

SEDIMENTATION AND EROSION CONTROL NOTES

1. LAND DISTURBANCE SHALL BE KEPT TO A MINIMUM. PERMANENT STABILIZATION SHALL BE SCHEDULED AS SOON AS FINAL GRADES ARE ESTABLISHED.
2. ALL DISTURBED AREAS SHALL BE FINE GRADED AND SEEDED WITH AN APPROVED SEED MIXTURE. COVER NEWLY SEEDED AREAS WITH MULCH HAY OR SALT HAY.
3. ALL EROSION AND SEDIMENT CONTROL MEASURES SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE STANDARDS AND SPECIFICATIONS OF THE 2022 CONNECTICUT "GUIDELINES FOR SOIL EROSION AND SEDIMENT CONTROL" HANDBOOK.
4. ALL CONTROL MEASURES SHALL BE MAINTAINED IN EFFECTIVE CONDITION THROUGHOUT THE CONSTRUCTION PERIOD. CHECK AFTER EACH STORM EVENT.
5. ADDITIONAL CONTROL MEASURES SHALL BE INSTALLED DURING THE CONSTRUCTION PERIOD, IF REQUIRED BY TOWN AUTHORITIES.
6. SEDIMENT DEPOSITS REMOVED FROM FILTER BARRIERS SHALL BE PLACED IN FILL AREAS OR SPREAD WHERE THERE IS PROPOSED VEGETATIVE COVER. ANY SEDIMENT DEPOSITS REMAINING AFTER THE FILTER BARRIER IS REMOVED SHALL BE FINE GRADED AND PLANTED ACCORDING TO PLAN.
7. THE SITE CONSTRUCTION CONTRACTOR IS ASSIGNED THE RESPONSIBILITY FOR IMPLEMENTING THIS EROSION AND SEDIMENT CONTROL PLAN. THIS RESPONSIBILITY INCLUDES THE INSTALLATION AND MAINTENANCE OF CONTROL MEASURES, INFORMING ALL PARTIES ENGAGED ON THE CONSTRUCTION SITE OF THE REQUIREMENTS AND OBJECTIVES OF THE PLAN, NOTIFYING THE PLANNING AND ZONING OFFICE (AND/OR THE CONSERVATION COMMISSION) OF ANY TRANSFER OF THIS RESPONSIBILITY AND CONVEYING A COPY OF THE EROSION AND SEDIMENT CONTROL PLAN IF THE TITLE TO THE LAND IS TRANSFERRED TO A NEW OWNER.

N/F
WILDLIFE IN CRISIS INC.
9 OSBORN FARM ROAD
2/6/3

N/F
BISNI NARAYANAN &
SUJEET ROJAN
3 OSBORN FARM ROAD
2/6/2

N/F
PAUL THOMAS & CARAGH LANDRY
17 OSBORN FARM ROAD
2/6/4

N/F
JI-TAEK & SOOJIN HONG
12 KRAMER LANE
2/6/9

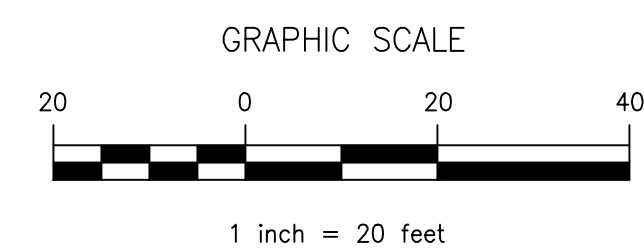
N/F
JACEK & EWA M. SKIEDZIEL
6 KRAMER LANE
2/6/10

N/F
MICHAEL NORAH BEERS
2 KRAMER LANE
2/6/11

ALL PIPES ARE TO BE 6" PVC (S=0.01 MIN.) UNLESS OTHERWISE INDICATED.

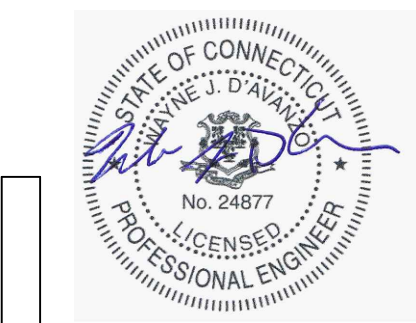
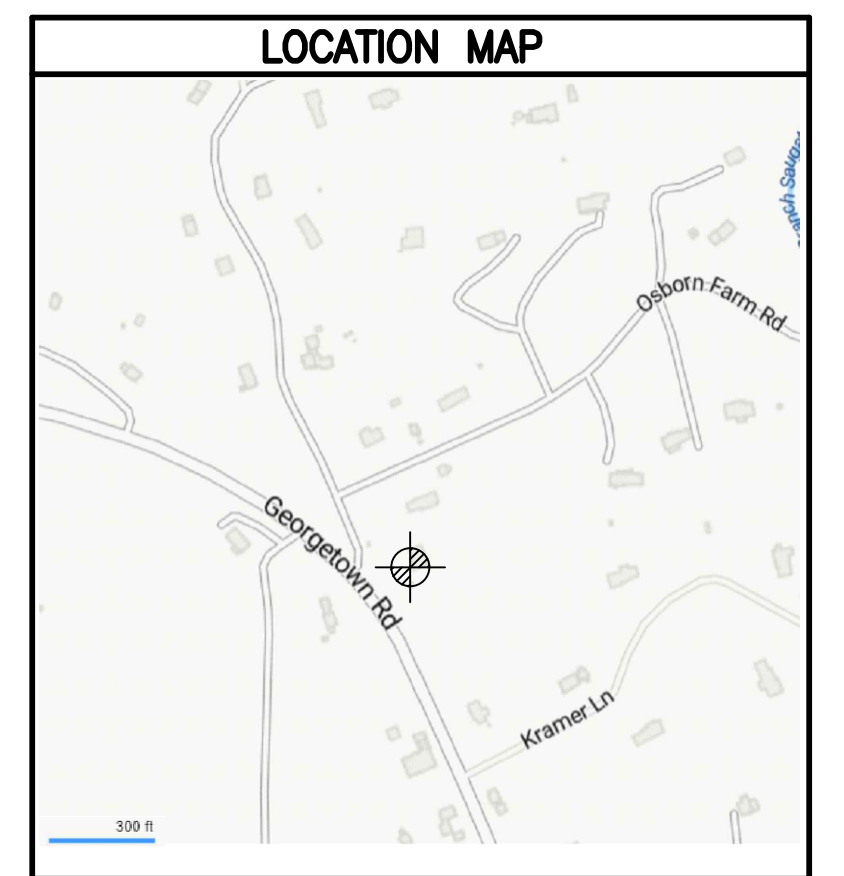
RETENTION CHAMBERS TO BE INSTALLED NO LOWER THAN ELEVATION SHOWN.

PARCEL AREA
106,934 SF
2.45 AC

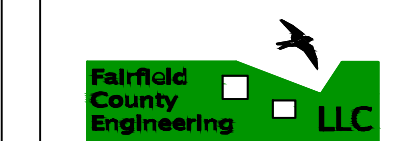


GENERAL CONSTRUCTION NOTES:

1. CONSTRUCTION AND STRUCTURES SHALL COMPLY WITH ALL MUNICIPAL OR STATE REQUIREMENTS. ALL WORK SHALL BE CERTIFIED BY A REGISTERED PROFESSIONAL ENGINEER, TO THE SATISFACTION OF THE ENGINEERING BUREAU, THAT CONSTRUCTION IS IN ACCORDANCE WITH THESE PLANS.
2. THE ENGINEERING BUREAU OF THE DEPARTMENT OF PUBLIC WORKS AND THE ENGINEER OF RECORD SHALL BE NOTIFIED THREE DAYS PRIOR TO THE COMMENCEMENT OF EACH PHASE OF CONSTRUCTION.
3. NO CERTIFICATE OF CONFORMANCE TO STANDARDS SHALL BE ISSUED BY THE DESIGN ENGINEER IF PROPER NOTICE IS NOT PROVIDED FOR INSPECTIONS OR IF INSPECTIONS ARE NOT MADE PRIOR TO BACKFILLING OF BELOW GROUND STRUCTURES AND APPURTENANCES.
4. SUBSURFACE STRUCTURES AND UTILITIES HAVE BEEN DETERMINED FROM EXISTING RECORDS AND ARE NOT GUARANTEED TO BE COMPLETE OR ACCURATE. IN ORDER TO AVOID CONFLICT OF THE PROPOSED WORK AND EXISTING UTILITIES, THE CONTRACTOR SHALL LOCATE EXISTING UTILITIES BY EXCAVATING TEST HOLES. IF THE CONTRACTOR DETERMINES THAT A CONFLICT EXISTS, HE SHALL IMMEDIATELY NOTIFY THE ENGINEER, WHO WILL MAKE THE NECESSARY ADJUSTMENTS.
5. EXISTING PROPERTY AND UTILITY INFORMATION WAS TAKEN FROM A SURVEY BY ALL SEASONS LAND SURVEYING "ZONING LOCATION SURVEY PREPARED FOR TOMASZ GEREMEK", DATED JANUARY 11, 2024.
6. THESE PLANS ARE FOR MUNICIPAL OR STATE AGENCY APPROVAL ONLY. NOT FOR CONSTRUCTION.
7. NO PIPE SHALL HAVE A BEND OF GREATER THAN 45 DEGREES.
8. THE CONTRACTOR SHALL NOTIFY "CALL BEFORE YOU DIG" AT 1-800-922-4455, OR OTHER APPROPRIATE CONTACT POINT PRIOR TO START OF CONSTRUCTION.
9. ALL UTILITY LOCATIONS ARE APPROXIMATE. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO CONFIRM THE LOCATION OF THE UTILITIES IN THE FIELD BY WHATEVER MEANS HE DEEMS PRUDENT.
10. THIS DESIGN CONFORMS TO APPLICABLE CODES AND ACCEPTED PRACTICE, NO OTHER WARRANTY IS EXPRESSED OR IMPLIED.
11. TOTAL SITE AREA = 2.45 ACRES



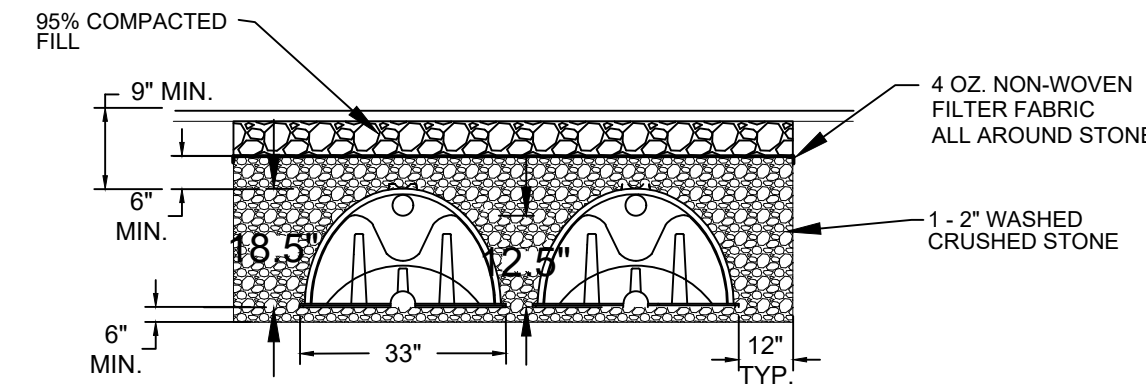
3-15-24
date



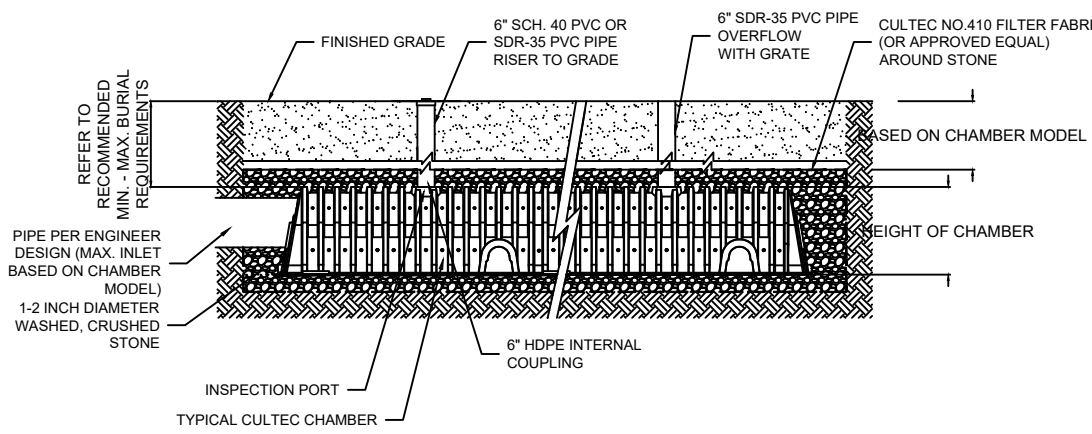
FAIRFIELD COUNTY ENGINEERING L.L.C.
60 WINFIELD STREET, NORWALK, CONNECTICUT 06855 PH: (203) 831-8005 wayne@fairfieldce.com

TOM GEREMEK	
60 GEORGETOWN ROAD WESTON, CONNECTICUT	
DRAINAGE PLAN	
CIVIL ENGINEERS	2370 project
1 OF 2 sheet	

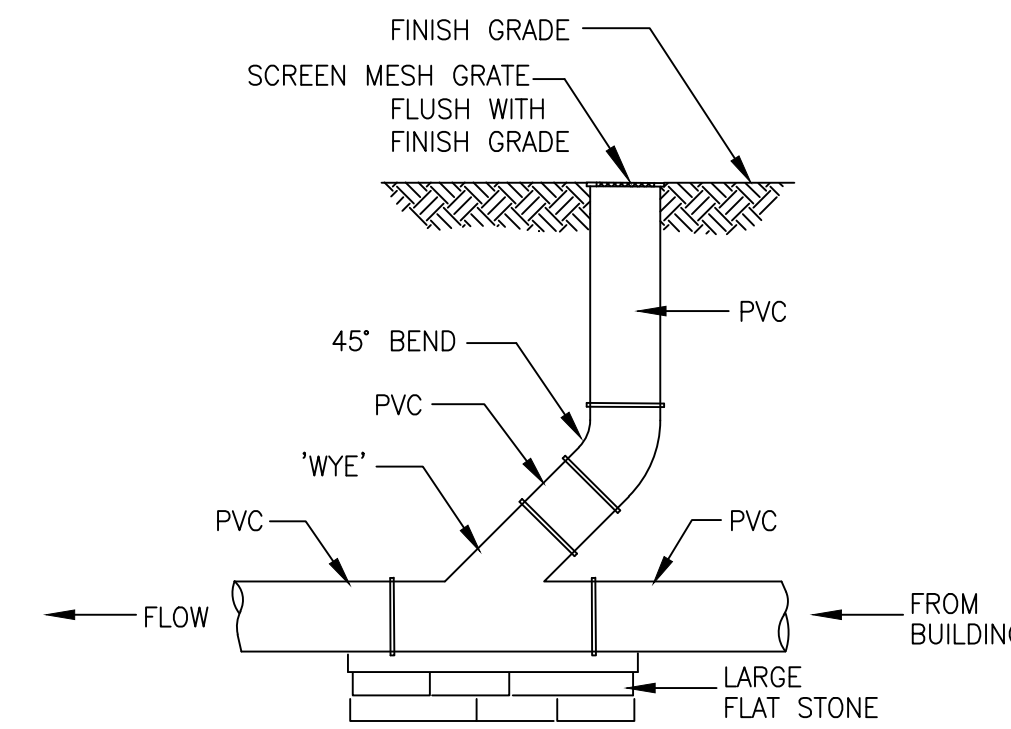
FCE Project #	2370	Date Performed:	3/15/2024
Client:	Tom Geremek		
Location:	60 Georgetown Road, Weston		
Observed by:	Wayne D'Avanzo		
Test Hole 1:			
	0-7"	Topsoil	
	7-48"	Light Brown Gravel and Silt, stony	
		No Ground Water	
		Mottling @ 26"	
		No Ledge	
		Roots to 26"	



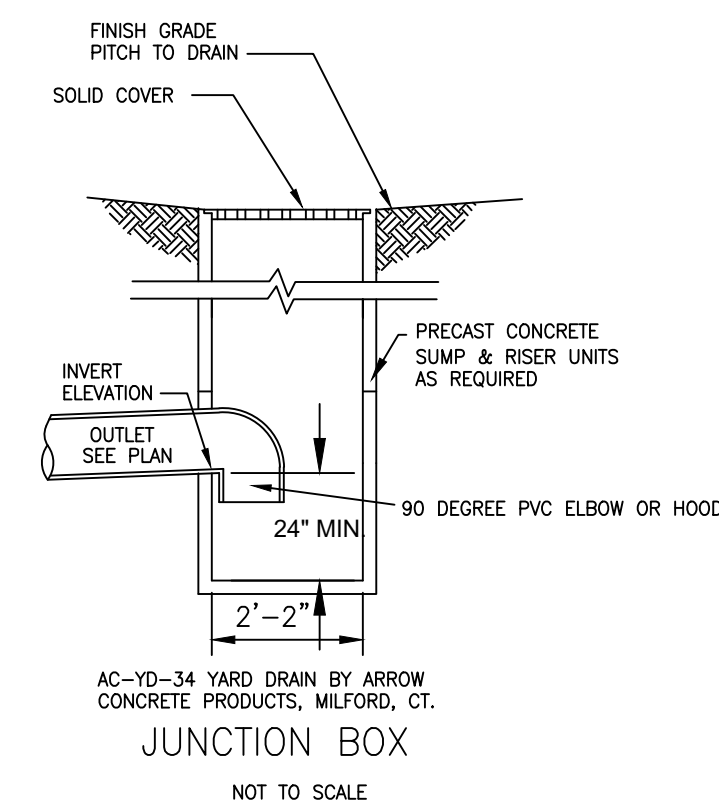
CULTEC RECHARGER 150XLHD
TYPICAL CROSS SECTION



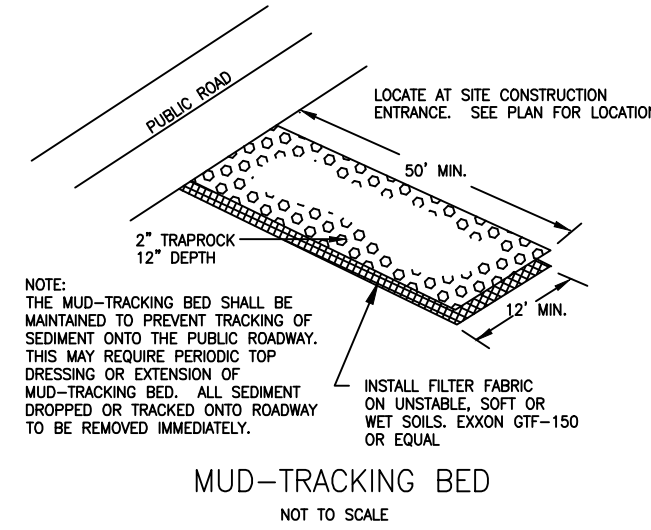
NUMBER OF UNITS SHOWN FOR ILLUSTRATIVE PURPOSES ONLY.
CULTEC INSPECTION PORT AND OVERFLOW
(AS APPLICABLE)



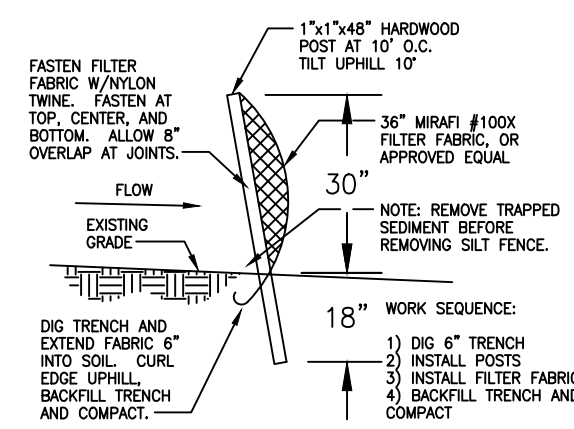
TYPICAL CLEANOUT
NOT TO SCALE



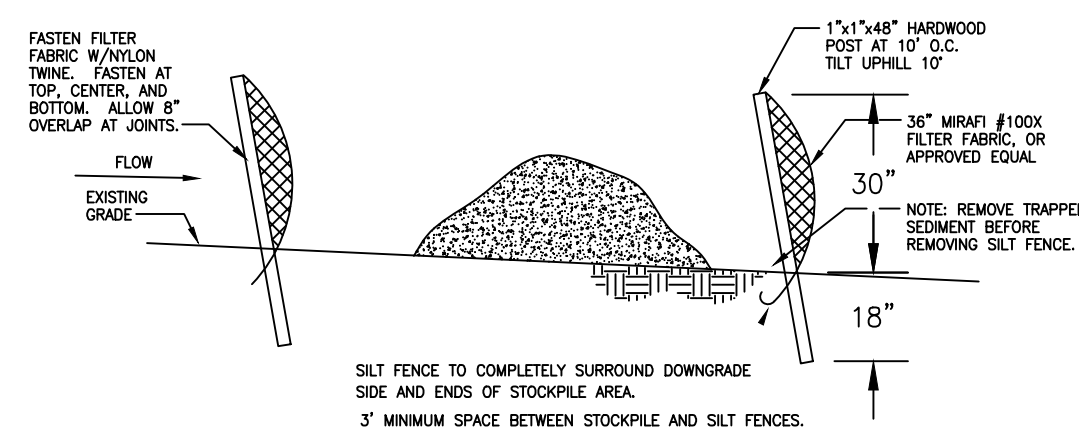
JUNCTION BOX
NOT TO SCALE



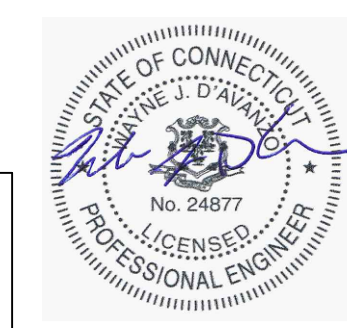
MUD-TRACKING BED
NOT TO SCALE



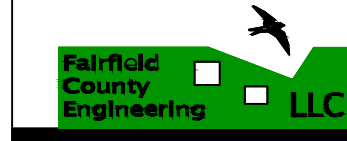
SILT FENCE
NOT TO SCALE



STOCKPILE PROTECTION
NOT TO SCALE



3-15-24
date



FAIRFIELD COUNTY ENGINEERING L.L.C.
60 WINFIELD STREET, NORWALK, CONNECTICUT 06855 PH: (203) 831-8005 FAX: (203) 831-8006

TOM GEREMEK
60 GEORGETOWN ROAD WESTON, CONNECTICUT

DETAIL SHEET

CIVIL ENGINEERS 2370 project

2 OF 2 sheet

DRAINAGE REPORT
PREPARED FOR
EXISTING AND PROPOSED SITE CONDITIONS

LOCATED AT:

60 GEORGETOWN ROAD

WESTON, CONNECTICUT

FCE #2370



March 15, 2024

FAIRFIELD COUNTY ENGINEERING, LLC
CIVIL ENGINEERS

60 WINFIELD ST.
NORWALK, CONNECTICUT 06855
(203) 831-8005
FAX: (203) 831-8006
E-mail to: wayne@fairfieldce.com



NARRATIVE:

The subject of this report is a 2.45 acre parcel located at 60 Georgetown Road in Weston. The purpose of this report is to determine the existing and proposed runoffs resulting from the proposed site improvements in order to design a stormwater management system.

EXISTING CONDITIONS:

The subject parcel is located at the east side of Georgetown Road, at its intersection with Old Farm Road. The lot currently contains a single family residence, driveway, and deck. The lot slopes gently across its width, generally from the southeast to the northwest, flattening towards the front.

Existing soils at this location, as identified in the NRCS Soil Survey of Fairfield County, Connecticut, consist of a combination of Canton and Charlton fine sandy loams, 3 to 8 percent slopes, and Charlton-Chatfield complex, 0 to 15 percent slopes, very rocky, both of which have a Hydrologic classification of 'B', and Ridgebury, Leicester and Whitman soils, 0 to 8 percent slopes, extremely stony, which has a Hydrologic classification of "D".

For the purposes of this analysis a Hydrologic classification of "B" was used.

The existing runoff from a 1.3" rainfall event is 0.00 c.f.s.

PROPOSED CONDITIONS:

The proposal for this site is to account for a patio and removal of trees.

The proposed runoff (unmitigated) from a 1.3" rainfall event is 0.00 c.f.s.

COMPUTATIONS:

The following computations of the existing and proposed conditions runoff flows were derived from the HydroCAD computer software. HydroCAD follows the NRCS TR-20 procedure for computing stormwater runoff. Computations were performed for a 1.3” rainfall event.

Existing Conditions:

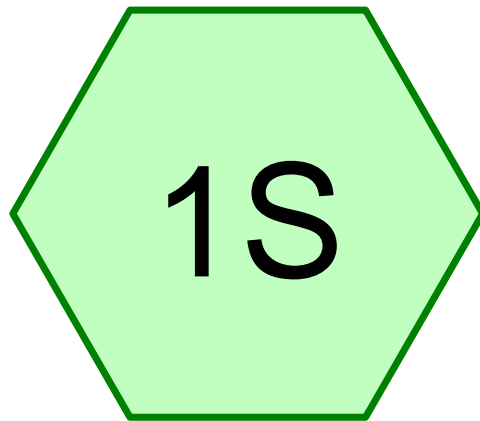
House	1,729 s.f.	CN 98
Gravel Driveway	2,591 s.f.	CN 98
Deck	354 s.f.	CN 85
Walk	26 s.f.	CN 98
Lawn	20,796 s.f.	CN 69
Woods	81,438 s.f.	CN 60
Total -	106,934 s.f.	

Weighted CN - **63**

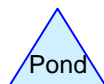
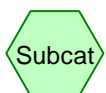
Proposed Conditions:

House	1,729 s.f.	CN 98
Gravel Driveway	2,591 s.f.	CN 98
Deck	354 s.f.	CN 85
Walk	26 s.f.	CN 98
Patio	240 s.f.	CN 98
Lawn	29,462 s.f.	CN 69
Woods	72,532 s.f.	CN 60
Total -	106,934 s.f.	

Weighted CN - **64**



Existing Conditions



Routing Diagram for 2370Existing
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Summary for Subcatchment 1S: Existing Conditions

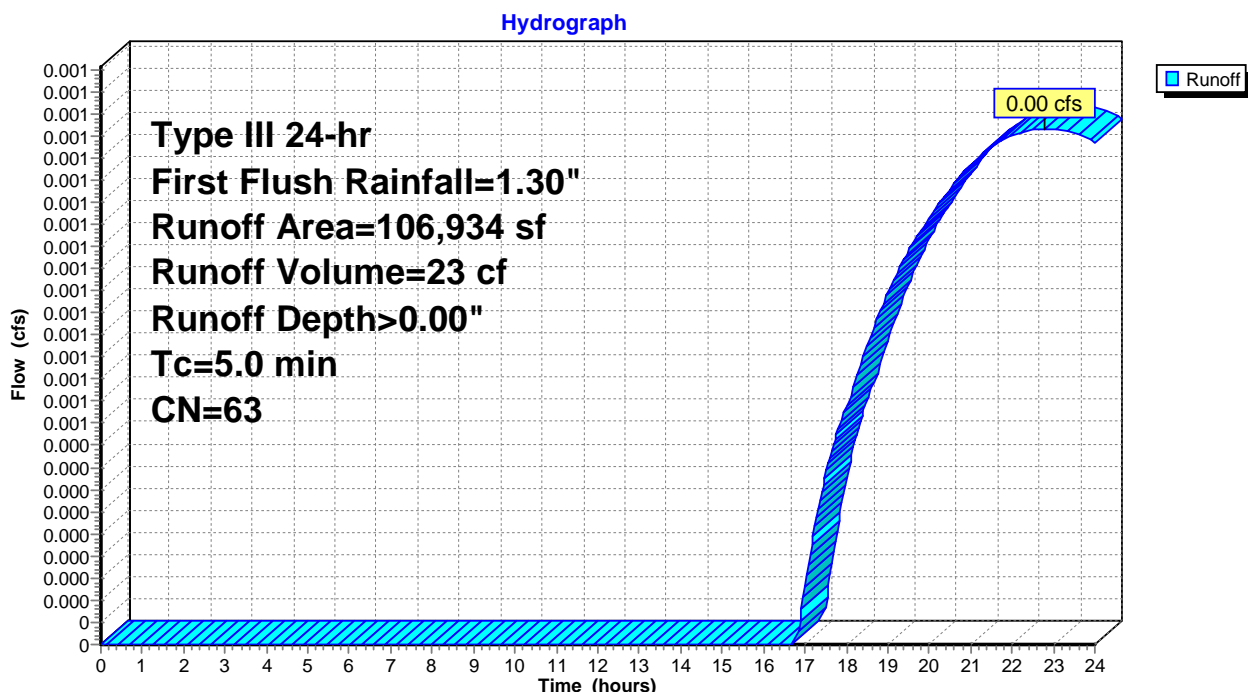
Runoff = 0.00 cfs @ 22.81 hrs, Volume= 23 cf, Depth> 0.00"

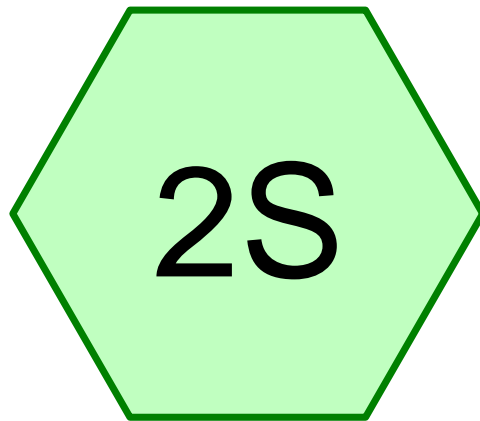
Runoff by SCS TR-20 method, UH=SCS, Weighted-CN, Time Span= 0.00-24.00 hrs, dt= 0.04 hrs
 Type III 24-hr First Flush Rainfall=1.30"

Area (sf)	CN	Description
* 1,729	98	House
* 2,591	85	Gravel Driveway
* 354	98	Deck
* 26	98	Walk
20,796	69	50-75% Grass cover, Fair, HSG B
81,438	60	Woods, Fair, HSG B
106,934	63	Weighted Average
104,825		98.03% Pervious Area
2,109		1.97% Impervious Area

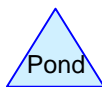
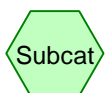
Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
5.0					Direct Entry, Direct

Subcatchment 1S: Existing Conditions





Proposed Conditions



Routing Diagram for 2370Proposed

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Summary for Subcatchment 2S: Proposed Conditions

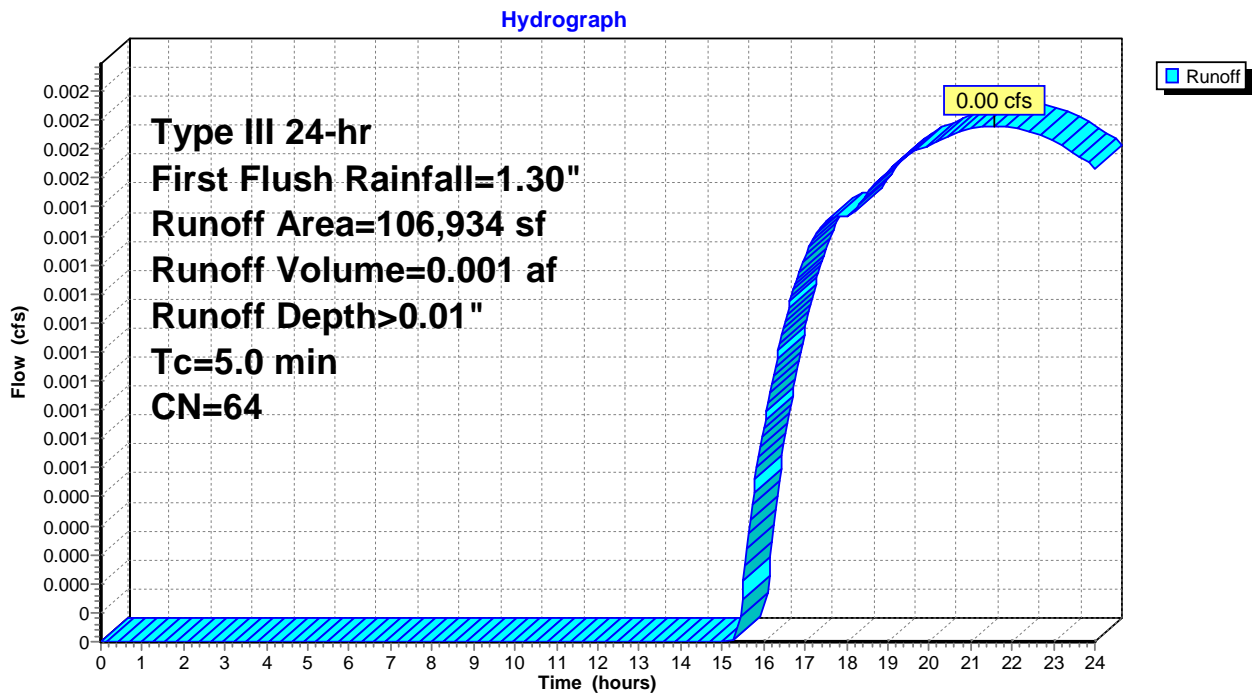
Runoff = 0.00 cfs @ 21.59 hrs, Volume= 0.001 af, Depth> 0.01"

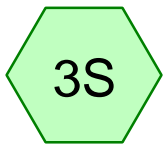
Runoff by SCS TR-20 method, UH=SCS, Weighted-CN, Time Span= 0.00-24.00 hrs, dt= 0.04 hrs
 Type III 24-hr First Flush Rainfall=1.30"

Area (sf)	CN	Description
* 1,729	98	House
* 2,591	85	Gravel Driveway
* 354	98	Deck
* 26	98	Walk
* 240	98	Patio
29,462	69	50-75% Grass cover, Fair, HSG B
72,532	60	Woods, Fair, HSG B
106,934	64	Weighted Average
104,585		97.80% Pervious Area
2,349		2.20% Impervious Area

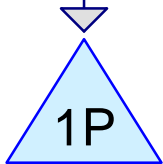
Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
5.0					Direct Entry, Direct

Subcatchment 2S: Proposed Conditions

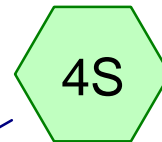




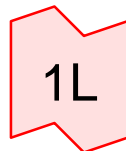
Areas Routed to Retention



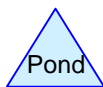
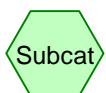
Cultrec R150XLHD



Areas not Routed to Retention



Combined Hydrograph



Routing Diagram for 2370Combined

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Summary for Subcatchment 3S: Areas Routed to Retention

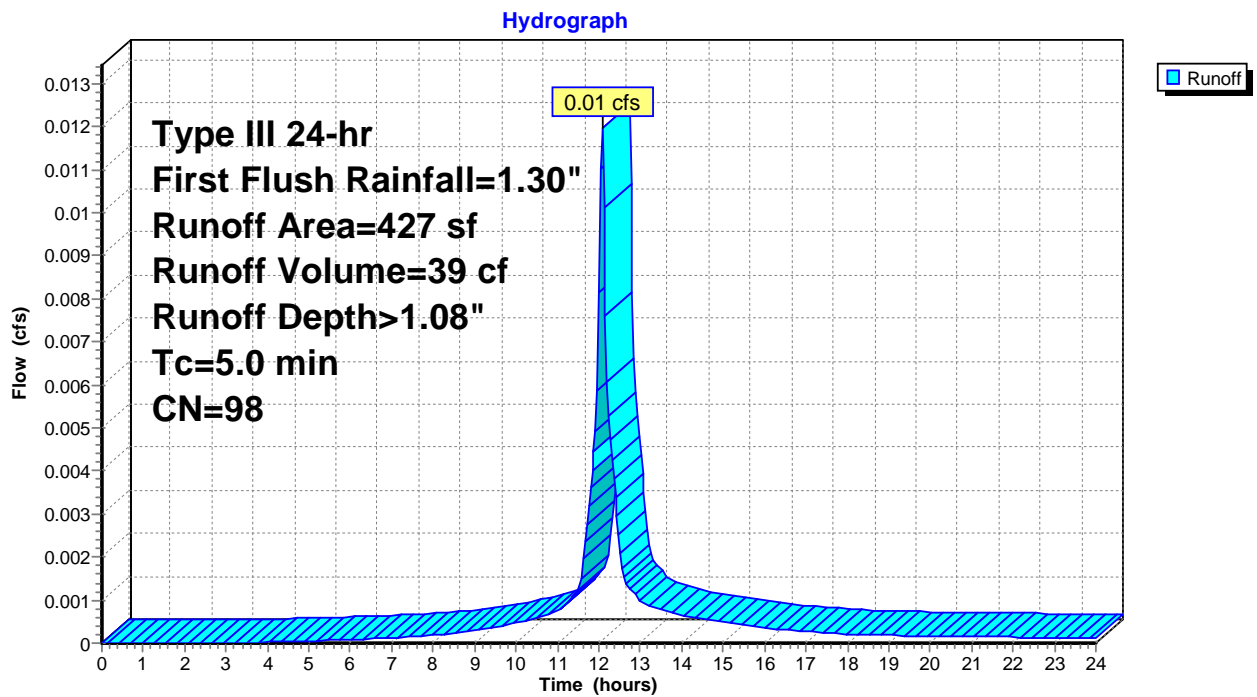
Runoff = 0.01 cfs @ 12.07 hrs, Volume= 39 cf, Depth> 1.08"

Runoff by SCS TR-20 method, UH=SCS, Weighted-CN, Time Span= 0.00-24.00 hrs, dt= 0.04 hrs
 Type III 24-hr First Flush Rainfall=1.30"

Area (sf)	CN	Description
* 427	98	Portion of House roof
427		100.00% Impervious Area

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

Subcatchment 3S: Areas Routed to Retention



Summary for Subcatchment 4S: Areas not Routed to Retention

Runoff = 0.00 cfs @ 21.59 hrs, Volume= 47 cf, Depth> 0.01"

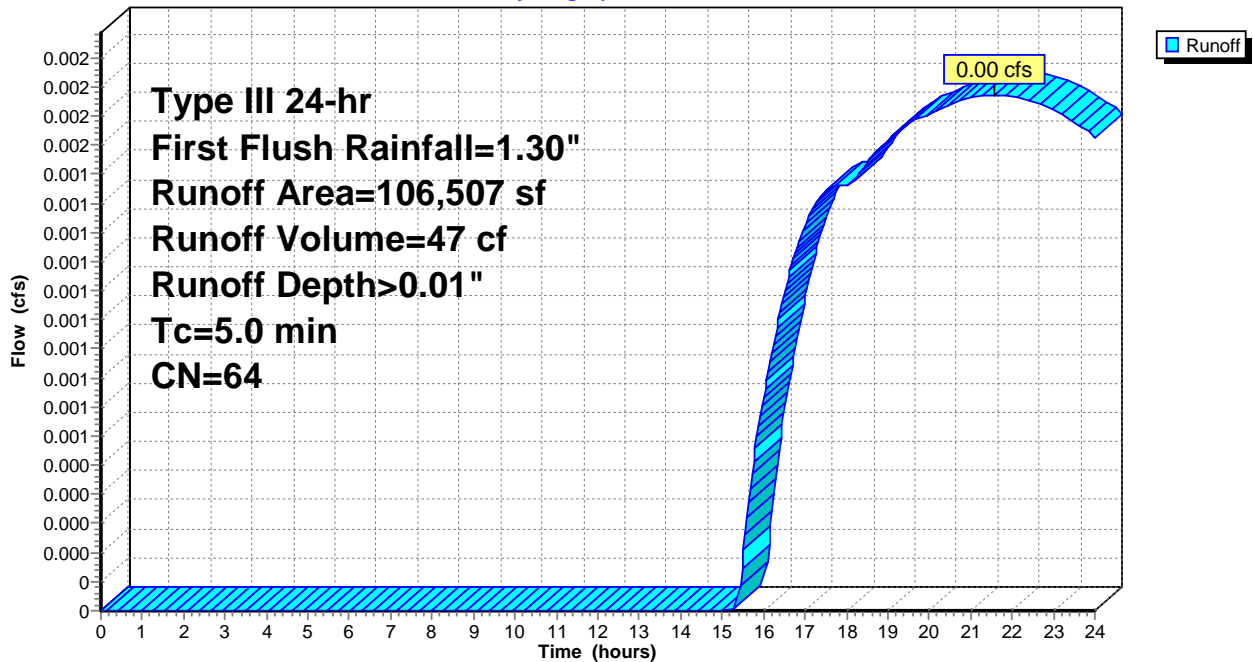
Runoff by SCS TR-20 method, UH=SCS, Weighted-CN, Time Span= 0.00-24.00 hrs, dt= 0.04 hrs
Type III 24-hr First Flush Rainfall=1.30"

Area (sf)	CN	Description
* 1,302	98	House
* 2,591	85	Gravel Driveway
* 354	98	Deck
* 26	98	Walk
* 240	98	Patio
29,462	69	50-75% Grass cover, Fair, HSG B
72,532	60	Woods, Fair, HSG B
106,507	64	Weighted Average
104,585		98.20% Pervious Area
1,922		1.80% Impervious Area

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

Subcatchment 4S: Areas not Routed to Retention

Hydrograph



Summary for Pond 1P: Cultrec R150XLHD

Inflow Area = 427 sf, 100.00% Impervious, Inflow Depth > 1.08" for First Flush event
 Inflow = 0.01 cfs @ 12.07 hrs, Volume= 39 cf
 Outflow = 0.00 cfs @ 0.00 hrs, Volume= 0 cf, Atten= 100%, Lag= 0.0 min
 Primary = 0.00 cfs @ 0.00 hrs, Volume= 0 cf

Routing by Stor-Ind method, Time Span= 0.00-24.00 hrs, dt= 0.04 hrs
 Peak Elev= 413.45' @ 24.00 hrs Surf.Area= 98 sf Storage= 39 cf

Plug-Flow detention time= (not calculated: initial storage exceeds outflow)

Center-of-Mass det. time= (not calculated: no outflow)

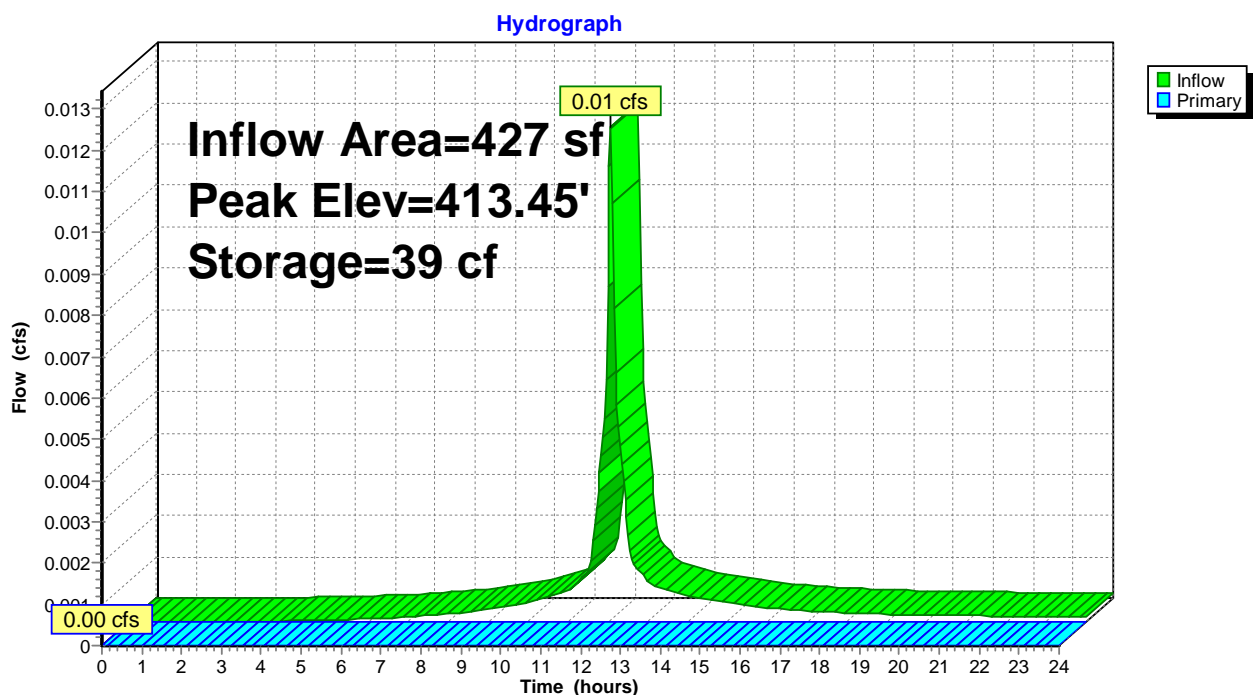
Volume	Invert	Avail.Storage	Storage Description
#1A	412.90'	37 cf	7.50'W x 13.00'L x 1.54'H Field A 150 cf Overall - 58 cf Embedded = 92 cf x 40.0% Voids
#2A	412.90'	58 cf	Cultec R-150XLHD x 2 Inside #1 Effective Size= 29.8"W x 18.0"H => 2.65 sf x 10.25'L = 27.2 cf Overall Size= 33.0"W x 18.5"H x 11.00'L with 0.75' Overlap Row Length Adjustment= +0.75' x 2.65 sf x 2 rows
		95 cf	Total Available Storage

Storage Group A created with Chamber Wizard

Device	Routing	Invert	Outlet Devices
#1	Primary	414.44'	6.0" Horiz. Orifice/Grate C= 0.600 Limited to weir flow at low heads

Primary OutFlow Max=0.00 cfs @ 0.00 hrs HW=412.90' (Free Discharge)
 ↑-1=Orifice/Grate (Controls 0.00 cfs)

Pond 1P: Cultrec R150XLHD

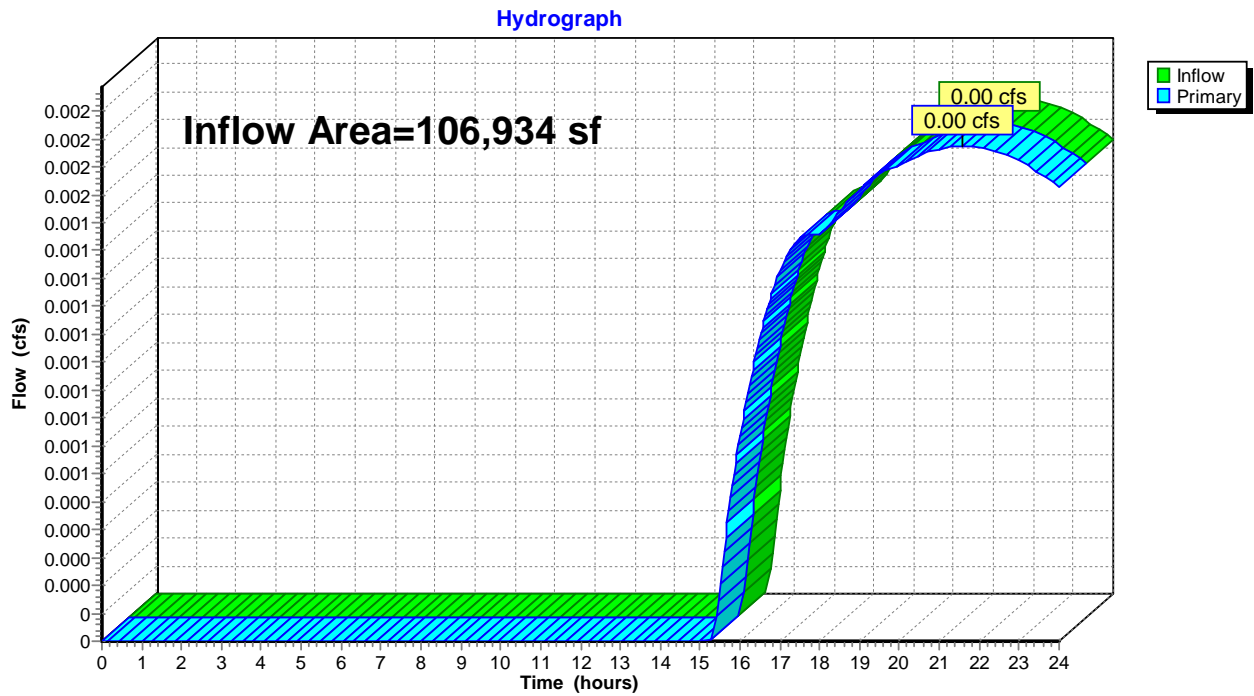


Summary for Link 1L: Combined Hydrograph

Inflow Area = 106,934 sf, 2.20% Impervious, Inflow Depth > 0.01" for First Flush event
Inflow = 0.00 cfs @ 21.59 hrs, Volume= 47 cf
Primary = 0.00 cfs @ 21.59 hrs, Volume= 47 cf, Atten= 0%, Lag= 0.0 min

Primary outflow = Inflow, Time Span= 0.00-24.00 hrs, dt= 0.04 hrs

Link 1L: Combined Hydrograph



SUMMARY

Existing Runoff (1.3'')	0.00 c.f.s.
Proposed Runoff (1.3'')	0.00 c.f.s.
Proposed Impervious Run-off Retained (1.3'')	0.01 c.f.s.
Proposed Run-off from Areas Bypassing Retention plus overflow (1.3'')	0.00 c.f.s.

CONCLUSIONS:

The increased run-off resulting from the proposed site improvements will be retained in 2 units of Cultec R-150XLHD retention chambers.

This system will maintain the net peak runoff during a 1.3'' storm at its current peak of 0.00 c.f.s. in the areas of the proposed improvements.

The proposed retention system provides 95 ft³ of storage.

The proposed improvements will have no adverse impact on surrounding properties during a 1.3'' rainfall event.