DRAINAGE REPORT
66 Kings Highway North
Westport, CT

- PREPARED FOR —

Scott & Margaret G. Buddenhagen

November 20, 2023
Rev. July 18, 2024 (Increase Proposed Driveway Area)

- PREPARED BY -

Ochman Associates, Inc.
Engineers & Surveyors
PO Box 76, Easton, CT 06612 PH: 203 268 9194

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Drainage Report for 66 Kings Highway North, Westport, CT

1.   Site Description:

The subject property is a 17,036 square foot parcel of land located on the east side of Kings Highway North in Westport, Connecticut.

2.   Existing Conditions:

The property currently has an existing 1.5 story residence, gravel driveway, rear patio, and front porch on it. The property slopes from west to east with slopes on average in the range of 1% to 20%.   Existing soils on the property are listed as Charlton urban land complex, Soil Type B, as per the NRCS Soil Survey Maps. Deep test holes and a percolation test were performed on October 26, 2023, by Ochman Associates Inc. and their results are on the Site Plan prepared by Ochman Associates Inc.

3.   Proposed Conditions:

The client is proposing to remove the existing residence and construct a new residence, asphalt driveway, front porch and walk, rear patio/walk and detached garage with an ADU above. The proposed residence and ADU will be served by municipal sewer and public water. In order to attenuate runoff from the new impervious surfaces and to provide groundwater recharge, a system of underground infiltration galleries will be utilized to detain the runoff from the proposed house, asphalt driveway, and detached garage/ADU.

4.   Design Objectives:

In order to meet or exceed the Town of Westport drainage requirements, the detention system will be designed to accommodate the 25-year, 24-hour, Type III storm (6.4 inches). Exfiltration was considered in our design based on a percolation rate of 1" in 10 minutes. A factor of safety of 1.5 was applied against the percolation rates determined in the field. The post-construction peak flow rate will be less than the pre-construction peak flow rate.   Section 5 of the report is a summary of pre and post development peak flows from the site for the 25-year storm event. The system was also designed for water quality volume or the first 1" of runoff for all new impervious surfaces (Appendix C).

5.　　　Summary of Peak Flow Rate (25 Yr. Storm Event)

| Storm Event	25 Year
24-hour rainfall (in)	**6.4**
Pre-Dev. Peak Flow (cfs)	0.82
Post Dev. Peak Flow (cfs)	0.69

6.　　　Conclusion:

The use of (24) 12" high H-20 concrete galleries will be more than sufficient to meet the design objectives. The driveway runoff will be collected via (2) 18" x 18" catch basins and (1) 24" x 24" catch basin with 2' sump, for settling of sediment, prior to being routed through the (24) 12" high H-20 concrete galleries.   The roof area from the primary residence and detached garage will also be routed through this system. The footing drain will function mechanically. It will run into a 12" high gravel bed (20'W x 30'L x 1'H) with (3) rows of perforated pipe connected at ends prior to dispersing into a high-level overflow area drain with raprap located 30'+ upgradient from the property line. In conclusion, the post-construction peak flow rate will be less than the pre-construction peak flow rate (See Section 5). The Water Quality Volume storage is also met for all new impervious surfaces on the site (See Appendix C, 386 cf required & 590 cf provided). There is also no increase in impervious cover with a direct hydraulic connection to the Town of Westport storm drainage system (See Appendix E).

APPENDIX A – HydroCAD Analysis
(Pre-Construction
25 Year Type III Storm Event)
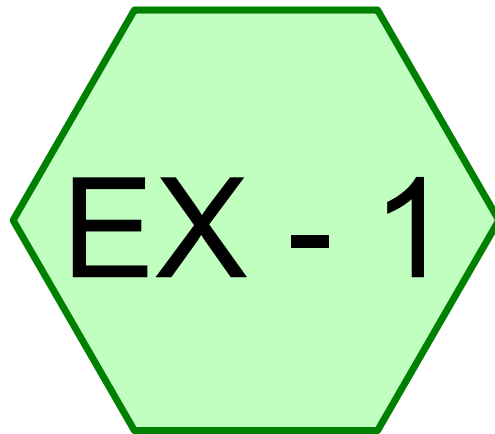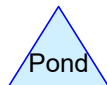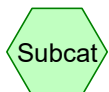
EX - 1

Treated As Lawn/Woods

KINGS HIGHWAY NORTH_66_PRE
Prepared by {enter your company name here}
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Type III 24-hr 25 yr storm Rainfall=6.40"
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Page 2

Time span=0.00-24.00 hrs, dt=0.05 hrs, 481 points
Runoff by SCS TR-20 method, UH=SCS, Weighted-CN
Reach routing by Stor-Ind+Trans method - Pond routing by Stor-Ind method

Subcatchment EX - 1: Treated As   Runoff Area=17,036 sf   0.00% Impervious   Runoff Depth>2.10"
Flow Length=195' Tc=8.3 min   CN=59   Runoff=0.82 cfs 2,974 cf

Total Runoff Area = 17,036 sf   Runoff Volume = 2,974 cf   Average Runoff Depth = 2.10"
100.00% Pervious = 17,036 sf   0.00% Impervious = 0 sf

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Type III 24-hr 25 yr storm Rainfall=6.40"
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Summary for Subcatchment EX - 1: Treated As Lawn/Woods

Runoff   =   0.82 cfs @ 12.13 hrs, Volume=   2,974 cf, Depth> 2.10"

Runoff by SCS TR-20 method, UH=SCS, Weighted-CN, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Type III 24-hr 25 yr storm Rainfall=6.40"

Area (sf)	CN	Description
12,536	61	>75% Grass cover, Good, HSG B
4,500	55	Woods, Good, HSG B
17,036	59	Weighted Average
17,036		100.00% Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
7.2	100	0.0390	0.23		**Sheet Flow, SHEET FLOW**
					Grass: Short n= 0.150 P2= 3.50"
1.1	95	0.0100	1.50		**Shallow Concentrated Flow, Shallow Concentrated**
					Grassed Waterway Kv= 15.0 fps
8.3	195	Total			

Subcatchment EX - 1: Treated As Lawn/Woods

Hydrograph

Type III 24-hr
25 yr storm Rainfall=6.40"
Runoff Area=17,036 sf
Runoff Volume=2,974 cf
Runoff Depth>2.10"
Flow Length=195'
Tc=8.3 min
CN=59

0.82 cfs
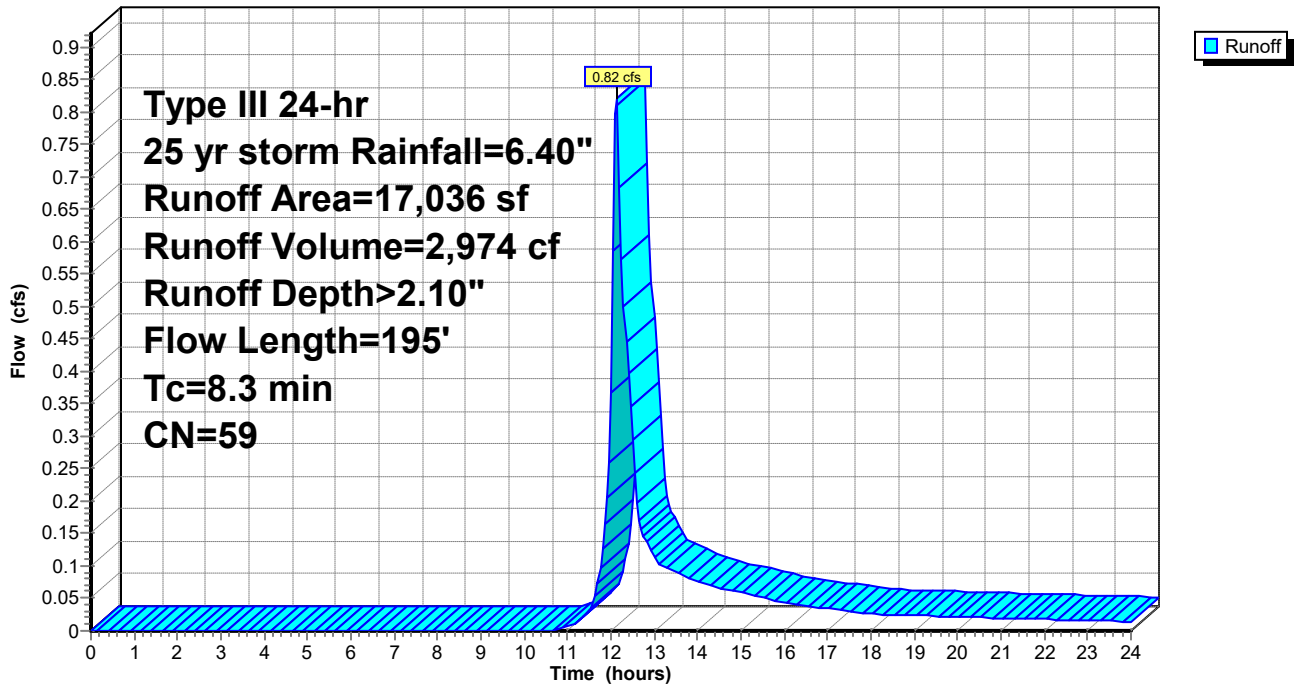
APPENDIX B – HydroCAD Analysis
(Post-Construction With Retention
25 Year Type III Storm Event)

Time span=0.00-24.00 hrs, dt=0.05 hrs, 481 points
Runoff by SCS TR-20 method, UH=SCS, Weighted-CN
Reach routing by Stor-Ind+Trans method - Pond routing by Stor-Ind method

Subcatchment BYPASS: BYPASS   Runoff Area=12,490 sf 4.12% Impervious Runoff Depth>2.36"
                                         Flow Length=195' Tc=8.3 min CN=62 Runoff=0.69 cfs 2,461 cf

Subcatchment DA -PR 1: DRIVEWAY &   Runoff Area=4,878 sf 100.00% Impervious Runoff Depth>6.16"
                                         Tc=3.0 min CN=98 Runoff=0.76 cfs 2,504 cf

Pond 1P: (24) 12" HIGH CONCRETE   Peak Elev=92.12' Storage=591 cf Inflow=0.76 cfs 2,504 cf
                                         Discarded=0.10 cfs 2,402 cf Primary=0.14 cfs 96 cf Outflow=0.24 cfs 2,498 cf

Pond 2P: FOOTING DRAIN (20' x 30' x 1') Gravel Peak Elev=90.51' Storage=2 cf Inflow=0.05 cfs 4,329 cf
                                         Outflow=0.05 cfs 4,325 cf

Link 2L: COMBINED HYDROGRAPH   Inflow=0.69 cfs 2,557 cf
                                         Primary=0.69 cfs 2,557 cf

Total Runoff Area = 17,368 sf   Runoff Volume = 4,965 cf   Average Runoff Depth = 3.43"
68.95% Pervious = 11,975 sf   31.05% Impervious = 5,393 sf

KINGS HIGHWAY NORTH_66_POST_REV_07_18_2 *Type III 24-hr 25 yr storm Rainfall=6.40"*

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Summary for Subcatchment BYPASS: BYPASS

Runoff   =   0.69 cfs @ 12.13 hrs, Volume=   2,461 cf, Depth> 2.36"

Runoff by SCS TR-20 method, UH=SCS, Weighted-CN, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Type III 24-hr 25 yr storm Rainfall=6.40"

Area (sf)	CN	Description
10,475	61	>75% Grass cover, Good, HSG B
1,500	55	Woods, Good, HSG B
* 480	98	Walk/Terrace Bypass, HSG B
* 35	98	Mech Pad, HSG B
12,490	62	Weighted Average
11,975		95.88% Pervious Area
515		4.12% Impervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
7.2	100	0.0390	0.23		**Sheet Flow, SHEET FLOW**
					Grass: Short n= 0.150 P2= 3.50"
1.1	95	0.0100	1.50		**Shallow Concentrated Flow, Shallow Concentrated**
					Grassed Waterway Kv= 15.0 fps
8.3	195				Total

Subcatchment BYPASS: BYPASS

Hydrograph

Type III 24-hr
25 yr storm Rainfall=6.40"
Runoff Area=12,490 sf
Runoff Volume=2,461 cf
Runoff Depth>2.36"
Flow Length=195'
Tc=8.3 min
CN=62

0.69 cfs

□ Runoff

Summary for Subcatchment DA -PR 1: DRIVEWAY & PRIMARY & ADU ROOF AREA

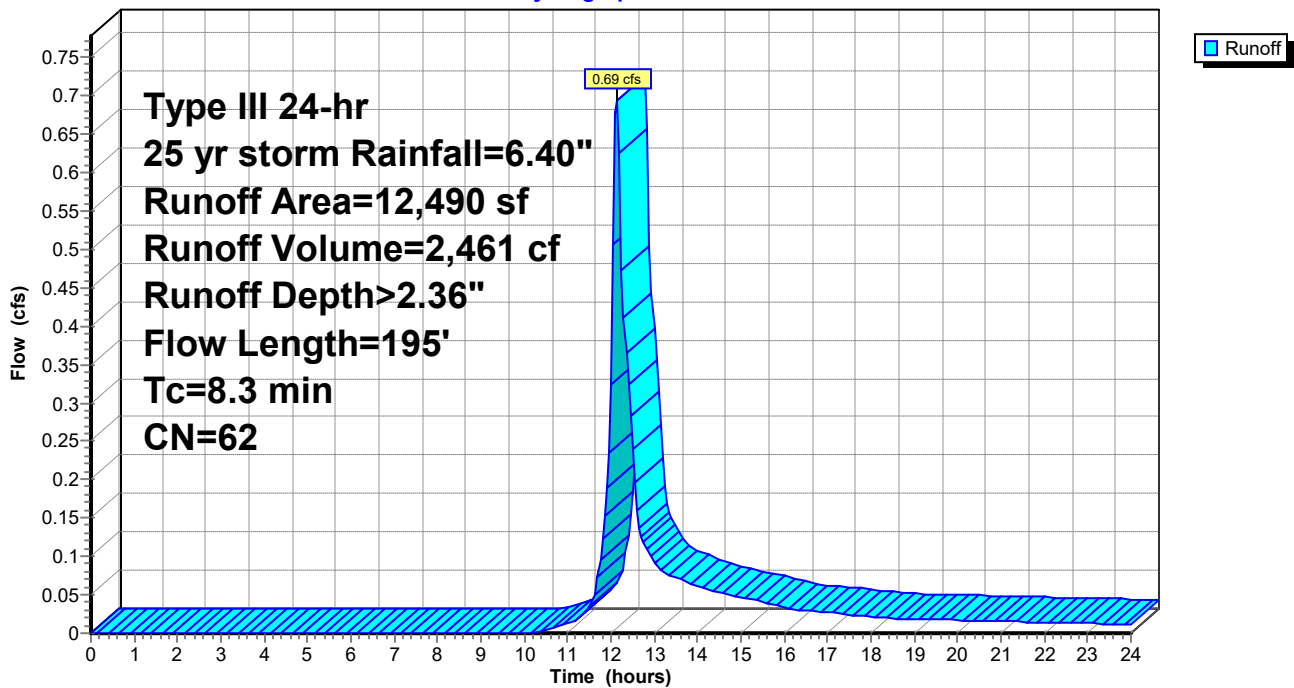Runoff   =   0.76 cfs @ 12.05 hrs, Volume=   2,504 cf, Depth> 6.16"

Runoff by SCS TR-20 method, UH=SCS, Weighted-CN, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Type III 24-hr 25 yr storm Rainfall=6.40"

	Area (sf)	CN	Description
	2,259	98	Paved parking, HSG B
	2,514	98	Roofs, HSG B
*	105	98	Walkway, HSG B
	4,878	98	Weighted Average
	4,878		100.00% Impervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
3.0					**Direct Entry, DIRECT**

Subcatchment DA -PR 1: DRIVEWAY & PRIMARY & ADU ROOF AREA
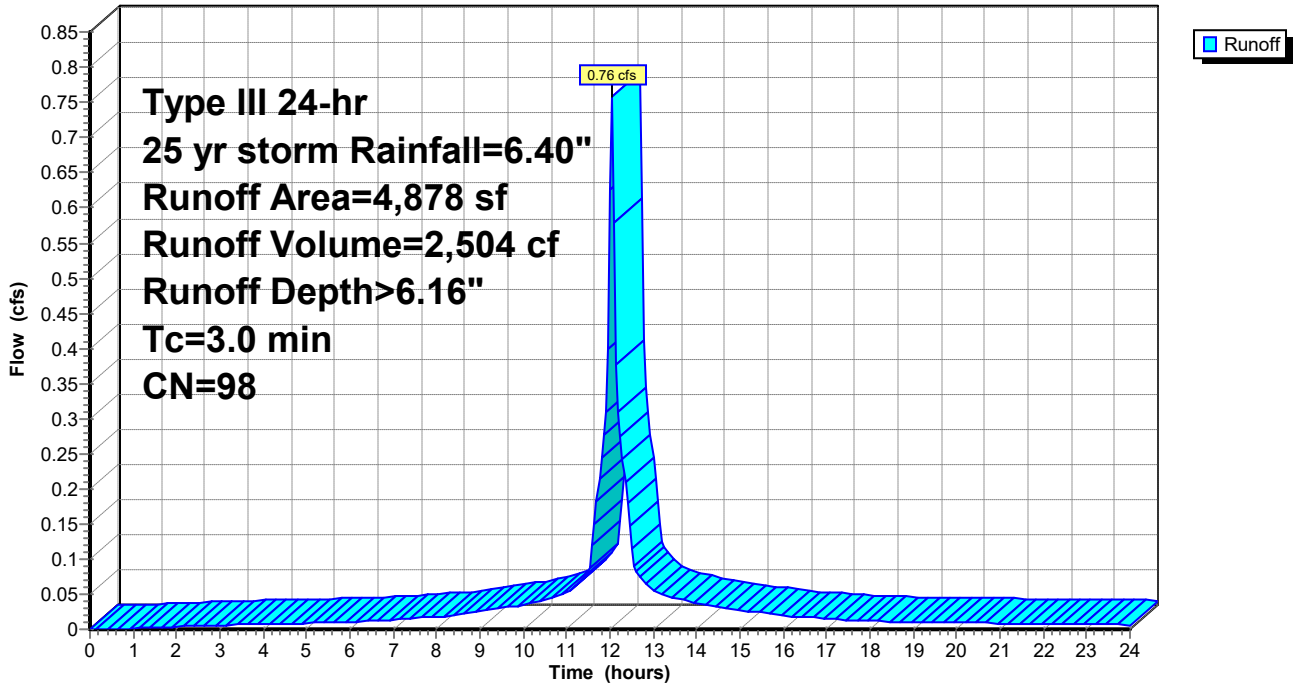
Summary for Pond 1P: (24) 12" HIGH CONCRETE GALLERIES

Inflow Area =   4,878 sf, 100.00% Impervious, Inflow Depth > 6.16"   for 25 yr storm event
Inflow   =   0.76 cfs @ 12.05 hrs, Volume=   2,504 cf
Outflow   =   0.24 cfs @ 12.28 hrs, Volume=   2,498 cf, Atten= 68%, Lag= 14.0 min
Discarded   =   0.10 cfs @ 11.60 hrs, Volume=   2,402 cf
Primary   =   0.14 cfs @ 12.28 hrs, Volume=   96 cf

Routing by Stor-Ind method, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs / 4
Peak Elev= 92.12' @ 12.28 hrs   Surf.Area= 1,071 sf   Storage= 591 cf

Plug-Flow detention time= 34.6 min calculated for 2,498 cf (100% of inflow)
Center-of-Mass det. time= 32.9 min (774.2 - 741.3)

Volume	Invert	Avail.Storage	Storage Description
#1A	90.50'	130 cf	**21.00'W x 51.00'L x 1.00'H Field A**
			1,071 cf Overall - 745 cf Embedded = 326 cf x 40.0% Voids
#2A	90.50'	448 cf	**Concrete Galley 4x8x1** x 24 Inside #1
			Inside= 42.0"W x 9.0"H => 2.49 sf x 7.50'L = 18.7 cf
			Outside= 48.0"W x 12.0"H => 3.88 sf x 8.00'L = 31.0 cf
			24 Chambers in 4 Rows
#3	89.00'	14 cf	**2.00'W x 2.00'L x 3.50'H 2' x 2' CB** -Impervious
		592 cf	Total Available Storage

   Storage Group A created with Chamber Wizard

Device	Routing	Invert	Outlet Devices
#1	Discarded	90.50'	**4.000 in/hr Exfiltration over Surface area**
#2	Primary	92.00'	**4.0" Horiz. Orifice/Grate** C= 0.600 Limited to weir flow at low heads

Discarded OutFlow Max=0.10 cfs @ 11.60 hrs HW=90.50' (Free Discharge)
└─**1=Exfiltration** (Exfiltration Controls 0.10 cfs)

Primary OutFlow Max=0.14 cfs @ 12.28 hrs HW=92.12' (Free Discharge)
└─**2=Orifice/Grate** (Weir Controls 0.14 cfs @ 1.14 fps)

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Pond 1P: (24) 12" HIGH CONCRETE GALLERIES - Chamber Wizard Field A

Chamber Model = Concrete Galley 4x8x1 (Concrete Galley, UCPI 12" Low Profile Galley or equivalent)
Inside= 42.0"W x 9.0"H => 2.49 sf x 7.50'L = 18.7 cf
Outside= 48.0"W x 12.0"H => 3.88 sf x 8.00'L = 31.0 cf

6 Chambers/Row x 8.00' Long = 48.00' Row Length +18.0" End Stone x 2 = 51.00' Base Length
4 Rows x 48.0" Wide + 30.0" Side Stone x 2 = 21.00' Base Width
12.0" Chamber Height = 1.00' Field Height

24 Chambers x 18.7 cf = 448.1 cf Chamber Storage
24 Chambers x 31.0 cf = 745.0 cf Displacement

1,071.0 cf Field - 745.0 cf Chambers = 326.0 cf Stone x 40.0% Voids = 130.4 cf Stone Storage

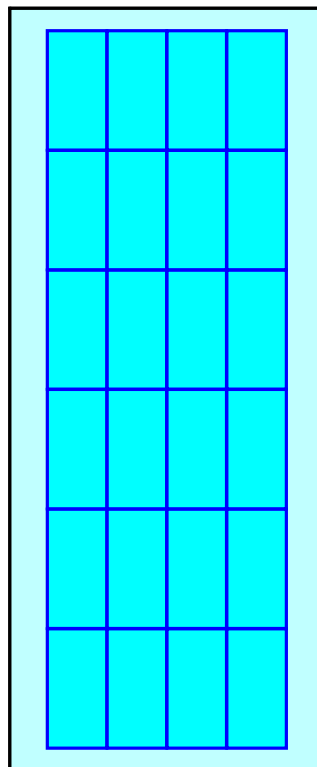Chamber Storage + Stone Storage = 578.5 cf = 0.013 af
Overall Storage Efficiency = 54.0%
Overall System Size = 51.00' x 21.00' x 1.00'

24 Chambers
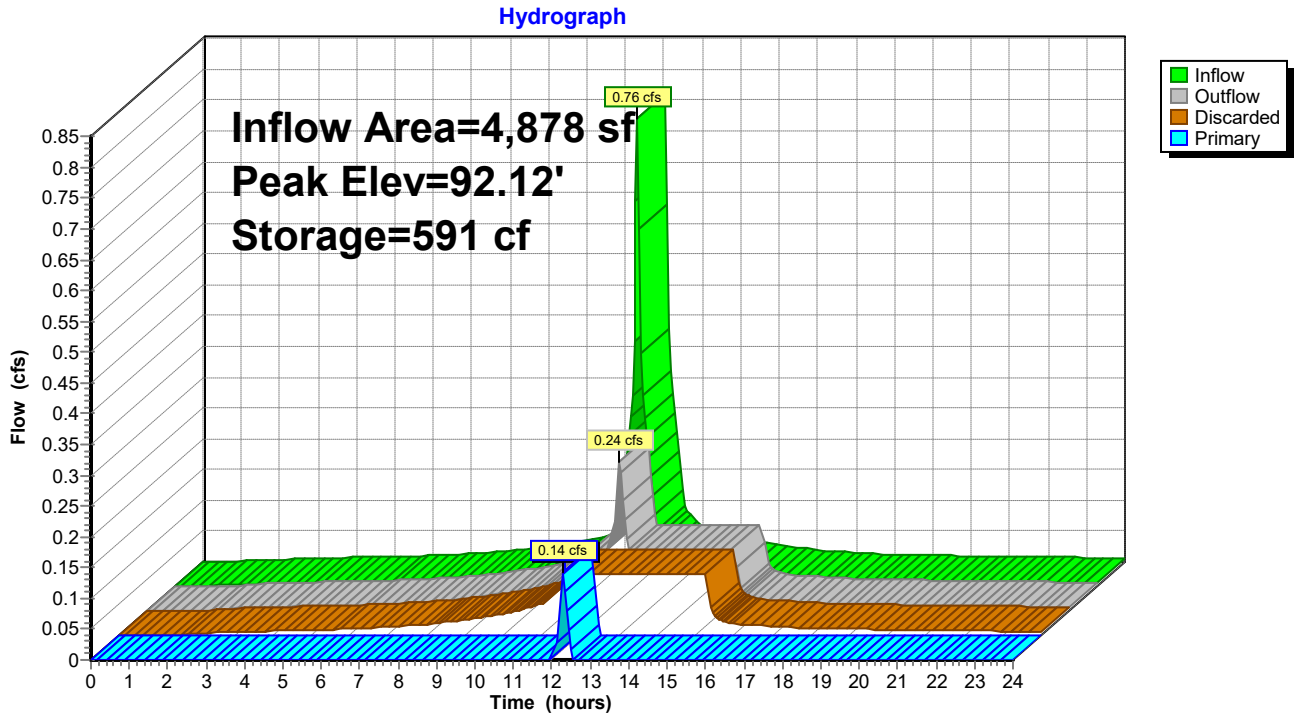39.7 cy Field
12.1 cy Stone

Pond 1P: (24) 12" HIGH CONCRETE GALLERIES

Hydrograph

Inflow Area=4,878 sf
Peak Elev=92.12'
Storage=591 cf

Legend:
- Inflow
- Outflow
- Discarded
- Primary

0.76 cfs
0.24 cfs
0.14 cfs

Flow (cfs) vs Time (hours)

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Stage-Area-Storage for Pond 1P: (24) 12" HIGH CONCRETE GALLERIES

Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)	Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)
89.00	0	0	91.55	1,071	589
89.05	0	0	91.60	1,071	589
89.10	0	0	91.65	1,071	589
89.15	0	1	91.70	1,071	589
89.20	0	1	91.75	1,071	589
89.25	0	1	91.80	1,071	590
89.30	0	1	91.85	1,071	590
89.35	0	1	91.90	1,071	590
89.40	0	2	91.95	1,071	590
89.45	0	2	92.00	1,071	590
89.50	0	2	92.05	1,071	591
89.55	0	2	92.10	1,071	591
89.60	0	2	92.15	1,071	591
89.65	0	3	92.20	1,071	591
89.70	0	3	92.25	1,071	591
89.75	0	3	92.30	1,071	592
89.80	0	3	92.35	1,071	592
89.85	0	3	92.40	1,071	592
89.90	0	4	92.45	1,071	592
89.95	0	4	92.50	1,071	**592**
90.00	0	4			
90.05	0	4			
90.10	0	4			
90.15	0	5			
90.20	0	5			
90.25	0	5			
90.30	0	5			
90.35	0	5			
90.40	0	6			
90.45	0	6			
90.50	**1,071**	6			
90.55	1,071	44			
90.60	1,071	81			
90.65	1,071	119			
90.70	1,071	156			
90.75	1,071	194			
90.80	1,071	232			
90.85	1,071	269			
90.90	1,071	307			
90.95	1,071	344			
91.00	1,071	382			
91.05	1,071	419			
91.10	1,071	456			
91.15	1,071	489			
91.20	1,071	522			
91.25	1,071	555			
91.30	1,071	562			
91.35	1,071	568			
91.40	1,071	575			
91.45	1,071	582			
91.50	1,071	588			

Summary for Pond 2P: FOOTING DRAIN (20' x 30' x 1') Gravel Trench

Inflow	=	0.05 cfs @	0.00 hrs,	Volume=	4,329 cf,	Incl. 0.05 cfs Base Flow
Outflow	=	0.05 cfs @	0.25 hrs,	Volume=	4,325 cf,	Atten= 0%, Lag= 15.0 min
Discarded	=	0.05 cfs @	0.25 hrs,	Volume=	4,325 cf	

Routing by Stor-Ind method, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs / 2
Peak Elev= 90.51' @ 0.20 hrs   Surf.Area= 600 sf   Storage= 2 cf

Plug-Flow detention time= 1.8 min calculated for 4,314 cf (100% of inflow)
Center-of-Mass det. time= 0.7 min (720.7 - 720.0)

Volume	Invert	Avail.Storage	Storage Description
#1	90.50'	240 cf	**20.00'W x 30.00'L x 1.00'H Gravel With 4" Perf pipe** 600 cf Overall x 40.0% Voids

Device	Routing	Invert	Outlet Devices
#1	Discarded	90.50'	**4.000 in/hr Exfiltration over Surface area**

Discarded OutFlow Max=0.06 cfs @ 0.25 hrs HW=90.51'   (Free Discharge)
└─**1=Exfiltration** (Exfiltration Controls 0.06 cfs)

Pond 2P: FOOTING DRAIN (20' x 30' x 1') Gravel Trench

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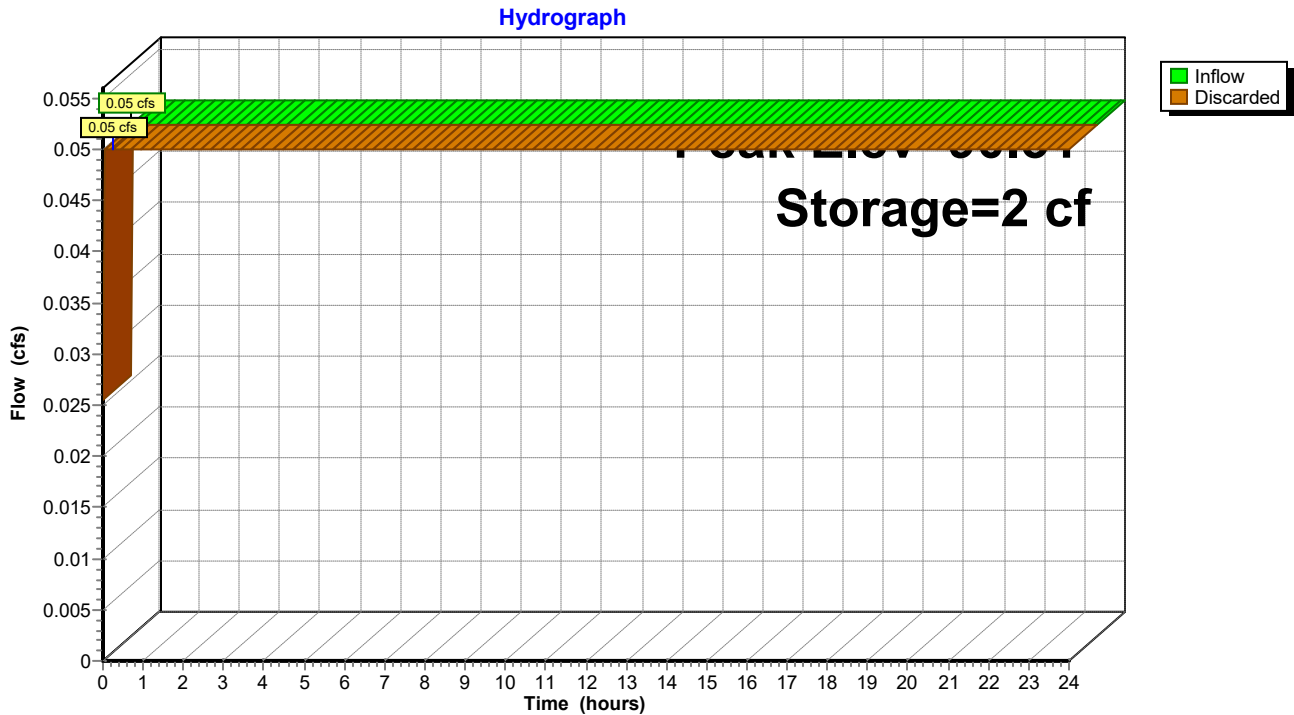
Stage-Area-Storage for Pond 2P: FOOTING DRAIN (20' x 30' x 1') Gravel Trench

Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)	Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)
90.50	**600**	0	91.01	600	122
90.51	600	2	91.02	600	125
90.52	600	5	91.03	600	127
90.53	600	7	91.04	600	130
90.54	600	10	91.05	600	132
90.55	600	12	91.06	600	134
90.56	600	14	91.07	600	137
90.57	600	17	91.08	600	139
90.58	600	19	91.09	600	142
90.59	600	22	91.10	600	144
90.60	600	24	91.11	600	146
90.61	600	26	91.12	600	149
90.62	600	29	91.13	600	151
90.63	600	31	91.14	600	154
90.64	600	34	91.15	600	156
90.65	600	36	91.16	600	158
90.66	600	38	91.17	600	161
90.67	600	41	91.18	600	163
90.68	600	43	91.19	600	166
90.69	600	46	91.20	600	168
90.70	600	48	91.21	600	170
90.71	600	50	91.22	600	173
90.72	600	53	91.23	600	175
90.73	600	55	91.24	600	178
90.74	600	58	91.25	600	180
90.75	600	60	91.26	600	182
90.76	600	62	91.27	600	185
90.77	600	65	91.28	600	187
90.78	600	67	91.29	600	190
90.79	600	70	91.30	600	192
90.80	600	72	91.31	600	194
90.81	600	74	91.32	600	197
90.82	600	77	91.33	600	199
90.83	600	79	91.34	600	202
90.84	600	82	91.35	600	204
90.85	600	84	91.36	600	206
90.86	600	86	91.37	600	209
90.87	600	89	91.38	600	211
90.88	600	91	91.39	600	214
90.89	600	94	91.40	600	216
90.90	600	96	91.41	600	218
90.91	600	98	91.42	600	221
90.92	600	101	91.43	600	223
90.93	600	103	91.44	600	226
90.94	600	106	91.45	600	228
90.95	600	108	91.46	600	230
90.96	600	110	91.47	600	233
90.97	600	113	91.48	600	235
90.98	600	115	91.49	600	238
90.99	600	118	91.50	600	**240**
91.00	600	120			

Summary for Link 2L: COMBINED HYDROGRAPH

Inflow Area =   17,368 sf, 31.05% Impervious, Inflow Depth >   1.77"   for 25 yr storm event
Inflow   =   0.69 cfs @   12.13 hrs, Volume=   2,557 cf
Primary   =   0.69 cfs @   12.13 hrs, Volume=   2,557 cf, Atten= 0%, Lag= 0.0 min

Primary outflow = Inflow, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs

Link 2L: COMBINED HYDROGRAPH
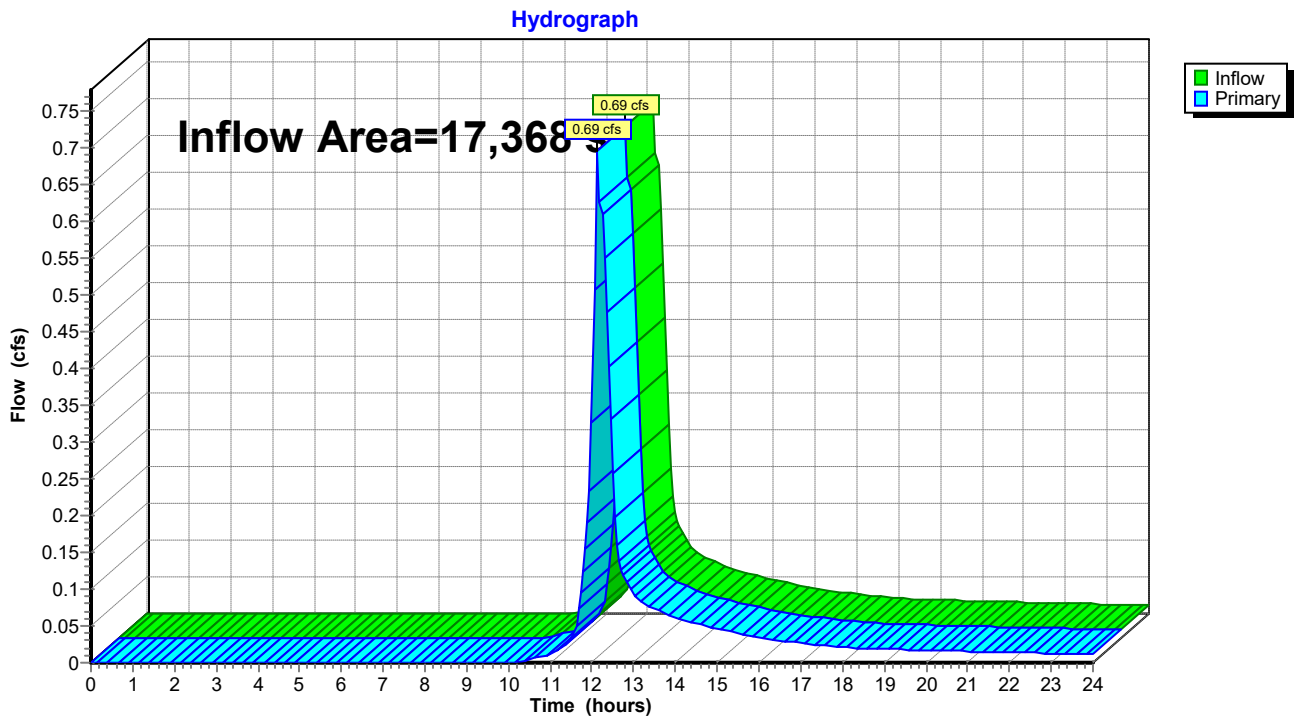
APPENDIX C – Water Quality
Volume Calculations

WATER QUALITY VOLUME DESIGN CALCULATIONS
FOR #66 KINGS HIGHWAY NORTH

Water Quality Volume (WQV):

$\quad$ WQV = 1" (R)(A)/12

Water Quality Volume Calculations

$\quad$ Proposed

$\quad$ Impervious Coverage $\qquad$ = 4,878 ft^2

$\quad$ Percentage Of Impervious Area, I $\qquad$ = 100%

$\quad$ Runoff Coefficient, R = $\qquad$ = 0.95

$\quad$ A = 4,878 ft^2

$\quad$ WQV = 1" (0.95) (4,878 ft^2)/12 = 386 ft^3

$\quad$ Water Quality Volume Required = 386 ft^3

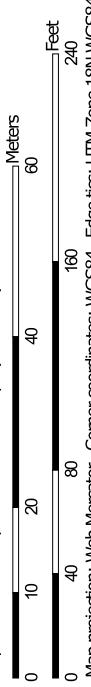WQV Detention System - (24) 12" High H-20 Conc. Galleries = 590 ft^3

Total WQV Provided $\qquad$ **= 590 ft^3**

APPENDIX D – NRCS Soil Map

Soil Map—State of Connecticut, Western Part
(66 KINGS HIGHWAY NORTH)

260B

Kings Hwy N

Soil Map may not be valid at this scale.

Map Scale: 1:886 if printed on A landscape (11" x 8.5") sheet.

Meters
0   10   20   40   60

Feet
0   40   80   160   240

Map projection: Web Mercator   Corner coordinates: WGS84   Edge tics: UTM Zone 18N WGS84

N

Map Unit Legend

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
260B	Charlton-Urban land complex, 3 to 8 percent slopes	3.2	100.0%
Totals for Area of Interest		**3.2**	**100.0%**

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State of Connecticut, Western Part

260B—Charlton-Urban land complex, 3 to 8 percent slopes

Map Unit Setting

National map unit symbol: 2xff7
Elevation: 0 to 1,020 feet
Mean annual precipitation: 36 to 71 inches
Mean annual air temperature: 39 to 55 degrees F
Frost-free period: 140 to 240 days
Farmland classification: Not prime farmland

Map Unit Composition

Charlton and similar soils: 40 percent
Urban land: 35 percent
Minor components: 25 percent
*Estimates are based on observations, descriptions, and transects of
the mapunit.*

Description of Charlton

Setting

Landform: Hills, ground moraines, ridges
Landform position (two-dimensional): Shoulder, summit, backslope
Landform position (three-dimensional): Crest, side slope
Down-slope shape: Convex, linear
Across-slope shape: Convex
Parent material: Coarse-loamy melt-out till derived from gneiss,
granite, and/or schist

Typical profile

Ap - 0 to 7 inches: fine sandy loam
Bw - 7 to 22 inches: gravelly fine sandy loam
C - 22 to 65 inches: gravelly fine sandy loam

Properties and qualities

Slope: 3 to 8 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Runoff class: Low
*Capacity of the most limiting layer to transmit water
(Ksat):* Moderately low to high (0.14 to 14.17 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Maximum salinity: Nonsaline (0.0 to 1.9 mmhos/cm)
Available water supply, 0 to 60 inches: Moderate (about 6.9
inches)

Interpretive groups

Land capability classification (irrigated): None specified
Land capability classification (nonirrigated): 2e

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Hydrologic Soil Group: B
Ecological site: F144AY034CT - Well Drained Till Uplands
Hydric soil rating: No

Description of Urban Land

Typical profile
M - 0 to 10 inches: cemented material

Properties and qualities
Slope: 3 to 8 percent
Depth to restrictive feature: 0 inches to manufactured layer
Runoff class: Very high
Capacity of the most limiting layer to transmit water (Ksat): Very low
   (0.00 to 0.00 in/hr)
Available water supply, 0 to 60 inches: Very low (about 0.0 inches)

Interpretive groups
Land capability classification (irrigated): None specified
Land capability classification (nonirrigated): 8
Hydrologic Soil Group: D
Hydric soil rating: Unranked

Minor Components

Chatfield
Percent of map unit: 10 percent
Landform: Hills, ridges
Landform position (two-dimensional): Shoulder, summit, backslope
Landform position (three-dimensional): Crest, side slope, nose
   slope
Down-slope shape: Convex
Across-slope shape: Convex, linear
Hydric soil rating: No

Leicester
Percent of map unit: 5 percent
Landform: Depressions, drainageways, ground moraines, hills
Landform position (two-dimensional): Toeslope, footslope
Landform position (three-dimensional): Base slope
Down-slope shape: Linear, concave
Across-slope shape: Concave
Hydric soil rating: Yes

Sutton
Percent of map unit: 5 percent
Landform: Hills, ground moraines
Landform position (two-dimensional): Footslope
Landform position (three-dimensional): Base slope
Down-slope shape: Concave
Across-slope shape: Linear
Hydric soil rating: No

Udorthents
Percent of map unit: 5 percent

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Landform: Ridges
Landform position (three-dimensional): Tread
Down-slope shape: Convex, linear
Across-slope shape: Convex, linear
Hydric soil rating: No

Data Source Information

Soil Survey Area: State of Connecticut, Western Part
Survey Area Data: Version 1, Sep 15, 2023

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APPENDIX E – MS4 Impervious

Cover Reduction Worksheet

Town of Westport Department of Public Works

Town Hall, 110 Myrtle Ave.

Westport, Connecticut 06880

(203) 341-1120

By: _____Ochman Associates Inc_____

Dated: _____11/20/23_____

Revised: _____7/18/2024_____

MS4 Impervious Cover Reduction Worksheet

Address:	66 Kings Hwy No.
GIS ID #:	C09-054-000
Lot Area:	17,036 SF

Existing Conditions

Impervious Items	Area (SF)	
	Disconnected	Connected
Ex. Bldg Cov.	1,360	0
Driveway	1,846	0
Patio/Walk	520	0
	0	0
	0	0

Totals   **3,726**   **0** SF

Proposed Conditions

Impervious Items	Area (SF)	
	Disconnected	Connected
Pr. Bldg Cov.	2,570	0
Pr. Driveway	2,259	0
Pr. Terrace/Walk	585	0
Pr.Mech Pad	35	0
	0	0
	0	0
		0
		0

Totals   **5,449**   **0** SF

Connected Impervious Area Reduction

Existing Connected Impervious Cover	0	SF
Proposed Connected Impervious Cover	0	SF
Reduction	0	SF
Percent Reduction	**0.0%**	