

ADDENDUM NO. 1

ZION HILL ROAD IMPROVEMENTS Salem, New Hampshire January 18, 2018

The following changes and information are hereby incorporated into the Contract Documents (Project Manual and Drawings)

PRE-BID MEETING NOTES

Meeting notes (Attachment "A") and the information provided within is included in the documents by addendum.

PROJECT MANUAL

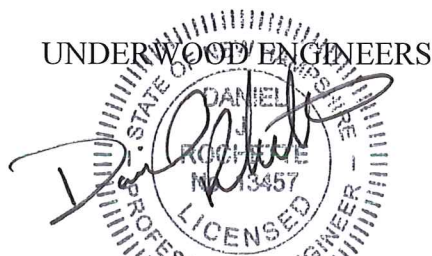
1. SECTION 00301A – BID

- a. **Delete** the Contractor's Bid Schedule (pages 00301A-3 to 00301A-10) in its entirety and **replace** with **Attachment "B"**. The following changes are noted:
 - Est. Quantity for Item 304.4 revised.
 - Est. Quantity for Item 603.33212 revised.
 - Est. Quantity for Item 603.33215 revised.
 - Est. Quantity for Item 609.811 revised.

CONTRACT DRAWINGS

2. QUANTITY SUMMARY, DWG NO G3

Delete DWG NO G3 in its entirety and **replace** with Attachment "C".



UNDERWOOD ENGINEERS, INC.
Daniel J. Rochette, P.E.

SUMMARY OF ATTACHMENTS

- A. Pre-bid Meeting Notes
- B. Contractors Bid Schedule (Pages 00301A-3 to 00301A-10)
- C. DWG NO G3

Zion Hill Road Improvements - Addendum No. 1

ATTACHMENT "A"

Pre-Bid Meeting Notes

Salem, NH

January 10, 2018 at 2:00 P.M.

Note: Revisions to the Agenda distributed at the pre-bid meeting are identified as *italic text*.

Attendees*

Dan Hudson
James Danis
Dan Rochette
Ryan Daigle
Jeff Twarog
Steve Hughes
Rian White
Robert Panwick
Brian Good
Paul LaChapelle
Jerry Maher

Representing

Town of Salem
Town of Salem
Underwood Engineers, Inc
EJ Paving
R&D Paving
PJ Keating
Weaver Brothers
American Excavating
Busby Construction
Busby Construction
Continental Paving

*Attendance Sheet Attached

1. Introductions

Introductions were made and attendees were requested to fill out the sign in sheet.

James Danis, P.E., Capital Projects Engineer Town of Salem

Dan Rochette, P.E., Project Engineer Underwood Engineers, Inc.
drochette@underwoodengineers.com Tel. 603.436.6192

2. Bidding Requirements

- Pre-Bid Meeting: This is a non-mandatory pre-bid meeting.
- Bid Security for 5% of bid price
- Acknowledgement of Addenda; Submit with Bid
- Qualification of Contractors: Submit with Bid
- Certificate of Non-Collusion: Submit with Bid

3. Project Area

The Zion Hill project extends from Bluff Street to Shadow Lake Road, approximately 9,400 feet.

4. Schedule

Completion time for the project will be as follows:

- Work is expected to begin in April/May 2018, construction layout may precede construction
- Substantial Completion: September 28, 2018.
- Final Completion: October 26, 2018.

5. Project Overview

The project generally includes the following items:

- Drainage Improvements – subsurface (underdrains), ditching and drainage conveyance (structures and piping)
- Pavement Milling & Overlay (~4,000 LF)
- Pavement Repairs
- Road Reclamation & Full Depth Re-construction (~5,400 LF)
- Property restorations
- Other work as specified on drawings or included in Bid Schedule
 - *Reconstruction of stone retaining walls*
 - *Construction of bituminous curbing*
 - *Misc. shoulder and embankment grading*
 - *Tree Removal*

6. Traffic Management

The Contractor will be required to maintain the roadway in a safe passable condition. Refer to Section 01850 for general requirements. Traffic is generally light to moderate (approximately 4,000 vpd). Traffic increases during commuter hours and during school release. One way alternating traffic is anticipated during work hours. However, traffic in either direction may not be impeded for more than 5 minutes without the Town’s prior approval.

7. Work Hours

The contract time for completion is based on work hours from 7am to 3:30pm, Monday through Fridays. Work beyond these hours will not be permitted without Town approval.

8. Temporary Facilities & Environmental Controls

Contractor is required to provide and monitor erosion and siltation controls, to prevent degradation to wetlands, drainage ditches and adjoining properties. Temporary controls and general housekeeping during construction include but may not be limited to:

- Preparation and implementation of SWPPP (unit items provided)
- Dust Control
- Continuous maintenance and cleanup of uncompleted work areas
- Safe passage of traveling public
- General housekeeping

9. Community Information

The Contractor is required to provide the following information on a weekly basis:

- A brief narrative of upcoming work areas and schedule (2 week projection)
- Address or provide status updates relating to property owners complaints
- Provide a 24-hour contact person for emergencies
- Attend a public informational meeting prior to construction

10. Staging Areas

The Contractor is responsible for obtaining adequate staging areas for the project.

It was requested that the successful bidder not contact the property owner who owns a significant amount of land which abuts the project on the northerly end of the project. However, it was noted there are 4 or 5 building lots which abut the project in which the owner may entertain the use of a staging area. The Town will provide contact information for these properties following acceptance of bid.

11. Wetlands Permit

Work within jurisdictional wetlands is limited to grading around headwalls. A wetland permit application will be secured by the Town in advance of the work.

Drawings submitted with the wetlands application show modifications to proposed grading and proposed silt fence locations for work adjacent to jurisdictional wetlands. Impacted sheets are included with these meeting notes as Attachment “A-1” for contractors consideration in preparation of their bids. Silt fence revisions do not affect bid quantity provided for Item 645.531.

12. Utility Poles

The Town is coordinating with utility companies to re-locate the poles indicated on the drawings. Pole re-location by utility companies is expected in summer 2018. Some coordination with utility companies can be anticipated.

13. Addendum

Comments and questions will be received by Underwood Engineers, Inc. (addressed to the attention of Dan Rochette) until Wednesday January 17, 2018 for preparation of Addendum #1.

Addendum #1 will be issued at least five (5) days prior to the bid date and is expected to include the following:

- Pre-bid Meeting Notes
- Clarification of bid quantity for Item 304.4 - Crushed Stone (Fine)
- Drawings issued with the NHDES Wetlands Permit Application depicting limits of silt fence and wetland impact areas

14. Questions (Q) & Responses (R)

Q: The documents state that no more than 3,000 LF of roadway shall be disturbed at a given time. One section of reclamation identified is 3,600 LF. Will the Contractors be permitted to reclaim this section in two mobilizations?

R: Additional length of roadway disturbance allowed will be dependent on Contractor operations. If the Contractor has proven to complete the work with good housekeeping practice as described in the specifications and able to properly maintain safe vehicular travel ways the Town will consider allowing additional roadway to be disturbed.

Q: Do the quantities include excavation/gravel quantities for installation of new bituminous curbing adjacent to existing pavement sections in the mill and overlay section.

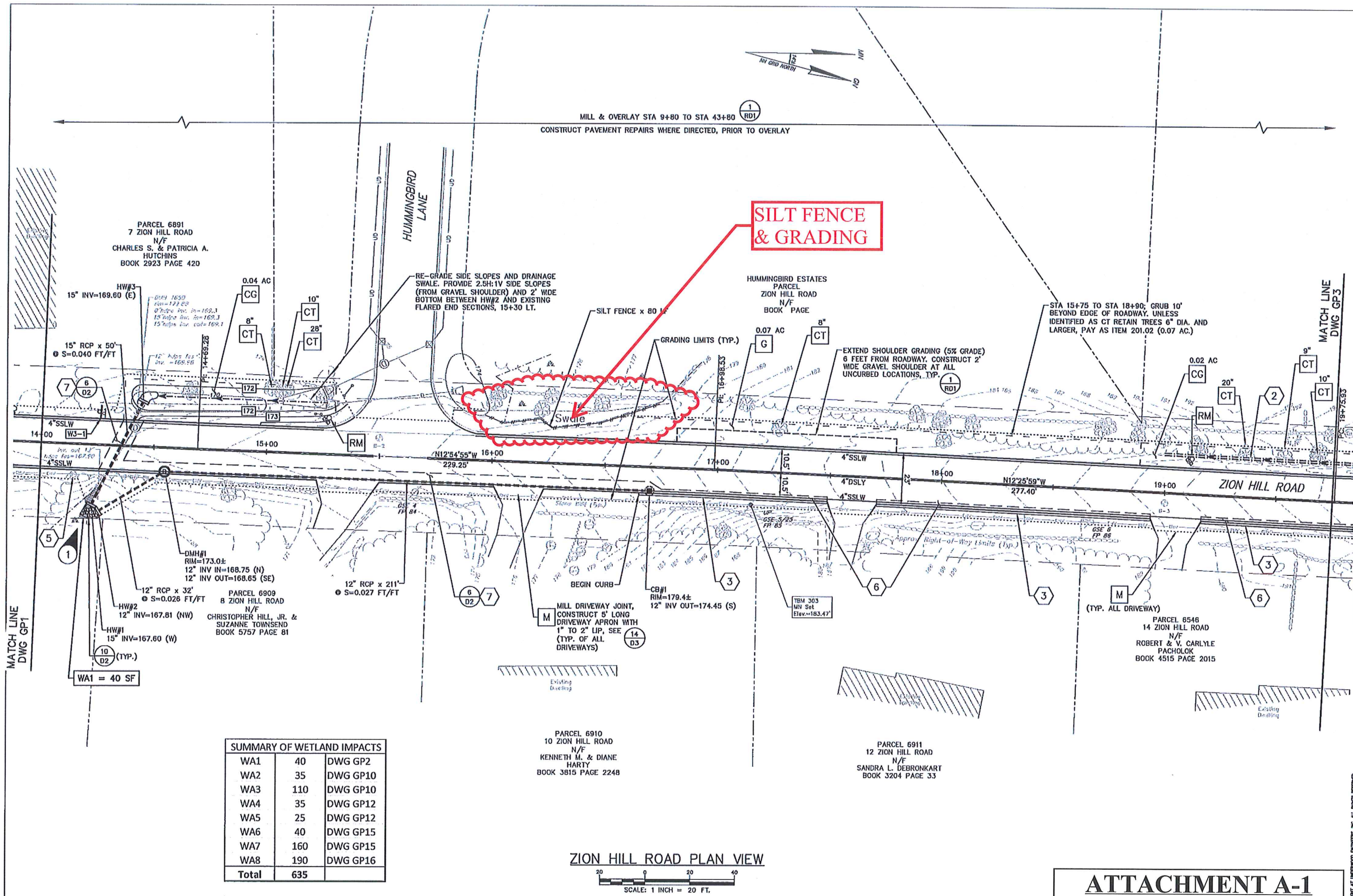
R: Quantities for curbing installation (common excavation and gravels) are summarized in the Pavement Repair quantity schedule on DWG G3. This sheet has been updated and is being re-issued as part of Addendum #1

Additional questions following meeting (not part of meeting) as follows:

Q: The typical drain trench detail does not call for sand placed over the pipe and note # 4 references Salem Subdivision standards which I believe calls out sand over pipe. Please clarification

R: Drainage pipe shall be installed with 12” stone blanket above the pipe for HDPE pipe. Stone blanket shall meet material specification for NHDOT Item 304.4 and shall be incidental to the respective pipe items (Attachment “A-2” of these notes)

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SUMMARY OF WETLAND IMPACTS		
WA1	40	DWG GP2
WA2	35	DWG GP10
WA3	110	DWG GP10
WA4	35	DWG GP12
WA5	25	DWG GP12
WA6	40	DWG GP15
WA7	160	DWG GP15
WA8	190	DWG GP16
Total	635	

ZION HILL ROAD PLAN VIEW

ATTACHMENT A-1

ISSUE FOR BIDDING

By PDM

Date 12/19/17

FOR CONSTRUCTION

By PDM

Date 12/19/2017

RECORD DRAWING

By PDM

Date 12/19/2017

Drawn/Chk. RMG

Designed RMG

Checked RMG

Approved RMG

Date 12/19/2017

Book No. 2224

Project No. 2224

Dwg. ID 2224 base

Scale AS SHOWN

REVISIONS

NO.

APPD

UNDERWOOD

engineers

25 Vaughan Mall, Portsmouth, N.H. 03801

Tel. 603-436-6192 Fax. 603-431-4733

ZION HILL ROAD

GENERAL PLANS

ZION HILL ROAD IMPROVEMENTS

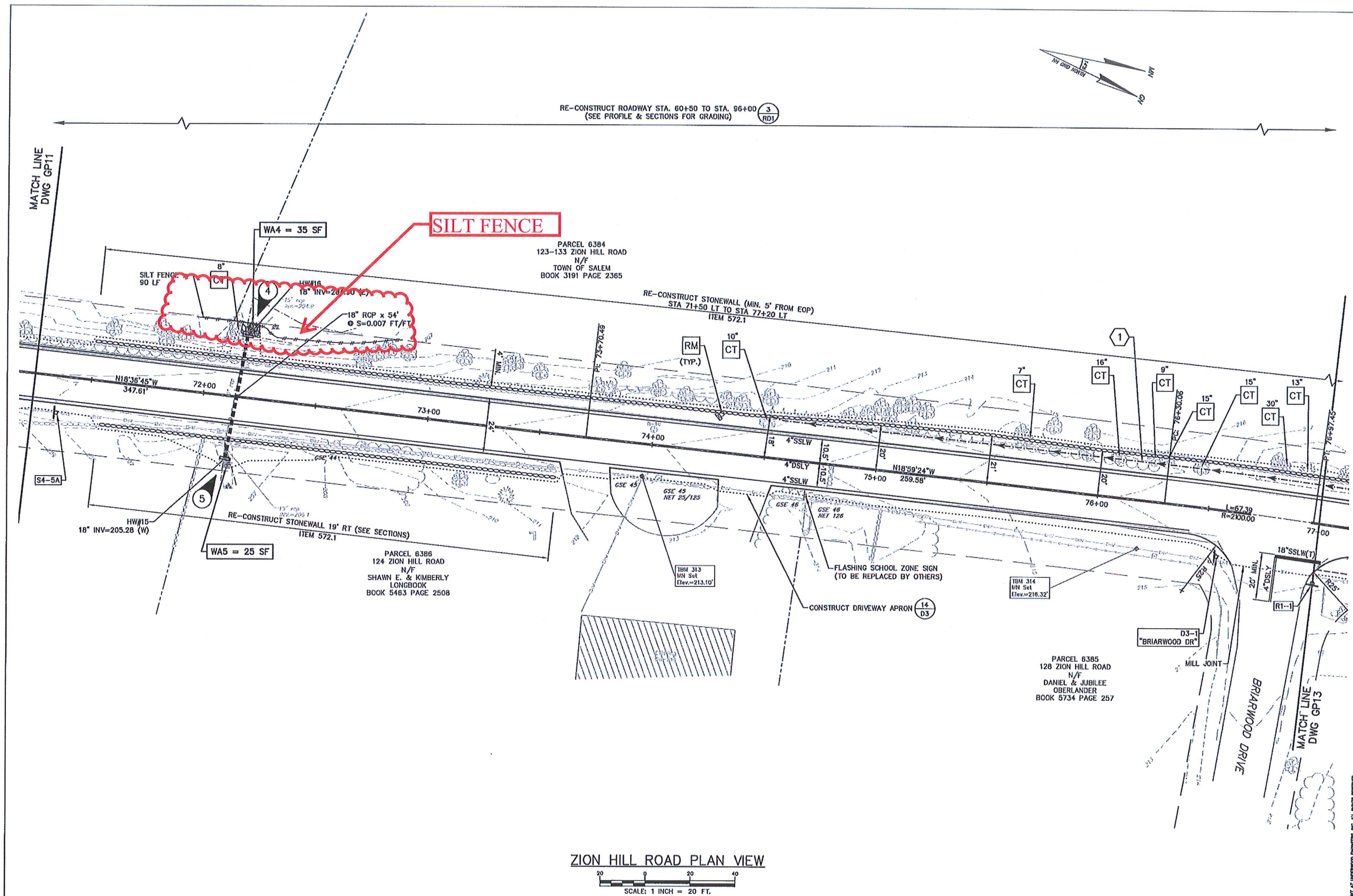
TOWN OF SALEM, NH

DWG NO GP2

SHEET 6 OF 36

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ZION HILL ROAD PLAN VIEW
SCALE: 1 INCH = 20 FT.

ISSUE FOR		FOR BIDDING		CONSTRUCTION		RECORD DRAWING	
Date	By	Date	By	Date	By	Date	By
12/18/17	PM	12/18/17	PM				

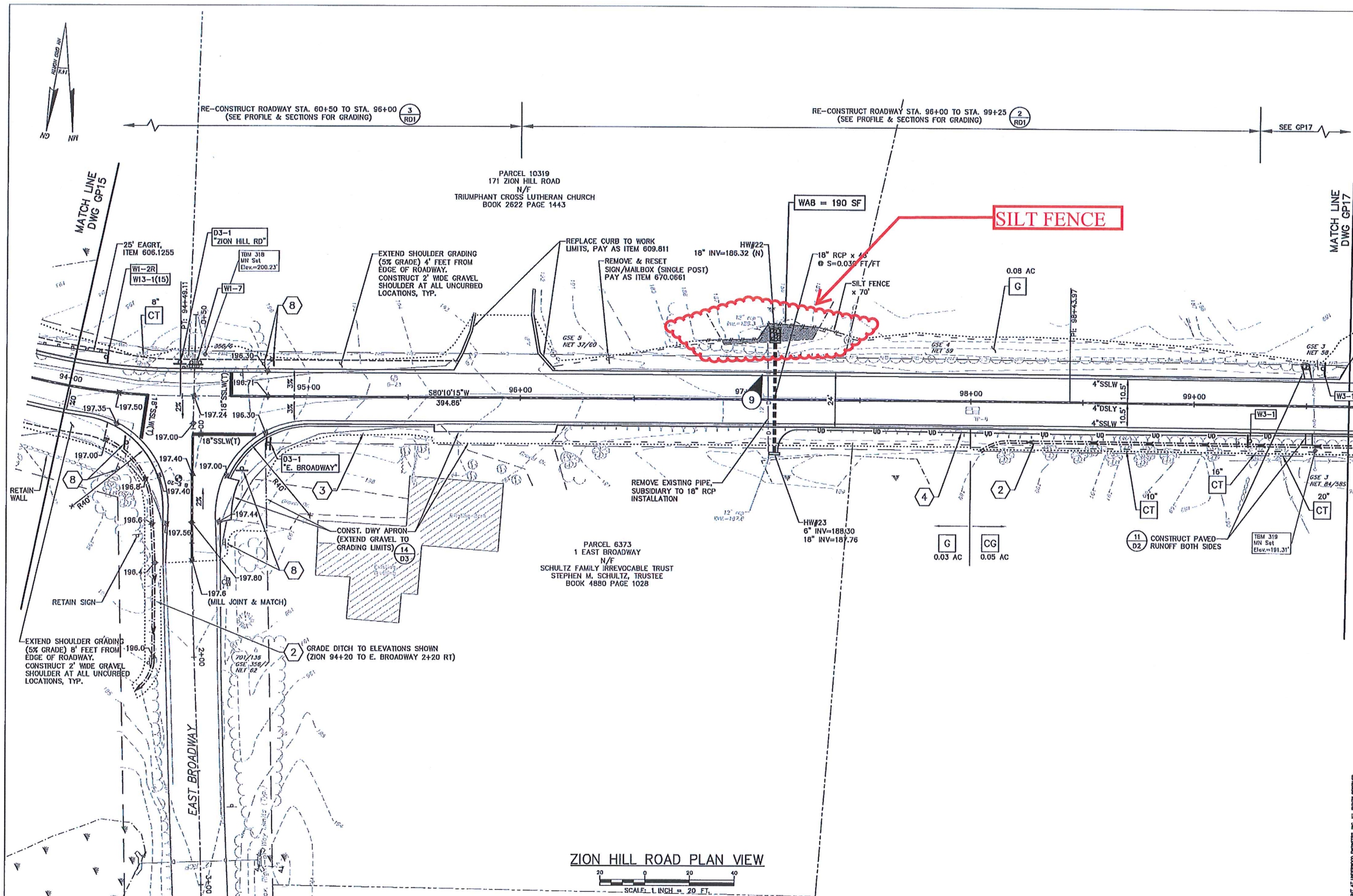
Drawn/Chk.	RMG	Checked	PM	Approved	PM	Project No.	Dwg. ID	Scale	AS SHOWN
						2224	2224 base		

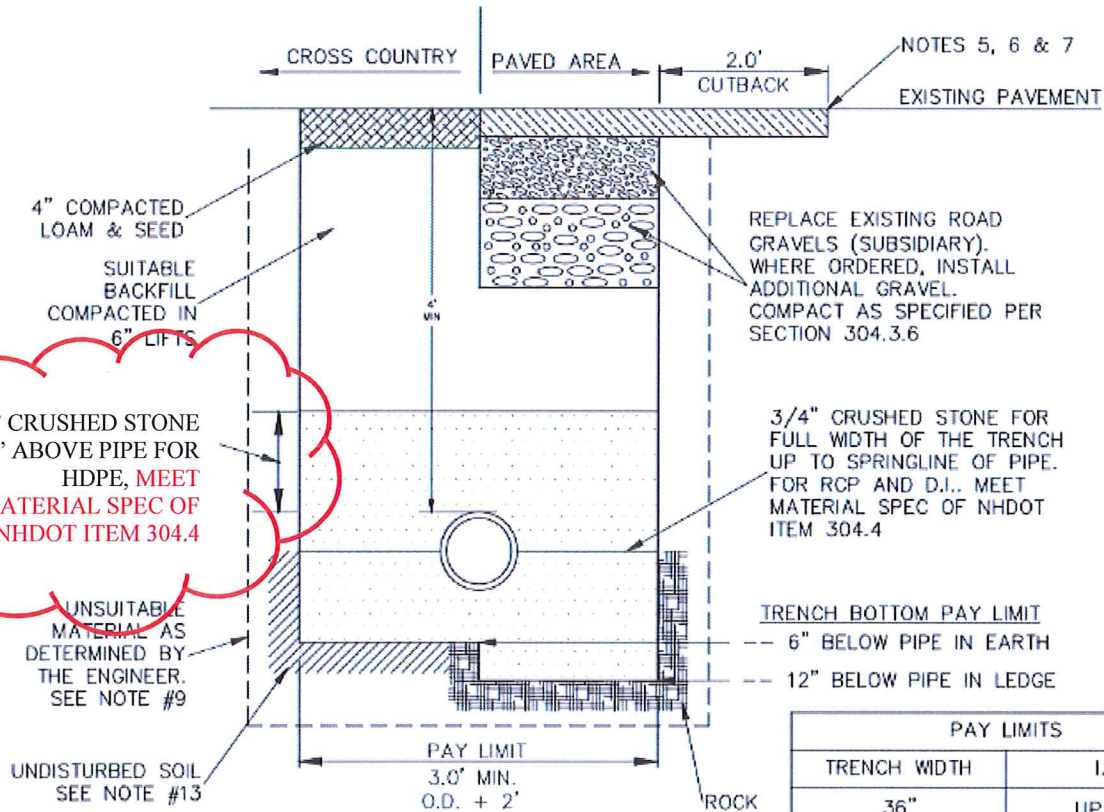
UNDERWOOD engineers
25 Vaughan Mall, Portsmouth, N.H. 03801
Tel. 603-436-6192 Fax. 603-431-4733

ZION HILL ROAD GENERAL PLANS	TOWN OF SALEM, NH
ZION HILL ROAD IMPROVEMENTS	

DWG NO GP12	SHEET 16 OF 36
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6
D2
TYPICAL DRAIN TRENCH DETAIL
NOT TO SCALE

PAY LIMITS	
TRENCH WIDTH	I.D.
36"	UP TO 12"
I.D. + 24"	12" TO 24"
2 x I.D.	OVER 24"

Addendum #1
Typical Drain Trench Detail
Zion Hill Road Reconstruction
Salem, New Hampshire



DATE
1/17/18

FIGURE
A-2

ADDENDUM #1 - ATTACHMENT "B"

BID 00301A-3

CONTRACTOR'S BID SCHEDULE

Item No.	Est. Quantity	Units	Item Description (and Unit Price written in words)	Unit Price	Amount
201.02	0.7	Ac.	Grubbing (F): _____ Dollars and _____ Cents per	Ac.	
201.1	0.3	Ac.	Clearing and Grubbing (F): _____ Dollars and _____ Cents per	Ac.	
201.21	50	Ea.	Removing small trees: _____ Dollars and _____ Cents per	Ea.	
201.22	5	Ea.	Removing large trees: _____ Dollars and _____ Cents per	Ea.	
201.321	1	LS	Tree Pruning and Trimming: _____ Dollars and _____ Cents per	LS	
201.4	30	Ea.	Removing Stumps: _____ Dollars and _____ Cents per	Ea.	
202.41	110	LF	Removal of Existing Pipe (0 to 24"): _____ Dollars and _____ Cents per	LF	
202.5	3	LF	Removal of Catch Basins, Drop Inlets & Manholes: _____ Dollars and _____ Cents per	LF	
203.1	4,300	CY	Common Excavation (F): _____ Dollars and _____ Cents per	CY	
203.4	100	CY	Muck/Unsuitable Material Excavation: _____ Dollars and _____ Cents per	CY	
203.55552	2	Unit	Guardrail Eagrt Platform Alternate, TL 2: _____ Dollars and _____ Cents per	Unit	

ADDENDUM #1 - ATTACHMENT "B"

BID 00301A-4

Item No.	Est. Quantity	Units	Item Description (and Unit Price written in words)	Unit Price	Amount
203.6	600	CY	Embankment-in-Place (F): Dollars and Cents per	CY	
206.19	100	CY	Common Structure Excavation - exploratory: Dollars and Cents per	CY	
206.2	300	CY**	Rock Structure Excavation: Dollars and Cents per	CY**	
214	1	Unit	Fine Grading: Dollars and Cents per	Unit	
304.2	100	CY	Additional Gravel (where directed): Dollars and Cents per	CY	
304.3	200	CY	Additional Crushed Gravel (where directed): Dollars and Cents per	CY	
304.33	300	CY	Crushed Aggregate for Shoulders: Dollars and Cents per	CY	
304.4	360 800	CY	Crushed Stone, Fine Gradation (F): Dollars and Cents per	CY	
304.5	1,450	CY	Crushed Stone, Coarse Gradation (F): Dollars and Cents per	CY	
306.110	10,200	SY	Reclaimed Stabilized Base, Processed in Place (10" Depth): Dollars and Cents per	SY	
306.210	1,800	SY	Reclaimed Stabilized Base, Remove & Rehandle (10" Depth): Dollars and Cents per	SY	
306.36	1,200	Ton	Stone for Reclaimed Stabilized Base: Dollars and Cents per	Ton	

ADDENDUM #1 - ATTACHMENT "B"

BID 00301A-5

Item No.	Est. Quantity	Units	Item Description (and Unit Price written in words)	Unit Price	Amount
403.11A	3,000	Ton	Hot Bit. Pavement - Machine Method (Binder): Dollars and _____ Cents per _____	Ton	
403.11B	2,950	Ton	Hot Bit. Pavement - Machine Method (Wearing Course): Dollars and _____ Cents per _____	Ton	
403.12	500	Ton	Hot Bit. Pavement - Hand Method: Dollars and _____ Cents per _____	Ton	
417	12,000	SY	Cold planing bituminous surfaces: Dollars and _____ Cents per _____	SY	
572.1	1,500	LF	Re-Construct Stone Wall (Single Stone Wide): Dollars and _____ Cents per _____	LF	
572.3	200	LF	Re-Construct Stone Wall (Double Faced): Dollars and _____ Cents per _____	LF	
585.31	40	CY	Stone fill, Class C1: Dollars and _____ Cents per _____	CY	
593.211	100	SY	Geotextile-Separation, Class 1, Non Woven: Dollars and _____ Cents per _____	SY	
593.320	260	SY	Geotextile, Stabilization (in drainage swales and where ordered): Dollars and _____ Cents per _____	SY	
603.00212	1,680	LF	12" Rein. Conc. Pipe, 2000D: Dollars and _____ Cents per _____	LF	
603.00315	122	LF	15" Rein. Conc. Pipe, 3000D: Dollars and _____ Cents per _____	LF	

ADDENDUM #1 - ATTACHMENT "B"

BID 00301A-6

Item No.	Est. Quantity	Units	Item Description (and Unit Price written in words)	Unit Price	Amount
603.00318	207	LF	18" Rein. Conc. Pipe, 3000D: ____ Dollars and ____ Cents per	LF	
603.33212	4 2	Ea.	12" PE End Section: ____ Dollars and ____ Cents per	Ea.	
603.33215	4 2	Ea.	15" PE End Section: ____ Dollars and ____ Cents per	Ea.	
603.82212	45	LF	12" PE Pipe (Smooth Interior): ____ Dollars and ____ Cents per	LF	
603.82215	61	LF	15" PE Pipe (Smooth Interior): ____ Dollars and ____ Cents per	LF	
604.0007	9	Ea.	Polyethylene Liners: ____ Dollars and ____ Cents per	Ea.	
604.12	9	Unit	Catch Basin, Type B (or "B-Hive in Ditches): ____ Dollars and ____ Cents per	Unit	
604.122	1	Unit	Catch Basin, Type B, 2 ft. Dia.: ____ Dollars and ____ Cents per	Unit	
604.32	8	Unit	Drainage Manholes: ____ Dollars and ____ Cents per	Unit	
604.9	3	Unit	4' Dia. Infiltration Basin: ____ Dollars and ____ Cents per	Unit	
604.4	1	LF	Re-Constructing/Adjusting Catch Basins: ____ Dollars and ____ Cents per	LF	

ADDENDUM #1 - ATTACHMENT "B"
BID 00301A-7

Item No.	Est. Quantity	Units	Item Description (and Unit Price written in words)		Unit Price	Amount
605.508	80	LF	8" Perf. CPE Pipe (Underdrain): _____ Dollars and _____ Cents per	LF		
605.82251	2,657	LF	24" Aggregate Underdrain, Type 2 w/6 Perf. PE Pipe: _____ Dollars and _____ Cents per	LF		
606.12	137.5	LF	Beam Gaurdrail, Standard Section, Steel Post: _____ Dollars and _____ Cents per	LF		
606.1255	2	Unit	Beam Gaurdrail, 25'EAGRT - Steel Post: _____ Dollars and _____ Cents per	Unit		
607.98	300	LF	Reset Miscellaneous Fences: _____ Dollars and _____ Cents per	LF		
609.811	2,600 3,200	LF	Bituminous Curb (Modified Cape Cod Curb): _____ Dollars and _____ Cents per	LF		
615.03	205	Sq. Ft.	Traffic Sign, Type C: _____ Dollars and _____ Cents per	Sq. Ft.		
615.06	15	Sq. Ft.	Traffic Sign, Type CC: _____ Dollars and _____ Cents per	Sq. Ft.		
616.68	3	Ea.	Relocate Stop Signs with Flashing Beacon & Solar Array: _____ Dollars and _____ Cents per	Ea.		
618.6	1	Allow	Uniformed Officers (Allowance): One Hudred Fifty Thousand Dollars and Zero Cents (Allow) per			
619.1	1	Unit	Maintenance of Traffic: _____ Dollars and _____ Cents per	Unit		
619.25	12	Month	Portable Changeable Message Sign: _____ Dollars and _____ Cents per	Month		
				Allow	\$150,000.00	\$150,000.00

ADDENDUM #1 - ATTACHMENT "B"

BID 00301A-8

Item No.	Est. Quantity	Units	Item Description (and Unit Price written in words)	Unit Price	Amount
621.31	10	Ea.	Single Delineator with Post: _____ Dollars and _____ Cents per	Ea.	
622.55	10	Ea.	Remove and Reset Monuments: _____ Dollars and _____ Cents per	Ea.	
628.1	100	LF	Sawed Concrete Pavement: _____ Dollars and _____ Cents per	LF	
628.2	2,800	LF	Sawed Bituminous Pavement: _____ Dollars and _____ Cents per	LF	
632.0104	36,000	LF	Retroreflective Paint Pave. Marking, 4" Line: _____ Dollars and _____ Cents per	LF	
632.02	700	Sq. Ft.	Retroreflective Paint Pave. Marking, Symbol/Word: _____ Dollars and _____ Cents per	Sq. Ft.	
632.3118	170	LF	Retroreflective Thermo. Pave. Marking, 18 in (stop bars): _____ Dollars and _____ Cents per	LF	
645.44	150	SY	Temporary Slope Stabilization Type D (Wildlife Friendly): _____ Dollars and _____ Cents per	SY	
645.512	100	LF	Compost Sock for Erosion & Sediment Control: _____ Dollars and _____ Cents per	LF	
645.531	400	LF	Silt fence: _____ Dollars and _____ Cents per	LF	
645.533	9	Ea.	Inlet Filter Basket: _____ Dollars and _____ Cents per	Ea.	

ADDENDUM #1 - ATTACHMENT "B"

BID 00301A-9

Item No.	Est. Quantity	Units	Item Description (and Unit Price written in words)	Unit Price	Amount
645.7	1	Unit	Storm Water Pollution Prevention Plan: Dollars and Cents per	Unit	
645.71	100	HR	Monitoring SWPPP and Erosion and Sediment Controls: Dollars and Cents per	HR	
646.512	10,000	SY	Turf establishment with mulch, tackifiers and loam (F): Dollars and Cents per	SY	
651.001	5	Ea.	Evergreen Tree, 6'-8' High: Dollars and Cents per	Ea.	
652.002	1.5	Ea.	Deciduous Tree, 2-1/2" to 3" Caliper: Dollars and Cents per	Ea.	
652.003	5	Ea.	Deciduous Tree, 3-1/2" to 4-1/2" Caliper: Dollars and Cents per	Ea.	
670.0661	25	Ea.	Remove & Re-set Single or Double Mailbox Assemblies: Dollars and Cents per	Ea.	
692	1	Unit	Mobilization: Dollars and Cents per	Unit	
900.1	17	Unit	Rein. Conc. PC-1 Headwall (12" to 18" dia. pipe): Dollars and Cents per	Unit	
900.2	4	Unit	Rein. Conc. Headwall (2 pipes to 18" dia.): Dollars and Cents per	Unit	
900.3	3	Unit	Rein. Conc. Headwall (for underdrain): Dollars and Cents per	Unit	

ADDENDUM #1 - ATTACHMENT "B"

BID 00301A-10

Item No.	Est. Quantity	Units	Item Description (and Unit Price written in words)	Unit Price	Amount
912	1	LS	R&R Landscaping: Dollars and Cents per	LS	
1010.2	1	Allow	Asphalt Cement Adjustment: Ten Thousand Dollars and Zero Cents (Allow.) per	Allow	

Total Base Bid \$

Name of Contractor:

Date:

Notes to Bidders:

1. Contract award is dependent on Town appropriation of funds (March 2018).
2. ** Means Indeterminate Quantity.
3. The owner reserves the right to waive any informalities or minor defects or reject any and all bids and to take any other action that is in the best interest of the Town.
4. Unit prices in words shall govern over unit prices in numbers in determination of bid.

ROAD RE-CONSTRUCTION:

Sta.	Lgth (feet)	Paved Width (feet)	Exist. CL Elev. (EG)	Design CL Elev. (DG)	Δ C.L. (DG-EG)	SG Elev.	Excav Depth EG-SG (feet)	Excav Width (feet)	Item 203.1 Common Excav. (F) (Cu. Yds.)	Item 304.3 Cr. Grav. (Cu. Yds.)	Item 304.4 Cr. Stone, F. Grad, 6" Depth (Cu. Yds.)	Item 304.5 Cr. Stone, C. Grad, 12" Depth (Cu. Yds.)	Item 306.110 Recl. Base, Proc. In Place, 10" Depth (Sq. Yds.)	Item 306.210 Recl. Base, Rem. & Reh., 10" Depth (Sq. Yds.)	Item 306.36 Cr. Stone Agg., Blended with Reclaim Base (Tons)	Item 403.11A H.B.P. - Binder, 3" Depth (Tons)	Item 403.11B H.B.P. - Wearing, 1.5" Depth (Tons)
43+80		25.5	209.7	209.78	0.08	207.78	1.92	28.0	(Note 1)	(Note 2)			(Note 3)	(Note 4)			
44+00	20	25.5	208.2	208.15	(0.05)	206.15	2.05	28.0			10.4	20.7				9.6	5.1
44+50	50	24.0	204.7	204.52	(0.18)	202.52	2.18	28.0			25.9	51.9				23.4	12.4
45+00	50	24.0	201.4	201.54	0.14	199.54	1.85	28.0			25.9	51.9				22.7	12.0
45+50	50	24.0	199.0	199.19	0.19	197.19	1.81	28.0			25.9	51.9				22.7	12.0
46+00	50	24.0	197.6	197.47	(0.13)	195.47	2.13	28.0			25.9	51.9				22.7	12.0
46+50	50	24.0	195.6	196.40	(0.20)	194.40	2.20	28.0			25.9	51.9				22.7	12.0
47+00	50	24.0	195.2	195.96	(0.24)	193.96	2.24	28.0			25.9	51.9				22.7	12.0
47+50	50	24.0	195.2	196.11	(0.09)	194.11	2.09	28.0			25.9	51.9				22.7	12.0
48+00	50	24.0	195.3	196.37	0.07	194.37	1.93	28.0	104.2		25.9	51.9				22.7	12.0
54+50		24.0	198.8	198.85	0.05	196.85	1.95	28.0								0.0	
55+00	50	24.0	198.3	198.25	(0.05)	196.25	2.05	28.0	103.7		25.9	51.9				22.7	12.0
55+50	50	24.0	197.9	197.85	(0.05)	195.85	2.05	28.0	106.3		25.9	51.9				22.7	12.0
56+00	50	24.0	197.4	197.45	0.05	195.45	1.95	28.0	103.7		25.9	51.9				22.7	12.0
56+50	50	24.0	197.0	197.09	0.09	195.09	1.91	28.0	100.1		25.9	51.9				22.7	12.0
57+00	50	24.0	195.6	196.79	0.19	194.79	1.81	28.0	98.4		25.9	51.9				22.7	12.0
57+50	50	24.0	195.4	196.49	0.09	194.49	1.91	28.0	96.4		25.9	51.9				22.7	12.0
58+00	50	24.0	195.3	196.21	(0.09)	194.21	2.09	28.0	103.7		25.9	51.9				22.7	12.0
58+50	50	24.0	195.3	196.35	0.05	194.35	1.95	28.0	104.7		25.9	51.9				22.7	12.0
59+00	50	24.0	195.6	196.70	0.10	194.70	1.90	28.0	99.8		25.9	51.9				22.7	12.0
59+50	50	24.0	195.9	197.05	0.15	195.05	1.85	28.0	97.2		25.9	51.9				22.7	12.0
60+00	50	24.0	197.2	197.40	0.20	195.40	1.80	28.0	94.6		25.9	51.9				22.7	12.0
60+50	50	24.0	197.8	197.90	0.10	195.90	1.90	28.0	95.9		25.9	51.9				22.7	12.0
60+50		24.0	197.8	197.90	0.10	197.52	0.28	28.0									
61+00	50	24.0	198.4	198.40	0.00	198.02	0.38	28.0	17.1				133		14.0	22.7	12.0
62+00	100	24.0	199.1	199.43	0.33	199.05	0.05	28.0	22.3				267		28.0	45.4	24.0
63+00	100	24.0	200.0	200.53	0.53	200.15	0.00	28.0	2.6				267		28.0	45.4	24.0
64+00	100	24.0	201.5	201.93	0.43	201.55	0.00	28.0	0.0				267		28.0	45.4	24.0
65+00	100	24.0	203.5	203.63	0.13	203.25	0.25	28.0	13.0				267		28.0	45.4	24.0
66+00	100	25.5	205.4	205.63	0.23	205.25	0.15	29.5	21.3				275		28.0	45.4	24.0
67+00	100	25.5	207.1	207.63	0.53	207.25	0.00	29.5	8.2				283		28.0	48.2	25.5
68+00	100	25.5	208.6	208.63	0.03	208.25	0.35	29.5	19.1				283		28.0	48.2	25.5
69+00	100	25.5	209.1	209.63	0.53	209.25	0.00	29.5	19.1				283		28.0	48.2	25.5
70+00	100	25.5	209.3	209.83	0.53	209.45	0.00	29.5	0.0				283		28.0	48.2	25.5
71+00	100	25.5	209.9	210.43	0.53	210.05	0.00	29.5	0.0				283		28.0	48.2	25.5
72+00	100	24.0	210.3	211.03	0.73	210.65	0.00	28.0	0.0				275		28.0	46.8	24.8
73+00	100	24.0	211.6	211.72	0.12	211.34	0.26	28.0	13.5				267		28.0	45.4	24.0
74+00	100	24.0	212.9	213.08	0.18	212.70	0.20	28.0	23.9				267		28.0	45.4	24.0
75+00	100	24.0	214.4	214.78	0.38	214.40	0.00	28.0	10.4				267		28.0	45.4	24.0
76+00	100	24.0	215.9	216.37	0.47	215.99	0.00	28.0	0.0				267		28.0	45.4	24.0
77+00	100	24.0	216.8	217.28	0.48	216.90	0.00	28.0	0.0				267		28.0	45.4	24.0
78+00	100	24.0	217.5	218.08	0.58	217.70	0.00	28.0	0.0				267		28.0	45.4	24.0
78+50	50	32.0	218.0	218.48	0.48	218.10	1.20	4.5	10.0	6.9			133		14.0	26.5	14.0
79+00	50	32.0	218.3	218.76	0.46	218.38	1.20	9.0	20.0	13.8			133		14.0	30.2	16.0
80+00	100	32.0	217.9	218.08	0.18	217.70	1.20	9.0	40.0	27.7			267		28.0	60.5	32.0
81+00	100	32.0	216.8	217.28	0.48	216.90	1.20	9.0	40.0	27.7			267		28.0	60.5	32.0
82+00	100	32.0	215.4	216.48	1.08	216.10	1.20	9.0	40.0	27.7			267		28.0	60.5	32.0
82+90	90	32.0	214.4	214.86	0.46	214.48	1.20	9.0	36.0	24.9			240		25.2	54.4	28.8
82+90		24.0	214.4	214.86	0.46	214.48	0.00	28.0	0.0				0		0.0	0.0	0.0
83+00	10	24.0	214.3	214.68	0.38	214.30	0.00	28.0	8.6				27		2.8	5.3	2.4
84+00	100	24.0	213.6	214.13	0.33	213.75	0.05	28.0	2.6				267		28.0	45.4	24.0
85+00	100	24.0	214.1	214.59	0.49	214.21	0.00	28.0	2.6				267		28.0	45.4	24.0
86+00	100	24.0	213.1	213.55	0.45	213.17	0.00	28.0	0.0				267		28.0	45.4	24.0
87+00	100	24.0	211.6	212.20	0.60	211.82	0.00	28.0	0.0				267		28.0	45.4	24.0
88+00	100	24.0	210.4	210.60	0.20	210.22	0.18	28.0	9.3				267		28.0	45.4	24.0
89+00	100	24.0	208.6	208.99	0.39	208.61	0.00	28.0	9.3				267		28.0	45.4	24.0
90+00	100	24.0	205.2	207.07	0.87	206.69	0.00	28.0	0.0				267		28.0	45.4	24.0
91+00	100	24.0	202.8	203.19	0.39	202.81	0.00	28.0	0.0				267		28.0	45.4	24.0
91+50	50	24.0	201.2	201.38	0.18	201.00	0.20	28.0	5.2				133		14.0	22.7	12.0
91+50		24.0	201.2	201.38	0.18	200.17	0.20	28.0									
92+00	50	24.0	199.8	200.13	0.33	199.92	0.05	28.0	6.5								
93+00	100	24.0	198.1	198.35	0.25	197.14	0.13	28.0	9.3				133		14.0	22.7	12.0
94+00	100	24.0	197.9	197.65	(0.25)	196.44	0.63	38.0	46.4				267		28.0	45.4	24.0
94+50	50	24.0	198.1	197.24	(0.06)	196.03	1.24	28.0	102.2				133		14.0	22.7	12.0
95+00	50	24.0	198.3	198.44	0.14	195.23	0.24	28.0	63.4				133		14.0	22.7	12.0
96+00	100	24.0	192.8	193.60	0.80	192.39	0.00	28.0	12.4				267		28.0	45.4	24.0
96+00		24.0	192.8	193.60	0.80	191.60	1.20	28.0									
96+50	50	24.0	191.6	192.75	1.15	190.75	0.85	28.0	53.1		25.9	51.9				22.7	12.0
97+00	50	24.0	190.9	192.43	1.53	190.43	0.47	28.0	34.2		25.9	51.9				22.7	12.0
97+50	50	24.0	190.6	192.18	1.58	190.18	0.42	28.0	23.1		25.9	51.9				22.7	12.0
98+00	50	24.0	190.5	191.93	1.43	189.93	0.57	28.0	25.7		25.9	51.9				22.7	12.0
98+50	50	24.0	190.7	191.68	0.98	189.68	1.02	28.0	41.2		25.9	51.9				22.7	12.0
99+00	50	24.0	190.7	191.43	0.73	189.43	1.27	28.0	59.4		25.9	51.9				22.7	12.0
99+25	25	24.0	190.7	191.30	0.60	189.30	1.40	28.0	34.6		13.0	25.9				11.3	6.0
99+25		24.0	190.7	191.30	0.60	190.90	0.00	28.0									
100+00	75	24.0	191.2	191.44	0.24	191.04	0.14	28.0	5.4				200		21.0	34.0	18.0
101+00	100	24.0	193.0	193.63	0.63	193.23	0.00	28.0	7.3				267		28.0	45.4	24.0
102+00	100	24.0	195.5	196.90	0.40	195.50	0.50	10.0	17.6				267		28.0	45.4	24.0
103+00	100	24.0	200.2	200.17	(0.03)	199.77	0.41	44.0	45.5				267		28.0	45.4	24.0
104+00	100	30.0	203.1	203.14	0.04	202.74	0.34	60.0	72.2				300		28.0	51.0	27.0
104+20	20	90.0	203.6	203.60	0.00	203.20	0.38	80.0	18.7				133		5.6	22.7	12.0
Briarwood	25	34.0		</													