Attachment E
Geotechnical Report

A copy of the Geotechnical Report prepared for the subject parcel is included for reference.

Summit
Environmental Consultants, Inc

summitenv.com

PN: 12-3178

July 23, 2012

Wes Thames
Priority Group, LLC
2 Main Street
Border Trust Business Center
Topsham, ME 04086

RE: Infiltration Study
Thomas Point Road - Brunswick, Maine

Dear Wes:

At your request, Summit Environmental Consultants, Inc. (Summit) evaluated the infiltration capacity of the soils at the above referenced location (the Site) for a proposed stormwater management structure.

Date of Investigation: July 17, 2012.

Site Description: The Site consists of Lots 26 and 42 on the Town of Brunswick Tax Assessment Map CC1. A Site plan showing the property boundaries, existing site features and proposed development is attached.

Method of Investigation: A backhoe was used to excavate three test pits to a depth of 9 feet below ground surface (bgs).

Method of Ground Control: The test pits were located approximately using a tape and compass, and the existing building and utility poles shown on the preliminary plan prepared by Sitelines, PA entitled "Site Plan Layout" and dated May 31, 2012.

Findings: Test pits TP-12-01, TP-12-02 and TP-12-03 revealed a loose loamy sand topsoil and a loose medium sand subsoil and substratum. Free water was encountered at 6 to 6.5 feet below the ground surface. Evidence of a seasonal high water table (low chroma, gleyed sand) was encountered at 5 to 5.5 feet below the ground surface. The type of surficial materials and the elevation of the seasonal high water table do not vary significantly across the Site. Copies of the test pit logs and photographs are attached.

Samples of surficial materials (medium sand) from a depth of 3 to 5.5 feet below the ground surface were collected from test pits TP-12-02 and TP-12-03 and submitted to Summit's Material Testing Laboratory for analysis of grain size, modified maximum density (modified Proctor) and permeability (constant head). Laboratory testing results are attached.

If you have any questions concerning this letter, please feel free to contact me.

Sincerely,
SUMMIT ENVIRONMENTAL CONSULTANTS, INC.

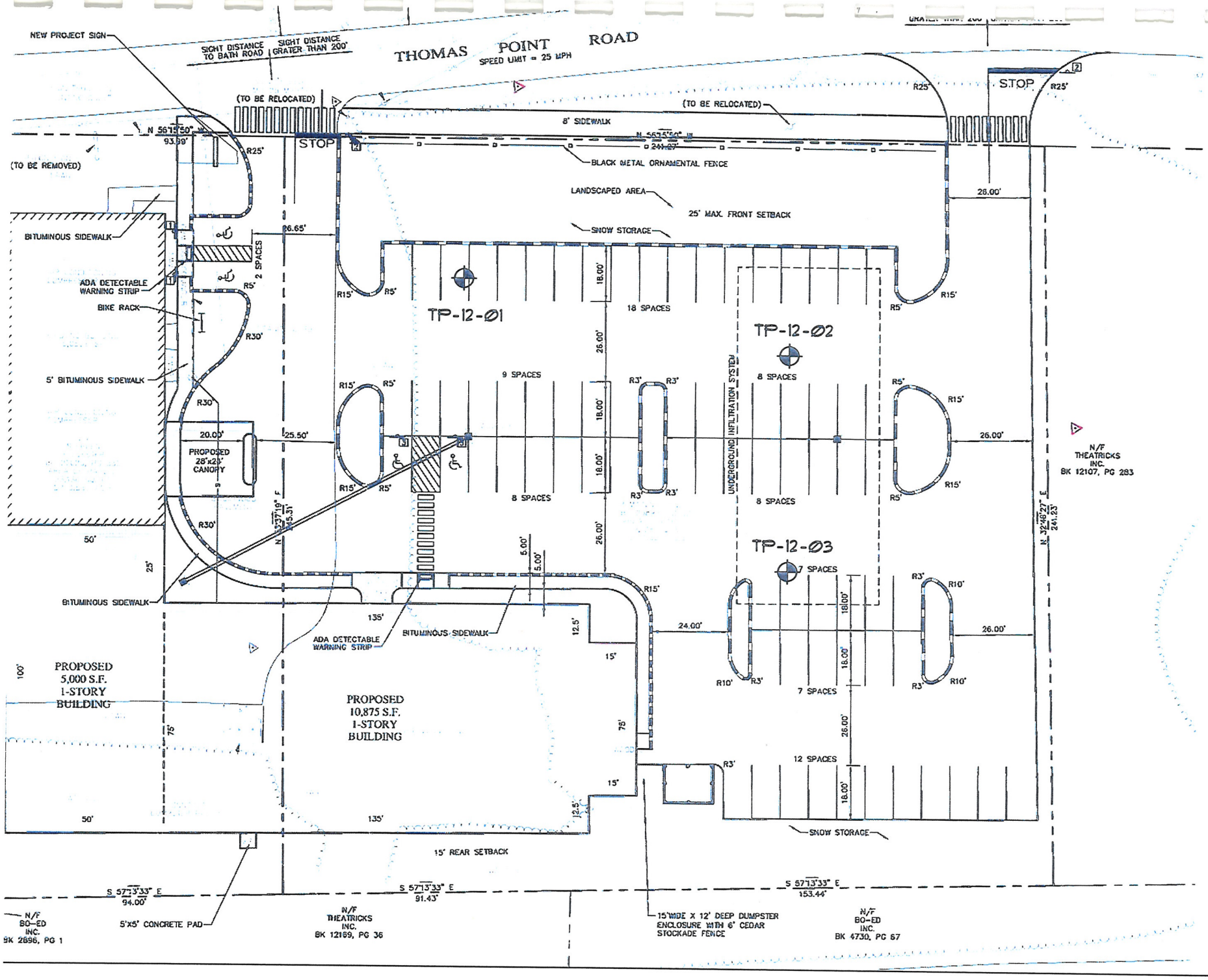
Stephen B. Marcotte, C.G., LSE
Maine Certified Geologist GE539
Maine Licensed Site Evaluator S387

STATE OF MAINE
STEPHEN B. MARCOTTE
GE539
CERTIFIED GEOLOGIST

Enclosures: Site Plan, test pit logs and photographs

cc. Curtis Y. Neufeld (Sitelines, PA)

SITE PLAN


THOMAS POINT ROAD
SPEED LIMIT = 25 MPH
NEW PROJECT SIGN
SIGHT DISTANCE TO BATH ROAD
SIGHT DISTANCE GRATER THAN 200'
(TO BE RELOCATED)
(TO BE RELOCATED)
(TO BE REMOVED)
STOP
STOP
8' SIDEWALK
BLACK METAL ORNAMENTAL FENCE
LANDSCAPED AREA
25' MAX. FRONT SETBACK
SNOW STORAGE
BITUMINOUS SIDEWALK
ADA DETECTABLE WARNING STRIP
BIKE RACK
5' BITUMINOUS SIDEWALK
2 SPACES
PROPOSED 28'x20' CANOPY
TP-12-01
18 SPACES
9 SPACES
8 SPACES
TP-12-02
8 SPACES
8 SPACES
UNDERGROUND INFILTRATION SYSTEM
TP-12-03
7 SPACES
7 SPACES
12 SPACES
N/F THEATRICKS INC. BK 12107, PG 283
PROPOSED 5,000 S.F. 1-STORY BUILDING
PROPOSED 10,875 S.F. 1-STORY BUILDING
ADA DETECTABLE WARNING STRIP
BITUMINOUS SIDEWALK
15' REAR SETBACK
SNOW STORAGE
S 57°13'33" E 94.00'
S 57°13'33" E 91.43'
S 57°13'33" E 153.44'
N/F BO-ED INC. BK 2696, PG 1
5'x5' CONCRETE PAD
N/F THEATRICKS INC. BK 12169, PG 36
15'WIDE X 12' DEEP DUMPSTER ENCLOSURE WITH 6' CEDAR STOCKADE FENCE
N/F BO-ED INC. BK 4730, PG 67

TEST PIT LOGS

SUMMIT ENVIRONMENTAL CONSULTANTS, INC. 640 Main Street Lewiston, Maine 04240	TEST PIT LOG Project: Thomas Point Road - Brunswick, ME	Test Pit # TP-12-01 Project #: 12-3178 Groundwater: 5.5 ft bgs

Contractor:	Summit Environmental Consult.	Ground Surface Elevation: See Site Plan	
Equipment:	Takeuchi TB135	Reference:	
Summit Staff:	Steve Marcotte & Brett Deyling	Date: 7/17/2012	Weather: Partly Sunny 80's

Depth (ft)	DESCRIPTION: GEOLOGIC/GENERAL	DESCRIPTION: COMMENTS
1	Loose Dark Brown Loamy Sand	
2	Reddish Brown to Yellow Brown Loose Medium Sand, trace gravel	
3		
4	Yellow Brown Medium Sand Friable	
5		seasonal high water table (gleyed) at 5.5 ft bgs
6	Gray Medium Sand Friable	free water observed at 6.5 ft bgs
7	Dark Gray Medium Sand Saturated	
8		
9		
10	Limit of Excavation at 9 ft bgs	
11		
12		
13		
14		
15		
16		
17		
18		
19		
20		

SUMMIT ENVIRONMENTAL CONSULTANTS, INC. 640 Main Street Lewiston, Maine 04240	TEST PIT LOG Project: Thomas Point Road - Brunswick, ME	Test Pit # TP-12-02 Project #: 12-3178 Groundwater: 5 ft bgs

Contractor:	Summit Environmental Consult.	Ground Surface Elevation: See Site Plan	
Equipment:	Takeuchi TB135	Reference:	
Summit Staff:	Steve Marcotte & Brett Deyling	Date: 7/17/2012	Weather: Partly Sunny 80's

Depth (ft)	DESCRIPTION: GEOLOGIC/GENERAL	DESCRIPTION: COMMENTS
1	Loose Dark Brown Loamy Sand	
2	Reddish Brown to Yellow Brown Loose Medium Sand, trace gravel	material testing sample collected from 3 to 5.5 ft bgs
3		
4	Yellow Brown Medium Sand Friable	
5		seasonal high water table (gleyed) at 5 ft bgs
6	Gray Medium Sand Friable	free water observed at 6 ft bgs
7	Dark Gray Medium Sand Saturated	
8		
9		
10	Limit of Excavation at 9 ft bgs	
11		
12		
13		
14		
15		
16		
17		
18		
19		
20		

SUMMIT ENVIRONMENTAL CONSULTANTS, INC. 640 Main Street Lewiston, Maine 04240	TEST PIT LOG Project: Thomas Point Road - Brunswick, ME	Test Pit # TP-12-03 Project #: 12-3178 Groundwater: 5 ft bgs

Contractor:	Summit Environmental Consult.	Ground Surface Elevation: See Site Plan	
Equipment:	Takeuchi TB135	Reference:	
Summit Staff:	Steve Marcotte & Brett Deyling	Date: 7/17/2012	Weather: Partly Sunny 80's

Depth (ft)	DESCRIPTION	
	GEOLOGIC/GENERAL	COMMENTS
1	Loose Dark Brown Loamy Sand	
2	Reddish Brown to Yellow Brown Loose Medium Sand, trace gravel	material testing sample collected from 3 to 5.5 ft bgs
3		
4	Yellow Brown Medium Sand Friable	
5		seasonal high water table (gleyed) at 5 ft bgs
	Gray Medium Sand Friable	
6		free water observed at 6 ft bgs
7	Dark Gray Medium Sand Saturated	
8		
9		
	Limit of Excavation at 9 ft bgs	
10		
11		
12		
13		
14		
15		
16		
17		
18		
19		
20		

PHOTOGRAPHS

Summit Environmental Consultants, Inc

PHOTOGRAPHIC LOG

Client Name:
PRIORITY GROUP, LLC

Project No.
12-3178

Photo No. 1

Date:
July 17, 2012

Site Location:
Thomas Point Road
Brunswick, Maine

Description:

Test Pit TP-12-03

Photo No. 2

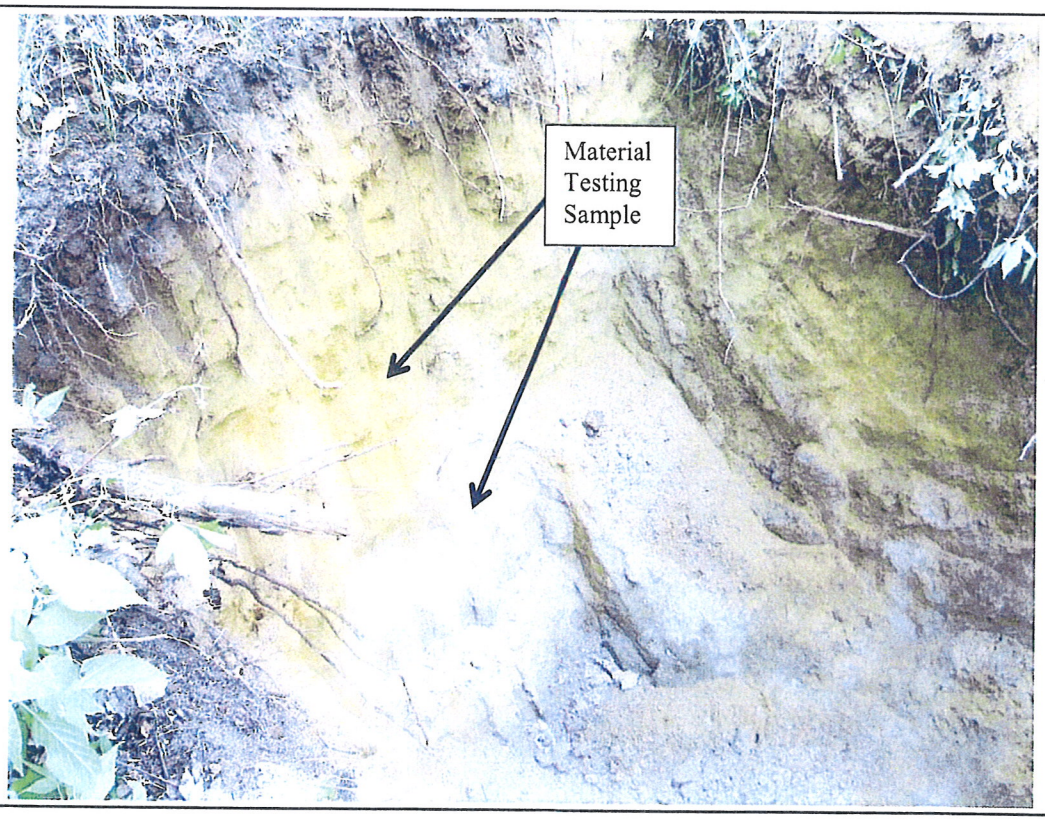
Date:
July 17, 2012

Site Location:
Thomas Point Road
Brunswick, Maine

Description:

Test Pit TP-12-03

Note trace water in bottom of pit.



Summit Environmental Consultants, Inc.

PHOTOGRAPHIC LOG

Client Name:	Project No.
PRIORITY GROUP, LLC	12-3178

Photo No. 3

Date:
July 17, 2012

Site Location:
Thomas Point Road
Brunswick, Maine

Description:

Test Pit TP-12-02

Photo No. 4

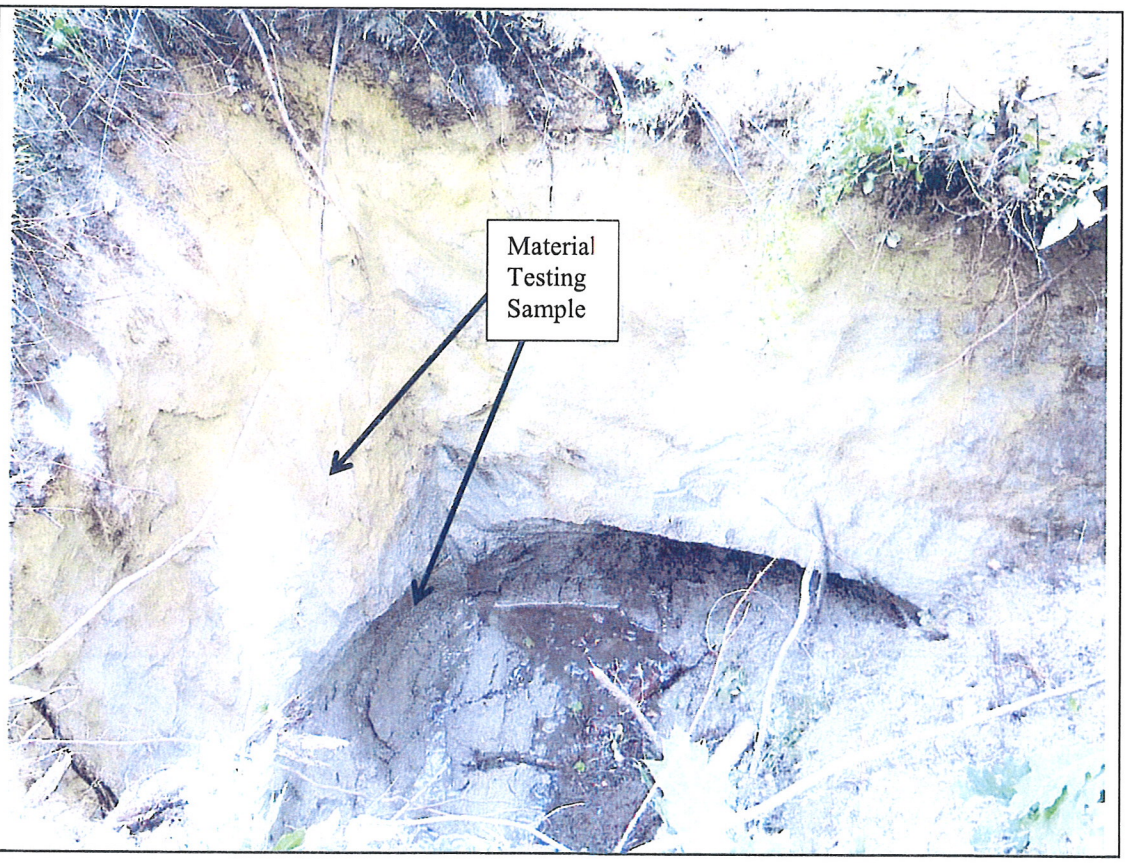
Date:
July 17, 2012

Site Location:
Thomas Point Road
Brunswick, Maine

Description:

Test Pit TP-12-02

Note free water in bottom of pit. Top of caving edge at approx. top of seasonal high water table



MATERIAL TESTING RESULTS
(Test Pit TP-12-02)

SUMMIT ENVIRONMENTAL CONSULTANTS, INC.
434 Cony Road, Augusta, Maine 04330
Ph: (207) 621-8334 Fx: (207) 626-9094

PERMEABILITY OF GRANULAR SOILS (Constant Head) ASTM D2434

PROJECT NAME:	Thomas Point - Brunswick, ME	PROJECT #:	12.3178
CLIENT:	Priority Group	SAMPLE #:	TP-12-02
SOIL DESCRIP:	Sand	DATE:	19-Jul-12
INTENDED USE:	Investigation	SOURCE:	TP-12-02
TECHNICIAN:	A. Higgins	DEPTH:	3' to 5.5'

Data

Maximum Particle Size:	#4	Dry Unit Weight:	94.05
Maximum Density (lbs./ft^3):	104.5	% Oversized Material:	0.0
% of Maximum Density:	90	Void Ratio:	0.76

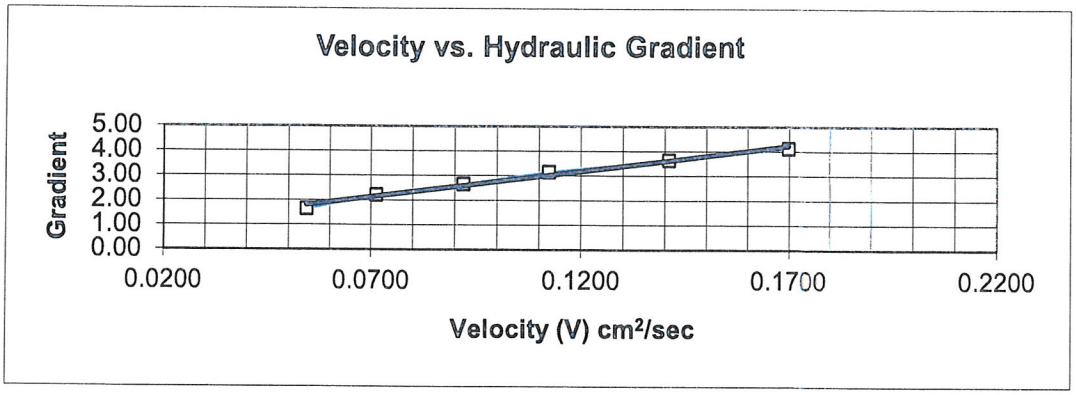
Results

Permeability (K_{20}) = QL/Ath

where:
Q = Quanity of water discharged (cm^3)
L = Distance between manometers (cm)
A = Cross sectional area of specimen (cm^2)
t = Total time of discharge (sec)
h = Difference in head (cm)

Permeability (K_{20}) = 3.67E-02 cm/sec.
52.02 in/hr

Test #	Velocity,v (Q/At)	Hydraulic Gradient, (h/L)	Permeability,KT (QL/Ath) cm/sec.	Corr. Factor	Permeability @ 20.0C
1	0.1698	4.12	4.12E-02	1.025	4.22E-02
2	0.1409	3.64	3.87E-02	1.025	3.96E-02
3	0.1122	3.15	3.56E-02	1.025	3.65E-02
4	0.0920	2.66	3.46E-02	1.025	3.55E-02
5	0.0712	2.21	3.22E-02	1.025	3.30E-02
6	0.0543	1.66	3.27E-02	1.025	3.36E-02
				Ave.	***3.67E-02***



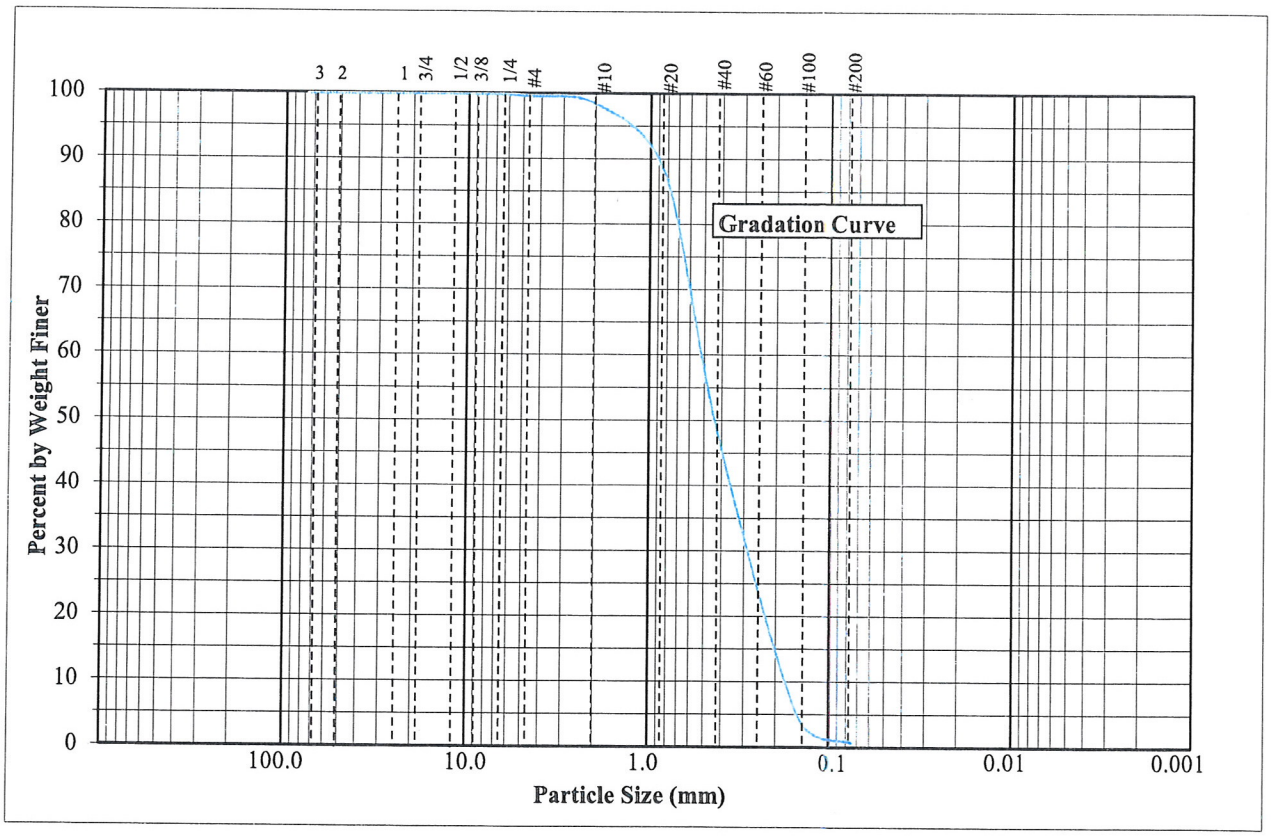
SUMMIT ENVIRONMENTAL CONSULTANTS, INC.
434 Cony Road, Augusta, Maine 04330
Phone:(207) 621-8334 Fax:(207) 626-9094

GRAIN SIZE ANALYSIS - ASTM D422

PROJECT NAME:	Thomas Point - Brunswick	PROJECT #:	12.3178
CLIENT:	Priority Group, LLC	SUMMIT SAMPLE:	TP-12-02
CLIENT SOIL DES:		INTENDED USE:	Investigation
SOURCE:	TP-12	SPECIFICATION:	
DATE:	July 18, 2012	TECHNICIAN:	M. Pellerin

DATA

PARTICLE SIZE mm		% BY WT FINER
76.20	(3 in)	100.0
50.80	(2 in)	100.0
38.10	(1-1/2 in)	100.0
25.40	(1 in)	100.0
19.05	(3/4 in)	100.0
12.70	(1/2 in)	100.0
9.53	(3/8 in)	100.0
6.35	(1/4 in)	99.9
4.75	(No. 4)	99.7
2.00	(No. 10)	98.5
0.85	(No. 20)	88.3
0.43	(No. 40)	48.2
0.15	(No. 100)	4.5
0.08	(No. 200)	0.7



REMARKS:

Reviewed: Darrell A. Gilman, CMT Manager
Date: 7/20/12

SUMMIT ENVIRONMENTAL CONSULTANTS, INC.
434 Cony Road, Augusta, ME 04330
PH: (207) 621-8334 FX (207) 626-9094

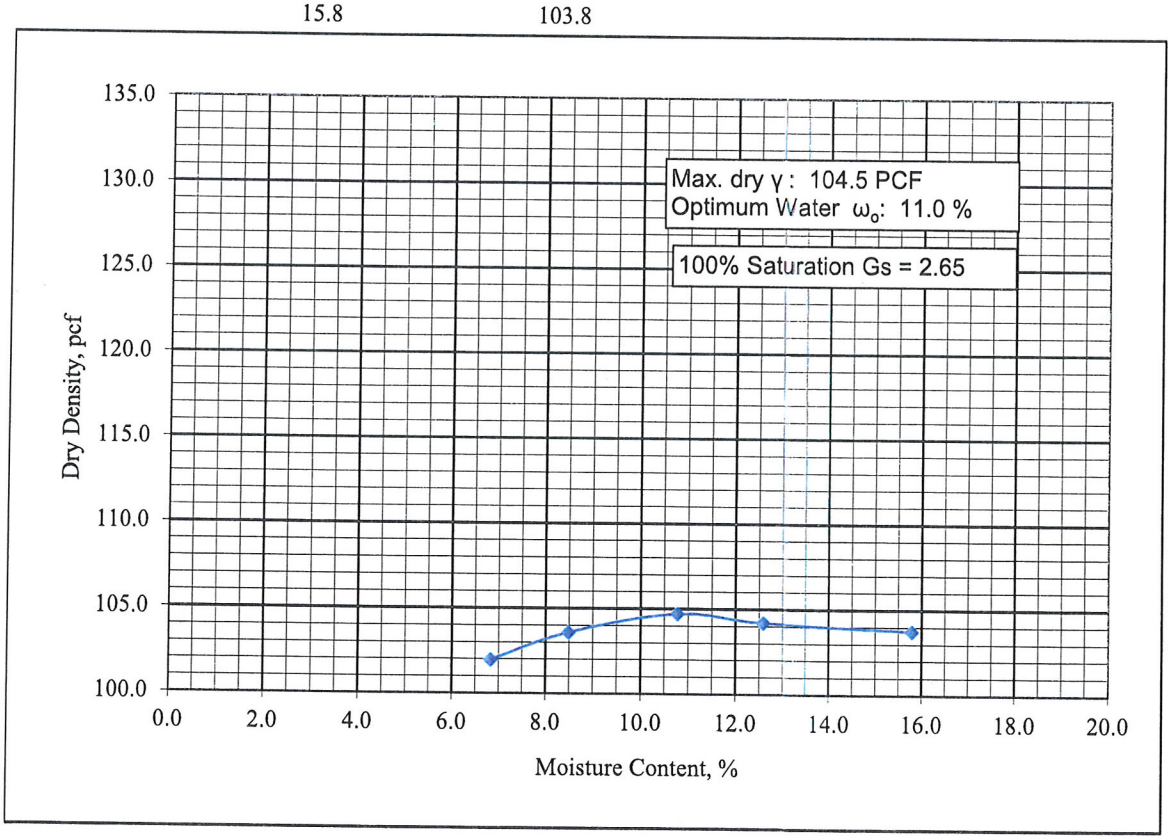
MOISTURE DENSITY TEST - ASTM D698

PROJECT NAME:	Thomas Point - Brunswick, Maine	PROJECT #:	12-3178
CLIENT:	Priority Group	SAMPLE #:	TP-12-02
SOIL DESCRIPTION:	Sand	DATE:	7/19/2012
INTENDED USE:	Investigation	SOURCE:	TP-12-02, 3' to 5.5'
		TECH.:	A. Higgins

DATA

Method:	A
Max. Particle Size (in):	#4
Oversize Correction (%):	0

Moisture Content %	Dry Density, pcf
6.8	102.0
8.5	103.6
10.8	104.7
12.6	104.2
15.8	103.8



Remarks:

Reviewed: Darrell Gilman, CMT Manager
Date: 7/19/12

MATERIAL TESTING RESULTS
(Test Pit TP-12-03)

SUMMIT ENVIRONMENTAL CONSULTANTS, INC.
434 Cony Road, Augusta, Maine 04330
Ph: (207) 621-8334 Fx: (207) 626-9094

PERMEABILITY OF GRANULAR SOILS

(Constant Head) ASTM D2434

PROJECT NAME:	Thomas Point - Brunswick	PROJECT #:	12-3178
CLIENT:	Priority Group	SAMPLE #:	TP-12-03
SOIL DESCRIP:	Sand	DATE:	20-Jul-12
INTENDED USE:	Investigation	SOURCE:	TP-12-03
TECHNICIAN:	D. Gilman	DEPTH:	3' - 5.5'

Data

Maximum Particle Size:	#4	Dry Unit Weight:	94.92
Maximum Density (lbs./ft^3):	105.5	% Oversized Material:	0.0
% of Maximum Density:	90	Void Ratio:	0.82

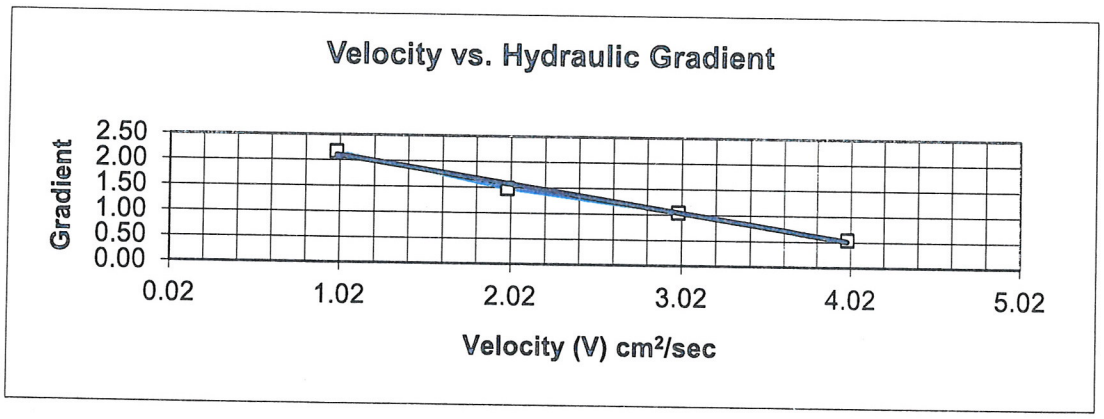
Results

Permeability (K_{20}) = QL/Ath

where:
Q = Quanity of water discharged (cm^3)
L = Distance between manometers (cm)
A = Cross sectional area of specimen (cm^2)
t = Total time of discharge (sec)
h = Difference in head (cm)

Permeability (K_{20}) = 9.06E-03 cm/sec.
12.84 in/hr

Test #	Velocity,v (Q/At)	Hydraulic Gradient, (h/L)	Permeability,KT (QL/Ath) cm/sec.	Corr. Factor	Permeability @ 200C
1	0.0190	2.17	8.77E-03	1.025	8.99E-03
2	0.0136	1.48	9.17E-03	1.025	9.40E-03
3	0.0090	1.04	8.68E-03	1.025	8.90E-03
4	0.0047	0.54	8.74E-03	1.025	8.96E-03
5					
6					
				Ave.	***9.06E-03***



Reviewed: D. Gilman, CMT Manager
Date: 7/23/2012

SUMMIT ENVIRONMENTAL CONSULTANTS, INC.
434 Cony Road, Augusta, ME 04330
PH: (207) 621-8334 FX (207) 626-9094

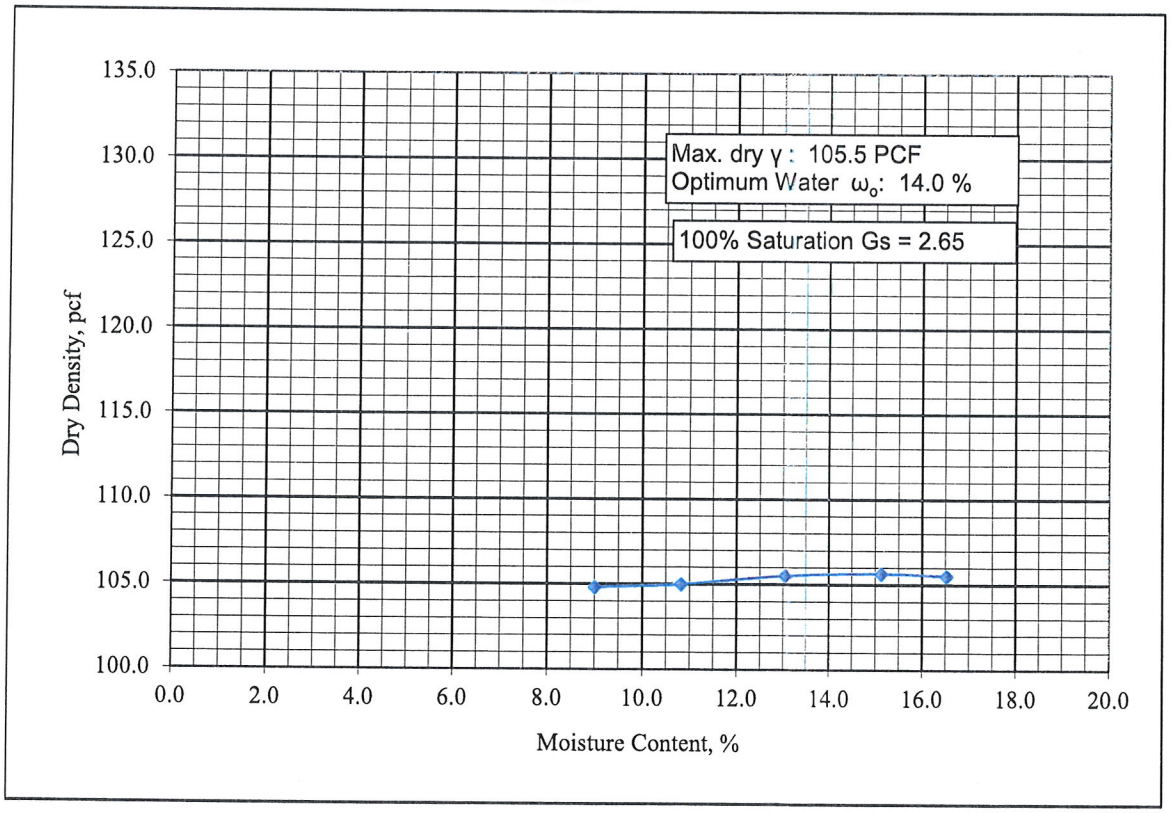
MOISTURE DENSITY TEST - ASTM D698

PROJECT NAME:	Thomas Point - Brunswick, Maine	PROJECT #:	12-3178
CLIENT:	Priority Group	SAMPLE #:	TP-12-03
SOIL DESCRIPTION:	Sand	DATE:	7/19/2012
INTENDED USE:	Investigation	SOURCE:	TP-12-03, 3' to 5.5'
		TECH.:	A. Higgins

DATA

Method:	A
Max. Particle Size (in):	#4
Oversize Correction (%):	0

Moisture Content %	Dry Density, pcf
9.0	104.8
10.8	105.0
13.0	105.5
15.1	105.7
16.5	105.5



Remarks:

Reviewed: Darrell Gilman, CMT Manager
Date: 7/19/12

Attachment F
Supporting Documents

Copies of relevant correspondence and documents pertaining to the project are enclosed.

May 29, 2012

2052-2

Mr. Wes Thames
Priority Group, LLC
2 Main Street
Topsham, ME 04086

Re: Designation of Agent Authorization
Medical Office Development, 14 Thomas Point Road, Brunswick, ME 04011

Dear Wes:

As required by various approval agencies, please indicate by signing below that Sitelines, PA is authorized to act as agent for Priority Group, LLC, for the specific purpose of preparation and submission of local and state permitting applications on your behalf for the proposed Medical Office Development to be located at 14 Thomas Point Road in Brunswick, ME.

Sincerely,

Joseph J. Marden, P.E.
Project Engineer

The undersigned hereby gives Sitelines, PA the authority to act as agent for Priority Group, LLC, for the specific purpose of preparation and submission of local and state permitting applications for the project specifically identified above.

Wes Thames, Vice President; Construction — Date 5/29/12

SITELINES, PA
ENGINEERS ▪ PLANNERS ▪ SURVEYORS ▪ LANDSCAPE ARCHITECTS
8 Cumberland Street ▪ Brunswick, ME 04011 ▪ TEL 207-725-1200 ▪ FAX 207-725-1114 ▪ www.sitelinespa.com

BRUNSWICK & TOPSHAM
WATER DISTRICT

Alan J. Frasier, PE
General Manager

Craig W. Douglas, PE
District Engineer

PO Box 489
Topsham, Maine 04086
Telephone (207) 729-9956
Fax (207) 725-6470

Daniel O. Knowles, CPA
Director of Finance and
Data Management Systems

William G. Alexander, Jr.
Operations Manager

July 9, 2012

Joseph J. Marden, P.E.
Sitelines
8 Cumberland Street
Brunswick, ME 04011
Via email: jmarden@sitelinespa.com

RE: 14 Thomas Point Road; Brunswick

Dear Mr. Marden:

This letter is to inform you that the District has the ability to serve the referenced project, and will provide service in accordance with Maine Public Utilities Commission and Brunswick & Topsham Water District Rules and Regulations.

Service must be taken from a public main in the street on which the property fronts. Our records indicate that there is an existing 1" domestic service to the site. According to your preliminary utility plan and accompanying letter, a new 6" fire service is required for the project. In order to properly size the water meter and verify the domestic service line size is adequate, the District requires the customer to provide us with the estimated peak flow in gallons per minute.

The District requires the customer or its authorized agent to make application for service for all new service and meter installation requests. An application form is enclosed for your convenience. Again, we require that the customer provide us with the estimated peak domestic demand so that we may properly size the meter. The sprinkler system designer should specify the service size required.

Please keep us informed as this project progresses. If you have any questions, please call.

Yours truly,

Eric Gagnon
Engineering Technician

Enc.

Cc: Craig Douglas

From: Jeff Emerson [jemerson@brunswickme.org]
Sent: Monday, June 25, 2012 10:56 AM
To: jmarden@sitelinespa.com
Cc: Ken Brillant; Carl Adams
Subject: RE: 2052-Medical Office Development (Thomas Point Road)

Joseph,
We were unable to attend the Staff Review for this project due to training; however, we did review the sketch plan and have no immediate concern with the proposed site plan. I did have the opportunity to discuss the building plan with Carl Adams the other day and feel that it is likely that the building will end up being sprinkled. We will conduct a comprehensive building plan review when plans are submitted. Thank you for contacting us.

Jeff Emerson
Deputy Chief
Fire Prevention Division
Brunswick Fire Department
21 Town Hall Place
Brunswick, ME 04011
207-725-5541 X 12
207-725-6638 Fax
jemerson@brunswickme.org

From: Joseph Marden [mailto:jmarden@sitelinespa.com]
Sent: Monday, June 25, 2012 9:55 AM
To: Ken Brillant
Subject: 2052-Medical Office Development (Thomas Point Road)

Chief Brillant,

Attached is a preliminary Site Plan for a Medial Office Development to be located at 14 Thomas Point Road in Brunswick, Maine. Architectural elevations are still being developed, but, as part of the proposed development, the existing 5,000 s.f. commercial building will be expanded by 5,000 s.f. and an attached 10,000 s.f. footprint field house will be constructed. The existing parking lot will be reconstructed and enlarged in order to accommodate the parking demand for the additional buildings. It is not known at this time if a sprinkler system will be required for the buildings. We anticipate the building to be serviced by public water, public sewer, propane gas, and underground electric. There is a fire hydrant located on the opposite side of Thomas Point Road. Per town requirements, we are requesting that you review the attached Site Plan and provide any comments or questions you may have.

Thanks,

Joseph J. Marden, P.E.
Project Engineer
Sitelines PA
8 Cumberland Street

Attachment G
Supporting Graphics

This attachment includes supporting materials and graphics for the application. This includes an excerpt of the FEMA flood rate insurance map (FIRM) and reduced size copies of the zoning map and tax maps. An excerpt of the applicable USGS 7.5 minute quadrangle map is provided for reference.

75 years Walpole Woodworkers

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fence & gates pergolas & arbors buildings & enclosures mail & lantern posts furniture exterior home decor garden decor wooden playsets & games

home fence & gates fence

Back to Fence

Magnum Plus Majestic

SKU: Magnum Plus Majestic

With a recommended height of 5', the Magnum Plus is noted for its understated charm and dignity. This three rail version features decorative rings.

Magnum Plus Majestic

Due to the many options available in our custom designs and shipping or installation complexities, we are unable to offer this product online. Please call 800-343-6948 and we will be delighted to be of service.

SHARE

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Products

exterior home decor
garden decor
mail & lantern posts
furniture
buildings & enclosures
fence & gates
pergolas & arbors
wooden playsets & games

Store locations

California
Connecticut
Florida
Massachusetts
Maryland
New Hampshire
New Jersey
New York
Ohio
Pennsylvania
Rhode Island
South Carolina
Virginia

Fences Types :
Picket Fence, Chain Link Fence, Board Fence, Lattice Fence

Gate Types :
Driveway Gates, Automatic Gates, Walk Gates, Entrance Gates

Pergolas :
Wood Pergolas, Vinyl Pergolas, Shade Pergolas, Garden Pergolas

Lantern Posts :
Wood Lantern Posts, Vinyl Lantern Posts

Arbors :
Wood Arbors, Vinyl Arbors, Garden Arbors

Playsets & Games :
Wooden Playsets

Fence Use :
Garden Fence, Privacy Fence, Pool Fence

Gates Use :
Security Gates, Entry Gates, Decorative Gates, Wrought Iron Gates

Buildings & Sheds :
Guest Houses, Pool Houses, Wood Sheds

Mail Posts :
Wood Mailposts, Vinyl Mailposts

Outdoor Furniture :
Patio Furniture, Cedar Outdoor Furniture, Teak Outdoor Furniture, Seaside Casual Furniture

Fence Materials :
Wood Fence, Vinyl Fence, Metal Fence, Wrought Iron Fence

Gate Materials :
Wood Gates, Vinyl Gates, Metal Gates

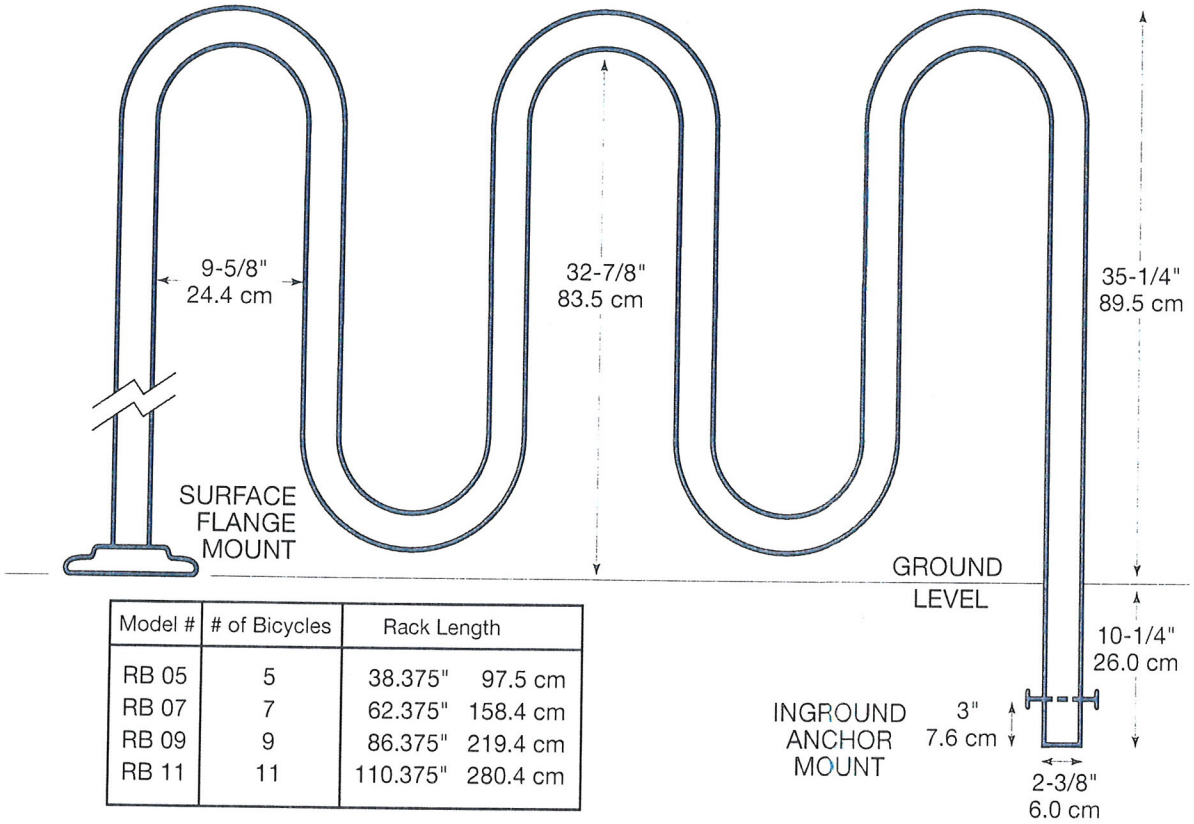
Window Boxes :
Wood Window Boxes, Vinyl Window Boxes

Planters :
Wood Planters, Vinyl Planters

Railings :
Wood Railings, Vinyl Railings, Metal Railings

The Original Ribbon® Rack—IDSA National Design Award Winner

PERMANENT DESIGN COLLECTION—MUSEUM OF MODERN ART



Model #	# of Bicycles	Rack Length	
RB 05	5	38.375"	97.5 cm
RB 07	7	62.375"	158.4 cm
RB 09	9	86.375"	219.4 cm
RB 11	11	110.375"	280.4 cm

Specifications

All standard units made from ASTM A53/A500 SCHD 40 steel pipe (2.375" OD X .154 wall), hydraulically bent with a mandril, hot-dipped galvanized after fabrication.
The RIBBON® RACK is available in ASTM A312 SCHEDULE 40 TP 304 stainless steel, satin #4 finish—optional and extra.

Installation Methods

Inground Anchor Mount—standard
Surface Flange Mount—optional and extra

General Information

RIBBON and the Brandir International Inc. logo are trademarks of Brandir International Inc., used exclusively by AAA RIBBON RACK CO.
Delivery time: Six weeks or sooner from receipt of order.

Important Considerations

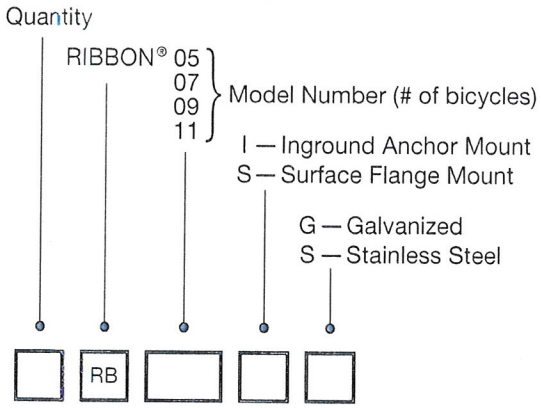
Colors: (Painting/Coating)—Painting or coating the rack will result in a maintenance problem, as no coating will withstand the abuse of the bicycles. Powder coating cannot be maintenanced; an enamel finish will chip. AAA RIBBON RACK CO. has the best solution where color is essential. Please contact us to find out how to achieve an appropriate color with a minimum of maintenance.

Materials: Steel tubing or aluminum are not suitable materials for a bicycle rack. Pre-galvanized material will flake and crack during manufacture. AAA RIBBON RACK CO. uses heavy-duty steel pipe, hot-dipped galvanized after fabrication to provide security and durability.

Manufacture: Hydraulic bending with a mandril, as used by AAA RIBBON RACK CO., insures smooth and aesthetic curves on the Ribbon® Rack. Press bending leaves an indentation; other methods flatten outer curves and crimp inner curves.

Specifying / Estimating / Ordering

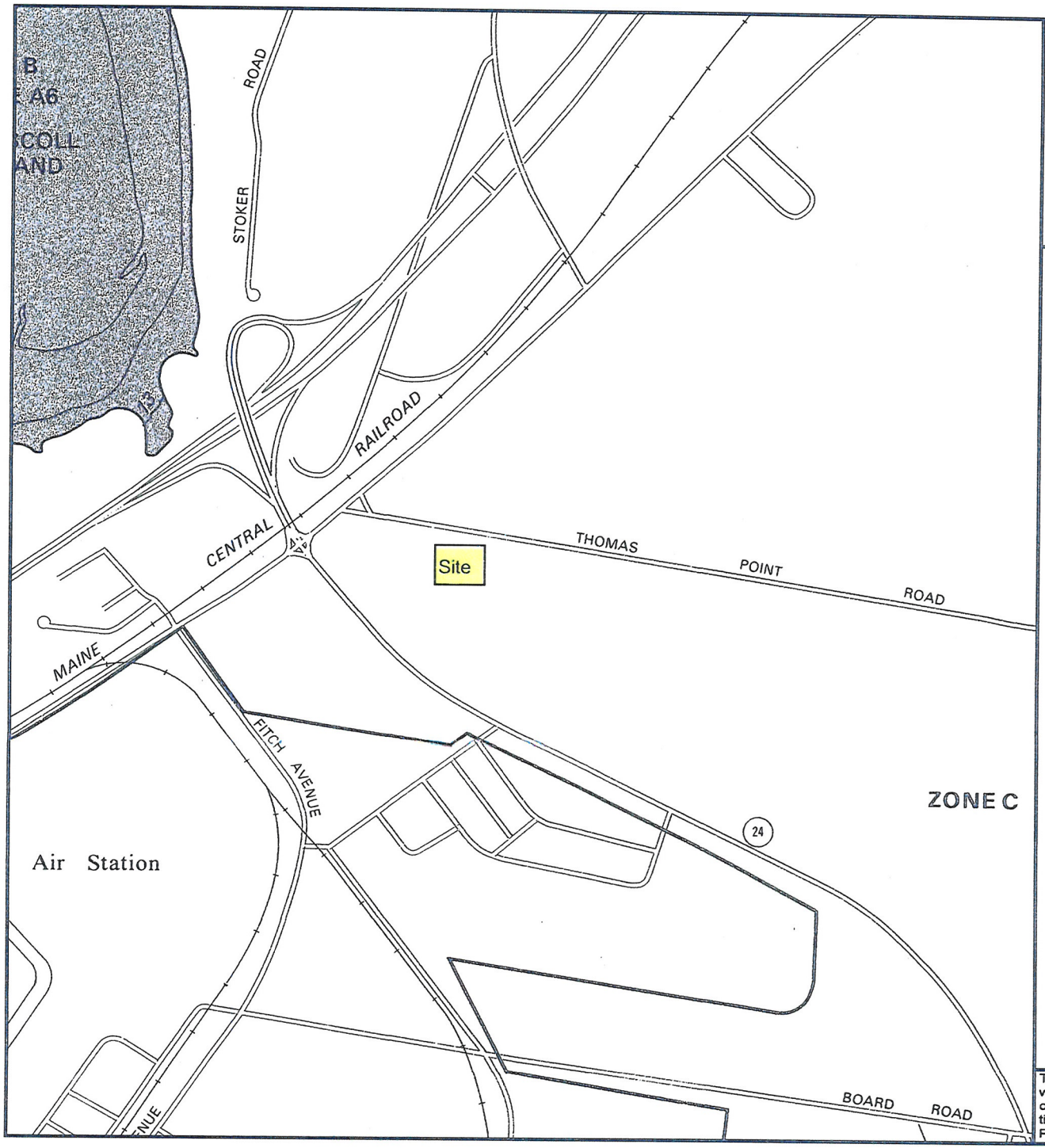
Please use the following notations:



A A A RIBBON BIKE RACK CO.
Division of:
BRANDIR INTERNATIONAL, INC.
521 Fifth Avenue, 17th Floor
New York NY 10175-1799 USA
Phone: **800-849-3488**
Email: **info@ribbonrack.com**
Web: **ribbonrack.com**

© 2010 Brandir International Inc

Thomas Point Rd
Project location:
14 Thomas Point Ro



APPROXIMATE SCALE

1000 0 1000 FEET

NATIONAL FLOOD INSURANCE PROGRAM

FIRM
FLOOD INSURANCE RATE MAP

TOWN OF
BRUNSWICK, MAINE
CUMBERLAND COUNTY

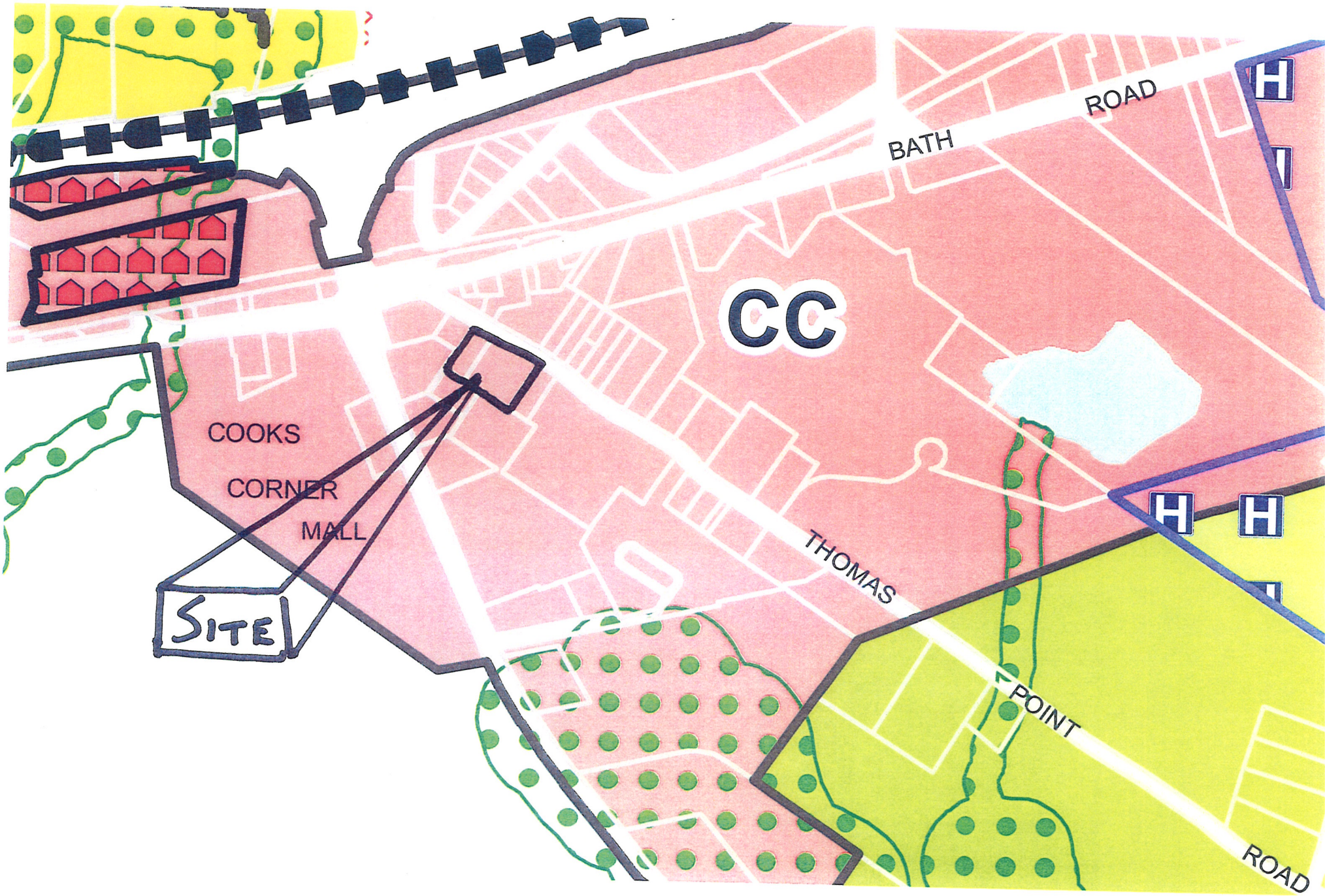
PANEL 15 OF 35
(SEE MAP INDEX FOR PANELS NOT PRINTED)

COMMUNITY-PANEL NUMBER
230042 0015 B

EFFECTIVE DATE:
JANUARY 3, 1986

Federal Emergency Management Agency

This is an official copy of a portion of the above referenced flood map. It was extracted using F-MIT On-Line. This map does not reflect changes or amendments which may have been made subsequent to the date on the title block. For the latest product information about National Flood Insurance Program flood maps check the FEMA Flood Map Store at www.msc.fema.gov


BATH
ROAD
CC
COOKS
CORNER
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POINT
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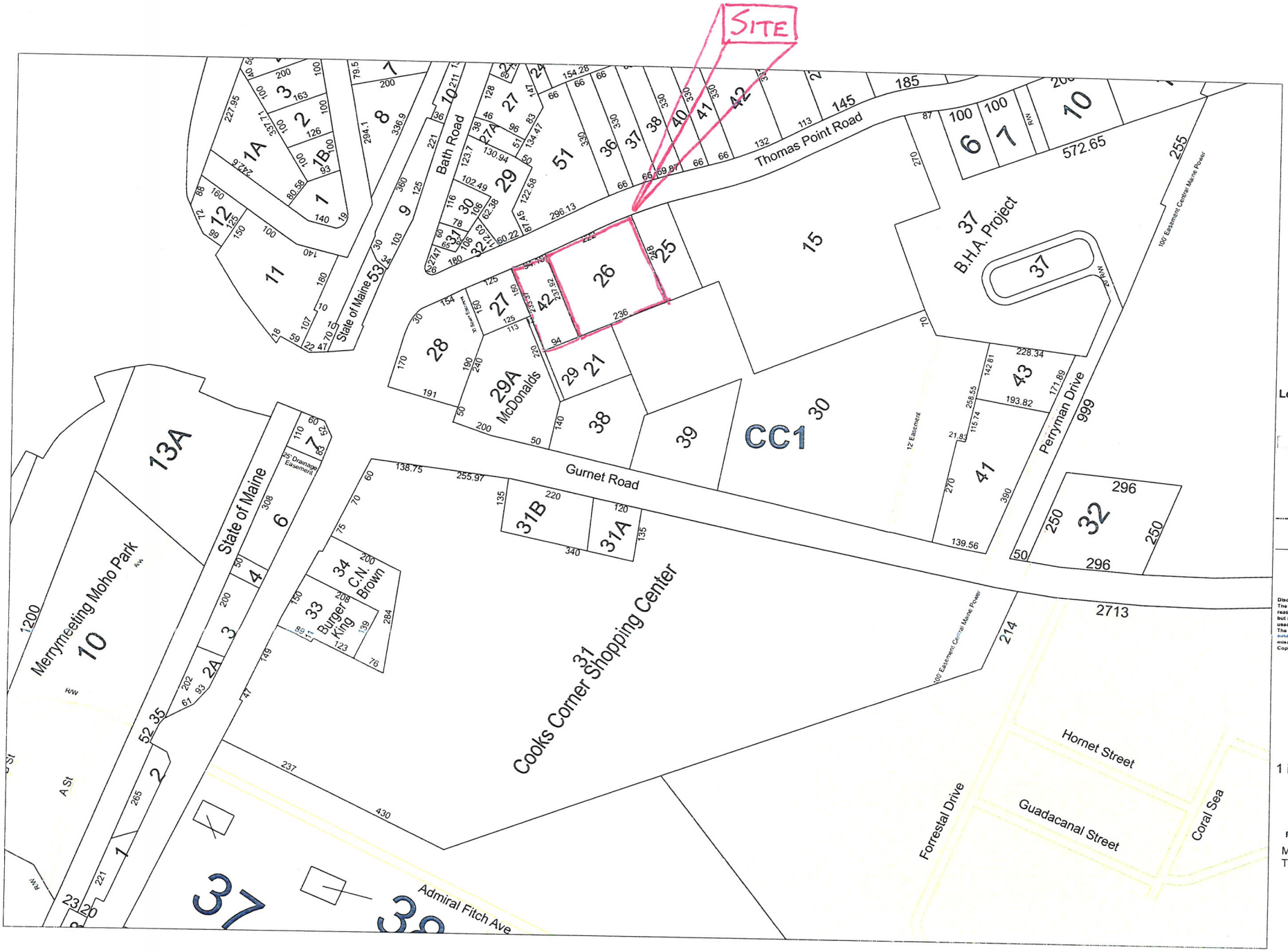
SITE
Thomas Point Road
Bath Road
State of Maine
Gurnet Road
Perryman Drive
B.H.A. Project
CC1
McDonalds
C.N. Brown
Burger King
Cooks Corner Shopping Center
Merrymeeting Moho Park
Hornet Street
Guadacanal Street
Forrestal Drive
Coral Sea
Admiral Fitch Ave
100' Easement Central Maine Power
12' Easement
25' Drainage Easement
Town of
BRUNSWICK
Maine
Legend
Public Road
Private Road
ROW
Water
Hydrography Line
ROW Property Access
Other Road
Town Boundary
Other Lot Boundary
Parcels_Lines
Disclaimer:
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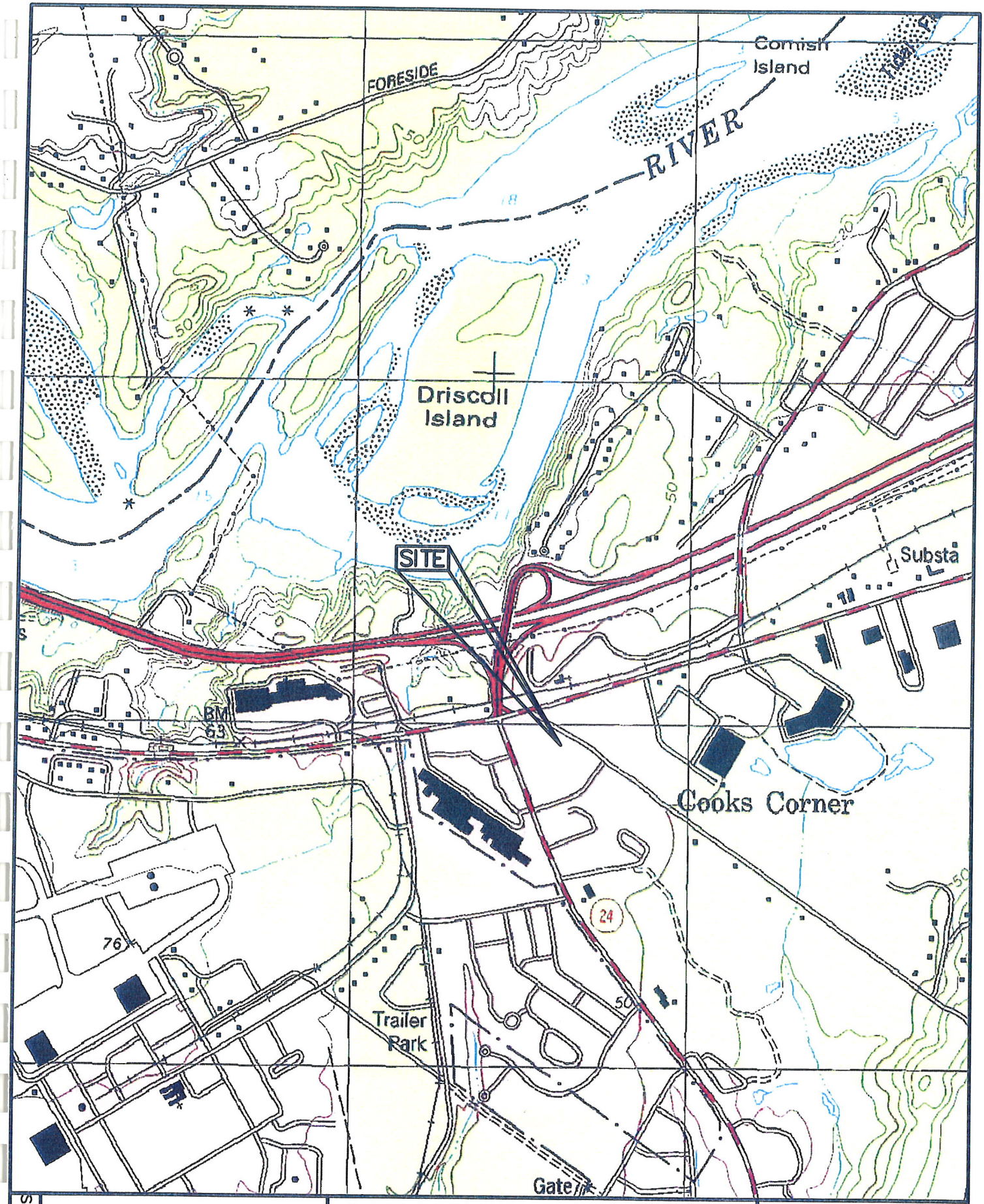
1 inch = 100 feet
Revised To: April 1, 2011
Maps Prepared by:
Town of Brunswick
MAP
CC1



SHEET: 1 OF 1

SITELINES
ENGINEERS PLANNERS

8 CUMBERLAND ST. BRUNSWICK, ME 04011
(207) 725-1200 FAX 725-1114

USGS LOCATION MAP

PROPOSED MEDICAL OFFICE DEVELOPMENT
PRIORITY GROUP, LLC
14 THOMAS POINT ROAD

DATE: 5/25/12	
SCALE: NOT TO SCALE	
JOB: 2052	
FILE: 2052-USGS	

Attachment H
Erosion and Sedimentation Control Plan

A detailed erosion and sediment control plan has been prepared. This plan will be part of the contract documents.

Erosion and Sedimentation Control Plan
"Proposed Medical Office Development"
Thomas Point Road, Brunswick, Maine

A. Narrative

I. Project Description

Priority Group, LLC (herein referred to as Applicant) is proposing construction of a 5,000 s.f. footprint addition to the existing 5,000 s.f. footprint commercial building and an attached 10,000 s.f. footprint field house. The development will include parking for 73 vehicles and will result in approximately 60,647 s.f. of impervious area (43,411 s.f. new).

II. Technical Guide

Best Management Practices

The stormwater maintenance management for this project will be performed consistent with the two references listed below and as amended in this plan. Where standards are not consistent, the more stringent requirement shall apply.

References

The primary references for the stormwater management design were as follows:

1 "Stormwater Management for Maine", Maine Department of Environmental Protection No. DEPLW0738, January 2006.

2 "Maine Erosion and Sedimentation Best Management Practices", Maine Department of Environmental Protection, current edition on-line.

III. Existing and Proposed Drainage Features

The proposed site has previously been developed, and is currently occupied by a 1.5-story 5,000 s.f. footprint commercial building and associated infrastructure. The building was originally occupied by a "Radio City" store, and is now partially occupied by a tattoo parlor. The topography of the site is relatively gradual across the entire site. Development of the site consists of the expansion of an existing building, construction of a new building, vehicular access, parking facilities, a stormwater management system, utilities and lawn/landscaped areas. Stormwater runoff from the existing development is directed to a shallow basin located to the rear of the parcel for infiltration. As part of the proposed development, the existing infiltration basin will be removed and stormwater runoff for the redevelopment will be collected and retained on-site, where it will be directed to a new subsurface infiltration system. No connection will be made to the storm drain system within Thomas Point Road.

IV. Erosion/Sedimentation Control Devices

The following erosion/sedimentation control devices are planned for this site during the construction period. These devices are installed as indicated on the drawings.

1. Sediment Barrier will be installed down gradient of disturbed areas to trap runoff borne sediments until the site is stabilized. Installation details are provided in the drawings on the Erosion Control detail sheets. If moderate to highly erodible soils are to be disturbed, then a wood waste compost/bark filter berm with a minimum height of 18 inches shall be placed down slope of the sediment barrier.

2. Straw or hay mulch is intended to provide cover for denuded or seeded areas until revegetation is established. Mulch placed on slopes of less than 10 percent shall be anchored by applying water; mulch placed on slopes steeper than 10 percent shall be covered with "Tenax R-4" fabric netting or approved equal and anchored with staples in accordance with the manufacturer's recommendations. Mulch application rates are provided as noted. Regardless of mulch application rate, soil must not be visible when mulching is complete. All slopes greater than 15% during regular construction season and 8% during winter season are to have mulch pinned down by netting or a manufactured combination pinned mulch/net matt may be used.

3. Loam and seed is intended to serve as the primary permanent stabilization method for all denuded areas not covered with other erosion control measures, such as riprap. Application rates are to be provided as noted.

4. No seeding or mulching shall be done when soil is covered by snow. If seeding is necessary, snow will be removed exposing bare soil before seeding and mulching.

5. If hydro seeding is used, all mulching/netting requirements still apply.

V. Temporary/Erosion/Sedimentation Control Measures

The following are planned as temporary erosion/sedimentation control measures during construction:

1. Sediment barrier shall be installed along the down gradient side of the parking areas, the vegetated filter basins and all fill sections. The sediment barrier will remain in place until the site is stabilized.

2. Temporary stockpiles of stumps, grubbings, or common excavation will be protected as follows:

   a. Temporary Stockpiles shall not be located within 25 feet of the wetlands nor in areas with slopes over 10 percent, and shall be located away from drainage swales.

b. The stockpile shall be stabilized within 14 days and be covered with mulch and "Terrajute" fabric netting. Sediment barrier shall be installed along the down gradient side of the stockpile.

c. Stockpiles shall be seeded, mulched and anchored with "Tenax R-4" fabric netting if they are to remain in place over 21 days.

3. All denuded areas, which have been rough graded and are not located within the parking and driveway sub base area, shall receive mulch or erosion control mesh fabric within 15 days of final grading.

4. If work is conducted between September 1st and December 1st of any calendar year, all denuded areas will be covered with hay mulch, applied at twice the normal application rate, and anchored with "Tenax R-4" fabric netting. The period between final grading and mulching shall be reduced to a 14-day maximum. The period between final grading and mulching shall be reduced 3 days for construction done between December 1st and March 30th.

5. Pavement shall be swept or washed to control mud and dust as necessary.

6. Seeding cutoff dates: All areas not permanently seeded by September 1st should (a) be temporarily seeded with rye and mulched by October 1st, (b) covered with sod by November 1st, or (c) mulched for over winter stabilization by November 15th.

VI. Permanent Erosion Control Measures

The following permanent erosion control measures have been designed as part of the Erosion/Sedimentation Control Plan:

1. All areas disturbed during construction, but not subject to other restoration (paving, riprap, etc.) will be loamed, limed, fertilized, mulched, and seeded. "Tenex R-4" fabric netting anchored with staples shall be placed over the mulch in areas where the finish grade slope is greater than 10 percent. This protection shall be installed within 7 days on the areas noted on the Erosion Control Plan Sheet; all other areas shall receive protection within 15 days. Native topsoil shall be stockpiled and reused for final restoration when it is of sufficient quality.

VII. Timing and Sequence of Erosion/Sedimentation Control Measures During Construction

THE FOLLOWING CONSTRUCTION SEQUENCE IS MANDATORY:

1. Install stabilized construction entrance and maintain until site is paved.

2. Only those areas necessary for construction will be disturbed.

3. Prior to the start of construction, sediment barrier will be installed across the slope(s), on the contour, at or just below the limits of clearing or grubbing, and/or just above any adjacent travelled way to protect it from construction-related erosion.

4. Clear and grub work site as needed to execute plans using caution not to over expose the site.

5. Stormwater management system and catch basins will be installed prior to construction of site elements that discharge to these systems. Catch basin inlet protection shall be installed in all new and existing catch basins that will receive runoff from the project. No stormwater should be directed to the subsurface infiltration system until the site is completely stabilized.

6. Begin footings and building foundation, including foundation drainage.

7. Disturbed areas will be permanently stabilized within 15 days of final grading, or temporarily stabilized within 30 days of the initial disturbances of soils. Disturbed areas will be stabilized before storms. Loam will be saved for later use where possible. Excess soil materials will be used as fill or removed from site to an approved location.

8. At a minimum, the erosion control measures shall be reviewed and repaired once a week or immediately following any significant rainfall or snowmelt. Sediment trapped behind these barriers shall be excavated when it reaches a depth of 6 inches and be discarded on the site. All erosion control measures shall be installed as indicated on the drawings.

9. Install utilities and appurtenances.

10. Construct parking areas.

11. Construct buildings.

12. Install pavement and curbing.

13. Loam, lime, fertilize, seed, and mulch landscaped and other disturbed areas.

14. Once the site is stabilized and a 90% catch of vegetation has been obtained, remove all temporary erosion control measures.

15. Touch up loam and seed.

Note: All denuded areas not subject to final paving, riprap or gravel shall be revegetated.

VIII. Submittals

The project may be bid to site contractors. The site contractor shall submit a schedule for the completion of the work, which will satisfy the following criteria:

1. Items in the construction sequence shall generally be completed in the specified order; separate items may be constructed simultaneously. Work must also be scheduled or phased to minimize the extent of the exposed areas as specified below. The intent of this sequence is to provide for erosion control and to have structural measures such as sediment barrier in place before large areas of land are denuded.

2. The work shall be conducted to:

   a. Limit the amount of exposed area to those areas in which work is expected to be undertaken during the proceeding 30 days.

   b. Revegetate disturbed areas as rapidly as possible. If areas are sited on the Erosion Control Plan Sheet as "Special Treatment", they shall be permanently stabilized within 24 hours; all other areas shall be permanently stabilized within 14 days of initial disturbance (7 days if area is located within 25 feet of wetland boundary).

   c. Incorporate planned inlets and drainage systems as early as possible into the construction phase. Surface drainage shall be immediately lined or revegetated as soon as installation is complete.

3. If the summer/fall construction schedule is not possible and construction is planned between September 1st and April 1st of any calendar year, then the Site Contractor shall submit a schedule, which will satisfy the following criteria:

   a. Limit the amount of exposed area to those areas in which work is expected to be undertaken during the proceeding 30 days.

   b. During the construction process, all disturbed areas shall be covered with mulch within 14 days of final grading.

   c. Once final grade has been established, the site contractor may choose to dormant seed the disturbed areas prior to placement of mulch and "Tenax R-4" fabric netting anchored with staples.

4. If dormant seeding is used for the site, all disturbed areas shall receive 4" of loam and seed at an application rate of 3.6#/1,000 s.f.

All areas seeded during the winter months will be inspected in the spring for adequate catch. All areas insufficiently vegetated (less than 90 percent catch) shall be revegetated by replacing loam, seed, and mulch.

a. The area of denuded non-stabilized construction shall be considered to be denuded until the sub base gravel is installed in parking areas, the base slab gravel is installed in building areas, or the areas of future loam and seed have been loamed, meshed, and mulched. The mulch rate shall be twice the rate specified in the seeding plan (90#/1,000 s.f. x 2 = 180#/s.f.).

b. Within the exposed work area, temporary sedimentation sumps shall be provided at the interface between parking areas and graded slopes. This shall be accomplished by creating an area 18" below adjacent temporary grades. The sedimentation area shall have a bottom width of 3" and 3:1 side slopes. Culverts to allow access shall be installed by the site contractor. Along the sedimentation sumps, barriers shall be provided at sufficient intervals to permit runoff to be accumulated to a minimum depth of 12" before overflowing.

c. If the project construction occurs such that winter construction is used, these items shall be deferred to permit their completion between May 15th and September 15th of any calendar year. The site contractor must use any added measures which may be necessary to control erosion/sedimentation from the site.

The site contractor shall note that no areas shall remain denuded for a period of over 30 days before it is temporarily stabilized. Temporary stabilization shall be installation of gravel or mulching.

IX. Provision for Maintenance of the Erosion/Sedimentation Control Features

The project will be contracted by the Owner for construction by a site contractor. The project is subject to the requirements of a MEDEP Permit-by-Rule (PBR). This permit requires the site contractor to prepare a list and designate by name, address and telephone number all individuals who will be responsible for implementation, inspection and maintenance of all erosion control measures identified within this section. As contained in the erosion and sedimentation control plan of the contract drawings of this section, one of these individuals shall prepare and sign a report which will include:

1. Assuring and certifying the owner's construction sequence is in conformance with the specified schedule of this section. A weekly certification stating compliance, any deviations, and corrective measures necessary to comply with the erosion control requirements of this section shall be prepared and signed by the inspector(s).

2. In addition to the weekly certifications, the inspector(s) shall maintain written reports recording construction activities on the site, which include:

- Dates when major grading activities occur in a particular area.
- Dates when construction activities cease in a particular area, either temporarily or permanently.
- Dates when an area is stabilized.

3. Inspection of the project work site on a weekly basis and after each significant rainfall event (0.5 inches or more within any consecutive 24-hour period) during construction until permanent erosion control measures have been properly installed and the site has been stabilized. Inspection of the project work site shall include:

- Identification of proper erosion control measure installation in accordance with the erosion control detail sheet or as specified in this section.

- Determine whether erosion control measure is properly operating. If not, identify damage to control device and determine remedial measures.

- Identify areas, which appear vulnerable to erosion and determine additional erosion control measures to improve conditions.

- Inspect areas of recent seeding to determine catch of grass. A minimum catch of 90 percent is required prior to removal of erosion control measures.

Accumulated silt/sediment should be removed when the depth of sediment reaches 50 percent of the barrier height. Accumulated silt/sediment should be removed from behind sediment barrier when the depth of the sediment reaches 6 inches.

4. If inspections of the site indicate a change should be made to the erosion control plan, to either improve effectiveness or correct a site-specific deficiency, the inspector shall immediately implement the corrective measure and notify the Owner, Owner's representative, and MEDEP project analyst of the recommended change.

5. Once construction has been completed, long-term maintenance of the catch basins will be the responsibility of the Owner. The catch basin sumps shall be inspected in April and October of each year. Sediment shall be removed when the depth of sediment reaches one-half the depth of the sump (typically 12").

All certifications, inspection forms, and written reports prepared by the inspector(s) shall be filed on site, and a copy will be kept at the general contractor's office. All written reports will be available for onsite inspection as needed.

X. Facility Operation and Maintenance

Maintenance measures will commence upon completion of construction. Maintenance measures shall consist of the following:

A. Storm drain maintenance shall be performed to maintain capacity.

B. Surface drainage shall be maintained to repair erosion problems and remove accumulated debris. As a minimum, channel deposition, and sediment barrier shall be reviewed and repaired once a week or immediately after any significant rainfall or snow melt. Sediment trapped behind barriers shall be excavated once it reaches a depth of 6" and regraded on site.

C. The storm drain pipes shall be maintained to keep inlets and outlets free of debris. As a minimum, inlets, outlets and their appurtenances shall be reviewed weekly.

XI. Seeding Plan:

1. Instructions on preparation of soil: Prepare a good seed bed for planting method used.

2. Apply lime as follows: 138#/1000 s.f.

3. Fertilize with 18.4 pounds of 10, 20, 10 N-P-K/1000 s.f.

4. Method of applying lime and fertilizer: Spread and work into the soil before seeding.

5. Seed with the following mixture:

   - 47% Red Fescue
   - 5% Red Top
   - 40% Tall Fescue
   - 7% Perennial Rye
   - 1% Inert

   When using small grain as nurse crop, seed it at one-half the normal seeding rate.

6. Mulching instructions: Apply at the rate of 90# per 1000 s.f.

	Amount	Units # Tons, Etc.
Total Lime	138	#/1000 s.f.
Total Fertilizer	18.4	#/1000 s.f.
Total Seed	3.0	#/1000 s.f.
Total Mulch	90	#/1000 s.f.

XIII. Construction Schedule

Site improvements will begin in the Summer of 2012 depending upon final project approval by the Owner.

B. Erosion and Sedimentation Control Plan

A comprehensive erosion and sedimentation control plan has been prepared as part of the site design to address temporary and permanent erosion and sedimentation control measures. Erosion control details, notes, and requirements are included in the submitted plan set.

Stormwater Facilities Inspection and Maintenance Plan

"Proposed Medical Office Development"
Thomas Point Road, Brunswick, Maine

1.0 GENERAL

This stormwater facilities maintenance plan has been prepared in support of the Maine Department of Environmental Protection Stormwater Permit-by-Rule Application for the proposed Medical Office Development in Brunswick, Maine. The requirements of this plan shall be incorporated into the efforts associated with the development including construction and ongoing operations.

2.0 BEST MANAGEMENT PRACTICES

2.1 Best Management Practices

During construction, a stabilized construction entrance, sediment barrier, erosion control blanket and/or erosion control mix, seeding, and mulching practices will be used in accordance with the Maine Department of Environmental Best Management Practices (BMP) manual during construction and until a stabilized condition exists.

After construction, stormwater BMPs will includes housekeeping and physical measures described herein, including subsurface infiltration systems, sweeping of paved surfaces, maintenance of storm drain pipes and outfalls.

The stormwater maintenance management for this project will be performed consistent with the two references listed below and as amended in this manual. Where standards are not consistent, the more stringent requirement shall apply.

2.2 References

The primary references for the stormwater management design were as follows:

1 "Stormwater Management for Maine", Maine Department of Environmental Protection No. DEPLW0738, January 2006.
2 "Maine Erosion and Sedimentation Best Management Practices", Maine Department of Environmental Protection, current edition on-line.

3.0 MAINTENANCE OF STORMWATER FACILITIES

3.1 General Responsibilities

The Contractor will be responsible for maintaining the stormwater BMPs and facilities until the construction phase of the project is complete and the site is permanently stabilized and accepted by the Applicant. These efforts shall include maintenance of temporary and permanent stormwater features and addressing interim site conditions as necessary. After acceptance of the development, the Applicant will be responsible for maintaining the permanent stormwater features as shown on the plan.

The Point of Contact for the Applicant is as follows:

Mr. Wes Thames
Priority Group, LLC
2 Main Street
Topsham, Maine 04086
Phone: 207-837-6159

3.1 General Requirements

The general requirements for this stormwater maintenance management manual will meet the standards of Reference No.1, specific to the water quality feature concerned. Additional maintenance requirements are identified in the following narratives.

3.2 Specific Maintenance Requirements

The following specific maintenance requirements apply to stormwater features as follows:

3.2.1 Catch Basins

- The maintenance of catch basins shall be performed monthly to ensure proper function. The hood and absorbent pads (Smart Sponge or approved equivalent) shall be present and in working condition.
- Debris and trash shall be removed from the catch basin sump when present.
- Sediment build-up in the sump should be removed when accumulation within 1 foot of the outlet pipe and/or snout hood is observed.

3.2.2 Storm Drain System

- Piped drainage systems shall be inspected in spring and late fall, and after heavy rains to remove any obstructions to flow; remove accumulated sediments and debris at the inlet, at the outlet, and within the conduit; and to repair any erosion damage at the culvert's inlet and outlet. Sediment should be removed when its level exceeds 20% of the pipe diameter. Hydraulic flushing or any mechanical means may accomplish sediment removal. Care shall be taken to contain the sediment at the pipe outlet.

3.2.3 Paved Surfaces

- Accumulations of winter sand along impervious areas shall be cleared at least once a year, preferably in the spring. Accumulations on pavement may be removed by pavement sweeping. Accumulations of sand along the edge of paved areas may be removed by grading excess sand to the pavement edge and removing it manually or by a front-end loader.

3.2.4 Vegetative Surfaces

- For most vegetative surfaces, grass should be mowed on a regular basis so that grass height does not exceed 6 inches. Any erosion rills, gullies, or bare spots should be seeded or sodded to re-establish the turf cover.

- Buffer, screening, and decorative landscaping should be inspected for health on a regular basis. Pruning, weeding, feeding, and mulching should be accomplished annually or as needed.

3.2.5 Subsurface Infiltration System

- Inspect the subsurface infiltration system on a quarterly basis the first year, with yearly inspections thereafter. Flushing of the system should be performed if sediment depth exceeds 6" or 15% of the system height.

4.0 INSPECTION AND MAINTENANCE CHECK-LIST

4.1 Maintenance Frequency

Notwithstanding any other schedule noted herein, general inspections should be conducted monthly during wet weather conditions from March to November.

4.2 Inspection and Maintenance Checklist

Inspection of the stormwater facilities shall be completed by individual qualified by experience or training to assess their condition and performance. Maintenance actions required will be documented, completed and inspected by individuals trained or experienced in such maintenance. An inspection and maintenance checklist specific to the facilities for this development is included.

Medical Office Development
Brunswick, Maine
Stormwater Inspection and Maintenance Log

Performed by:_____ **Date:**_____

Feature	Description of maintenance	Recorded Observation/Corrective Action Taken or Required
Storm Drain Pipes	Inspect for evidence of sediment	
	Inspect for clogging debris and material	
Paved Surfaces	Inspect for excessive sediment deposits, trash and debris.	
	Inspect for evidence of cracking	
Vegetative Surfaces	Inspect for vegetative cover of at least 85%	
Subsurface Infiltration System	Inspect for evidence of sediment	
Catch basins	Inspect for presence of sediment in traps; remove sediment if within 1 foot of outlet invert or hood.	
	Inspect frame and grate to verify grate is flush with finish grade.	
	Inspect for presence of trash and debris.	
	Inspect oil adsorbent material (Smart Sponge). Replace per manufacturers recommendations.	

Attachment I
Stormwater Management Plan

A stormwater management plan has been prepared including computations and sizing of the infiltration system.

STATE OF MAINE
CURTIS
Y.
NEUFELD
No. 9779
LICENSED
PROFESSIONAL ENGINEER

MEDICAL OFFICE DEVELOPMENT
14 THOMAS POINT, BRUNSWICK, MAINE

STORMWATER MANAGEMENT PLAN

Introduction

Priority Group, LLC (herein referred to as Applicant) is proposing the development of a medical office building and field house, with associated parking, infrastructure and landscaping to be located along Thomas Point Road. As part of the proposed development, the existing 5,000 s.f. commercial building will be expanded by 5,000 s.f. and an attached 10,000 s.f. footprint field house will be constructed. The existing parking lot will be reconstructed and enlarged in order to accommodate the parking demand for the additional buildings.

The project parcel has an existing stormwater management system, including a shallow infiltration basin located to the rear. This basin was observed to be empty after recent rainfalls in excess of six (6) inches of precipitation, providing evidence the soils are well suited for infiltration. As part of the proposed development, the existing infiltration basin will be removed and stormwater runoff for the redevelopment will be collected and retained on-site, where it will be directed to a new subsurface infiltration system. No connection will be made to the storm drain system within Thomas Point Road.

Study Methodology

Topographical data was obtained from on the ground survey. Hydrologic boundaries were generated using the topographic mapping and the drainage patterns were verified by a site reconnaissance visit. Surficial soils located in the vicinity of the site were obtained from the United States Department of Agriculture Natural Resources Conservation Service Soil Survey Geographic (SSURGO) Database (see Attachments). The Applicant's parcel includes the soil classifications listed below.

SOILS TYPES IN LOCAL STUDY AREA

Soils Series	Hydrologic Group (HSG) **
AU Gres	B
Croghan	B

**Hydrologic Soils Group taken from SCS TR-55 Manual

For the development of the abutting Regal Cinemas (formerly Hoyts Cinema), a Class A Soil Survey was completed by Albert Frick Associates, Inc. in November of 1994. As part of their investigation, they determined that the Hydrologic Group for soils on the cinema parcel was mostly Group B. As such, for the purposes of this report, a Hydrologic Group B is assumed for the soils located on the site. Upon the completion of a Geotechnical Study for the subject parcel, this will be amended as necessary.

Flooding

The project area is located in Zone C (Areas of Minimal Flooding) of the Flood Insurance Rate Maps (FIRMs) for Cumberland County, Maine. The project area is located on Panel 15 of 35 (Community Panel 230042-0015-B, Effective June 3, 1986). An excerpt of the applicable FIRM is enclosed.

Off-Site Watersheds

The site is located on Thomas Point Road within the area of Brunswick known as Cook's Corner. The section of Thomas Point Road adjacent to the project was constructed with a storm drain system that drains towards Bath Road. As understood from discussions with Town staff, the storm drain system is at capacity and no further connections to the system are recommended. The developed land adjacent to the site have drainage systems installed. There are no areas that drain onto the project area.

Pre-Development Conditions

The proposed site has previously been developed, and is currently occupied by a 1.5-story 5,000 s.f. footprint commercial building and associated infrastructure. The existing improvements result in approximately 17,236 s.f. (0.40 acres) of impervious area. Drainage flows generally to the rear of the lot where the runoff is conveyed to a shallow infiltration basin.

Post-Development Conditions

Under post-development conditions, the parcel will be redeveloped and some of the land use will be converted to impervious areas (roofs and parking). The current design, including all phases, represents approximately 60,544 s.f. (1.39 acres) of impervious surface, or an increase of 43,308 s.f. (0.99 acres).

Site Stormwater Evaluation

The parcel was evaluated for drainage options based on the site conditions. The lack of topographic change, absence of natural features and drainage ways demonstrated that the use of surface conveyances or storm drain was not compatible with these conditions. The selection of a drainage system that discharged directly into the existing storm drain system would be the most practical method, but the existing municipal storm drain system is over-capacity. With the majority of the site covered in impervious area, a subsurface detention and infiltration system was selected which maintained site watershed conditions while providing stormwater attenuation.

A stormwater management design was developed that would allow for the use of infiltration for stormwater while also providing for pre-treatment. Catch basins will provide pre-treatment through the installation of sumps, hoods and adsorbent pads to collect and store coarse sediment and other pollutants.

A proprietary subsurface storage unit called StormTank was selected for this use due to its significant (97%) porosity and shallow profile that allowed maximum storage volumes for relatively smaller treatment areas. This storage unit uses a plastic frame to create a subsurface storage volume while providing excellent infiltration properties to the well-drained soils below. This is the same product used at the Brunswick High School. The StormTank units are available in depths of 18" or 36" and

are stackable. For this development, a 36" deep, single-layer design was chosen to increase separation from groundwater. A copy of the brochure for the StormTank unit is enclosed with this report, and details for the unit can be found within the submitted plan set. A HydroCAD model was developed for the project which models the proposed detention and infiltration system to ensure that it is sized adequately for the project. The HydroCAD report is enclosed for your review.

As part of a proposed redevelopment of the abutting Atrium, a Geotechnical Study was completed by Summit Geoengineering Services on October 21, 2007. As part of that study, it was determined that the permeability rates for the soils in the area were between 10 and 45 inches per hour. Based on this information, and the fact that the existing shallow infiltration basin located on the site appears to drain adequately, we believe that an infiltration system would be applicable in this area. A Geotechnical Study for the Medical Office Development is being completed, but is not available at the time of this submission. As such, a conservative infiltration rate of 2.41 inches per hour was used in all calculations. A copy of the report from Summit Geoengineering Services is included with this submission for reference.

Results

The following table indicates the peak runoff rates and water elevations within the StormTank system for the 2, 10, 25, and 100-year, 24-hour storm events. A base elevation of 44.00' was used for the 3' deep StormTank Units.

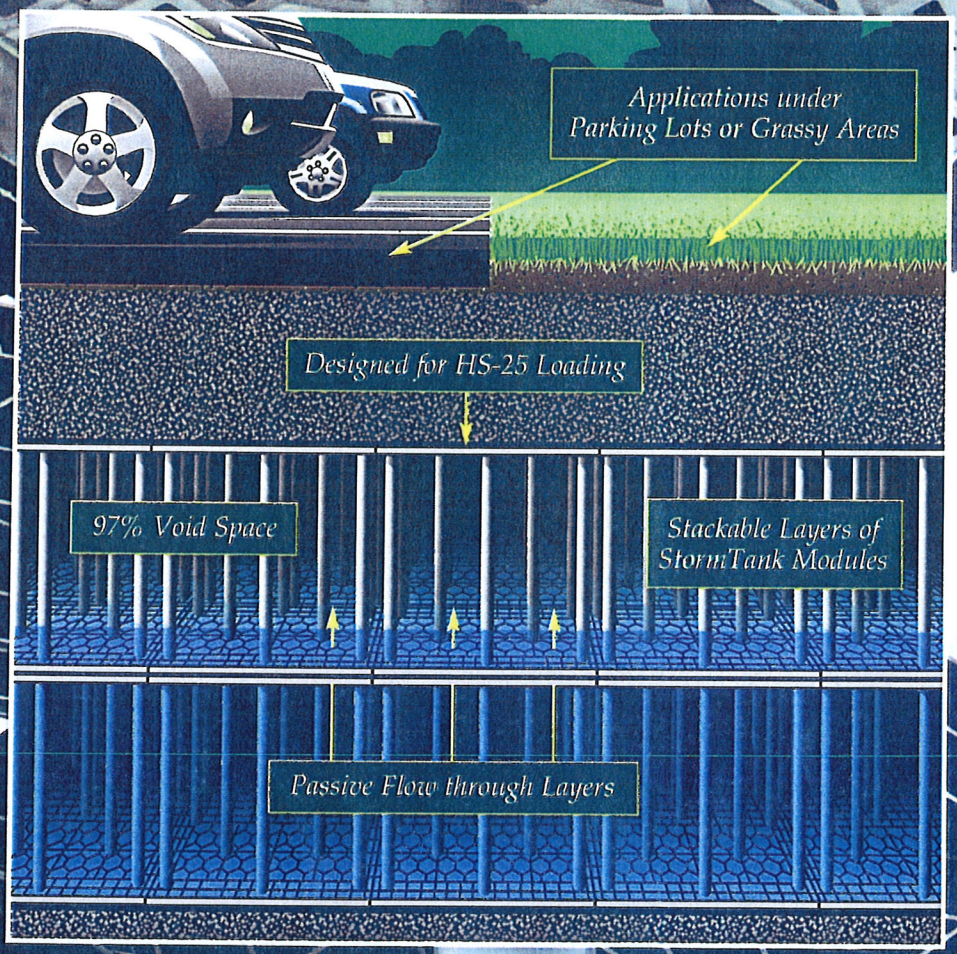
Design Storm	Peak Runoff Rate (cfs)	Peak Elevation (ft)
2-Year	4.04	44.45
10-Year	6.52	45.09
25-Year	7.68	45.44
100-Year	9.41	46.00

As shown in the table above, in the 100-year storm, assuming an infiltration rate of 2.41 inches per hour, there is still one foot of freeboard between the peak water elevation and the top of the StormTank unit.

Conclusion

Runoff from the new and redeveloped impervious area for the project will be captured and conveyed to a subsurface infiltration system. The stormwater management plan will not adversely impact the municipal drainage system, adjacent parcels, or the receiving water bodies. By including infiltration in the design, the stormwater management plan will promote groundwater recharge, simulating the natural cycle. The proposed project has been conceived with erosion and sedimentation controls and BMPs during and after construction.

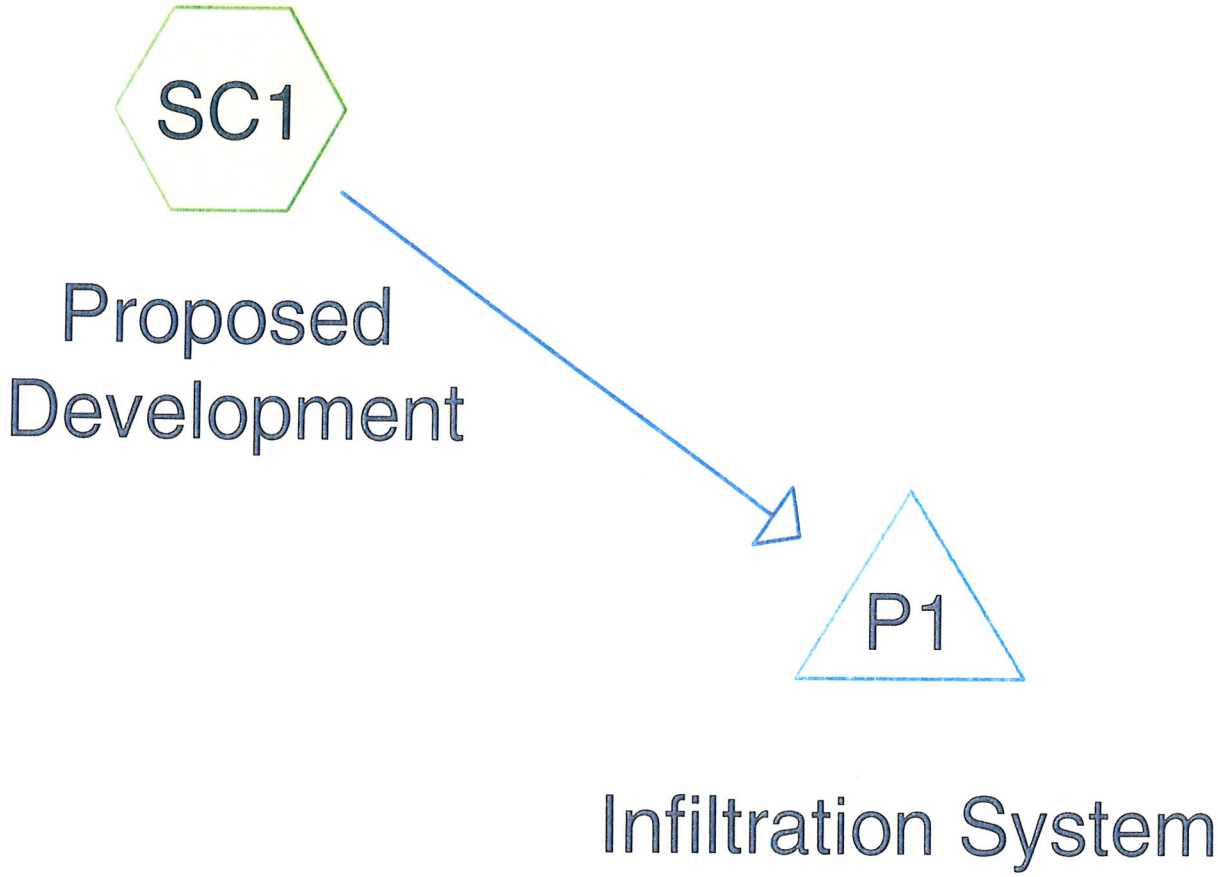
STORMTANK™ STORMWATER STORAGE MODULES



StormTank™

Stormwater Storage Modules are a high-void, strong, affordable alternative to crushed stone, concrete structures, or pipe chambers for sub-surface stormwater detention or infiltration basins.

BRENTWOOD INDUSTRIES



Drainage Diagram for 2052proposed
Prepared by Sitelines PA 7/12/2012
HydroCAD® 7.10 s/n 001100 © 2005 HydroCAD Software Solutions LLC

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

Subcatchment SC1: Proposed Development Runoff Area=62,550 sf Runoff Depth>2.55"
Tc=5.0 min CN=96 Runoff=4.04 cfs 0.305 af

Pond P1: Infiltration System Peak Elev=43.95' Storage=4,621 cf Inflow=4.04 cfs 0.305 af
Outflow=0.42 cfs 0.305 af

Total Runoff Area = 1.436 ac Runoff Volume = 0.305 af Average Runoff Depth = 2.55"

Subcatchment SC1: Proposed Development

[49] Hint: Tc<2dt may require smaller dt

Runoff = 4.04 cfs @ 12.07 hrs, Volume= 0.305 af, Depth> 2.55"

Runoff by SCS TR-20 method, UH=SCS, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Type III 24-hr 2 Yr Storm Rainfall=3.00"

Area (sf)	CN	Description
58,815	98	Pavement
3,735	61	>75% Grass cover, Good, HSG B
62,550	96	Weighted Average

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

Pond P1: Infiltration System

Inflow Area = 1.436 ac, Inflow Depth > 2.55" for 2 Yr Storm event
Inflow = 4.04 cfs @ 12.07 hrs, Volume= 0.305 af
Outflow = 0.42 cfs @ 11.60 hrs, Volume= 0.305 af, Atten= 90%, Lag= 0.0 min
Discarded = 0.42 cfs @ 11.60 hrs, Volume= 0.305 af

Routing by Stor-Ind method, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Peak Elev= 43.95' @ 12.80 hrs Surf.Area= 7,462 sf Storage= 4,621 cf
Plug-Flow detention time= 79.4 min calculated for 0.305 af (100% of inflow)
Center-of-Mass det. time= 78.8 min (853.4 - 774.6)

Volume	Invert	Avail.Storage	Storage Description
#1	43.00'	4,975 cf	**Custom Stage Data (Prismatic)** Listed below (Recalc) 33,579 cf Overall - 21,141 cf Embedded = 12,438 cf x 40.0% Voids
#2	43.50'	20,507 cf	**Custom Stage Data (Prismatic)** Listed below (Recalc) Inside #1 21,141 cf Overall x 97.0% Voids
		25,482 cf	Total Available Storage

Elevation (feet)	Surf.Area (sq-ft)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)
43.00	7,462	0	0
47.50	7,462	33,579	33,579

Elevation (feet)	Surf.Area (sq-ft)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)
43.50	7,047	0	0
46.50	7,047	21,141	21,141

Device	Routing	Invert	Outlet Devices
#1	Discarded	0.00'	**2.410 in/hr Exfiltration over Surface area**

Discarded OutFlow Max=0.42 cfs @ 11.60 hrs HW=43.05' (Free Discharge)
└─**1=Exfiltration** (Exfiltration Controls 0.42 cfs)

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

Subcatchment SC1: Proposed Development Runoff Area=62,550 sf Runoff Depth>4.23"
Tc=5.0 min CN=96 Runoff=6.52 cfs 0.506 af

Pond P1: Infiltration System Peak Elev=44.59' Storage=9,100 cf Inflow=6.52 cfs 0.506 af
Outflow=0.42 cfs 0.506 af

Total Runoff Area = 1.436 ac Runoff Volume = 0.506 af Average Runoff Depth = 4.23"

Subcatchment SC1: Proposed Development

[49] Hint: Tc<2dt may require smaller dt

Runoff = 6.52 cfs @ 12.07 hrs, Volume= 0.506 af, Depth> 4.23"

Runoff by SCS TR-20 method, UH=SCS, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Type III 24-hr 10 Yr Storm Rainfall=4.70"

Area (sf)	CN	Description
58,815	98	Pavement
3,735	61	>75% Grass cover, Good, HSG B
62,550	96	Weighted Average

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

Pond P1: Infiltration System

Inflow Area = 1.436 ac, Inflow Depth > 4.23" for 10 Yr Storm event
Inflow = 6.52 cfs @ 12.07 hrs, Volume= 0.506 af
Outflow = 0.42 cfs @ 10.95 hrs, Volume= 0.506 af, Atten= 94%, Lag= 0.0 min
Discarded = 0.42 cfs @ 10.95 hrs, Volume= 0.506 af

Routing by Stor-Ind method, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Peak Elev= 44.59' @ 13.54 hrs Surf.Area= 7,462 sf Storage= 9,100 cf
Plug-Flow detention time= 174.9 min calculated for 0.505 af (100% of inflow)
Center-of-Mass det. time= 174.0 min (936.6 - 762.6)

Volume	Invert	Avail.Storage	Storage Description
#1	43.00'	4,975 cf	**Custom Stage Data (Prismatic)** Listed below (Recalc) 33,579 cf Overall - 21,141 cf Embedded = 12,438 cf x 40.0% Voids
#2	43.50'	20,507 cf	**Custom Stage Data (Prismatic)** Listed below (Recalc) Inside #1 21,141 cf Overall x 97.0% Voids
		25,482 cf	Total Available Storage

Elevation (feet)	Surf.Area (sq-ft)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)
43.00	7,462	0	0
47.50	7,462	33,579	33,579

Elevation (feet)	Surf.Area (sq-ft)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)
43.50	7,047	0	0
46.50	7,047	21,141	21,141

Device	Routing	Invert	Outlet Devices
#1	Discarded	0.00'	**2.410 in/hr Exfiltration over Surface area**

Discarded OutFlow Max=0.42 cfs @ 10.95 hrs HW=43.05' (Free Discharge)
└─**1=Exfiltration** (Exfiltration Controls 0.42 cfs)

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

Subcatchment SC1: Proposed Development Runoff Area=62,550 sf Runoff Depth>5.03"
Tc=5.0 min CN=96 Runoff=7.68 cfs 0.602 af

Pond P1: Infiltration System Peak Elev=44.94' Storage=11,542 cf Inflow=7.68 cfs 0.602 af
Outflow=0.42 cfs 0.556 af

Total Runoff Area = 1.436 ac Runoff Volume = 0.602 af Average Runoff Depth = 5.03"

Subcatchment SC1: Proposed Development

[49] Hint: Tc<2dt may require smaller dt

Runoff = 7.68 cfs @ 12.07 hrs, Volume= 0.602 af, Depth> 5.03"

Runoff by SCS TR-20 method, UH=SCS, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Type III 24-hr 25 Yr Storm Rainfall=5.50"

Area (sf)	CN	Description
58,815	98	Pavement
3,735	61	>75% Grass cover, Good, HSG B
62,550	96	Weighted Average

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

Pond P1: Infiltration System

Inflow Area = 1.436 ac, Inflow Depth > 5.03" for 25 Yr Storm event
Inflow = 7.68 cfs @ 12.07 hrs, Volume= 0.602 af
Outflow = 0.42 cfs @ 10.50 hrs, Volume= 0.556 af, Atten= 95%, Lag= 0.0 min
Discarded = 0.42 cfs @ 10.50 hrs, Volume= 0.556 af

Routing by Stor-Ind method, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Peak Elev= 44.94' @ 13.92 hrs Surf.Area= 7,462 sf Storage= 11,542 cf
Plug-Flow detention time= 227.8 min calculated for 0.555 af (92% of inflow)
Center-of-Mass det. time= 187.7 min (946.6 - 758.9)

Volume	Invert	Avail.Storage	Storage Description
#1	43.00'	4,975 cf	**Custom Stage Data (Prismatic)** Listed below (Recalc) 33,579 cf Overall - 21,141 cf Embedded = 12,438 cf x 40.0% Voids
#2	43.50'	20,507 cf	**Custom Stage Data (Prismatic)** Listed below (Recalc) Inside #1 21,141 cf Overall x 97.0% Voids
		25,482 cf	Total Available Storage

Elevation (feet)	Surf.Area (sq-ft)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)
43.00	7,462	0	0
47.50	7,462	33,579	33,579

Elevation (feet)	Surf.Area (sq-ft)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)
43.50	7,047	0	0
46.50	7,047	21,141	21,141

Device	Routing	Invert	Outlet Devices
#1	Discarded	0.00'	**2.410 in/hr Exfiltration over Surface area**

Discarded OutFlow Max=0.42 cfs @ 10.50 hrs HW=43.05' (Free Discharge)
└─**1=Exfiltration** (Exfiltration Controls 0.42 cfs)

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

Subcatchment SC1: Proposed Development Runoff Area=62,550 sf Runoff Depth>6.22"
Tc=5.0 min CN=96 Runoff=9.41 cfs 0.745 af

Pond P1: Infiltration System Peak Elev=45.50' Storage=15,514 cf Inflow=9.41 cfs 0.745 af
Outflow=0.42 cfs 0.581 af

Total Runoff Area = 1.436 ac Runoff Volume = 0.745 af Average Runoff Depth = 6.22"

Subcatchment SC1: Proposed Development

[49] Hint: Tc<2dt may require smaller dt

Runoff = 9.41 cfs @ 12.07 hrs, Volume= 0.745 af, Depth> 6.22"

Runoff by SCS TR-20 method, UH=SCS, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Type III 24-hr 100 Yr Storm Rainfall=6.70"

Area (sf)	CN	Description
58,815	98	Pavement
3,735	61	>75% Grass cover, Good, HSG B
62,550	96	Weighted Average

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

Pond P1: Infiltration System

Inflow Area = 1.436 ac, Inflow Depth > 6.22" for 100 Yr Storm event
Inflow = 9.41 cfs @ 12.07 hrs, Volume= 0.745 af
Outflow = 0.42 cfs @ 9.95 hrs, Volume= 0.581 af, Atten= 96%, Lag= 0.0 min
Discarded = 0.42 cfs @ 9.95 hrs, Volume= 0.581 af

Routing by Stor-Ind method, Time Span= 0.00-24.00 hrs, dt= 0.05 hrs
Peak Elev= 45.50' @ 14.59 hrs Surf.Area= 7,462 sf Storage= 15,514 cf
Plug-Flow detention time= 249.9 min calculated for 0.581 af (78% of inflow)
Center-of-Mass det. time= 169.8 min (924.4 - 754.6)

Volume	Invert	Avail.Storage	Storage Description
#1	43.00'	4,975 cf	**Custom Stage Data (Prismatic)** Listed below (Recalc) 33,579 cf Overall - 21,141 cf Embedded = 12,438 cf x 40.0% Voids
#2	43.50'	20,507 cf	**Custom Stage Data (Prismatic)** Listed below (Recalc) Inside #1 21,141 cf Overall x 97.0% Voids
		25,482 cf	Total Available Storage

Elevation (feet)	Surf.Area (sq-ft)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)
43.00	7,462	0	0
47.50	7,462	33,579	33,579

Elevation (feet)	Surf.Area (sq-ft)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)
43.50	7,047	0	0
46.50	7,047	21,141	21,141

Device	Routing	Invert	Outlet Devices
#1	Discarded	0.00'	**2.410 in/hr Exfiltration over Surface area**

Discarded OutFlow Max=0.42 cfs @ 9.95 hrs HW=43.05' (Free Discharge)
└─**1=Exfiltration** (Exfiltration Controls 0.42 cfs)

SEBAGO TECHNICS

CIVIL ENGINEERING • SURVEYING • LANDSCAPE ARCHITECTURE

Memorandum

12214

TO: Kris Hultgren, Town Planner

FROM: James Seymour, P.E.
Development Engineering Review Consultant
Sebago Technics, Inc.

DATE: July 26, 2012

RE: Stormwater Management Plan Review
Priority Group LLC - Medical Office Development Expansion
Thomas Point Rd., Brunswick, Maine

We have reviewed the submitted drawings and drainage design for the proposed Medical Office Development for Priority Group LLC to be located off Thomas Point Road. The site is located in the CC (Cook Corner Center) Zone. We have been requested to review the plan to assess whether it has met the Brunswick Ordinance requirements under Section 411.5 Stormwater Management. That section references stormwater design standard compliance with the Stormwater Management for Maine: Best Management Practices as published by the Maine Department of Environmental Protection (Maine DEP) November 1995 and also references Section 504: Stormwater Management.

We received a copy of the Proposed Site Layout Plan set, along with the written Stormwater Management Plan as prepared by Curtis Neufield P.E. of Sitelines, PA. The Town's Ordinance references a manual which was replaced by the Maine DEP in 2005. Therefore, we feel it is in the best interest of the Town to enforce the standards as closely as possible to today's Maine DEP Stormwater Best Management Practices (BMP). The site appears to have been constructed prior to the 2005 cutoff date by the Maine DEP, such that it may develop an additional acre of impervious surface before triggering a stormwater permit. Based on that, if the site disturbs an acre of soil, it will require a Stormwater Permit-By-Rule, which essentially looks at the Basic Standards equal to an Erosion and Sedimentation Control Plan.

The plan calls for a new addition and parking area to be added to the existing structure on the property. The building location is positioned such that it creates an "L" type footprint in the western corner of the lot. The Engineer has prepared a design where all runoff from the parking area will be diverted into a runoff infiltration system of plastic chamber/boxes located under the parking lot, where it will be allowed to seep back into the sandy soils without discharge onto an abutting lot.

Our concern with the design is the design of the infiltration as it relates to the most current Maine DEP's Stormwater Management BMP requirements as noted below:

75 John Roberts Road • Suite 1A • South Portland, ME 04106-6963 • 207.200.2100 • Fax 207.856.2206

1. The Maine DEP does not typically allow for direct infiltration of stormwater into existing soils without some level of pre-treatment or removal of sediment/pollutants. This may entail deep sumps on catch basins, isolator rows in the chamber type system, forebays, or settling areas. The design as such shows excessively deep sumps. We have not seen the construction detail for the selected Brentwood Industries Stormtank system as would be installed for this site. We would recommend that the system include a measure similar to the BMP requirement for an Isolator Row.

2. The design included geotechnical information regarding existing soil permeability for the system as proposed. That data indicates a very rapid draining soil in the order of 12 in/hr upwards to 52 in/hr. This far exceeds the Maine DEP limitations for maximum infiltration rates. The Engineer has based detained storage on a slower rate as allowed of 2.41 in/hr but the system will not function as designed and will drain much faster. The design shall include a restrictive layer of fine sands, as directed by the Maine BMPs which will restrict actual flow to the design rate of 2.41in/hr. Excessive runoff infiltration theoretically harms groundwater quality as the rate is so rapid contaminants and pollutants from runoff don't have time to be filtered out and migrate directly into groundwater.

3. The system itself because it promotes direct infiltration without any use of filtration lenses for treatment could be considered an injection well application under the Maine DEP which would require registration and permitting separately with the Maine DEP. We believe the concern is that there is no containment, or there is measure to prevent contact with subsurface soils with groundwater should a pollution spill occur. Therefore, we recommend that the applicant consider the additional measures to promote pretreatment and filtration measure.

4. The StormTank system itself appears that it may be within the seasonal groundwater elevation. The Test pit logs indicate that the groundwater is 5 to 5.5 feet below existing grade at or near elevation 45.0. The tank bottom is shown at 43.5 per the typical detail section. Typically, the Maine DEP requires a foot separation between the system bottom and seasonal groundwater elevation. Concerns will be that the system could partial fill with groundwater decreasing infiltration capacity or discharge rates. The applicant should carefully review the groundwater elevations and determine that the system will be above groundwater seasonal elevations. The plan also indicates that the site could be subject to minimal flooding (Zone C). Will that flooding area affect the performance of the system, and what is the source of the minimal flooding?

Other items to discuss with the applicant regarding drainage are as follows:

1. The building is positioned very close to the Promto Inc. and MacDonald's property lines and with the finish floor raised to 51.5. The grading will need to be shown in this confined area sufficient to not promote ponding on the adjacent lots, and to assure roof drainage can be directed into the drainage system or by other means not to impact abutting properties.

2. The Thomas Point Road sidewalk as proposed does not show grading. Along this section of road the elevation is relatively level as noted by the easterly curb cut being a constant grade across the intersection with the proposed driveway. If a sidewalk is proposed the applicant shall verify that the sidewalk elevation will not create a "false curb" to pond runoff on Thomas Point Road, or will not be build such that it will have a flooding or icing issue due to cascading runoff from the street. We realize that this is not an easy solution but one that needs to be discussed with Public

Works or the City Engineer. The sidewalk shall conform to a Town Standard for sidewalk cross-section since it is within the Right of Way.

3. More details will be required for the StormTank infiltration system to include cross sections with piped invert elevations, clean out structures, preferred isolator rows or similar, and liners if necessary to keep out groundwater.

4. Although it is implied that there is no change in the pre condition watershed mapping and that all runoff will be discharged through the ground, it would be useful to verify the timing and distance of sheet flow of the proposed condition and to verify the areas contributing to the catch basins/infiltration system.

Please feel free to contact me if you or the design-professional has questions with our comments or concerns. We will be available to assist you and the applicant, if warranted, to address any further questions. We look forward to assisting the Town and applicant to work through design issues and zoning requirements associated with this important community project development within the Town of Brunswick.

JRS:jrs/kn

July 26, 2012

2052-7

Kris Hultgren, Town Planner
Town of Brunswick
28 Federal Street
Brunswick, Maine 04011

Re: Response to Review Engineer Comments
MEDICAL OFFICE DEVELOPMENT
14 THOMAS POINT ROAD, BRUNSWICK, MAINE
Tax Map CC1, Lot 26 & 42

Dear Kris,

We have reviewed the comments provided by Sebago Technics, Inc., following their review of the project plans, particularly with regard to the stormwater management plan. Their comments generally were concerned with the design of the system relative to Maine Department of Environmental Protection criteria for infiltration as published in 2005.

We acknowledge those criteria provide a solid foundation for design. In this instance, given the necessity of the site to retain & infiltrate stormwater volumes for major storm events as well as the water quality volume, we request the town consider some variance from those criteria, particularly in light of the use of infiltration on parcels in the immediate area. We would like to work with Town staff to arrive at a design rate acceptable to all parties.

The infiltration rates and depth to groundwater were not available at the time the subsurface infiltration system was designed for submission. Based on the geotechnical information made available, Sitelines will modify the design to conform as nearly with the DEP criteria as possible. We will also included pre-treatment of stormwater at the catch basin by means of sumps, hoods or shouts, and adsorbent pads. We will work with the product manufacturer to regarding an isolator row type component; however, we note that there was none included for the high school design.

The other items listed for discussion are addressed below:

The building proximity to the adjacent Promto site is the same as current conditions. Runoff from the portion of the roof draining in that direction will infiltrate at the drip line as it has done for the existing installation. Sitelines examined the drip line the morning after we had approximately 6" of rain and saw no evidence of local drainage issues (See attached photo).

The sidewalk adjacent to Thomas Point Road will have an esplanade area approximately 7' wide and will be constructed at existing grades. Given the well drainage nature of the soils, ponding of water shedding from the roadway is not anticipated. The sidewalk will be constructed to drain away from the esplanade and will be constructed to the Town Standard.

As requested, additional details for the StormTank infiltration system will be prepared and provided for review. Sitelines can address the comments in greater detail and we are certain we can modify the stormwater management plan to the satisfaction of the Town Staff and Engineer. Whereas these details are technical in nature and will revise only a subsurface component of the site, we request they be address as a condition of approval.

Should you have any questions, please call.

Very truly yours,

Curtis Y. Neufeld, P.E.
Vice President

Enclosures

cc: Jim Howard, Priority Group, LLC

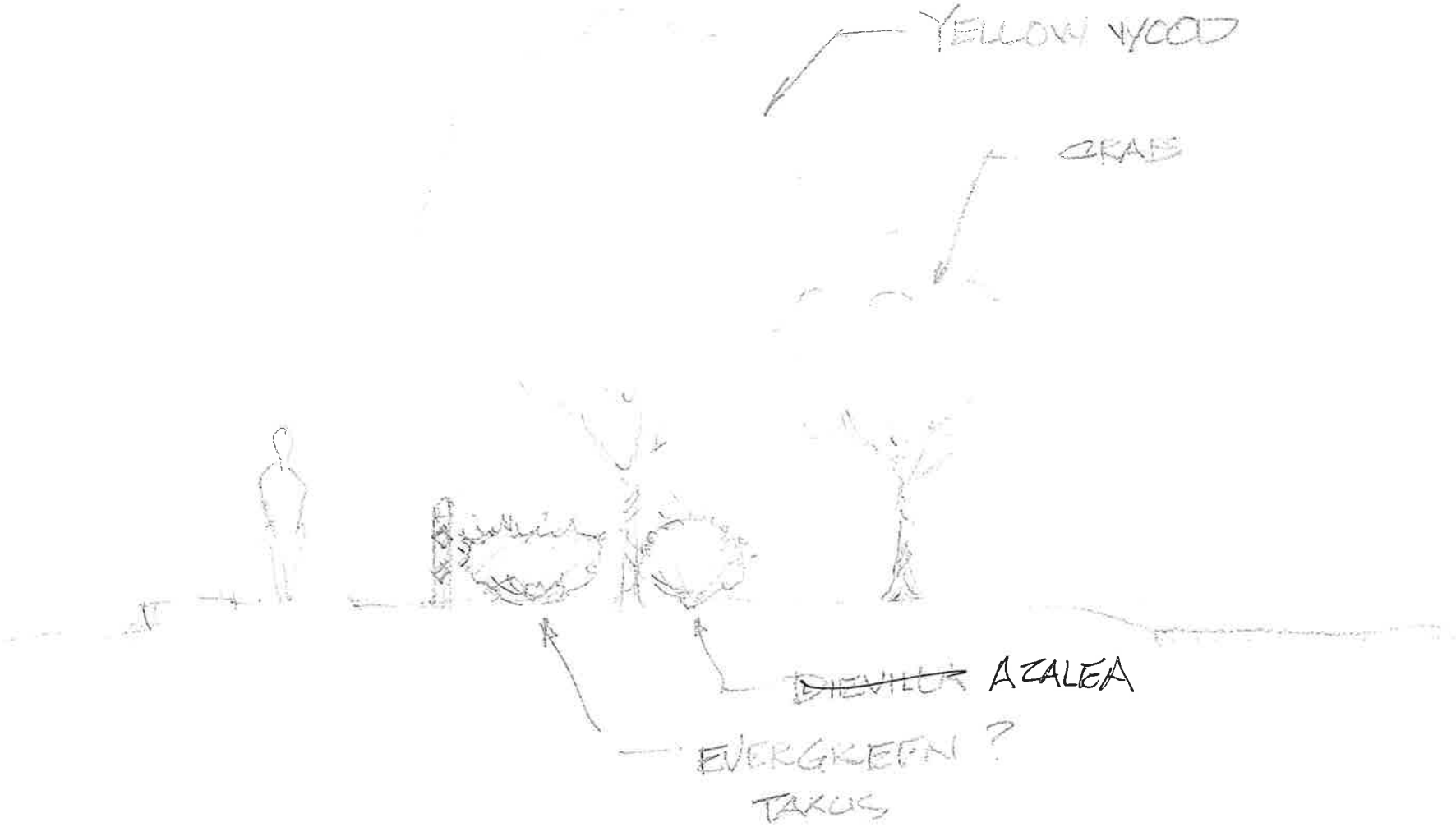
Drip edge at Radio City building following 6"+ rain event June 4, 2012

Attachment J
Floor Plan & Elevations

Architectural floor plans and elevations of the proposed good building are enclosed for reference.

Attachment K
Landscape Plan

A copy of the Landscape Plan and details are enclosed.


YELLOW WOOD
GRASS
~~DEVILLA~~ AZALEA
EVERGREEN ?
TAXUS

Attachment L
Lighting Plan

A copy of the Lighting Plan and applicable lighting cut-sheets are enclosed.

Medical Office Bldg. Project

Date	Jul 11, 2012
Project Name	Medical Office Bldg.
Project Number	2052
Project File	2052 LITEPRO.PZP

Project Location: Medical Office Bldg.

Project Description:
Site Area Lighting

Prepared By:
FACushing

Prepared For:
Priority Group LLC
Topsham, Maine

Generated by LitePro version 2.030, which is provided and supported by Columbia Lighting, Alera, and Prescolite. Calculations are performed in accordance with IESNA procedures. Columbia, Alera, and Prescolite are not responsible for the light output of lamps and ballasts, or design variables not shown.

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Group Schedule

Date	Jul 11, 2012
Project Name	Medical Office Bldg.
Project Number	2052
Project File	2052 LITEPRO.PZP
Group Name	2052
Power Density	0.01 Watts/Sq. Ft

Luminaires Used

TYPE	QTY	TEST#	DESCRIPTION
A-3H	1	T3HS	Spaulding Light, RCS-x-MS25-H3-HS OUTDOOR ARCHITECTURAL ROADWAY REFL: SPECULAR ALUMINUM ENCL: *LAMPS: (1) MVR250/HOR, 21000 LUMENS* *BLST: , WATTS= 288*
A-4	2	T4	Spaulding Light, RCS-x-MS25-H4 OUTDOOR ARCHITECTURAL ROADWAY REFL: HAMMERTONE ALUMINUM ENCL *LAMPS: (1) MVR250/HOR, 21000 LUMENS* *BLST: , WATTS= 288*
A-5	3	T5	Spaulding Light, RCS-A-MS25-H5P OUTDOOR ARCHITECTURAL ROADWAY REFL: SPECULAR ALUMINUM ENCL: *LAMPS: (1) MVR250/HOR, 21000 LUMENS* *BLST: , WATTS= 285*
CW2	3	lli07040	GRANDLITE / HUB, TRP 150PX WT 16-3/4" X 9-1/4" X 7-1/8" SURF WIDE THROW TYPE SPECULAR REFLE *LAMPS: (1) GE MXR150/U/MED, 12500 LUMENS* *BLST: ADVANCE M102 71, WATTS= 185*
DW1	3	lli07040	GRANDLITE/HUBBE, TRP 70PX FT 16-3/4" X 9-1/4" X 7-1/8" SURF FORWARD THROW TYPE SPECULAR RE *LAMPS: (1) GE MXR70/U/MED, 5000 LUMENS* *BLST: ADVANCE M102 71, WATTS= 185*

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Assemblies Used

ASSY	QTY	DESCRIPTION	TYPE	MHT	ORI	TILT	ROLL	BRKLEN	BRKROT
1A3H	1	T3 HS 250	A-3H	25.00	90	0	0	0.50	0
1A4	2	T4 250 SQ.STEEL	A-4	25.00	180	0	0	0.50	0
1A5	3	T5 250 SQ.STEEL	A-5	25.00	90	0	0	0.50	0
1CW	3	150 wall pack	CW2	16.00	0	0	0	0.00	0
1DF	3	70 wall pack	DW1	12.00	0	0	0	0.00	0

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TRP Trapezoid

Architectural Wallpack

WALLPACKS

- Full cut-off, dark sky, neighbor friendly
- Die-cast aluminum housing and door
- Tempered, impact-resistant, clear glass lens
- Energy-saving LED, Pulse Start Metal Halide and Electronic Fluorescent systems
- Egress options for 120V or 12V remote power (by others)
- Two distributions: (see below for restrictions)

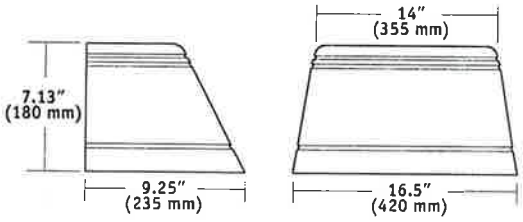
  FT - forward throw for area lighting
  WT - wide lateral throw for maximum spacing
- Five powder coat standard finishes
- Listed to UL1598 for use in wet locations
- LED color temperature 5000K, 2218 lumens
- CFL lamp color temperature 3500K
- HID lamps are medium base

ORDERING INFORMATION

TRP

SERIES	WATTAGE/SOURCE/VOLTAGE	DISTRIBUTION	FINISH	OPTIONS
TRP Trapezoid	LED **50L8-5K**[2,4] 47.5w, 120-277V PULSE START METAL HALIDE[1] **50P9** 50w, 120/277V **70P8** 70w, Quad-Tap® **100P8** 100w, Quad-Tap® **150P8** 150w, Quad-Tap® CFL[1] **26F8** 26w, 120-277V **32F8** 32w, 120-277V **42F8** 42w, 120-277V **52F8**[2] 2x26w, 120-277V **64F8**[2] 2x32w, 120-277V **84F8**[2] 2x42w, 120-277V	**FT** Forward throw **WT** Wide throw	**BZ** Bronze **BL** Black **GR** Gray **WH** White **PL** Platinum	**QST**[3] Time delay quartz standby system energizes quartz socket when main lamp does not strike (HID only) **EM** Double contact bayonet socket only for use with 120V remote power (generator by others) **EM12** Two-pin 12V socket for MR11/MR16 lamps (backup power by others) **PC(X)**[4] Button photocontrol; Specify voltage 1-120V, 2-208V, 3-240V, 4-277V **BOC(X)** 0°C battery backup for one CFL lamp provides 90 minutes backup power, specify 1-120V or 4-277V

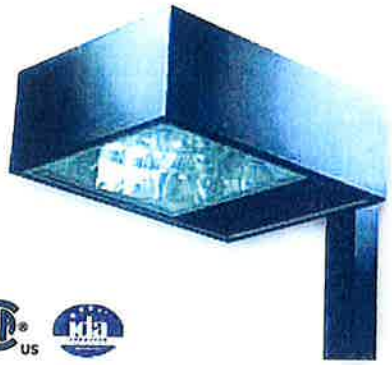
1 Lamp(s) included
2 LED and 2 lamp CFL units available in WT distribution only
3 100w D.C. bayonet lamp included
4 PC is only option for LED
Color Temperature: CFL lamps 3500K, LED 5000K



RCS

Raven®

RECTANGULAR LUMINAIRES



- Lightweight, rugged, one-piece formed and welded aluminum for smooth construction and weather-proofing; Pre-drilled for mounting; Decorative embossed band and reveal colors available
- Electronic ballast for 150w, 250w, 350w and 400w PSMH with 0-10V dimming capability (control system by others); Ballast pro grammed for automatic dimming also available (consult factory)
- Extruded aluminum doorframe with rigid corner bracing and die-cast zinc latches for tool-free entry; Quality silicone gasketing seals out insects, dirt and moisture; Decorative silk screening conceals electrical compartment; Flat tempered and impact-resistant glass provides sharp full cut-off
- Extruded arms along with multiple adapters provide mounting flexibility
- IDA fixture seal of approval
- Rotatable hydroformed and High Performance segmented reflectors available in IES type II, III, IV and V distributions; H2/H3/H5 (hydro-formed), H2P (multifacated hydroformed); H3P/H4P/H5P (segmented)
- Mogul porcelain socket, pulse-rated, with spring-loaded, nickel-plated center contact and reinforced lamp grip screw shell; Medium base for ED-17 lamp
- 100w - 150w Lag type HPF ballast, starting rated at -20°F (-40°F for HPS)
- 200w - 400w CWA type, HPF ballast, starting rated at -20°F (-40°F for HPS)
- Removable Powr-Panl' available for maintenance and installation ease
- Durable Lektrocote™ TGIC thermoset polyester powder coat paint finish assures long life and maintenance-free service
- Listed to UL1598 for use in wet locations

ORDERING INFORMATION

RCS - - - - - - F - - -

SERIES

RCS	Raven Small (100-400w)

MOUNT

A4	Arm mount (includes 4" rigid arm)
A10[2]	Arm mount (includes 10" rigid arm)
WB[3]	Wall bracket (arm not required nor included)
WBA4	Wall bracket with 4" rigid arm
WBA10	Wall bracket with 10" rigid arm
0	No arm or wall bracket (only order without arm or wall bracket when they are ordered as an accessory)

SOURCE/WATTAGE

ELECTRONIC PULSE START METAL HALIDE

E15	150w (ED-28 Mog base)
E25	250w (ED-28 Mog base)
E35	350w (ED-28 Mog base)
E40	400w (ED-28 Mog base)

PULSE START METAL HALIDE

P10	100w (ED-17)
P12	125w (ED-17)
P15	150w (ED-28)
P20	200w (T-15)
P25[5]	250w (ED-28)
P32	320w (ED-28)
P35	350w (ED-28)
P40[5]	400w (ED-28)

HIGH PRESSURE SODIUM

S10	100w (ED-23 1/2)
S15	150w (ED-23 1/2)
S25	250w (ED-18)
S40	400w (ED-18)

LAMP ORIENT./DISTR.

H2	Horiz. II (hydroformed)
H2P	Horiz. II High Performance Series (multi-faceted hydroformed)
H3	Horiz. III (hydroformed)
H3P	Horiz. III High Performance Series (segmented)
H4	Horiz. IV (multi-piece)
H4P	Horiz. IV High Performance Series(segmented) with integrated house-side shield
H5	Horiz. V (hydroformed)
H5P	Horiz. V High Performance Series (segmented)

LENS

F	Flat

COLOR

DB	Dark Bronze
BL	Black
WH	White
GR	Gray
PS	Platinum Silver
RD	Red (premium color)
FG	Forest Green (premium color)
CC	Custom Color (consult factory)

VOLTAGE

Q[1]	Quad-Tap' 120/208/240/277V
5	480V
T[1]	Tri-Tap 120/277/347V
E	50Hz, 220/240V (250 & 400w PSMH & HPS only)
V[1,5]	Five-tap 120/208/240/277/480V
0	No ballast
1	120V (350 & 400w eHID)
J	208/240/277V (350 & 400w eHID only)
O	120/208/240/277V (150 & 240w eHID only)
F	347V

OPTIONS

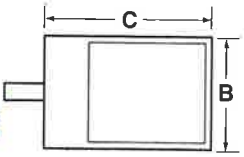
W(X)	Wiring prep (replace X with voltage: 1-120, 2-208, 3-240, 4-277, 5-480, 6-347)
RPA2	Round pole adapter (2 3/4-3 1/8")
RPA3	Round pole adapter (3 1/4-3 3/4")
RPA4	Round pole adapter (3 7/8-4 1/2")
RPA5	Round pole adapter (5")
RPA6	Round pole adapter (6")
F(X)	Fusing (replace X with voltage: 1-120, 2-208, 3-240, 4-277, 5-480, 6-347)
P(X)	Photobutton (replace X with voltage: 1-120, 2-208, 3-240, 4-277)
PR(X)	Photo cell receptacle (replace X with voltage: 1-120, 2-208, 3-240, 4-277, 5-480, 6-347)
QZ	Quartz RS with lamp
HS[4]	Internal house-side shield (Except type V distribution)
VG	Polycarbonate vandal guard
RP	Power Panel
R(XX)	Reveal (EB option must be chosen also); Replace XX with color
EB	Embossed band
L	Lamp

EASY ORDER FIXTURE AND POLE COMBINATIONS

Catalog Number	Description
RSPC-1-P25-H3-20	20ft, 250w PSMH, Type III
RSPC-1-P40-H3-20	20ft, 400w PSMH, Type III
RSPC-1-P40-H3-25	25ft, 400w PSMH, Type III
RSPC-1-P40-H4-20	20ft, 400w PSMH, Type IV
Twin Configurations	
RSPC-2-P25-H3-20	20ft, 250w PSMH, Type III
RSPC-2-P40-H3-20	20ft, 400w PSMH, Type III
RSPC-2-P40-H3-25	25ft, 400w PSMH, Type III

1 Factory wired for highest voltage unless specified
2 Required for 90° configurations
3 FDMLH direct mount hardware kit required
4 Not needed with H4P optics
5 Five-tap ballast available with 250w & 400w PSMH only

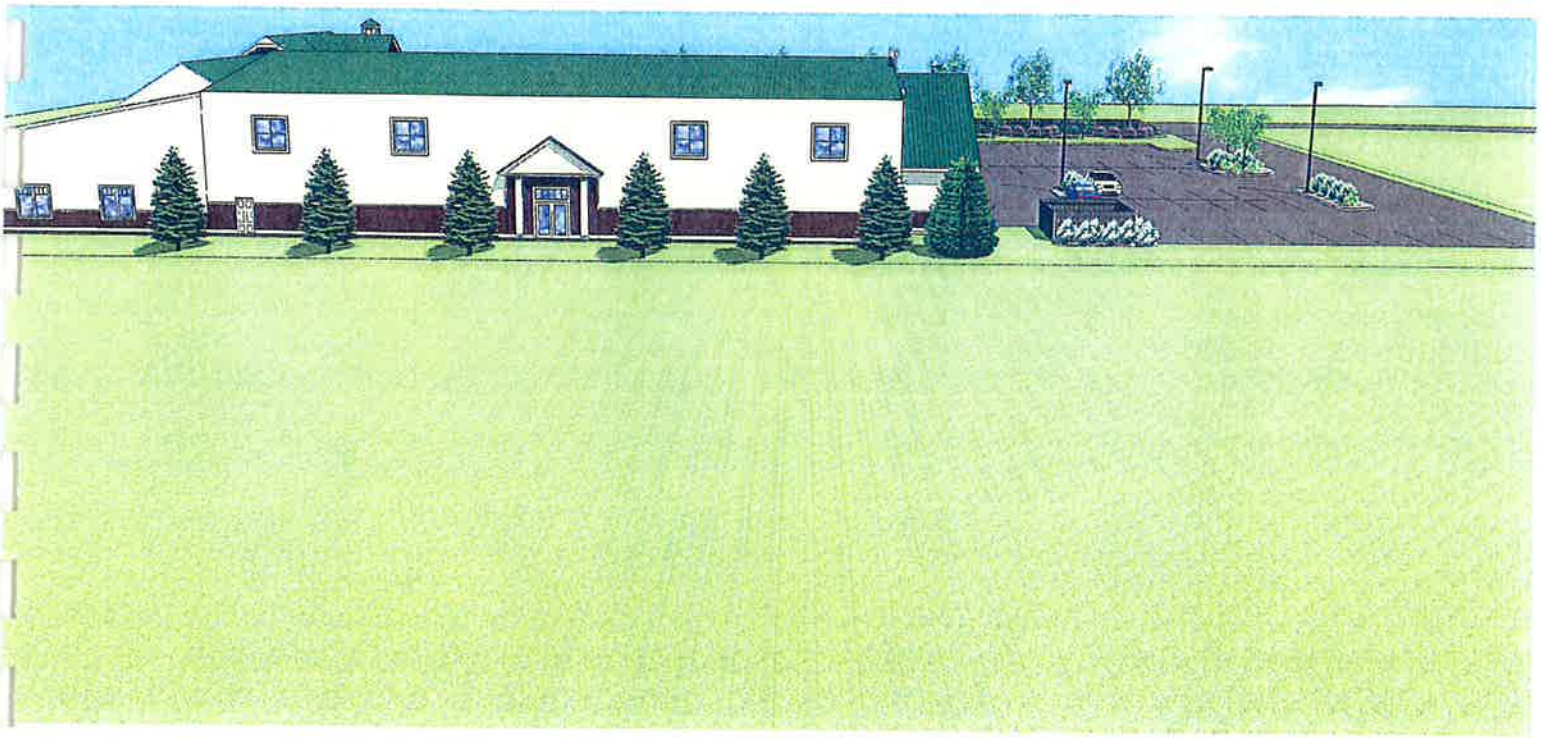
NOTE: All poles to be drilled with #2 pattern
SEE PAGE 615 FOR ACCESSORIES

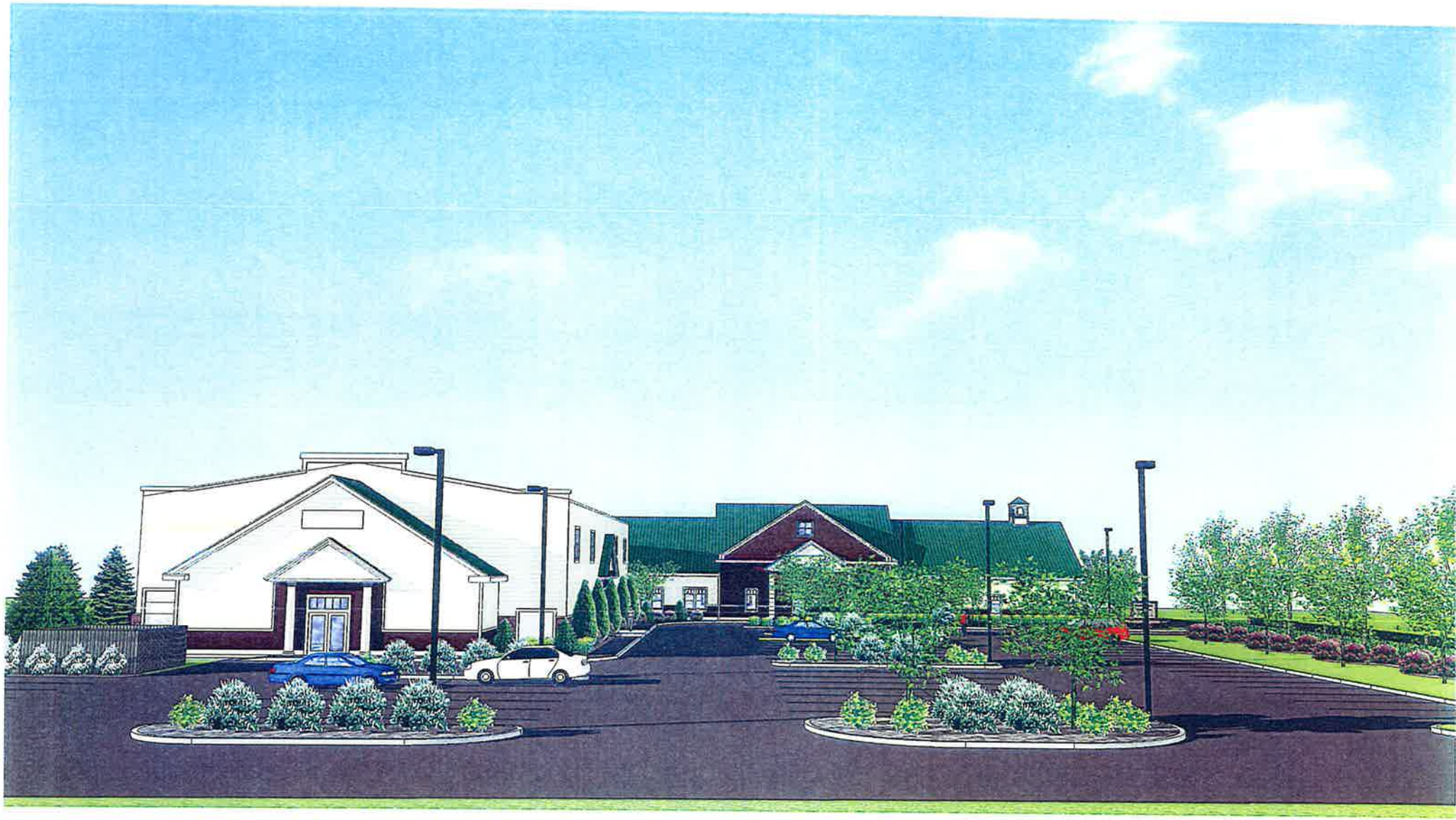


	A	B	C	EPA	Weight
RCS	8 1/2"	16 1/4"	23 1/2"	1.7 ft²	42 lbs.
	203mm	413mm	591mm	0.2 m²	19.1 kg

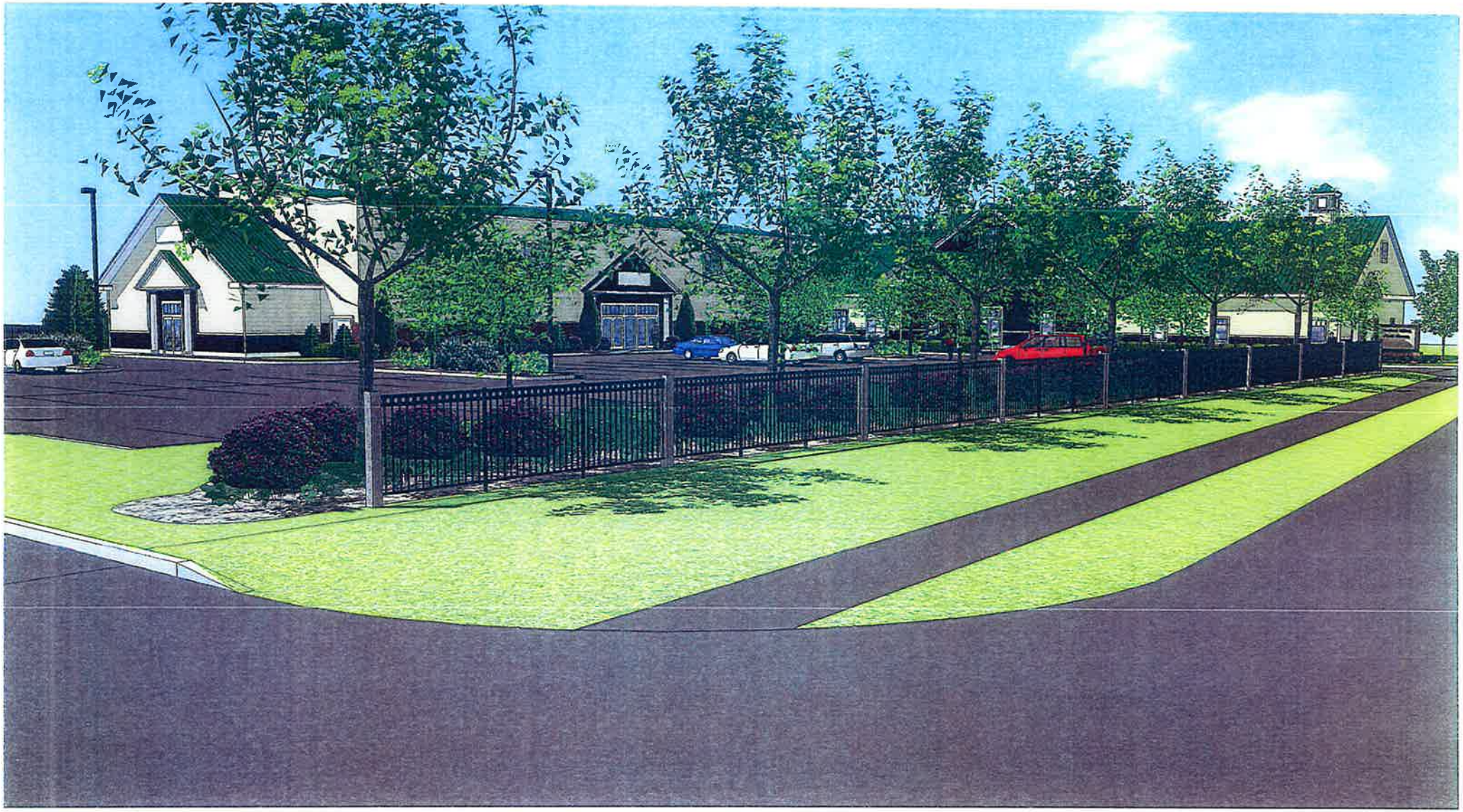
Note: EPA and weight values do not include mounting arm
See Spaulding EPA Value pgs. 622-623 for more detailed information

SPAULDING LIGHTING



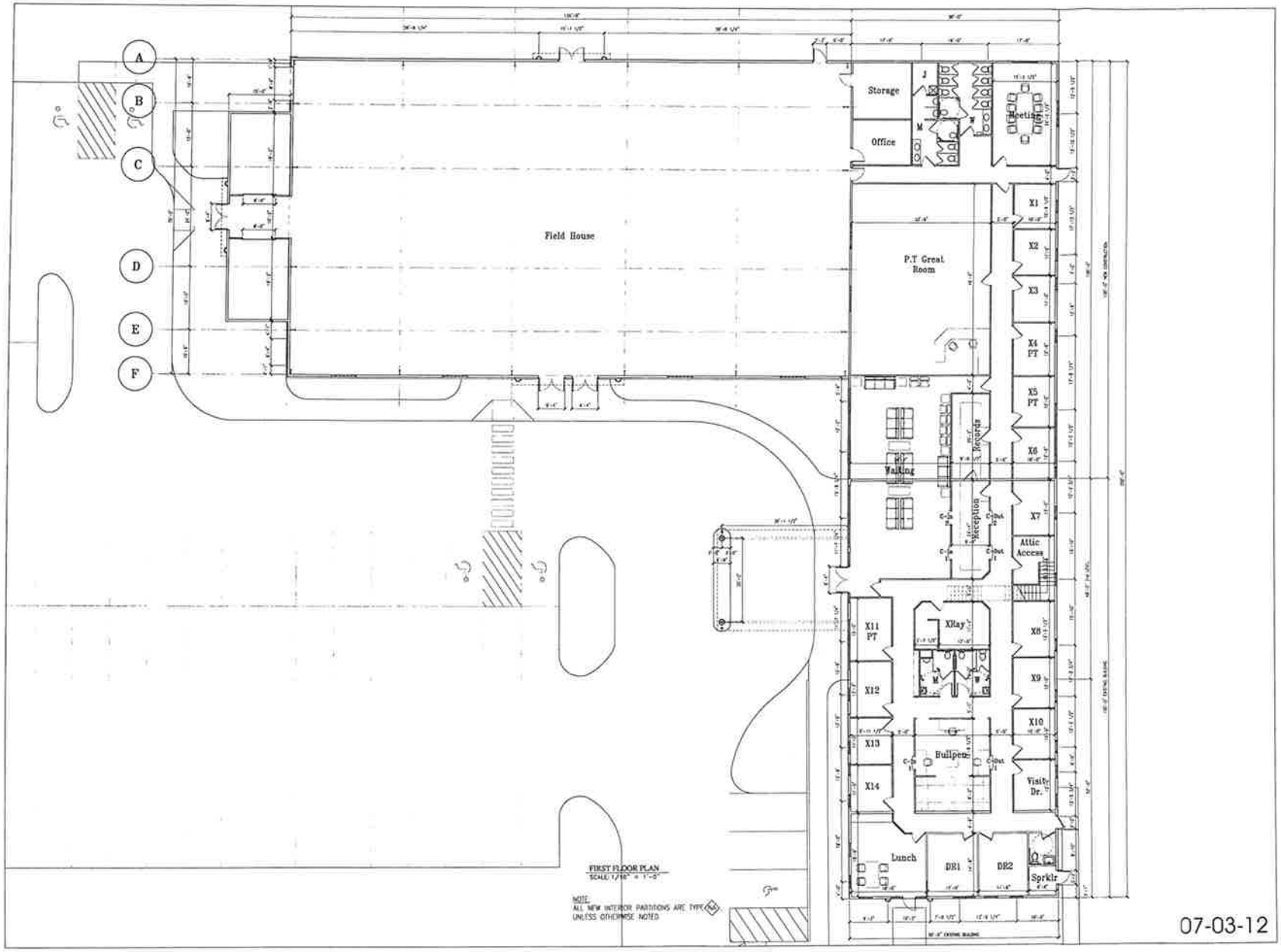


Medical Office
Field House



Attachment M
Site Plans

The project site plans are included in reduced format for review, and full size copies have been provided as a separate plan sets of as required.



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FAX: 207.761.9595
design@alphaarchitects.com

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PRELIMINARY:
NOT FOR CONSTRUCTION

Thomas Point Office Building
14 Thomas Point Road
Brunswick, ME. 04011

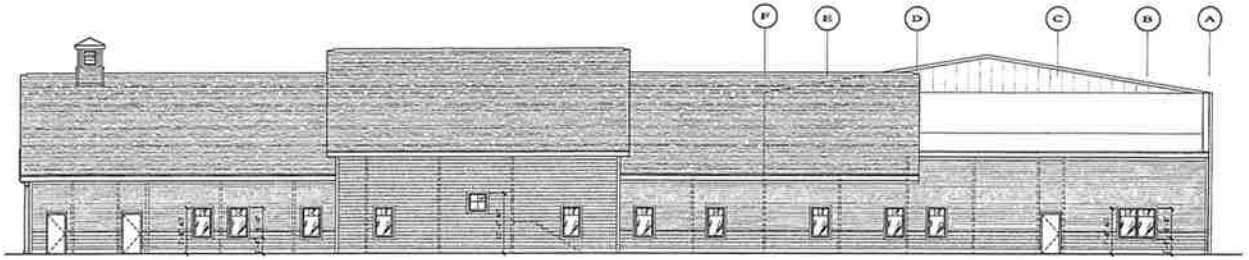
JOB: 12124

ISSUE DATE	
PRELIM	04-18-12
P BOARD	-
SFMO	-
CD's	-
REV. 1	-
PRINT	07-03-12

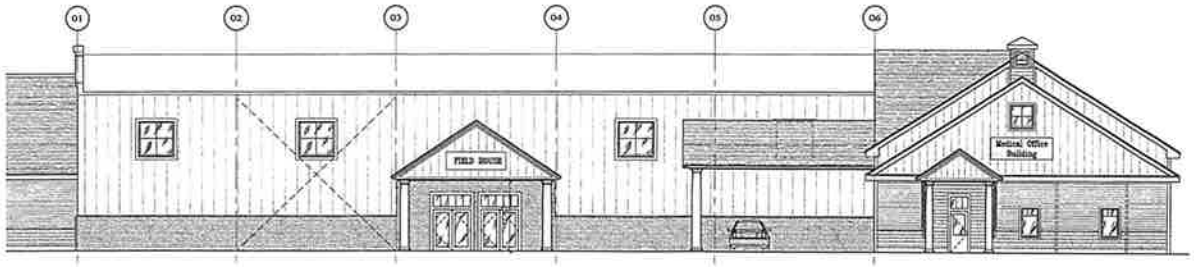
FIRST FLOOR PLAN

E1.0

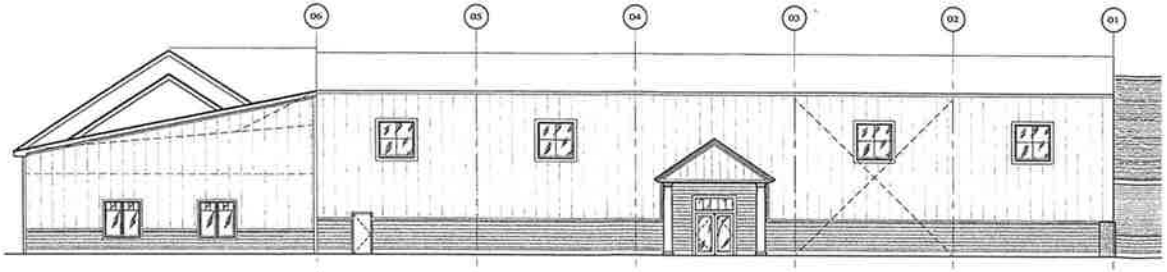
EAST ELEVATION
SCALE: 1/10" = 1'-0"



SOUTH ELEVATION
SCALE: 1/10" = 1'-0"



NORTH ELEVATION
SCALE: 1/10" = 1'-0"



WEST ELEVATION
SCALE: 1/10" = 1'-0"

07-03-12

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PRELIM	04-18-12
P BOARD	-
SFMO	-
CD's	-
REV. 1	-
PRINT	07-03-12

EXTERIOR ELEVATIONS

E2.0

MEDICAL OFFICE BUILDING

THOMAS POINT ROAD
BRUNSWICK, MAINE
PREPARED FOR:
PRIORITY GROUP LLC
TOPSHAM, MAINE

GENERAL NOTES:

1. DRAWINGS ARE BASED ON BOUNDARY AND TOPOGRAPHIC SURVEY INFORMATION FROM MULTIPLE SOURCES BY SITELINES, PA.

2. THE CONTRACTOR IS SPECIFICALLY CAUTIONED THAT THE LOCATION AND/OR THE ELEVATION OF THE EXISTING UTILITIES AS SHOWN ON THESE PLANS IS BASED ON RECORDS OF THE VARIOUS UTILITY COMPANIES AND WHERE POSSIBLE, MEASUREMENTS TAKEN IN THE FIELD. THIS INFORMATION HAS NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR ITS REPRESENTATIVES AND IS NOT TO BE RELIED ON AS BEING EXACT OR COMPLETE. THE CONTRACTOR SHALL CALL THE APPROPRIATE UTILITY COMPANY AND DIG SAFE (1-800-DIG-SAFE) AT LEAST 72 HOURS PRIOR TO ANY EXCAVATION TO REQUEST EXACT FIELD LOCATION OF UTILITIES. IN AREAS OF POTENTIAL CONFLICTS TEST PITS SHALL BE REQUIRED TO VERIFY EXISTING UTILITY LOCATION. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO RELOCATE ALL EXISTING UTILITIES WHICH CONFLICT WITH THE PROPOSED IMPROVEMENTS SHOWN ON THE PLANS.

3. RIM ELEVATIONS OF PROPOSED SANITARY SEWER MANHOLES AND ASSOCIATED STRUCTURES ARE APPROXIMATE. FINAL ELEVATIONS ARE TO BE SET FLUSH AND CONSISTENT WITH THE GRADING PLANS. ADJUST ALL OTHER RIM ELEVATIONS OF MANHOLES, WATER GATES, GAS GATES AND OTHER UTILITIES TO FINISH GRADE WITHIN LIMITS OF WORK.

4. THE LOCATION, SIZE, DEPTH, AND SPECIFICATIONS FOR CONSTRUCTION OF PROPOSED PRIVATE UTILITY SERVICES SHALL BE INSTALLED ACCORDING TO THE REQUIREMENTS PROVIDED BY, AND APPROVED BY THE RESPECTIVE UTILITY COMPANY (GAS, TELEPHONE, ELECTRIC, CABLE AND FIRE ALARM). FINAL DESIGN LOADS AND LOCATIONS TO BE COORDINATED WITH CONSTRUCTION MANAGER AND ARCHITECT.

5. THE CONTRACTOR SHALL FIELD VERIFY THE LOCATION, SIZE, INVERTS AND TYPES OF EXISTING PIPES AT ALL PROPOSED POINTS OF CONNECTION PRIOR TO ORDERING MATERIALS. WHERE AN EXISTING UTILITY IS FOUND TO CONFLICT WITH THE PROPOSED WORK, THE LOCATIONS, ELEVATION, AND SIZE OF THE UTILITY SHALL BE ACCURATELY DETERMINED WITHOUT DELAY BY THE CONTRACTOR, AND THE INFORMATION FURNISHED IN WRITING TO THE CONSTRUCTION MANAGER REPRESENTATIVE FOR THE RESOLUTION OF THE CONFLICT.

6. THE CONTRACTOR SHALL VERIFY ALL CRITICAL DIMENSIONS AND GRADES BEFORE WORK BEGINS. CONTRACTOR SHALL CONFIRM LOCATION AND DEPTH ALL UTILITY LINE CROSSINGS WITH TEST PITS PRIOR TO BEGINNING WORK. CONFLICTS SHALL BE REPORTED IN WRITING TO CONSTRUCTION MANAGER FOR RESOLUTION OF THE CONFLICT.

7. ALL AREAS OUTSIDE THE LIMIT OF WORK THAT ARE DISTURBED SHALL BE RESTORED BY THE CONTRACTOR TO THEIR ORIGINAL CONDITION AT THE CONTRACTOR'S EXPENSE. ALL AREAS DISTURBED DURING CONSTRUCTION NOT COVERED WITH BUILDINGS, STRUCTURES, OR PAVEMENT SHALL RECEIVE 4 INCHES OF LOAM AND SEED.

8. THE CONTRACTOR SHALL MAKE ALL ARRANGEMENTS AND SHALL BE RESPONSIBLE FOR PAYING ANY FEES FOR ANY POLE RELOCATION AND FOR THE ALTERATION OR ADJUSTMENT OF GAS, ELECTRIC, TELEPHONE, CABLE, FIRE ALARM AND ANY OTHER PRIVATE UTILITIES BY THE UTILITY COMPANIES.

9. UPON AWARD OF CONTRACT, CONTRACTOR SHALL MAKE ALL NECESSARY CONSTRUCTION NOTIFICATIONS AND APPLY FOR AND OBTAIN ALL NECESSARY PERMITS, PAY ALL FEES AND POST ALL BONDS ASSOCIATED WITH THE WORK INDICATED ON THE DRAWINGS AND AS SPECIFIED.

10. ALL PROPERTY MONUMENTATION DISTURBED DURING CONSTRUCTION SHALL BE RESET TO THEIR ORIGINAL LOCATION BY A MAINE REGISTERED LICENSED PROFESSIONAL LAND SURVEYOR (PLS) AT THE CONTRACTOR'S EXPENSE. THE CONTRACTOR SHALL PREPARE AN AS-BUILT PLAN SURVEY SHOWING LOCATIONS OF ALL SURFACE FEATURES AND SUBSURFACE UTILITY SYSTEMS INCLUDING THE LOCATION, TYPE, SIZE AND INVERTS.

11. THE CONTRACTOR SHALL INSTALL ALL EROSION CONTROL MEASURES PRIOR TO EARTHWORK OPERATION AND MAINTAIN ALL EROSION CONTROL MEASURES AND SEEDED EMBANKMENTS DURING CONSTRUCTION. EROSION CONTROL SHALL BE REMOVED ONLY UPON THE ESTABLISHMENT OF ALL LANDSCAPED AREAS. ALL WORK SHALL BE IN COMPLIANCE WITH THE ENVIRONMENTAL QUALITY HANDBOOK FOR EROSION AND SEDIMENT CONTROL, LATEST EDITION, AS ADOPTED BY THE MAINE DEPARTMENT OF ENVIRONMENTAL PROTECTION.

12. THE CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR SITE SECURITY AND JOB SAFETY. ALL CONSTRUCTION ACTIVITY SHALL BE IN ACCORDANCE WITH OSHA STANDARDS AND LOCAL REQUIREMENTS.

13. ALL MATERIALS AND CONSTRUCTION METHODS USED WITHIN THE PUBLIC RIGHT-OF-WAY SHALL CONFORM TO ALL LOCAL MUNICIPAL STANDARDS AND MAINE DEPARTMENT OF TRANSPORTATION SPECIFICATIONS.

14. THE CONTRACTOR IS REQUIRED TO CONTROL DUST DURING CONSTRUCTION. EXPOSED SOIL AREAS SHALL BE SPRAYED WITH WATER AS NEEDED TO CONTROL DUST EMISSIONS. COVER EXPOSED SOIL AREAS AS QUICKLY AS PRACTICAL TO PREVENT WINDS FROM GENERATING DUST.

15. ALL HANDICAP ACCESSIBLE PARKING SPACES, RAMPS AND SIDEWALKS SHALL BE CONSTRUCTED IN CONFORMANCE WITH THE AMERICANS WITH DISABILITIES ACT (ADA).

16. ALL SITE SIGNAGE AND PAVEMENT MARKINGS SHALL CONFORM TO THE MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES, LATEST EDITION.

17. THE CONTRACTOR SHALL ANTICIPATE THAT GROUNDWATER WILL BE ENCOUNTERED DURING CONSTRUCTION AND SHALL INCLUDE SUFFICIENT COSTS WITHIN THEIR BID TO PROVIDE DEWATERING AS NECESSARY. NO SEPARATE PAYMENT SHALL BE MADE TO THE CONTRACTOR FOR DEWATERING.

LAYOUT NOTES:

1. ALL DIMENSIONING, UNLESS NOTED OTHERWISE, IS TO THE FACE OF CURB OR FOUNDATION.

2. OFFSETS TO CATCH BASINS AND MANHOLES ARE TO THE CENTER OF THE FRAME.

3. PIPE LENGTH EQUALS THE CENTER TO CENTER DISTANCES BETWEEN CATCH BASINS AND/OR MANHOLES MINUS ONE HALF THE DIAMETER OF EACH CATCH BASIN OR MANHOLE.

4. BOUNDARY INFORMATION ON LAYOUT PLAN IS FOR REFERENCE ONLY, REFER TO CERTIFIED BOUNDARY PLANS FOR BOUNDARY INFORMATION.

GRADING AND DRAINAGE NOTES:

1. UNLESS OTHERWISE NOTED, ALL STORM DRAIN PIPE SHALL BE IN ACCORDANCE WITH MDOT SPECIFICATIONS SECTION 603. PIPE CULVERTS AND STORM DRAINS, LATEST REVISION WITH THE EXCEPTION THAT THE ONLY ACCEPTABLE TYPES OF PIPE ARE AS FOLLOWS:

   POLYVINYL CHLORIDE PIPE (PVC) SDR 35
   SMOOTH BORE POLYETHYLENE PIPE – HDPE N-12 ADS OR SDR 35

2. TOPSOIL STRIPPED IN AREAS OF CONSTRUCTION THAT IS SUITABLE FOR REUSE AS LOAM SHALL BE STOCKPILED ON SITE AT A LOCATION TO BE DESIGNATED BY OWNER. UNSUITABLE SOIL SHALL BE SEPARATED, REMOVED AND DISPOSED OF AT AN APPROVED DISPOSAL LOCATION OFF SITE.

3. THE CONTRACTOR SHALL ANTICIPATE THAT GROUNDWATER WILL BE ENCOUNTERED DURING CONSTRUCTION AND SHALL INCLUDE SUFFICIENT COSTS WITHIN THEIR BID TO PROVIDE DEWATERING AS NECESSARY. NO SEPARATE PAYMENT SHALL BE MADE TO THE CONTRACTOR FOR DEWATERING.

PERMITTING REQUIREMENTS:

AGENCY:	*PERMIT:*	*STATUS:*
TOWN OF BRUNSWICK	SITE PLAN APPROVAL BUILDING	PENDING (BY CONTRACTOR)
MAINE DEPARTMENT OF ENVIRONMENTAL PROTECTION	STORMWATER PERMIT-BY-RULE	PENDING

CALL DIG SAFE UTILITY LOCATION
1-888-344-7233
STATE LAW REQUIRES ADVANCE NOTICE OF AT LEAST 3 BUSINESS DAYS BEFORE YOU DIG, GRADE OR EXCAVATE FOR THE MARKING OF UNDERGROUND UTILITIES

UTILITY CONTACTS

CODE ENFORCEMENT
JEFF HUTCHINSON
TOWN OF BRUNSWICK
28 FEDERAL STREET
BRUNSWICK, MAINE 04011
207-725-6651

ELECTRIC SERVICE
CENTRAL MAINE POWER
280 BATH ROAD
BRUNSWICK, MAINE 04011
207-721-8054

TELEPHONE SERVICE
FAIRPOINT
BATH ROAD (P.O. BOX 360)
BRUNSWICK, MAINE 04011
207-442-8018

CABLE SERVICE
COMCAST CONSTRUCTION OFFICE
336 BATH ROAD
BRUNSWICK, MAINE 04011
207-729-6660

WATER SERVICE
BRUNSWICK-TOPSHAM WATER DISTRICT
ALAN FRASIER, P.E., SUPERINTENDENT
BOX 580
BRUNSWICK, MAINE 004011
207-729-9956

SANITARY SEWER
BRUNSWICK SEWER DISTRICT
LEONARD BLANCHETTE
10 PINE TREE ROAD
BRUNSWICK, MAINE 04011
207-729-0148

PUBLIC WORKS DEPARTMENT
JOHN FOSTER, P.E.
9 INDUSTRY ROAD
BRUNSWICK, MAINE 04011
207-725-6654

BRUNSWICK FIRE DEPARTMENT
KENNETH BRILLANT, FIRE CHIEF
21 TOWN HALL PLACE
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207-725-5541

PROJECT TEAM

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BRUNSWICK, MAINE 04011
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WWW.SITELINESPA.COM

SURVEYOR
SITELINES P.A.
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WWW.SITELINESPA.COM

ARCHITECT
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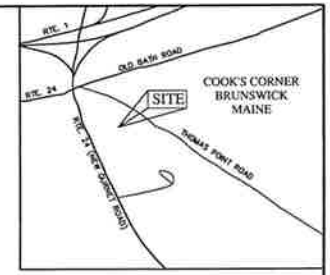


LOCATION MAP
NOT TO SCALE

LEGEND

EXISTING / PROPOSED

- IRON MARKER FOUND
- 5/8" REBAR TOPPED WITH AN ALUMINUM CAP READING "BRUCE W. MARTINSON – PLS 2137" TO BE SET
- GRANITE MONUMENT SET
- CATCH BASIN
- SEWER MANHOLE
- FIRE HYDRANT
- WATER GATE VALVE
- WATER SHUT-OFF
- BLOW-OFF/CLEAN-OUT
- UTILITY POLE
- UTILITY LINE — OHE (OVERHEAD UTILITY LINE) / UGE (OVERHEAD UTILITY LINE)
- PROPERTY LINE
- EASEMENTS
- SETBACK/BUFFER
- SOILS BOUNDARY
- WETLAND BOUNDARY
- STREAM
- CULVERT
- CURB
- EDGE OF PAVEMENT
- ROAD CENTERLINE
- BUILDING
- STORM DRAIN(SEE PLAN FOR SIZE)
- SEWER LINE(SEE PLAN FOR SIZE)
- WATER LINE(SEE PLAN FOR SIZE)
- UNDERDRAIN(SEE PLAN FOR SIZE)
- SLOPE ARROW
- CONTOURS
- TEMPORARY INLET PROTECTION
- CLEARING LIMIT
- TREE LINE
- SEDIMENT BARRIER
- RIPRAP
- CONSTRUCTION ENTRANCE
- PROPOSED PAVEMENT
- SPOT GRADE

SHEET INDEX

SHEET #	SHEET TITLE
C1	COVER SHEET
C2	EXISTING CONDITIONS AND DEMOLITION PLAN
C3	SITE LAYOUT PLAN
C4	UTILITY PLAN
C5	GRADING, DRAINAGE, & EROSION CONTROL PLAN
C6	SITE DEVELOPMENT DETAILS SHEET 1 OF 2
C7	SITE DEVELOPMENT DETAILS SHEET 2 OF 2
C8	EROSION CONTROL DETAILS AND NOTES
L1	LANDSCAPE PLAN
L2	LIGHTING PLAN

2.	07-26-12	REVISED PER TOWN STAFF COMMENTS SUBMITTED TO TOWN FOR FINAL APPROVAL	RPL
1.	07-10-12	SUBMITTED TO TOWN OF BRUNSWICK FOR FINAL APPROVAL	RPL

STATE OF MAINE – CURTIS Y. NEUFELD – 9779 – LICENSED – PROFESSIONAL ENGINEER

TITLE: COVER SHEET

PROJECT: MEDICAL OFFICE BUILDING
14 THOMAS POINT ROAD, BRUNSWICK, MAINE

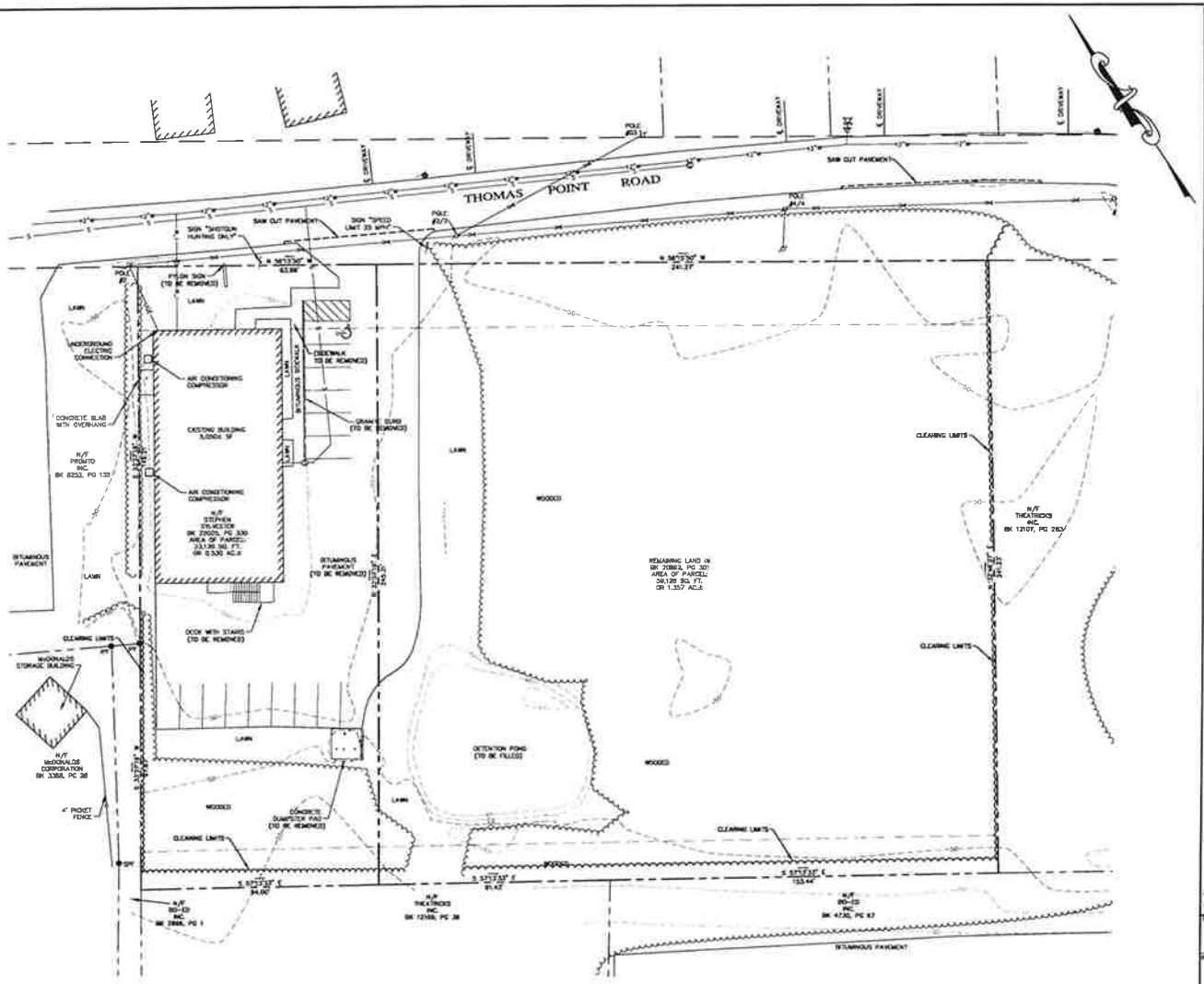
OWNER: PRIORITY GROUP LLC
2 MAIN STREET, TOPSHAM, MAINE

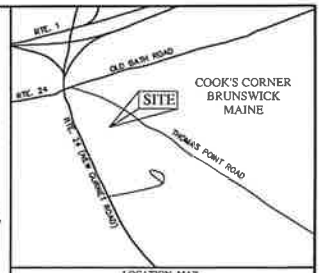
SITELINES, PA
ENGINEERS • PLANNERS • SURVEYORS
LANDSCAPE ARCHITECTS
8 CUMBERLAND STREET, BRUNSWICK, ME 04011
207.725.1200 www.sitelinespa.com

FIELD WK: BWM	SCALE: N/A	SHEET: C1
DRN BY: RPL	JOB #: 2052	
CHD BY: CYN	SS:	
DATE: 05-31-12	FILE: 2052-COVER-DET	

ZONING INFORMATION:

REFERENCE: TOWN OF BRUNSWICK ZONING ORDINANCE	
CRITERIA	REQUIRED
ZONE: CC (COOKS CORNER CENTER)	
MIN. LOT AREA	15,000 S.F.
DIMENSION REQUIREMENTS:	
1.) MIN. LOT WIDTH	50' (IF COMPATIBLE WITH SECTION 313)
2.) YARD DEPTHS:	
FRONT	25' MAX. (ON THOMAS POINT ROAD)
REAR	15 FT
SIDE	NONE
3.) BUILDING HEIGHT	MAX. 40 FT
MAXIMUM IMPERVIOUS SURFACE COVERAGE	80%
MAXIMUM BUILDING FOOTPRINT PER STRUCTURE	30,000 S.F.





LOCATION MAP
NOT TO SCALE

PLAN REFERENCE:

1. "BOUNDARY AND TOPOGRAPHIC PLAN OF LAND OF PRIORITY HOLDINGS, LLC – THOMAS POINT ROAD, BRUNSWICK, MAINE" DATED MARCH 3, 2003 PREPARED BY DROGO LAND SERVICES, INC. OF BATH, MAINE

2. "PLAN OF STANDARD BOUNDARY SURVEY PROPERTY OF: DEVELOPERS DIVERSIFIED COOKS CORNER, LP ET AL GURNEY ROAD (ROUTE 24) & THOMAS POINT ROAD BRUNSWICK, MAINE. FOR: DEVELOPER DIVERSIFIED COOKS CORNER, LP OF CLEVELAND, OHIO" PREPARED BY PAUL ROUPP JR. PLS #1165 OF MONMOUTH, MAINE DATED MARCH 11, 1998

GENERAL NOTES:

1. THE SITE IS OWNED BY, OR UNDER CONTRACT BY, PRIORITY GROUP, LLC AND CONSISTS OF THE FOLLOWING LOTS:
   (A) TAX MAP 021 LOT 28 BOOK 20832 PAGE 301 PER TOWN OF BRUNSWICK TAX ASSESSORS DATABASE
   (B) TAX MAP 021 LOT 42 BOOK 37386 PAGE 294 PER TOWN OF BRUNSWICK TAX ASSESSORS DATABASE

2. AREA OF EXISTING LOT: 82,258 S.F. 1.89 ACRES
   EXISTING IMPERVIOUS: 17,338 S.F. 0.40 ACRES
   EXISTING LANDSCAPING: 65,022 S.F. 1.49 ACRES

3. BENCHMARK INFORMATION: CONTACT SITELINES, PA 725-1200

4. FLOOD ZONE INFORMATION:
   PROJECT IS LOCATED IN ZONE C (AREAS OF MINIMAL FLOODING) OF THE FLOOD INSURANCE RATE MAPS FOR CUMBERLAND COUNTY, MAINE. THE PROJECT IS LOCATED ON PANEL 15 OF 35 (COMMUNITY PANEL 230042-0015-B; EFFECTIVE DATE JANUARY 3, 1986)

5. THERE ARE NO WETLANDS ON THIS PARCEL.

6. EXISTING PARKING

   1 HANDICAP PARKING SPACES
   14 PARKING SPACES
   15 TOTAL PARKING SPACES

DEMOLITION NOTES:

1. THE CONTRACTOR SHALL PERFORM SITE DEMOLITION AS SHOWN AND AS NECESSARY WITHIN THE LIMITS OF DISTURBANCE TO PREPARE THE SITE.
2. MATERIAL REMOVED BY THE CONTRACTOR SHALL BECOME THE PROPERTY OF THE CONTRACTOR, UNLESS SPECIFICALLY IDENTIFIED FOR OTHER USES. PROPER DISPOSAL OF SUCH MATERIAL SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR.
3. FEATURES MARKED TO BE ABANDONED MAY REMAIN IN PLACE UNLESS REMOVAL IS REQUIRED THROUGH OTHER WORK EFFORTS.
4. THE CONTRACTOR SHALL SECURE THE SITE ON A DAILY BASIS.
5. THE CONTRACTOR SHALL CONTACT DIGSAFE PRIOR TO COMMENCING WORK. 1-800-DIGSAFE
6. THE CONTRACTOR SHALL REPORT TO THE ENGINEER IF ANY UNFORESEEN SUBSURFACE CONDITIONS ARE ENCOUNTERED INCLUDING BUT NOT LIMITED TO UNDERGROUND STORAGE TANKS, WASTE MATERIAL, OR UTILITIES.
7. AREAS WITHIN THE LIMITS OF DISTURBANCE SHALL BE CLEARED AND GRUBBED UNLESS OTHERWISE NOTED.
8. THE CONTRACTOR SHALL INSTALL EROSION CONTROL MEASURE PRIOR TO DEMOLITION EFFORTS.

3.	07-26-12	REVISED PER TOWN STAFF COMMENTS	RPL
2.	07-10-12	SUBMITTED TO TOWN FOR FINAL APPROVAL	
1.	07-10-12	SUBMITTED TO TOWN OF BRUNSWICK FOR FINAL APPROVAL	RPL

TITLE: EXISTING CONDITION AND DEMOLITION PLAN

PROJECT: MEDICAL OFFICE BUILDING
14 THOMAS POINT ROAD, BRUNSWICK, MAINE

OWNER: PRIORITY GROUP LLC
2 MAIN STREET, TOPSHAM, MAINE

CALL DIG SAFE UTILITY LOCATION
1-888-344-7233
STATE LAW REQUIRES ADVANCE NOTICE OF AT LEAST 3 BUSINESS DAYS BEFORE YOU DIG, GRADE OR EXCAVATE FOR THE MARKING OF UNDERGROUND UTILITIES

GRAPHIC SCALE
(IN FEET)
1 inch = 20 ft.

NOT FOR CONSTRUCTION

STATE OF MAINE
CURTIS T. MOSFIELD
9779
LICENSED
PROFESSIONAL ENGINEER

SITELINES, PA
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8 CUMBERLAND STREET, BRUNSWICK, ME 04011
207.725.1200 www.sitelines.com

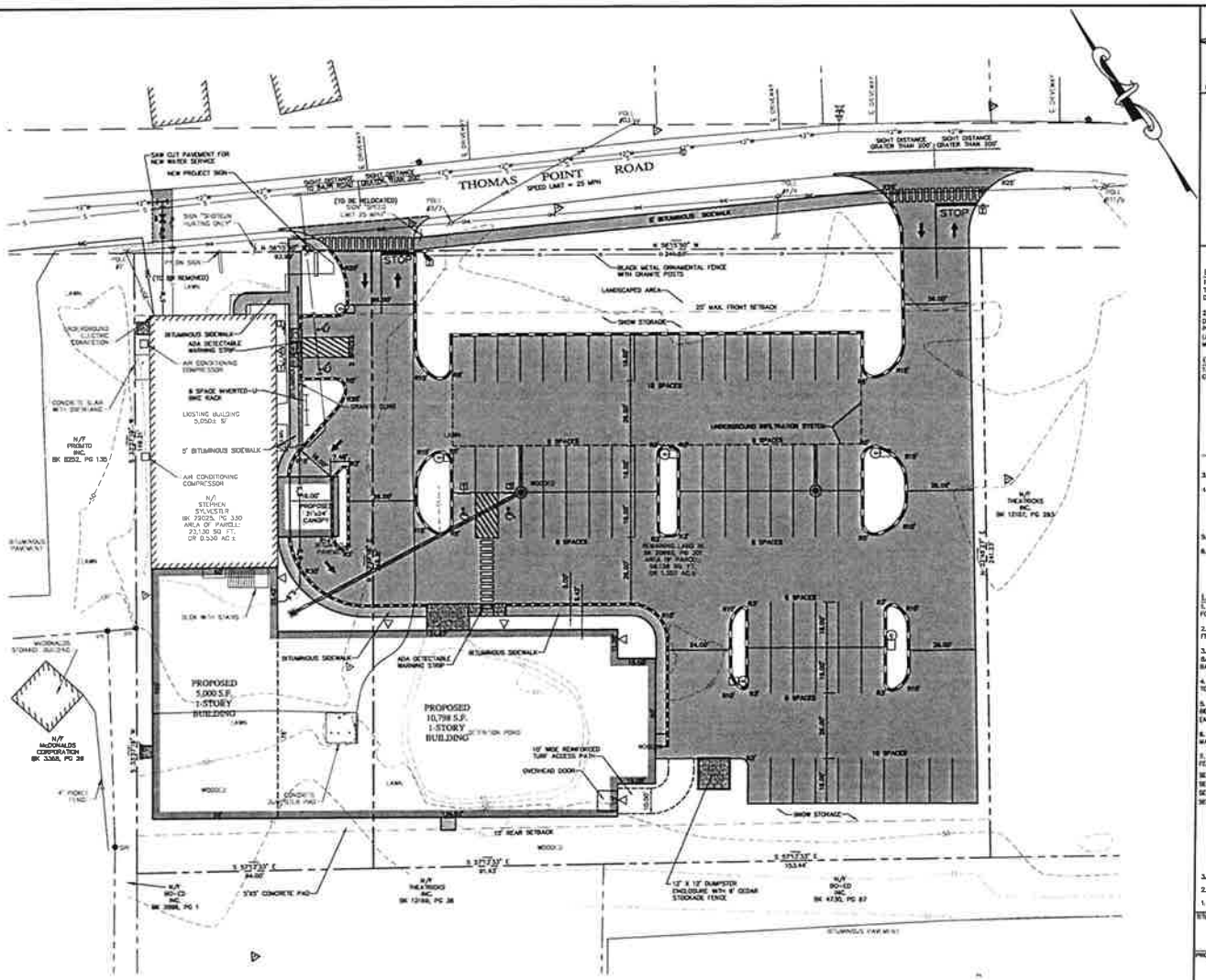
FIELD WK: BWM	SCALE 1" = 20'	SHEET: C2
DRN BY: RPL	JOB # 2052	
CH D BY: CYN	SS:	
DATE: 05-31-12	FILE: 2052-EX-COND-DEMO	

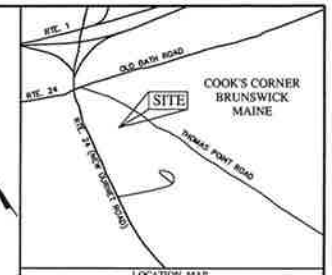
SIGN LEGEND:

CURBING LEGEND:

VERTICAL SLIP FORM

SLOPED SLIP FORM





LOCATION MAP
NOT TO SCALE

PLAN REFERENCE:

1. "BOUNDARY AND TOPOGRAPHIC PLAN OF LAND OF PRIORITY HOLDINGS, LLC – THOMAS POINT ROAD, BRUNSWICK, MAINE" DATED MARCH 3, 2005 PREPARED BY DRODO LAND SERVICES, INC. OF BATH, MAINE

2. "PLAN OF STANDARD BOUNDARY SURVEY PROPERTY OF: DEVELOPERS DIVERSIFIED COOKS CORNER, LP (7 AL GURNET ROAD (ROUTE 24) & THOMAS POINT ROAD BRUNSWICK, MAINE, FOR: DEVELOPERS DIVERSIFIED COOKS CORNER, LP OF CLEVELAND, OHIO" PREPARED BY PAUL ROUPP JR. PLS #1185 OF MONMOUTH, MAINE DATED MARCH 11, 1998

GENERAL NOTES:

1. THE SITE IS OWNED BY, OR UNDER CONTRACT BY, PRIORITY GROUP, LLC AND CONSISTS OF THE FOLLOWING LOTS:
   (A) TAX MAP 021 LOT 28 BOOK 20802 PAGE 301 FOR TOWN OF BRUNSWICK TAX ASSESSORS DATABASE
   (B) TAX MAP 021 LOT 42 BOOK 27366 PAGE 294 FOR TOWN OF BRUNSWICK TAX ASSESSORS DATABASE

2. AREA OF EXISTING LOT:

	82,258 S.F.	1.88 ACRES
EXISTING IMPERVIOUS:	17,336 S.F.	0.40 ACRES
EXISTING LANDSCAPING:	65,022 S.F.	1.49 ACRES
FINAL IMPERVIOUS:	60,544 S.F.	1.39 ACRES 74%
FINAL LANDSCAPING:	21,714 S.F.	0.50 ACRES
NET NEW IMPERVIOUS	43,208 S.F.	0.99 ACRES

3. BENCHMARK INFORMATION: CONTACT SITELINES PA. 725-1200

4. FLOOD ZONE INFORMATION:
   PROJECT IS LOCATED IN ZONE C (AREAS OF MINIMAL FLOODING) OF THE FLOOD INSURANCE RATE MAPS FOR CUMBERLAND COUNTY, MAINE. THE PROJECT IS LOCATED ON PANEL 15 OF 36 (COMMUNITY PANEL 230043-0015-B; EFFECTIVE DATE JANUARY 3, 1986)

5. THERE ARE NO WETLANDS ON THIS PARCEL.

6. PARKING:

   4 HANDICAP PARKING SPACES
   71 PARKING SPACES
   75 TOTAL PARKING SPACES

LAYOUT NOTES:

1. ALL DIMENSIONS, UNLESS NOTED OTHERWISE, IS TO THE FACE OF CURB OR FOUNDATION.

2. OFFSETS TO CATCH BASINS AND MANHOLES ARE TO THE CENTER OF THE FRAME.

3. PIPE LENGTH EQUALS THE CENTER TO CENTER DISTANCES BETWEEN CATCH BASINS AND/OR MANHOLES MINUS ONE HALF THE DIAMETER OF EACH CATCH BASIN OR MANHOLE.

4. BOUNDARY INFORMATION ON LAYOUT PLAN IS FOR REFERENCE ONLY. REFER TO CERTIFIED BOUNDARY PLANS FOR BOUNDARY INFORMATION.

5. ALL HANDICAP ACCESSIBLE PARKING SPACES, RAMPS AND SIDEWALKS SHALL BE CONSTRUCTED IN CONFORMANCE WITH THE AMERICANS WITH DISABILITIES ACT (ADA).

6. ALL SITE SIGNAGE AND PAVEMENT MARKINGS SHALL CONFORM TO THE MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES.

7. COORDINATE SITE WORK WITH ARCHITECTURAL DRAWINGS INCLUDING BUILDING FEATURES AND FOUNDATION PLAN.

SEE SHEET C4 FOR UTILITY PLAN
SEE SHEET C2 FOR DRAINAGE AND GRADING PLAN
SEE SHEET L1 FOR LANDSCAPING PLAN
SEE SHEET L3 FOR LIGHTING PLAN

3.	07-26-12	REVISED PER TOWN STAFF COMMENTS	RPL
2.	07-10-12	SUBMITTED TO TOWN FOR FINAL APPROVAL SUBMITTED TO TOWN OF BRUNSWICK FOR FINAL APPROVAL	RPL
1.	06-05-12	SUBMITTED SKETCH PLAN TO THE TOWN OF BRUNSWICK	RPL

ZONING INFORMATION:

REFERENCE: TOWN OF BRUNSWICK ZONING ORDINANCE	
CRITERIA:	REQUIRED:
ZONE: CC (COOKS CORNER CENTER)	
MIN. LOT AREA	15,000 S.F.
DIMENSION REQUIREMENTS	
1.) MIN. LOT WIDTH	80' (* COMPATIBLE WITH SECTION 5.1.2)
2.) YARD DEPTHS:	
FRONT	25' MAX. (ON THOMAS POINT ROAD)
REAR	15 FT
SIDE	NONE
3.) BUILDING HEIGHT	MAX. 40 FT
MAXIMUM IMPERVIOUS SURFACE COVERAGE	80%
MAXIMUM BUILDING FOOTPRINT PER STRUCTURE	50,000 S.F.

APPROVAL
TOWN OF BRUNSWICK PLANNING BOARD

DATE: _____

CHAIRMAN: _____

TITLE:

SITE LAYOUT PLAN

PROJECT:

MEDICAL OFFICE BUILDING
14 THOMAS POINT ROAD, BRUNSWICK, MAINE

OWNER:

PRIORITY GROUP LLC
2 MAIN STREET, TOPSHAM, MAINE

CALL DIG SAFE UTILITY LOCATION
1-888-344-7233
STATE LAW REQUIRES ADVANCE NOTICE OF AT LEAST 3 BUSINESS DAYS BEFORE YOU DIG, GRADE OR EXCAVATE FOR THE MARKING OF UNDERGROUND UTILITIES

GRAPHIC SCALE
(IN FEET)
1 inch = 20 ft.

NOT FOR CONSTRUCTION

STATE OF MAINE
CURTIS T. NEUFELD
9779
LICENSED
PROFESSIONAL ENGINEER

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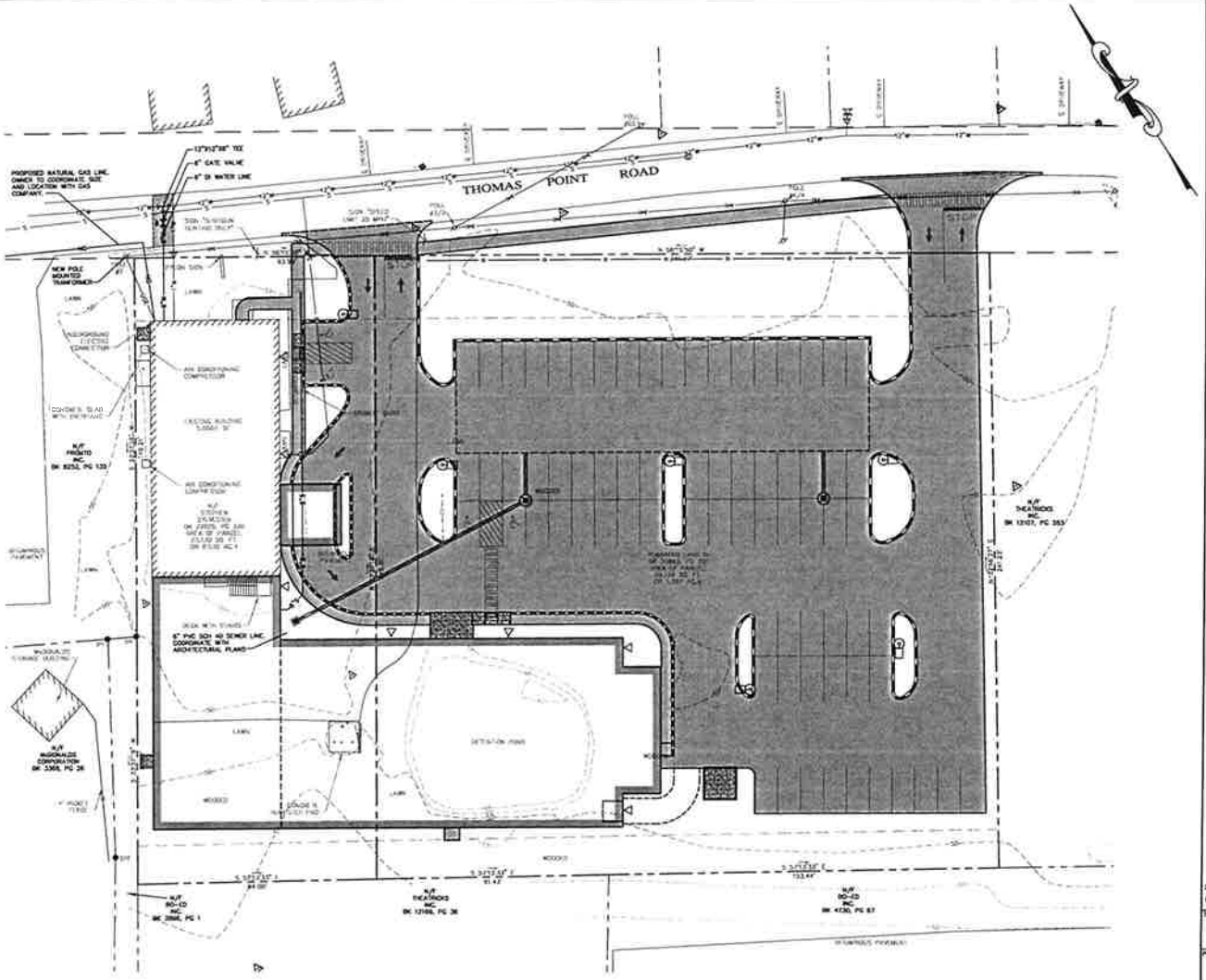
LANDSCAPE ARCHITECTS
8 CUMBERLAND STREET, BRUNSWICK, ME 04011
207.725.1200 www.sitelinespa.com

FIELD WK: BWM	SCALE: 1" = 20'	SHEET: C3
DRN BY: RPL	JOB #: 2002	
CHD BY: CTN	SS:	
DATE: 05-31-12	FILE: 2002-SITE-LAYOUT	



LAYOUT NOTES:

1. ALL DIMENSIONS, UNLESS NOTED OTHERWISE, IS TO THE FACE OF CURB AND/OR FOUNDATION
2. OFFSETS TO CATCH BASINS AND MANHOLES ARE TO THE CENTER OF THE FRAME.
3. PIPE LENGTH EQUALS THE CENTER TO CENTER DISTANCES BETWEEN CATCH BASINS AND/OR MANHOLES MINUS ONE HALF THE DIAMETER OF EACH CATCH BASIN OR MANHOLE.
4. BOUNDARY INFORMATION ON LAYOUT PLAN IS FOR REFERENCE ONLY, REFER TO CERTIFIED BOUNDARY PLANS FOR BOUNDARY INFORMATION.

UTILITY NOTES:

1. ALL TERMINATIONS AND CONNECTIONS OF SERVICES SHALL BE IN COMPLIANCE WITH REQUIREMENTS OF THE APPLICABLE UTILITY DISTRICT. ALL BACKFILLING AND COMPACTION OF WATER AND SEWER LINE TRENCHES SHALL BE AS APPROVED BY THE BRUNSWICK AND TOPSHAM WATER DISTRICT AND BRUNSWICK SEWER DISTRICT, RESPECTIVELY.
3. THE CONTRACTOR SHALL CONTACT DIGSAFE (888-344-7233) PRIOR TO COMMENCING EXCAVATION.
3. THE BASIS FOR PROJECT LAYOUT AND FOR CONSTRUCTION ELEVATIONS IS THE BASELINE AND BENCHMARK EXISTING ON THE SITE AND SHOWN ON THE DRAWINGS.
4. THE CONTRACTOR SHALL CONFIRM HORIZONTAL AND VERTICAL CONTROL BEFORE BEGINNING WORK.
5. SEE PLUMBING AND ELECTRICAL PLANS FOR LOCATION AND INVERTS OF SLEEVES IN FOUNDATIONS.
6. ELECTRIC SERVICE SHALL BE INSTALLED IN CONDUIT UNDER PAVEMENT AND CONCRETE.
7. CONTRACTOR SHALL SUBMIT SHOP DRAWINGS OF ALL SEWER, WATER, ELECTRICAL, AND SANITARY CONDUIT, MANHOLES, TRANSFORMERS, AND FITTINGS FOR APPROVAL.
8. CONTRACTOR SHALL VERIFY LOCATION OF EXISTING UTILITIES PRIOR TO CONSTRUCTION.
8. DUCTILE IRON PIPE SHALL MEET THE REQUIREMENTS OF ANSI A C150 AND C151, CLASS 52, AND HAVE PUSH ON OR FLANGED JOINTS AS REQUIRED. FITTINGS SHALL HAVE MECHANICAL JOINTS WITH RETAINER GLANDS.
10. SANITARY SEWER PIPE AND FITTINGS SHALL BE SDR-35 PVC.
11. INSTALL 2" RIGID STYROFOAM INSULATION OVER SANITARY SEWER IN AREAS WHERE THERE IS LESS THAN 4' OF COVER.
12. CONNECTIONS AT MANHOLES/CATCH BASINS SHALL HAVE A FLEXIBLE BOOT CAST ONTO THE BARREL AND SECURED WITH STAINLESS STEEL BANDS.
13. SEE SHEET C4 FOR GRADING, DRAINAGE, STORM DRAIN DATA & EROSION CONTROL MEASURES.
14. BUILDING FOOTPRINT SHOWN IS NOT FOR FOUNDATION LAYOUT. REFER TO STRUCTURAL/ARCHITECTURAL DRAWINGS.

2.	07-26-12	REVISED PER TOWN STAFF COMMENTS	RFL
1.	07-10-12	SUBMITTED TO TOWN FOR FINAL APPROVAL	
	07-10-12	SUBMITTED TO TOWN OF BRUNSWICK FOR FINAL APPROVAL	RFL

TITLE:

UTILITY PLAN

PROJECT:

MEDICAL OFFICE BUILDING
14 THOMAS POINT ROAD, BRUNSWICK, MAINE

OWNER:

PRIORITY GROUP LLC
2 MAIN STREET, TOPSHAM, MAINE

CALL DIG SAFE UTILITY LOCATION
1-888-344-7233
STATE LAW REQUIRES ADVANCE NOTICE OF AT LEAST 3 BUSINESS DAYS BEFORE YOU DIG, GRADE OR EXCAVATE FOR THE MARKING OF UNDERGROUND UTILITIES

GRAPHIC SCALE
(IN FEET)
1 inch = 80 ft.

NOT FOR CONSTRUCTION

STATE OF MAINE
CURTIS H. NEUFELD
9770
LICENSED
PROFESSIONAL ENGINEER

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LANDSCAPE ARCHITECTS
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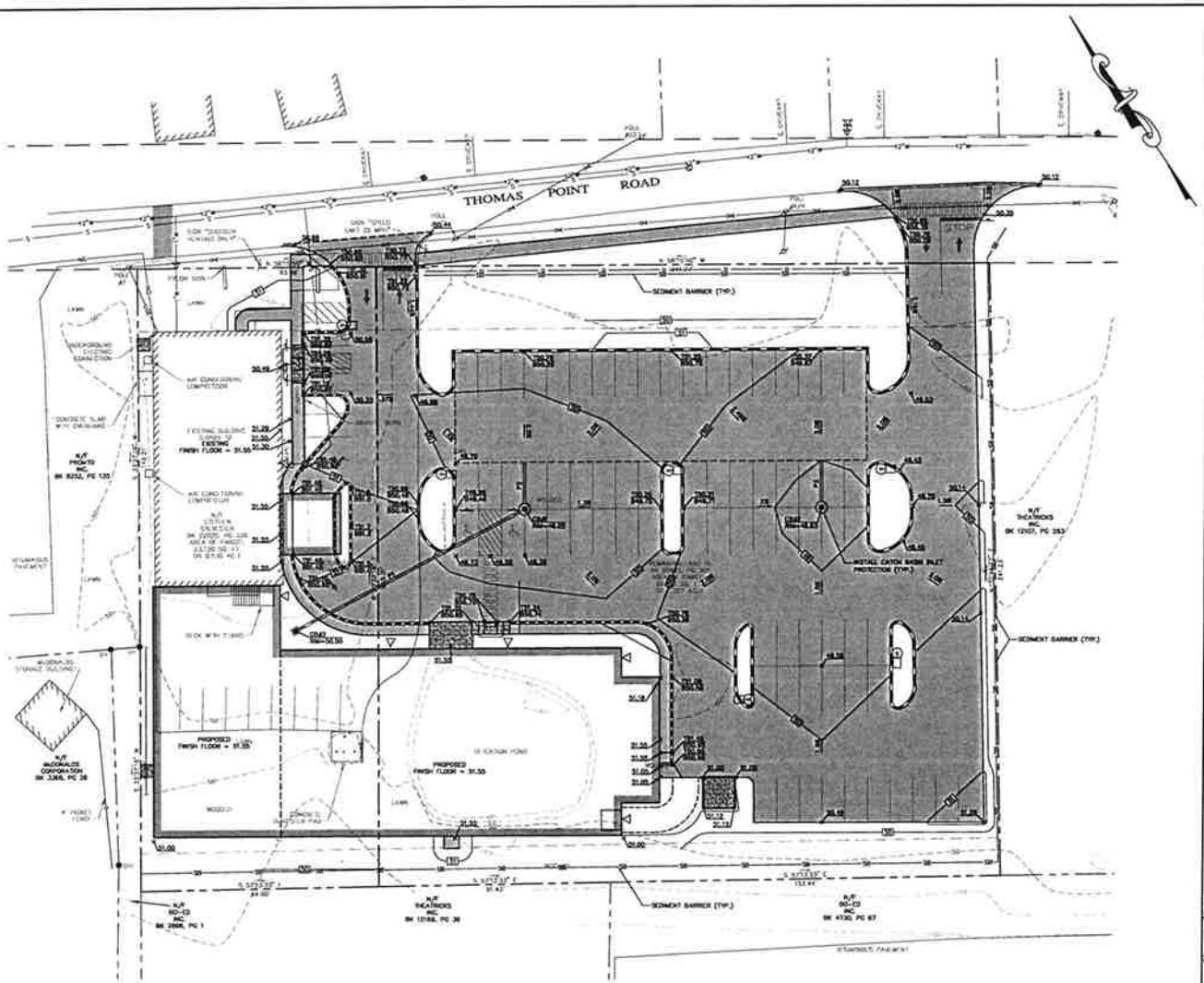
207.725.1200 www.sitelinespa.com

FIELD WK: BWM	SCALE: 1" = 20'	SHEET: C4
DRN BY: RFL	JOB #: 2052	
CHD BY: CYN	SS:	
DATE: 05-31-12	FILE: 2052-UTILITY	



GRADING AND DRAINAGE NOTES:

1. THE CONTRACTOR SHALL PHASE GRADING EFFORTS SUCH THAT TOTAL SITE DISTURBANCE IS MINIMIZED. TEMPORARY EROSION CONTROL MEASURES SHALL BE INSTALLED PRIOR TO GRADING EFFORTS OR WITHOUT DELAY UPON THEIR COMPLETION, DEPENDENT UPON THE SITUATION.

2. ALL FILL SLOPES SHALL BE A MINIMUM OF 3:1 HORIZONTAL TO VERTICAL UNLESS OTHERWISE NOTED ON SHEETS.

3. THE LIMITS OF DISTURBANCE SHALL GENERALLY BE THE MINIMAL EXTENT NECESSARY ONLY TO PERFORM THE GRADING EFFORTS SHOWN ON THE DRAWINGS. SPECIAL CARE SHALL BE TAKEN TO AVOID DISTURBANCE OF OBJECTS AND AREAS NOT SPECIFICALLY IDENTIFIED FOR MODIFICATION OR REMOVAL.

4. ALL DISTURBED AREAS SHALL BE LOAMED AND SEEDED IN ACCORDANCE WITH THE DRAWINGS, UNLESS INTENDED FOR OTHER SURFACE COVER.

5. STORM DRAINS SHALL BE CONSTRUCTED CONCURRENTLY WITH GRADING EFFORTS TO PROVIDE ADEQUATE CONVEYANCE FOR ANY SITE RUNOFF CONDITIONS.

6. WHERE FINAL GRADING HAS BEEN COMPLETED, SURFACE RESTORATION FOR DISTURBED AREAS WILL BE COMPLETED AS SOON AS PRACTICABLE. FOR VEGETATIVE AREAS, VEGETATION WILL BE PROGRESSIVELY ESTABLISHED.

7. UNLESS OTHERWISE NOTED, ALL STORM DRAIN PIPE SHALL BE IN ACCORDANCE WITH MDOT SPECIFICATIONS SECTION 603. PIPE CULVERTS AND STORM DRAINS, LATEST REVISION WITH ACCEPTABLE TYPES OF PIPE ARE AS FOLLOWS:

SMOOTH BORE POLYETHYLENE PIPE – HDPE N-12 ADS

CATCH BASIN DATA:

CB#1
RIM=48.05
INV.IN=44.70 (FROM CB#2)
INV.OUT=44.60 (TO DRAINAGE SYSTEM)

CB#2
RIM=48.63
INV.OUT=44.80 (TO DRAINAGE SYSTEM)

CB#3
RIM=50.50
INV.OUT= 45.80 (TO CB#2)

STORM DRAIN PIPE DATA:

P1 TYPE= 12" HDPE L=89' S=0.01
P2 TYPE= 12" HDPE L=18.5' S=0.005
P3 TYPE= 12" HDPE L=18.5' S=0.005

2.	07-26-12	REVISED PER TOWN STAFF COMMENTS	RPL
1.	07-10-12	SUBMITTED TO TOWN FOR FINAL APPROVAL	RPL
		SUBMITTED TO TOWN OF BRUNSWICK FOR FINAL APPROVAL	RPL

TITLE:
GRADING AND ERISION CONTROL PLAN

PROJECT:
MEDICAL OFFICE BUILDING
14 THOMAS POINT ROAD, BRUNSWICK, MAINE

OWNER:
PRIORITY GROUP LLC
2 MAIN STREET, TOPSHAM, MAINE

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GRAPHIC SCALE
(IN FEET)
1 inch = 20 ft.

NOT FOR CONSTRUCTION

STATE OF MAINE
DUETS
NEUFELD
9779
LICENSED
PROFESSIONAL ENGINEER

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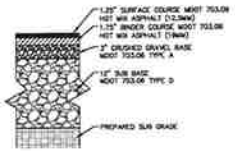
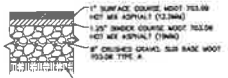
207.725.1200 www.sitelinespa.com

FIELD WK: RWM	SCALE: 1" = 20'	SHEET: C5
DRN BY: RPL	JOB #: 2052	
CHD BY: CYN	SE:	
DATE: 05-31-12	FILE: 2052-GRADING	

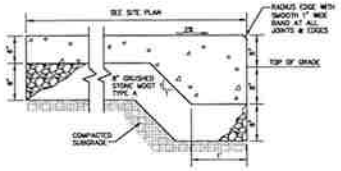


DRIVEWAY & PARKING SECTION
NOT TO SCALE



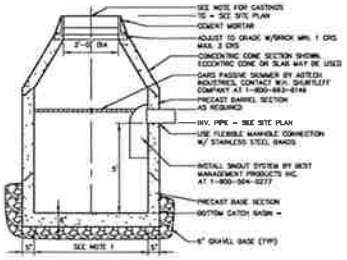
WALKWAY SECTION
NOT TO SCALE

A PAVEMENT SECTIONS
NTS



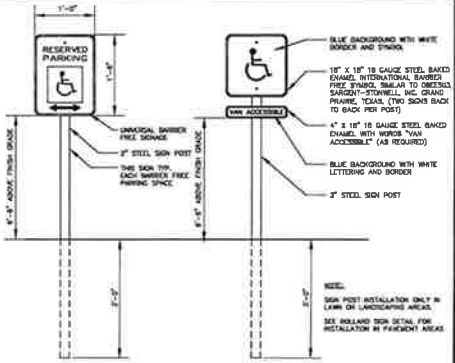
NOTES:
1. CONCRETE SHALL BE CAST-IN-PLACE 5000 PSI W/FIBER REINFORCEMENT.
2. APPLY MEDIUM BROOM FINISH PERPENDICULAR TO DIRECTION OF TRAVEL.
3. PROVIDE 1-1/2" DEEP TOOLED CONTROL JOINT PERPENDICULAR TO WALK AT 5' O.C.
4. PROVIDE EXPANSION JOINT AT 20' INTERVALS.
5. PROVIDE ISOLATION JOINT W/SELF LEVELING SEALER WHERE WALK ABUTS ANY VERTICAL SURFACE.

B INTEGRAL CONCRETE CURB AND SIDEWALK
NTS



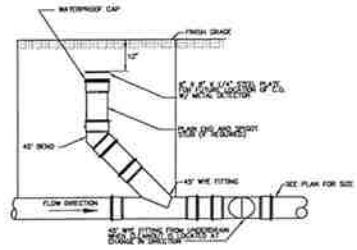
NOTES:
1. 4'-0" I.D. TYPICAL, SOME STRUCTURES MAY REQUIRE LARGER I.D. PROVIDE SHOP DRAWINGS.
2. DRAINAGE STRUCTURES TO BE DESIGNED FOR H-20 LOADING.
3. PIPE SIZES AND INVERTS AS NOTED ON PLANS.
4. CATCH BASIN FRAME AND GRATE TO BE LABARON FOUNDARY MODEL LF-244-S GRATE OR APPROVED EQUAL.

C CATCH BASIN OR DRAINAGE MANHOLE W/SNOUT
NTS

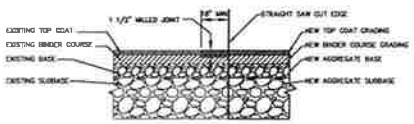


NOTE:
SIGN POST INSTALLATION ONLY IN LAWN OR LANDSCAPING AREAS.
SEE BOLLARD SIGN DETAIL FOR INSTALLATION IN PAVEMENT AREAS

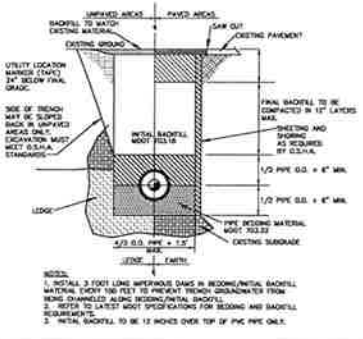
D BARRIER FREE PARKING SIGN DETAIL
NTS



E SEWER CLEAN OUT DETAIL
NTS

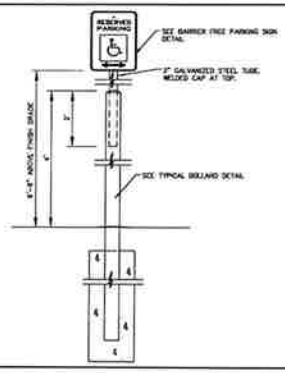


F PAVEMENT SAW CUT SECTION "FULL DEPTH RECONSTRUCTION"
NTS



NOTES:
1. INSTALL 3 FOOT LONG IMPERVIOUS DAMS IN BEDDING/INITIAL BACKFILL MATERIAL EVERY 100 FEET TO PREVENT TRENCH GROUNDWATER FROM BEING CHANNELED ALONG BEDDING/INITIAL BACKFILL.
2. REFER TO LATEST MDOT SPECIFICATIONS FOR BEDDING AND BACKFILL REQUIREMENTS.
3. INITIAL BACKFILL TO BE 12 INCHES OVER TOP OF PVC PIPE ONLY.

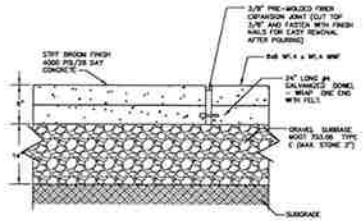
G TYPICAL PIPE TRENCH DETAIL
NTS



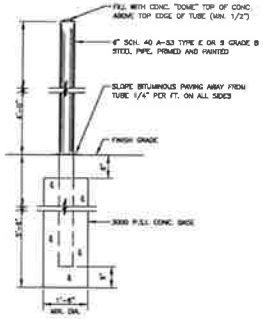
H BARRIER FREE PARKING SIGN IN PAVEMENT
NTS

NOTES:
1. THE MAXIMUM ALLOWABLE SIDEWALK AND CURB RAMP CROSS SLOPES SHALL BE 1.5% (1% MIN).
2. THE MAXIMUM ALLOWABLE SLOPE OF ACCESSIBLE ROUTE EXCLUDING CURB RAMPS SHALL BE 5%.
3. THE MAXIMUM ALLOWABLE SLOPE OF ACCESSIBLE ROUTE CURB RAMPS SHALL BE 7.5%.
4. A MINIMUM OF 3 FEET CLEAR SHALL BE MAINTAINED AT ANY PERMANENT OBSTACLE IN ACCESSIBLE ROUTE (I.E., HYDRANTS, UTILITY POLES, TREE WELLS, SIGNS, ETC.).
5. CURB TREATMENT VARIES, SEE PLANS FOR CURB TYPE.
6. BASE OF RAMP SHALL BE GRADED TO PREVENT PONDING.
7. SEE TYPICAL SIDEWALK SECTION FOR RAMP CONSTRUCTION.
8. WHERE ACCESSIBLE ROUTES ARE LESS THAN 5' IN WIDTH (EXCLUDING CURBING) A 5'x5' PASSING AREA SHALL BE PROVIDED AT INTERVALS NOT TO EXCEED 200 FEET.
9. ELIMINATE ALL CURBING AT RAMP (OTHER THAN VERTICAL CURBING, WHICH SHALL BE SET FLUSH) WHERE IT ABUTS ROADWAY.

I TIP DOWN SIDEWALK RAMP
NTS



J CONCRETE DUMPSTER PAD DETAIL
NTS



K TYPICAL BOLLARD DETAIL
NTS

2.	07-26-12	REVISED PER TOWN STAFF COMMENTS RPL
1.	07-10-12	SUBMITTED TO TOWN FOR FINAL APPROVAL RPL

TITLE:
SITE DEVELOPMENT DETAILS

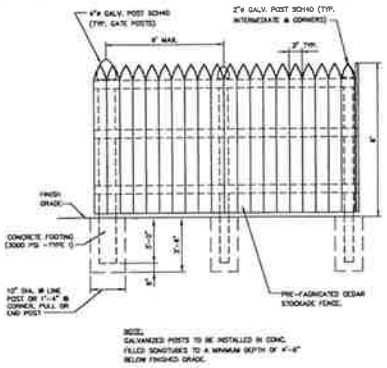
PROJECT:
MEDICAL OFFICE BUILDING
14 THOMAS POINT ROAD, BRUNSWICK, MAINE

OWNER:
PRIORITY GROUP LLC
2 MAIN STREET, TOPSHAM, MAINE

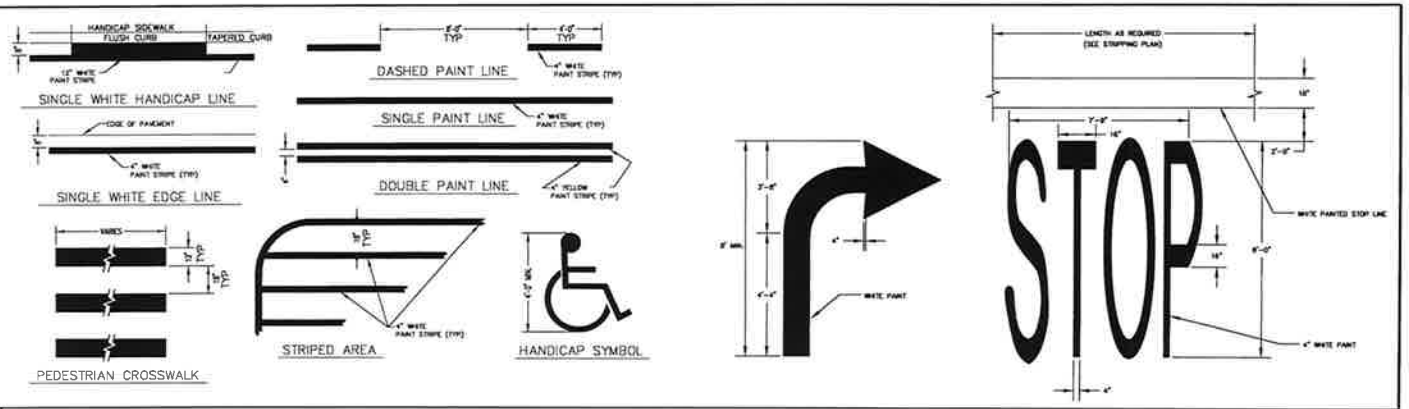
STATE OF MAINE
CURTIS T. MEUFELD
9779
LICENSED
PROFESSIONAL ENGINEER

SITELINES, PA
ENGINEERS • PLANNERS • SURVEYORS
LANDSCAPE ARCHITECTS
8 CUMBERLAND STREET, BRUNSWICK, ME 04011
207.725.1200 www.sitelinepa.com

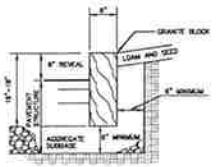
FIELD WK: BWM	SCALE: ###	SHEET:
DRN BY: RPL	JOB #: 2012	C6
CHD BY: CYN	SS:	
DATE: 05-31-12	FILE: 2012-COVER-DET	



A DUMPSTER STOCKADE FENCE DETAIL
NTS.

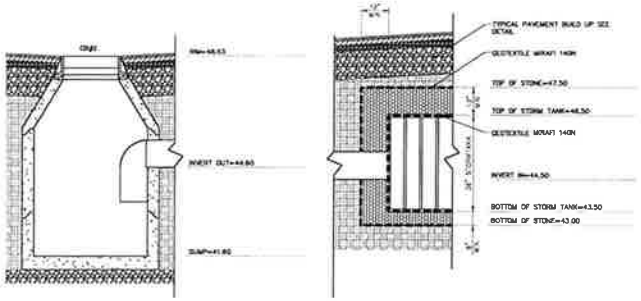


B PAVEMENT MARKINGS
NTS.



VERTICAL GRANITE CURB
NOT TO SCALE

C GRANITE CURB
NTS.



D UNDERGROUND INFILTRATION DETAIL
NTS.

3.	07-26-12	REVISED PER TOWN STAFF COMMENTS	RPL
1.	07-10-12	SUBMITTED TO TOWN FOR FINAL APPROVAL	
		SUBMITTED TO TOWN OF BRUNSWICK FOR FINAL APPROVAL	RPL

TITLE:
SITE DEVELOPMENT DETAILS

PROJECT:
MEDICAL OFFICE BUILDING
14 THOMAS POINT ROAD, BRUNSWICK, MAINE

OWNER:
PRIORITY GROUP LLC
2 MAIN STREET, TOPSHAM, MAINE

STATE OF MAINE
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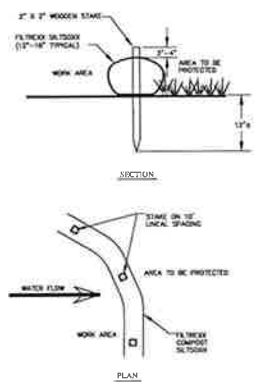
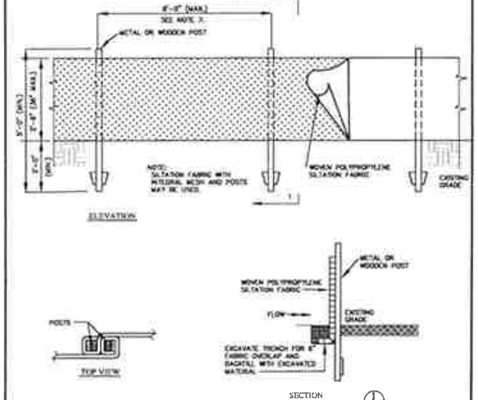
207.725.1200 www.sitelinespa.com

FIELD WK. BWM	SCALE: ###	SHEET
DWN BY. RPL	JOB #: 2052	C7
CH'D BY. CVN	SS:	
DATE: 05-31-12	FILE: 2052-COVER-DET	



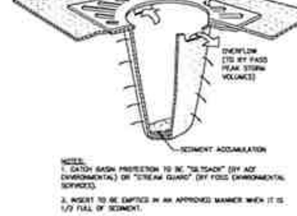
NOTES:
1. ALL MATERIALS TO MEET FILTREXX SPECIFICATIONS
2. SILTSOXX COMPOST/SOIL/ROCK/SEED FILL TO MEET APPLICATION REQUIREMENTS
3. SILTSOXX DEPICTED IS FOR MINIMUM SLOPES. GREATER SLOPES MAY REQUIRE LARGER SOCKS PER THE ENGINEER.
4. COMPOST MATERIAL TO BE DISPERSED ON SITE, AS DETERMINED BY ENGINEER.

A FILTREXX SILTSOXX DETAIL "SEDIMENT BARRIER OPTION"
N.T.S.



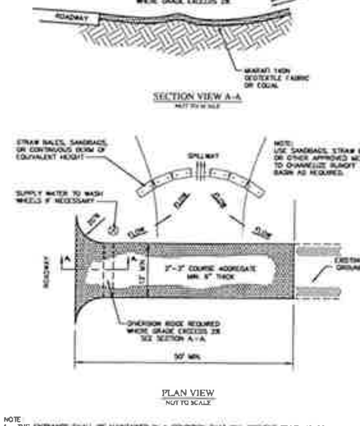
INSTALLATION:
1. EXCAVATE A 6" X 6" TRENCH ALONG THE LINE OF PLACEMENT FOR THE FILTER BARRIER.
2. UNROLL A SECTION AT A TIME AND POSITION THE POSTS AGAINST THE BACK (DOWNSTREAM) WALL OF THE TRENCH.
3. DRIVE POSTS INTO THE GROUND UNTIL APPROXIMATELY 2" OF FABRIC IS LYING ON THE TRENCH BOTTOM.
4. LAY THE TOE-IN FLAP OF FABRIC ONTO THE UNDISTURBED BOTTOM OF THE TRENCH. BACK FILL THE TRENCH AND TAMP THE SOIL.
5. JOIN SECTION AS SHOWN IN TOP VIEW.
6. BARRIER SHALL BE MIRAFI SILT FENCE (100X) OR APPROVED EQUIVALENT.
7. A STONE "FILLET" MAY BE USED FOR ANCHORING FABRIC IF IT CANNOT BE KEYED IN.

B SILT FENCE DETAIL "SEDIMENT BARRIER OPTION"
N.T.S.



NOTES:
1. CATCH BASIN PROTECTION TO BE "SILTSACK" (BY ACF ENVIRONMENTAL) OR "STREAM GUARD" (BY FOSS ENVIRONMENTAL SERVICES).
2. INSERT TO BE EMPTIED IN AN APPROVED MANNER WHEN IT IS 1/2 FULL OF SEDIMENT.
3. INSPECT INSERT AFTER ALL RAINFALL EVENTS, REPAIR AND MAINTAIN AS REQUIRED.

C TEMPORARY INLET PROTECTION DETAIL
N.T.S.



PLAN VIEW
NOT TO SCALE

NOTE:
1. THE ENTRANCE SHALL BE MAINTAINED IN A CONDITION THAT WILL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO PUBLIC RIGHT-OF-WAYS. THIS MAY REQUIRE TOP DRESSING, REPAIR, AND/OR CLEANOUT OF ANY MEASURES USED TO TRAP SEDIMENT.
2. WHEN NECESSARY, WHEELS SHALL BE CLEANED PRIOR TO ENTRANCE ONTO PUBLIC RIGHT-OF-WAYS.
3. WHEN WASHING IS REQUIRED, IT SHALL BE DONE ON AN AREA STABILIZED WITH CRUSHED STONE THAT DRAINS INTO AN APPROVED SEDIMENT TRAP OR BASIN

D STABILIZED CONSTRUCTION ENTRANCE
N.T.S.

EROSION AND SEDIMENTATION NOTES:

1. CONTRACTOR SHALL FOLLOW BEST MANAGEMENT PRACTICES OF THE CUMBERLAND COUNTY SOIL CONSERVATION SERVICE AND THE MAINE DEP BEST MANAGEMENT PRACTICES HANDBOOK.

GENERAL EROSION AND SEDIMENTATION CONTROL PRACTICES:

EROSION/SEDIMENT CONTROL DEVICES:

THE FOLLOWING EROSION SEDIMENTATION CONTROL DEVICES ARE PROPOSED FOR CONSTRUCTION ON THIS PROJECT. INSTALL THESE DEVICES AS INDICATED ON THE PLANS.

1. SEDIMENT BARRIER: SILT SOXX OR APPROVED EQUAL WILL BE INSTALLED ALONG THE DOWN GRADING EDGES OF DISTURBED AREAS TO TRAP RUNOFF BORNE SEDIMENTS UNTIL THE SITE IS STABILIZED. IN AREAS WHERE STORMWATER DISCHARGES THE SEDIMENT BARRIER WILL BE REINFORCED WITH HAY BALES TO HELP MAINTAIN THE INTEGRITY OF THE SEDIMENT BARRIER AND TO PROVIDE ADDITIONAL TREATMENT.

2. HAY BALES: HAY BALES TO BE PLACED IN LOW FLOW DRAINAGE SWALES AND PATHS TO TRAP SEDIMENTS AND REDUCE RUNOFF VELOCITIES. DO NOT PLACE HAY BALES IN FLOWING WATER OR STREAMS.

3. RIPRAP: PROVIDE RIPRAP IN AREAS WHERE CULVERTS DISCHARGE OR AS SHOWN ON THE PLANS.

4. LOAM, SEED, & MULCH: ALL DISTURBED AREAS, WHICH ARE NOT OTHERWISE TREATED, SHALL RECEIVE PERMANENT SEEDING AND MULCH TO STABILIZE THE DISTURBED AREAS. THE DISTURBED AREAS WILL BE REVEGETATED WITHIN 5 DAYS OF FINAL GRADING. SEEDING REQUIREMENTS ARE PROVIDED AT THE END OF THIS SPECIFICATION.

5. STRAW AND HAY MULCH: USED TO COVER DENUDED AREAS UNTIL PERMANENT SEED OR EROSION CONTROL MEASURES ARE IN PLACE. MULCH BY ITSELF CAN BE USED ON SLOPES LESS THAN 15% IN SUMMER AND 8% IN WINTER. JUTE MESH IS TO BE USED OVER MULCH ONLY.

6. IN LIEU OF MULCH, USE EROSION CONTROL BLANKET (EQUAL TO NORTH AMERICAN GREEN SC150) TO STABILIZE AREAS OF CONCENTRATED FLOW AND DRAINAGE WAYS.

TEMPORARY EROSION/SEDIMENTATION CONTROL MEASURES:

PROVIDE THE FOLLOWING TEMPORARY EROSION/SEDIMENTATION CONTROL MEASURES DURING CONSTRUCTION OF THE DEVELOPMENT:

1. SEDIMENT BARRIER ALONG THE DOWNGRADIENT SIDE OF THE PARKING AREAS AND OF ALL FILL SECTIONS. THE SEDIMENT BARRIER WILL REMAIN IN PLACE UNTIL THE SITE IS 85% REVEGETATED.

2. HAY BALES PLACED AT KEY LOCATIONS TO SUPPLEMENT THE SEDIMENT BARRIER.

3. PROTECT TEMPORARY STOCKPILES OF STUMPS, GRUBBINGS, OR COMMON EXCAVATION AS FOLLOWS:
A. SOIL STOCKPILE SIDE SLOPES SHALL NOT EXCEED 2:1
B. AVOID PLACING TEMPORARY STOCKPILES IN AREAS WITH SLOPES OVER 10 PERCENT, OR NEAR DRAINAGE SWALES. SEE ITEM 3 IN CONSTRUCTION PHASE NOTES BELOW.
C. STABILIZE STOCKPILES WITHIN 15 DAYS BY TEMPORARILY SEEDING WITH A HYDROSEED METHOD CONTAINING AN EMULSIFIED MULCH TACKIFIER OR BY COVERING THE STOCKPILE WITH MULCH.
D. SURROUND STOCKPILE SOIL WITH SEDIMENT BARRIER AT BASE OF PILE.

4. ALL DENUDED AREAS WHICH HAVE BEEN ROUGH GRADED AND ARE NOT LOCATED WITHIN THE BUILDING PAD, OR PARKING AND DRIVEWAY SUBBASE AREA SHALL RECEIVE MULCH WITHIN 30 DAYS OF INITIAL DISTURBANCE OF SOIL OR WITHIN 15 DAYS AFTER COMPLETING THE ROUGH GRADING OPERATIONS. IN THE EVENT THE CONTRACTOR COMPLETES FINAL GRADING AND INSTALLATION OF LOAM AND SOD WITHIN THE TIME PERIODS PRESENTED ABOVE, INSTALLATION OF MULCH AND NETTING, WHERE APPLICABLE, IS NOT REQUIRED.

5. IF WORK IS CONDUCTED BETWEEN OCTOBER 15 AND APRIL 15, ALL DENUDED AREAS ARE TO BE COVERED WITH HAY MULCH, APPLIED AT TWICE THE NORMAL APPLICATION RATE, AND ANCHORED WITH FABRIC NETTING. THE PERIOD BETWEEN FINAL GRADING AND MULCHING SHALL BE REDUCED TO A 15 DAY MAXIMUM.

6. TEMPORARY EROSION CONTROL MEASURES SHALL BE REMOVED ONCE THE SITE HAS BEEN STABILIZED OR IN AREAS WHERE PERMANENT EROSION CONTROL MEASURES HAVE BEEN INSTALLED.

PERMANENT EROSION CONTROL MEASURES:

THE FOLLOWING PERMANENT CONTROL MEASURES ARE REQUIRED BY THIS EROSION/SEDIMENTATION CONTROL PLAN:

1. ALL AREAS DISTURBED DURING CONSTRUCTION, BUT NOT SUBJECT TO OTHER RESTORATION (PAVING, RIPRAP, ETC.), WILL BE LOAMED, LIMED, FERTILIZED AND SEEDED. NATIVE TOPSOIL SHALL BE STOCKPILED AND REUSED FOR FINAL RESTORATION WHEN IT IS OF SUFFICIENT QUALITY.

2. SLOPES GREATER THAN 2:1 WILL RECEIVE RIPRAP. (NONE ANTICIPATED)

POST-CONSTRUCTION REVEGETATION:

THE FOLLOWING GENERAL PRACTICES WILL BE USED TO PREVENT EROSION AS SOON AS AN AREA IS READY TO UNDERGO FINAL GRADING.

1. A MINIMUM OF 6" OF LOAM WILL BE SPREAD OVER DISTURBED AREAS AND GRADED TO A UNIFORM DEPTH AND NATURAL APPEARANCE, OR STONE WILL BE PLACED ON SLOPES TO STABILIZE SURFACES.

2. IF FINAL GRADING IS REACHED DURING THE NORMAL GROWING SEASON (4/15 TO 8/15), PERMANENT SEEDING WILL BE DONE AS SPECIFIED BELOW. PRIOR TO SEEDING, LIMESTONE SHALL BE APPLIED AT A RATE OF 138 LBS/1000 SQ. FT. AND 10:20:20 FERTILIZER AT A RATE OF 18.4 LBS/1000 SQ.FT WILL BE APPLIED. BROADCAST SEEDING AT THE FOLLOWING RATES:

LAWNS SHALL BE: ALLEN, STERLING & LATHROP "TUFFTURF", 70% DIAMOND TALL FESCUE, 20% PLEASURE OLUS PERENNIAL RYEGRASS, 10% BARON KENTUCKY BLUEGRASS. SEEDING RATE SHALL BE 7-LBS./1,000 SQ. FT.

SWALES SHALL BE: WILDFLOWER MEADOW (SEED) FESTUCA OVINA SHEEP FESCUE: SOW AT A RATE OF 12 OZ. PER 1,000 SQFT. TRIFOLIUM REPENS WHITE CLOVER: SOW AT A RATE OF ¼ OZ.PER 1,000 SQFT. (FLOWERS) ACHILLEA MILLEFOLIUM YARROW, AQUILEGIA CANADENSIS COLUMBINE, ASCLEPIAS TUBEROSE BUTTERFLY MILKWEED, ASTER NOVAE-ANGLIAE NEW-ENGLAND ASTER, BAPTISIA AUSTRALIS WILD INDIGO, BOLTONIA ASTEROIDES FALSE ASTER, CHRYSANTHEMUM LEUCANTHEMUM OXEYE DAISY, DIGITALIS PURPUREA FOXGLOVE, ECHINACEA PURPUREA PURPLE CONEFLOWER, LUPINUS PERENNIS LUPINE, MONARDA FISTULOSA BERGAMOT, PAPAVER ORIENTALE ORIENTAL POPPY, RUDBECKIA HIRTA BLACK-EYED SUSAN, SALVIA OFFICINALIS SAGE: SOW AT A RATE OF 1/3 OZ. EACH PER 1,000 SQFT. OR 4 OZ. PER 1,000 SQFT. IN COMBINATION

3. AN AREA SHALL BE MULCHED IMMEDIATELY AFTER IS HAS BEEN SEEDED. MULCHING SHALL CONSIST OF HAY MULCH, HYDRO-MULCH, JUTE NET OVER MULCH, PRE-MANUFACTURED EROSION MATS OR ANY SUITABLE SUBSTITUTE DEEMED ACCEPTABLE BY THE DESIGNER.
A. HAY MULCH SHALL BE APPLIED AT THE RATE OF 2 TONS PER ACRE. HAY MULCH SHALL BE SECURED BY EITHER: (NOTE: SOIL SHALL NOT BE VISIBLE)
i. BEING DRIVEN OVER BY TRACKED CONSTRUCTION EQUIPMENT ON GRADES OF 5% AND LESS.
ii. BLANKETED BY TACKED PHOTODEGRADABLE/BIODEGRADABLE NETTING OR WITH SPRAY, ON GRADES GREATER THAN 5%.
iii. SEE NOTE 6, GENERAL NOTES, AND NOTE 6, WINTER CONSTRUCTION.
B. HYDRO-MULCH SHALL CONSIST OF A MIXTURE OF EITHER ASPHALT, WOOD FIBER OR PAPER FIBER AND WATER SPRAYED OVER A SEEDED AREA. HYDRO-MULCH SHALL NOT BE USED BETWEEN 9/15 AND 4/15.

4. CONSTRUCTION SHALL BE PLANNED TO ELIMINATE THE NEED FOR SEEDING BETWEEN SEPTEMBER 15 AND APRIL 15. SHOULD SEEDING BE NECESSARY BETWEEN SEPTEMBER 15 AND APRIL 15 THE FOLLOWING PROCEDURE SHALL BE FOLLOWED. ALSO REFER TO NOTE 6 OF WINTER CONSTRUCTION.
A. ONLY UNFROZEN LOAM SHALL BE USED.
B. LOAMING, SEEDING AND MULCHING WILL NOT BE DONE OVER SNOW OR ICE COVER. IF SNOW EXISTS, IT MUST BE REMOVED PRIOR TO PLACEMENT OF SEED.
C. WHERE PERMANENT SEEDING IS NECESSARY, ANNUAL WINTER RYE (1.2 LBS/1000 SQ.FT) SHALL BE ADDED TO THE PREVIOUSLY NOTED AREAS.
D. WHERE TEMPORARY SEEDING IS REQUIRED, ANNUAL WINTER RYE (2.6 LBS/1000 SQ. FT.) SHALL BE SOWN INSTEAD OF THE PREVIOUSLY NOTED SEEDING RATE.
E. FERTILIZING, SEEDING AND MULCHING SHALL BE APPLIED TO LOAM THE DAY THE LOAM IS SPREAD BY MACHINERY.
F. ALTERNATIVE HAY MULCH SHALL BE SECURED WITH PHOTODEGRADABLE/BIODEGRADABLE NETTING. TRACKING BY MACHINERY ALONE WILL NOT SUFFICE.

5. FOLLOWING FINAL SEEDING, THE SITE WILL BE INSPECTED EVERY 30 DAYS UNTIL 85% COVER HAS BEEN ESTABLISHED. RESEEDING WILL BE CARRIED OUT BY THE CONTRACTOR WITHIN 10 DAYS OF NOTIFICATION BY THE ENGINEER THAT THE EXISTING CATCH IS INADEQUATE.

MONITORING SCHEDULE:

THE CONTRACTOR IS RESPONSIBLE FOR INSTALLING, MONITORING, MAINTAINING, REPAIRING, REPLACING AND REMOVING ALL OF THE EROSION AND SEDIMENTATION CONTROLS OR APPOINTING A QUALIFIED SUBCONTRACTOR TO DO SO. MAINTENANCE MEASURES WILL BE APPLIED AS NEEDED DURING THE ENTIRE CONSTRUCTION CYCLE. AFTER EACH RAINFALL, A VISUAL INSPECTION WILL BE MADE OF ALL EROSION AND SEDIMENTATION CONTROLS AS FOLLOWS.

1. HAY BALE BARRIERS, SEDIMENT BARRIER, AND STONE CHECK DAMS SHALL BE INSPECTED AND REPAIRED ONCE A WEEK OR IMMEDIATELY FOLLOWING ANY SIGNIFICANT RAINFALL. SEDIMENT TRAPPED BEHIND THESE BARRIERS SHALL BE EXCAVATED WHEN IT REACHES A DEPTH OF 6" AND REDISTRIBUTED TO AREAS UNDERGOING FINAL GRADING. SHOULD THE HAY BALE BARRIERS PROVE TO BE INEFFECTIVE, THE CONTRACTOR SHALL INSTALL SEDIMENT BARRIER BEHIND THE HAY BALES.

2. VISUALLY INSPECT RIPRAP ONCE A WEEK OR AFTER EACH SIGNIFICANT RAINFALL AND REPAIR AS NEEDED. REMOVE SEDIMENT TRAPPED BEHIND THESE DEVICES ONCE IT ATTAINS A DEPTH EQUAL TO 1/2 THE HEIGHT OF THE DAM OR RISER. DISTRIBUTE REMOVED SEDIMENT OFF-SITE OR TO AN AREA UNDERGOING FINAL GRADING.

3. REVEGETATION OF DISTURBED AREAS WITHIN 25' OF DRAINAGE-COURSE/STREAM WILL BE SEEDED WITH THE "MEADOW AREA MIX" AND INSPECTED ON A WEEKLY BASIS OR AFTER EACH SIGNIFICANT RAINFALL AND RESEEDED AS NEEDED. EXPOSED AREAS WILL BE RESEEDED AS NEEDED UNTIL THE AREA HAS OBTAINED 100% GROWTH RATE. PROVIDE PERMANENT RIPRAP FOR SLOPES IN EXCESS OF 3:1 AND WITHIN 25' OF DRAINAGE COURSE.

CONSTRUCTION PHASE:

THE FOLLOWING GENERAL PRACTICES WILL BE USED TO PREVENT EROSION DURING CONSTRUCTION OF THIS PROJECT.

1. ONLY THOSE AREAS UNDER ACTIVE CONSTRUCTION WILL BE CLEARED AND LEFT IN AN UNTREATED OR UNVEGETATED CONDITION. IF FINAL GRADING, LOAMING AND SEEDING WILL NOT OCCUR WITHIN 15 DAYS, SEE ITEM NO. 4.

2. PRIOR TO THE START OF CONSTRUCTION IN A SPECIFIC AREA, SEDIMENT BARRIER AND/OR HAY BALES WILL BE INSTALLED AT THE TOE OF SLOPE AND IN AREAS AS LOCATED ON THE PLANS TO PROTECT AGAINST ANY CONSTRUCTION RELATED EROSION. IMMEDIATELY FOLLOWING CONSTRUCTION OF CULVERTS AND SWALES, RIP RAP APRONS SHALL BE INSTALLED, AS SHOWN ON THE PLANS.

3. TOPSOIL WILL BE STOCKPILED WHEN NECESSARY IN AREAS WHICH HAVE MINIMUM POTENTIAL FOR EROSION AND WILL BE KEPT AS FAR AS POSSIBLE FROM THE EXISTING DRAINAGE COURSE. NO STOCKPILE SHALL BE CLOSER THEN 100' OF A RESOURCE INCLUDING, BUT NOT LIMITED TO, WETLANDS, STREAMS, AND OPEN WATER BODIES. ALL STOCKPILES SHALL HAVE A SEDIMENT BARRIER BELOW THEM REGARDLESS OF TIME OF PRESENCE. ALL STOCKPILES EXPECTED TO REMAIN LONGER THAN 15 DAYS SHALL BE:
A. TREATED WITH ANCHORED MULCH (WITHIN 5 DAYS OF THE LAST DEPOSIT OF STOCKPILED SOIL).
B. SEEDED WITH CONSERVATION MIX AND MULCHED IMMEDIATELY.
C. INSTALL SEDIMENT BARRIER AROUND STOCKPILE AT BASE OF PILE. STOCKPILES TO HAVE SEDIMENT BARRIER INSTALLED AT TIME OF ESTABLISHMENT AT BASE OF PILE.

4. ALL DISTURBED AREAS EXPECTED TO REMAIN LONGER THAN 30 DAYS SHALL BE EITHER:
A. TREATED WITH ANCHORED MULCH IMMEDIATELY, OR
B. SEEDED WITH CONSERVATION MIX OF ANNUAL RYE GRASS (0.9 LBS/1000 SQ. FT) AND MULCHED IMMEDIATELY.

5. ALL GRADING WILL BE HELD TO A MAXIMUM 2:1 SLOPE WHERE PRACTICAL. ALL SLOPES WILL BE STABILIZED WITH PERMANENT SEEDING, OR WITH STONE, WITHIN 5 DAYS AFTER FINAL GRADING IS COMPLETE. (SEE POST-CONSTRUCTION REVEGETATION FOR SEEDING SPECIFICATION.)

6. ALL CULVERTS WILL BE PROTECTED WITH STONE RIPRAP (D50 = 6" UNLESS OTHERWISE SPECIFIED) AT INLETS AND OUTLETS.

7. EXISTING TREES REMOVED WITHIN THE LIMITS OF CONSTRUCTION SHALL BE GROUND AND USED FOR MULCH OR HAULED OFF-SITE TO AN APPROVED FACILITY FOR GRINDING OR OTHER DISPOSAL. STUMPS SHALL ALSO BE GROUND AND USED FOR MULCHED OR REMOVED FROM THE SITE TO AN APPROVED FACILITY FOR GRINDING OR OTHER DISPOSAL. BURYING OF STUMPS IS PROHIBITED.

EROSION CONTROL DURING WINTER CONSTRUCTION:

1. WINTER CONSTRUCTION PERIOD: NOVEMBER 1 THROUGH APRIL 15.

2. WINTER EXCAVATION AND EARTHWORK SHALL BE COMPLETED SUCH THAT NO MORE THAN 1 ACRE OF THE SITE IS WITHOUT STABILIZATION AT ANY ONE TIME.

3. EXPOSED AREA SHALL BE LIMITED TO THOSE AREAS TO BE MULCHED IN ONE DAY PRIOR TO ANY SNOW EVENT. AT THE END OF EACH WORK WEEK NO AREAS MAY BE LEFT UNSTABILIZED OVER THE WEEKEND.

4. CONTINUATION OF EARTHWORK OPERATIONS ON ADDITIONAL AREAS SHALL NOT BEGIN UNTIL THE EXPOSED SOIL SURFACE ON THE AREA BEING WORKED HAS BEEN STABILIZED, SUCH THAT NO LARGER AREA OF THE SITE IS WITHOUT EROSION CONTROL PROTECTION AS LISTED IN ITEM 2 ABOVE.

5. AN AREA SHALL BE CONSIDERED TO HAVE BEEN STABILIZED WHEN EXPOSED SURFACES HAVE BEEN EITHER MULCHED WITH STRAW OR HAY AT A RATE OF 150 LB. PER 1000 S.F. (WITH OR WITHOUT SEEDING) OR DORMANT SEEDED, MULCHED AND ANCHORED SUCH THAT SOIL SURFACE IS NOT VISIBLE THROUGH THE MULCH. NOTE: AN AREA IS ALSO CONSIDERED STABLE IF SODDED, COVERED WITH GRAVEL (PARKING LOTS) OR STRUCTURAL SAND.

6. BETWEEN THE DATES OF OCTOBER 15 AND APRIL 1, LOAM OR SEED WILL NOT BE REQUIRED. DURING PERIODS OF ABOVE FREEZING TEMPERATURES THE SLOPES SHALL BE FINE GRADED AND EITHER PROTECTED WITH MULCH OR TEMPORARILY SEEDED AND MULCHED UNTIL SUCH TIME AS THE FINAL TREATMENT CAN BE APPLIED. IF THE DATE IS AFTER NOVEMBER 1 AND IF THE EXPOSED AREA HAS BEEN LOAMED, FINAL GRADED WITH A UNIFORM SURFACE, THEN THE AREA MAY BE DORMANT SEEDED AT A RATE OF 3 TIMES HIGHER THAN SPECIFIED FOR PERMANENT SEED AND THEN MULCHED. IF CONSTRUCTION CONTINUES DURING FREEZING WEATHER, ALL EXPOSED AREAS SHALL BE CONTINUOUSLY GRADED BEFORE FREEZING AND THE SURFACE TEMPORARILY PROTECTED FROM EROSION BY THE APPLICATION OF MULCH. SLOPES SHALL NOT BE LEFT UNEXPOSED OVER THE WINTER OR ANY OTHER EXTENDED TIME OF WORK SUSPENSION UNLESS TREATED IN THE ABOVE MANNER. UNTIL SUCH TIME AS WEATHER CONDITIONS ALLOW, DITCHES TO BE FINISHED WITH THE PERMANENT SURFACE TREATMENT, EROSION SHALL BE CONTROLLED BY THE INSTALLATION OF BALES OF HAY, SEDIMENT BARRIER OR STONE CHECK DAMS IN ACCORDANCE WITH THE STANDARD DETAILS SHOWN ON THE DESIGN DRAWINGS. NOTE: DORMANT SEEDING SHOULD NOT BE ATTEMPTED UNLESS SOIL TEMPERATURE REMAINS BELOW 50 DEGREES AND DAY TIME TEMPERATURES REMAIN IN THE 30'S.

7. MULCH NETTING SHALL BE USED TO ANCHOR MULCH IN ALL DRAINAGE WAYS, SLOPES GREATER THAN 3% FOR SLOPES EXPOSED TO DIRECT WINDS AND FOR ALL OTHER SLOPES GREATER THAN 8%. VEGETATED DRAINAGE SWALES SHALL BE LINED WITH EXCELSIOR OR CURLEX.

8. BETWEEN THE DATES OF OCTOBER 15 TO NOVEMBER 1, WINTER RYE IS RECOMMENDED FOR STABILIZATION. AFTER NOVEMBER 1, WINTER RYE IS NOT EFFECTIVE. AROUND NOVEMBER 15 OR LATER, ONCE TEMPERATURES OF THE AIR AND SOIL PERMIT, DORMANT SEEDING IS EFFECTIVE.

9. IN THE EVENT OF SNOWFALL (FRESH OR CUMULATIVE) GREATER THAN 1 INCH DURING WINTER CONSTRUCTION PERIOD ALL SNOW SHALL BE REMOVED FROM THE AREAS OF SEEDING AND MULCHING PRIOR TO PLACEMENT.

SITE INSPECTION AND MAINTENANCE:

1. WEEKLY INSPECTIONS, AS WELL AS ROUTINE INSPECTIONS FOLLOWING RAIN FALLS, SHALL BE CONDUCTED BY THE GENERAL CONTRACTOR OF ALL TEMPORARY AND PERMANENT EROSION CONTROL DEVICES UNTIL FINAL ACCEPTANCE OF THE PROJECT (85% GRASS CATCH). NECESSARY REPAIRS SHALL BE MADE TO CORRECT UNDERMINING OR DETERIORATION. FINAL ACCEPTANCE SHALL INCLUDE A SITE INSPECTION TO VERIFY THE STABILITY OF ALL DISTURBED AREAS AND SLOPES. UNTIL FINAL INSPECTION, ALL EROSION AND SEDIMENTATION CONTROL MEASURES SHALL IMMEDIATELY BE CLEANED, AND REPAIRED BY THE GENERAL CONTRACTOR AS REQUIRED. DISPOSAL OF ALL TEMPORARY EROSION AND CONTROL DEVICES SHALL BE THE RESPONSIBILITY OF THE GENERAL CONTRACTOR.

IT IS RECOMMENDED THAT THE OWNER HIRE THE SERVICES OF THE DESIGN ENGINEER TO PROVIDE COMPLIANCE INSPECTIONS (DURING ACTIVE CONSTRUCTION) RELATIVE TO IMPLEMENTATION OF THE STORMWATER AND EROSION CONTROL PLANS. SUCH INSPECTIONS SHOULD BE LIMITED TO ONCE A WEEK OR AS NECESSARY AND BE REPORTABLE TO THE OWNER AND TOWN.

2. SHORT-TERM SEDIMENTATION MAINTENANCE SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO CLEAN OUT ALL SWALES AND STRUCTURES PRIOR TO TURNING PROJECT OVER.

3. LONG-TERM PROVISIONS FOR PERMANENT MAINTENANCE OF ALL EROSION AND SEDIMENTATION CONTROL DEVICES AFTER ACCEPTANCE OF THE PROJECT SHALL BE THE RESPONSIBILITY OF THE OWNER.

2.	07-26-12	REVISED PER TOWN STAFF COMMENTS SUBMITTED TO TOWN FOR FINAL APPROVAL	RPL
1.	07-10-12	SUBMITTED TO TOWN OF BRUNSWICK FOR FINAL APPROVAL	RPL

TITLE:
EROSION CONTROL DETAILS

PROJECT:
MEDICAL OFFICE BUILDING
14 THOMAS POINT ROAD, BRUNSWICK, MAINE

OWNER:
PRIORITY GROUP LLC
2 MAIN STREET, TOPSHAM, MAINE

STATE OF MAINE — CURTIS V. NEUFELD — 9779 — LICENSED — PROFESSIONAL ENGINEER

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8 CUMBERLAND STREET, BRUNSWICK, ME 04011
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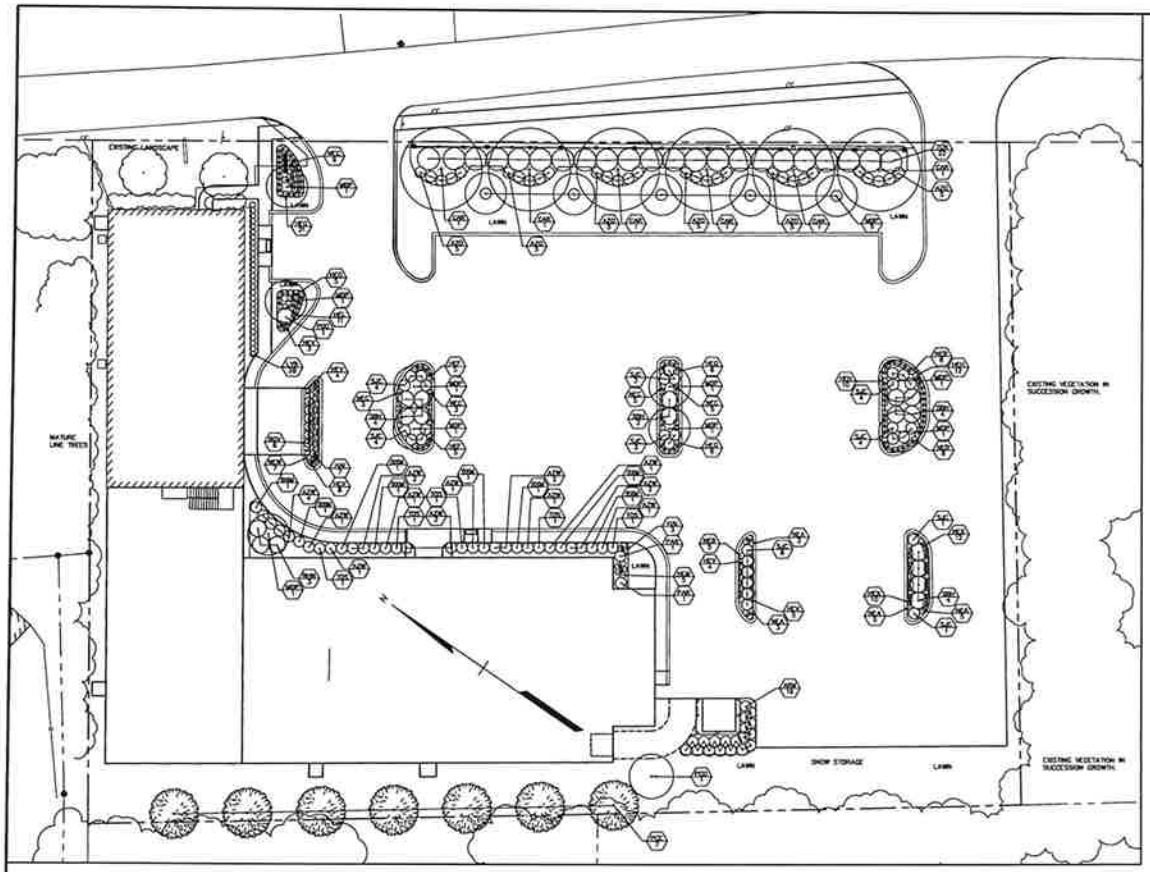
FIELD WK: BWM	SCALE: ###	SHEET:
DRN BY: RPL	JOB #: 2052	C8
CHD BY: CYN	SS:	
DATE: 05-31-12	FILE: 2052-COVER.DET	



PLANTING PLAN

GRAPHIC SCALE

(IN FEET)
1 inch = 20 ft.

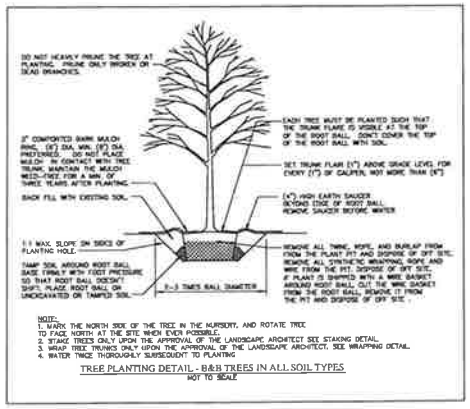
PLANTING NOTES

1. Compostable bark mulch shall be spread on all shrub beds and tree pits 3" deep but not touching the trunk. New shrub beds shall have loam spread to a depth of 12"
2. Plant material shall conform in all ways to the minimum standards set forth in The American Standards for Nursery Stock, published by the American Nursery & Landscape Association, ANSI Z60.1-2004. The following sections shall apply: Section 1, Section 2, Section 3, Section 4, Section 5, and Section 112
3. No fertilizer shall be applied to new plantings. Only Smart Phosphate may be used in process coating.
   a) In the first spring subsequent to new plantings, fertilize new trees and shrubs. The fertilizer shall be 20-10-5 Agriform planting tablets in 21 gram size for trees and/or gram size for shrubs. Place tablets in root zone equal spaced at the plant branch drip line. Provide 20 grams of fertilizer for each 1" caliper of tree trunk at the base and 20 grams of fertilizer for each 18 inches of shrub height or spread. Stack 50 for tables. Repeat the fertilizer application after 24 months.
   b) In the spring, fertilize perennials and herbaceous plants. The fertilizer shall be Osmocote-Plus 15-9-12 (8 mos.). Apply at a rate of 1 lbs./50 grams/ per 2 gallon size or 4 sqft. of plant bed. Incorporate well into the surface mulch.
   c) For established lawn areas, fertilizer there shall be seasonal. Spring fertilizer shall be Scotts Turf Builder with Crabgrass control 30-3-4. Subsequent fertilizer shall be Scotts Turf Builder Plus 2 with broad leaf weed control 28-0-3. Fall fertilizer shall be Scotts Winterizer Lawn Food 22-0-14. Apply fertilizers at a rate of 5 pounds per 1,000 sqft. or as required by soil testing. Only apply to turf area. Lawn areas may be limed in the fall with pulverized ground limestone at a rate of 50 pounds per 1,000 sqft. or as was determined by soil testing.
4. Any substitutions for plant material species or size must be consulted with and approved by the Landscape Architect. The plant schedule shall have precedence over any conflicts with plant quantities on the plan. Notify the Landscape Architect of any conflicts.
5. All grading and construction must be complete before planting can be installed.
6. All areas disturbed by construction and those areas indicated as lawn shall be loam spread to a depth of 4" and shall be seeded.
7. Seeding shall be performed in accordance with M.D.O.T. specifications section 618.09 method one or method two. Lime: 3 tons/acre. Fertilizer: 10-10-10, 14 lbs./1,000 sq. ft. Seeding shall be performed April 15th-June 1st or August 15th-October 1st
8. Seed Mix: One shall be: Allen, Sterling A Lofteny "Puffer", 70% Diamond Tall Fescue, 30% Pioneer Ohio Perennial Ryegrass, 10% Yama Kentucky Bluegrass. Seeding rate shall be 7-lbs./1,000 sq. ft.
9. All areas to be seeded shall be mulched. Mulch shall be hay (free hay or straw not spread or a mat of tree mulches.
10. The Landscape Architect shall approve plant spacing prior to planting.
11. Installation of plant material and lawns shall be in accordance with part 1, 2, 3 and 4 of the Maine Nurseryman's Association Landscape Contract Specifications, Dec. 1999. Evergreen trees 8' and taller must be staked.

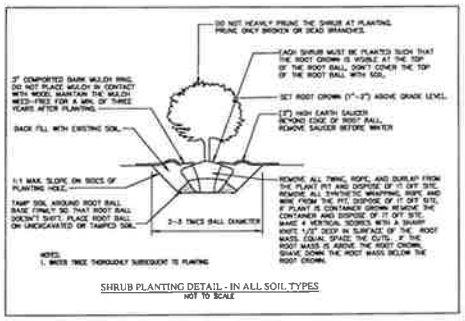
PRIORITY HOLDINGGS GROUP, LLC
THOMAS POINT ROAD
BRUNSWICK, MAINE

PLANT SCHEDULE

KEY	BOTANICAL NAME	COMMON NAME	QTY.	SIZE
TREES				
CAR	Cladrastis lutea	American Yellow Wood	6	2"
MOP	Malus 'Spring Snow'	Sterile White Crabapple	14	1.3/4"
PGE	Picea glauca 'Densata'	Black Hills Spruce	7	5-6'
PCO	Picea omorika	Serbian Spruce	1	5-6'
SHRUBS				
ARM	Aronia melanocarpa 'Autumn Magic'	Black Chokeberry	19	2'-4'
AJO	Azalea poukhanense 'Sweet Sixteen'	Pink Korean Azalea	30	#5
AJW	Azalea 'Conrad's Pleasant White'	Conrad's White Azalea	19	#5
BOV	Buxus sempervirens 'Graves'shief'	Green Velvet Boxwood	6	#3
BMM	Buxus x 'Green Mountain'	Green Mountain Boxwood	8	#5
PAR	Picea glauca 'Pixie'	Blue Alberta Spruce	2	#5
POO	Picea pungens 'Glauca Globosa'	Globe Blue Spruce	1	#5
RHW	Rhododendron 'Windsorea'	Willam Rhododendron	3	2-2.5'
SBM	Spiraea nipponica 'Snow Mound'	Snowmound Spirea	14	#3
SJC	Spiraea japonica 'Magic Carpet'	Magic Carpet Spirea	30	#3
TCN	Taxus cuspidata 'Nana'	Dark Spreading Japanese Yew	22	2-2.5'
TOS	Thuja occidentalis 'Smaragd'	Emerald Green Arborvitae	5	4-5'
PERENNIALS				
HAI	Heuchera alba 'Caramel'	Coral Bells	10	1 Gallon
HCF	Hemerocallis 'Lady Elizabeth'	White Elizabeth Daylily	10	1 Gallon
HEH	Hemerocallis 'Happy Returns'	Happy Returns Daylily	22	1 Gallon
HEL	Hemerocallis 'Barbara Mitchell'	Pink Daylily	11	1 Gallon
HEM	Hemerocallis 'Mary Todd'	Gold/Yellow Daylily	5	1 Gallon
HEQ	Hemerocallis 'Catherine Woodbery'	Rose/Pink Daylily	5	1 Gallon
HEO	Hemerocallis 'On and On'	Pink Repeat Daylily	33	1 Gallon
HEV	Hemerocallis 'Stephanie Returns'	Pink/Yellow Daylily	22	1 Gallon
HEX	Hemerocallis 'Stella Supreme'	Yellow Daylily	22	1 Gallon
LYB	Lysimachia clethroides	Gooseneck Loosestrife	28	1 Gallon
NEA	Nepeta x faassenii 'Dropmore'	Lavender Catmint	16	1 Gallon
NEB	Nepeta x faassenii 'Walker's Low'	Catmint	28	1 Gallon
NEC	Nepeta subsessilis	Japanese Catmint	25	1 Gallon



TREE PLANTING DETAIL - B&B TREES IN ALL SOIL TYPES
NOT TO SCALE



SHRUB PLANTING DETAIL - IN ALL SOIL TYPES
NOT TO SCALE

STATE OF MAINE
FRANCIS A. CUSHING
63
REGISTERED LANDSCAPE ARCHITECT

Francis A. Cushing, RLA
F.A.Cushing, inc.
Master Planning & Landscape Architecture
(207) 751-0416
cushingla@gmail.com
9 Cumberland Street
Brunswick, Maine 04011
www.facushing.com

LANDSCAPE PLAN

MEDICAL OFFICE AND FIELD HOUSE
THOMAS POINT ROAD, BRUNSWICK

PRIORITY HOLDINGS GROUP LLC
TOPSHAM, MAINE

SITELINES, PA
ENGINEERS • PLANNERS • SURVEYORS
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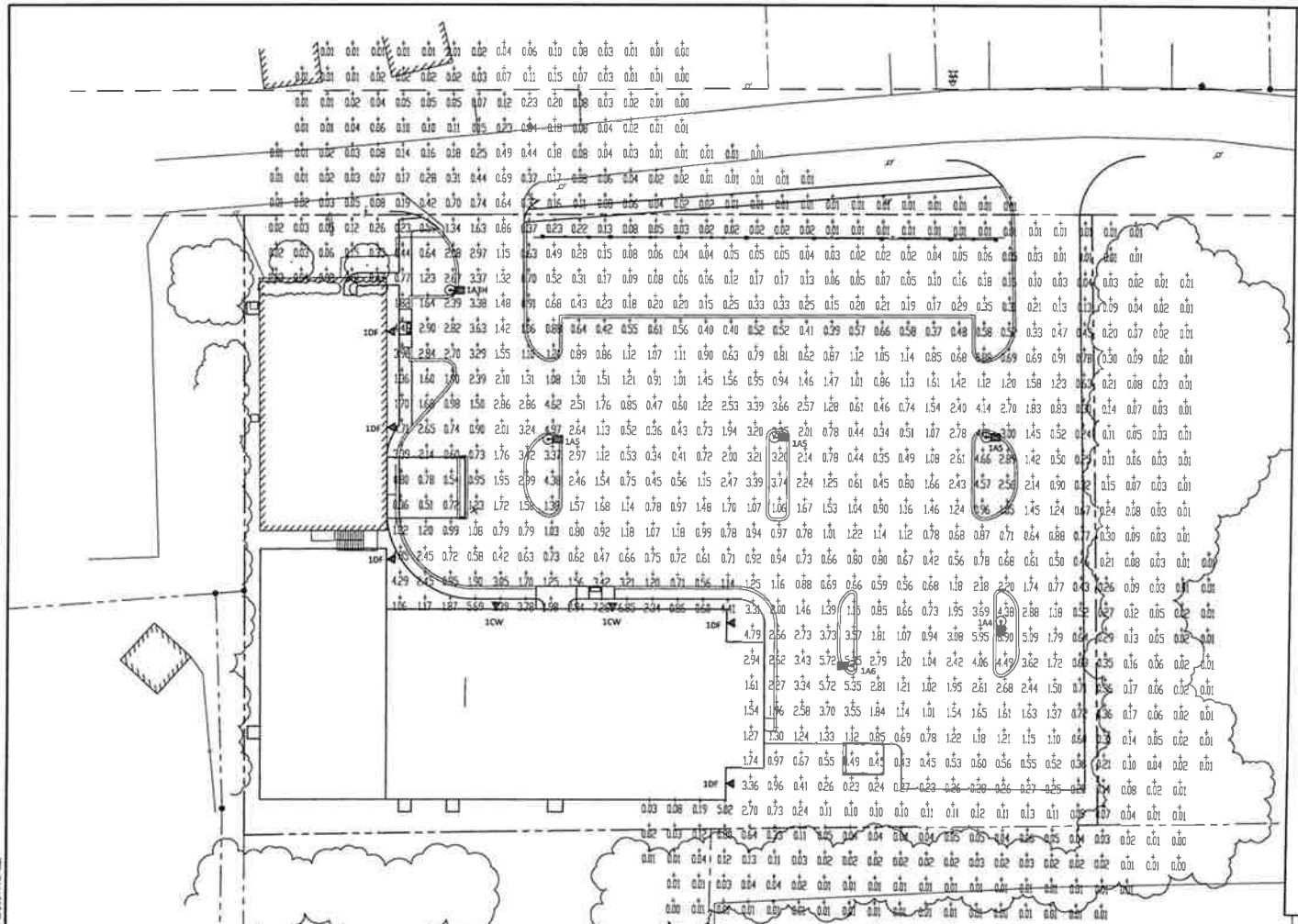
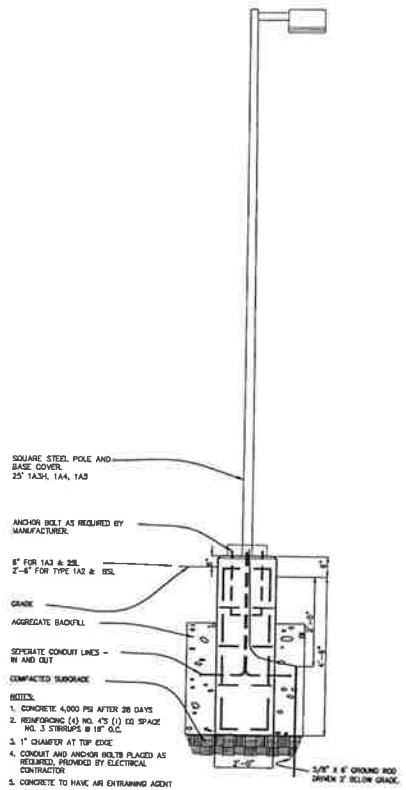
8 CUMBERLAND STREET, BRUNSWICK, ME 04011
207.725.1200 www.sitelinespa.com

FIELD WK:	SCALE: 1"=20'	SHEET: L-1
DRN BY:	JOB #: 2052	
CHD BY:	SS	
DATE: 7-10-12	FILE: FAC	



Medical Office Bldg. (2052) LUMINAIRE SCHEDULE							
TYP	SYMBOL	DESCRIPTION	LAMP	LUMENS	MOUNTING/BALLAST	LLF	QTY
1A3H		Spotlight Light T3 HS 250 (1) "A-3H" RCS-a-WS25-H3-HS	(1) MVR250/HOR	21000	25' SQ.STEEL POLE	0.75	1
1A4		Spotlight Light T4 250 (1) "A-4" RCS-a-WS25-H4	(1) MVR250/HOR	21000	25' SQ.STEEL POLE	0.75	1
1A5		Spotlight Light T5 250 (1) "A-5" RCS-A-WS25-HSP	(1) MVR250/HOR	21000	25' SQ.STEEL POLE	0.75	3
1A6		Spotlight Light T4 250 (1) "A-6" RCS-a-WS25-H4	(1) MVR250/HOR	21000	25' SQ.STEEL POLE	0.75	1
1CW		GRANDLITE / HUB 150 wall pack (1) "CWU" TRP 150PX WT	(1) GE M0R150/U/MED	12500	BLDG. MOUNTED @ 16'	0.75	2
1DF		GRANDLITE/MUBBIE 70 wall pack (1) "DW" TRP 70PX FT	(1) GE M0R70/U/MED	5000	BLDG. MOUNTED @ 12'	0.75	5



LIGHT POLE BASE DETAIL

STATE OF MAINE — CURTIS J. MCLFIELD — 9779 — PROFESSIONAL ENGINEER

STATE OF MAINE — FRANCIS A. CUSHING — # 63 — LICENSED LANDSCAPE ARCHITECT

LIGHTING PLAN

MEDICAL OFFICE AND FIELD HOUSE
THOMAS POINT ROAD, BRUNSWICK, MAINE

PRIORITY HOLDINGS GROUP LLC
TOPSHAM, MAINE

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8 CUMBERLAND STREET, BRUNSWICK, ME 04011
207.725.1200 www.sitelinespa.com

FIELD WK:	SCALE: 1"=20'	SHEET: L-2
DRN BY: FAC	JOB #:	
CHKD BY:	SS:	
DATE: 7/10/12	FILE: 2052 LIGHTING PLAN	

Draft Findings of Fact
Major Site Plan Final Review
Review Date: July 31, 2012

Project Name:	Medical Office, 14 Thomas Point Rd
Case Number:	12-020
Tax Map:	Map CC, Lot 2A
Applicant:	Priority Group 2 Main Street Topsham, Maine 04086
Authorized Representative:	Curt Neufeld, PE Sitelines, PA 8 Cumberland Street Brunswick, Me 04011

PROJECT SUMMARY

The applicant proposes a 15,000 square foot addition to an existing building at 14 Thomas Point Road. The existing 5,000 square foot building will be converted to medical offices and an additional 5,000 square foot will also be medical offices. A 10,000 square foot field house will be added to the 5,000 square foot addition.

The proposed development is located in the Cooks Corner Zoning District within the town's Growth Area and can be serviced by the town's water and sewer system. Brunswick's Cook's Corner Design Standards apply.

Motion 1: That the Final Plan application is deemed complete.

The following waivers have been requested by the applicant:

1. Section 412.2.B.8 – Name, location and width of paving for proposed roads
2. Section 412.2.B.14 – Location of proposed cross section of sanitary sewers
3. Section 412.2.B.16 – Class A Soil Survey
4. Cooks Corner Sidewalk Standard.

Staff recommends approval of the requested waiver.

Review Standards from Section 411 of the Town of Brunswick Zoning Ordinance

411.1 Ordinance Provisions

The property is located in the Cooks Corner (CC) Zoning District. Medical offices are an allowed use within the district. The density provisions do not apply to this nonresidential use. The development meets dimensional and lot configuration requirements. The development complies with all applicable standards for the CC Zoning District including the Cooks Corner Design Standards. *The Board finds that the provisions of Section 411.1 are satisfied.*

411.2 Preservation of Natural Features
The parcel is mostly covered by trees and will be cleared for the new development. There are no steep slopes on the property, it is not within a flood hazard area and no part of the land is within a Natural Resource Protection Zone. The development does not occur within or cause harm to any land which is not suitable for development. *The Board finds that the provisions of Section 411.2 are satisfied.*

411.3 Surface Waters, Wetlands and Marine Resources
No water bodies, streams, wetlands or vernal pools are identified on the site. The development will not adversely affect the Mare Brook watershed or the water quality of Casco Bay or its estuaries. *The Board finds that the provisions of Section 411.3 are satisfied.*

411.4 Flood Hazard Areas
Based on the Flood Insurance Rate Map, community panel # 230042 0015 B, effective date, 1/3/1986, the project site is located within Zone C, described as areas of minimal flooding and outside the regulatory 100-year flood zone. The development activity does not occur within a FEMA flood hazard area and therefore minimizes any risk of flooding. *The Board finds that the provisions of Section 411.4 are satisfied.*

411.5 Stormwater Management
The development creates 74% impervious surface on the parcel. The development cannot connect to the town's storm drain system on Thomas Point Road because the system is beyond capacity so all stormwater will be retained on site. Sebago Technics reviewed the applicant's stormwater management plan and offered ways to improve the system. The applicant will submit an updated stormwater management plan implementing those recommendations detailed in Sebago Technics peer review as required by Staff. The project satisfies the recommended stormwater quality standards described in the Storm Water Management for Maine: Best Management Practices, published by the State of Maine Department of Environmental Protection, as amended. *The Board finds that the provisions of Section 411.5 are satisfied, conditional upon the applicant implementing the recommendations detailed in Sebago Technics peer review as required by Staff.*

411.6 Groundwater
The project will be served by the town's municipal water system. No activities are proposed or anticipated that will extract groundwater for commercial purposes. The Board finds that the development will not, alone or in conjunction with existing activities; adversely affect the quality or quantity of groundwater. *The Board finds that the provisions of Section 411.6 are satisfied.*

411.7 Erosion and Sedimentation Control
The project has been designed to incorporate Best Management Practices as outlined in the Maine Erosion and Sediment Control BMPs as published by the Maine DEP, current edition. Specific provisions for permanent and temporary erosion control features have been provided on the Final Plan. The proposed development will not cause unreasonable soil erosion or reduction in the land's capacity to hold water so that a dangerous or unhealthy situation results. *The Board finds that the provisions of Section 411.7 are satisfied.*

411.8 Sewage Disposal
The project will be served by the town's sewer system and the Sewer Department confirmed its capacity to serve the project. *The Board finds that the provisions of Section 411.8 are satisfied.*

411.9 Water Supply
The project will be served by the town's municipal water system. A letter from the Brunswick-Topsham Water District confirming capacity to serve the project was submitted as part of the applicant's final application. *The Board finds that the provisions of Section 411.9 are satisfied.*

411.10 Aesthetic, Cultural and Natural Values
The proposed project will not have any undue adverse effect on the scenic or natural beauty of the area, historic sites, or significant wildlife habitat identified by the Maine Department of Environmental Protection and Inland Fisheries & Wildlife or by the Town of Brunswick, or rare and irreplaceable natural areas or any public rights for physical or visual access to the shoreline. *The Board finds that the provisions of Section 411.10 are satisfied.*

411.11 Community Impact
The proposed project is located at 14 Thomas Point Road in the Cooks Corner Zoning District. The Brunswick Sewer District and Brunswick-Topsham Water District have confirmed their capacity to serve the project. A solid waste impact fee of $2,018.00 is required for the addition. The town's emergency services are able to adequately serve the location and no significant impact on school enrollment is anticipated as a result of the project. Overall, municipal resources are available to service the project. *The Board finds that the provisions of Section 411.11 are satisfied.*

411.12 Traffic
The developer conducted a traffic study to assess the traffic increase to the area and specifically the intersection at Thomas Point Road and Bath Road. The results of the study show no decrease in service as a result of the development. The development calls for 75 parking spaces. For a 20,000 square foot building housing with all medical offices, 60 spaces would be required; however, the field house includes 10,000 square feet but the extra demand in parking is met with the 75 proposed spaces. The proposed development will not cause unreasonable highway or public road congestion or unsafe conditions with

respect to the use of the highways or public roads existing and the traffic associated with the development shall maintain level of service within 200 feet of any existing curb cut. *The Board finds that the provisions of Section 411.12 are satisfied.*

411.13 Pedestrian and Bicycle Access and Safety
The development provides eight bicycle parking spaces. The Board finds that the development will accommodate bicyclists and addresses pedestrian access, safety and circulation within the site. *The Board finds that the provisions of Section 411.13 are satisfied.*

411.14 Development Patterns
The proposed development is a medical office building and field house located in the town's Growth Area. The surrounding properties are a mix of residential and commercial. The project will utilize public water and sewer service. The development is consistent with the surrounding properties as the Cooks Corner District contains numerous commercial entities. As proposed, the development is respectful of Brunswick's historic development pattern and will have no adverse impact on adjacent residential areas. *The Board finds that the provisions of Section 411.14 are satisfied.*

411.15 Architectural Compatibility
The development is within the Cooks Corner Zoning District and subject to the Cooks Corner Design Standards. The new additions to the existing structure comply with Cooks Corner Design Standards by incorporating elements of New England style architecture. The development is compatible with its surroundings in terms of size, scale, mass and design. *The Board finds that the provisions of Section 411.15 are satisfied.*

411.16 Municipal Solid Waste Disposal
The Director of Public Works requires a solid waste impact fee of $2,018.00 to accommodate the new structures and paying the fee prior to receiving a building permit is a condition of approval. The development will not cause an unreasonable burden on the municipality's ability to dispose of solid waste. *The Board finds that the provisions of Section 411.16 are satisfied, conditional upon paying a $2,018.00 solid waste impact fee.*

411.17 Recreation Needs
The development will not cause an unreasonable burden on the municipality's ability to provide recreational services. No recreation impact fee is required for this nonresidential use. *The Board finds that the provisions of Section 411.17 are not applicable.*

411.18 Access for Persons with Disabilities
The development shall comply with the Americans with Disabilities Act as applicable, which will be reviewed as part of the building permit application. *The Board finds that the provisions of Section 411.18 are satisfied.*

411.19 Financial Capacity and Maintenance

The developer has completed several project of similar scale in Brunswick and adjacent communities and will partner with a local financial institution to complete the project. *The Board finds that the provisions of Section 411.19 are satisfied.*

411.20 Noise and Dust

Best Management Practices as outlined in the Maine Erosion and Sediment Control BMP's published by the Maine Department of Environmental Control, will be utilized to control dust during construction. Noise will be limited through the compliance of the site contractor with the standard hours of construction per Section 524.1. Upon construction completion, there are no anticipated impacts with regard to noise or dust. *The Board finds that the provisions of Section 411.20 are satisfied.*

411.21 Right, Title and Interest

The developer owns the property giving him sufficient right, title and interest to develop the land. *The Board finds that the provisions of Section 411.21 are satisfied.*

411.22 Payment of Application Fees

The applicant has paid all applicable development review application fees but is required by ordinance to pay peer review costs of the town's stormwater review. The amount is $450.00. *The Board finds that the provisions of Section 411.22 are satisfied, conditional upon the applicant paying the peer review costs of the stormwater review.*

DRAFT MOTIONS
MEDICAL OFFICE BUILDING
CASE NUMBER
12-020

Motion 2: That the Board waives the following requirement:

1. Section 412.2.B.8 – Name, location and width of paving for proposed roads
2. Section 412.2.B.14 – Location of proposed cross section of sanitary sewers
3. Section 412.2.B.16 – Class A Soil Survey
4. Cooks Corner Sidewalk Standard requiring concrete pavers.

Motion 3: That the Final Plan is approved with the following conditions:

1. That the Board's review and approval does hereby refer to these findings of fact, the plans and materials submitted by the applicant and the written and oral comments of the applicant, his representatives, reviewing officials, and members of the public as reflected in the public record. Any changes to the approved plan not called for in these conditions of approval or otherwise approved by the Director of Planning and Development as a minor modification shall require a review and approval in accordance with the Brunswick Zoning Ordinance.
2. That prior to receiving a building permit, the applicant submits an updated stormwater management plan implementing those recommendations detailed in Sebago Technics peer review as required by Staff.
3. That prior to receiving a building permit, the applicant pays a solid waste impact fee of $2,018.
4. That prior to receiving a building permit, the applicant pays the peer review fee of $450.00.

* Please note that site plan approvals by the Planning Board shall expire at the end of two years after the date of Final Plan approval unless all construction has been completed by that date (Section 407.4.B of the Brunswick Zoning Ordinance).

Kris Hultgren

From: Curtis Neufeld <cneufeld@sitelinespa.com>
Sent: Friday, July 27, 2012 9:10 AM
To: John Foster; Kris Hultgren
Subject: RE: 14 Thomas point rd

With regard to Solid Waste, using a rate of 1 pound per 100 s.f. of floor area per day (office/warehouse) and 10,000 s.f. of occupied space, it can be estimated that the Project will generate 15.6 tons of solid waste per year (assuming 6 days of operation for 52 weeks). Based on a rate of $258.56 per ton, a fee of $4,034 is estimated. The field house contribution should be incidental to the office uses.

The previous project estimated their solid waste using the same method in 2006 for the 5,000 s.f. existing building, and presumably paid the fee of $2,016. If I understand John's comment, the current project must pay the difference, or an additional $2,018 (the previous estimate rounded down, it should have been $2,017).

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Vice President
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(207) 725-1200 x18

www.sitelinespa.com

From: John Foster [mailto:jfoster@brunswickme.org]
Sent: Thursday, July 26, 2012 2:34 PM
To: Kris Hultgren
Cc: Curtis Neufeld
Subject: RE: 14 thomas point rd

Kris,

They need to submit info on projected solid waste generation for new occupancy and building versus what was generated on site previously. If there is a net increase then there should be a solid waste impact fee. I am copying Curt with this email so he can address that point, thanks, John

John A. Foster, Town Engineer/Public Works Director
Brunswick Public Works
207.725.6654

From: Kris Hultgren
Sent: Thursday, July 26, 2012 1:35 PM
To: John Foster
Subject: 14 thomas point rd

Are you requiring a solid waste impact fee for the addition at 14 Thomas Point Rd – medical offices and a field house?

Kris Hultgren

From: Curtis Neufeld <cneufeld@sitelinespa.com>
Sent: Thursday, July 26, 2012 3:05 PM
To: Kris Hultgren
Subject: FW: CC MOB Sewer

FYI

Curtis Y. Neufeld
Vice President
Sitelines PA
8 Cumberland Street
Brunswick, ME 04011
(fax) (207) 725-1114
(207) 725-1200 x18

www.sitelinespa.com

From: Rob Pontau [mailto:rpontau@brunswicksewer.org]
Sent: Thursday, July 26, 2012 2:51 PM
To: Curtis Neufeld
Subject: Re: CC MOB Sewer

Hi Curt,

We have capacity. I will send you a formal letter early next week, but you are all set.

Robert A. Pontau Jr., PE
Assistant General Manager
Brunswick Sewer District
www.brunswicksewer.org

On Thu, Jul 26, 2012 at 2:41 PM, Curtis Neufeld <cneufeld@sitelinespa.com> wrote:
Rob,

Per our conversation.

thanks.

Curt

SCI # 12217

FORM OF TASK ORDER

TASK ORDER #12-001
Issued Pursuant to the

MASTER SERVICES AGREEMENT

Executed by and between the Town of Brunswick and **Sebago Technics, Inc**

This Task Order is issued pursuant to, and in accordance with, the terms of the Master Service Agreement (the "MSA") entered into by and between the Town of Brunswick, a municipal corporation, with a mailing address of 28 Federal Street, Brunswick, ME 04011, (hereinafter called the "TOWN"), and **Sebago Technics, Inc.**, a corporation, with its principal office located at **75 John Roberts Road Suite 1A, South Portland, ME 04106** (hereinafter called "CONSULTANT").

Task Name: ***Medical Office Building***

Start on:July 18, 2012 *Complete by:July 26* *Budget:* 450.00

Scope of Work: Review stormwater narrative and plan and confirm consistency with Brunswick's stormwater standard (Section 411.5).

Terms and Conditions: All the terms and provisions of the MSA are incorporated herein by reference and made a part hereof. this Task Order.

CONSULTANT	TOWN OF BRUNSWICK
By: James R. Sigmon P.E.	By: Anna M. Breinich Anna M. Breinich, Director Department of Planning & Development
Date: 7/25/12	Date: 7/27/12

Kris Hultgren

From: Peter Baecher
Sent: Friday, July 27, 2012 10:20 AM
To: Kris Hultgren
Subject: Medical Office Building

Hi Kris,

I have reviewed the landscape plan for the Medical Office and Field House project on Thomas Point Road as you requested. The landscape plan is well done, both in plant selection and the amount of trees and plant materials utilized. Therefore, I would like to report to you that I have no issues or concerns about the landscape plan.

Please contact me if you have any questions.

Thank you,
Peter

Peter Baecher, Parks and Facilities Manager/Town Arborist
Brunswick Parks and Recreation Department
30 Federal Street
Brunswick, ME 04011

Phone: 207-725-6656
Fax: 207-725-0148
email: pbaecher@brunswickme.org