-	Stormwater Ma	North East Township
-	Stormwater Ma	maaaaaant Ammiicatio
ator Managamar		inagemeni Applicalio
square feet of importance of water into the g	pervious surface are ground and shall inclu	
<u> PERKATURAN KANTANT BERMUAKSIA</u>	en in de den de aktive skiljenskin het en versie in de in d	[1] [1] [1] [1] [2] [2] [2] [2] [3] [4] [4] [4] [4] [4] [4] [4] [4] [4] [4
_ X		Proposed Impervious Area
X	=	
X	=	
X	=	
X	=	
х	=	
X	=	
X	=	
X	=	
X	=	
X	=	
X	=	
X	=	
X	=	
X		
x	=	
Area to be manac	aed (sum of all areas)	
	of water into the shilar structures, and inpervious Surface and input Surface and i	of water into the ground and shall incluniar structures, and any new streets or somplete. The structures are some some some some some some some som

representative. I further acknowledge that the information provided is accurate and employees of North East Township are granted access to the above described property for review and inspection as may be required. By signature below I acknowledge the requirements of Section 302.A, 302.B and 302.C of the North East Township Stormwater Management Ordinance, and hereby state that the Regulated Activity to be undertaken will comply

Owner

Date:

PDF processed with CutePDF evaluation edition www.CutePDF.com

with these Sections.

CREDITS

Credit 1: DISCONNECTION OF IMPERVIOUS AREA

When runoff from impervious areas is directed to a pervious area that allows for infiltration, filtration, and increased time of concentration, all or parts of the impervious areas may qualify as Disconnected Impervious Area (DIA). Using the criteria below, determine the portion of the impervious area that can be excluded from the calculation of total impervious area.

Criteria: An impervious area is considered to be completely or partially disconnected if it meets the requirements listed below

- rooftop area draining to a downspout is ≤500 sf
- paved area draining to a discharge is ≤1,000 sf
- flow path of paved impervious area is not more than 75'
- soil at discharge is not designated as hydrologic soil group "D"
- flow path at discharge area has a positive slope of ≤5%
- gravel strip or other spreading device is required at paved discharges.

Length of Pervious Flow	DIA Gredit
Path from discharge point *	Factor
(fit) 0 – 14	1.0
15 – 29	0.8
30 – 44	0.6
45 – 59	0.4
60 – 74	0.2
75 or more	0

^{*} Flow path cannot include impervious surfaces and must be at least 15 feet from any impervious surfaces.

Calculate DIA Credit & Required Capture Volume									
Surface Type	Proposed Impervious Area (from previous sheet)	X	DIA Credit Factor		Impervious Area to be managed	•		-	Required Capture Volume (ff3)
Building (area per downspout)		Х		=		÷	6	=	
		Х		=		÷	6	=	
		Х		=		÷	6	=	
		Х		=		÷	6	=	
Driveway		Х		=		÷	6	=	
		Х		=		÷	6	=	
		Х		=		÷	6	=	
Parking Areas		Х		=		÷	6	=	
		Х		=		÷	6	=	
7 7707		Х		=		÷	6	=	
Patios/Walks		Х		=		÷	6	=	
		Х		=		÷	6	=	
		Х		=		÷	6	=	
		Х		=		÷	6	=	
Other		х		=		÷	6	=	7,11-11-11
		Х		=		÷	6	=	
		Х		=		÷	6	=	

Total Req'd Capture Volume

Credit 2: TREE PLANTING

Perhaps the best BMP is a tree as they intercept rainfall, increase evapotranspiration and increase time of concentration. A portion of the required capture volume can be reduced provided the criteria are met.

CREDITS

Deciduous Trees	Evergreen Trees
6 ft³ per tree planted	10 ft³ per tree planted

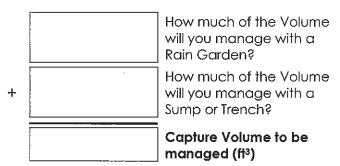
Criteria

To receive credit for planting trees, the following must be met:

- Trees must be native species (see below), minimum 1" caliper tree and 3 feet tall shrub (min).
- Trees shall be adequately protected during construction.
- Trees shall be maintained until redevelopment occurs.
- No more than 25% of the required capture volume can be mitigated through the use of trees.
- Dead trees shall be replaced within 12 months.
- Non-native species are not applicable.

	Req'd Capture Volume (ft³)
-	 Tree Planting Credit (ft³)
	 Capture Volume to be managed (ft³)

Sizing of BMP



Enter the volumes into the Small Project SWM Plan Worksheet on the next sheet.

Native Species Trees (Common Name)

- Blackgum
- Cucumber magnolia
- Hophornbeam
- Maple, (sugar, red or silver)
- Pine, (pitch or eastern white)
- Ironwood
- Hickory, sweet pignut or shag-bark
- Sycamore, American
- Cotton-wood, eastern
- Aspen, big-tooth or quaking
- Cherry, black

- Oak, (white, swamp white, scarlet, pin, red, black)
- Dogwood (silky or red osier)
- Tuliptree
- Willow, black
- Chokeberry (red or black)
- Basswood, American
- Serviceberry, (downy or shadbush)
- Elderberry
- Witch hazel
- Mountain laurel

Small Project SWM Plan Worksheet

Based upon the information you have provided a **Stormwater Plan IS Required** for this development activity. The Stormwater Management Ordinance developed through the *Erie County Act 167 Stormwater Management Plan* regulates compliance requirements for Stormwater Management in this jurisdiction. A complete copy of the Plan can be found on the Erie County Planning Department website (http://www.eriecountyplanning.org) which contains the Model Ordinance.

Regulated activities shall be conducted only after North East Township approves a stormwater management plan. The Erie County Act 167 Stormwater Management Plan will assist you in preparing the necessary information and plans for North East Township to review and approve. This document will constitute an approved plan if all of the relevant details are to be installed in their entirety AND no part of the stormwater system adversely affects any other property, nor adversely affect any septic systems or drinking water wells on this, or any other, parcel. Alternative system proposed require a plan will need to be submitted to North East Township for approval. A design by a qualified professional may be required for more complex sites.

				FOR THIS SITE
Minimum Control	#1 Erosion & Sediment Pollution C#2: Source Control of Pollution#3: Preservation of Natural Drains		ems and Outfo	a lir
The relevant deta entirety AND the	ails from <i>Erie County Act 167 Stori</i> system will be located as not to gwater wells on this, or any other,	mwater o advei	Management rsely affect otl	Plan will be installed in the
To meet this requi	rement, the following will be insta	illed and	d maintained:	
Capture Volume	to be managed (ff3)		Conversion	Surface Area of BMPs (ff²)
	By Rain Garden 6" ponding; 2' soil depth	х	1.20	
	Dry Well or Infiltration Trend 2½' aggregate depth	ch x	1.25	
	Total		Total	
	the above, an alternative and/o			
water wells on this	s, or any other, parcer.		enterveg er dyranes geologis j	Niintente e kasuunaan muunti attatoin uukaan kasaan.

Condition on approval - The stormwater management plan must be fully implemented prior to a request for final inspection of the building or zoning permit.

Acknowledgement - By executing below, the Owner acknowledges the following:

- I declare that I am the owner of the property.
- The information provided is accurate.
- I further acknowledge that municipal representatives are granted access to the above described property for review and inspection as may be required.
- I acknowledge the requirements of Section 302.A, 302.B and 302.C of the North East Township Stormwater Management Ordinance, and hereby state that the Regulated Activity to be undertaken will comply with these Sections.

Owner	Date:

APPENDIX F – RELEASE RATE MAP

