

Chain Bridge Road Gravity Sewer Capacity Improvements

Community Meeting

(Phase 2 of Langley School PS-FM project)

Department of Public Works and Environmental Services
Working for You!



A Fairfax County, VA, publication
June 28, 2022

Introductions

- Introductions
 - Lizzy Merin
 - Engineer II
 - Project Manager for this project for Fairfax County
 - Black and Veatch (Designer)
 - Water/Wastewater Engineering Firm
 - David Hill, Professional Engineer
 - Ryan Perigard, Project Engineer
 - Fort Myer (Contractor)
 - *To make sure we can answer all your questions, please type them in the chat throughout the presentation!*

Langley School PS-FM Project Phases

- Phase one
 - new force main and gravity sewer on Langley Lane
- **Phase two – Chain Bridge Road Gravity Sewer Capacity Improvements**
 - consists of updating the pumps at the pump station
 - gravity sewer improvements along Chain Bridge Road and Ballantrae Lane
 - the existing Force Main shall be abandoned in place and filled with concrete
- Phase three
 - consists of replacing the pump station and electrical buildings



Purpose of Community Meeting

- Inform the community about the upcoming project Phase 2- Chain Bridge Road Gravity Sewer Capacity Improvements



FAIRFAX COUNTY, VIRGINIA
DEPARTMENT OF PUBLIC WORKS
AND ENVIRONMENTAL SERVICES

**CHAIN BRIDGE ROAD
GRAVITY SEWER CAPACITY IMPROVEMENTS**

PROJECT NO. WW-000001-024-A

VICINITY MAP

NO.	REVISION	DATE
1	GENERAL	COVER SHEET AND SHEET LIST
2	GENERAL	GENERAL NOTES
3	GENERAL	GENERAL NOTES
4	GENERAL	GENERAL NOTES
5	GENERAL	GENERAL NOTES
6	GENERAL	GENERAL NOTES
7	C&E	GRAVITY SEWER PLAN AND PROFILE
8	C&E	GRAVITY SEWER PLAN AND PROFILE
9	C&E	GRAVITY SEWER PLAN AND PROFILE
10	C&E	GRAVITY SEWER PLAN AND PROFILE
11	C&E	GRAVITY SEWER PLAN AND PROFILE
12	C&E	GRAVITY SEWER PLAN AND PROFILE
13	C&E	GRAVITY SEWER PLAN AND PROFILE
14	C&E	GRAVITY SEWER PLAN AND PROFILE
15	C&E	GRAVITY SEWER PLAN AND PROFILE
16	C&E	GRAVITY SEWER PLAN AND PROFILE
17	C&E	GRAVITY SEWER PLAN AND PROFILE
18	C&E	GRAVITY SEWER PLAN AND PROFILE
19	C&E	GRAVITY SEWER PLAN AND PROFILE
20	C&E	GRAVITY SEWER PLAN AND PROFILE
21	C&E	GRAVITY SEWER PLAN AND PROFILE
22	C&E	GRAVITY SEWER PLAN AND PROFILE
23	C&E	GRAVITY SEWER PLAN AND PROFILE
24	C&E	GRAVITY SEWER PLAN AND PROFILE

TAX MAP 82-3 AND 81-1

RECOMMENDED FOR APPROVAL FOR CONSTRUCTION

DESIGNED BY: [Signature] DATE: [Date]

CHECKED BY: [Signature] DATE: [Date]

APPROVED: [Signature] DATE: [Date]

BLACK & VEATCH

JUNE 2022

COVER SHEET AND SHEET LIST

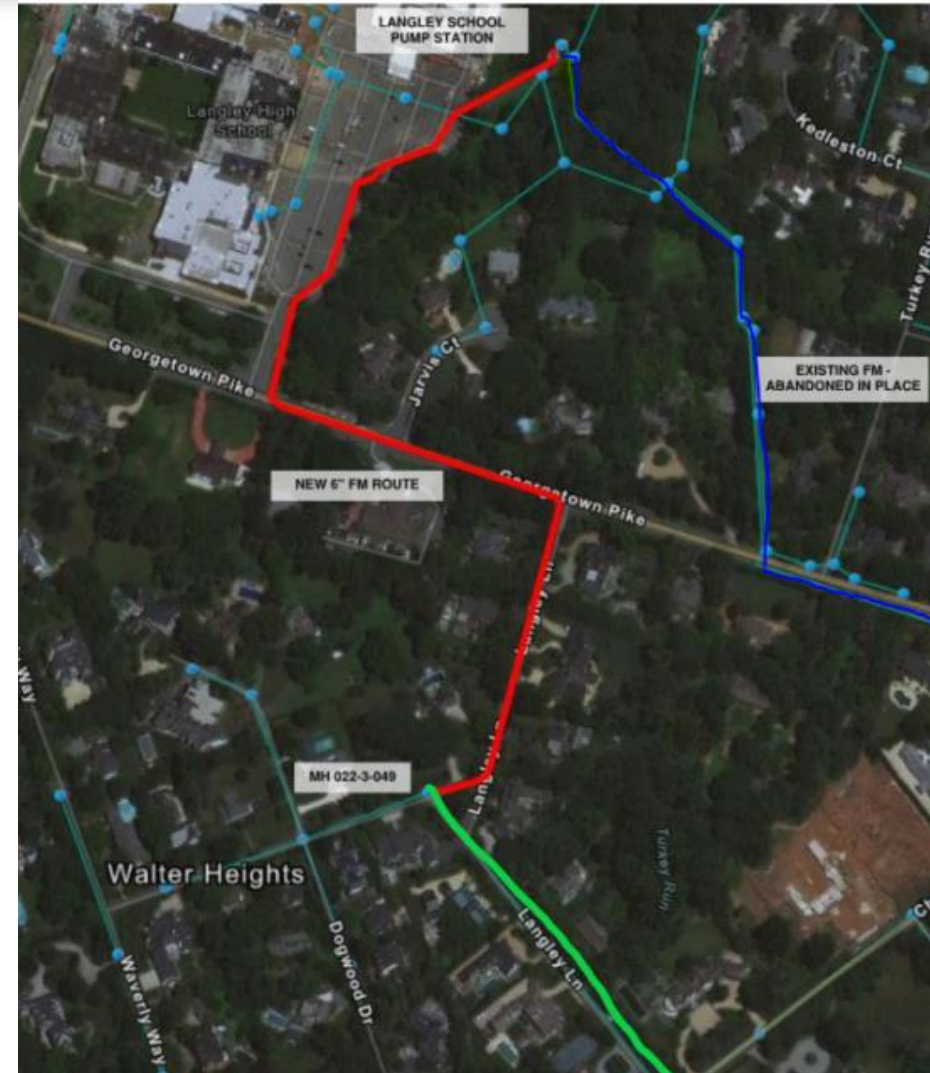
PROJECT NO. WW-000001-024-A

1 OF 24 SHEETS



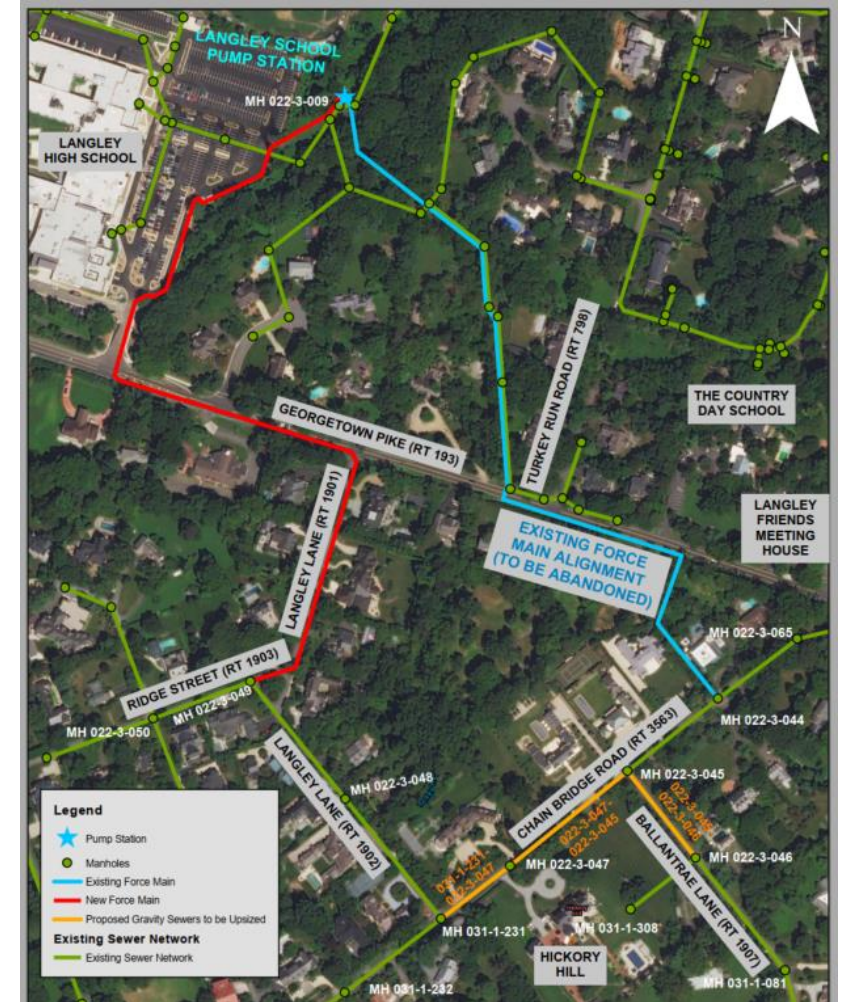
New Forcemain & Gravity Sewer was installed in Phase 1

- The New Forcemain (Pressure Pipe)
 - New 6" Ductile Iron Pipe (80-year life)
 - 4—6 feet below the ground
- New Gravity Sewer along Langley Lane
 - 12" PVC pipe (80-year life)
- New Asphalt Replacement for:
 - Pump station Access Road
 - High School Entrance
 - Georgetown Pike
 - Langley Lane (Full Width)



Overall Summary Phase 1 and 2 Combined

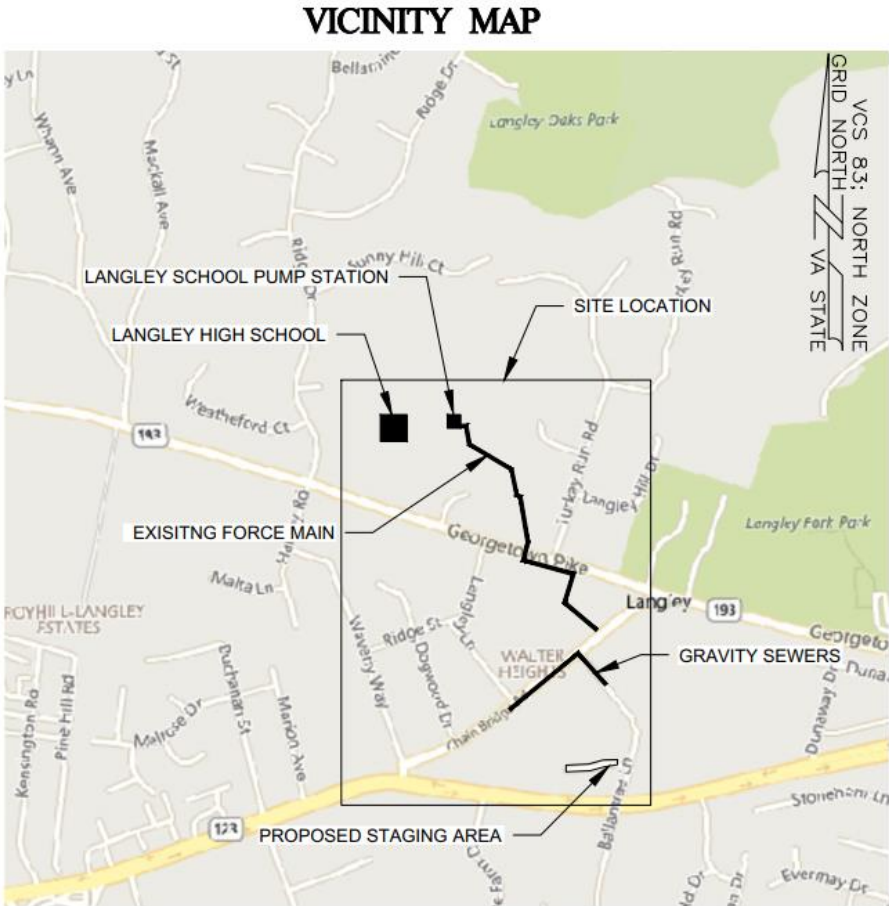
- Phase 1
 - Implemented the new force main and gravity sewer on Langley Lane
- Phase 2
 - Will replace the orange gravity sewers on Chain Bridge Road and Ballantrae Lane
 - Abandon the existing force main by filling with concrete
 - And update the pumps at the pump station
 - New 12" PVC Pipe (80-year life)
 - Same Location



Project Site



Staging area on Old Merlin's Lane



TAX MAP: 022-3 AND 031-1
1" = 100'



Chain Bridge Road Gravity Sewer Impacts

- Lateral reconnections
- Newly paved street
- Existing forcemain abandoned in place and filled with concrete to prevent pipe settlement- all work to take place in the VDOT ROW and at the PS.
- Staging area on Old Merlin's Lane
- Temporary sewer bypass during working hours
- Traffic detours

Chain Bridge Road Sewer Bypass Plan



Legend

- Manholes
- Laterals
- Existing Force Main
- New Force Main
- Proposed Gravity Sewers to be Upsized
- Existing Sewer Network

Chain Bridge Road Sewer Bypass Plan



Legend

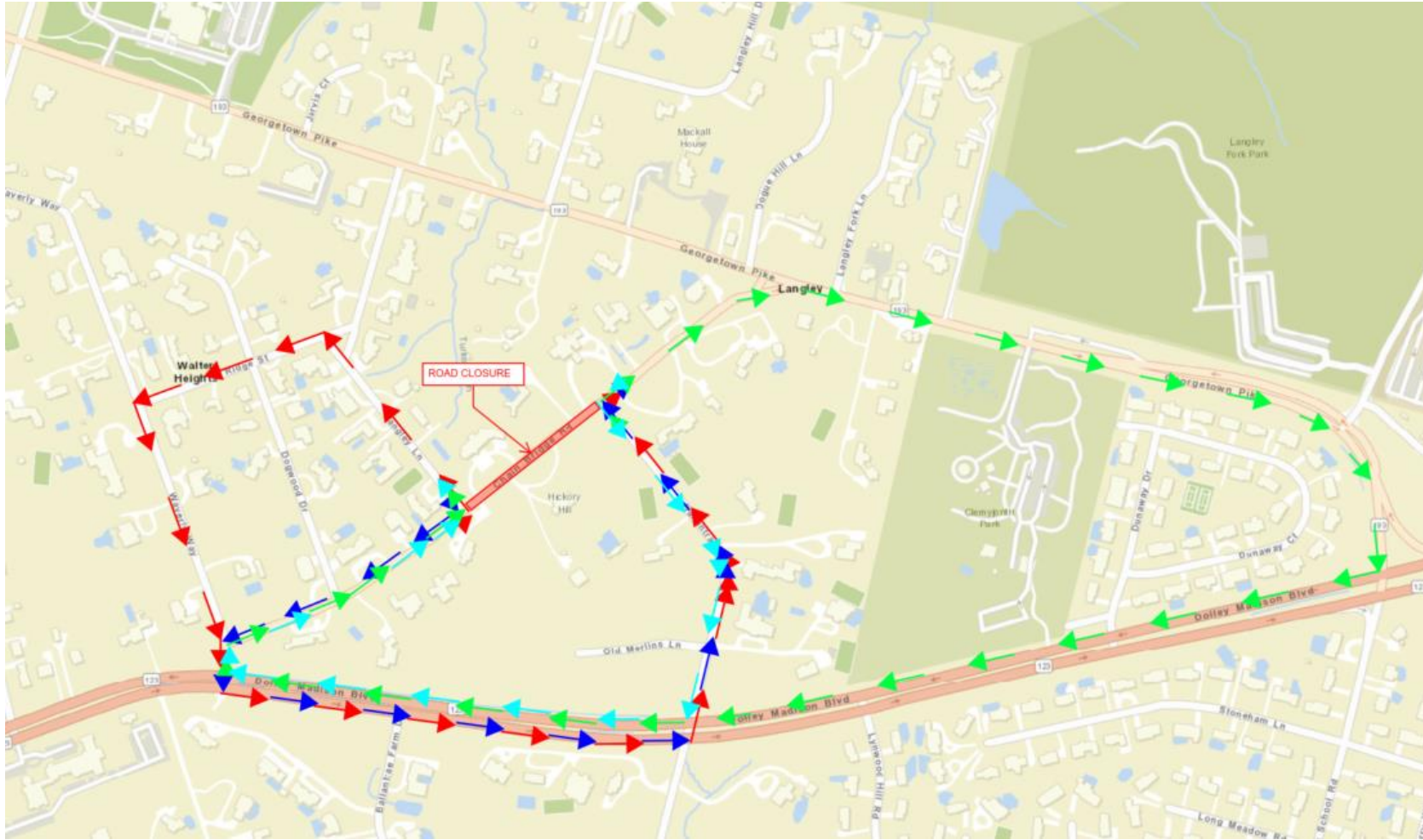
- Manholes
- Laterals
- Existing Force Main
- New Force Main
- Proposed Gravity Sewers to be Upsized
- Existing Sewer Network



Community Impacts

- Construction of Gravity Sewer in roadway:
 - Contractor may use steel plates, or other means to maintain access to all property entrances.
 - A detour plan will restrict non-local traffic for full road closures during working hours. Some single lane closures will also be used.
 - Contractor to work with homeowners to facilitate driveway access as work progresses.

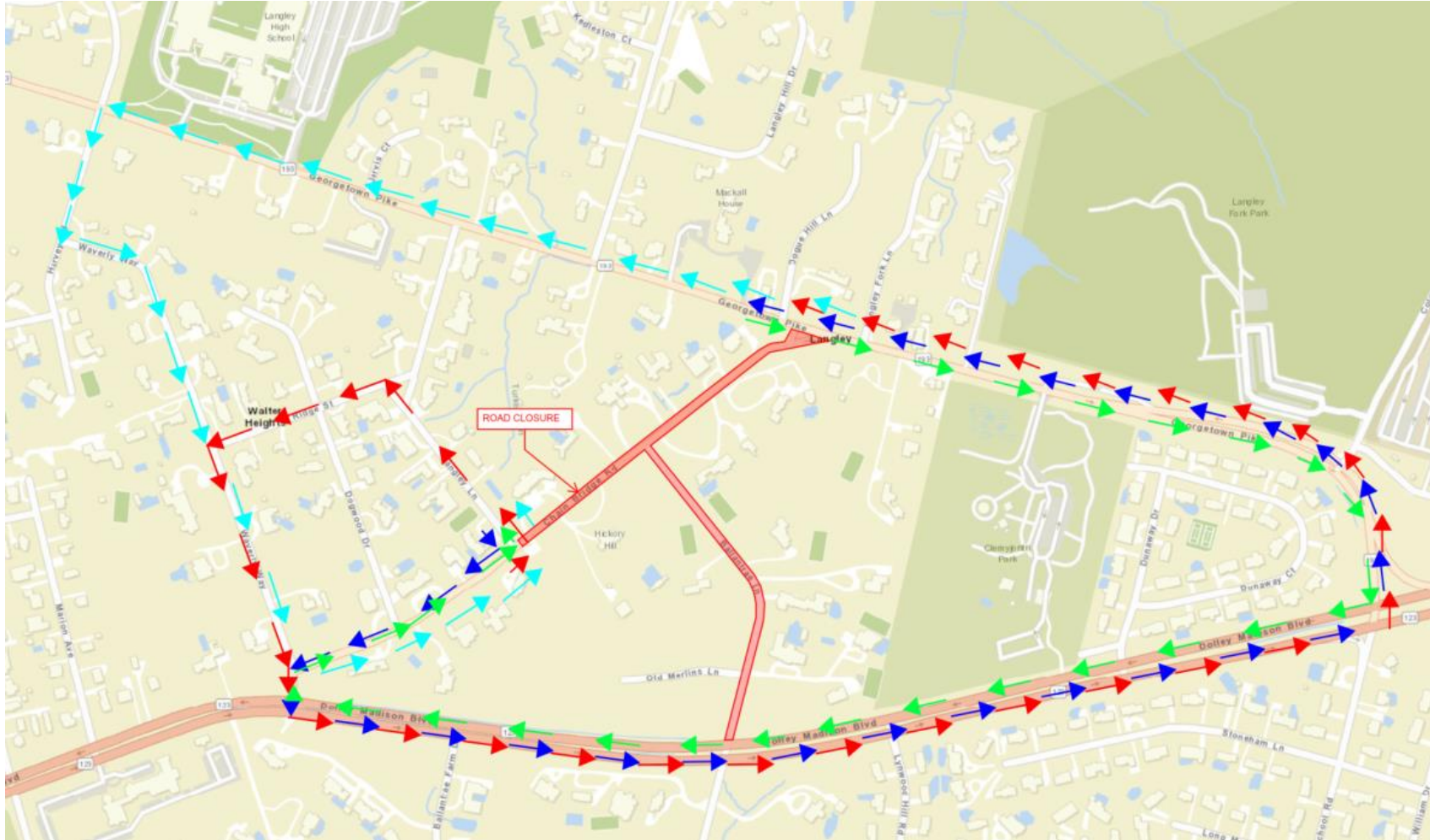
Traffic Detours - work on Chain Bridge



Closed to Thru-Traffic

Only homeowner
access allowed

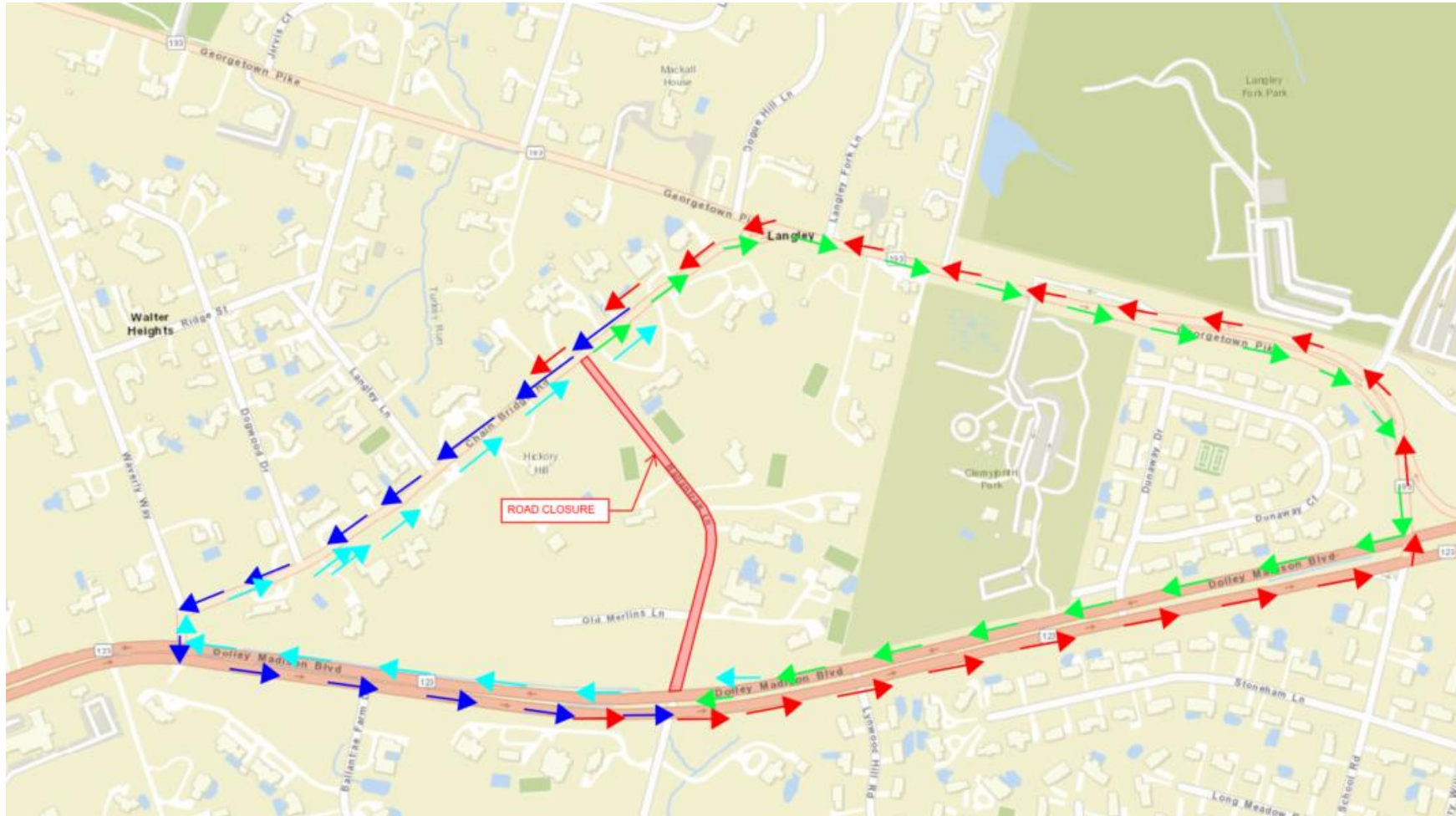
Traffic Detours - work on Chain Bridge and Ballantrae



Closed to Thru-Traffic

Only homeowner
access allowed

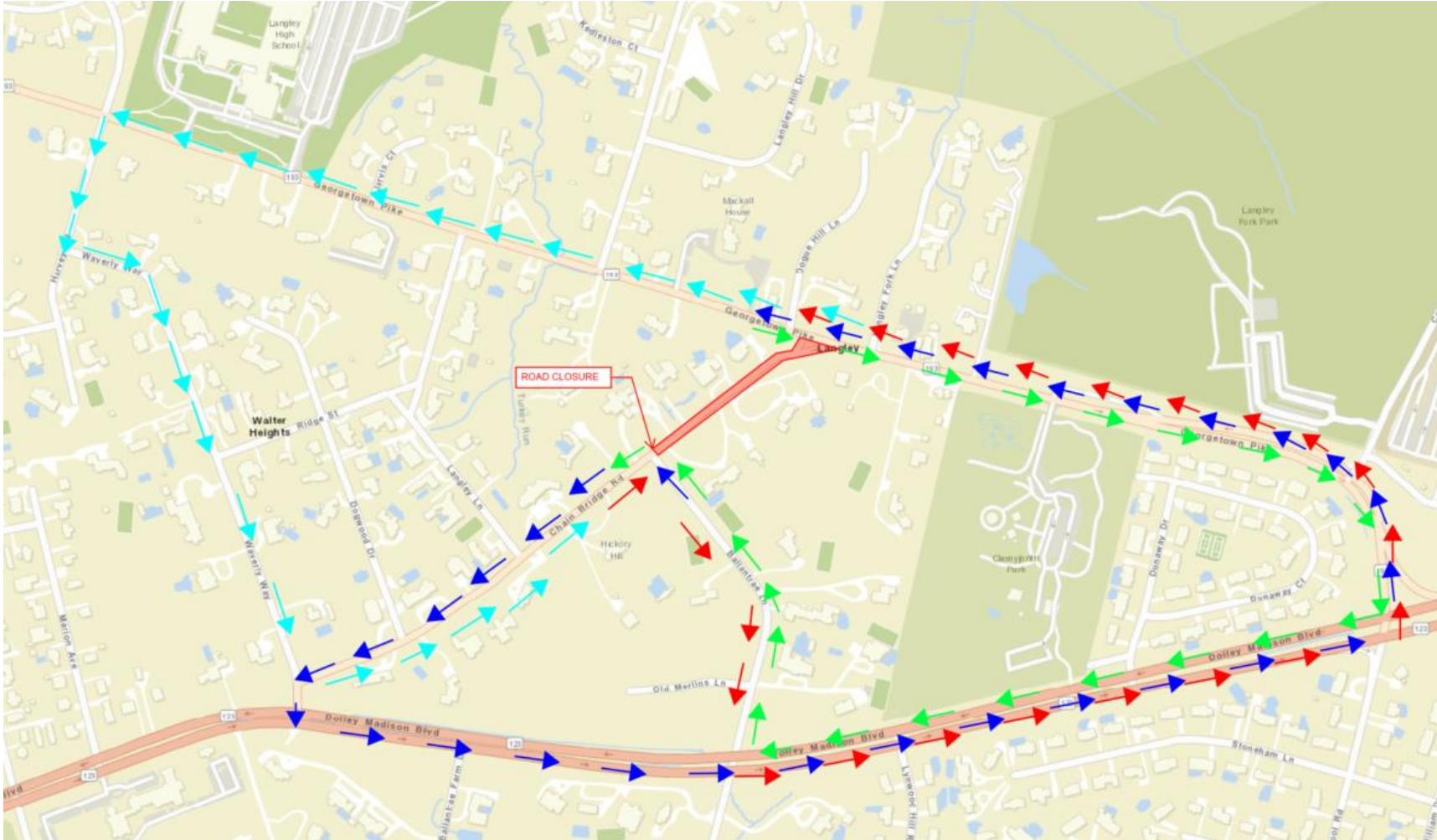
Traffic Detours - work on Ballantrae



Closed to Thru-Traffic

Only homeowner
access allowed

Traffic Detours - Rehabilitation of Manhole #44



Closed to Thru-Traffic

Only homeowner
access allowed

Project Schedule

Project Schedule

Project Timeline

TIMELINE

Phases	Date
Public Input and Open Discussion on Phase 1	May 2021
Begin Construction on Phase 1	June 2021
Public Input and Open Discussion on Phase 2	June 2022
Begin Construction on Phase 2	July 2022



Start Construction in Chain Bridge Road July 2022.
Estimated substantial completion early 2023.

Questions & Answers



Thank you for listening!

For additional information, please contact

Lizzy Merin

Elizabeth.merin@fairfaxcounty.gov

<https://www.fairfaxcounty.gov/publicworks/capital-projects/langley-school-pump-station-and-force-main-project>

- Future meeting notices will be posted here
- We will post this presentation on the website

www.fairfaxcounty.gov/publicworks