

Application Type Renewal  
Facility Type MS4  
Permit Type Individual

**NPDES PERMIT FACT SHEET**  
**MS4s**

Application No. PAI130025  
APS ID 949923  
Authorization ID 1197402


**Applicant and Facility Information**

Applicant Name	<u>Thornbury Township Chester County</u>	Facility Name	<u>Thornbury Township Chester County MS4 UA</u>
Applicant Address	<u>800 E Street Road</u> <u>West Chester, PA 19382-8545</u>	Facility Address	<u>800 W Street Road</u> <u>West Chester, PA 19382</u>
Applicant Contact	<u>Judy Lizza</u>	Facility Contact	<u>Judy Lizza</u>
Applicant Phone	<u>(610) 399-1425</u>	Facility Phone	<u>(610) 399-1425</u>
Client ID	<u>146863</u>	Site ID	<u>616964</u>
SIC Code	<u>9199</u>	Municipality	<u>Thornbury Township</u>
SIC Description	<u>Public Admin. - Genral Government, Nec</u>	County	<u>Chester</u>
Date Application Received	<u>July 31, 2017</u>		
Date Application Accepted	<u>August 23, 2024</u>		
Purpose of Application	<u>.</u>		

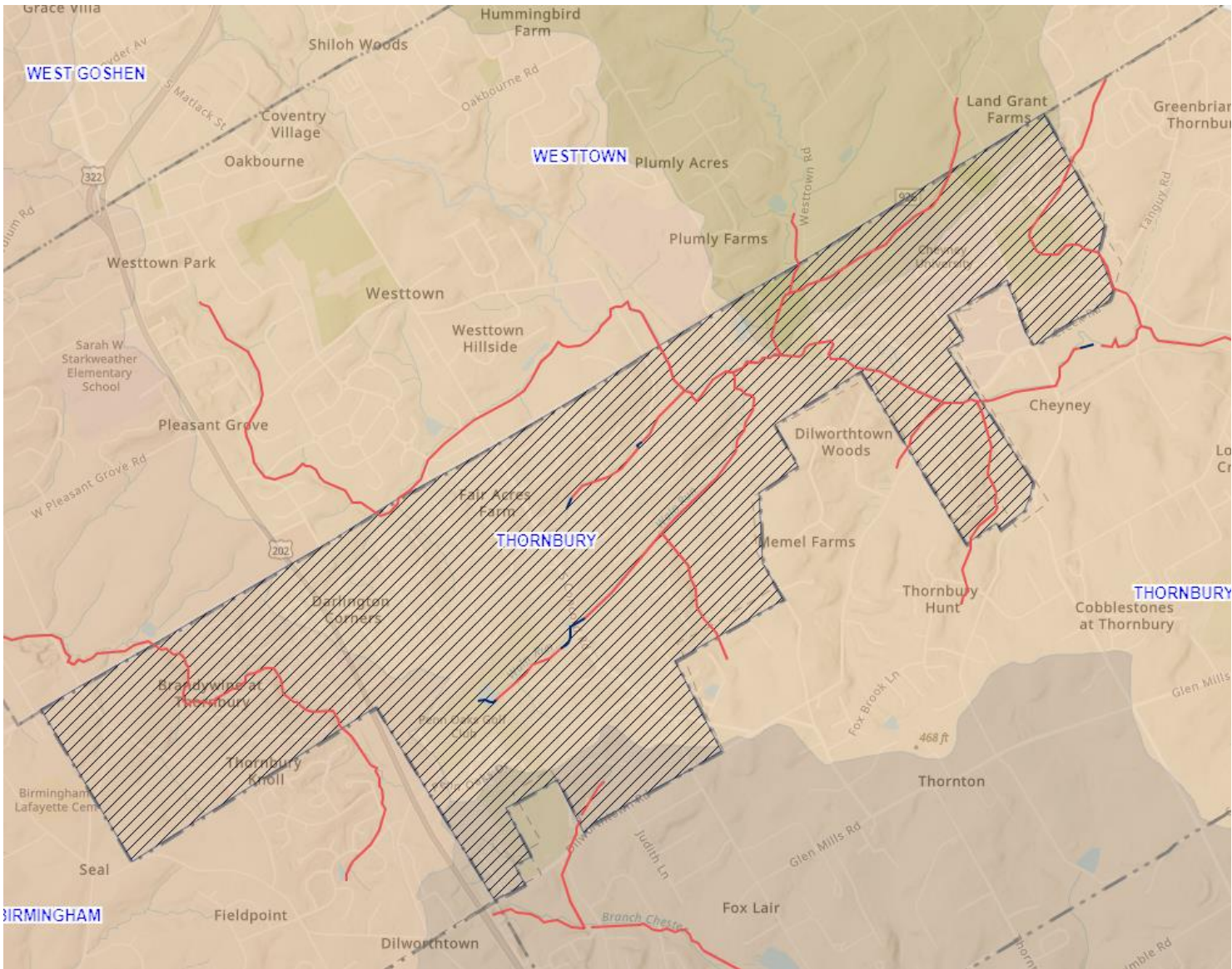
**Internal Review and Recommendations**

PRP/TMDL plans went out for public comment on 6/14/24 and submitted to DEP 8/22/24

The Township did not receive any comments.

Approve	Deny	Signatures	Date
X		 Ian Quinlan / Environmental Engineer	August 23, 2024
x		<i>Elizabeth Mahoney</i> / Elizabeth Mahoney/ Environmental Group Manager	10/07/2024

Internal Review and Recommendations



Internal Review and Recommendations

**MS4 Urban Area Report**  
**THORNBURY TWP, Chester County**

<b>INDIVIDUAL PERMIT REQUIRED:</b> Yes	<b>REASON:</b> TMDL Plan	<b>NPDES ID:</b> PAG130067
<b>IMPAIRED DOWNSTREAM WATERS</b>	<b>REQUIREMENTS</b>	<b>OTHER CAUSES OF IMPAIRMENT</b>
Christina River Basin Sediment	TMDL Plan-Siltation Suspended Solids (4a)	
Goose Creek TMDL	TMDL Plan-Nutrients (4a)	Cause Unknown (4a)
Waln Run	Appendix E-Siltation (5)	Other Habitat Alterations Water/Flow Variability (4c)
Chester Creek	Appendix B-Pathogens (5) Appendix E-Siltation (5)	Cause Unknown (5) Flow Alterations Other Habitat Alterations Water/Flow Variability (4c)
Radley Run		Water/Flow Variability (4c)
East Branch Chester Creek	Appendix E-Siltation (5)	Cause Unknown (5) Other Habitat Alterations Water/Flow Variability (4c)
West Branch Chester Creek	Appendix E-Siltation (5)	Cause Unknown (5) Other Habitat Alterations Water/Flow Variability (4c)

<b>WATERSHED</b>	<b>BASELINE SEDIMENT LOADING (lbs/yr)*</b>	<b>Minimum Required 10% Reduction (lbs/yr)</b>
Brandywine Creek (in Christina Basin)*	162,298	16,230
Chester Creek	249,422	24,942
<b>Total</b>	<b>413,755</b>	<b>41,375</b>

PROPOSED BMPS:

Internal Review and Recommendations

Stream Restoration in Brandywine Creek and Chester Creek Watersheds

An annual mass nutrient and sediment reduction credit for qualifying stream restoration practices that prevent channel or bank erosion that otherwise would be delivered downstream from an actively enlarging or incising urban stream. Applies to 0 to 3rd order streams that are not tidally influenced. If one of the protocols is cited and pounds are reported, then the mass reduction is received for the protocol. They have a sediment removal effectiveness value of 48.88 lbs./ft./yr.

Bioretention / Raingarden (C/D Soils w/Underdrain) in the Christina Basin / Brandywine Creek Watershed

A shallow basin or depression backfilled with engineered media, topsoil, mulch and vegetation, used to temporarily store and treat stormwater runoff by filtering through plant and soil medias. They have a sediment removal effectiveness value of 55%

Bioswale (to be used with the Bioretention / Raingarden) in the Christina Basin / Brandywine Creek Watershed

For a bioswale, the load is reduced because, unlike other open channel designs, there is now treatment through the soil. A bioswale is designed to function as a bioretention area. A bioswale is an excavated pit backfilled with engineered media, topsoil, mulch, and vegetation. These are planting areas installed in shallow basins in which the storm water runoff is temporarily ponded and then treated by filtering through the bed components, and through biological and biochemical reactions within the soil matrix and around the root zones of the plants. They have a sediment removal effectiveness value of 80%



Internal Review and Recommendations

Christina Basin / Brandywine Creek Watershed

The minimum 10% Load Reduction Required = 16,230 lbs./yr.

Bioretention / Raingarden at S. New Street = 5,187 lbs./yr.

and either Radley Run Stream Restoration location = 17,952 lbs./yr.

Total BMP's = 23,139 lbs. / yr.

BMP's > the minimum 10% Load Reduction Required therefore OK.

Chester Creek Watershed

The minimum 10% Load Reduction Required = 24,942.16 lbs./yr.

PennDOT Goose Creek Stream Restoration Project = 166,505 lbs./yr.

This BMP > the minimum 10% Load Reduction Required therefore OK.

Public Participation

DEP will publish notice of the receipt of the NPDES permit application and a tentative decision to issue the individual NPDES permit in the *Pennsylvania Bulletin* in accordance with 25 Pa. Code § 92a.82. Upon publication in the *Pennsylvania Bulletin*, DEP will accept written comments from interested persons for a 30-day period (which may be extended for one additional 15-day period at DEP's discretion), which will be considered in making a final decision on the application. Any person may request or petition for a public hearing with respect to the application. A public hearing may be held if DEP determines that there is significant public interest in holding a hearing. If a hearing is held, notice of the hearing will be published in the *Pennsylvania Bulletin* at least 30 days prior to the hearing and in at least one newspaper of general circulation within the geographical area of the discharge.