

Fredericksburg Campus

### Municipal Separate Storm Sewer System Annual Report

For

General Permit No. VAR040125

Permit Year

July 1, 2022 through June 30, 2023

This annual report is submitted in accordance with 9VAC25-890-40 as part of the requirement for permit coverage to discharge stormwater to surface waters of the Commonwealth of Virginia consistent with the VAR04 General Permit effective date November 1, 2018.

Submitted: September 29, 2023



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### **ACRONYMS**

BMP	Best Management Practice
DEQ	Virginia Department of Environmental Quality
MCM	Minimum Control Measure
MS4	Municipal Separate Storm Sewer System
NMP	Nutrient Management Plan
POC	Pollutant of Concern
SWM	Stormwater Management
SWPPP	Stormwater Pollution Prevention Plan
TMDL	Total Maximum Daily Load
VPDES	Virginia Pollution Discharge Elimination System
WLA	Wasteload Allocation





### 1.0 GENERAL ANNUAL REPORTING REQUIREMENTS

### 1.1. General Information (Part I.D.2.a)

Permitee Name: Germanna Community College

System Name: Virginia Community College System

Permit Number: VAR040125

### 1.2. Reporting Period (Part I.D.2.b)

The reporting period for which the annual report is being submitted:

July 1, 2022 through June 30, 2023

### 1.3. Signed Certification (Part I.D.2.c)

A signed certification as per Part III K:

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

Printed Name: John M. Davis

Title: Vice President of Administrative Services

### 1.4. Reporting for MCMs 1-6 (Part I.D.2.d)

Include information for each annual reporting item specified in Part I.E:

Reporting information for each Minimum Control Measure is provided in Section 2.0.





### 1.5. Evaluation of the MS4 Program Implementation (Part I.D.2.e)

An evaluation of the MS4 program implementation, including a review of each MCM to determine the MS4 program's effectiveness and whether changes to the MS4 Program Plan are necessary:

An evaluation for each Minimum Control Measure is provided in Section 2.0. Changes that are necessary to be made to the MS4 Program Plan are summarized in Table 1.

Table 1: Summary of MS4 Program Plan Changes

Not Applicable





### 2.0 MINIMUM CONTROL MEASURES

### 2.1. MCM #1: Public Education and Outreach

### 2.1.1. High Priority Stormwater Issues (Part I.E.1.g(1))

A list of high-priority stormwater issues addressed in the public education and outreach program:

A list of high-priority stormwater issues addressed in public education and outreach program is provided in Table 2.

### 2.1.2. High Priority Stormwater Issue Communication Strategies (Part I.E. 1.g(2))

A list of strategies used to communicate each high-priority stormwater issue:

A list of strategies used to communicate each high-priority stormwater issue is provided in Table 2 and documentation of the communication efforts are included in Appendix A.

Ta	Table 2: High Priority Stormwater Issues					
#	Stormwater Issue	Strategy	Communication	Metric	Beneficial	
1	Public education of stormwater runoff	Traditional Written Materials	Powerpoint distributed via email to all students, faculty and staff	Approx. 10,000 students, faculty & staff	⊠ Yes □ No	
2	TMDLs and local impaired waters	Media materials	Graphic media placed on TV monitors in public frequented areas	Approx. 1,500 students, faculty & staff	⊠ Yes □ No	
3	Motor oil from vehicles in parking lots	Traditional Written Materials	Posters hung in frequented areas in multiple buildings around campus	Approx. 1,500 students, faculty & staff	⊠ Yes □ No	

### 2.1.3. MCM #1 Evaluation (Part I.D.2.e)

Review the MCM to determine the MS4 Program's effectiveness and whether or not changes to the MS4 Program Plan are necessary:

Were al	1 MCM #1	measurable	goals completed	d in accordance	with the MS	4 Program Plan'
⊠ Yes	□ No (	)				





Are	the MS4 Program	i me	asurable goals effective?
$\boxtimes$	Yes (Effective)		No (Ineffective, necessary changes to the MS4 Program ar
incl	uded in Section 1.	5.)	





### 2.2. MCM #2: Public Involvement and Participation

# 2.2.1. Public Input Summary (Part I.E.2.f(1)) A summary of any public input on the MS4 program received (including stormwater complaints) and responses: Were any MS4 Program inputs or stormwater complaints received from the public? ☐ Yes ☐ No If yes, were responses provided? ☐ Yes ☐ No ☒ Not Applicable

### 2.2.2. MS4 Program Webpage (Part I.E.2.f(2))

A webpage address to the MS4 program and stormwater website:

The webpage address is https://germanna.edu/about-germanna/public-information/environmental-sustainability

### 2.2.3. Public Involvement Activities Implemented (Part I.E.2.f(3))

A description of the public involvement activities implemented:

A description of the implemented public involvement activities is provided in Table 3.

### 2.2.4. Public Involvement Activity Metric and Evaluation (Part I.E.2.f(4))

A report of the metric as defined for each activity and an evaluation as to whether or not the activity is beneficial to improving water quality:

A report of the metric as defined for each activity and an evaluation as to whether or not the activity is beneficial to improving water quality is provided in Table 3. Appendix B includes documentation of the public involvement activities.





T	Table 3: Public Involvement Activities Implemented					
#	<b>Activity Description/Date</b>	Category	Metric	Collaboration	Beneficial	
1	Environmental Science Classroom Presentation w/ Q&A on January 23, 2023 at 10:30 am	Educational	22 attendees	NA	⊠ Yes □ No	
2	Environmental Science Classroom Presentation w/ Q&A on January 18, 2023 at 3:30 pm	Educational	22 attendees	NA	⊠ Yes □ No	
3	STEAM-H Day Stormwater Booth on April 1, 2023	Educational	13 people reached	NA	<ul><li>⋈ Yes</li><li>□ No</li></ul>	
4	Storm drain makers install by students at SGA Meeting on April 11, 2023	Pollution Prevention	11 participants, 5 storm drain markers installed	NA	⊠ Yes □ No	

### 2.2.5. MS4 Collaboration (Part I.E.2.f(5))

The name of other MS4 permittees collaborated with in the public involvement opportunities:

If applicable, the name of other MS4 permittees collaborated with for any of the public involvement opportunities are provided in Table 3.

### 2.2.6. MS4 Program Plan BMP Measurable Goals

The MS4 Program Plan BMPs measurable goals are provided in Table 4.

Table 4: MS4 Program Plan BMP Measurable Goals for MCM #2					
BMP	Measurable Goal	Completeness Status			
		□ Yes			
2.1	Was documentation of the public input or complaints on the MS4 program and MS4 Program Plan maintained?	□ No			
2.1					
		(None received)			
2.1	Is the effective MS4 permit and coverage letter on the	⊠ Yes			
	webpage?	□ No			
2.1	Is the most current MS4 Program Plan on the webpage?	⊠ Yes			





		□ No			
2.1	Is the annual report for each year of the term covered by this permit no later than 30 days after submittal to the department on the webpage?	<ul><li>⋈ Yes</li><li>⋈ No</li><li>⋈ Not Applicable</li><li>( )</li></ul>			
2.1	Is there a mechanism for the public to report potential illicit discharges, improper disposal or spills to the MS4, complaints regarding land disturbing activities or other potential stormwater pollution concerns on the webpage?	⊠ Yes □ No			
2.1	Is there a method for how the public can provide input of the MS4 Program Plan on the webpage?	<ul><li></li></ul>			
2.1	Is the latest Virginia Community College System Annual Standards and Specifications on the webpage?	<ul><li>☑ Yes</li><li>☐ No</li></ul>			
	2.2.7. MCM #2 Evaluation (Part I.D.2.e)  Review the MCM to determine the MS4 Program's effective changes to the MS4 Program Plan are necessary:  Were all MCM #2 measurable goals completed in accordance with				
	Were all MCM #2 measurable goals completed in accordance with the MS4 Program Plan <sup>4</sup> ✓ Yes (Documentation is provided in Appendix B.)   No				
	Are the MS4 Program measurable goals effective?  ☑ Yes (Effective) □ No (Ineffective, necessary changes included in Section 1.5.)	to the MS4 Program are			





### 2.3. MCM #3: Illicit Discharge Detection and Elimination

### 2.3.1. MS4 Map and Information Table (Part I.E.3.e(1))

A confirmation statement that the MS4 map and information table have been updated to

reflect any changes to the MS4 occurring on or before June 30 of the reporting year:
Were the MS4 storm sewer map and outfall information table updated to reflect any changes to the MS4 occurring on or before June 30 of the reporting year?  ☐ Yes ☐ No ( ) ☒ Not Applicable (No changes required)
2.3.2. Dry Weather Screening (Part I.E.3.e(2))  The total number of outfalls screened during the reporting period as part of the dry weather screening program:
Were outfalls screened during the reporting period? ⊠ Yes □ No
The number of outfalls screened during the reporting yard as part of the dry weather screening program is 2. This represents 100% of the total outfalls.
<ul> <li>2.3.3. Illicit Discharges (Part I.E.3.e(3))</li> <li>A list of illicit discharges to the MS4 including spills reaching the MS4:</li> <li>Were there any illicit discharges to the MS4 including spills reaching the MS4?</li> <li>□ Yes (Refer to Table 5) ⋈ No</li> </ul>
Table 5: Illicit Discharges
Illicit Discharge Not Applicable
Part I.E.3.e(3)(a) Source:
Part I.E.3.e(3)(b) Date Observed & Date Reported:
Part I.E.3.e(3)(c) Detected during Screening, Reported by Public or Other (Describe):
Part I.E.3.e(3)(d) Investigation Resolution:
Part I.E.3.e(3)(e) Description of Follow-up Activities:
Part I.E.3.e(3)(f) Date Investigation Closed:





### 2.3.4. MS4 Program Plan BMP Measurable Goals

Table 6: MS4 Program Plan BMP Measurable Goals for MCM #3

Are the MS4 Program measurable goals effective?

included in Section 1.5.)

The MS4 Program Plan BMPs measurable goals are provided in Table 6.

BMP	Measurable Goal	<b>Completeness Status</b>			
3.1	Was a GIS compatible shapefile submitted to DEQ?	Completed			
		□ Yes			
	Was written notification provided to any downstream				
3.1	adjacent MS4 of any known interconnection established or	(No new or			
	discovered during the permit reporting year?	discovered)			
		□ No			
	Did all students, faculty and staff have access to the	⊠ Yes			
3.2	Standards of Conduct for Employees and the Student				
	Handbook for Students?	LI NO			
3.3	Were illicit discharge detection and elimination procedures	⊠ Yes			
3.3	implemented, enforced and documentation maintained?	□ No			
2.3.5. MCM #3 Evaluation (Part I.D.2.e) Review the MCM to determine the MS4 Program's effectiveness and whether or no					
	changes to the MS4 Program Plan are necessary:				
	changes to the MS+110gram Francisco de decessary.				
	Were all MCM #3 measurable goals completed in accordance wit ⊠ Yes □ No ( )	h the MS4 Program Plan?			

⊠ Yes (Effective) □ No (Ineffective, necessary changes to the MS4 Program are





### 2.4. MCM #4: Construction Site Stormwater Runoff Control

### 2.4.1. Implementation of Standards and Specifications (Part I.E.4.a(3))

The MS4 implements a construction site stormwater runoff program in accordance with the most recent DEQ approved Standards and Specifications in compliance with the Virginia Erosion and Sediment Control Law and Virginia Erosion and Sediment Control Regulations.

### 2.4.1.1. Conforming Land Disturbance Projects (Part I.E.4.d(1)(a))

A confirmation statement that land disturbing projects that occurred during the reporting period have been conducted in accordance with the current department approved standards and specifications for erosion and sediment control:

	ted
in accordance with the current department approved standards and specifications :	for
erosion and sediment control?	

	Yes		No	(Refer to	Table 7)	$\boxtimes$	Not A	Applicab)	le (No	o land	disturbing	g projects)
--	-----	--	----	-----------	----------	-------------	-------	-----------	--------	--------	------------	-------------

### 2.4.1.2. Non-Conforming Land Disturbance Projects (Part I.E.4.d(1)(b))

If one or more of the land disturbing projects were not conducted with the department standards and specifications, an explanation as to why the projects did not conform to the approved standards and specifications:

If no is checked above, an explanation as to why a project did not conform to the approved standards and specifications is provided in Table 7.

Table 7: Project(s) Not in Conformance with Approved Standards and Specifications
Project Name: Not Applicable
Explanation:

### 2.4.2. Site Stormwater Runoff Inspections (Part I.E.4.d(2))

<u>Total number of inspections conducted:</u>

The total number of site stormwater runoff inspections conducted for regulated land disturbance activities in accordance with the most recent DEQ approved Standards and Specifications is Not Applicable.





### 2.4.3. Enforcement Actions (Part I.E.4.d(3))

The total number and type of enforcement actions implemented:

The total number of enforcement actions implemented is Not Applicable.

The total number of Notices of Violation (Red flag) issued is Not Applicable.

The total number of Stop Work Orders (Black flag) issued is Not Applicable.

### 2.4.4. MCM #4 Evaluation (Part I.D.2.e)

Review the MCM to determine the MS Program's effectiveness and whether or not changes to the MS4 Program Plan are necessary:

We	re all MCM #4 me	asur	able goals completed in accordance with the MS4 Program Plan
$\boxtimes$	Yes $\square$ No (	)	
Are	the MS4 Program	n me	asurable goals effective?
$\boxtimes$	Yes (Effective)		No (Ineffective, necessary changes to the MS4 Program are
incl	uded in Section 1	.5.)	





### 2.5. MCM #5: Post-Construction Stormwater Management

### 2.5.1. Implementation of Standards and Specifications (Part I.E.5.a(3))

The MS4 implements the most recent DEQ approved standards and specifications and a stormwater management facility inspection and maintenance program in accordance with Part I.E.5.b.

### 2.5.2. Stormwater Management Facility Inspections (Part I.E.5.i(2))

<u>Total number of inspections conducted on stormwater management facilities owned or operated by the permittee:</u>

Were	in spections	conducted	on	stormwater	management	facilities	during	the	reporting
year?	⊠ Yes □	No							

The total number of inspections conducted on stormwater management facilities is 6.

### 2.5.3. Stormwater Management Facility Maintenance (Part I.E.5.i(3))

A description of significant maintenance, repair, or retrofit activities performed on the stormwater management facilities owned or operated by the permittee to ensure it continues to perform as designed. This does not include routine activities such as grass mowing or trash collection:

Were significant maint	tenance,	repair, o	r retrofit	activities	performed	on any	stormwater
management (SWM) fa	acilities d	luring th	e reportir	ıg year?			
☐ Yes ☐ No (	) 🛛 N	ot Applie	cable (No	significa	nt maintena	nce req	uired.)

If yes, a description of significant maintenance, repair, or retrofit activities performed on the stormwater management facilities owned or operated by the MS4 to ensure it continues to perform as designed is provided in Table 8.

Table 8: Maintenance A	ctivities Performed on Stormwater Management Facilities
Stormwater Management Facility	Significant Maintenance Activity





### 2.5.4. Virginia Construction Stormwater General Permit Database (Part I.E.5.i(4))

A confirmation statement that the permittee submitted stormwater management facility information through the Virginia Construction Stormwater General Permit database for those land disturbing activities for which the permittee was required to obtain coverage under the General VPDES Permit for Discharges of Stormwater from Construction Activities in accordance with Part I E 5 f or a statement that the Permittee did not complete any projects requiring coverage under the General VPDES Permit for Discharges of Stormwater form Construction Activities:

Stormwater management facility information for stormwater facilities installed after July 1, 2014 was submitted through the Virginia Construction Stormwater General Permit database for land disturbing activities requiring a General VPDES Permit for Discharges of Stormwater from Construction Activities?

☑ Not Applicable (Not a VSMP authority.)

### 2.5.5. DEQ BMP Warehouse (Part I.E.5.i(5))

A confirmation statement that the permittee electronically reported BMPs using the DEQ BMP Warehouse in accordance with Part I E 5 g and the date on which the information was submitted:

No later than October 1 of each year, stormwater management facilities and BMPs implemented to meet a TMDL load reduction between July 1 and June 30 of each year were electronically reported using the DEQ BMP Warehouse for any practices not reported in accordance with Part I.E.5.f (requirement 2.5.4) including stormwater management facilities from land disturbing activities less than one acre in accordance with the Chesapeake Bay Preservation Act regulations and for which a General VPDES Permit for Discharges of Stormwater from Construction Activities was not required?

$\square$ Yes, <u>Date Submitted</u> :	☐ No ☒ Not Applicable (No qualifying SWM facilities
constructed or structural BMPs	implemented.)





included in Section 1.5.)

### 2.5.6. MS4 Program Plan BMP Measurable Goals

The MS4 Program Plan BMPs measurable goals are provided in Table 9.

Table 9	9: MS4 Program Plan BMP Measurable Goals for MCM #5	
BMP	Measurable Goal	<b>Completeness Status</b>
5.1	Was the post-construction stormwater management inspection and maintenance program implemented in accordance with approved standards and specifications?	<ul><li>⋈ Yes</li><li>□ No</li></ul>
5.2	Was the stormwater management facility tracking database updated?	<ul><li>⊠ Yes</li><li>□ No</li></ul>
<u> </u>	2.5.7. MCM #5 Evaluation (Part I.D.2.e)  Review the MCM to determine the MS4 program's effective changes to the MS4 Program Plan are necessary:  Were all MCM #5 measurable goals completed in accordance wi  ✓ Yes ☐ No ( )	
	Are the MS4 Program measurable goals effective?	

⊠ Yes (Effective) □ No (Ineffective, necessary changes to the MS4 Program are





### 2.6. MCM #6: Pollution Prevention and Good Housekeeping

### 2.6.1. Operational Procedures (Part I.E.6. q(1))

A summary of any operational procedures developed or modified in accordance with Part I E 6 a during the reporting period:

	IE 6 a during the reporting period:	
	Were any operational procedures develo during the reporting period?	ped or modified in accordance with Part I E 6 a
	$\square$ Yes (Refer to Table 10) $\square$ No $\boxtimes$ 1	Not Applicable (Not necessary)
	e 10: Good Housekeeping Operational Pro	cedures Developed or Modified
Not 2	Applicable	
	2.6.2. Newly Developed SWPPPs (Part A summary of any new SWPPPs develop period:	I.E.6.q(2)) ed in accordance Part I E 6 c during the reporting
	•	ordance Part I E 6 c during the reporting period?
	$\square$ Yes (Refer to Table 11) $\square$ No (facilities.)	)   Not Applicable (No new high priority
Γabl	e 11: New SWPPPs Developed	
	SWPPP Name	SWPPP Address
	*	SWPPP Address
	SWPPP Name Applicable  2.6.3. Modified or Delisted SWPPPs (P A summary of any new SWPPPs modified	
	Applicable  2.6.3. Modified or Delisted SWPPPs (P A summary of any new SWPPPs modified of any high priority facilities delisted in a period:	Part I.E.6.q(3)) and in accordance with Part I E 6 f or the rationale
	Applicable  2.6.3. Modified or Delisted SWPPPs (PA summary of any new SWPPPs modified of any high priority facilities delisted in a period:  Were any new SWPPPs modified after an  Yes (Refer to Table 12)  No (	ed in accordance with Part I E 6 f or the rationale accordance with Part I E 6 h during the reporting unauthorized discharge, release or spill reported?  Not Applicable (Modification not required) ed in accordance with Part I E 6 h during the



IE 6 h during the reporting period in Table 12.



Table 12: SWPPPs Modified or Delisted	1
SWPPPs Modified/Delisted	Rationale for Delisting
Not Applicable	

A summary of new turf and landscape nutrie	ment Plans (Part I.E.) ent management plans	
Were any new turf and landscape nutrient m  ☐ Yes (Refer to Table 13) ☐ No (	anagement plans devel  Not Applicable (1)	•
2.6.4.1. Nutrient Management Plan Ac The location and the total acreage of each		)(a))
If yes is checked above, the location and developed nutrient management plan is p	•	and area for any
2.6.4.2. Nutrient Management Plan Ap The date of the approved nutrient management	• •	E.6.q(4)(b))
If yes is checked above, the approval date plan is provided in Table 13.	e of any newly develope	ed nutrient manag
plan is provided in Table 13.  13: New Turf and Landscape Nutrient Mana		ed nutrient manag
plan is provided in Table 13.		Date Appro
plan is provided in Table 13. 2 13: New Turf and Landscape Nutrient Mana	agement Plans  Total	
plan is provided in Table 13. e 13: New Turf and Landscape Nutrient Mana	agement Plans  Total	



Was training conducted?

⊠ Yes □ No (

) \( \subseteq \text{ Not Applicable (Not required this reporting year.)} \)



If yes is checked above, a list of training events conducted in accordance with Part I.E.6.m is provided in Table 15.

### **2.6.5.1.** Training Dates (Part I.E.6.q(5)(a))

The date of the training event:

If yes is checked above, the date of the training event is provided in Table 14.

### **2.6.5.2. Quantity Trained (Part I.E.6.q(5)(b))**

The number of employees who attended the training event:

If yes is checked above, the number of employees who attended the training event is provided in Table 14.

### **2.6.5.3.** Training Objective (Part I.E.6.q(5)(c))

The objective of the training event:

If yes is checked above, the objective of the training event is provided in Table 14.

Table 14:	Training Events	
Date	# of Attendees	Training Objective
3/2023	2	Pesticide Application

### 2.6.6. MS4 Program Plan BMP Measurable Goals

The MS4 Program Plan BMPs measurable goals are provided in Table 15.

Table 15: MS4 Program Plan BMP Measurable Goals for MCM #6						
BMP	Measurable Goal	Completeness Status				
		⊠ Yes				
6.1	Was good housekeeping and pollution prevention	☐ Not Applicable (Not required				
	biennial training conducted this reporting year?	this reporting year)				
		□ No				
6.2	Was the annual comprehensive compliance	⊠ Yes				
6.2	evaluation conducted?	□ No				





6.2	Was the SWPPP reviewed within 30 days after an unauthorized discharge, release or spill reported?	<ul><li>☐ Yes</li><li>☒ Not Applicable (Not required)</li><li>☐ No</li></ul>
6.2	Was the SWPPP updated within 90 days after an unauthorized discharge?	<ul><li>☐ Yes</li><li>☒ Not Applicable (Not required)</li><li>☐ No</li></ul>
6.2	Were the MS4's properties reviewed this reporting year to determine if the properties meet the criteria of a high priority facility?	<ul> <li>☑ Yes</li> <li>☐ Not Applicable (The MS4 campus is a high priority facility.)</li> <li>☐ No</li> </ul>
6.3	Was the nutrient management plan implemented through completion of application records?	<ul><li>☑ Yes</li><li>☐ Not Applicable (No nutrients applied)</li><li>☐ No</li></ul>
6.4	Were all signed contracts executed with contract good housekeeping and pollution prevention language?	□ Yes ⊠ No
6.5	Did all signed contracts executed for pesticide and herbicide application maintain proof of certifications on file?	<ul><li>☐ Yes</li><li>☒ Not Applicable (No contracts executed)</li><li>☐ No</li></ul>
6.6	Did training occur and were proof of certifications maintained on file for employees performing pesticide and herbicide applications?	<ul><li>☒ Yes</li><li>☐ Not Applicable (No employees applied pesticides/herbicides)</li><li>☐ No</li></ul>

### 2.6.7. MCM #6 Evaluation (Part I.D.2.e)

Review the MCM to determine the MS4 Program's effectiveness and whether or not changes to the MS4 Program Plan are necessary:

Were all MCM #6 measurable goals completed in accordance with the MS4 Program Plan?

 $\ \square$  Yes  $\ \boxtimes$  No (GCC to work with VCCS concerning contract language.)





Are the MS4 Program measurable goals effective?								
oxtimes Yes (Effective) $oxtimes$ No (Ineffective, necessary changes to the MS4 Program are								
included in Section 1.5.)								





### 3.0 TMDL SPECIAL CONDITIONS

### 3.1. Chesapeake Bay TMDL Action Plan

### 3.1.1. BMPs Implemented and Estimated POC Reductions (Part II.A.13.a)

A list of BMPs implemented during the reporting period but not reported to the DEQ BMP Warehouse in accordance with Part I E 5 g and the estimated reduction of pollutants of concern achieved by each and reported in pounds per year:

We	ere	any	BMPs	implemented	during	the	reporting	period	but n	ot re	eported	to	the	DEQ
BN	1P	War	ehouse	in accordance	with Pa	art I	.E.5.g?							
$\boxtimes$	Y	es (F	Refer to	Table 16)	No (		)							

The estimated reduction of pollutants of concern achieved by each BMP reported in pounds per year is provided in Table 16.

Table 16: Chesapeake Bay TMDL Action Plan POC Reductions									
BMP #1: Street Sweeping	TN (lbs./yr.)	TP (lbs./yr.)	TSS (lbs./yr.)						
SCP-4 Practice (1 pass every 4 weeks or									
approximately 10 passes per year, 11.29 lane	1.06	0.48	287.20						
miles per pass) Provided Reduction (lbs.) =									
BMP #2: Land Use Change Conversion	TN (lbs./yr.)	TP (lbs./yr.)	TSS (lbs./yr.)						
1.41 Acres of Mixed Open to Forest	0.66	0.39	968.67						
(Regulated Property)	0.00	0.39	908.07						
1.85 Acres of Turf to Mixed Open	11.23	2.09	0						
(Unregulated Property)	11.23	2.09	U						
Provided Reduction (lbs.) =	12.95	2.96	1,255.87						
Required 40% Reduction (lbs.) =	4.56	0.96	347.84						

### 3.1.2. Nutrient Credits (Part II.A.13.b)

If the permitee acquired credits during the reporting period to meet all or a portion of the required reductions in Part II A 3, A 4, or A 5, a statement that credits were acquired:

Were credits acquired during the reporting period to meet all or a portion of the required reductions in Part II A 3, A 4, or A 5?  $\square$  Yes  $\boxtimes$  No





### 3.1.3. POC Cumulative Reduction Progress (Part II.A.13.c)

The progress, using the final design efficiency of the BMPs, toward meeting the required cumulative reductions for total nitrogen, total phosphorus, and total suspended solids:

The progress, using the final design efficiency of the BMPs, toward meeting the required 40% reductions for total nitrogen, total phosphorus, and total suspended solids is provided in Table 17.

Table 1	Table 17: 2018 – 2023 Chesapeake Bay TMDL Action Plan Implementation Schedule									
Step	General Description	Measurable Goal	Completeness Status							
1	5% reduction requirement complete. Evaluate lbs. swept.	Completed tracking documentation?	<ul><li>☑ Yes (July 2019)</li><li>☐ No</li></ul>							
2	5% reduction requirement complete. Make adjustments to frequency based on 2019 information obtained.	Completed tracking documentation with increase sweeping frequency?	<ul><li>✓ Yes (July 2020)</li><li>☐ No</li></ul>							
3	5% reduction requirement complete. Determine if 40% can be achieved w/ street sweeping alone. If not, evaluate alternate means to achieve 40% reduction. Secure funding for future implementation of new BMPs. Revise Action Plan accordingly.	Completed tracking documentation. If required, revise Action Plan?								
4	Revise Action Plan based on the newly issued DEQ Guidance Memo No. GM-20-2003 (Appendix V.G).	Completed tracking documentation and support documentation from any new BMPs employed to meet 40% reduction?	<ul><li>✓ Yes (July 2022)</li><li>☐ No</li></ul>							
5	Complete 40% reduction requirement with selected means and methods.	Completed tracking documentation and support documentation from any new BMPs employed to meet 40% reduction?	<ul><li>✓ Yes (July 2023)</li><li>☐ No</li></ul>							
6	Report on Chesapeake Bay TMDL 40% reduction achievement.	Recorded results in Annual Report?	<ul><li>⋈ Yes (Oct 2023)</li><li>□ No</li></ul>							





### 3.1.4. Next Reporting Period Planned BMPs (Part II.A.13.d)

A list of BMPs that are planned to be implemented during the next reporting period:

BMPs that are planned to be implemented during the next reporting period is provided in Table 18.

Table 18: Chesapeake Bay TMDL Action Plan BMPs Planned for the Next Reporting Year
Not Applicable. 100% nutrient credits achieved.

### 3.1.5. Chesapeake Bay TMDL Action Plan Measurable Goals

The Chesapeake Bay TMDL Action Plan measurable goals are provided in Table 19.

Table	Table 19: Chesapeake Bay TMDL Action Plan Measurable Goals							
#	Measurable Goal	Completeness Status						
1	Were public comments considered during the required 15-day comment period?	<ul><li>☐ Yes</li><li>☒ Not Applicable (Not required this reporting year)</li><li>☐ No</li></ul>						
2	Were cost effective BMPs selected to support model quantification to achieve the required pollutant reductions?	<ul><li>⋈ Yes</li><li>□ Not Applicable (Not required this reporting year)</li><li>□ No</li></ul>						
3	Was the required pollutant reduction reached for this reporting year?	<ul><li>⋈ Yes</li><li>□ No</li></ul>						

### 3.1.6. Chesapeake Bay TMDL Action Plan Implementation Evaluation (Part I.D.2.e) Review the TMDL Special Condition to determine the Chesapeake Bay TMDL Action Plan's effectiveness and whether or not changes to the Chesapeake Bay TMDL Action Plan

are necessary:

Were a	ll measurable	goals	completed	in	accordance	with	the	Chesapeake	Bay	TMDL
Action	Plan?									
⊠ Yes	□ No (	)								





Are	Are the MS4 Program measurable goals effective?										
$\boxtimes$	Yes	(Effective)		No (Ineffective	, necessary	changes	to the	MS4	Program	are	
included in Section 1.5.)											





### 3.2. Local TMDL Action Plan

### 3.2.1. No Local TMDL Implementation (Part II.B.9)

A summary of actions conducted to implement each local TMDL action plan:

The MS4 has not been assigned a wasteload allocation (WLA) for any local TMDLs.





Appendix A: Documentation of Public Education and Outreach Activities





High Priority Stormwater Issue #1



 From:
 Garland Fenwick

 To:
 \*All-Germanna\*

 Cc:
 Garland Fenwick

**Subject:** Important Municipal Separate Storm Sewer System Program(MS-4)

 Date:
 Wednesday, March 29, 2023 8:34:01 AM

 Attachments:
 GCC Stormwater Slides CCTV Group 1.pptx

image001.png

### Dear Faculty and Staff,

Attached is a short power point that provides important information pertaining to Municipal Separate Storm Sewer System Program(MS-4) and Stormwater Management at the Fredericksburg Area Campus and your communities . Please take a few minutes to review the power point and help GCC and your communities improve their MS-4 and Stormwater Management Program.

### Thank you

Garland M. Fenwick
Director of Facilities
Germanna Community College
PO Box 1430
2130 Germanna Highway
Locust Grove, VA 22508
540-423-9046





High Priority Stormwater Issue #2



### **Garland Fenwick**

From:

James Solomon

Sent:

Friday, January 20, 2023 11:15 AM

To:

Garland Fenwick

Subject:

RE: MS-4 Slides for TV Monitors

You bet!

Thank you,

Jim Solomon Marketing and Information Specialist (540) 423-9069

From: Garland Fenwick < GFenwick@germanna.edu>

Sent: Friday, January 20, 2023 11:01 AM

To: James Solomon <JSolomon@germanna.edu>
Cc: Garland Fenwick <GFenwick@germanna.edu>

Subject: MS-4 Slides for TV Monitors

Jim,

It's that time of year where I need to run the MS-4 slides for the Fredericksburg Campus on the TV monitors. Can you get them on monitors for me? If you get them on the monitors by February 1 and they run until March 1 I should be good.

Thanks for the help. Garland



mpacts of Stormwater Runoff

GERMANNA COLLEGE Sediment from **construction sites** & **streambank erosion** from urbanization adversely affect the streams & rivers & the Chesapeake Bay.

CENTER FOR WORKFORCE COMMUNITY EDUCATION

Who We Are

## GEZMANNA COLLEGE

How Sediment Impacts Virginia's Waterbodies

- Clogs fish gills causing death
- Creates a muddy bottom unsuitable for spawning beds
  - Reduces visibility for fish to locate prey causing
- Decreases water depth resulting in an increase of temperature causing fish to relocate
- Stunts plant growth due to reduced light penetration
- Interferes with navigation, flood control, recreation & fishing industries



NEC

# TER FOR WORKFORCE COMMUNITY EDUCATION

Who We Are

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# る B



Nitrogen and Phosphorous in fertilizers cause algae blooms in waterbodies.

Improperly disposed of animal waste and human waste from sanitary overflows cause high levels of bacteria (E.coli) in waterbodies.

Algae create toxins and excessive E.coli makes waterbodies unsafe for swimming and unhealthy for humans and wildlife consumption.

NEC

# ER FOR WORKFORCE 'Y EDUCATION

Company Comments of the Commen Who We Are



FOR WORKFORCE

**LY EDUCATION** 



Limit landscape additives such as lime & potashonly in amounts needed & at appropriate times especially never before a rain event.

Properly store & dispose of chemicals. Quickly clean-up spilled chemicals & properly dispose of the materials used to clean-up spills.

Pick-up pet waste & properly dispose in the trash.

➤ Never dump anything down storm drains.

Place litter & cigarette butts in proper receptacles.

Utilize recycling programs.

Promptly repair vehicle & equipment leaks.

Wash vehicles at a commercial car wash instead of in a driveway or parking lot.

Properly dispose of household waste items.

NEC

Who he Are



High Priority Stormwater Issue #3



# **Garland Fenwick**

From:

Garland Fenwick

Sent:

Friday, January 20, 2023 10:11 AM

To:

Garland Fenwick

Subject:

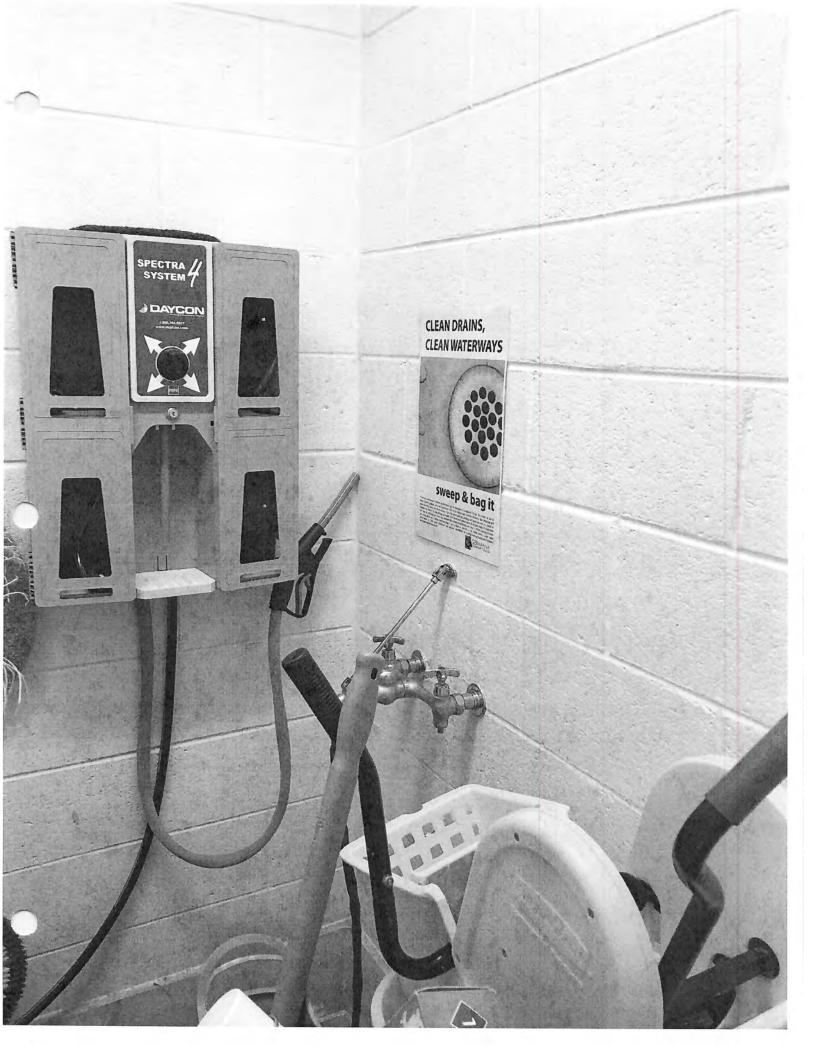
Posters Place on Bulletin Boards

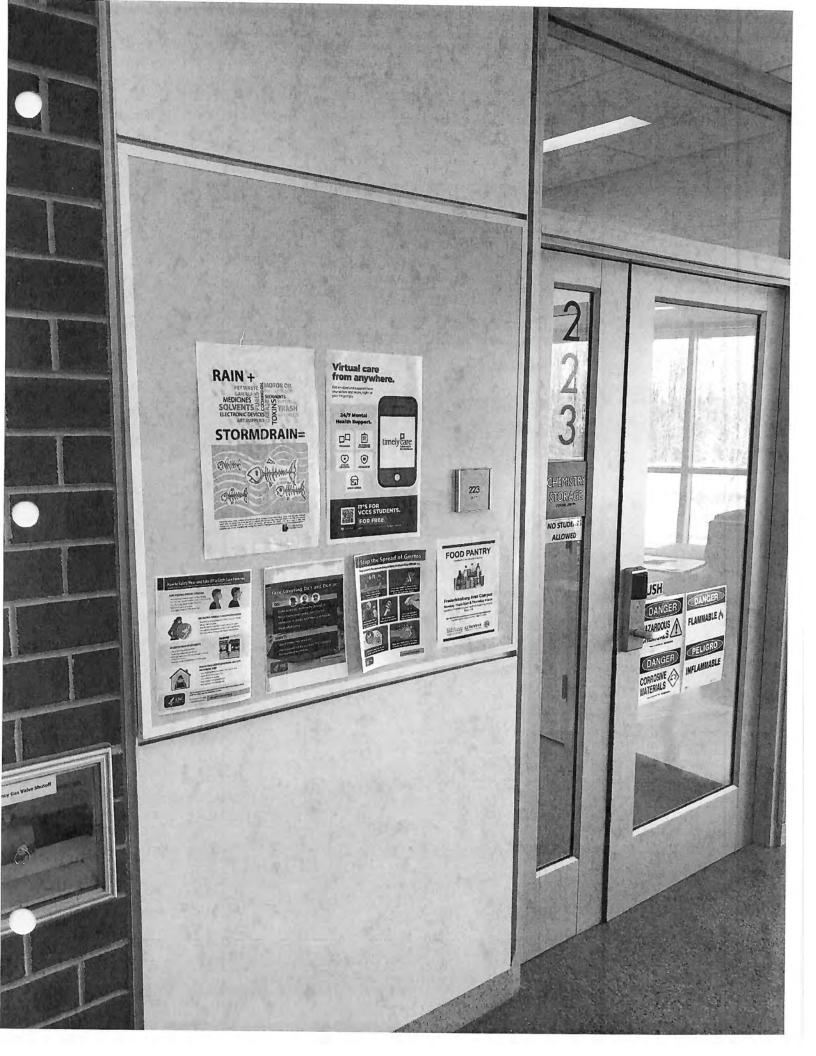
Garland M. Fenwick Director of Facilities Germanna Community College PO Box 1430 2130 Germanna Highway Locust Grove, VA 22508 540-423-9046













Appendix B: Documentation of Public Involvement Activities





Public Involvement Activity #1



#### **Garland Fenwick**

rom:

Harvey Gold

Sent:

Friday, February 3, 2023 9:21 PM

To:

Garland Fenwick

Subject:

Re: MS4 Presentation

Attachments:

ENV 122 2023 F02 Class Roster.docx; ENV 122 F01 2023 Class Roster.docx

Garland: I didn't forget you, just diverted in the past few days. The two class rosters are attached. Your presentation was, as always, excellent and it looked like you have updated a number of slides. Thanks for taking the time out of your very busy schedule.

# Harvey

Harvey S. Gold

Harvey S. Gold

**Adjunct Professor** 

**Environmental Science** 

Germanna Community College

804-450-5261

From: Garland Fenwick < GFenwick@germanna.edu>

Sent: Friday, February 3, 2023 10:29 AM
To: Harvey Gold <HGold@germanna.edu>

Subject: MS4 Presentation

Happy Friday Harvey,

Please don't forget to forward the two class rosters of the attendees of my MS4 presentation.

Thanks Garland

From: Harvey Gold <HGold@germanna.edu> Sent: Tuesday, January 10, 2023 4:13 PM

To: Garland Fenwick < GFenwick@germanna.edu>

Subject:

Hope this finds you well. Would it be possible for you to make your usual presentation to my environmental science classes on Jan. 18 at 10:30 am and 3:30 pm in room 215 in FAC 3? If not on Jan. 18, then perhaps on Jan. 23? Thanks. BTW any progress on a new door slide CARD key for me? Mine doesn't work anymore.

Harvey S. Gold

Harvey S. Gold

Adjunct Professor

**Environmental Science** 

Germanna Community College

804-450-5261

# Class Roster

# 2023 Spring | Regular Academic Session | Germanna Community College | Credit

# ENV 122 - F01 (21044)

General Environmental Science II (Lecture)

Days and Times	Room	Instructor	Dates
MoWe 9:00AM-	Rm 215 FAC Sci & Eng	Harvey	01/17/2023 -
10:20AM	Bldg SP3	Gold	05/08/2023

# Enrollment Status Enrolled

Enrollment Capacity 24 Enrolled 22

# **Enrolled Students**

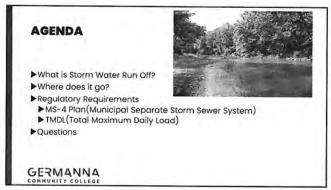
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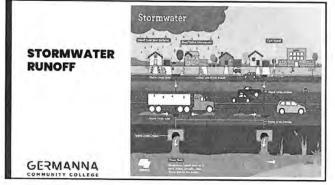
	Name
Row	AUSTIN, SOPHIA
1	ELIZABETH
Row 2	BAIR,RYAN OTIS
Row 3	BARNES,CARYS ELYSE
Row 4	BASSONG,LYNN ATEH
Row 5	BISHOP, JOCELYN EMMA
Row 6	CHACRA,SAMUEL THOMAS
Row 7	CONROY, ISABELLA
Row 8	DESAUSSURE,JA'MYRE JACQUEZ
Row 9	GABALDON, JOSH
Row 10	GRAY, JACELYNN BRIEANNA
Row 11	HESSIN, MATTHEW R
Row 12	JANSSON,RISS FRANCES
Row	KEEVE, KENNETH

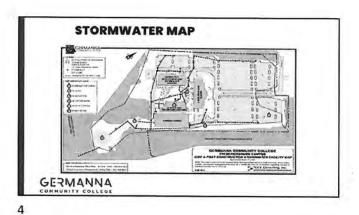
PARKER

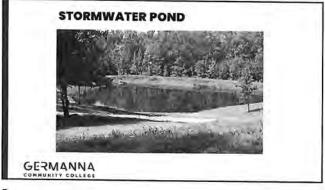
Row	MECKLE, JOURDAN
14	MIKAYLA
Row 15	MEYER,JAYME PACE
Row 16	PEARSON,KIARRA SIMONE KINI
Row 17	QUESADA,CHARLES AVERY
Row 18	SAGE, HOLLY NOELLE
Row 19	SHERALD, JOSHUA DANIEL
Row 20	SIMONI, JOSEPH M
Row 21	VARELA,ANDREA ELIZABETH
Row 22	WILCOX,RAYGEN BRIANNA

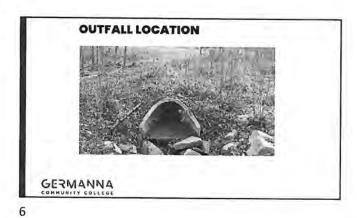


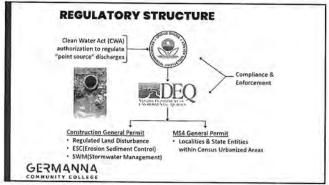












**MS4 GENERAL PERMIT** 

Special Conditions

1. Chesapeake Bay TMDL(Total Maximum Daily Load)

Minimum Control Measures

- 1. Public Education & Outreach
  2. Public Involvement/Participation
  3. Illicit Discharge Detection & Elimination
  4. Construction Site Runoff Controls
  5. Post-construction Runoff Controls
  6. Pollution Prevention/Good Housekeeping

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#### TOTAL MAXIMUM DAILY LOAD (TMDL)

- TMDL is a plan (pollution diet) that establishes the maximum amount of a pollutant the waterbody can hold and meet water quality standards.
- WLA(Waste Load Allocations) is the quantity of the pollutant (sediment, nitrogen, bacteria, etc.) that may be discharged.

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9

#### CHESAPEAKE BAY TMDL

- The Chesapeake Bay is impaired for Nitrogen, Phosphorous and
- GCC implements a Chesapeake Bay TMDL Action Plan to reduce the Pollutants of Concern (POCs) based on the amount of impervious area (hard surfaces like roads, sidewalks and building footprints) on campus.
- Currently, GCC uses street sweeping as a Best Management Practice to achieve the required reductions.

Requires 35% load reduction (40% Overall) per year for the 5 year permit cycle(2018-2023) (Phosphorus, Nitrogen, Sediment)

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10

#### LOCAL IMPAIRED WATERWAYS

- · GCC directly discharges into an unnamed tributary of the Massaponax Creek; however, downstream of the College is Massaponax Creek is designated as an impaired waterway.

  DEQ's 2016 impaired waters list identifies Massaponax
- Creek as impaired for:
  - pH (measure of amount of hydrogen and hydroxide ions in water i.e. alkalinity versus acidity); and E. coli (bacteria).

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#### LOCAL IMPAIRED WATERWAYS CONTINUED

- Pollutant sources that affect water pH: landscape additives such as lime, potash; and chemicals that are alkaline, acidic or neutral in content.
- · Pollutant sources of E. coli: livestock and pet waste and sanitary sewer overflows.
- Steps taken to reduce pollution of impaired waterways:
   Limit landscape additives only in amounts needed and at appropriate times (never before a rain event);
   Properly store and dispose of spilled chemicals; and

  - Pick-up pet waste.

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#### PUBLIC INVOLVEMENT/EDUCATION

- Involvement
  - Implement 4 activities per year i.e. educational events, pollution prevention, stream restoration
- Education
  - Communicate two or more strategies i.e. speaking
  - engagements, media materials

     Program Plan/Annual Report webpage posting specifics



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13

#### ILLICIT DISCHARGE DETECTION AND ELIMINATION(IDDE)

What is Illicit Discharge? Any discharge to an MS4 that is not composed entirely of stormwater, except discharges specifically identified in the Va. Administrative Code

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14

## IDDE CONTINUED

- Written IDDE procedures to detect, identify, and address nonstormwater discharges

  Methods for field observations/screening
  Schedule (outfalls screened annually)
  Data collection (field screening)
  Methods for investigation of source
  Observation
  Mechanisms for eliminations of source
  Policies
  Follow-up & documentation
- Public reporting of illicit discharges
   Promote, publicize, & tacilitate reporting
   Who to contact Garland Fenwick, 540-423-9046
   Conduct inspections in response to complaints
   Ensure corrective action where necessary

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# ILLICIT DISCHARGE CLEAN-UP



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**CONSTRUCTION SITE RUNOFF** CONTROLS

- VCCS Standards & Specifications for ESC
  Approved plan prior to start of regulated land disturbance (Approved by VCCS)
  Inspection oversight (Certified consultants)
  Legal Authority to require compliance
- Contractor responsibilities with VCCS oversight
  - Obtain Construction General Permit (GP), when required
     Implement the ESC Plan and meet GP requirements
- Develop and implement Stormwater Pollution Prevention Plan (SWPPP)

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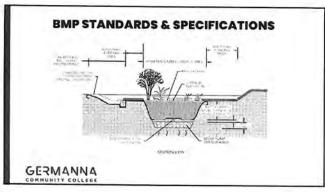


## POST CONSTRUCTION CONTROLS

- Permit requires long-term Inspection, operation, & maintenance of SW BMPs
  Written inspection & maintenance procedures
  Conduct maintenance as necessary
  BMP Specific Checklists
  Annual inspections
  Frequency of inspection may vary based on BMP type
  Additional SWM facility tracking and reporting
  Lat. Jana, date brought online, date of latest
- - Lat./long,, date brought online, date of latest inspection, total inspections

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22

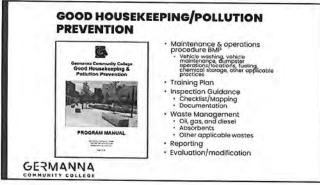




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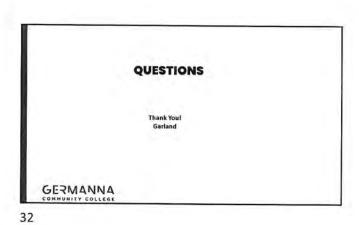














Public Involvement Activity #2



#### **Garland Fenwick**

rom:

Harvey Gold

Sent:

Friday, February 3, 2023 9:21 PM

To:

Garland Fenwick

Subject:

Re: MS4 Presentation

Attachments:

ENV 122 2023 F02 Class Roster.docx; ENV 122 F01 2023 Class Roster.docx

Garland: I didn't forget you, just diverted in the past few days. The two class rosters are attached. Your presentation was, as always, excellent and it looked like you have updated a number of slides. Thanks for taking the time out of your very busy schedule.

# Harvey

Harvey S. Gold

Harvey S. Gold

**Adjunct Professor** 

**Environmental Science** 

Germanna Community College

804-450-5261

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Harvey S. Gold

Harvey S. Gold

Adjunct Professor

**Environmental Science** 

**Germanna Community College** 

804-450-5261

#### Class Roster

2023 Spring | Regular Academic Session | Germanna Community College | Credit

# ENV 122 - F02 (22662)

General Environmental Science II (Lecture)

Days and TimesRoomInstructorDatesMoWe 2:00PM-<br/>3:20PMRm 215 FAC Sci & Eng<br/>Bldg SP3Harvey<br/>Gold01/17/2023 -<br/>05/08/2023

#### Enrollment Status Enrolled

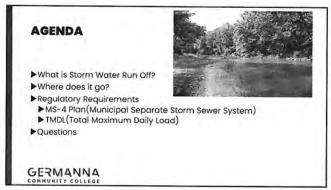
Enrollment Capacity 24 Enrolled 22

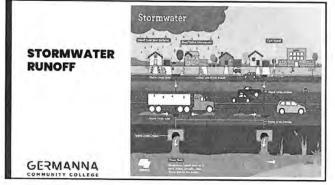
## **Enrolled Students**

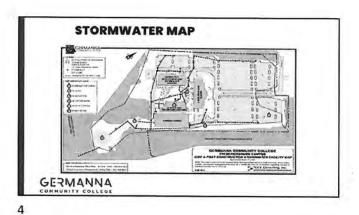
	Name		
Row	ALEXANDER,MORGAN		
1	ELIZABETH		
Row 2	ANDERSON,NATHAN THOMAS		
Row	APICELLA,MICHAEL		
3	JOHN		
Row	BALL, CHEYENNE		
4	LESLIE		
Row	BRADEN, DANTE'		
5	NATHAN		
Row 6	COULTER, JOSHUA		
Row	HANKINS, CHRISTOPHER		
7	MARQUIS		
Row	MACDIARMID,NOLAN		
8	JORY		
Row 9	MAJOR,GRACE ELLEN		
Row 10	MCSWEEN,RYAN CADE		
Row	NAVARRO,ANALI		
11	CELESTE		
Row	ORME,ANDERSON		
12	MICHEAL		
Row	ORME,EVERETT		
13	BRADLEY		
Row 14	PETKE,EMILY GRACE		

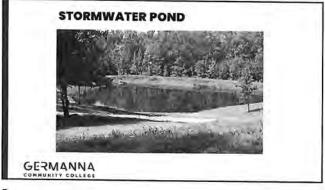
Row 15	QUILLEN,JAYNA TRINITY
Row 16	RECORE,BRAEDON GARY
Row 17	SALYAN,CONNOR WILLIAM
Row 18	SHAUGHNESSY,MEGAN
Row 19	SOW,MARIAM O
Row 20	ST. JOHN,LEXI MARIE
Row 21	STOETER, CHARLES
Row 22	VARELA,KAROLL SOFIA
772.0	VARELA,KAROLL SO

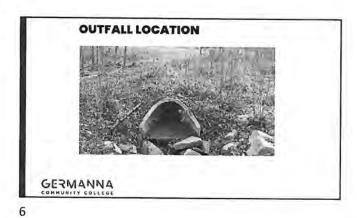


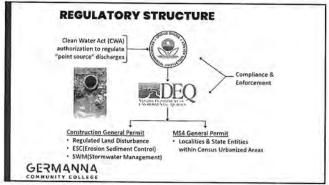












**MS4 GENERAL PERMIT** 

Special Conditions

1. Chesapeake Bay TMDL(Total Maximum Daily Load)

Minimum Control Measures

- 1. Public Education & Outreach
  2. Public Involvement/Participation
  3. Illicit Discharge Detection & Elimination
  4. Construction Site Runoff Controls
  5. Post-construction Runoff Controls
  6. Pollution Prevention/Good Housekeeping

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#### TOTAL MAXIMUM DAILY LOAD (TMDL)

- TMDL is a plan (pollution diet) that establishes the maximum amount of a pollutant the waterbody can hold and meet water quality standards.
- WLA(Waste Load Allocations) is the quantity of the pollutant (sediment, nitrogen, bacteria, etc.) that may be discharged.

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#### CHESAPEAKE BAY TMDL

- The Chesapeake Bay is impaired for Nitrogen, Phosphorous and
- GCC implements a Chesapeake Bay TMDL Action Plan to reduce the Pollutants of Concern (POCs) based on the amount of impervious area (hard surfaces like roads, sidewalks and building footprints) on campus.
- Currently, GCC uses street sweeping as a Best Management Practice to achieve the required reductions.

Requires 35% load reduction (40% Overall) per year for the 5 year permit cycle(2018-2023) (Phosphorus, Nitrogen, Sediment)

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#### LOCAL IMPAIRED WATERWAYS

- · GCC directly discharges into an unnamed tributary of the Massaponax Creek; however, downstream of the College is Massaponax Creek is designated as an impaired waterway.

  DEQ's 2016 impaired waters list identifies Massaponax
- Creek as impaired for:
  - pH (measure of amount of hydrogen and hydroxide ions in water i.e. alkalinity versus acidity); and E. coli (bacteria).

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#### LOCAL IMPAIRED WATERWAYS CONTINUED

- Pollutant sources that affect water pH: landscape additives such as lime, potash; and chemicals that are alkaline, acidic or neutral in content.
- · Pollutant sources of E. coli: livestock and pet waste and sanitary sewer overflows.
- Steps taken to reduce pollution of impaired waterways:
   Limit landscape additives only in amounts needed and at appropriate times (never before a rain event);
   Properly store and dispose of spilled chemicals; and

  - Pick-up pet waste.

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#### PUBLIC INVOLVEMENT/EDUCATION

- Involvement
  - Implement 4 activities per year i.e. educational events, pollution prevention, stream restoration
- Education
  - Communicate two or more strategies i.e. speaking
  - engagements, media materials

     Program Plan/Annual Report webpage posting specifics



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#### ILLICIT DISCHARGE DETECTION AND ELIMINATION(IDDE)

What is Illicit Discharge? Any discharge to an MS4 that is not composed entirely of stormwater, except discharges specifically identified in the Va. Administrative Code

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## IDDE CONTINUED

- Written IDDE procedures to detect, identify, and address nonstormwater discharges

  Methods for field observations/screening
  Schedule (outfalls screened annually)
  Data collection (field screening)
  Methods for investigation of source
  Observation
  Mechanisms for eliminations of source
  Policies
  Follow-up & documentation
- Public reporting of illicit discharges
   Promote, publicize, & tacilitate reporting
   Who to contact Garland Fenwick, 540-423-9046
   Conduct inspections in response to complaints
   Ensure corrective action where necessary

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# ILLICIT DISCHARGE CLEAN-UP



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**CONSTRUCTION SITE RUNOFF** CONTROLS

- VCCS Standards & Specifications for ESC
  Approved plan prior to start of regulated land disturbance (Approved by VCCS)
  Inspection oversight (Certified consultants)
  Legal Authority to require compliance
- Contractor responsibilities with VCCS oversight
  - Obtain Construction General Permit (GP), when required
     Implement the ESC Plan and meet GP requirements
- Develop and implement Stormwater Pollution Prevention Plan (SWPPP)

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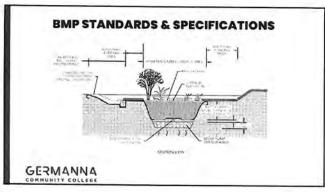


## POST CONSTRUCTION CONTROLS

- Permit requires long-term Inspection, operation, & maintenance of SW BMPs
  Written inspection & maintenance procedures
  Conduct maintenance as necessary
  BMP Specific Checklists
  Annual inspections
  Frequency of inspection may vary based on BMP type
  Additional SWM facility tracking and reporting
  Lat. Jana, date brought online, date of latest
- - Lat./long,, date brought online, date of latest inspection, total inspections

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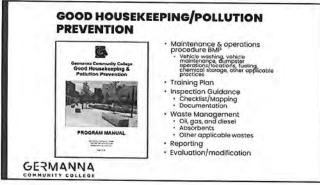




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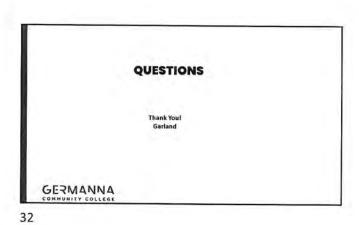














Public Involvement Activity #3



# **Garland Fenwick**

From: Shaquanda Y. Stewart

Sent: Friday, March 31, 2023 3:13 PM

To: Eric Earnhardt; Rachel M. Eaton; Maury Wrightson; Grace A. Cellucci; Stephanie L.

Marsich; Novel Yi; John Stroffolino; William T. Callan; Tamara A. Muldrow; Garland Fenwick; Jagwinder Singh; Zachary A. Wyant; Andrea Goldstein; Yawo M. Ekpoh; Shawn

Shields; Tracey F. Williams; Jennifer C. Scott; Elizabeth A. Granger; Larry Adams;

sarahjfralich@gmail.com; stephanieshand12@gmail.com;

jasmine.anderson@hq.doe.gov; Christl E. Zaccagnino; Samantha Wilson; Brenda J. Anderson-Diggs; Harry E. Schoeller; Sandra L. Lovell; Tina Lance; Arisa Johnson; Shand, Stephanie P (V55) CIV USN NAVSURFWARCEN DAH VA (USA); Mark T. Ecleo; Kelvin Lee;

Tereza D. Valencia; Jane Teresi; Sandra L. Lovell

Cc: Reem M. Adams; Shashuna J. Gray

Subject: RE: STEAM-H Coordinator Follow-up and Meeting Recording

Attachments: Activity Schedule (3).pdf

Importance: High

Good afternoon,

Due to the weather forecast we have decided it would be safer to move outdoor activities indoors (<u>please disregard previous courtyard map</u>). See the updated activity schedule attached and for those who were previously scheduled to run an activity in the courtyard, your activity has been moved to an indoor location.

If you have any questions, please be sure to ask Eric, Quanda or Reem in the morning during breakfast.

Thank you all again for volunteering for this event and your flexibility during this time!

See you in the morning .

Best,

Shaquanda Stewart
Administrative Assistant to the Dean of Arts and Sciences
Germanna Community College
(540) 834-1086 | Office SP3-112
Systewart@germanna.edu

# GERMAI

As a public, comprehensive community college, Germanna provides accessible, high quality educational and training opportunities that address our communities' diverse and changing learning needs.

From: Eric Earnhardt < EEarnhardt@germanna.edu>

Sent: Thursday, March 23, 2023 6:15 PM

To: Rachel M. Eaton <REaton@germanna.edu>; Maury Wrightson <mwrightson@germanna.edu>; Grace A. Cellucci

<gcellucci@germanna.edu>; Stephanie L. Marsich <SMarsich@germanna.edu>; Novel Yi <nyi@germanna.edu>; John Stroffolino <JStroffolino@germanna.edu>; William T. Callan <WCallan@germanna.edu>; Tamara A. Muldrow <TMuldrow@germanna.edu>; Garland Fenwick <GFenwick@germanna.edu>; Jagwinder Singh <JSingh@germanna.edu>; Zachary A. Wyant <ZWyant@germanna.edu>; Andrea Goldstein <andreagoldstein22@gmail.com>; Yawo M. Ekpoh <YEkpoh@germanna.edu>; Shawn Shields <SShields@germanna.edu>; Tracey F. Williams <TWilliams@germanna.edu>; Jennifer C. Scott <JScott@germanna.edu>; Elizabeth A. Granger <EGranger@germanna.edu>; Larry Adams <LAdams@germanna.edu>; sarahjfralich@gmail.com; stephanieshand12@gmail.com; jasmine.anderson@hq.doe.gov; Christl E. Zaccagnino <CZaccagnino@germanna.edu>; Samantha Wilson <SWilson@germanna.edu>; Brenda J. Anderson-Diggs <BAnderson-Diggs@germanna.edu>; Harry E. Schoeller <HSchoeller@germanna.edu>; Sandra L. Lovell <SLovell@germanna.edu>; Tina Lance <TLance@germanna.edu>; Arisa Johnson <RJohnson@germanna.edu>; Shand, Stephanie P (V55) CIV USN NAVSURFWARCEN DAH VA (USA) <stephanie.p.shand.civ@us.navy.mil>; Mark T. Ecleo <MEcleo@germanna.edu>; Kelvin Lee <KLee@germanna.edu>; Tereza D. Valencia <TValencia@germanna.edu>; Jane Teresi <JTeresi@germanna.edu> Cc: Reem M. Adams <RAdams@germanna.edu>; Shaquanda Y. Stewart <SYStewart@germanna.edu>; Shashuna J. Gray <SGray@germanna.edu>

Subject: STEAM-H Coordinator Follow-up and Meeting Recording

Greetings STEAM-H Day Activity Coordinators!

Thanks to those who made it to the confirmation meeting this Tuesday. For those who want to review or who couldn't make it, you can access the recording of the meeting here: <a href="https://vccs.zoom.us/rec/share/SkM1blul9nlO-Cmp9tJVWz0-zQyu4LnBvgWDquuilc91ECglli04CPr09lkTJ102.ZHkElcUIN7QLF-lq?startTime=1679428966000">https://vccs.zoom.us/rec/share/SkM1blul9nlO-Cmp9tJVWz0-zQyu4LnBvgWDquuilc91ECglli04CPr09lkTJ102.ZHkElcUIN7QLF-lq?startTime=1679428966000</a>

If you know of individuals who want to volunteer but will not be part of your activity (greeters, crowd direction, etc.), you can direct them to sign up by adding their name to this form: <a href="https://docs.google.com/spreadsheets/d/1dkOpk\_B66\_8x5MwfJJ80V9wG-19GMrVpjyyu4AKYfgM/edit?usp=sharing">https://docs.google.com/spreadsheets/d/1dkOpk\_B66\_8x5MwfJJ80V9wG-19GMrVpjyyu4AKYfgM/edit?usp=sharing</a>

Attached to this email is the **event flyer** for your continued distribution and the current draft of the **Activity Schedule** we reviewed during the meeting.

If any of the information regarding your activity needs to be changed, please send your alterations for the Activity Schedule to Reem Adams by Monday, March 27 (<a href="mailto:radams@germanna.edu">radams@germanna.edu</a>) so that the QR code can be developed and distributed at the event. Please remember that if your activity occurs within specified time increments (every twenty minutes, for example), let Reem know that so we can put it on the activity list and signage outside your door.

Coffee, bagels, and pastries will be available for volunteers at 9:00am in SP1 101 (the 1st-floor student lounge of the Dickinson Bldg.) Stop in to grab some ( and pick up your free t-shirt and mug (available to all faculty and staff volunteers). Please try to get to your station to perform all set up in plenty of time for a 10am start! ALL volunteers can help themselves to food, cotton candy and ice cream during the event. NOTE: faculty

# SIGN-IN SHEET (MS-4)

 School Name:
 Germanna Community College
 Date: 4/1/2023

 Event:
 STEAM-H Day
 Location:
 Fredericksburg Campus

Name	Role	Time	Flyer ☑	No.
Pete William				1
Neechea Sins				2
Megan Sakiyana				3
Megan Sakiyana Tamara Rich				4
Tyler Posey				5
Taylor Pylant				6
Elise Mescas				7
Holm	4			8
John Dall				9
Toffany Ray				10
Susan Van Vleet				11
Lechlann Earnhard+				12
Peter Paradis				13
				14
				15
				16
				17
				18
				19
				20



## STORM WATER POSTER PRESENTATION

STEAM-H DAY
Science, Technology, Engineering, Art,
Mathematics & Health

Science, Technology, Engineering, Art, Mathematics & Health



April 1 • 10 a.m. – 2 p.m.

Fredericksburg Campus, 10000 Germanna Point Drive, Fredericksburg, VA Here are just a few examples of activities designed for grades K-12:

- Drones
- · Geology rocks
- Learn to use a microscope
- Drawing & painting from observation
- Hands-only CPR & AED
- · Fibonacci art
- Cybersecurity
- Math games/activities

- · 3D-Printed Catapult Event
- Game truck
- Music & food
- · Campus tours
- Ice cream
- · Bounce house
- Giant Jenga
- Squishy circuits

We are collecting canned and boxed food and personal hygiene items for the Food Pantry at the event.



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**GERMANNA.EDU** 

Science, Technology, Engineering, Art, Mathematics & Health



#### **Building SP1: V. Earl Dickinson Building**

Instructor Name	Activity Name	Room	Age-Range	Time Available	Increments
Rachel Eaton	Fibonacci Art	Room 309	Grades K-12	10am-2pm	Top of Each Hour
John Stroffolino	Hands-Only CPR & AED	Room 304	Grades K-8	10am-2pm	Join anytime
Grace Cellucci	Math Games/ Activities	Room 318	Grades K-12	10am-2pm	Join anytime
Novel Yi	Drawing & Painting from Observation	Room 319	Grades K-12	10am-2pm	Join anytime
Jagwinder Singh	You will find this Humerus!	Room 325	Grades K-12	10am-2pm	Join anytime
Brenda Anderson- Diggs	Habits for Basic Cybersecurity	Room 317	Grades 4-12	10am-2pm	Join anytime
Stephanie Shand	Monty Hall Problem	Room 323	Grades K-12	10am-2pm	Join anytime
Mark Ecleo, Tereza Valencia, Kelvin Lee	Campus Tour	Meet in Lobby of SP1 (2nd floor)	Grades 5-12	12pm and 12:30pm	12pm and 12:30pm
Tracy Williams	Balance and Agility– Twister!	Multicultural Room 3rd floor.	Grades K-12	10am-2pm	Join anytime

(continue to next page)

Science, Technology, Engineering, Art, Mathematics & Health



#### **Building SP2: Workforce and Technology Center**

Instructor Name	Activity Name	Room	Age-Range	Time Available	Increments
Harry Schoeller Sandy Lovell	Drones	Main Lobby	Grades 5-12	10am-2pm	Join anytime
Zach Wyant	Virtual Reality Showcase & Hard Hat Craft	Room 125	Grades K-12	10am-2pm	Join anytime
Yawo Ekpoh	Future Builders/ Constructors Adventure	Room 139	Grades K-5	10am-2pm	Join anytime
Larry Adams	Cryptography (Cybersecurity)	Room 128	Grades 9-12	10am-2pm	Join anytime
Sarah Fralich	Build Your Own Cypher	Room 129	Grades K-12	10am-2pm	Join anytime
Garland Fenwick	Stormwater Management Poster Presentation	Front of Sealy Auditorium	Grades K-12	10am-2pm	Join anytime

(continue to next page)

Science, Technology, Engineering, Art, Mathematics & Health



#### **Building SP3: Science & Engineering Building and Information Center**

Instructor Name	Activity Name	Room	Age-Range	Time Available	Increments
Stephanie Marsich	Microscope Room	Room 311	Grades K-12	10am-2pm	Join anytime
Tamara Muldrow	Pond Water	Room 315	Grades K-8	10am-2pm	Join anytime
Maury Wrightson	Geology Rocks!	Room 215	Grades K-8	10am-2pm	Join anytime
Jennifer Scott	See your DNA	Room 319	Grades K-12	10am-2pm	Join anytime
Shawn Shields/ Christl Zaccagnino	Slime!	Room 225	Grades K-8	10am-12pm	Every 30 minutes
Todd Callan	Specimens	Room 323	Grades K-12	10am-12pm	Join anytime
Beth Granger	Squishy Circuits	Room 123	Grades K-12	10am-2pm Every 30 minutes	
Harry Schoeller Beth Granger	3-D Printing, Catapults, and Mechanical Testing (Can Compression / Crushing)	Room 127	Grades K-12	10am-2pm	Every 30 minutes
Andrea Goldstein	Egg Drop Gravity	Room 303	Grades K-12	10am-2pm	Join anytime

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Science, Technology, Engineering, Art, Mathematics & Health



#### Food & Misc.

Please enjoy free food and activities!

Туре	Building	Room/Area	Time	Notes	
Cotton Candy	SP2	Main floor lounge	10am-2pm		
SWAG Tables	SP3	Main Lobby	10am-2pm	Free SWAG bags and t-shirts!	
Peppers Grill	Outside	TBD	11am-2pm		
Game Truck	Outside	TBD	10am-2pm		
Ice Cream Truck	Outside	TBD	10am-2pm		
Ambulance	Outside	TBD	10am-2pm		
Lunch Room	SP1	101	10am-2pm		
Lunch Room	SP2	105 A/B	10am-2pm		
Welcome Table/ Food Pantry Donations	SP1	Main Lobby (2nd floor)	10am-2pm		
Welcome Table/ Food Pantry Donations	SP2	Main Lobby	10am-2pm		
Welcome Table/ Food Pantry Donations	SP3	Main Lobby	10am-2pm		
Resource Fair	SP1	Main Lobby (2nd floor)	12pm		
Arcade Games/ Coloring Station	SP1	3rd floor Lobby	10am-2pm	-Strike a Light -Play Back -Giant Connect 4	
Backyard Games	Outside	Courtyard	10am-2pm	-Cornhole -Giant Jenga	



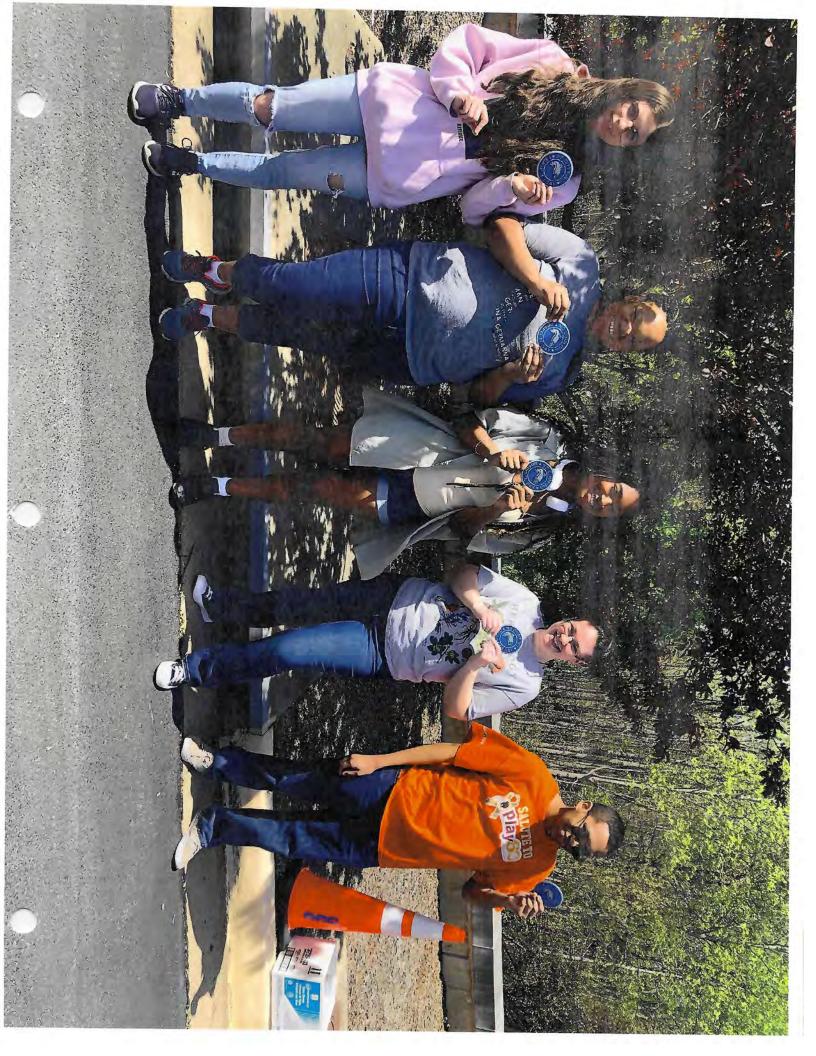
Public Involvement Activity #4



#### SIGN-IN SHEET (MS-4)

School Name:	Germanna Community College	Date: 4/11/20	023
Event: SGA Meeting		Location:	Fredericksburg Campus

Name	Role	Time	Flyer ☑	No.
NEESHING SINS		12:00		1
Sean Ahmad		12:00		2
Jessica Wolski		12:00		3
Jayson Johes		12:00		4
Renee Pringles		12:00		5
Lynn Korb		12:00		6
Alessandra Jarcia	SGA Public Relate	12:00		7
Jaxton Anderson	Senate Memeber	12:00		8
Chaylea Buchanan		12:00		9
rolell larlor	selmas	12:00		10
Brandon Beiler		12:08		11
				12
				13
				14
	4			15
HAMDED OUT 28 B	LOCHULES			16
				17
5 STUDENT PARTICIPA	TED IN I	PSTALL T	EV6	18
STORMWATER WED	ALLION.			19
				20





# Examples of BMP's structural control measures:

Retention basins - used to manage stormwater run-off to prevent flooding and downstream erosion, and improve water quality in an adjacent river, stream, lake or bay.

Sometimes called a wet pond or wet detention basin, it is an artificial lake with vegetation around the perimeter, and includes a permanent pool of water in its design.



**Bioswales** are landscape elements designed to remove silt and pollution from surface runoff water.



Additional examples of BMP's structural control measures:

Bioswales









Germanna Community College

Stormwater Manangement

bodies (surface water). evaporate, or run-off and end up in nearby streams, rivers, or other water Stormwater can soak into the soil originates during precipitation events. (infiltrate), be held on the surface and What is stormwater? Water that



degradation, and flooding. purpose of reducing erosion, water quality controlling stormwater run-off for the Stormwater management is the process of What is stormwater management?

are often referred to as Best Management Practices (BMPs). Stormwater management control measures

## Stormwater Management Best Management Practices can either be

and quality of runoff. to mitigate changes to both the quantity nonstructural or structural measures taken



## structural control measures: Examples of BMP's non-

Never dump anything down storm

trash receptacles Placing litter and cigarette butts in

Utilize recycling programs

Promptly repair vehicle and

garbage or flush it down the toilet equipment leaks Clean up pet waste and dispose it in the

of washing it in a driveway or parking lot Take your car to the car wash instead

Properly dispose household waste

