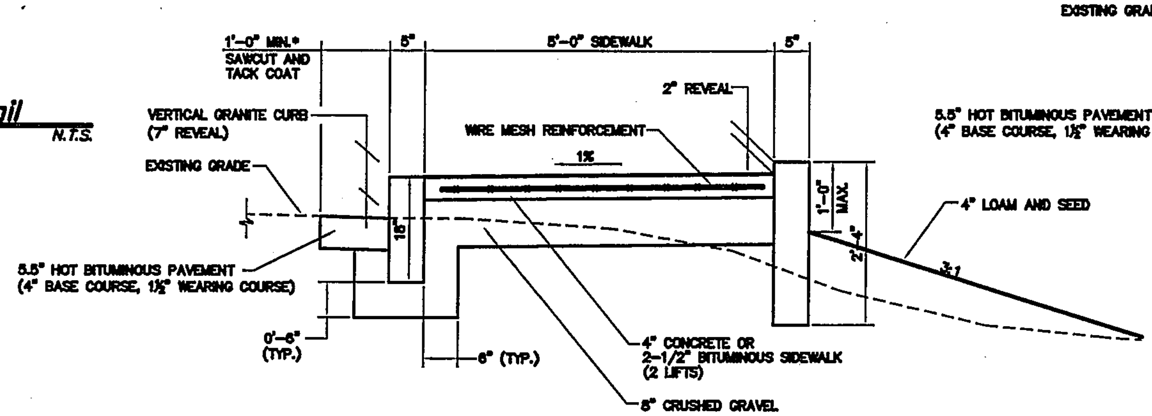
(STATION 112+35± TO 113+95±) (STATION 129+70± TO 134+67±)
(STATION 45+30± TO 2+78±) (STATION 3+28± TO 5+55±)
SCALE: 3/4" = 1'-0"

*IN AREAS NEED TO ACHIEVE POSITIVE DRAINAGE, PAVEMENT SHALL BE SAWCUT AT 3'-0" FROM PROPOSED FACE OF CURB (LOCATIONS SHOWN ON PLANS).



TYPICAL SIDEWALK SECTION WITH GRASS STRIP

(STATION 114+35± TO 128+50±) (STATION 35+00± TO 46+00±)
SCALE: 3/4" = 1'-0"



TYPICAL SIDEWALK SECTION W/BACKCURB

(STATION 1+43.4± TO 2+00±)
SCALE: 3/4" = 1'-0"

NOTE: SIDEWALK SURFACE (CONCRETE VS. PAVEMENT) WILL BE BID AS ALTERNATE (SEE BID FORM).

NO.	DATE	REVISION

DRAWN: DAD | DESIGNED: DAD/MLO | CHECKED: MF | APPROVED: MF

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CITY HALL
DOVER, NH 03820

SIDEWALK TYPICAL SECTIONS
RTE 108/ LONG HILL ROAD
DOVER, NH

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
DEC 2007	9

DRAINAGE NOTES: SEE GENERAL NOTE #2, SHEET 2, PRIOR TO ORDERING STRUCTURES OR INSTALLING DRAINAGE.

(1) STA 130+03.24, RT 24.36 (INV. = 194.15±) TO
STA 129+89.59, RT 12.55
CONSTRUCT 16' x 15" HDPE W/4' CONCRETE HEADWALL
CONSTRUCT 4' ø DMH +89.59, RIM = 202.5±
15" HDPE INV. IN = 194.55
15" HDPE INV. OUT = 194.30

(2A) STA 129+89.59, RT 12.55 TO STA 129+53.80, RT 12.24
CONSTRUCT 34' x 15" HDPE
CONSTRUCT 2' ø NYLOPLAST DRAIN BASIN, +53.80, RIM = 204.1±
15" HDPE INV. IN = 194.70 (BYPASS PIPE)
15" HDPE INV. IN = 194.70 (FROM WQU)
15" HDPE INV. OUT = 194.70

(2B) STA 129+53.80, RT 12.24 TO STA 129+05.19, RT 11.08
CONSTRUCT 48' x 15" HDPE
CONSTRUCT 2' ø NYLOPLAST DRAIN BASIN, +05.19, RIM = 204.8±
12" HDPE INV. IN = 196.43
15" HDPE INV. OUT = 194.93 (TO WQU)
15" HDPE INV. OUT = 196.18 (BYPASS PIPE)

(2C) STA 129+05.19, RT 11.08 TO STA 128+47.15, RT 9.92
CONSTRUCT 57' x 12" HDPE
CONSTRUCT 4' ø CB, +47.15, RIM = 204.4±
12" HDPE INV. IN = 196.96
12" HDPE INV. OUT = 196.70

(3) STA 128+47.15, RT 9.92 TO STA 126+34.65, RT 13.88
CONSTRUCT 211.5' x 12" HDPE
CONSTRUCT 4' ø CB, +34.65, RIM = 207.45±
12" HDPE INV. IN = 198.24
12" HDPE INV. OUT = 198.00

(4) STA 126+34.65, RT 13.88 TO STA 126+06.33, RT 14.36
CONSTRUCT 24' x 12" HDPE
CONSTRUCT 4' ø CB, +06.33, RIM = 207.75±
12" HDPE INV. IN = 198.62
12" HDPE INV. OUT = 198.37

(5) STA 126+06.33, RT 14.36 TO STA 124+00.28, RT 13.00
CONSTRUCT 205.0' x 12" HDPE
CONSTRUCT 4' ø CB, +00.28, RIM = 209.65±
12" HDPE INV. IN = 199.87
12" HDPE INV. OUT = 199.62

(6) STA 124+00.28, RT 13.00 TO STA 123+69.50, RT 13.50
CONSTRUCT 27' x 12" HDPE
CONSTRUCT 4' ø CB, + 69.50, RIM = 209.75±
12" HDPE INV. IN = 200.26
12" HDPE INV. OUT = 200.00

(7) STA 123+69.50, RT 13.50 TO STA 121+52.33, RT 13.58
CONSTRUCT 215' x 12" HDPE
CONSTRUCT 4' ø CB, +52.33, RIM = 211.1±
12" HDPE INV. IN = 201.58
12" HDPE INV. OUT = 201.33

(8) STA 121+52.33, RT 13.58 TO STA 121+25.25, RT 13.40
CONSTRUCT 23.2' x 12" HDPE
CONSTRUCT 4' ø CB, +25.25, RIM = 211.0±
12" HDPE INV. IN = 201.95
12" HDPE INV. OUT = 201.70
REGRADE LAKE STREET TO DRAIN

(9) STA 121+25.25, RT 13.40 TO STA 119+12.20, RT 11.80
CONSTRUCT 211.5' x 12" HDPE
CONSTRUCT 4' ø CB, +12.20, RIM = 210.4±
12" HDPE INV. IN = 203.25
12" HDPE INV. OUT = 203.00

(10) STA 119+12.20, RT 11.80 TO STA 118+82.00, RT 11.00
CONSTRUCT 26.5' x 12" HDPE
CONSTRUCT 4' ø CB, +82.00, RIM = 210.5±
12" HDPE INV. IN = 203.63
12" HDPE INV. OUT = 203.38

(11) STA 118+82.00, RT 11.00 TO STA 116+73.40, RT 14.00
CONSTRUCT 206.5' x 12" HDPE
CONSTRUCT 4' ø CB, +73.40, RIM = 209.7±
12" HDPE INV. OUT = 205.68

(12) STA 34+81.23, RT 140.20 TO STA 34+91.06, RT 81.62
CONSTRUCT 57.5' x 30" HDPE
INV. OUT = 193.62

RIM ELEVATIONS FOR STRUCTURES (2)–(11) ARE APPROXIMATE AND WILL DEPEND ON LIMITS OF SIDESTREET RECONSTRUCTION (SEE DETAILS SHEET 37). STRUCTURES SHALL BE ORDERED TO ALLOW A DOWNWARD ADJUSTMENT OF RIMS UP TO 6".

(13) STA 34+91.06, RT 81.62
CONSTRUCT 6' ø CB, RIM = 198.80
30" HDPE INV. OUT = 194.20
TWIN 15" (EXIST) INV. IN = 196.62±
12" HDPE INV. IN = 195.90 (42)
12" HDPE INV. IN = 195.70 (42)

(14) STA 34+91.06, RT 81.62 TO STA 35+01.06, RT 81.62
CONSTRUCT 5' x 12" HDPE

(15) STA 35+01.06, RT 81.62
CONSTRUCT 4' ø DMH, RIM = 199.10
12" HDPE INV. IN = 196.00 (42)
12" HDPE INV. OUT = 195.75 (42)

(16) STA 34+91.06, RT 81.62 TO STA 134+25.00, RT 15.66
CONSTRUCT 80' x 12" HDPE
CONSTRUCT 4' ø DMH, +25, RIM = 202.20±
12" HDPE INV. IN = 196.55 (43)
12" HDPE INV. IN = 196.90 (17)
12" HDPE INV. OUT = 196.30

(17) STA 134+25.00, RT 15.66 TO STA 134+25.00, RT 2.25
CONSTRUCT 10.5' x 12" HDPE
CONSTRUCT 2' DI–DB, +25, RIM = 201.59
12" HDPE INV. OUT = 197.00

(18) STA 134+25.00, RT 15.66 TO STA 133+25.00, RT 13.67
CONSTRUCT 97' x 12" HDPE
CONSTRUCT 4' ø DMH, 133+25, RIM = 202.35±
12" HDPE INV. IN = 197.10 (43)
12" HDPE INV. IN = 197.42 (18)
12" HDPE INV. OUT = 196.85

(19) STA 133+25.00, RT 13.67 TO STA 133+25.00, RT 2.25
CONSTRUCT 9' x 12" HDPE
CONSTRUCT 2' DI–DB, 133+25, RIM = 201.59
12" HDPE INV. OUT = 197.50

(20) STA 133+25.00, RT 13.67 TO STA 132+25.00, RT 11.75
CONSTRUCT 97' x 12" HDPE
CONSTRUCT 4' ø DMH, 132+25, RIM = 202.25±
12" HDPE INV. IN = 197.65
12" HDPE INV. OUT = 197.40

(21) STA 132+25.00, RT 11.75 TO STA 132+25.00, RT 2.25
CONSTRUCT 6.5' x 12" HDPE
CONSTRUCT 2' DI–DB, +25, RIM = 201.47
12" INV. OUT = 197.70

(22) STA 35+01.06, RT 81.62 TO STA 35+15, RT 15.00
CONSTRUCT 65' x 12" HDPE
CONSTRUCT 4' ø CB, +15, RIM = 201.69
12" HDPE INV. IN = 197.25
12" HDPE INV. OUT = 197.00

(23) STA 35+15, RT 15.00 TO STA 35+83.45, RT 15.00
CONSTRUCT 65' x 12" HDPE
CONSTRUCT 4' ø CB, +83.45, RIM = 201.75
12" HDPE INV. IN = 197.70
12" HDPE INV. OUT = 197.45

(24) STA 35+83.45, RT 15.00 TO STA 36+80.00, RT 15.00
CONSTRUCT 93.5' x 12" HDPE
CONSTRUCT 4' ø CB, +80.00, RIM = 202.48
12" INV. IN = 198.25
12" INV.OUT = 198.00

(25) STA 36+80.00, RT 15.00 TO STA 37+62.00, RT 15.00
CONSTRUCT 78' x 12" HDPE
CONSTRUCT 4' ø CB, +62.00, RIM = 203.23
12" HDPE INV. IN = 199.15
12" HDPE INV. OUT = 198.90

(26) STA 37+62.00, RT 15.00 TO STA 38+50.00, RT 15.00
CONSTRUCT 83' x 12" HDPE
CONSTRUCT 4' ø CB, +50.00, RIM = 204.45
12" HDPE INV. OUT = 200.00

(27A) STA 40+95.8, RT 50.83 TO STA 40+96.3, RT 34.20
CONSTRUCT 16' x 15" HDPE w/15" TEE INTO BASIN
15" HDPE TEE INV. = 197.60
CONSTRUCT 2' ø NYLOPLAST DRAIN BASIN +96.3, RIM = 206.0±
15" HDPE INV. IN = 197.85 (BYPASS PIPE)
15" HDPE INV. IN = 197.85 (FROM WQU)
15" HDPE INV. OUT = 197.85 (TO TEE)

(27B) STA 40+96.3, RT 34.20 TO STA 41+50, RT 29.40
CONSTRUCT 54' x 15" HDPE w/90° SWEEP
CONSTRUCT 2' ø NYLOPLAST DRAIN BASIN +50, RIM = 206.5±
15" HDPE INV. IN = 199.30
15" HDPE INV. OUT = 199.30 (BYPASS PIPE)
15" HDPE INV. OUT = 198.05 (TO WQU)

(28) STA 41+50, RT 29.40 TO STA 41+50, RT 21.65
CONSTRUCT 5' x 15" HDPE
CONSTRUCT 4' ø CB, +50, RIM = 205.90±
15" HDPE INV. IN = 199.57 (29)
15" HDPE INV. IN = 199.57 (30)
15" HDPE INV. OUT = 199.32

(29) STA 41+50, RT 21.65 TO STA 40+50.00, RT 18.80
CONSTRUCT 94.5' x 15" HDPE
CONSTRUCT 4' ø CB 40+50, RIM = 205.35
15" HDPE INV. IN = 200.20
15" HDPE INV. OUT = 199.95

(30) STA 40+50.00, RT 18.80 TO STA 39+50.00, RT 15.93
CONSTRUCT 94.5' x 15" HDPE
CONSTRUCT 4' ø CB, 39+50, RIM = 205.3±
15" HDPE INV. OUT = 201.0

(31) STA 41+50.00, RT 21.65 TO STA 42+50.00, RT 23.50
CONSTRUCT 97' x 15" HDPE
CONSTRUCT 4' ø CB, 42+50, RIM = 206.10
15" INV. IN = 200.20
15" INV. OUT = 199.95

(32) STA 42+50.00, RT 23.50 TO STA 43+50.00, RT 23.50
CONSTRUCT 96' x 15" HDPE
CONSTRUCT 5' ø CB, 43+50, RIM = 206.82
15" HDPE INV. IN = 200.90 (33)
15" HDPE INV. IN = 200.90 (33)
15" HDPE INV. OUT = 200.65

(33) STA 43+50.00, RT 23.50 TO STA 44+50.00, RT 23.50
CONSTRUCT 96' x 15" HDPE
CONSTRUCT 4' ø CB, 44+50, RIM = 206.98
15" HDPE INV. IN = 201.74
15" HDPE INV. OUT = 201.49

(34) STA 44+50.00, RT 23.50 TO STA 45+50.00, RT 23.50
CONSTRUCT 97' x 15" HDPE
CONSTRUCT 4' ø CB, 45+50, RIM = 207.53
12" HDPE INV. IN = 202.40
15" HDPE INV. OUT = 202.15

(35) STA 45+77, RT 45.20 TO STA 45+50.00, RT 23.50
CONSTRUCT 33.3' x 12" HDPE W/FLARED END SECTION
12" HDPE INV. (IN FLARED END SECTION) = 204.5
REGRADE AREA TO DRAIN TO END SECTION.
(SEE NOTE (35))

(36) STA 43+50.00, RT 23.50 TO STA 43+82.28, LT 27.45
CONSTRUCT 57' x 15" HDPE
CONSTRUCT 4' ø CB, +82.28, RIM = 205.80
15" HDPE INV. IN = 201.34
15" HDPE INV. OUT = 201.09

(37) STA 43+82.28, LT 27.45 TO STA 45+49.15, LT 28.82
CONSTRUCT 164.5' x 15" HDPE
CONSTRUCT 4' ø CB, +49.15, RIM = 207.11
15" HDPE INV. OUT = 203.0

(38A) STA 5+00.69, RT 94.15
CONSTRUCT 4' ° DMH, RIM = 205±
15" HDPE INV. IN = 198.25 (BYPASS PIPE)
15" HDPE INV. IN = 198.25 (FROM WQU)
15" HDPE INV. OUT = 198.00 (TO ISOLATER ROW)
15" HDPE INV. OUT = 198.00 (TO MANIFOLD)
WEIR PLATE ELEV. = 199.25

(38B) STA 5+00.69, RT 94.15 TO 4+83.72, RT 48.58
CONSTRUCT 47' x 15" HDPE
CONSTRUCT 2' ø NYLOPLAST DRAIN BASIN, RIM = 206±
15" HDPE INV. IN = 199.70
15" INV. OUT = 199.70 (BYPASS PIPE)
15" HDPE INV. OUT = 198.45 (TO WQU)

(39) STA 4+83.72, RT 48.58 TO STA 4+75.28, RT 26.16
CONSTRUCT 22' x 15" HDPE
CONSTRUCT 5' ø CB, +75.28, RIM = 205.0
15" INV. IN = 200.02 (41)
15" INV. IN = 200.02 (42)
15" INV. OUT = 199.75

(40) STA 4+75.28, RT 26.16 TO STA 4+60.46, LT 43.35
CONSTRUCT 67.5' x 15" HDPE
CONSTRUCT 4' ø CB, +60.46, RIM = 204.72
15" HDPE INV. OUT = 200.70

(41) STA 4+75.28, RT 26.16 TO STA 2+75.00, RT 14.00
CONSTRUCT 200.5' x 15" HDPE
CONSTRUCT 4' ø CB, 2+75.00, RIM = 205.49
15" HDPE INV. IN = 201.27
15" HDPE INV. OUT = 201.02

(42) STA 2+75.00, RT 14.00 TO STA 2+75.00, LT 25.30
CONSTRUCT 36' x 15" HDPE
CONSTRUCT 4' ø CB, 2+75.00 LT., RIM = 205.21
15" HDPE INV. OUT = 201.45

(43) STA 35+85.00, RT 38.00 TO STA 36+75.00, RT 38.00
CONSTRUCT 90' x 12" HDPE
INV. IN = 200.0
INV. OUT = 199.5

REMOVAL NOTES

(R1) STA 34+81.23, RT 140.00 TO STA 34+91.06, RT 81.62
REMOVE (TWIN) 60' x 15" RCP (SUBSIDIARY TO NOTE 12)

(R2) STA 34+91.06, RT 81.62
REMOVE CB (SUBSIDIARY TO NOTE 13)

(R3) STA 36+00, RT 30.00 TO STA 36+60.00, RT 30.00
REMOVE 60' x 12" CMP (SUBSIDIARY TO (35))

(R4) STA 45+90.35, RT 55.60
REMOVE CB
NOTE: PRIOR TO REMOVAL, CONTRACTOR TO VERIFY EXISTING STRUCTURE DIMENSIONS AND DETERMINE FEASIBILITY FOR CORING INVERT FOR 12" HDPE TO (35). UPON DIRECTION FROM ENGINEER, THIS STRUCTURE MAY REMAIN AND REPLACE F.E.S. AND REGRADING IN NOTE (35). CORING INTO STRUCTURE SHALL BE PAID 604.4, IF REQUIRED.

NO.	DATE	REVISION	DESIGNED: DAD/RMM	CHECKED: MF	APPROVED: MF
			DRAWN: DAD		

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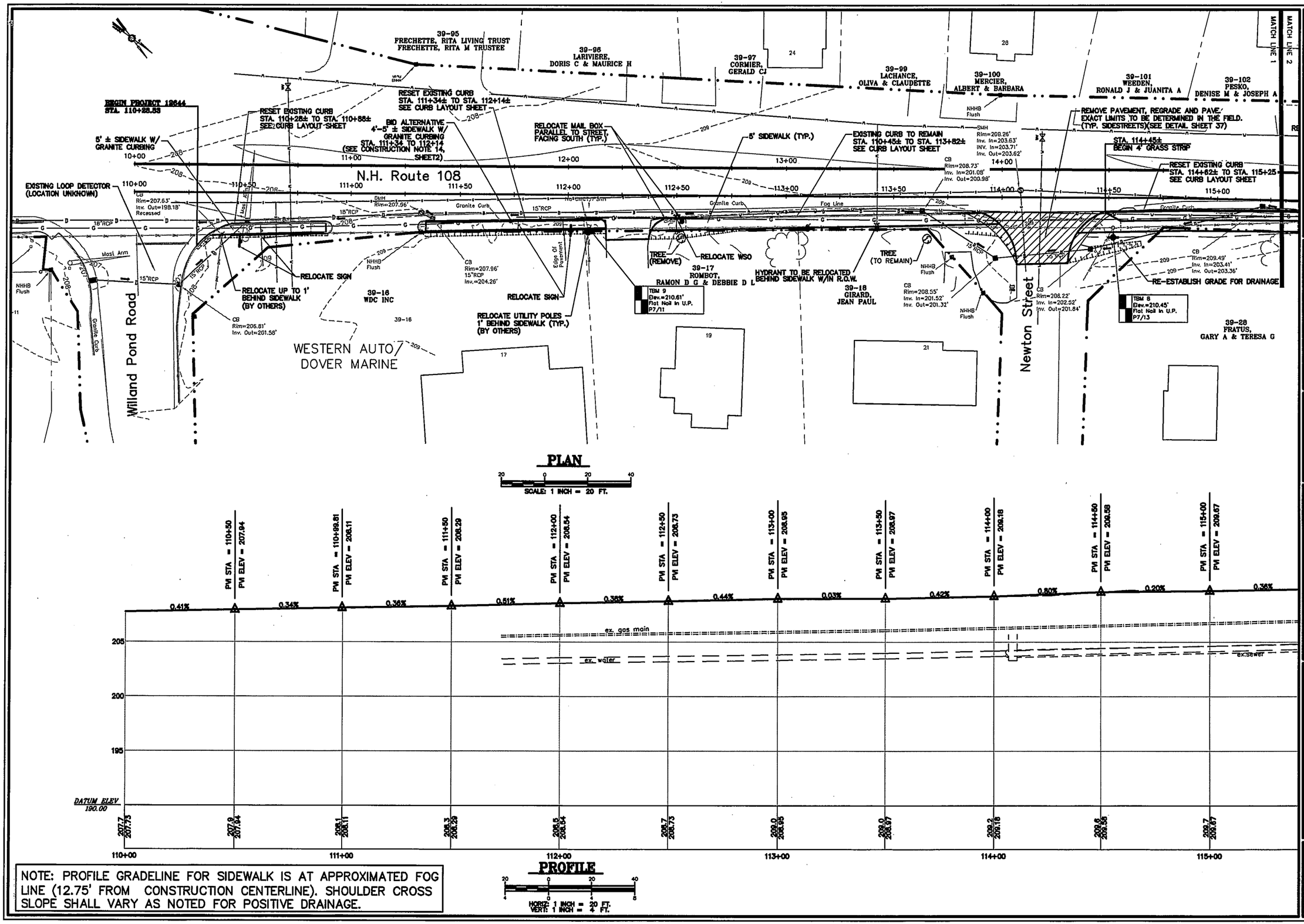
CITY OF DOVER
CITY HALL
DOVER, NH 03820

DRAINAGE NOTES

STATE PROJ. NO. 12844/12808
FED. PROJ. NO. STP-T-X-5123(010)
FED. PROJ NO. STP-X-5-0008(252)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE: -	JOB NO. 060172
DATE: DEC 2007	DWG. 10



PLAN

SCALE: 1 INCH = 20 FT.

PROFILE

HORIZ: 1 INCH = 20 FT.
VERT: 1 INCH = 4 FT.

NOTE: PROFILE GRADELINE FOR SIDEWALK IS AT APPROXIMATED FOG LINE (12.75' FROM CONSTRUCTION CENTERLINE). SHOULDER CROSS SLOPE SHALL VARY AS NOTED FOR POSITIVE DRAINAGE.

NO.	DATE	REVISION	DESIGNED: DAD/ALO	CHECKED: MF	APPROVED: MF
			DRAWN: DAD		

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CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

SIDEWALK PLAN AND PROFILE
STATE PROJ. NO. 12944/12009
FED. PROJ. NO. STP-TE-X-0122(010)
FED. PROJ. NO. STP-X-0005(282)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
DEC 2007	11

MATCH LINE 1

MATCH LINE 2

MATCH LINE 3

39-102

39-103
SCOTT, LEO V REV TRUST
SCOTT, LEO TRUSTEE

39-104
LADISHEFF, WALTER TRUSTEE
LADISHEFF, WALTER REV TRUST 99

39-105
PELOQUIN, A ELAINE &
ZERBINOPOULOS, CHARLENE

39-106
BOUCHER,
SHARON O & RONALD A

39-69A
GRANT,
TIMOTHY & LYNN M

RELOCATE MAIL BOX

SMH
Rim=210.21'
Inv. In=204.54'
INV. In=204.73'
Inv. Out=204.53'

SEE DETAIL SHEET 37

EXISTING SIGN TO BE RELOCATED OUTSIDE SIDEWALK

CUT AND REMOVE LANDSCAPE TIMBER (1' BEHIND SIDEWALK)(SUBSIDIARY TO COMMON EXCAVATION)

SMH
Rim=210.76'
Inv. In=205.52'
INV. In=205.44'
Inv. Out=204.60'

N.H. Route 108

16+00 17+00 18+00 19+00 20+00 21+00

115+50 116+00 116+50 117+00 117+50 118+00 118+50 119+00 119+50 120+00 120+50 121+00

Egg Line

12" HDPE

12" HDPE

15 RCP

RELOCATE WSO

SAWCUT

RECONSTRUCT PAVED WALKWAY W/ 2-1/2" HBP (HAND METHOD)

REMOVE SHRUBS WITHIN 1' OF SIDEWALK

TBM 7
Elev.=210.95'
Flat Nail in U.P. 48

SAWCUT ALONG EDGE OF DRIVEWAY

RELOCATE WSO

TREE (TRIM)

Landscaped Area

Chainlink Fence

RELOCATE WSO

SEE DETAILS SHEET 37.

TBM 6
Elev.=211.93'
Flat Nail in U.P. 7/17

TREE (TRIM)

RELOCATE WSO

SMH
Rim=211.51'
Inv. In=204.29'
INV. In=204.26'
Inv. Out=204.21'

Auburn Street

Sherman Street

39-27
MCKEAGNEY,
ROBERT B & WENDI E

39-38
WEEDEN,
RONALD J & JUANITA A

39-37
OTIS,
LELAND H & CYNTHIA H

39-51
RUSSELL,
JEAN A
LIVING REVOCABLE TRUST OF

39-50
SAYANGBATI, ALDRIN &
SETIAWAN, BAMBANG

EXIS TO F

PLAN

SCALE: 1 INCH = 20 FT.

PM STA = 115+50 PM ELEV = 209.85
PM STA = 116+00 PM ELEV = 210.13
PM STA = 116+50 PM ELEV = 210.35
PM STA = 117+00 PM ELEV = 210.46
PM STA = 117+50 PM ELEV = 210.55
PM STA = 118+00 PM ELEV = 210.79
PM STA = 118+50 PM ELEV = 210.91
PM STA = 119+00 PM ELEV = 211.08
PM STA = 119+50 PM ELEV = 211.22
PM STA = 120+00 PM ELEV = 211.30
PM STA = 120+50 PM ELEV = 211.23
PM STA = 121+00 PM ELEV = 211.51

0.36% 0.55% 0.45% 0.21% 0.16% 0.48% 0.23% 0.35% 0.27% 0.17% -0.15% 0.57%

ex. gas main
ex. water main
ex. sewer
ex. sewer crossing
ex. water crossing
ex. water
ex. sewer
1%
0.5%
0.5%

DATUM ELEV 190.00

209.9 209.85 | 210.1 210.13 | 210.4 210.35 | 210.5 210.46 | 210.5 210.55 | 210.8 210.79 | 210.9 210.91 | 211.1 211.08 | 211.2 211.22 | 211.3 211.30 | 211.2 211.23 | 211.5 211.51

116+00 117+00 118+00 119+00 120+00 121+00

PROFILE

HORIZ: 1 INCH = 20 FT.
VERT: 1 INCH = 4 FT.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DAD/MJD	MF	MF
			DRAWN: DAD		

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Maine • New Hampshire • Vermont

CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

SIDEWALK PLAN AND PROFILE

STATE PROJ. NO. 12644/13508
FED. PROJ. NO. STP-TE-X-0122(019)
FED. PROJ. NO. STP-X-0006(004)

NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	060172
DATE:	DWG.
DEC 2007	12

MATCH LINE 2

MATCH LINE 3

MATCH LINE 4

MAGNETIC

39-69F
LEBLANC,
ARTHUR L & HENRIETTA M

40-35
MACINNIS FAMILY IRREVOCABLE TRUST
MACINNIS, BRIAN E TRUSTEE

40-35A
SMITH,
MADELINE L

EXISTING R.O.W.

1:8 TIPDOWN
(TYP. THIS SECTION ONLY)

5' SIDEWALK W/
4' GRASS STRIP AND
GRANITE CURB (TYP.)

N.H. Route 108

12" HDPE

SEE DETAILS
SHEET 37.

SMH
Rim=210.71'
Inv. In=203.49'
INV. In=203.41'
Inv. Out=203.36'

SMH
Rim=208.5'±
Inv. In=201.5'±
INV. In=201.6'±
Inv. Out=201.47'±

SMH
Rim=211.51'
Inv. In=204.28'
INV. In=204.28'
Inv. Out=204.21'

EXISTING BASIN
TO REMAIN

Lake Street

Gage Street

Earle Street

Fog Line

Iron Pipe 1"
2' Above Grade

Concrete Bound 3X3
With PK In Center

Iron Pipe 2.5"
Top Pinched
Flush

Iron Pipe 6.5"
Flush

Concrete

TBM 5
Elev.=211.84'
Flat Nail in U.P.53
7/20

TBM 4
Elev.=209.96'
Flat Nail in U.P.55
7/22

39-64
PATCH,
LISA M & GREG

39-63
ARGIRAS,
PANOS I & JENNIFER

40-5
MITCHEL,
ETHEL W

40-4
COTE,
MARGARET R.

PLAN

SCALE: 1 INCH = 20 FT.

PVI STA = 121+00
PVI ELEV = 211.51

PVI STA = 121+50
PVI ELEV = 211.56

PVI STA = 122+00
PVI ELEV = 211.54

PVI STA = 122+50
PVI ELEV = 211.52

PVI STA = 123+00
PVI ELEV = 211.33

PVI STA = 124+00
PVI ELEV = 210.61

PVI STA = 125+00
PVI ELEV = 209.93

PVI STA = 125+50
PVI ELEV = 209.41

PVI STA = 126+00
PVI ELEV = 208.63

PVI STA = 126+48.57
PVI ELEV = 208.18

0.09%
-0.04%
-0.04%
-0.38%
-0.72%
-0.62%
-1.03%
-1.57%
-0.92%

ex. gas main
ex. water
ex. water main
ex. sewer
ex. water crossing
ex. sewer crossing
5" ex. sewer
0.5%

DATUM ELEV
190.00

211.5 / 211.51
211.6 / 211.56
211.5 / 211.54
211.5 / 211.52
211.3 / 211.33
211.1 / 210.97
210.8 / 210.61
210.4 / 210.27
209.9 / 209.93
209.4 / 209.41
208.6 / 208.63
208.2 / 208.18

121+00 122+00 123+00 124+00 125+00 126+00

PROFILE

HORIZ: 1 INCH = 20 FT.
VERT: 1 INCH = 4 FT.

NO.	DATE	REVISION	DESIGNED: DAD/MJD	CHECKED: MF	APPROVED: MF
			DRAWN: DAD		

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Maine • New Hampshire • Vermont

CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

SIDEWALK PLAN AND PROFILE

STATE PROJ. NO. 15641/15805
FED. PROJ. NO. STP-TE-X-0122(019)
FED. PROJ. NO. STP-X-0035(202)

NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
DEC 2007	13

MATCH LINE 3

MATCH LINE 4

40-36
MOORE,
ERIC S & SHERRI A

Willard Ave

N.H. Route 108

40-37
CHASE, STERLING R &
FONTAINE, MICHELE L

40-38A
OAK BLUFF REALTY LLC

MATCH LINE 5

RELOCATE MAIL BOXES

INSTALL OFFSET CONE ON SMH TO AVOID CURB

RELOCATE MAIL BOX

5' SIDEWALK W/ GRANITE CURB (TYP.)

SMH TO BE RAISED FLUSH W/ SIDEWALK

4' VINYL COATED CHAIN LINK FENCE

HDPE

12" HDPE

15" HDPE

RELOCATE WSO

Dirt Drive

Post & Rail Fence

Mailbox (Typ.)

Concrete

TBM 3
Elev.=207.67'
Flat Nail in U.P.57
7/24

40-14
SMITH,
DONNA L & HAROLD B

40-15
PLANTE,
JOSEPH E

40-16
CLOUTIER,
JANICE L & ROBERT
C/O VICKI CHAPMAN

WATER QUALITY UNIT
(SEE DETAIL SHEET 36)

PC = 129+59.54

PT = 131+74.95

PLUNGE POOL
W/ STONE DITCH PROTECTION

TBM 2
Elev.=202.99'
Flat Nail in U.P.60
7/27

40-17
CITY OF DOVER

EDGE OF WETLANDS

SHORELINE

WILLAND POND

PLAN

SCALE: 1 INCH = 20 FT.

PVI STA = 126+48.87
PVI ELEV = 208.18

PVI STA = 127+00
PVI ELEV = 207.48

PVI STA = 127+50
PVI ELEV = 206.63

PVI STA = 128+00
PVI ELEV = 205.90

PVI STA = 128+50
PVI ELEV = 205.13

PVI STA = 129+00
PVI ELEV = 204.39

PVI STA = 129+50
PVI ELEV = 203.67

PVI STA = 130+00
PVI ELEV = 202.97

PVI STA = 130+50
PVI ELEV = 202.48

PVI STA = 131+00
PVI ELEV = 202.11

PVI STA = 131+50
PVI ELEV = 201.88

PVI STA = 132+00
PVI ELEV = 201.69

-1.36% -1.70% -1.46% -1.54% -1.47% -1.45% -1.39% -1.00% -0.74% -0.45% -0.39%

0.5%

ex. sewer

ex. gas main

ex. water main

DATUM ELEV
190.00

INCRE
XSLOP

208.2 208.18
207.5 207.48
206.8 206.63
205.9 205.90
205.1 205.13
204.4 204.39
203.7 203.67
203.0 202.97
202.5 202.48
202.1 202.11
201.9 201.88
201.7 201.69

127+00 128+00 129+00 130+00 131+00 132+00

PROFILE

HORIZ: 1 INCH = 20 FT.
VERT: 1 INCH = 4 FT.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DAD/MLD	MF	MF
			DRAWN: DAD		

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Maine - New Hampshire - Vermont

CLIENT:
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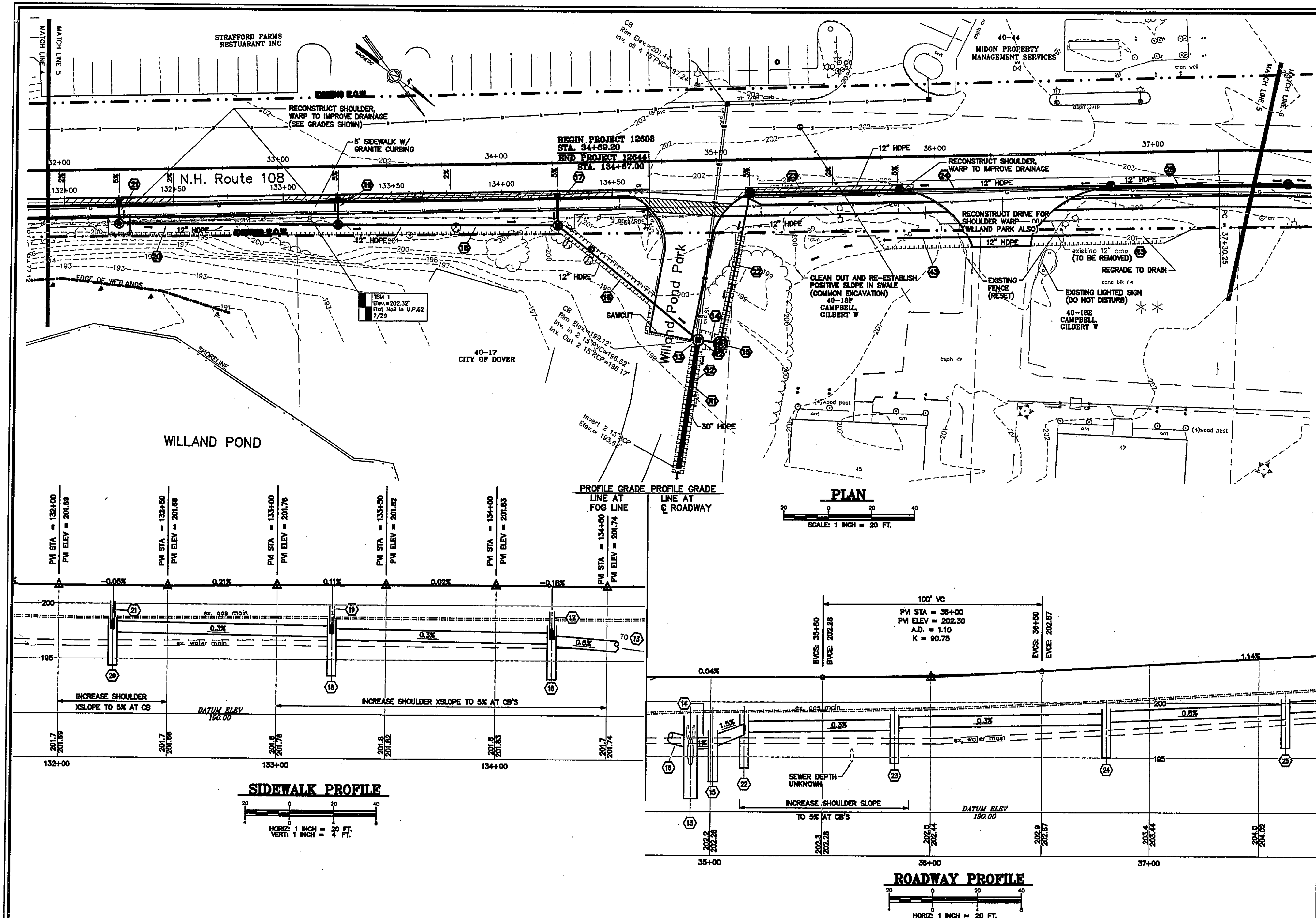
CITY HALL
DOVER, NH 03820

SIDEWALK PLAN AND PROFILE
STATE PROJ. NO. 12844/13806
FED. PROJ. NO. STP-TE-X-0125(019)
FED. PROJ. NO. STP-X-0005(252)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
DEC 2007	14



NO.	DATE	REVISION

DRAWN: DAD | DESIGNED: DAD/MJO | CHECKED: JLF | APPROVED: JLF

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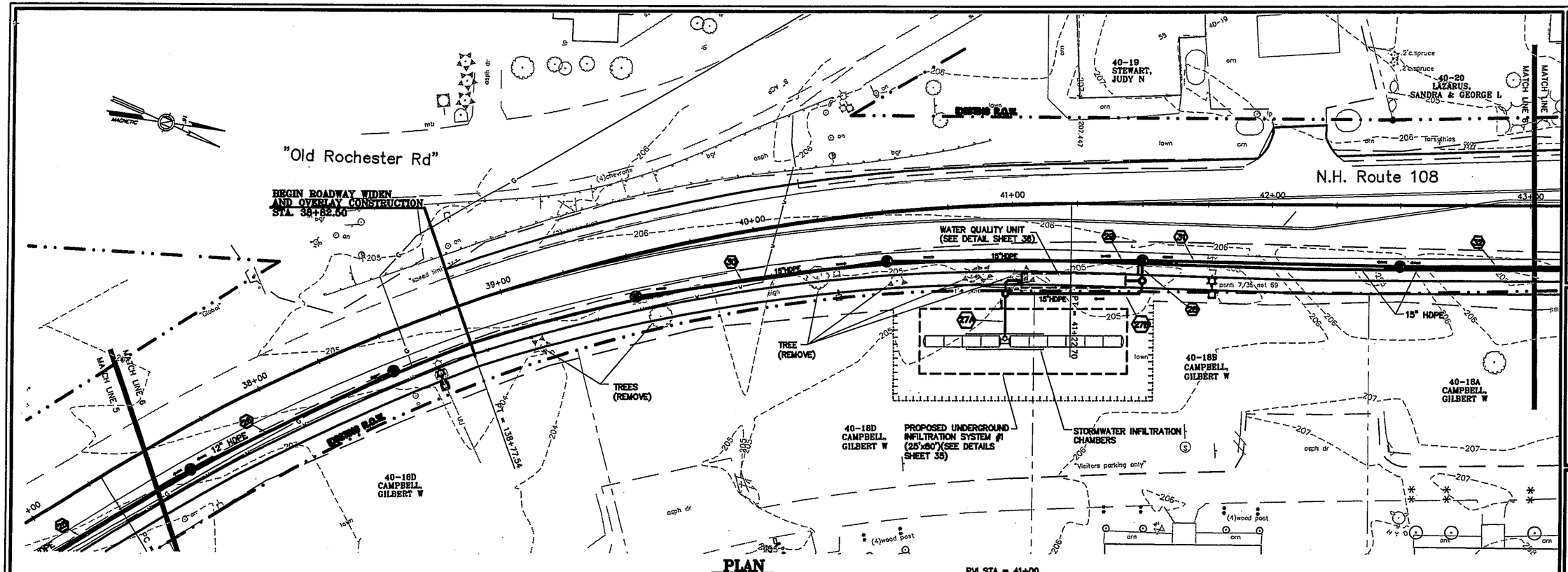
CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

SIDEWALK/ROADWAY PLAN AND PROFILE

STATE PROJ. NO. 12644/12608
FED. PROJ. NO. STP-TE-X-5125(019)
FED. PROJ. NO. STP-X-5005(252)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE: AS NOTED | JOB NO. 050172
DATE: DEC 2007 | DWG. 15



NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DRAWN: DAD	JF	JF

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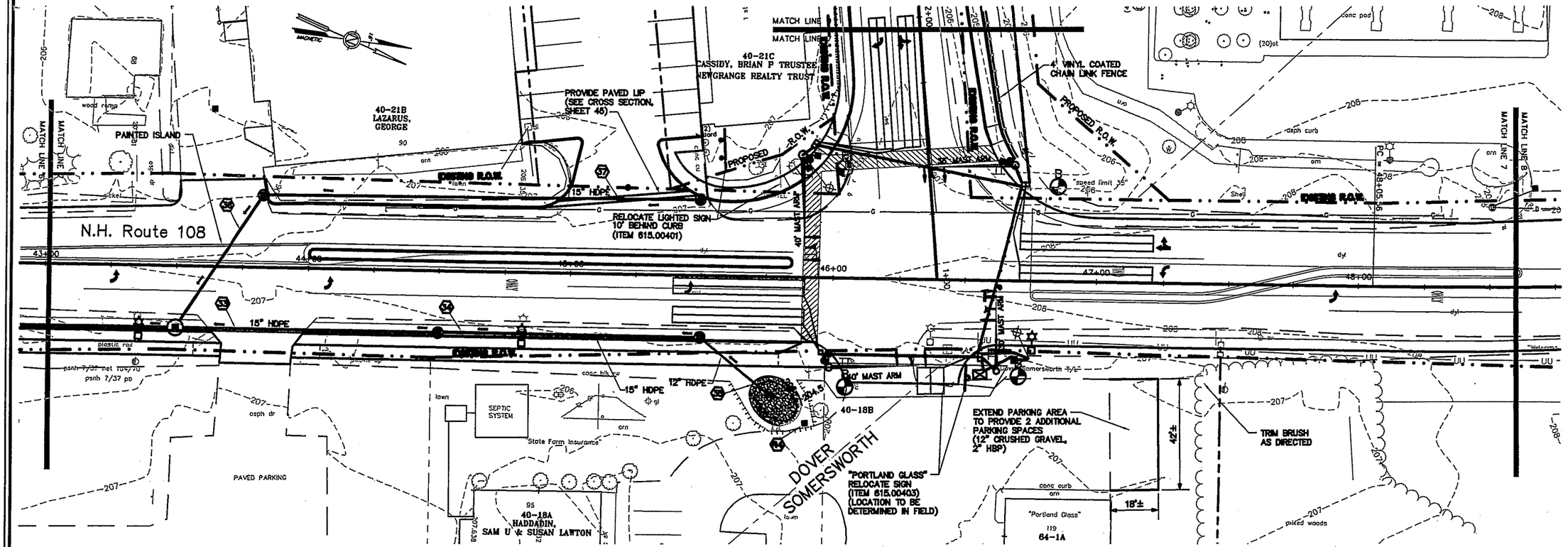
CITY HALL
DOVER, NH 03820

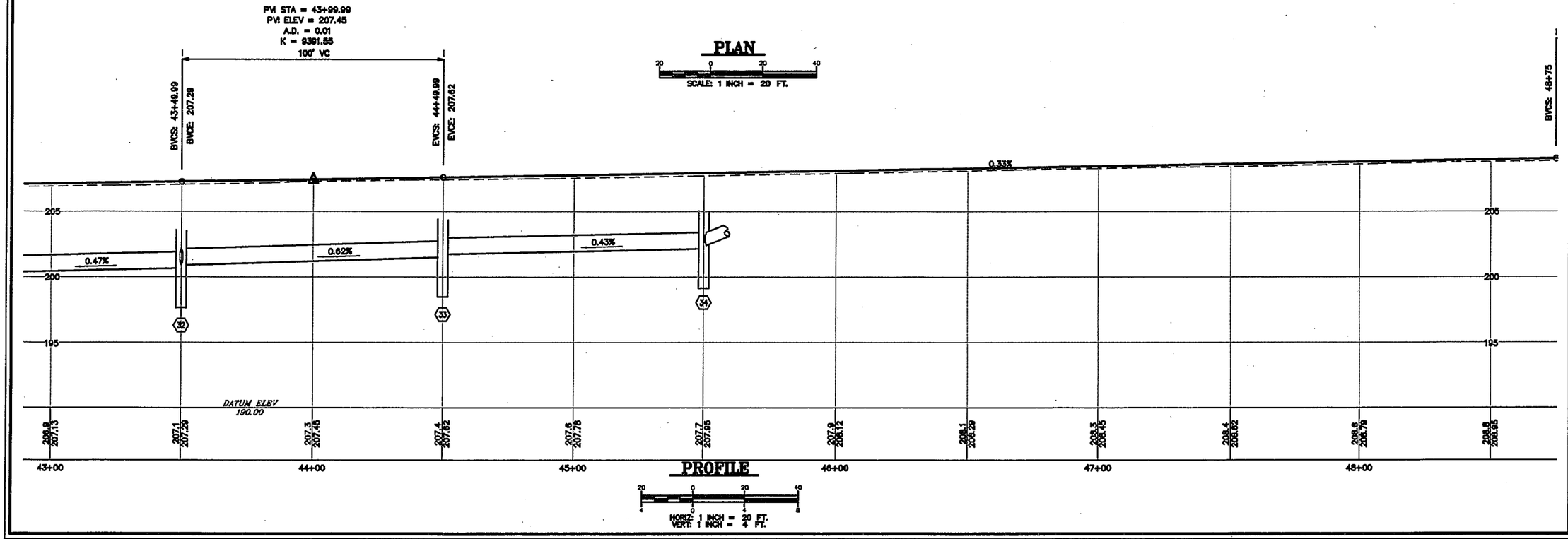
ROADWAY PLAN AND PROFILE

STATE PROJ. NO. 12644/12909
FED. PROJ. NO. STP-TE-X-0132(019)
FED. PROJ. NO. STP-X-0028(002)

NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	060172
DATE:	DWG.
DEC 2007	16





NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
1	5/15/07	ADJUST LIMITS OF CONSTRUCTION (R4 & 34)			

DRAWN: DAO

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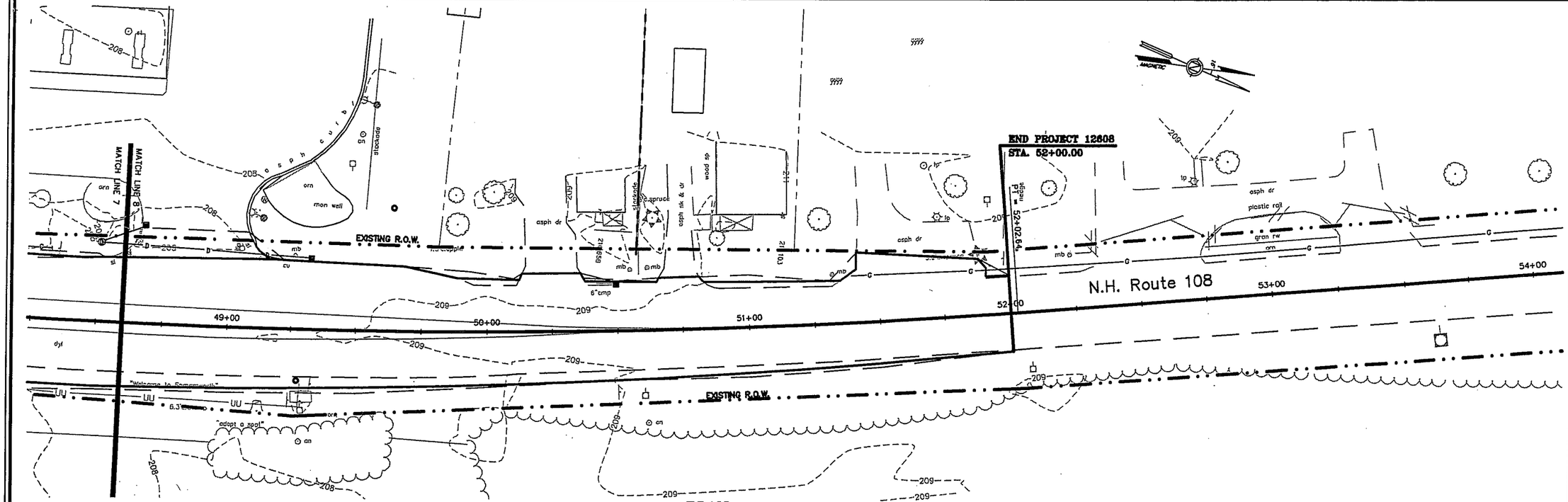
DOVER, NH 03820

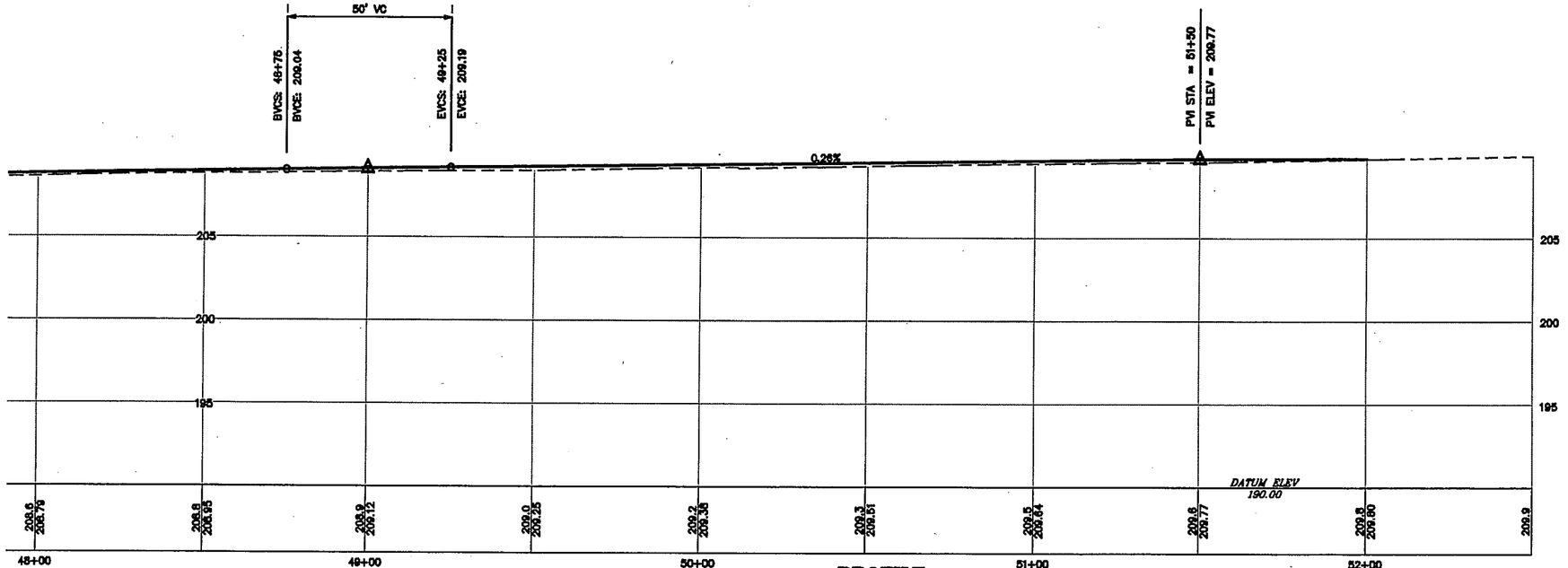
ROADWAY PLAN AND PROFILE
STATE PROJ. NO. 13944/13908
FED. PROJ. NO. STP-TE-X-0122(009)
FED. PROJ. NO. STP-X-0035(202)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	060172
DATE:	DWG.
DEC 2007	17



PLAN

SCALE: 1 INCH = 20 FT.



PROFILE

HORIZ: 1 INCH = 20 FT.
VERT: 1 INCH = 4 FT.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
	DRAWN: DAD		DAD/MJO	MF	MF

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Maine • New Hampshire • Vermont

CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

ROADWAY PLAN AND PROFILE

STATE PROJ. NO. 13644/13009
FED. PROJ. NO. STP-TE-X-0122(019)
FED. PROJ. NO. STP-X-0003(232)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	080172
DATE:	DWG.
DEC 2007	18

Old Rochester Road

Long Hill Road

"Middleton Building Supply"

"Empire Beauty School"

REMOVE TREES

RELOCATE HYDRANT
LOCATION SHOWN IS APPROXIMATE
FINAL LOCATION TO BE VERIFIED
IN FIELD BY CITY AND ENGINEER

Invert Elev.=203.10'

existing
infiltration trench
(approximate location)

edge of pavement

PROPOSED INFILTRATION SYSTEM #2
(75'x16.75')
(SEE DETAILS SHEET 35)

WATER QUALITY UNIT
(SEE DETAIL SHEET 36)

SW Elev.=208.01'

A-1-1
SITTIE ENTERPRISES LLC SERIES A
"TAMARACK"

5' – 6' BALSAM TREES
AT 6' FT. O.C.
(STAGGERED)(TYP.)(ITEM 650)

15" HDPE

RELOCATE SIGN
(ITEM 615.00402)

PROVIDE 1" OVERLAY
IN PARKING LOT. GRADE TO DRAIN.
(SEE PAVEMENT MARKING
SHEET FOR LIMITS)

GRAVEL PARKING

asphalt parking

40-21
RAIZES,
MARIA & DEMETRIOS P

FINE GRADE AND PAVE
1" BASE COURSE AND
1" OVERLAY (GRAVEL AREAS)

50'-0"

PROPOSED DUMPSTER
LOCATION

1 story canc blk

MATCH LINE

MATCH LINE

40-21C

A-1
MOTIVA ENTERPRISES LLC
ATTN TAX DEPARTMENT PROPERTY
"SHELL"

asphalt

canopy overhang

conc pump island

cone pad

(20)st

DOVER/SOMERSWORTH
TOWN LINE

NO.	DATE	REVISION

DRAWN: DAD | DESIGNED: DAD/MJO | CHECKED: MF | APPROVED: MF

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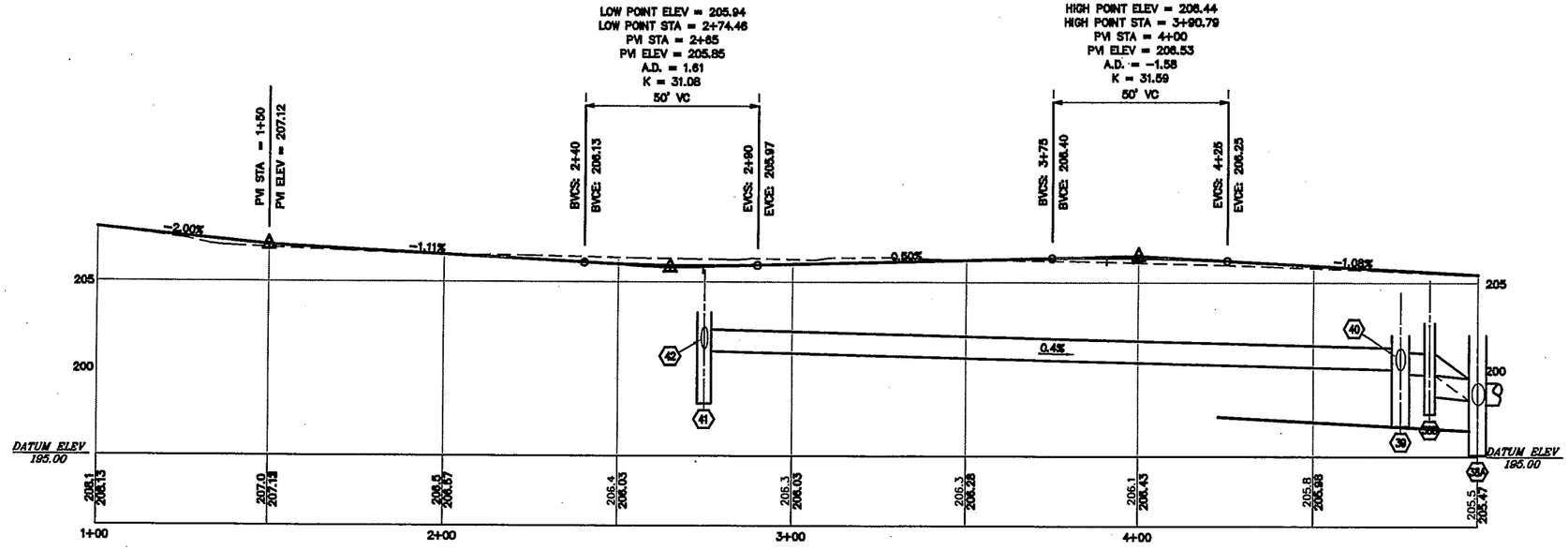
Maine · New Hampshire · Vermont

CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

LONG HILL ROAD PLAN
STATE PROJ. NO. 12944/12908
FED. PROJ. NO. STP-TE-X-0122(009)
FED. PROJ. NO. STP-X-0035(202)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1"=20'	050172
DATE: DEC 2007	DWG. 19



PROFILE – LONG HILL ROAD

HORIZ: 1 INCH = 20 FT.
VERT: 1 INCH = 4 FT.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DRAWN: DAD	DESIGNED: DAD/MLD	CHECKED: MF	APPROVED: MF

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Maine • New Hampshire • Vermont

CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

LONG HILL ROAD PROFILE
STATE PROJ. NO. 13544/13606
FED. PROJ. NO. STP-TE-X-0122(010)
FED. PROJ. NO. STP-X-0005(252)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
HOR.1"=20' VERT.1"=4'	080172
DATE: DEC 2007	DWG. 20

N.H. Route 108

10+00 11+00 12+00 13+00 14+00 15+00

110+00 110+50 111+00 111+50 112+00 112+50 113+00 113+50 114+00 114+50 115+00 115+50

MATCH LINE 2
MATCH LINE 1

TD A1 A2 A3 A4 A5 A6 A7 A8 A9 A10 ADA

RESET EXISTING CURB

RESET EXISTING CURB
A5 AND A6 = BID ALTERNATIVE
(SEE GENERAL NOTE 14, SHEET 2)

RESET EXISTING CURB

Willand Pond Road

WESTERN AUTO/
DOVER MARINE

Newton Street

NOTE: A5 AND A6 = BID ALTERNATE SEE GENERAL NOTE 14, SHEET 2

NOTE: FINAL LOCATION OF A2 AND A5 TO BE DETERMINED IN THE FIELD BY ENGINEER.

TD = CURB TIPDOWN

ADA = CONCRETE SIDEWALK TIPDOWN W/ ADA TRUNCATED DOMES AT COMMERCIAL DRIVES AND STREET CROSSINGS

MATCH LINE 2
MATCH LINE 1

16+00 N.H. Route 108 17+00 18+00 19+00 20+00 21+00

115+50 116+00 116+50 117+00 117+50 118+00 118+50 119+00 119+50 120+00 120+50 121+00

MATCH LINE 3
MATCH LINE 2

TD A11 A12 A13 A14 A15 A16 R=3 A17 ADA

Auburn Street

Sherman Street

PLAN

20 0 20 40
SCALE: 1 INCH = 20 FT.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DAD/MJO	MJF	MJF
			DRAWN: DAD		

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Maine • New Hampshire • Vermont

CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

SIDEWALK CURBING & PAVEMENT LAYOUT PLAN

STATE PROJ. NO. 12044/12908
FED. PROJ. NO. STP-TE-X-0152(019)
FED. PROJ. NO. STP-X-0008(202)

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
DEC 2007	21

MATCH LINE 2

MATCH LINE 3

N.H. Route 108

21+00 22+00 23+00 24+00 25+00 26+00

A16 R=3' A16 R=2.5' A15 A17 A18 A19 A20 A21 A22

TD TD TD TD

ADA ADA

121+00 121+50 122+00 122+50 123+00 123+50 124+00 124+50 125+00 125+50 126+00 126+50

Lake Street

Gage Street

Earle Street

MATCH LINE 3

MATCH LINE 4

MATCH LINE 4

MATCH LINE 3

TD = CURB TIPDOWN

ADA = CONCRETE SIDEWALK TIPDOWN W/ ADA TRUNCATED DOMES AT COMMERCIAL DRIVES AND STREET CROSSINGS

MATCH LINE 3

MATCH LINE 4

N.H. Route 108

27+00 28+00 29+00 30+00 31+00 32+00

126+50 127+00 127+50 128+00 128+50 129+00 129+50 130+00 130+50 131+00 131+50 132+00

A23 A24 A25 R=3' A26 A27 A28 R = 1434'

TD TD TD

Concrete

1/2" REVEAL FOR DRAINAGE (A25, A26)

PC = 129+59.22

PC = 129+59.54

PT = 131+74.95

PT = 31+72.12

MATCH LINE 5

MATCH LINE 4

SHORELINE

WILLAND POND

PLAN

SCALE: 1 INCH = 20 FT.

NO.	DATE	REVISION	DRAWN: DAD	DESIGNED: DAD/ALO	CHECKED: MF	APPROVED: MF

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Maine • New Hampshire • Vermont

CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

SIDEWALK CURBING & PAVEMENT LAYOUT

STATE PROJ. NO. 13144/13808
FED. PROJ. NO. STP-TE-X-0112(010)
FED. PROJ. NO. STP-X-0009(022)

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
JULY 2007	22

N.H. Route 108

BEGIN PROJECT 12608
STA. 34+69.20
END PROJECT 12444
STA. 134+87.00

Willand Pond Park

"Old Rochester Rd"

MATCH LINE 4
MATCH LINE 5
MATCH LINE 6
MATCH LINE 7

TD = CURB TIPDOWN

ADA = CONCRETE SIDEWALK TIPDOWN W/ ADA TRUNCATED DOMES AT COMMERCIAL DRIVES AND STREET CROSSINGS

SAWCUT AT 1.5' FROM FACE OF CURB FOR PIPE

PC = 37+30.21
PT = 41+22.70
PT = 138+77.54

TAPER 35:1±

R = 710
R = 676.29'

asphalt parking
asph
asph dr
Sign

PLAN

SCALE: 1 INCH = 20 FT.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DAD/MLO	MF	MF
			DRAWN: DAD		

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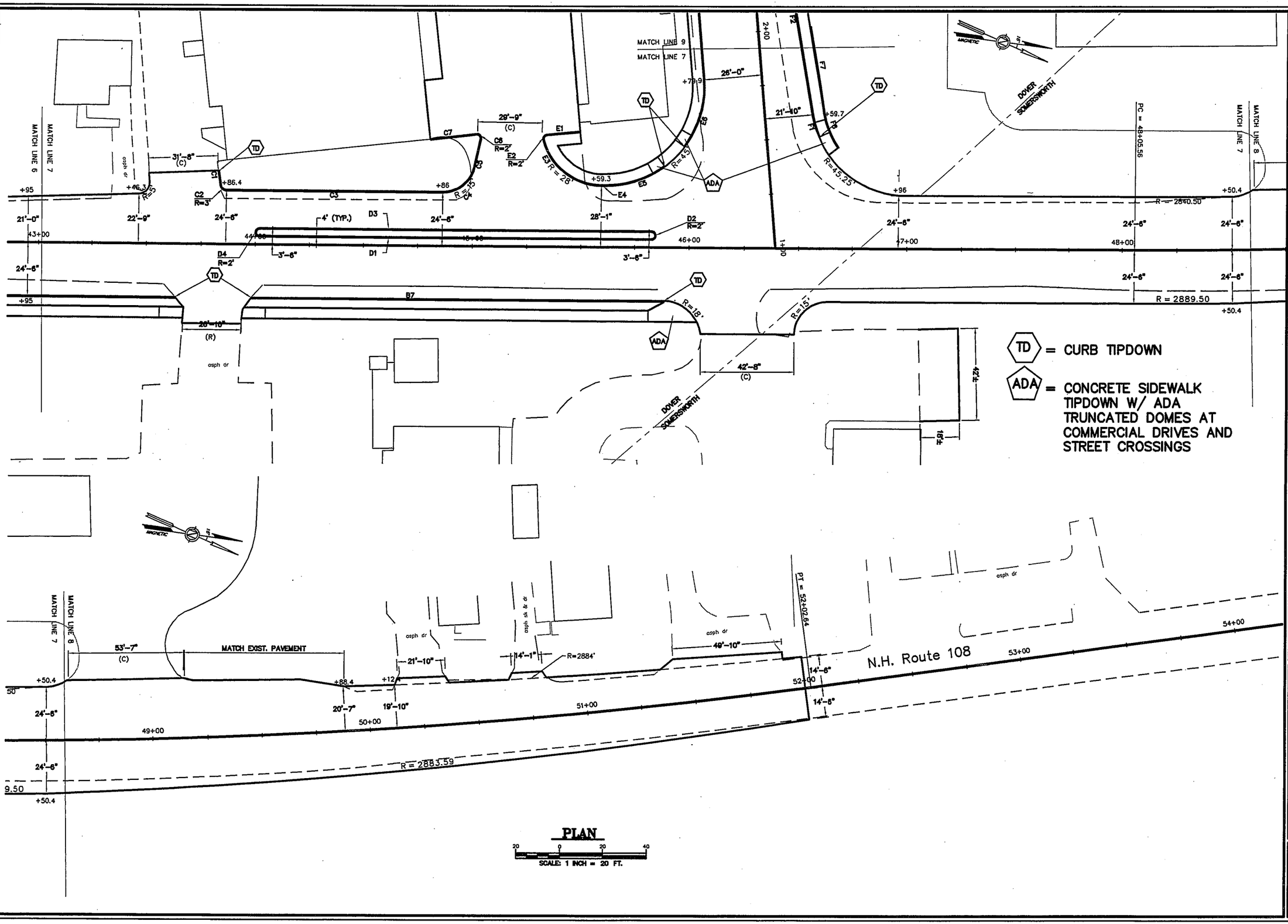
CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

ROADWAY CURBING & PAVEMENT LAYOUT
STATE PROJ. NO. 12644/12608
FED. PROJ. NO. STP-TE-T-5152(019)
FED. PROJ. NO. STP-X-0005(252)

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
JULY 2007	23



TD = CURB TIPDOWN

ADA = CONCRETE SIDEWALK TIPDOWN W/ ADA TRUNCATED DOMES AT COMMERCIAL DRIVES AND STREET CROSSINGS

PLAN

SCALE: 1 INCH = 20 FT.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DAD/MLO	MF	JF
			DRAWN: DAD		

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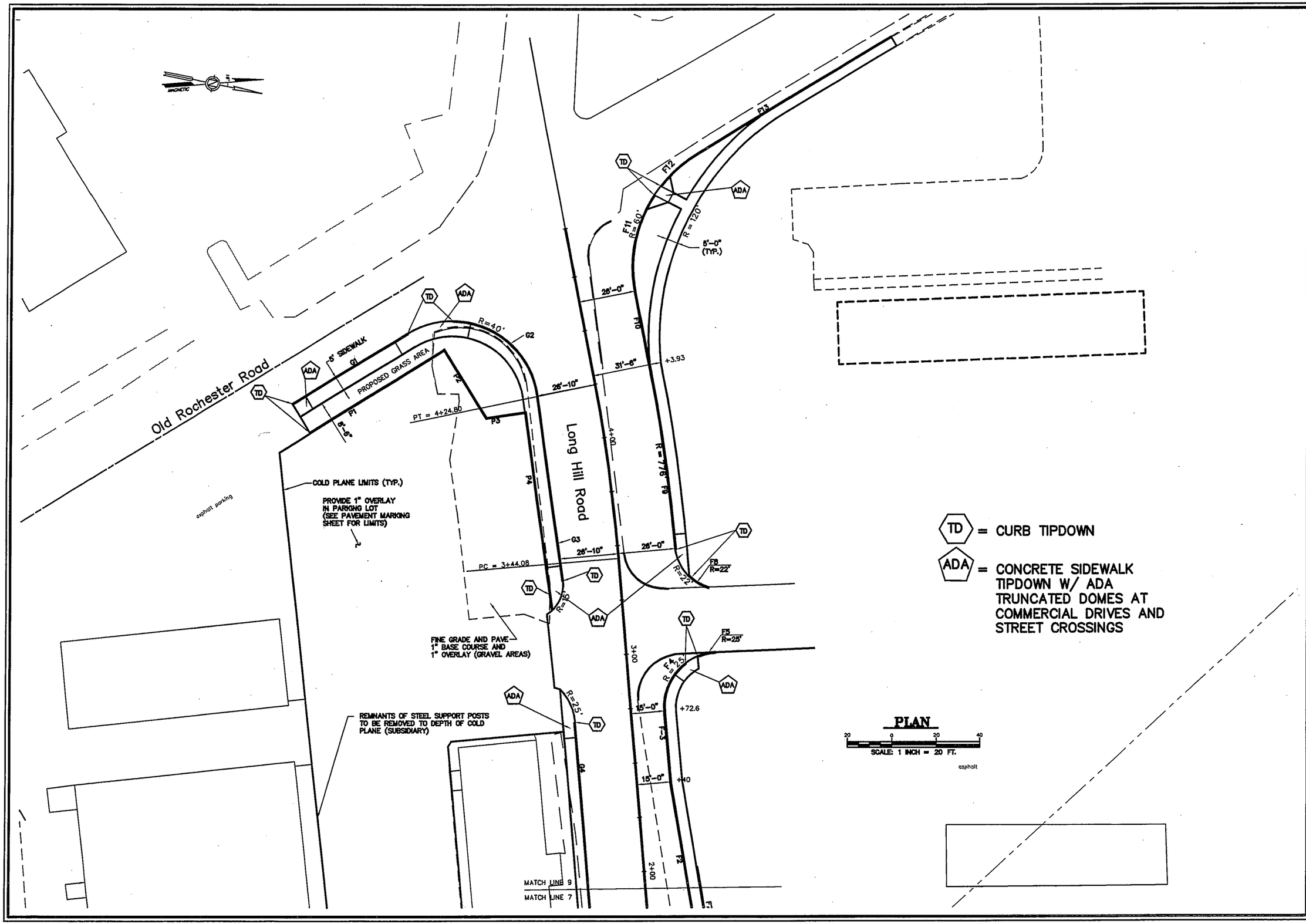
Maine · New Hampshire · Vermont

CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

ROADWAY CURBING & PAVEMENT LAYOUT

STATE PROJ. NO. 12044/12009
FED. PROJ. NO. STP-TE-X-5132(019)
FED. PROJ. NO. STP-X-0005(252)

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
JULY 2007	24



NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DRAWN: DAD	DAD/ALO	

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DOVER, NH 03820

ROADWAY CURBING & PAVEMENT LAYOUT

STATE PROJ. NO. 13044/13009
FED. PROJ. NO. STP-TE-X-0122(019)
FED. PROJ. NO. STP-X-0005(232)

SCALE:	JOB NO.
AS NOTED	060172
DATE:	DWG.
JULY 2007	25

N.H. Route 108

10+00 11+00 12+00 13+00 14+00 15+00

110+00 110+50 111+00 111+50 112+00 112+50 113+00 113+50 114+00 114+50 115+00 115+50

MATCH LINE 1 MATCH LINE 2

Willand Pond Road

Mast Arm

RIGHT LANE ENDS (RELOCATE)

BID ALTERNATE #3 (SEE CONSTRUCTION NOTE 14, SHEET 2)

LANE ENDS MERGE LEFT

(RELOCATE)

Newton Street

PLAN

SCALE: 1 INCH = 20 FT.

39-102

36 38 40 42

MATCH LINE 1 MATCH LINE 2

N.H. Route 108

16+00 17+00 18+00 19+00 20+00 21+00

115+50 116+00 116+50 117+00 117+50 118+00 118+50 119+00 119+50 120+00 120+50 121+00

MATCH LINE 2 MATCH LINE 3

"AUBURN ST." RELOCATE

Auburn Street

Sherman Street

23 23 25 27 29

PLAN

SCALE: 1 INCH = 20 FT.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DAD/ALO	JLF	JLF

DRAWN: DAD

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DOVER, NH 03820

PAVEMENT MARKING & SIGNING LAYOUT

STATE PROJ. NO. 12644/12808
FED. PROJ. NO. STP-TE-X-0512(019)
FED. PROJ. NO. STP-X-0008(202)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	030172
DATE:	DWG.
JULY 2007	26

MATCH LINE 2
MATCH LINE 3

N.H. Route 108

21+00 121+00 121+50 22+00 122+00 122+50 23+00 123+00 123+50 24+00 124+00 124+50 25+00 125+00 125+50 26+00 126+00 126+50

Lake Street

Gage Street

Earle Street

MATCH LINE 3
MATCH LINE 4

PLAN

SCALE: 1 INCH = 20 FT.

MATCH LINE 3
MATCH LINE 4

N.H. Route 108

27+00 126+50 127+00 127+50 28+00 128+00 128+50 29+00 129+00 129+50 30+00 130+00 130+50 31+00 131+00 131+50 32+00 132+00

Edge Of Pavement

Dirt Drive

PC = 129+59.22

PC = 29+59.54

PT = 131+74.95

PT = 31+27.12

MATCH LINE 4
MATCH LINE 5

SHORELINE

WILLAND POND

PLAN

SCALE: 1 INCH = 20 FT.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DAD/HLO	JLF	JLF
			DRAWN: DAD		

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PAVEMENT MARKING & SIGNING LAYOUT

STATE PROJ. NO. 13544/13508
FED. PROJ. NO. STP-T2-X-0122(019)
FED. PROJ. NO. STP-X-0008(221)

NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	060172
DATE: JULY 2007	DWG. 27

GENERAL PAVEMENT MARKING NOTE:

PLACEMENT AND COLOR OF PAVEMENT MARKING LINES, SYMBOLS, AND WORDS SHALL CONFORM TO THE (MUTCD), SECTION 632 OF NHDOT STANDARD SPECIFICATION BOOK. CONTRACT SUPPLEMENTAL SPECIFICATIONS, THE STATE OF NEW HAMPSHIRE PAVEMENT MARKING STANDARD DETAIL SHEETS, AND STANDARD PLAN SHEETS.

RETROREFLECTIVE PAINT MARKING KEY

( )SSL( ) = (SIZE IN INCHES) SINGLE SOLID LINE (COLOR)
( )DSL( ) = (SIZE IN INCHES) DOUBLE SOLID LINE (COLOR)
( )SSBL( ) = (SIZE IN INCHES) SINGLE SOLID W/BROKEN LINE (COLOR)
( )SBL( ) = (SIZE IN INCHES) SINGLE BROKEN LINE (COLOR)
( )DBL( ) = (SIZE IN INCHES) DOUBLE BROKEN LINE (COLOR)

RETROREFLECTIVE PAINT PAVEMENT MARKING KEY

THE FOLLOWING FINAL PAVEMENT MARKINGS SHALL BE RETROREFLECTIVE THERMOPLASTIC UNLESS OTHERWISE NOTIFIED BY THE STATE
STANDARD SYMBOLS AND WORDS
– SYMBOLS ONLY – WORDS
(A) = STOP BARS = 18" SSL (WHITE)(T)

MATCH LINE 4
MATCH LINE 5
MATCH LINE 6
MATCH LINE 7
N.H. Route 108
32+00
132+00
132+50
33+00
133+00
133+50
34+00
134+00
134+50
35+00
36+00
37+00
BEGIN PROJECT 12608
STA. 34+69.20
END PROJECT 12644
STA. 134+67.00
PT = 31+77.12
PC = 37+30.23
4" SSL (W)
Fog Line
Milland Pond Park
COAST BUS STOP (RELOCATE)

PLAN
SCALE: 1 INCH = 20 FT.

"Old Rochester Rd"
MAGNETIC
(4)chevrons
(2) arrow sign
"speed limit 25"
"Global"
asph
lawn
asph dr
38+00
39+00
40+00
41+00
R = 691.16
4" SSL (W)
11'
4" DSL (Y)
REMOVE AND RESET (SUBSIDIARY)
STA. 38+82.50
PC = 38+77.54
STA. 41+00
STA. 41+22.37
PT = 41+22.20
PAINTED ISLAND
STA. 41+88
STA. 42+31
forsythias
13'-6"
42+00
15'
43+00
1'-6"
22'
"1st long hill to old rochester rd"
LONG HILL RD TO OLD ROCH. RD (RELOCATED)
STA. 42+16.37
STA. 42+90
STA. 43+15
"Visitors parking only"

PLAN
SCALE: 1 INCH = 20 FT.

NO.	DATE	REVISION	DESIGNED: DAD/MLO	CHECKED: MF	APPROVED: MF
			DRAWN: DAD		

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CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

PAVEMENT MARKING & SIGNING LAYOUT
STATE PROJ. NO. 12644/12608
FED. PROJ. NO. STP-TE-X-6122(019)
FED. PROJ. NO. STP-X-0002(332)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	060172
DATE:	DWG.
JULY 2007	28

N.H. Route 108

PLAN

SCALE: 1 INCH = 20 FT.

NOTE: SEE ALSO TRAFFIC SIGNAL PLANS SHEET 31 AND 32 FOR SIGNS ATTACHED TO SIGNAL EQUIPMENT.

NO.	DATE:	REVISION	DESIGNED:	CHECKED:	APPROVED:
	DRAWN: DAD		DAD/ALD	ALF	ALF

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CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

PAVEMENT MARKING & SIGNING LAYOUT

STATE PROJ. NO. 12644/12800
FED. PROJ. NO. STP-TE-X-0122(010)
FED. PROJ. NO. STP-X-0005(222)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
JULY 2007	29

"Empire Beauty School"

"Middleton Building Supply"

MAGNETIC

(RELOCATE)
R1-1
STOP

SPEED LIMIT 30
(RELOCATE)

TO 108
(RELOCATE)

STA. 4+84

STA. 4+68

R = 45.25'

5'-7"
STA 67.55±
LT 88±

"speed limit 30" no trucks

Old Rochester Road

PROPOSED GRASS AREA

VARIES

PT = 4+24.80

COLD PLANE LIMITS (TYP.)

RELOCATE SIGN

Long Hill Road

4" SSL (W)

4" SSL (E)

4" SSL (S)

4" SSL (N)

R3-8 (25)
ONLY

PAVED PARKING

9'-0" (TYP.)

18'-0" (TYP.)

22'

25'

PC = 3+44.08

STA. 3+44

FIELD VERIFY LIMITS OF COLD PLANING. GRADE TO DRAIN.

asphalt parking

(RELOCATE)
ONLY

STA. 2+72

STA. 2+40

1 story conc blk

lawn

asphalt

MATCH LINE 9

MATCH LINE 7

COLD PLANE LIMITS

"NEXTEL" (RELOCATE)

R6-1R

R4-7

SPEED LIMIT 35
(RELOCATED FROM STA. 46+80, 29'L)

STOP

R3-8 (14)

(REMOVE)
CENTER LINE

PLAN

SCALE: 1 INCH = 20 FT.

NO.	DATE	REVISION	DESIGNED: DAD/MLD	CHECKED: MF	APPROVED: MF
			DRAWN: DAD		

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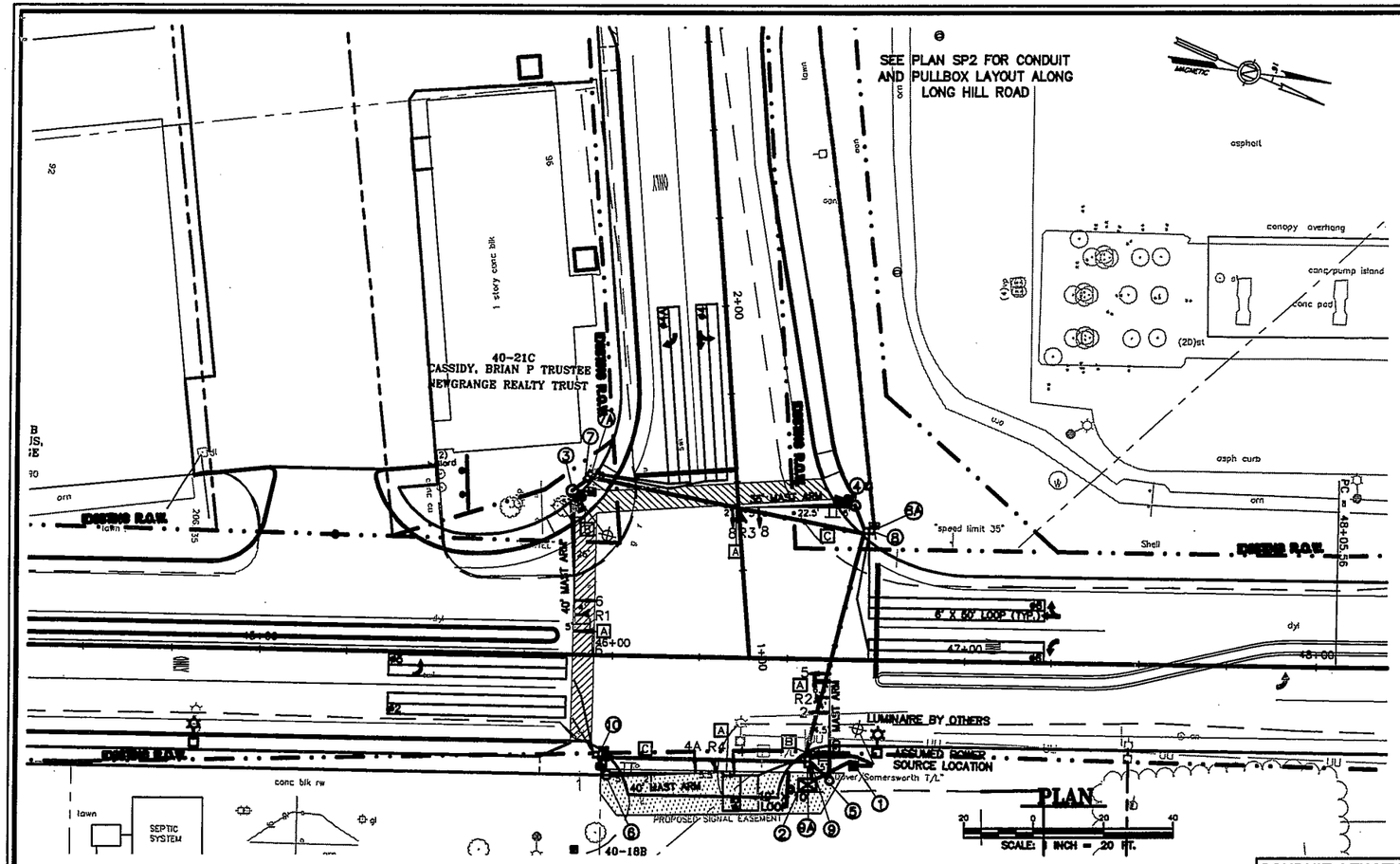
DOVER, NH 03820

PAVEMENT MARKING & SIGNING LAYOUT

STATE PROJ. NO. 13444/13808
FED. PROJ. NO. STP-TE-X-0120(010)
FED. PROJ. NO. STP-X-0003(232)

NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
AS NOTED	050172
DATE:	DWG.
JULY 2007	30



NOTES

1. DIGSAFE TO BE CONTACTED BEFORE COMMENCING ANY CONSTRUCTION, COORDINATION WITH UTILITY COMPANIES REQUIRED.
2. FOUNDATIONS FOR ALL SIGNAL POLES SHALL BE INSTALLED PER NHDOT STANDARD DETAILS.
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11. CONTRACTOR SHALL PROVIDE POLICE CONTROL FOR THE INTERSECTION DURING CONSTRUCTION.
12. EMERGENCY PRE-EMPTION SHALL OCCUR WITH ASSOCIATED PHASES AS FOLLOWS:
    PRE-EMPTION RECEIVER R1 CALLS PHASE 6
    PRE-EMPTION RECEIVER R2 CALLS PHASES 2+5
    PRE-EMPTION RECEIVER R3 CALLS PHASE 8
    PRE-EMPTION RECEIVER R4 CALLS PHASE 4

STANDARD NEMA SEQUENTIAL PHASING

ø2 & ø5 W/OVERLAP	ø2 & ø6 ø5 PERMITTED	ø4 & ø8	EXCLUSIVE PED ø*
ø4A OLA, ø5, ø2	ø5, ø6, ø2	ø4 & ø4A, ø8	

*UPON PUSHBUTTON ACTIVATION

PROPOSED SIGNAL HEADS

12" LED LENSES
5" (NOMINAL) BACKPLATES

R Y G — 2,4,6,8 | R Y G — 5 | R Y G — 4A

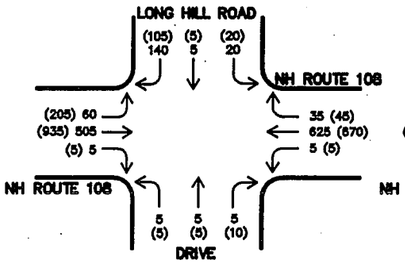
PROPOSED TRAFFIC SIGNS

LEFT TURN YIELD ON GREEN
24" X 30"
R10-12
A

LONG HILL RD
16" X 54"
WHITE ON GREEN
B

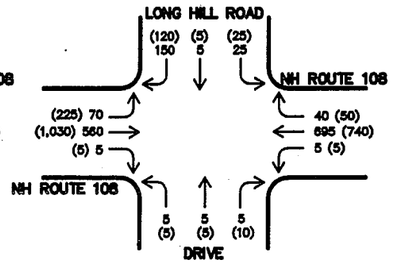
NH ROUTE 108
16" X 54"
WHITE ON GREEN
C

OPENING YEAR TRAFFIC VOLUMES



XXX – 2006 AM PEAK HOUR VOLUMES
(XXX) – 2006 PM PEAK HOUR VOLUMES

DESIGN YEAR TRAFFIC VOLUMES



XXX – 2016 AM PEAK HOUR VOLUMES
(XXX) – 2016 PM PEAK HOUR VOLUMES

CONDUIT LENGTHS (3" MIN.)

FROM	TO	SCHED. 40	SCHED. 80
POWER	①	TO BE DETERMINED IN FIELD BASED ON POWER SOURCE LOCATION	
POWER	9A	TO BE DETERMINED IN FIELD BASED ON POWER SOURCE LOCATION	
①	②	10'	
②	⑨	5'	
⑧	⑫	150'	
③	⑦ 7A	5'*	
④	⑧ 8A	5'	
⑤	⑨	5'	
⑥	⑩	5'	
⑦ 7A	⑧ 8A		86'*
⑧ 8A	⑨ 9A		72'*
⑨	⑩		65'
⑫	⑬		54'
⑬	⑭	154'	
⑭	⑮		114'

*2-DUCT CONDUIT RUN

FOUNDATIONS

LOC.	TYPE	STATION	OFFSET	NOTES
①	MP	46+70	30' RT	PROPOSED METER PEDESTAL
②	CC	46+56	36' RT	CONTROLLER CABINET ON CONCRETE FOUNDATION & EXTENSION W/PAD
③	MA	1+51	47' LT	SIGNAL POLE W/40' M.A. W/2 PED HEADS & PUSHBUTTON ASSEMBLY AND LUMINAIRE
④	MA	1+41	33' RT	SIGNAL POLE W/35' M.A. W/1 PED HEAD & PUSHBUTTON ASSEMBLY
⑤	MA	46+63	34' RT	SIGNAL POLE W/30' M.A.
⑥	MA	45+97	35' RT	SIGNAL POLE W/40' M.A. W/1 PED HEAD & PUSHBUTTON ASSEMBLY
⑦	PB	1+54	44' LT	PROPOSED CONCRETE PULLBOX, 14"
7A	PB	1+54	44' LT	PROPOSED MOLDED PULLBOX, 17"x30"
⑧	PB	1+33	36' RT	PROPOSED CONCRETE PULLBOX, 14"
8A	PB	1+33	36' RT	PROPOSED MOLDED PULLBOX, 17"x30"
⑨	PB	46+56	29' RT	PROPOSED CONCRETE PULLBOX, 14"
9A	PB	46+56	29' RT	PROPOSED MOLDED PULLBOX, 17"x30"
⑩	PB	45+96	28' RT	PROPOSED CONCRETE PULLBOX, 14"
⑫	PB	2+88	32' RT	PROPOSED CONCRETE PULLBOX, 14"
⑬	PB	3+35	28' RT	PROPOSED CONCRETE PULLBOX, 14"
⑭	PB	4+83	38' RT	PROPOSED CONCRETE PULLBOX, 14"
⑮	PB	4+59	68' LT	PROPOSED CONCRETE PULLBOX, 14"

LEGEND

PROPOSED		EXISTING
	SIGNAL CONDUIT	
	2-DUCT CONDUIT	
	JUNCTION BOX	
	CONTROLLER CABINET	
	PEDESTRIAN PUSH BUTTON	
	SIGNAL POLE (W/ PEDESTAL BASE)	
	SIGNAL HEAD	
	MAST ARM WITH SIGNAL STANDARD	
	PRE-EMPTION RECEIVERS	
	STROBE LIGHT	
	MOUNTED SIGN	
	LUMINAIRE	
	STANDARD QUADRUPOLE LOOP DETECTOR 2-4-2 TURNS	

SIGNAL PHASING

(ALL ENTRIES BELOW ARE IN SECONDS)

PHASE	ø2	ø4	ø5	ø6	ø8	PED
MIN. GREEN	10	5	5	10	5	–
PASSAGE	3	3	3	3	3	–
MAX. 1	60	15	15	60	15	–
MAX. 2	70	15	20	70	15	–
YELLOW	4	3	3	4	3	–
RED	2	2	2	2	2	–
RECALL	SOFT	NONE	NONE	SOFT	NONE	PED
WALK	–	–	–	–	–	7
CLEAR	–	–	–	–	–	17

USE MAX 2 DURING WEEKDAYS BETWEEN 3-6 PM. USE MAX 1 ALL OTHER TIMES.

PEDESTRIAN HEADS

NEW 12"LED FILLED SYMBOLIC, BIMODAL SIGNAL TO BE MOUNTED ON ③, ④ & ⑤ AT 7' HEIGHT FACING CROSSWALK

DETECTORS

STREET	DIRECTION	LANE	SIZE	AMPLIFIER NO.	AMPLIFIER CHAN.	INDUCT uH	RESIST. OF LOOP	RESIST. LOOP/GND MEG.	RESIST. SHIELD/GND MEG.
NH ROUTE 108	NB (ø2)	THRU/RIGHT	6'x50'	1	1				
LONG HILL ROAD	EB (ø4)	LEFT/THRU	6'x50'	2	1				
LONG HILL ROAD	EB (ø4)	RIGHT	6'x50'	2	2				
NH ROUTE 108	NB (ø5)	LEFT	6'x50'	1	2				
NH ROUTE 108	SB (ø6)	LEFT	6'x50'	3	1				
NH ROUTE 108	SB (ø6)	THRU/RIGHT	6'x50'	3	2				
DRIVEWAY	WB (ø8)	LEFT/THRU/RIGHT	10'x10'	4	1				

RECORD FIELD MEASUREMENTS ABOVE

NO.	DATE	REVISION	DESIGNED: RAB	CHECKED: PJK	APPROVED: JF
			DRAWN: RAB		

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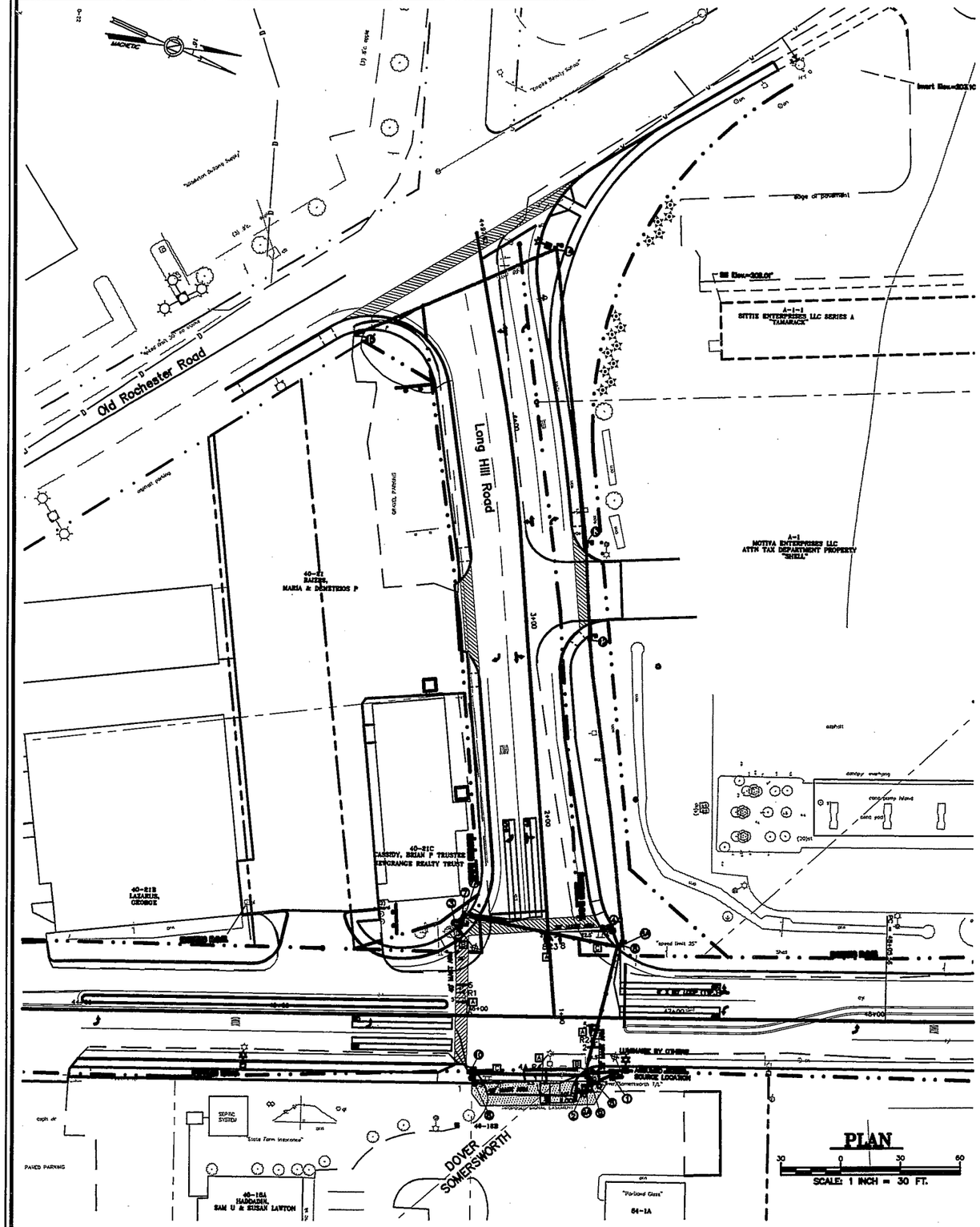
CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

TRAFFIC SIGNAL PLAN

STATE PROJ. NO. 12644/12606
FED. PROJ. NO. STP-TE-X-0120(019)
FED. PROJ. NO. STP-X-0025(022)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 20'	050172
DATE: JULY 2007	DWG. 31



NOTES

1. DIGSAFE TO BE CONTACTED BEFORE COMMENCING ANY CONSTRUCTION, COORDINATION WITH UTILITY COMPANIES REQUIRED.
2. FOUNDATIONS FOR ALL SIGNAL POLES SHALL BE INSTALLED PER NHDOT STANDARD DETAILS.
3. ALL SIGNAL EQUIPMENT SHALL BE INSTALLED PER **MUTCD 2003 EDITION** STANDARDS AND THE NH STANDARD SPECIFICATIONS 2006, OR AS AMENDED IN THE SPECIAL PROVISIONS.
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7. THE CONTRACTOR SHALL COORDINATE ALL SIGNALIZATION WORK WITH THE NEW HAMPSHIRE DEPARTMENT OF TRANSPORTATION AND THE CITY OF DOVER DPW.
8. SIGNAL TIMING IS PRELIMINARY AND IS TO BE ADJUSTED AS NECESSARY IN THE FIELD IN CONSULTATION WITH THE ENGINEER.
9. MISCELLANEOUS WIRE, DUCT, CABLE, LABOR AND EQUIPMENT (NOT SHOWN) NECESSARY TO COMPLETE THE INSTALLATION AND PROVIDE AN OPERATING TRAFFIC CONTROL SIGNAL, AS SHOWN, ARE REQUIRED (PAYMENT TO BE INCIDENTAL TO ITEM 616.1).
10. ALL LOOP WIRES TO BE BROUGHT BACK TO THE CONTROLLER ON SEPARATE LEAD-IN CABLES. LOOP WIRES SHALL BE INSTALLED AFTER MILLING OPERATIONS AND PRIOR TO WEARING COURSE AND/OR OVERLAY.
11. CONTRACTOR SHALL PROVIDE POLICE CONTROL FOR THE INTERSECTION DURING CONSTRUCTION.
12. EMERGENCY PRE-EMPTION SHALL OCCUR WITH ASSOCIATED PHASES AS FOLLOWS:
    PRE-EMPTION RECEIVER R1 CALLS PHASE 6
    PRE-EMPTION RECEIVER R2 CALLS PHASES 2+5
    PRE-EMPTION RECEIVER R3 CALLS PHASE 8
    PRE-EMPTION RECEIVER R4 CALLS PHASE 4
13. CONDUIT RUNS 2-12, 12-13, AND 13-14 ARE FOR FUTURE SIGNAL INTERCONNECT CABLE.

LEGEND

PROPOSED		EXISTING
	SIGNAL CONDUIT	
	2-DUCT CONDUIT	
	JUNCTION BOX	
	CONTROLLER CABINET	
	PEDESTRIAN PUSH BUTTON	
	SIGNAL POLE (W/ PEDESTAL BASE)	
	SIGNAL HEAD	
	MAST ARM WITH SIGNAL STANDARD	
	PRE-EMPTION RECEIVERS	
	STROBE LIGHT	
	MOUNTED SIGN	
	LUMINAIRE	
	STANDARD QUADRUPOLE LOOP DETECTOR 2-4-2 TURNS	

CONDUIT LENGTHS (3" MIN.)

FROM	TO	SCHED. 40	SCHED. 80
POWER	①	TO BE DETERMINED IN FIELD BASED ON POWER SOURCE LOCATION	
POWER	9A	TO BE DETERMINED IN FIELD BASED ON POWER SOURCE LOCATION	
①	②	10'	
②	⑨	5'	
⑧	⑫	150'	
③	7/7A	5'*	
④	8/8A	8'	
⑤	⑨	8'	
⑥	⑩	5'	
7/7A	8/8A		86'*
8/8A	9/9A		72'*
⑨	⑩		85'
⑫	⑬		54'
⑬	⑭	154'	
⑭	⑮		114'

*2-DUCT CONDUIT RUN

FOUNDATIONS

FOUNDATION LOC.	TYPE	STATION	OFFSET	NOTES
①	MP	46+70	30' RT	PROPOSED METER PEDESTAL
②	CC	46+56	36' RT	CONTROLLER CABINET ON CONCRETE FOUNDATION & EXTENSION W/PAD
③	MA	1+51	47' LT	SIGNAL POLE W/40' M.A. W/2 PED HEADS & PUSHBUTTON ASSEMBLY AND LUMINAIRE
④	MA	1+41	33' RT	SIGNAL POLE W/35' M.A. W/1 PED HEAD & PUSHBUTTON ASSEMBLY
⑤	MA	46+63	34' RT	SIGNAL POLE W/30' M.A.
⑥	MA	45+97	35' RT	SIGNAL POLE W/40' M.A. W/1 PED HEAD & PUSHBUTTON ASSEMBLY
⑦	PB	1+54	44' LT	PROPOSED CONCRETE PULLBOX, 14"
7A	PB	1+54	44' LT	PROPOSED MOLDED PULLBOX, 17"x30"
⑧	PB	1+33	36' RT	PROPOSED CONCRETE PULLBOX, 14"
8A	PB	1+33	36' RT	PROPOSED MOLDED PULLBOX, 17"x30"
⑨	PB	46+56	29' RT	PROPOSED CONCRETE PULLBOX, 14"
9A	PB	46+56	29' RT	PROPOSED MOLDED PULLBOX, 17"x30"
⑩	PB	45+96	28' RT	PROPOSED CONCRETE PULLBOX, 14"
⑫	PB	2+88	32' RT	PROPOSED CONCRETE PULLBOX, 14"
⑬	PB	3+35	28' RT	PROPOSED CONCRETE PULLBOX, 14"
⑭	PB	4+83	38' RT	PROPOSED CONCRETE PULLBOX, 14"
⑮	PB	4+59	68' LT	PROPOSED CONCRETE PULLBOX, 14"

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
	DRAWN: RLP		RLP	PK	

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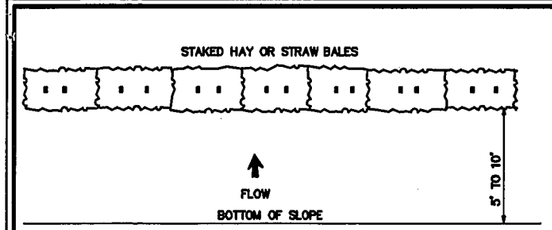
DOVER, NH 03820

TRAFFIC SIGNAL PLAN

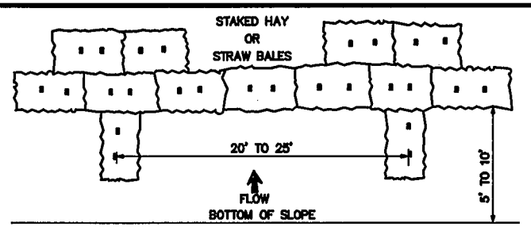
STATE PROJ. NO. 12844/12808
FED. PROJ. NO. STP-TE-X-0120(010)
FED. PROJ. NO. STP-X-0005(202)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 30'	050172
DATE: JULY 2007	DWG. 32



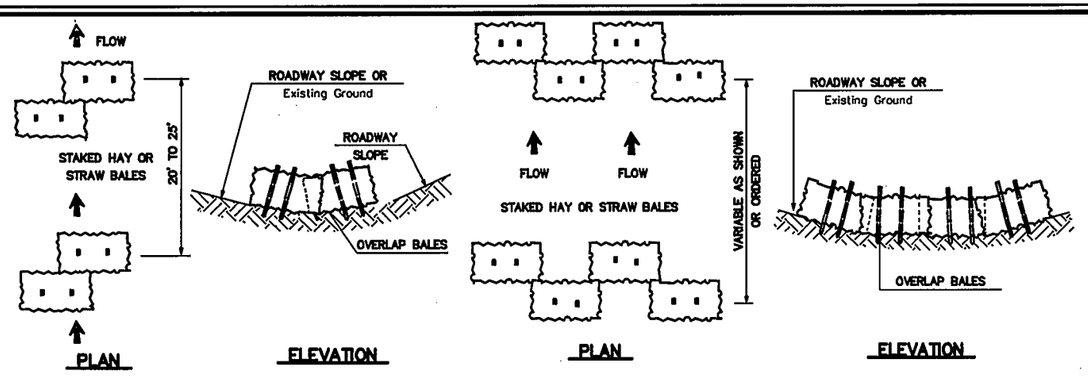
NOTE: USE AT BOTTOM OF FILL SLOPE.

EROSION PROTECTION TYPE A



NOTE: USE AT BOTTOM OF FILL SLOPE WHERE HEAVY FLOW MAY BE ANTICIPATED.

EROSION PROTECTION TYPE B

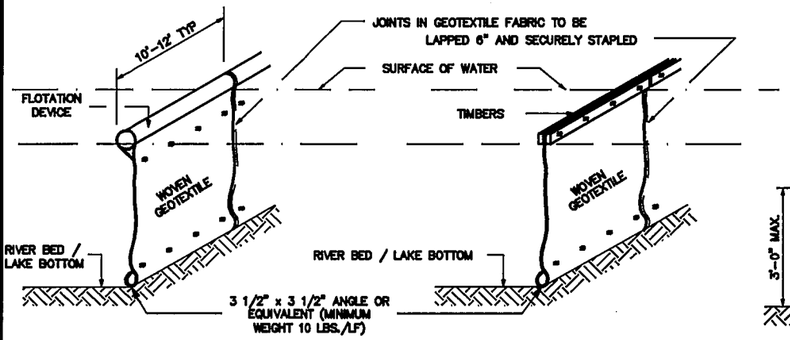


NOTE: USE IN NARROW DITCH SECTION.

NOTE: USE IN WIDE DITCH SECTION.

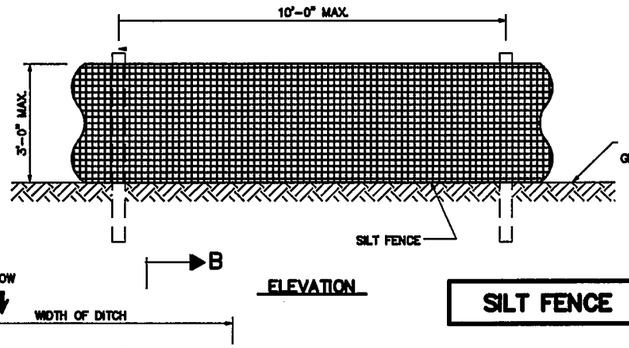
EROSION PROTECTION TYPE C

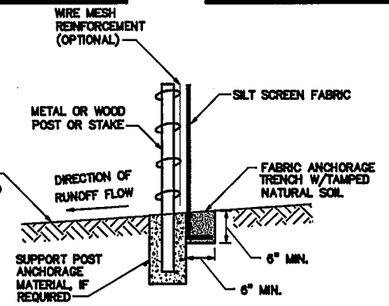
EROSION PROTECTION TYPE D



NOTE: THESE ARE SUGGESTED CONSTRUCTION METHODS. ACTUAL METHOD TO BE APPROVED BY THE ENGINEER.

SILT SCREEN

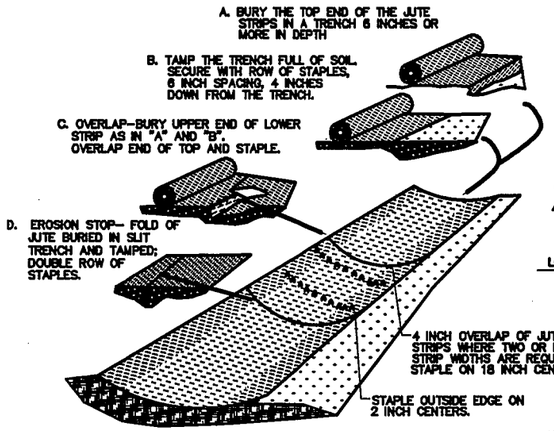




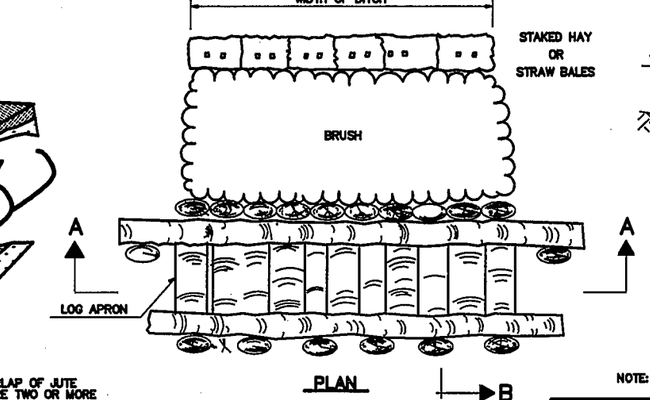
SILT FENCE

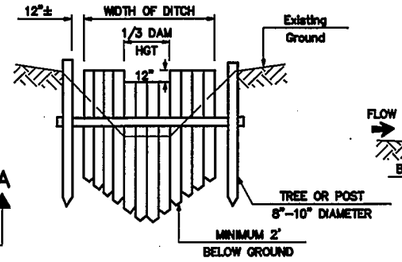
GENERAL NOTES

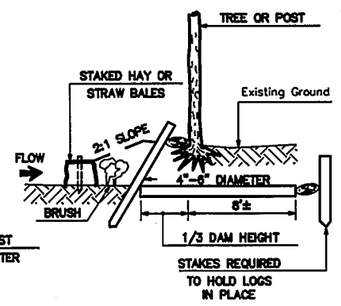
1. ALL WORK ASSOCIATED WITH TEMPORARY EROSION CONTROL, EXCEPT THAT DESCRIBED IN 699.5.2 AND IN NOTES NO. 2 & 5 (BELOW), WILL BE PAID FOR UNDER ITEM 699. – TEMPORARY PROJECT WATER POLLUTION CONTROL.
2. BALED HAY AND STRAW WILL BE PAID FOR UNDER ITEM 699. STAKES TO HOLD BALES SHALL BE 1"X1" OF EQUIVALENT SAPLINGS, AND SHALL BE LONG ENOUGH TO EXTEND 1 FOOT MINIMUM INTO THE GROUND. STAKES WILL BE SUBSIDIARY TO ITEM 699.
3. BALES SHALL BE SET 3 INCHES ± BELOW THE GROUND SURFACE OR AS ORDERED. ANY REQUIRED EXCAVATION TO SET BALES WILL BE SUBSIDIARY.
4. HAY BALES WILL BE ALLOWED TO ROT IN PLACE EXCEPT IN HIGHLY VISIBLE AREAS WHERE THE ENGINEER MAY ORDER REMOVAL. (SUBSID.)
5. SILT FENCE SHALL CONSIST OF AN APPROVED PREFABRICATED SILT FENCE WITH FABRIC ATTACHED TO POSTS AND SHALL BE ASSEMBLED IN THE FIELD ACCORDING TO THE MANUFACTURER'S INSTRUCTIONS. WIRE MESH REINFORCEMENT AND/OR CLOSER POST SPACING MAY BE ORDERED BY THE ENGINEER IN AREAS WHERE HIGH RUNOFF VOLUMES ARE ANTICIPATED, OR IN LOW SPOTS WHERE SEDIMENT WILL BE COLLECTED. SILT FENCE WILL BE PAID FOR UNDER ITEM 699.
6. PRIOR TO BEGINING EARTHWORK OPERATIONS AT LOCATIONS DIRECTED BY THE ENGINEER, SILT FENCE SHALL BE CONSTRUCTED ALONG THE TOE OF PROPOSED EMBANKMENT SLOPES AT THE LIMITS OF CLEARING.



JUTE MATTING DETAIL

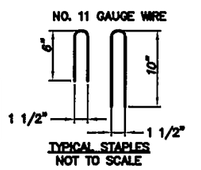


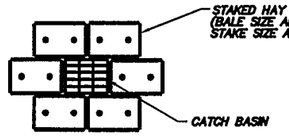




NOTE: USE IN OR JUST UPSTREAM OF WATER COURSE.

EROSION PROTECTION TYPE E

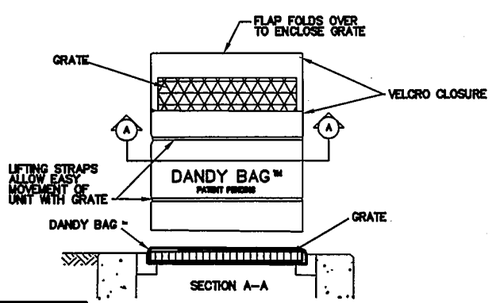




EROSION PROTECTION – CATCH BASINS AT LOW POINTS

INSTALLATION:
STAND GRATE ON END. PLACE DANDY BAG OVER GRATE. ROLL GRATE OVER SO THAT OPEN END IS UP. PULL UP BACK FLAP. PULL IN FREE VELCRO STRIPS TOGETHER. BE SURE END OF GRATE IS COMPLETELY COVERED BY FLAP OR DANDY BAG WILL NOT WORK PROPERLY. HOLDING HANDLES, CAREFULLY PLACE DANDY BAG WITH GRATE INSERTED INTO CATCH BASIN FRAME.

MAINTENANCE:
WITH A STIFF BRISTLE BROOM OR SQUARE POINT SHOVEL REMOVE SILT & OTHER DEBRIS OFF SURFACE AFTER EACH EVENT. REMOVE FINE MATERIAL FROM INSIDE ENVELOPE AS NEEDED.
(CONTACT DANDY PRODUCTS INC. 1-800-591-2284)



DANDY BAG

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			DAD/ALO	ALF	ALF

DRAWN: DAD

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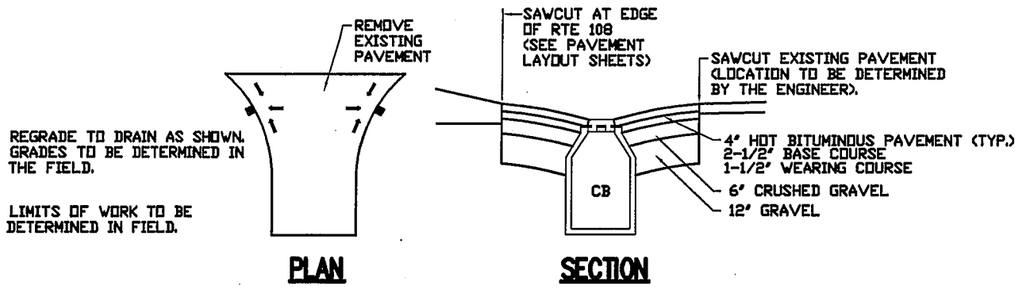
cle@cleengineers.com · www.cleengineers.com
Maine • New Hampshire • Vermont

CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

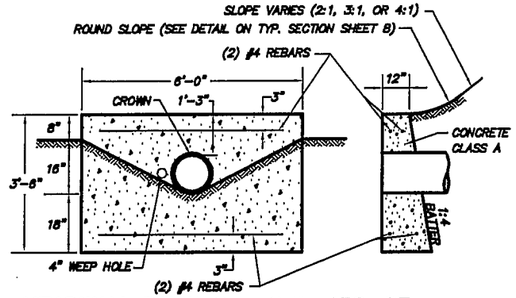
EROSION CONTROL MEASURES
STATE PROJ. NO. 13944/13938
FED. PROJ. NO. STP-T-X-0202(000)
FED. PROJ. NO. STP-X-0202(000)
NEW ROCHESTER RD/ LONG HILL RD.
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
N.T.S.	050172
DATE:	DWG.
JULY 2007	33



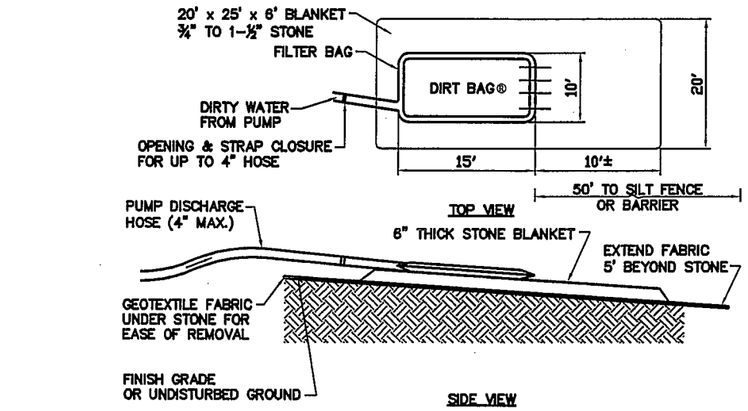
TYPICAL SIDESTREET RECONSTRUCTION

NOT TO SCALE



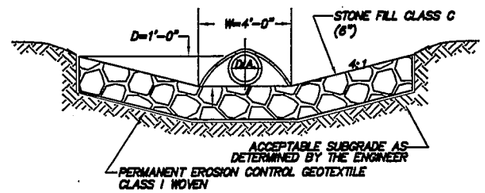
HEADWALL DETAILS - STA. 130+03

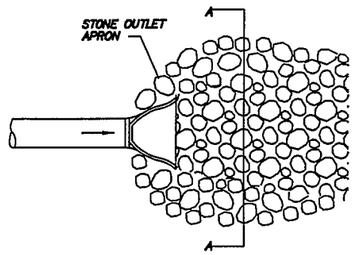
(SEE DRAINAGE NOTE 1, SHEET 10) N.T.S.



PUMPED DISCHARGE SEDIMENT CONTROL DEVICE ("DIRT BAG")

N.T.S.





PIPE OUTLET TO DEFINED CHANNEL

N.T.S.

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			RMM	JF	JF

DRAWN: DAD

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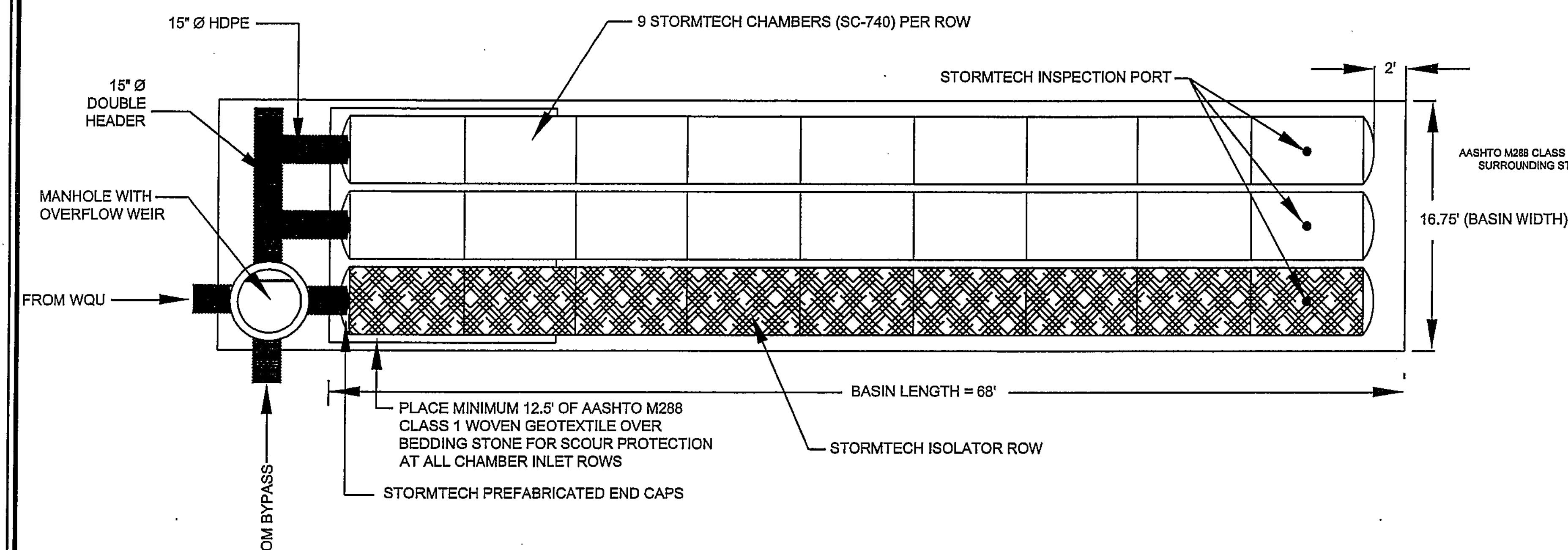
CITY HALL
DOVER, NH 03820

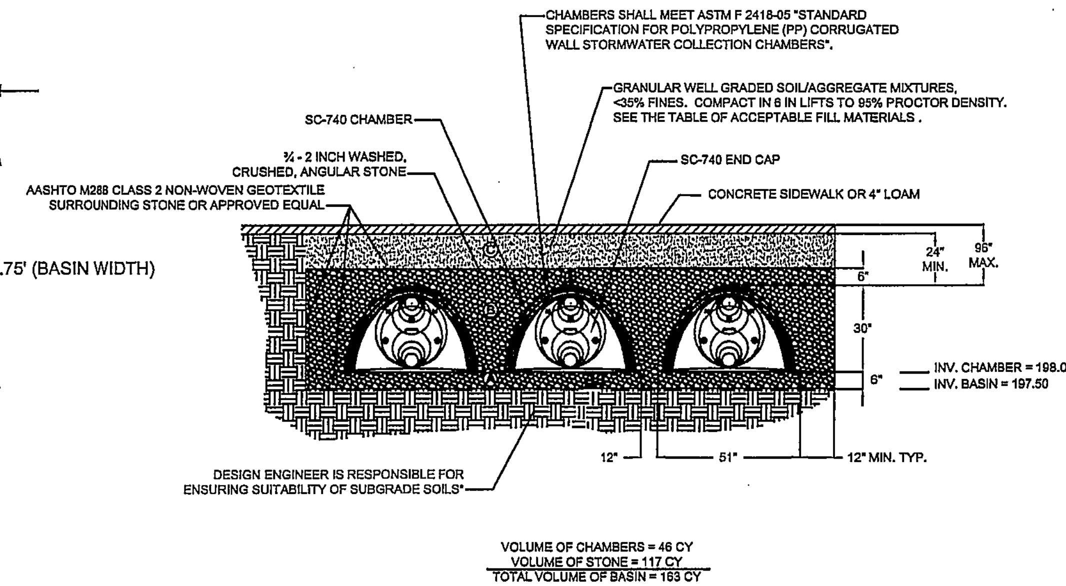
DRAINAGE DETAILS

STATE PROJ. NO. 13944/13909
FED. PROJ. NO. STP-E-X-X(XXX)
FED. PROJ. NO. STP-X-XXXX(XXX)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

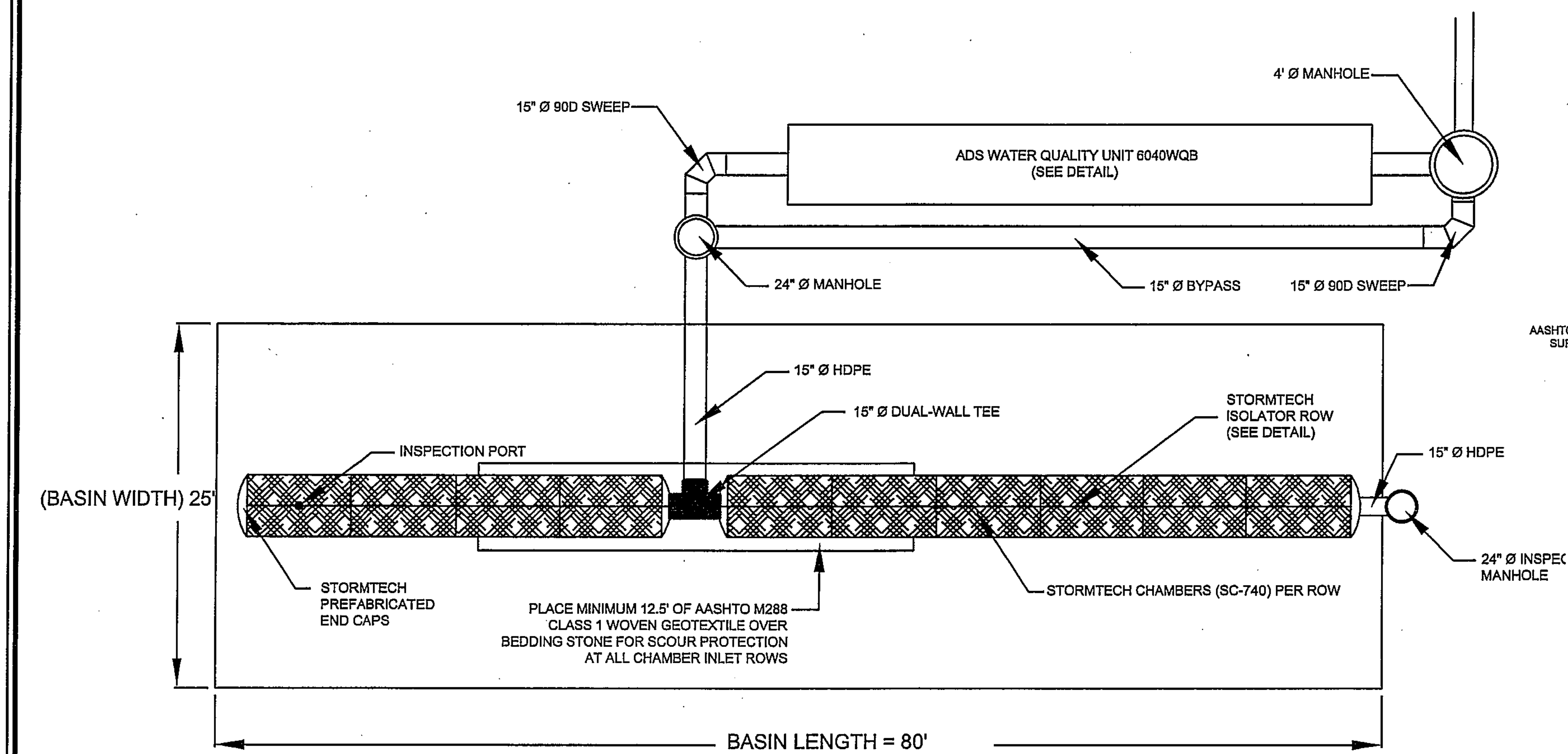
SCALE:	JOB NO.
NTS	060172
DATE:	DWG.
DEC 2007	34



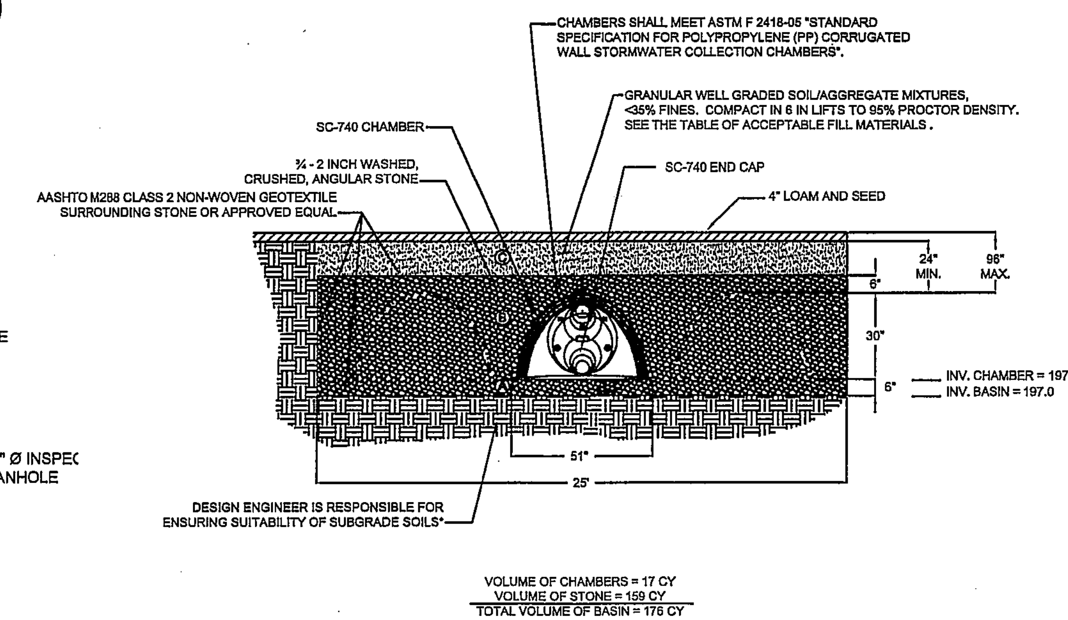
TAMARACK INFILTRATION BASIN



TAMARACK INFILTRATION BASIN
CROSS SECTION



WINCHESTER ARMS INFILTRATION BASIN
PLAN VIEW



WINCHESTER ARMS INFILTRATION BASIN
CROSS SECTION

NO.	DATE	REVISION

DRAWN: DAD | DESIGNED: RMM | CHECKED: JLF | APPROVED: JLF

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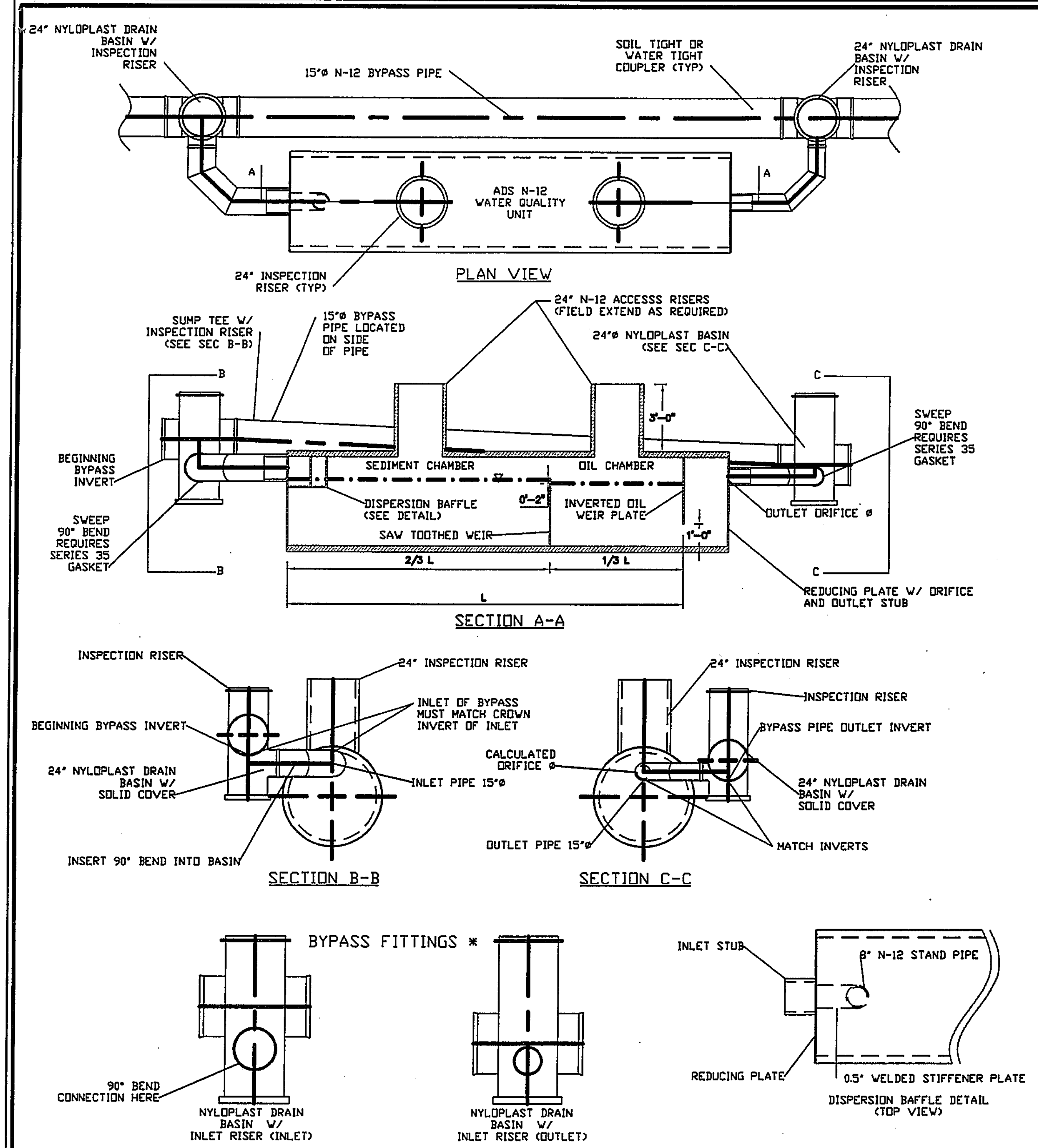
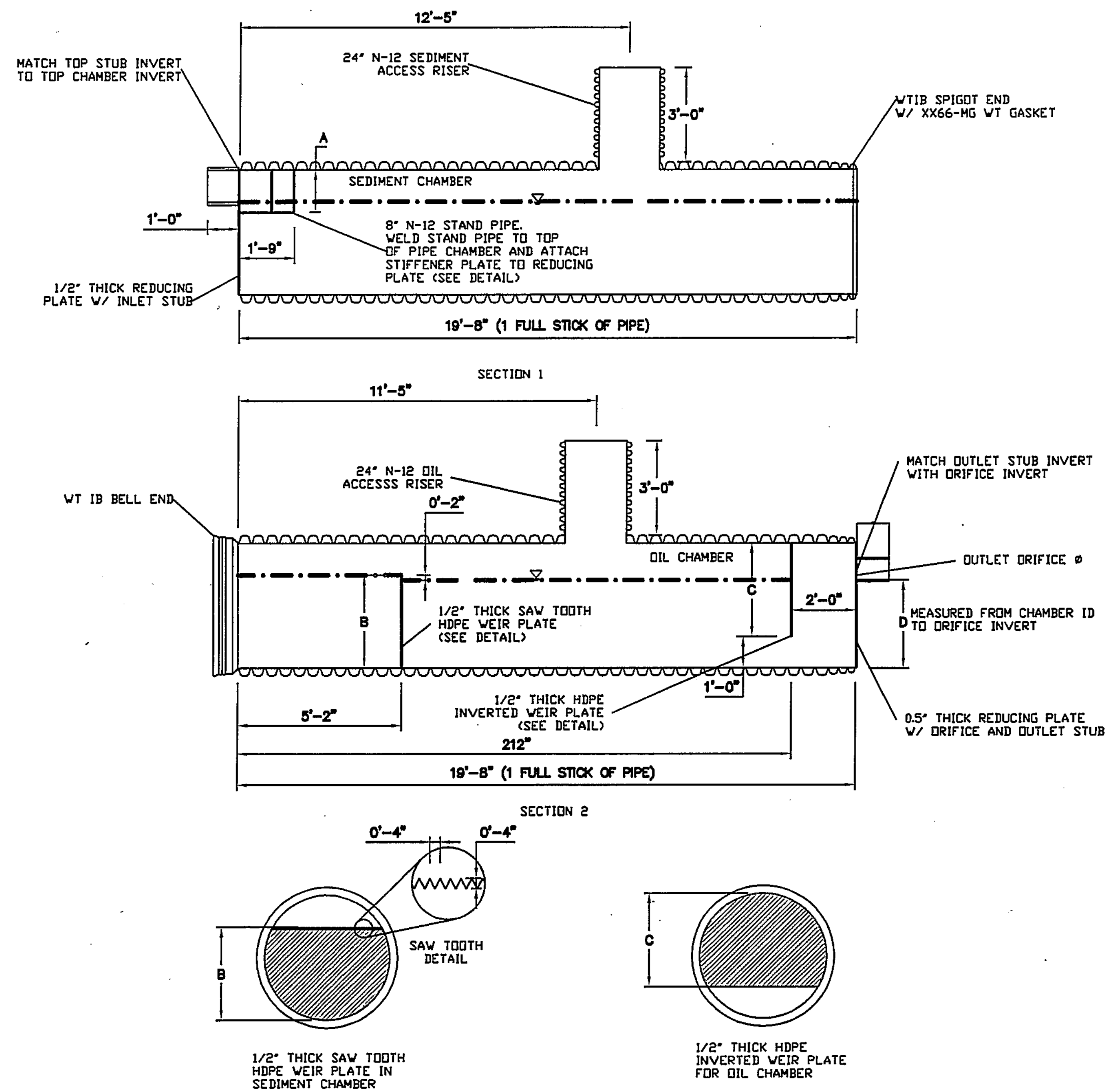
DRAINAGE DETAILS
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
NTS	060172
DATE:	DWG.
DEC 2007	35



(*) FITTING DIMENSIONS VARY WITH UNIT DESIGN, DIMENSIONS CAN BE PROVIDED ONCE DESIGN IS EVALUATED.

ADS HDPE WATER QUALITY UNIT
(NYLOPLAST INLET / NYLOPLAST OUTLET)



ADS MODEL #	MAIN PIPE DIA.	INLET STUB DIA.	OUTLET STUB DIA.	ORIFICE DIA.	A	B	C	D
6040WQBXX	60"	15"	10"	8.65"	18.9"	44.5"	47.5"	42.5"

40' ADS WATER QUALITY UNIT STANDARD FAB DETAIL

NOTES:

1. THE UNIT WILL BE SHIPPED IN TWO SECTIONS AS SHOWN ABOVE AND WILL BE REQUIRED TO BE CONNECTED IN THE FIELD. PROPERLY LUBE THE BELL AND SPIGOT GASKET PRIOR TO ASSEMBLY
2. ALL DIMENSIONS ARE NOMINAL.
3. ALL FITTING CONNECTIONS WILL BE MADE USING A STANDARD BELL/BELL OR SPLIT COUPLER.
4. ALL WATER QUALITY UNITS ARE PRODUCT # 6040WQB15.
5. WATER QUALITY UNITS SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE SPECIFICATIONS DEFINED IN THE ADS WATER QUALITY UNIT INSTALLATION GUIDE. SEE INSTALLATION GUIDE FOR PROPER BACKFILL MATERIAL AND DEPTHS, TRENCH CONSTRUCTION AND CONFIGURATION.
6. ADDITIONAL ANCHORING SHALL BE PROVIDED AS NEEDED TO AVOID PIPE FLOTATION.

NO.	DATE	REVISION

DRAWN: DAD | DESIGNED: DMM | CHECKED: JLF | APPROVED: JLF

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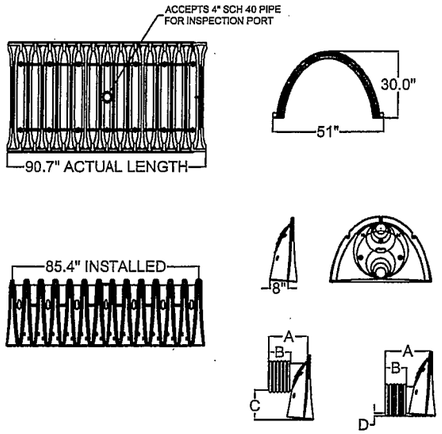
DRAINAGE DETAILS
STATE PROJ. NO. [illegible]
FED. PROJ. NO. STP-X-[illegible]
FED. PROJ. NO. STP-X-[illegible]
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
NTS	050172
DATE:	DWG.
DEC 2007	36



NOMINAL CHAMBER SPECIFICATIONS

SIZE (W x H x INSTALLED LENGTH) -	51.0" x 30.0" x 85.4"
CHAMBER STORAGE -	45.9 CUBIC FEET
MINIMUM INSTALLED STORAGE -	74.9 CUBIC FEET
WEIGHT -	75 LBS.

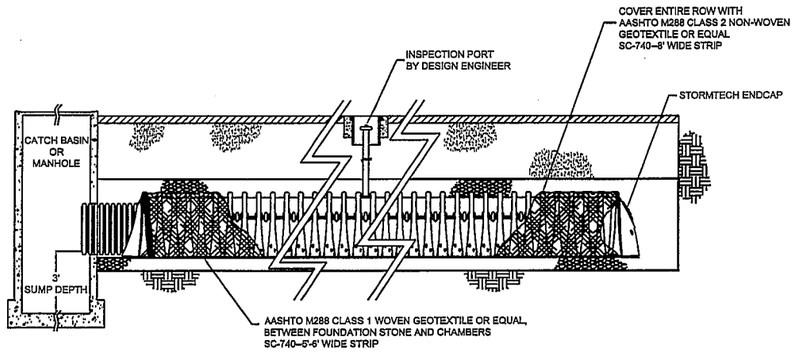
PART #	CHAMBER	PIPE SIZE	A	B	C	D
			STUBS AT TOP OF END CAP FOR PARTS NUMBERS ENDING WITH "T"		STUBS AT BOTTOM OF END CAP FOR PARTS NUMBERS ENDING WITH "B"	
SC740EPE15T	SC 740	15 in (375 mm)	18.40 in (467 mm)	10.36 in (263 mm)	9.00 in (229 mm)	N/A
SC740EPE15B	SC 740	15 in (375 mm)	18.40 in (467 mm)	10.36 in (263 mm)	N/A	1.30 in (33 mm)

NOTE: ALL DIMENSIONS ARE NOMINAL

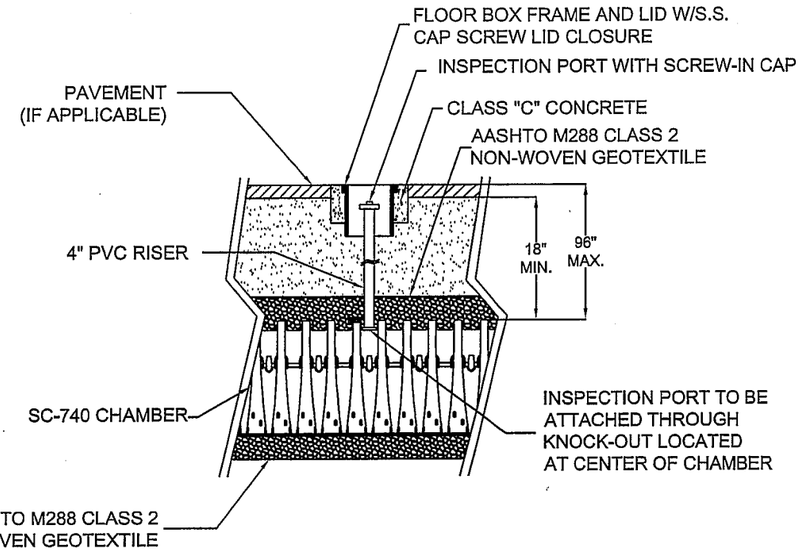
ALL STUBS, EXCEPT FOR THE SC740EPE24B ARE PLACED AT BOTTOM OF END CAP SUCH THAT THE OUTSIDE DIAMETER OF THE STUB IS FLUSH WITH THE BOTTOM OF THE END CAP. FOR ADDITIONAL INFORMATION CONTACT STORMTECH AT 1-888-892-2694.

* FOR THE SC740EPE24B THE 24" STUB LIES BELOW THE BOTTOM OF THE END CAP APPROXIMATELY 1.75". BACKFILL MATERIAL SHOULD BE REMOVED FROM BELOW THE N-12 STUB SO THAT THE FITTING SETS LEVEL.

SC-740 CHAMBER DETAIL



STORMTECH ISOLATOR ROW DETAIL



STORMTECH INSPECTION PORT DETAIL

MATERIAL LOCATION	DESCRIPTION	AASHTO M43 DESIGNATION	AASHTO M145 DESIGNATION	COMPACTION/DENSITY REQUIREMENT
FILL MATERIAL FROM 18" TO GRADE ABOVE CHAMBERS	ANY SOIL/ROCK MATERIALS, NATIVE SOILS OR PER ENGINEER'S PLANS. CHECK PLANS FOR PAVEMENT SUBGRADE REQUIREMENTS.	N/A	N/A	PREPARE PER ENGINEER'S PLANS. PAVED INSTALLATIONS MAY HAVE STRINGENT MATERIAL AND PREPARATION REQUIREMENTS.
(C) FILL MATERIAL FOR 6" TO 18" ELEVATION ABOVE CHAMBERS (24" FOR UNPAVED INSTALLATIONS)	GRANULAR WELL-GRADED SOIL/AGGREGATE MIXTURES, <35% FINES.	3, 357, 4, 467, 5, 56, 57, 6, 67, 68, 7, 78, 8, 89, 9, 10	A-1 A-2 A-3	COMPACT IN 6" LIFTS TO A MINIMUM 95% STANDARD PROCTOR DENSITY. ROLLER GROSS VEHICLE WEIGHT NOT TO EXCEED 12,000 LBS. DYNAMIC FORCE NOT TO EXCEED 20,000 LBS.
(B) EMBEDMENT STONE SURROUNDING AND TO A 6" ELEVATION ABOVE CHAMBERS	WASHED ANGULAR STONE WITH THE MAJORITY OF PARTICLES BETWEEN ¾ - 2 INCH	3, 357, 4, 467, 5, 56, 57	N/A	NO COMPACTION REQUIRED
(A) FOUNDATION STONE BELOW CHAMBERS	WASHED ANGULAR STONE WITH THE MAJORITY OF PARTICLES BETWEEN ¾ - 2 INCH	3, 357, 4, 467, 5, 56, 57	N/A	PLATE COMPACT OR ROLL TO ACHIEVE A 95% STANDARD PROCTOR DENSITY

PLEASE NOTE: THE LISTED AASHTO DESIGNATIONS ARE FOR GRADATIONS ONLY. THE STONE MUST ALSO BE WASHED CRUSHED ANGULAR. FOR EXAMPLE, THE STONE MUST BE SPECIFIED AS WASHED, CRUSHED, ANGULAR NO. 4 STONE.

STORMTECH ACCEPTABLE FILL MATERIALS

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
				MF	MF
			DRAWN: DMD		

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DRAINAGE DETAILS
STATE PROJ. NO. 12644/13000
FED. PROJ. NO. STP-E-X-X020(XXX)
FED. PROJ. NO. STP-X-XXXX(XXX)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
NTS	050172
DATE: DEC 2007	DWG. 37

ITEM NO.	IDENT. NO.	SIGN SIZE		TEXT	TEXT DIMENSIONS						NO. SIGNS REQ'D	SIGN AREA (SQ. FT.)		REMARKS
		HEIGHT	WIDTH		LETTER HEIGHT UC	LC	CAPS	RTE.MKR. OR SHIELD	ARROW	NUMERAL		NOM. AREA	TOTAL AREA	
615.06	R3-2	24"	24"								1	4.00	4.00	RED & BLACK/WHITE MOUNT BELOW R6-1R
615.06	R3-4	24"	24"								2	4.00	8.00	RED & BLACK/WHITE MOUNT ON REVERSE OF R4-7
615.03	R3-8 (25)	30"	36"	ONLY			4D				1	7.50	7.50	BLACK ON WHITE 1 ALUM. POST
615.03	R3-8 (14)	30"	36"	ONLY			4D				2	7.50	15.00	BLACK ON WHITE 1 ALUM. POST
615.03	R4-7	30"	24"								2	5.00	15.00	BLACK/WHITE
615.03	R6-1(R)	12"	36"	ONE WAY			4D				1	3.00	3.00	BLACK ON WHITE WITH BLACK BACKGROUND
615.06	R10-12	30"	24"								4	5.00	20.00	BLACK ON WHITE WITH SYMBOLIC GREEN BALL MOUNT ON MAST ARM
615.05	D3-1	16"	54"	LONG HILL RD			12"				2	6.00	12.00	WHITE ON GREEN MOUNT ON MAST ARM
615.05	D3-1	16"	54"	NH ROUTE 108			12"				2	6.00	12.00	WHITE ON GREEN MOUNT ON MAST ARM
615.06	R10-3B	9"	12"	PUSH							3	0.75	2.25	MOUNT ABOVE PEDESTRIAN PUSH BUTTONS

ITEM NO.	IDENT. NO.	SIGN SIZE		TEXT	TEXT DIMENSIONS						NO. SIGNS REQ'D	SIGN AREA (SQ. FT.)		REMARKS
		HEIGHT	WIDTH		LETTER HEIGHT UC	LC	CAPS	RTE.MKR. OR SHIELD	ARROW	NUMERAL		NOM. AREA	TOTAL AREA	
615.06	OM1-3	18"	18"								2	2.25	4.50	YELLOW TYPE III MOUNT BELOW R4-7

GENERAL NOTES

1. REFER TO THE 2006 STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION PUBLISHED BY THE NHDOT.
2. NOTE NEW REFLECTIVITY REQUIREMENTS IN THE 2006 STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION SECTION 718 PUBLISHED BY THE NHDOT.
3. REFER TO THE LATEST EDITION OF THE STANDARD PLANS FOR ROAD AND BRIDGE CONSTRUCTION AS PUBLISHED BY THE NHDOT FOR EXACT DETAILS OF PERMANENT SIGNING STANDARDS AND NHDOT SPECIFIC SIGNS.
4. REFER TO THE LATEST EDITION OF THE STANDARD HIGHWAY SIGNS MANUAL AS PUBLISHED BY THE USDOT--FHWA FOR EXACT DETAILS OF BORDERS, ETC.

NO. | DATE | REVISION | DESIGNED: DAD/RMM | CHECKED: MF | APPROVED: MF

DRAWN: DAD

CLD CONSULTING ENGINEERS, Inc.
Path Place Corporate Center
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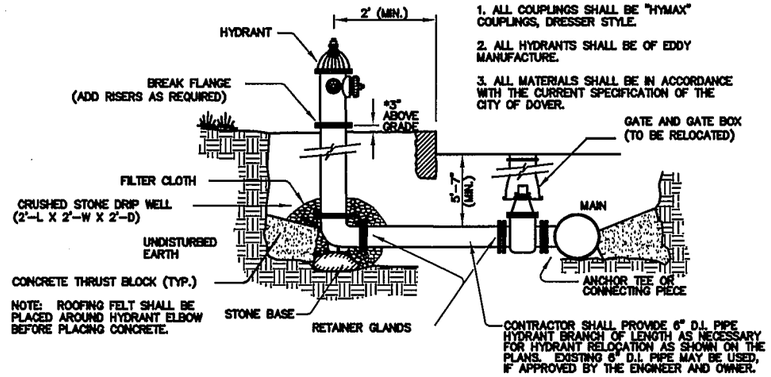
Maine • New Hampshire • Vermont

CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

SIGN TEXT LAYOUT

STATE PROJ. NO. 13544/13508
FED. PROJ. NO. STP-TE-X-6125(019)
FED. PROJ. NO. STP-X-0003(202)
NEW ROCHESTER RD / LONG HILL RD
DOVER, NEW HAMPSHIRE

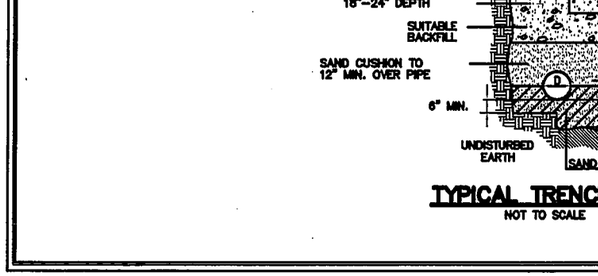
SCALE:	JOB NO.
NTS	050172
DATE: DEC 2007	DWG. 38



1. ALL COUPLINGS SHALL BE "HYMAX" COUPLINGS, DRESSER STYLE.
2. ALL HYDRANTS SHALL BE OF EDDY MANUFACTURE.
3. ALL MATERIALS SHALL BE IN ACCORDANCE WITH THE CURRENT SPECIFICATION OF THE CITY OF DOVER.

TYPICAL HYDRANT INSTALLATION

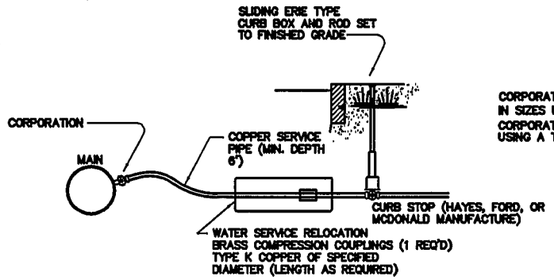
NOT TO SCALE



1. MATERIALS SHALL BE IN ACCORDANCE WITH THE CURRENT SPECIFICATIONS OF THE CITY OF DOVER.
2. CONTRACTOR SHALL REMOVE AND LEGALLY DISPOSE OF EXISTING WATERLINE MATERIALS (SUBSID.).
3. ALL EXCAVATION, BACKFILL, PIPE BEDDING, COUPLINGS, TIE RODS, BENDS, AND GLANDS SHALL BE SUBSIDIARY TO PIPE ITEMS FOR SPECIFIED DIAMETER.
4. "HYMAX" DRESSER STYLE COUPLINGS SHALL BE USED.

WATER MAIN ADJUSTMENT DETAIL

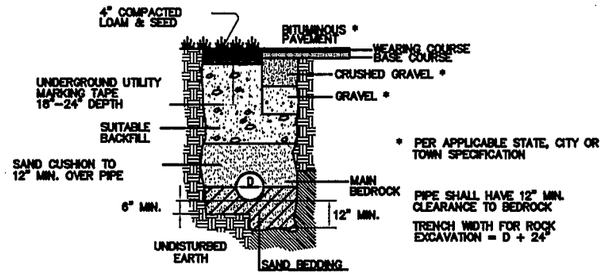
NOT TO SCALE



CORPORATIONS SHALL BE TAPPED DIRECTLY TO THE MAIN IN SIZES UP TO 1" ø (INCLUSIVE).
CORPORATIONS 1¼" ø AND GREATER SHALL BE INSTALLED USING A TAPPING SADDLE AND SHELL CUTTER

TYPICAL SERVICE CONNECTION

NOT TO SCALE



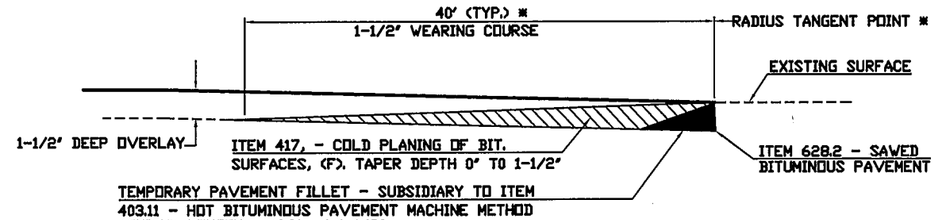
* PER APPLICABLE STATE, CITY OR TOWN SPECIFICATION

PIPE SHALL HAVE 12" MIN. CLEARANCE TO BEDROCK

TRENCH WIDTH FOR ROCK EXCAVATION = D + 24"

TYPICAL TRENCH DETAIL

NOT TO SCALE

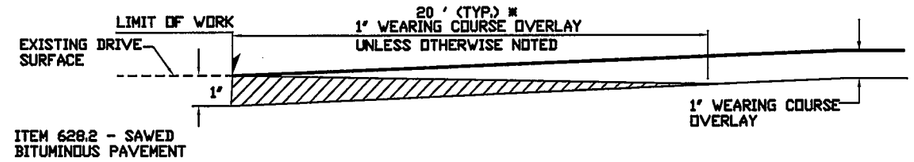


NOTE: * THE LENGTH OF THE TAPER MAY BE ADJUSTED AS ORDERED TO PROVIDE FOR VARYING FIELD CONDITIONS OR CHANGES IN SINGLE COURSE DEPTH.

PAVEMENT MATCH TYPICAL

NOT TO SCALE

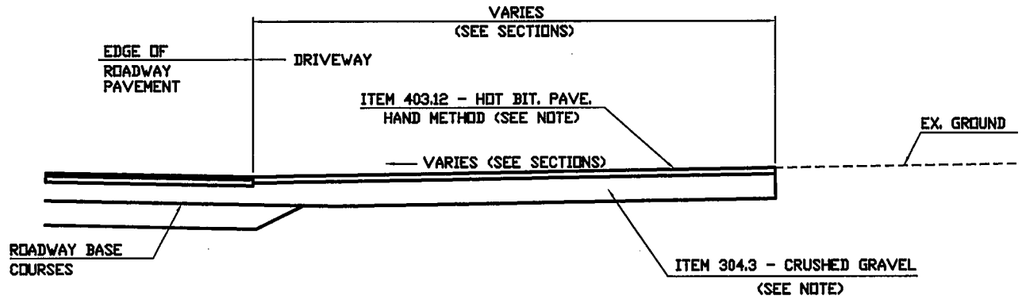
ROUTE 108 (STA. 38+82.50)
ROUTE 108 (STA. 52+00.00)



NOTE: * THE LENGTH OF THE TAPER MAY BE ADJUSTED AS ORDERED TO PROVIDE FOR VARYING FIELD CONDITIONS OR CHANGES IN SINGLE COURSE DEPTH.

PARKING LOT OVERLAY MATCH TYPICAL

NOT TO SCALE



NOTE: PAVEMENT & BASE COURSE DEPTHS FOR RESIDENTIAL DRIVES ARE TYPICALLY 12" CRUSHED GRAVEL WITH 3" H.B.P. (HAND METHOD) SINGLE COURSE. FOR COMMERCIAL OR INDUSTRIAL DRIVES WITH FREQUENT HEAVY TRUCK TRAFFIC, 15" CRUSHED GRAVEL WITH 3" H.B.P. SHOULD BE USED.

TYPICAL DRIVE SECTION

NOT TO SCALE

NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			RAM	JLF	JLF

DRAWN: DAD

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Maine · New Hampshire · Vermont

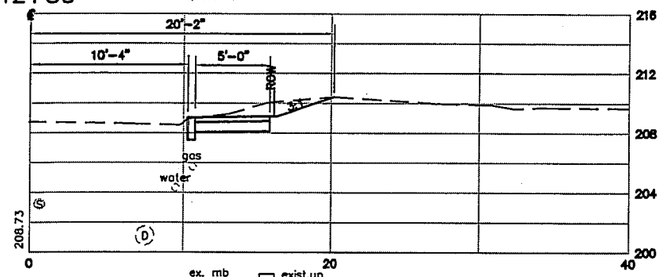
CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

MISCELLANEOUS DETAILS
STATE PROJ. NO. 13414/13008
FED. PROJ. NO. STP-T-X-0202(00)
FED. PROJ. NO. STP-X-0202(00)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
NTS	050172
DATE:	DWG.
DEC 2007	39

112+50

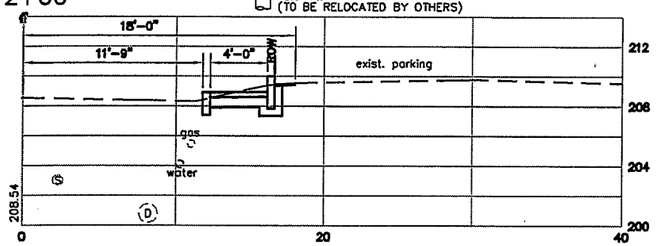
ex.wso
+0, 9.9 rt.



ex. mb
+45, 12' rt.

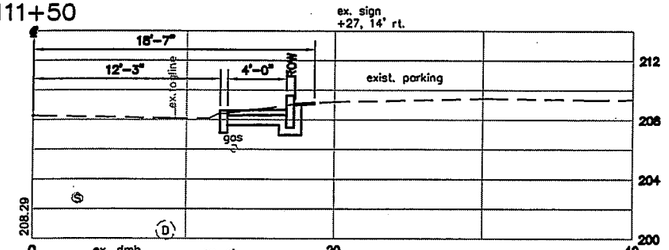
exist.up
sta. 112+09
15.6' rt.
(TO BE RELOCATED BY OTHERS)

12+00



111+50

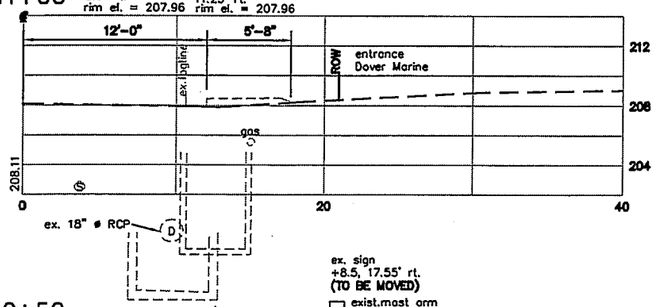
ex. sign
+27, 14' rt.



ex. dmh
sta. 111+32.25,
8.9' rt.
rim el. = 207.96

ex. cb
sta. 111+37.4,
11.25' rt.
rim el. = 207.96

111+00



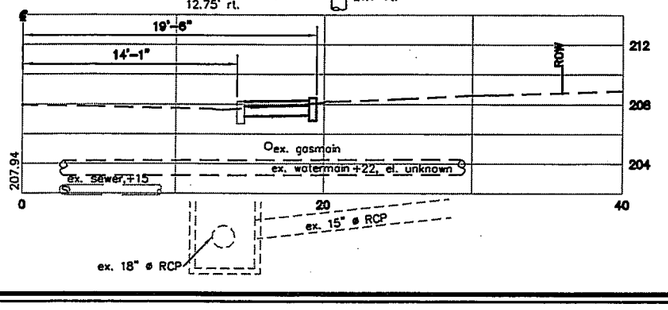
ex. 18" ø RCP

ex. sign
+8.5, 17.55' rt.
(TO BE MOVED)

exist.mast arm
sta. 110+50
21.1' rt.

ex. cb
sta. 110+51.9±,
12.75' rt.

110+50



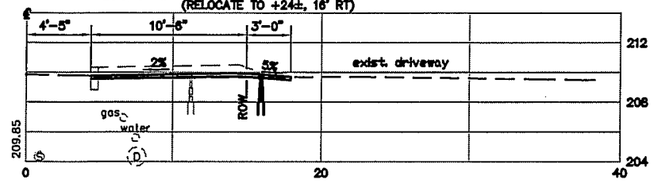
ex. 18" ø RCP

BID ALTERNATIVE – SEE GENERAL NOTE 14, SHEET 2

115+50

ex. mb
+20.6, 6' rt.

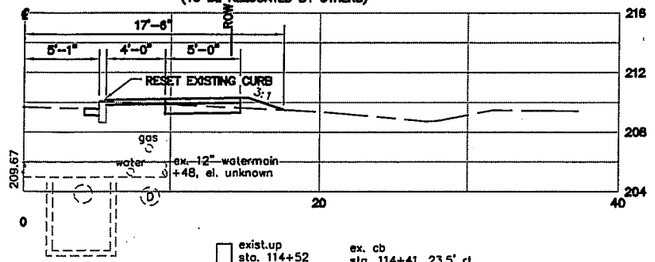
ex. wso
+24, 11.2' rt.
(RELOCATE TO +24±, 16' RT)



ex.cb
sta. 115+21.2
3.15' rt.

exist.up
sta. 115+39.2
9.85' rt.
(TO BE RELOCATED BY OTHERS)

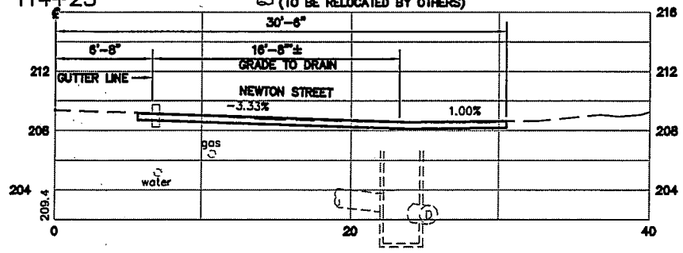
115+00



exist.up
sta. 114+52
13.75' rt.
(TO BE RELOCATED BY OTHERS)

ex. cb
sta. 114+41, 23.5' rt.

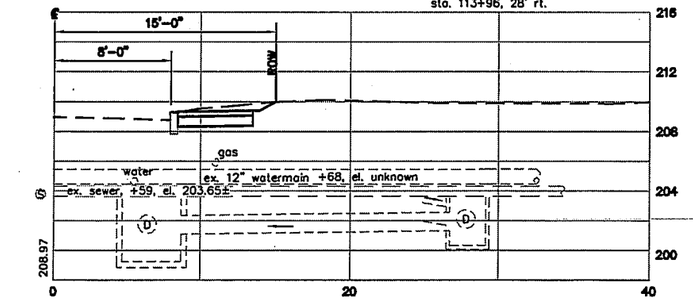
114+25



ex. cb
sta. 113+63, 6.35' rt.

ex. cb
sta. 113+96, 28' rt.

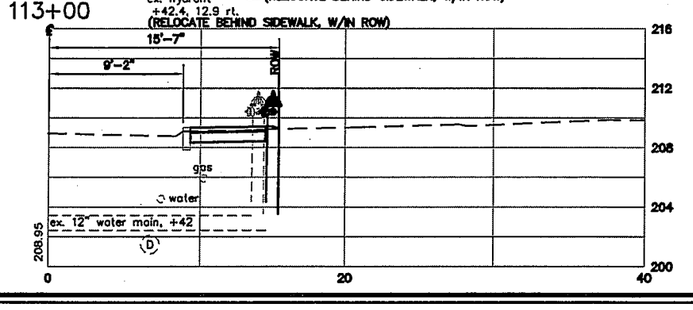
113+50



exist.up
sta. 113+10
13.85' rt.
(RELOCATE BEHIND SIDEWALK, W/IN ROW)

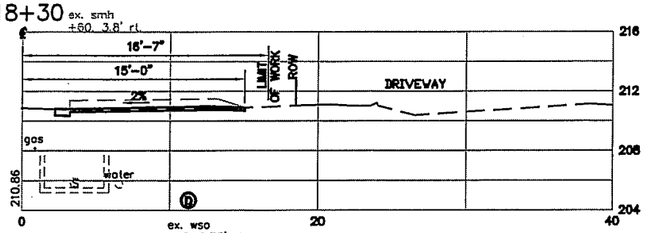
ex. hydrant
+42.4, 12.9 rt.
(RELOCATE BEHIND SIDEWALK, W/IN ROW)

113+00



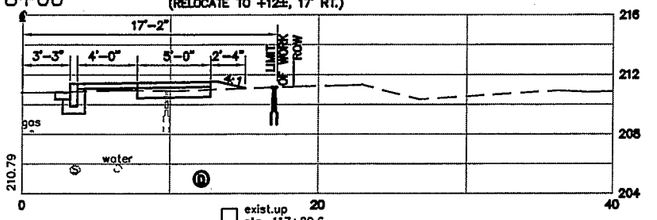
118+30

ex. smh
+60, 3.8' rt.



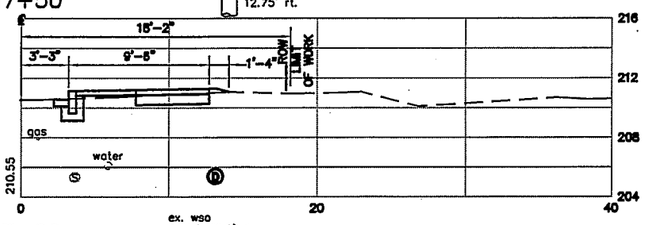
ex. wso
+12, 9.75' rt.
(RELOCATE TO +12±, 17' RT.)

118+00



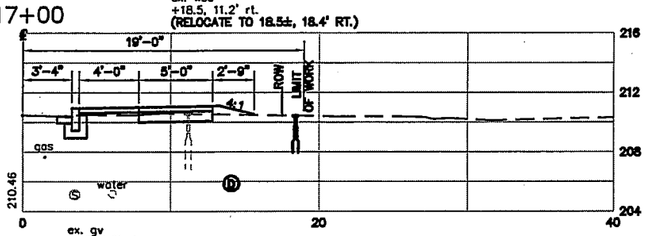
exist.up
sta. 117+80.6
12.75' rt.

117+50



ex. wso
+18.5, 11.2' rt.
(RELOCATE TO 18.5±, 18.4' RT.)

117+00



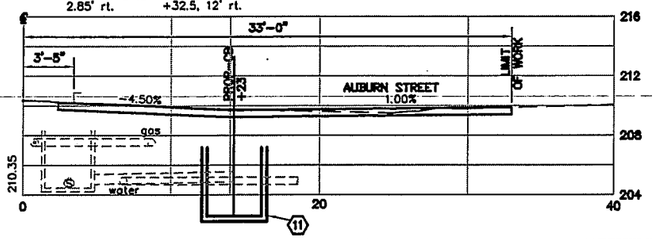
ex. gv
+40, 1.2' rt.

ex. wv
+16, 10.7' rt.

ex. smh
sta. 116+54.5
2.85' rt.

ex. sign
+32.5, 12' rt.

116+50

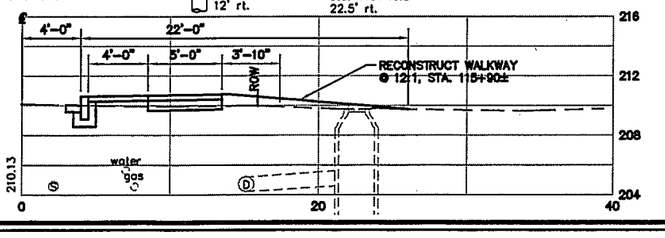


GAS MAIN HAS BEEN ABANDONED FROM APPROXIMATELY STA. 16+50 (AUBURN STREET) TO STA. 132+00±. NEW MAIN WAS PLACED ON OPPOSITE SIDE OF RTE. 108 ALONG SHOULDER OF ROAD.

exist.up
sta. 116+38.7
12' rt.

ex. cb
sta. 116+46.5
22.5' rt.

116+00



NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
		DRAWN: DAD	RWM	MF	MF

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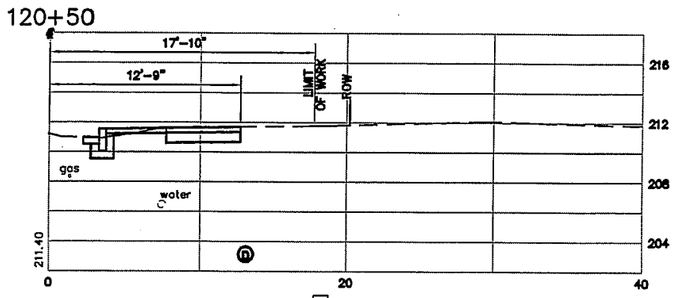
cld@cldengineers.com • www.cldengineers.com
Maine • New Hampshire • Vermont

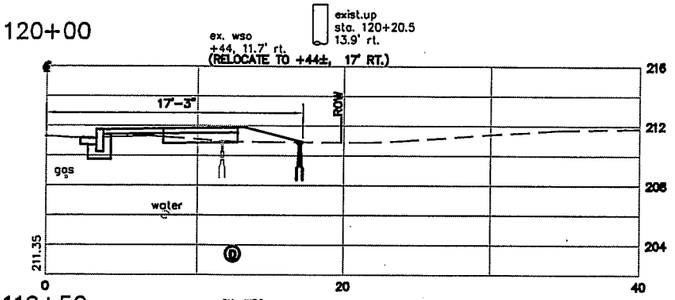
CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

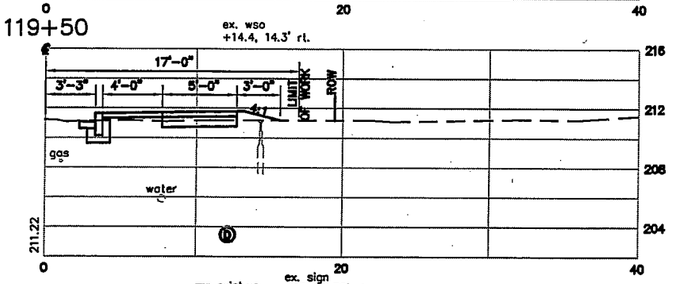
SIDEWALK
CROSS SECTIONS
STATE PROJ. NO. 13444/13606
FED. PROJ. NO. STP-T5-X-0532(006)
FED. PROJ. NO. STP-X-0532(007)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

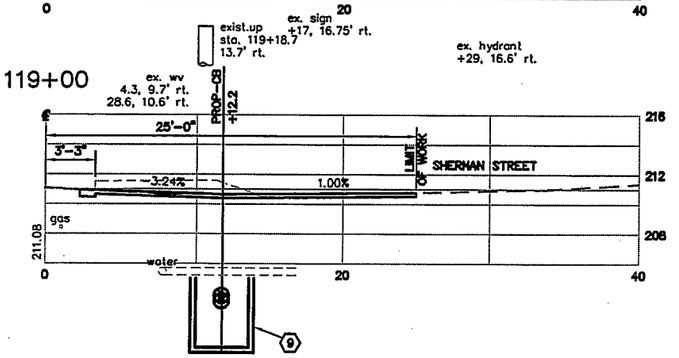
SCALE:	JOB NO.
1" = 5'	050172
DATE:	DWG.
DEC 2007	41

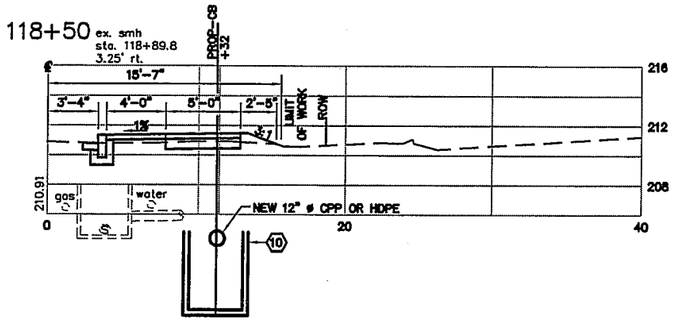
GAS MAIN HAS BEEN ABANDONED FROM APPROXIMATELY STA. 16+50 (AUBURN STREET) TO WILLAND POND ROAD. NEW MAIN WAS PLACED ON OPPOSITE SIDE OF RTE. 108 ALONG SHOULDER OF ROAD.

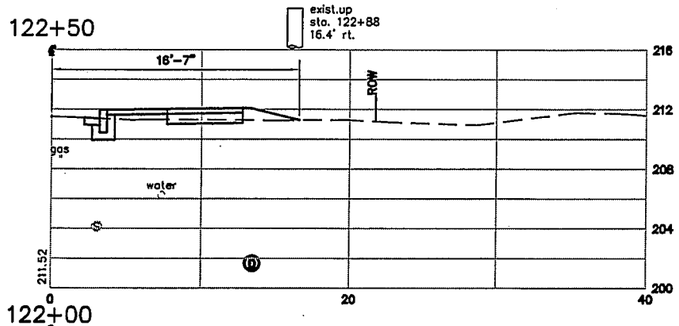


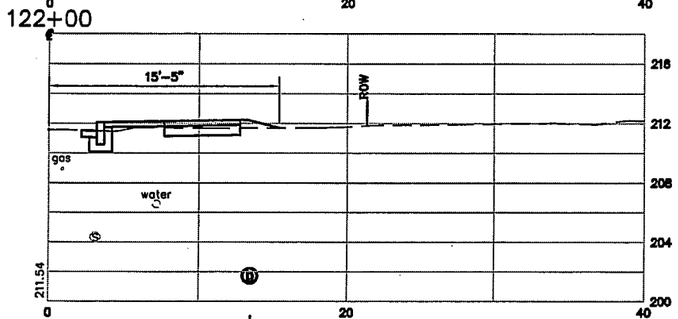


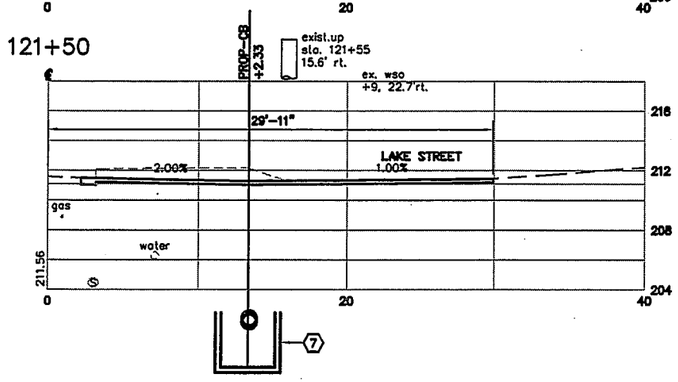


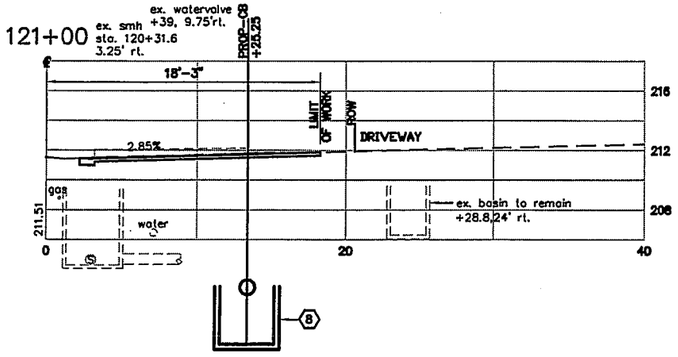


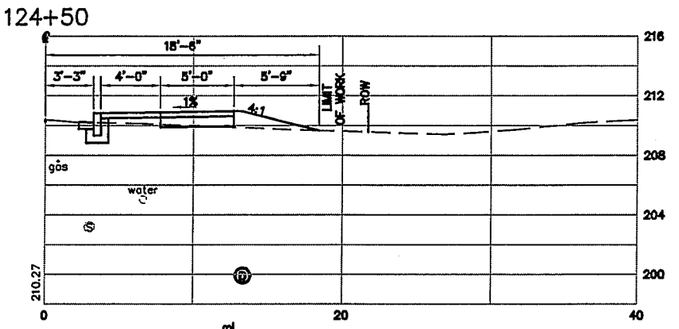


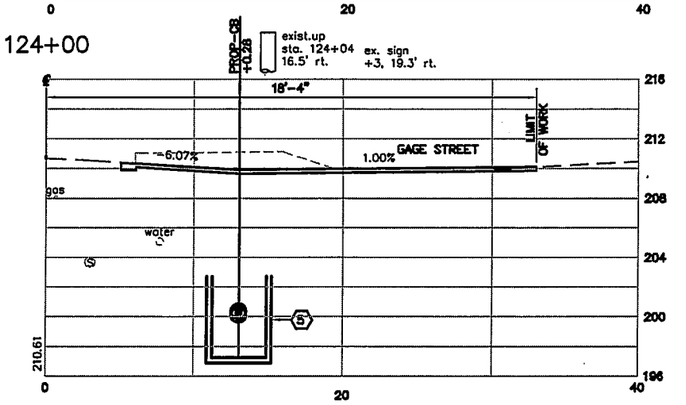


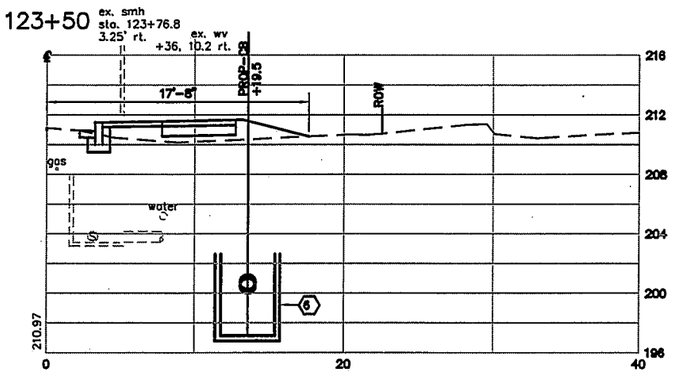


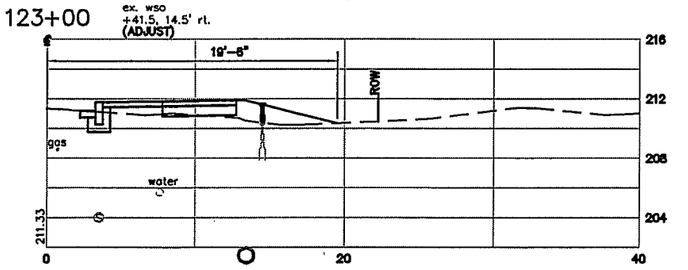












NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			RMM	JLF	JLF

DRAWN: DAD

CLD CONSULTING ENGINEERS Inc.
Park Place Corporate Center
316 US Route 1, Suite D • York, ME 03909
(207) 363-6669 • Fax: (207) 363-2384
cld@cldengineers.com • www.cldengineers.com
Maine • New Hampshire • Vermont

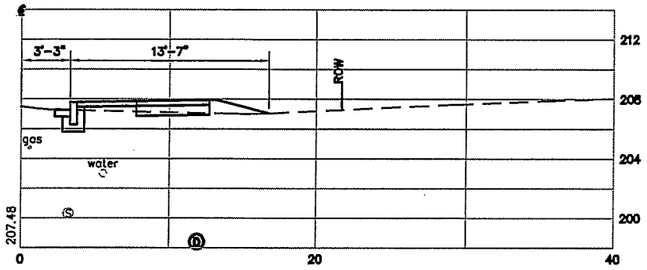
CITY OF DOVER
CITY HALL
DOVER, NH 03820

OWNER:

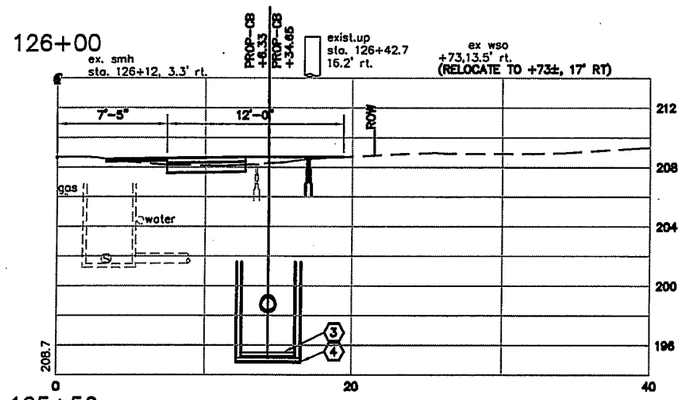
SIDEWALK
CROSS SECTIONS
STATE PROJ. NO. 13644/13668
FED. PROJ. NO. STP-X-0032(000)
FED. PROJ. NO. STP-X-0032(001)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 5'	020172
DATE:	DWG.
DEC 2007	42

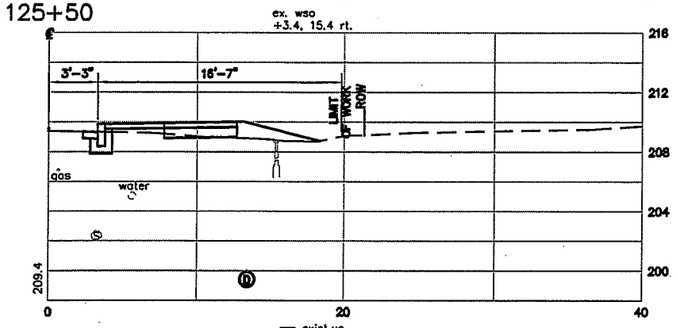
127+00



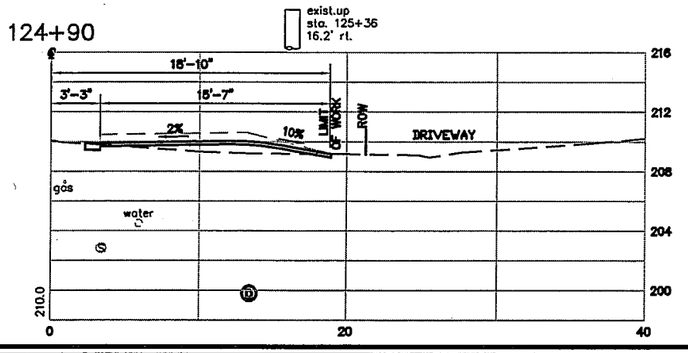
126+00



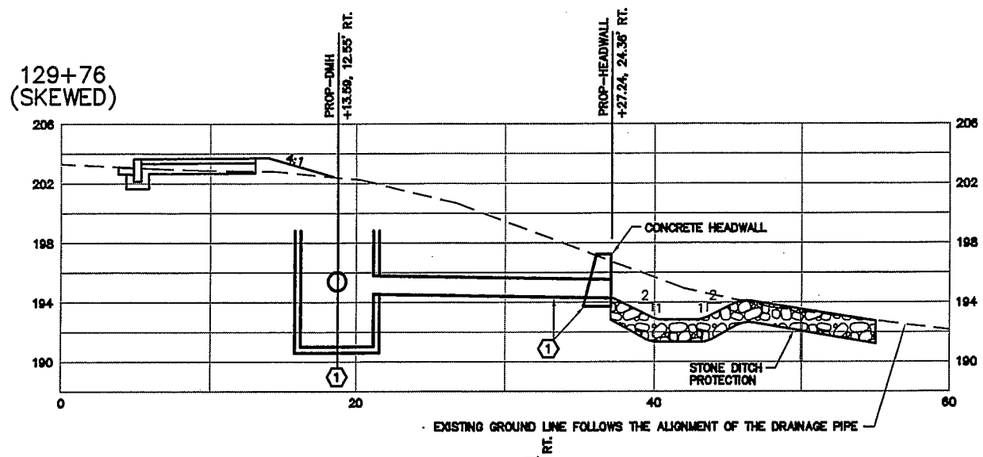
125+50



124+90

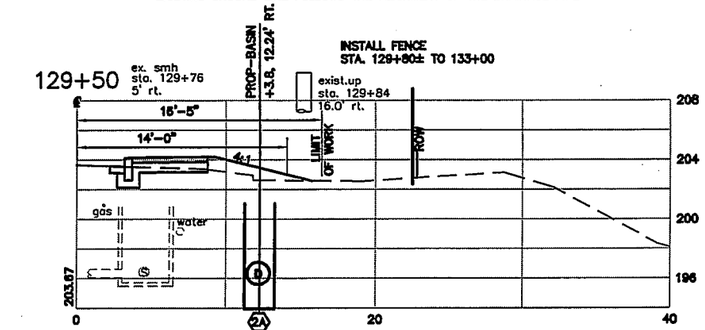


129+76 (SKEWED)

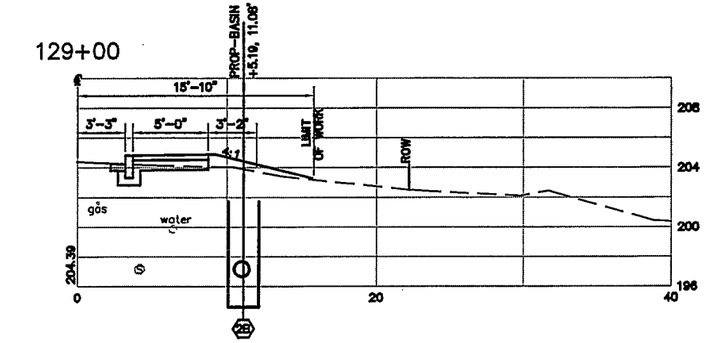


EXISTING GROUND LINE FOLLOWS THE ALIGNMENT OF THE DRAINAGE PIPE

129+50

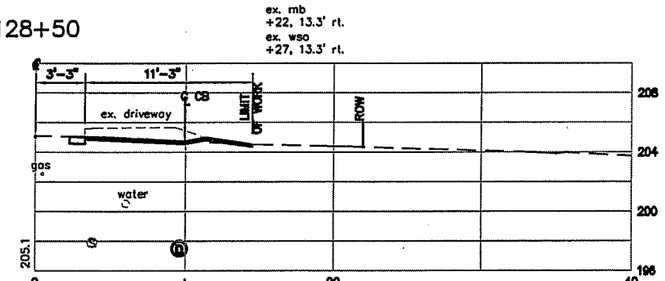


129+00

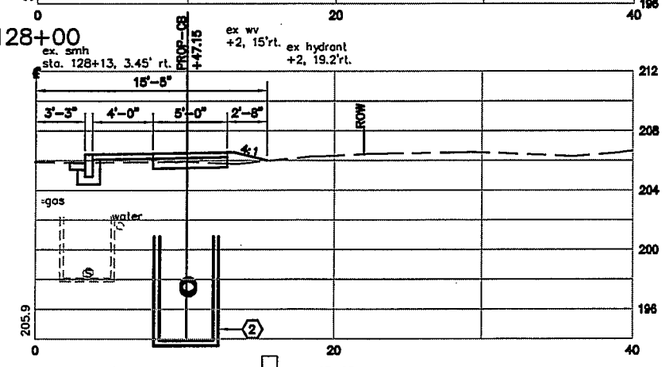


GAS MAIN HAS BEEN ABANDONED FROM APPROXIMATELY STA. 16+50 (AUBURN STREET) TO WILLAND POND ROAD. NEW MAIN WAS PLACED ON OPPOSITE SIDE OF RTE. 108 ALONG SHOULDER OF ROAD.

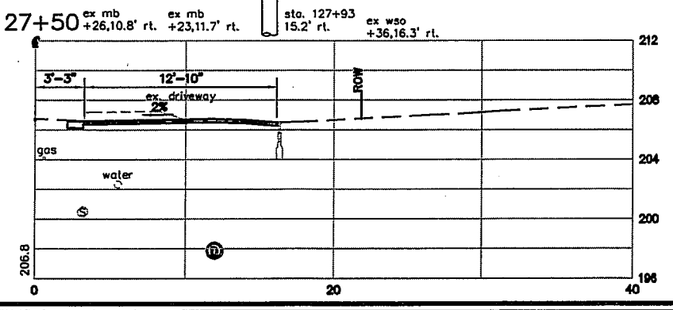
128+50



128+00



127+50



NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			RAM	MF	

DRAWN: DAD

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CLIENT:
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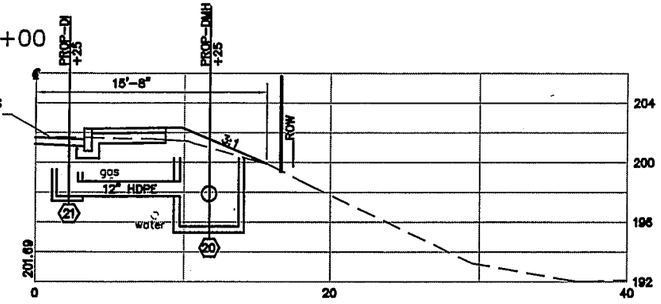
CITY HALL
DOVER, NH 03820

SIDEWALK CROSS SECTIONS
STATE PROJ. NO. 13544/13608
FED. PROJ. NO. STP-TE-X-0032(004)
FED. PROJ. NO. STP-X-0032(006)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

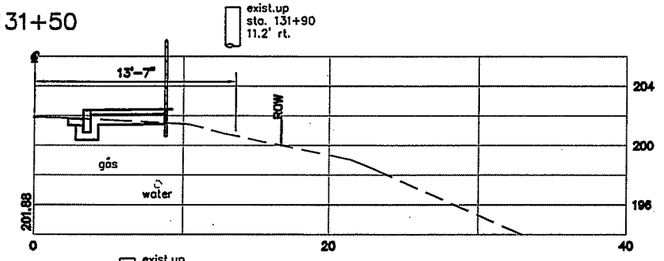
SCALE:	JOB NO.
1" = 5'	050172
DATE: DEC 2007	DWG. 43

132+00

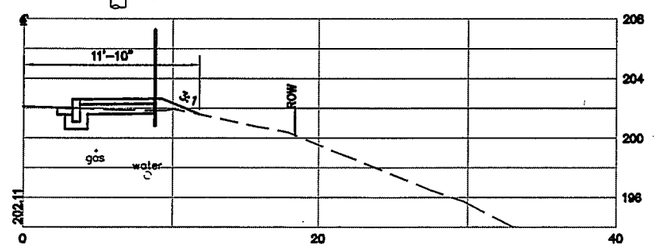
RECONSTRUCT SHOULDER STA. 132+00 TO STA.132+50; MATCH GRADE AT ENDS; WARP PAVEMENT, MAX. SLOPE 5% AT CB



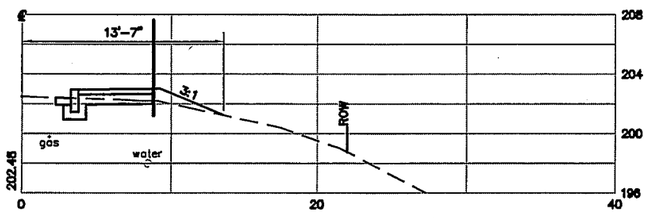
131+50



131+00

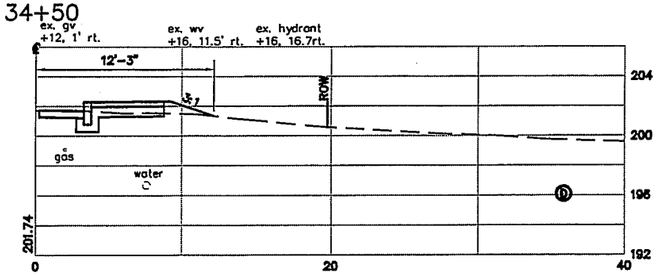


130+50

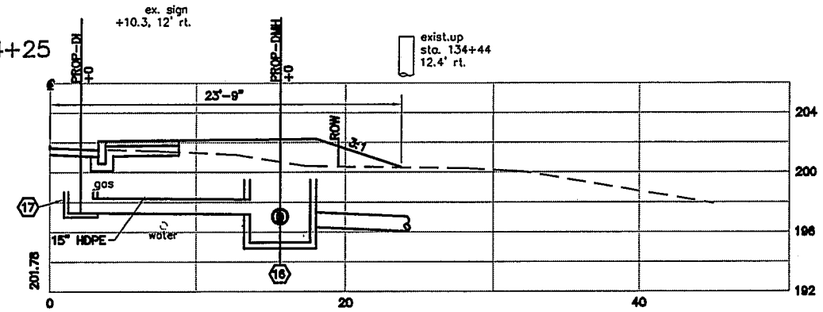


GAS MAIN HAS BEEN ABANDONED FROM APPROXIMATELY STA. 16+50 (AUBURN STREET) TO WILLAND POND ROAD. NEW MAIN WAS PLACED ON OPPOSITE SIDE OF RTE. 108 ALONG SHOULDER OF ROAD.

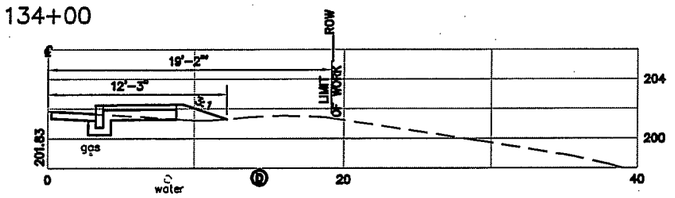
134+50



134+25

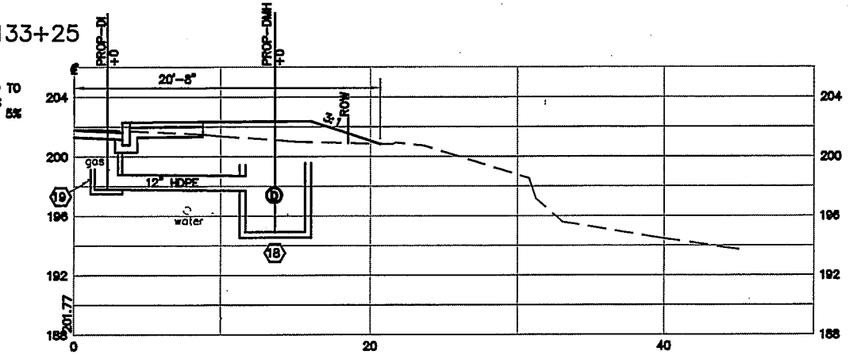


134+00

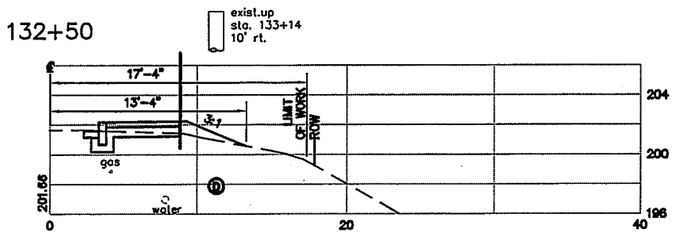


133+25

RECONSTRUCT SHOULDER STA. 133+00 TO STA. 134+50; MATCH GRADE AT ENDS; WARP PAVEMENT AT DI'S, MAX. GRADE 5%



132+50



NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			RMM	JLF	JLF
			DRAWN: DAD		

CLD CONSULTING ENGINEERS Inc.
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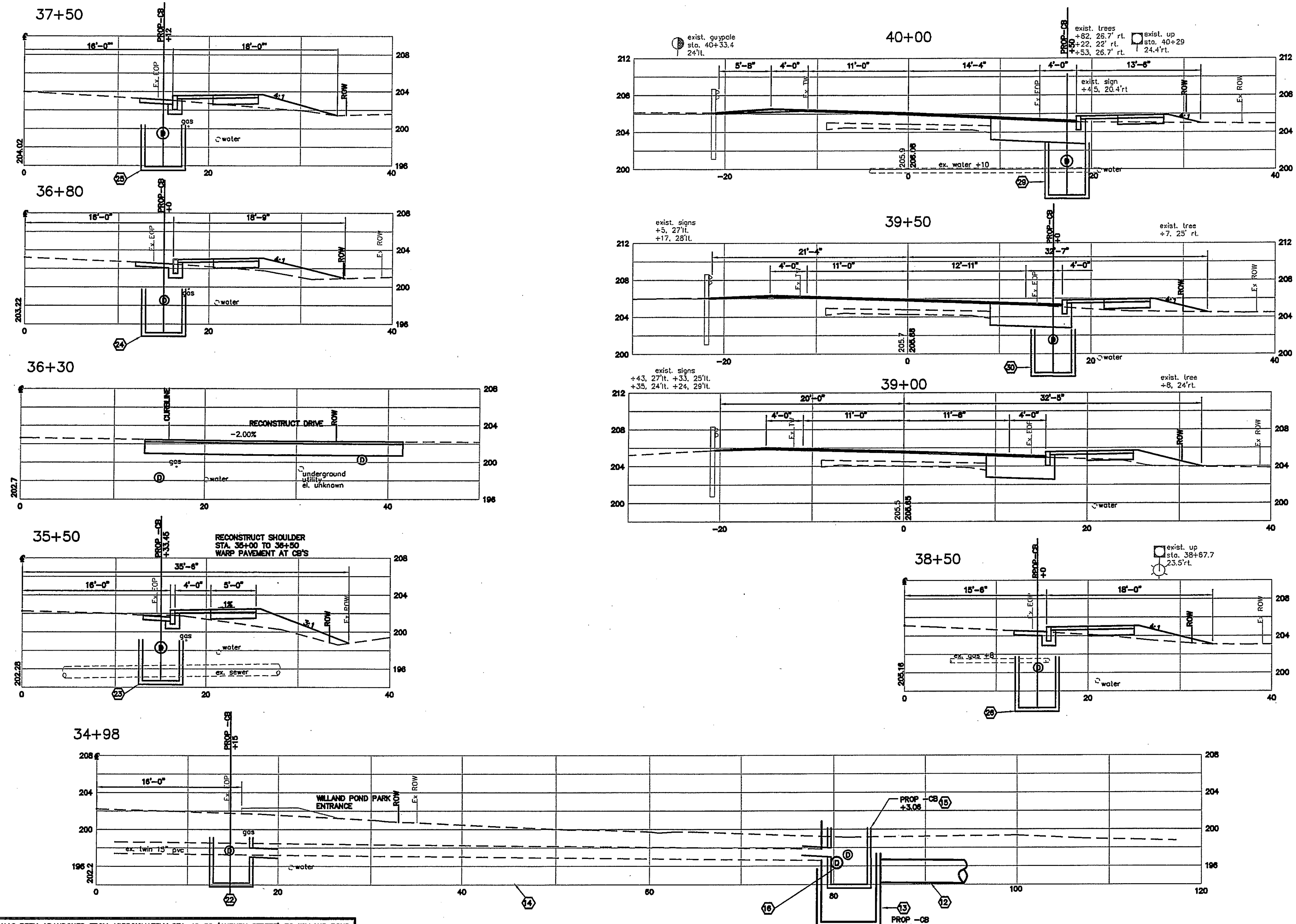
CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

SIDEWALK
CROSS SECTIONS
STATE PROJ. NO. 13844/13858
FED. PROJ. NO. STP-2E-X-0222(014)
FED. PROJ. NO. STP-X-0222(015)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 5'	050172
DATE:	DWG.
DEC 2007	44



GAS MAIN HAS BEEN ABANDONED FROM APPROXIMATELY STA. 16+50 (AUBURN STREET) TO WILLAND POND ROAD. NEW MAIN WAS PLACED ON OPPOSITE SIDE OF RTE. 108 ALONG SHOULDER OF ROAD.

NO.	DATE	REVISION

DRAWN: DAD | DESIGNED: RMM | CHECKED: JLF | APPROVED: JLF

CLD CONSULTING ENGINEERS Inc.

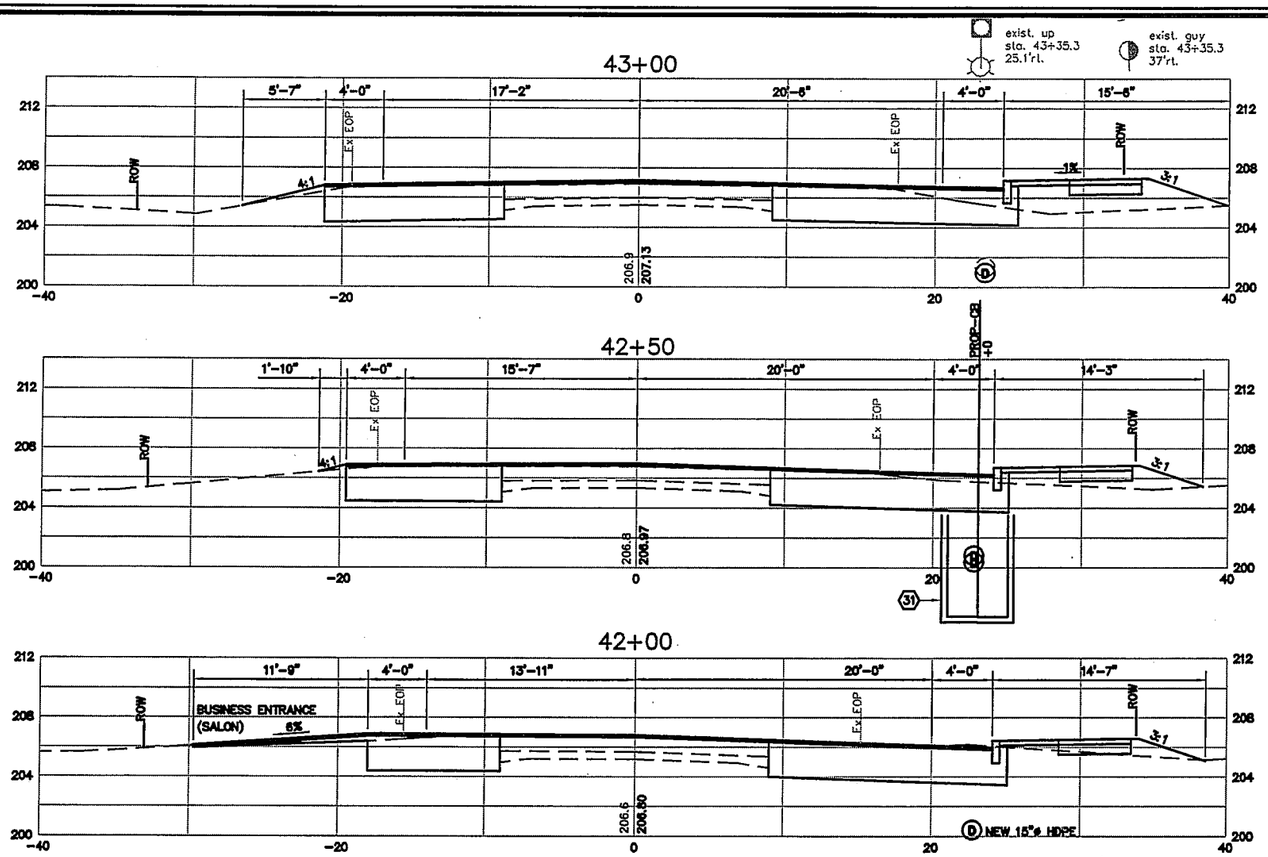
Park Place Corporate Center

CLIENT: CITY OF DOVER
CITY HALL
DOVER, NH 03820

ROADWAY CROSS SECTIONS

NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 5'	080172
DATE:	DWG.
DEC 2007	45



NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			RMM	MF	MF
			DRAWN: DAD		

CLD CONSULTING ENGINEERS Inc.
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CLIENT:
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CITY HALL
DOVER, NH 03820

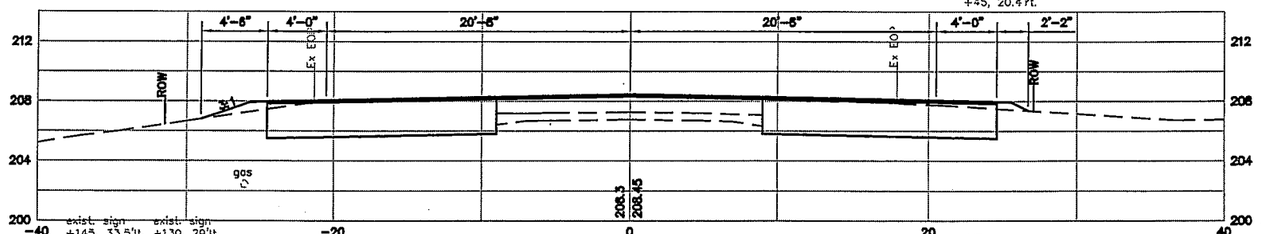
ROADWAY CROSS SECTIONS
STATE PROJ. NO. 13844/13855
FED. PROJ. NO. STP-X-0003(000)
FED. PROJ. NO. STP-X-0003(002)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 5'	050172
DATE: DEC 2007	DWG. 46

exist. joint pole
sta. 47+47, 23'rt.

exist. guy pole
sta. 47+49.5, 40.4'rt.

47+00



MAST ARM
STA. 46+68.2, 43.75' LT.

MAST ARM
STA. 45+87.5, 46.5' LT.

exist. cb
sta. 46+71.8±, 49.2' lt.
rim = 203.0

exist. sign
+145, 33.5'lt.

exist. sign
+130, 29'lt.

exist. lamp post
sta. 45+83, 42.2'lt.

exist. sign
+28, 37.8'lt.

exist. lamp post
sta. 45+70, 41.7'lt.

exist. joint pole
sta. 46+37±, 23.7'rt.

exist. sign
+105, 23'rt.

exist. sign
+94, 26.5'rt.

REMOVE EXISTING CB
STA. 45+90±, 55'RT.
SEE NOTE 44
SHEET 10

exist. sign
+93, 40.4'rt.

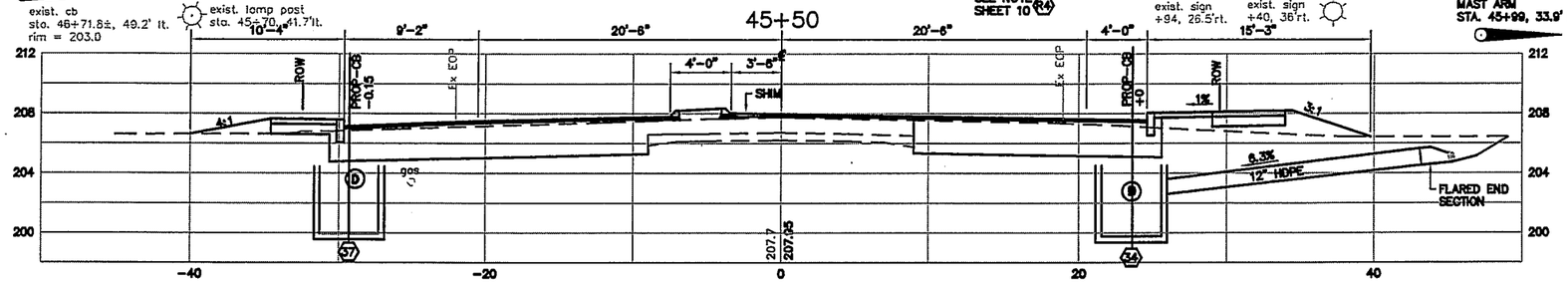
exist. sign
+40, 36'rt.

+30, 51.7' rt.

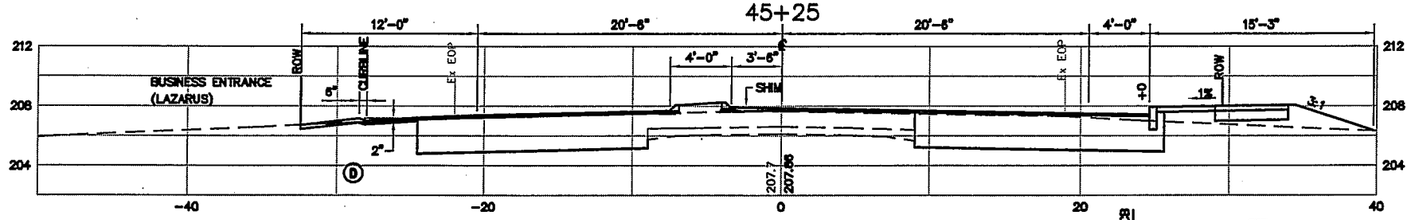
MAST ARM
STA. 46+62.6, 34.40' RT.

MAST ARM
STA. 45+99, 33.9' RT.

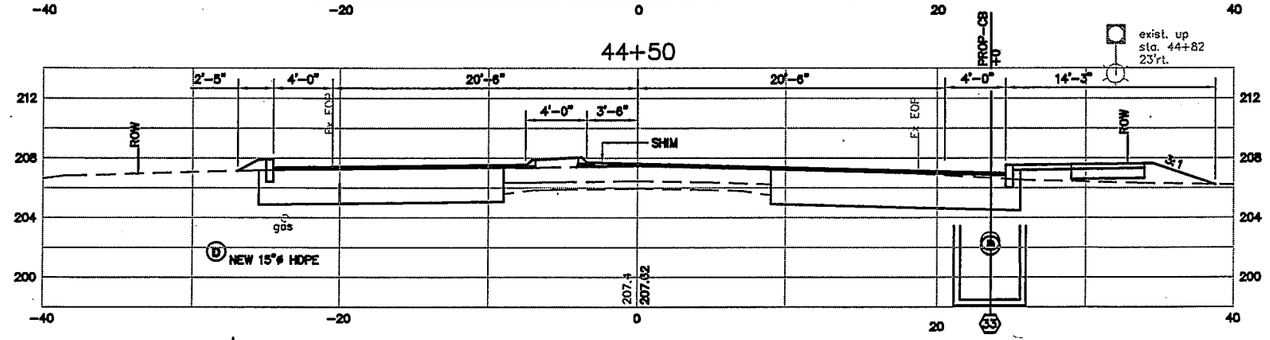
45+50



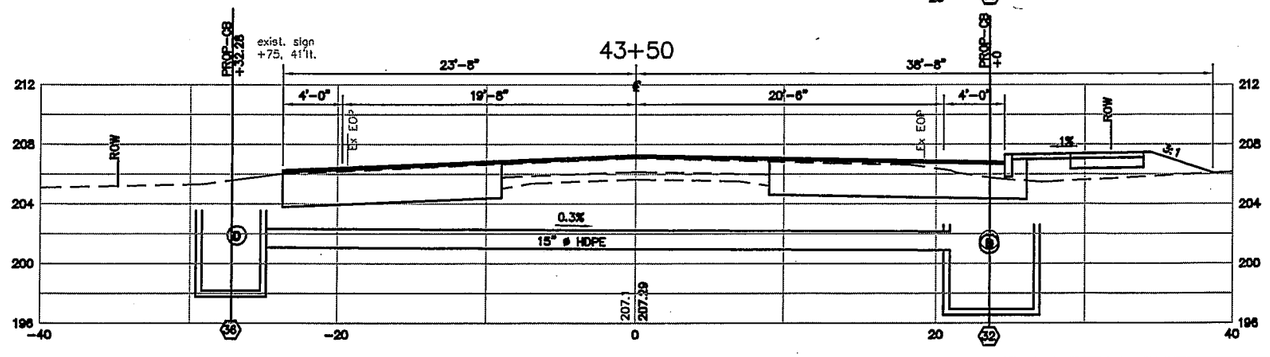
45+25



44+50



43+50



NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			RWM	MF	MF
			DRAWN: DJD		

CLD CONSULTING ENGINEERS, Inc.
Park Place Corporate Center
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Maine, New Hampshire, Vermont

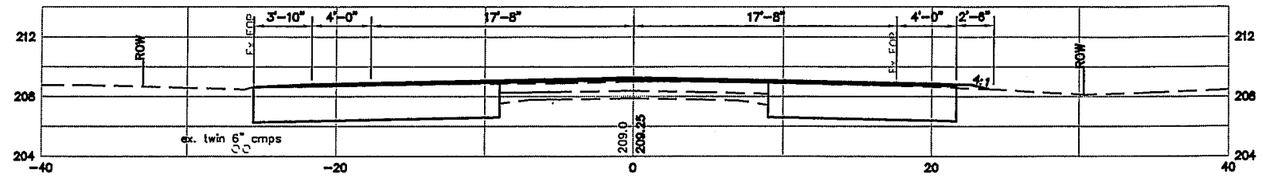
Client:

CITY OF DOVER
CITY HALL
DOVER, NH 03820

ROADWAY CROSS SECTIONS
STATE PROJ. NO. 13644/13800
FED. PROJ. NO. STP-E-4-022(019)
FED. PROJ. NO. STP-X-4005(250)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 5'	020172
DATE: DEC 2007	DWG. 47

49+50



exist. light pole sta.49+12, 42'lt.

exist. cb sta. 49+32, 27.2'lt.

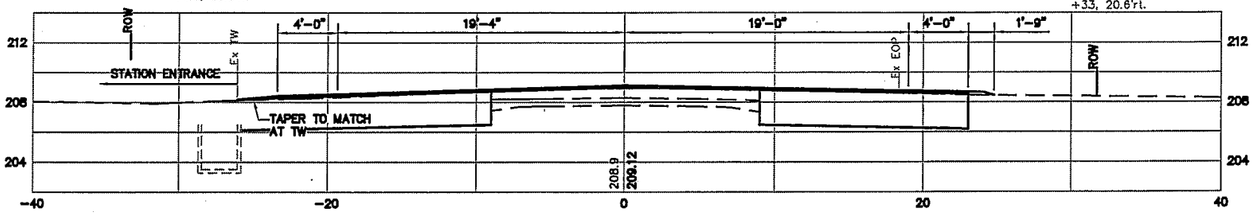
exist. mb +26, 27.7lt.

exist. gas shutoff +4.6, 29.9'lt.

exist. joint power sta. 48+29.5, 30.75'rt.

exist. signs +25, 27'rt. +28, 25.5'rt. +33, 20.6'rt.

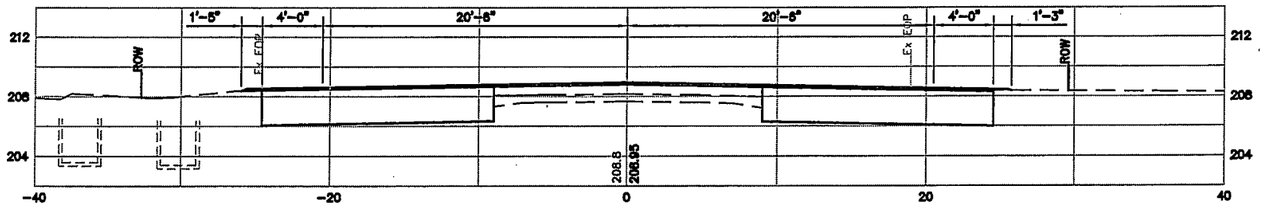
49+00



exist. cb sta. 48+67, 36.9'lt.

exist. dmh sta. 48+50.5, 30.13'lt.

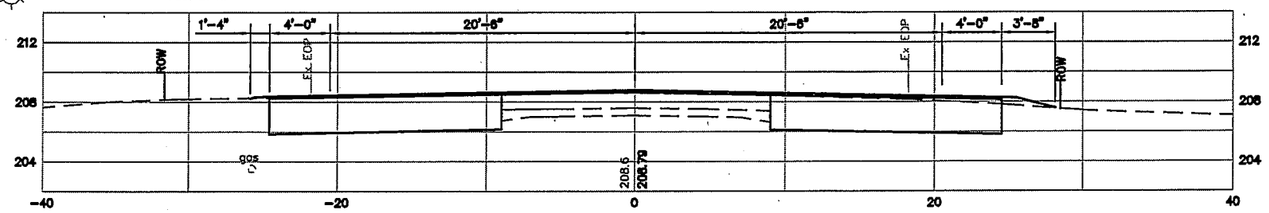
48+50



sta. 48+11±, 47.7'lt.

exist. sign +35, 27'lt.

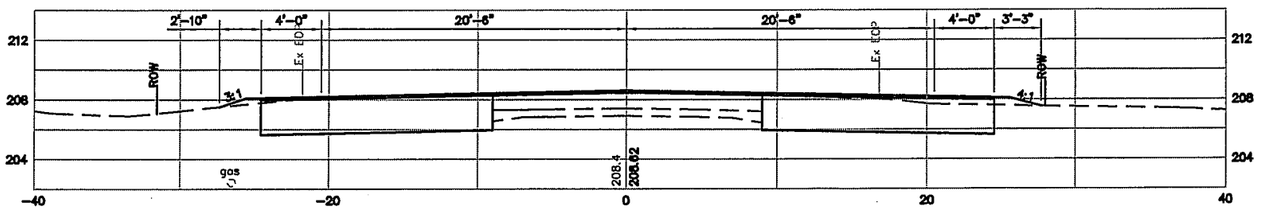
48+00



exist. sign +53, 47'lt.

47+50

exist. guy anchor sta. 47+62.5, 20.3'rt.



NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			RWM	MF	MF
			DRAWN: DAD		

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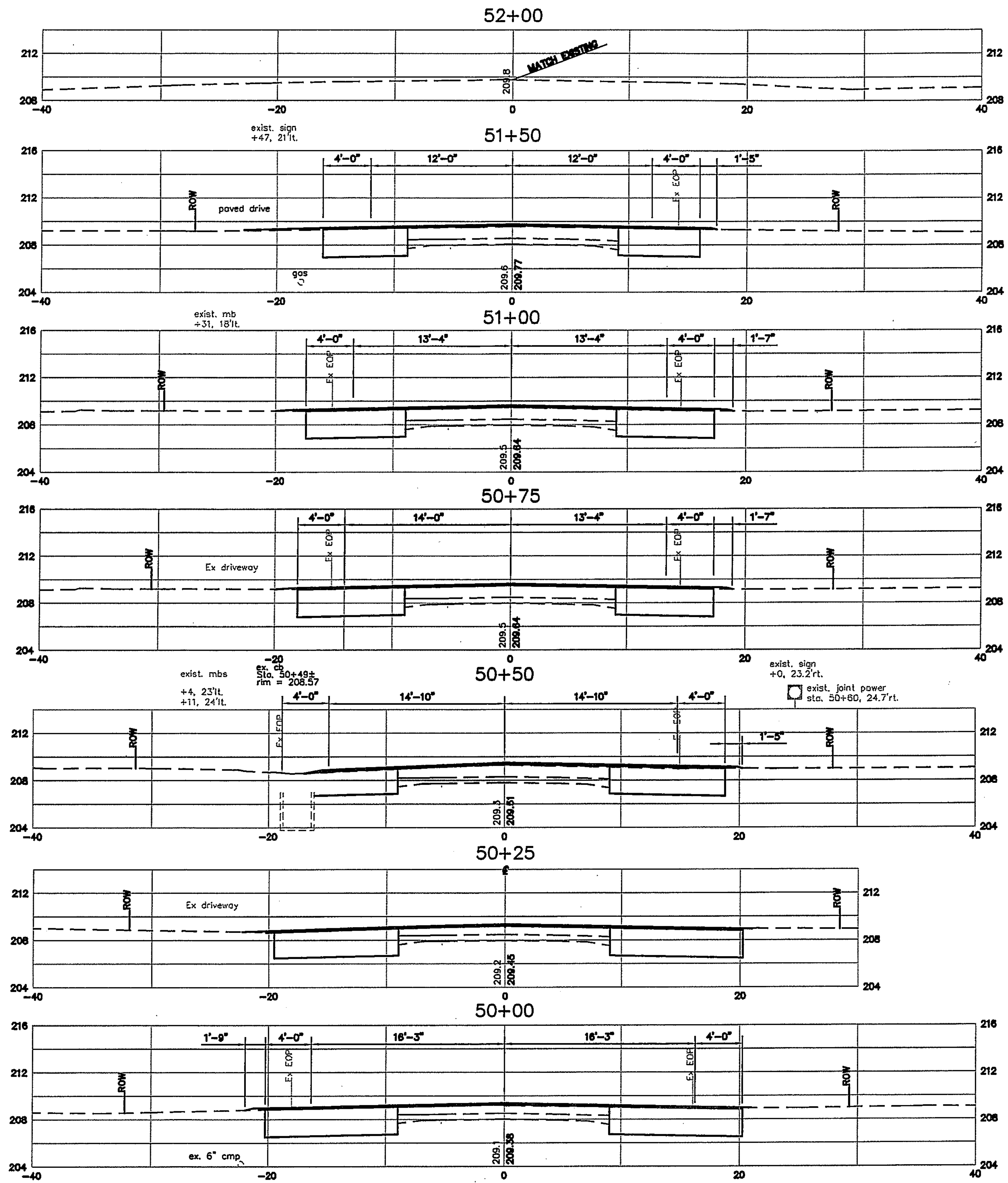
cld@cldengineers.com - www.cldengineers.com
Maine - New Hampshire - Vermont

CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

ROADWAY CROSS SECTIONS
STATE PROJ. NO. 13644/13659
FED. PROJ. NO. STP-TE-X-0032(016)
FED. PROJ. NO. STP-X-0032(020)
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 5'	050172
DATE: DEC 2007	DWG. 48



NO. | DATE | REVISION

DRAWN: DAD | DESIGNED: RWM | CHECKED: JLF | APPROVED: JLF

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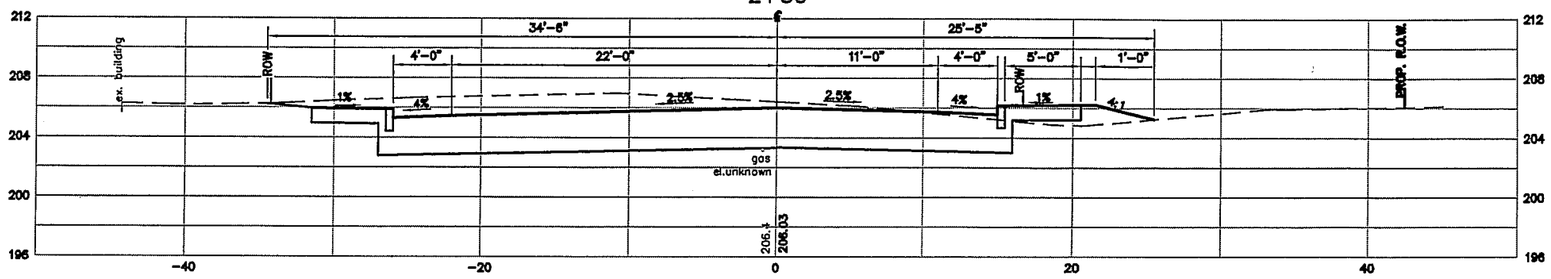
CITY HALL
DOVER, NH 03820

ROADWAY
CROSS SECTIONS
NEW ROCHESTER RD/ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 5'	080172
DATE: DEC 2007	DWG. 49

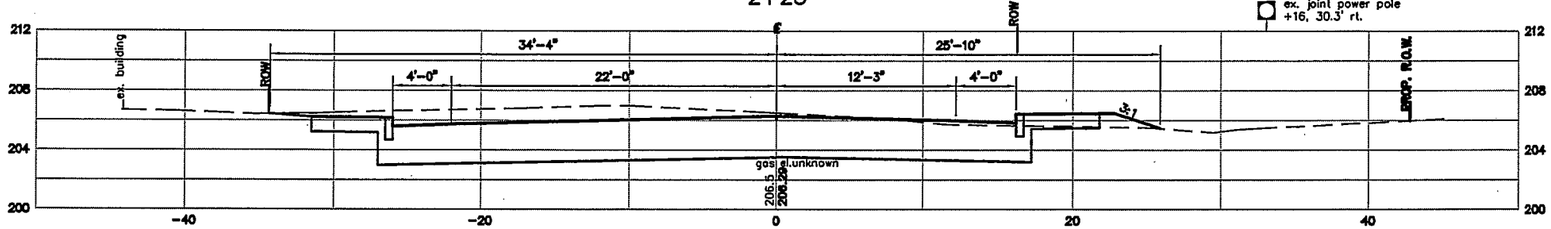
ex. sign
+14, 36' lt.

2+50

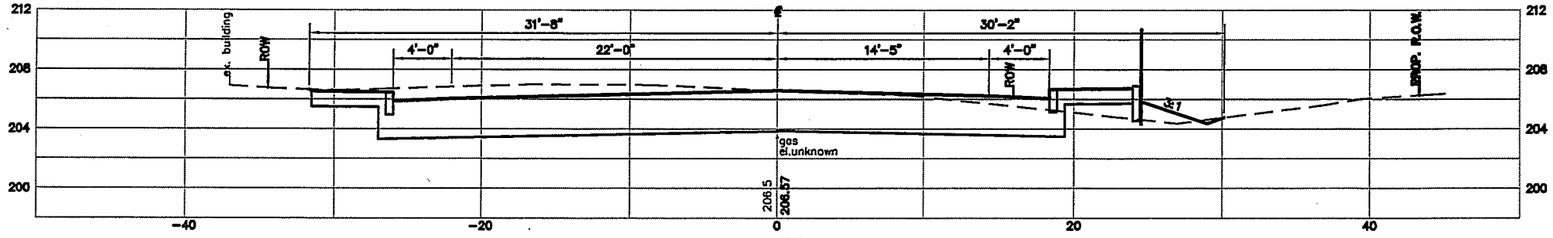


2+25

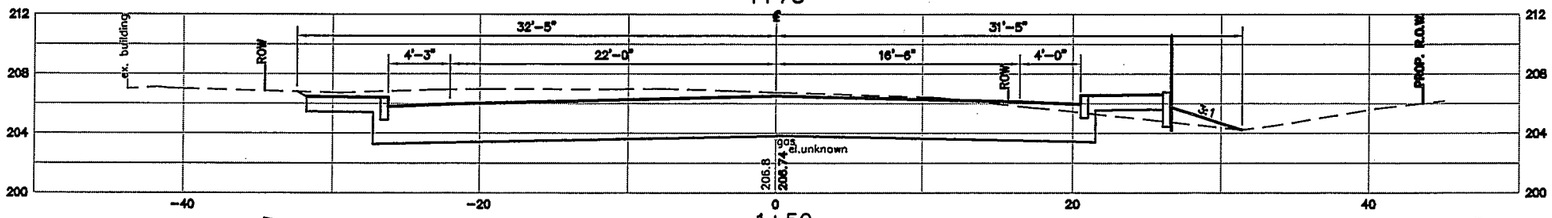
ex. anchors
+2.5, 30' rt.
+16, 40.15 rt.
ex. joint power pole
+16, 30.3' rt.



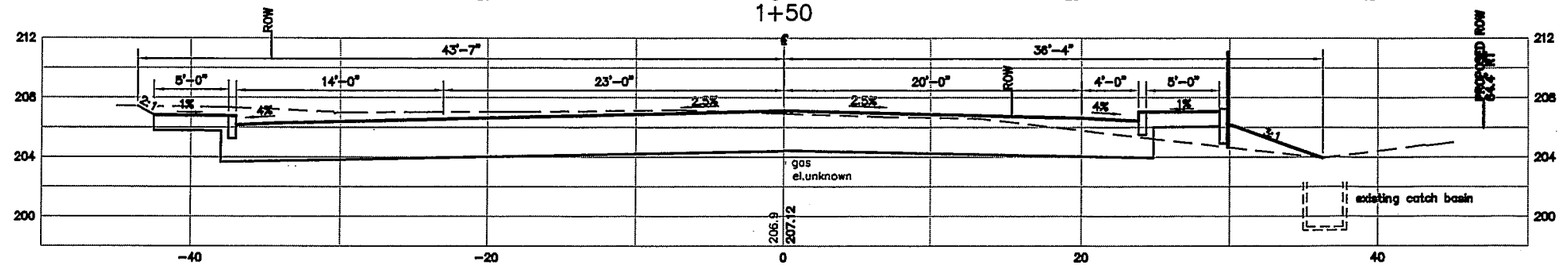
2+00



1+75



1+50



NO.	DATE	REVISION	DESIGNED:	CHECKED:	APPROVED:
			RAM	MF	MF
			DRAWN:		
			DAD		

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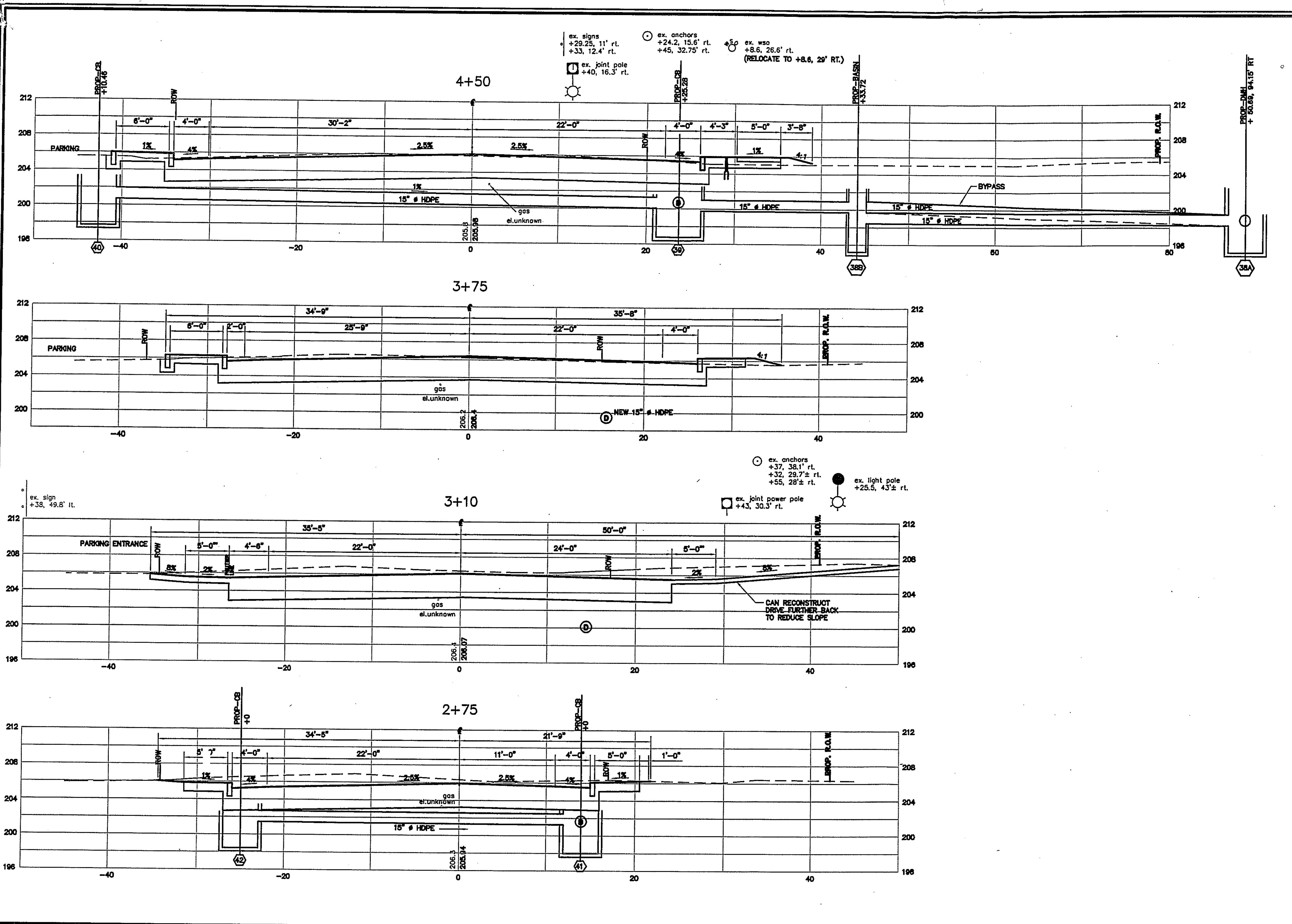
Maine - New Hampshire - Vermont

CLIENT:
CITY OF DOVER
CITY HALL
DOVER, NH 03820

ROADWAY CROSS SECTIONS
STATE PROJ. NO. 13814/13809
FED. PROJ. NO. STP-X-0032(104)
FED. PROJ. NO. STP-X-0032(099)
NEW ROCHESTER RD./ LONG HILL RD
DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 5'	050172
DATE: DEC 2007	DWG. 50



NO. | DATE | REVISION

DRAWN: DAD | DESIGNED: RMM | CHECKED: JLF | APPROVED: JLF

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DOVER, NEW HAMPSHIRE

SCALE:	JOB NO.
1" = 5'	080172
DATE: DEC 2007	DWG. 51