



## CERTIFICATE OF AUTHENTICITY

THIS IS TO CERTIFY THAT THE FOLLOWING ELECTRONIC RECORDS ARE TRUE AND ACCURATE REPRODUCTIONS OF THE ORIGINAL RECORDS OF JAMES CITY COUNTY GENERAL SERVICES DEPARTMENT- STORMWATER DIVISION; WERE SCANNED IN THE REGULAR COURSE OF BUSINESS PURSUANT TO GUIDELINES ESTABLISHED BY THE LIBRARY OF VIRGINIA AND ARCHIVES; AND HAVE BEEN VERIFIED IN THE CUSTODY OF THE INDIVIDUAL LISTED BELOW.

**BMP NUMBER:** CC-006

**DATE VERIFIED:** March 21, 2012

**QUALITY ASSURANCE TECHNICIAN:**

Leah Hardenbergh

*Leah Hardenbergh*

**LOCATION:** WILLIAMSBURG, VIRGINIA



# Stormwater Division

## MEMORANDUM

**DATE:** March 11, 2010  
**TO:** Michael J. Gillis, Virginia Correctional Enterprises Document Management Services  
**FROM:** Jo Anna Ripley, Stormwater  
**PO:** 270712  
**RE:** Files Approved for Scanning

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**General File ID or BMP ID:** CC006

**PIN:** 5020900005

**Subdivision, Tract, Business or Owner**

**Name (if known):** Busch Corporate Center  
**Property Description:** Lot 5 Parcel C  
**Site Address:** 496 Mcclaws Circle

*(For internal use only)*

**Box** 12

**Drawer:** 7

**Agreements:** (in file as of scan date)

N

**Book or Doc#:**

**Page:**

**Comments**

As of 3/11/10, this is currently a Suntrust Bank

C006

**Contents for Stormwater Management Facilities As-built Files**

Each file is to contain:

1. As-built plan
2. Completed construction certification
3. Construction Plan
4. Design Calculations
5. Watershed Map
6. Maintenance Agreement
7. Correspondence with owners
8. Inspection Records
9. Enforcement Actions

Pre-development Loading

	Ac	% Impervious	NSP Load (lbs/ac/yr)	Total P Loading (lbs/ac/yr)
Building Coverage	0.072	90%	2.0	0.144
Pavement	0.318	90%	2.0	0.636
Open Space	<u>0.624</u>	10%	0.3	<u>0.187</u>
Total	1.014 Ac			0.967 lbs/yr

A 10% reduction in nonpoint source pollutant is required  
 Required Reduction =  $0.967 \text{ lb/yr} (10\%) = 0.0967 \text{ lbs/yr}$ .

The required BMP shall be the treatment of the pavements stormwater runoff via an infiltration trench, design type 9. Design type 9 provides an average total P removal efficiency of 65%.

Achieved Total P Removed:

Pavement Runoff Captured = 4660 SF. = 0.11 Ac.  
 Total P Loading =  $0.11 \text{ Ac.} (2.0 \text{ lb/ac./yr.}) = 0.22 \text{ lbs/yr.}$

Using a design type 9 infiltration trench 65% of the total P loading is removed:

Total P Removed =  $0.22 \text{ lb/yr} (65\%) = 0.14 \text{ lb/yr.}$   
 Percentage Removed =  $\frac{0.14}{0.22} \times 100\% = 63.6\% > 10$

GOOD

Infiltration Trench Design (type 9)

Required Trench Volume:  
 10% Reduction Required, therefore,

$$10\% = 100 \left( \frac{x}{0.967} \right) \Rightarrow x = 0.0967 \text{ lbs/yr.}$$

$$0.0967 \text{ lbs/yr} = (y \text{ lb/yr}) 0.65 \Rightarrow y = 0.149 \text{ lbs/yr}$$

$$0.149 \text{ lbs/yr} = (z \text{ Ac}) (2.0 \text{ lb/ac/yr}) \Rightarrow z = 0.074 \text{ Ac} = 3240 \text{ S.F.}$$

1 inch rainfall on 3240 S.F. creates the required storage volume of:

$$3240 \text{ S.F.} \left( \frac{1 \text{ in}}{12 \text{ in}} \right) = 270.0 \text{ ft}^3$$

Volume Correction for Stone Void Ratio (40%) =  $\left( \frac{270 \text{ ft}^3}{0.4} \right) = 675 \text{ ft}^3$

W = 6 ft. D = 4 ft L = 28 ft

WATERSHED	CC	MAINTENANCE PLAN	No	CTRL STRUC DESC	
BMP ID NO	006	SITE AREA acre	1.14	CTRL STRUC SIZE inches	
PLAN NO		LAND USE	COMM	OTLT BARRL DESC	NONE
TAX PARCEL	(50-2)(9-5)	old BMP TYP	INFIL #9	OTLT BARRL SIZE inch	0
PIN NO	5020900005	JCC BMP CODE		EMERG SPILLWAY	No
CONSTRUCTION DATE	6/1/1993	POINT VALUE	10	DESIGN HW ELEV	
PROJECT NAME	Kingsmill Crestar Bank			PERM POOL ELEV	
FACILITY LOCATION	496 McLaws Circle			2-YR OUTFLOW cfs	
CITY-STATE	Williamsburg, VA	SVC DRAIN AREA acres	1	10-YR OUTFLOW cfs	
CURRENT OWNER	United Virginia Bank of Williamsburg			REC DRAWING	No
OWNER ADDRESS	C/O Suntrust Bank	SERVICE AREA DESCRI	NONE	CONSTR CERTIF	No
OWNER ADDRESS 2	919 E. Main Street	IMPERV AREA acres		LAST INSP DATE	
CITY-STATE-ZIP CODE	Richmond VA, 23219	RECV STREAM	COLLEGE CK TRIB	INTERNAL RATING	
OWNER PHONE		EXT DET-WQ-CTRL	No	MISC/COMMENTS	
MAINT AGREEMENT	No	WTR QUAL VOL acre-ft	0.02		
EMERG ACTION PLAN	No	CHAN PROT CTRL	No		
		CHAN PROT VOL acre-ft	0		
		SW/FLOOD CONTROL	No		
		GEOTECH REPORT	No		

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OWNER ADDRESS	C/O Suntrust Bank			CONSTR CERTIF	No
OWNER ADDRESS 2	919 E. Main Street	SERVICE AREA DESCR	NONE	LAST INSP DATE	8-10-04
CITY-STATE-ZIP CODE	Richmond VA, 23219	IMPERV AREA acres		INTERNAL RATING	?
OWNER PHONE		RECV STREAM	COLLEGE CK TRIB	MISC/COMMENTS	
MAINT AGREEMENT	No	EXT DET-WQ-CTRL	No		
EMERG ACTION PLAN	No	WTR QUAL VOL acre-ft	0.02		
		CHAN PROT CTRL	No		
		CHAN PROT VOL acre-ft	0		
		SW/FLOOD CONTROL	No		
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MAP 6 (K-13)  
MAP 7 (A-13)



CC006

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CROWN  
STA.

CC006

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