Avon Water Pollution Control Authority July 14, 2022 – 5:30 p.m. Via GoToMeeting

I. <u>CALL TO ORDER</u>

The Avon Water Pollution Control Authority meeting was called to order at 5:30 p.m. via GoToMeeting by Chairman Johansen.

AWPCA - Roll Call:

Present: Eric Johansen, Chairperson

Tom Armstrong, Vice-Chairperson

Chris Roy Micah Rousey

Lawrence Baril, Town Engineer

Absent: Keith Jones

II. MINUTES OF PRECEDING MEETING

June 9, 2022

On a motion made by Mr. Roy and seconded by Mr. Armstrong, it was voted:

RESOLVED: That the Authority approves the minutes of the June 9, 2022 Meeting as drafted.

Messrs.: Johansen, Armstrong, Rousey, and Roy voted in favor.

III. <u>COMMUNICATION FROM AUDIENCE</u> – None

IV. NEW BUSINESS

2022 – 5 Towpath Sewers

An update regarding Towpath Condominiums was given by Mr. Baril.

2022 – 6 Sanitary Sewers Evaluation Survey (SSES) presentation

Virgil Lloyd and Lindsay Silcox with Fuss & O'Neill made a presentation (which is attached and made part of these minutes).

On a motion made by Mr. Armstrong and seconded by Mr. Roy, it was voted:

RESOLVED: That the Authority recommend proceeding with the Sewer System Evaluation Survey (SSES) and recommend that the Town Council award the contract to Fuss & O'Neill.

Messrs: Johansen, Armstrong, Rousey, and Roy voted in favor.

2022 – 7 Route 44 Pump Station Upgrade

On a motion made by Mr. Armstrong and seconded by Mr. Roy, it was voted:

RESOLVED: That the Authority recommend proceeding with professional consulting services for the Route 44 Pump Station Project and recommend that the Town Council award the contract to Fuss & O'Neill.

Messrs: Johansen, Armstrong, Rousey, and Roy voted in favor.

V. <u>OLD BUSINESS</u>

2021 – 7 Benefit Assessments – Sub-dividable lots

On a motion made by Mr. Roy and seconded by Mr. Armstrong, it was voted: **RESOLVED:** That the Authority table this item to its September 8, 2022 meeting. Messrs: Johansen, Armstrong, Rousey, and Roy voted in favor.

2021 – 8 Timber Lane – Sewers

Mr. Baril reported that the boring contractor has completed their work. The Authority gave consensus to hold a Public Information Meeting at their September 8, 2022 meeting.

- VI. PLANNING & ZONING MATTERS No items presented.
- VII. <u>COMMUNICATION FROM STAFF</u> None
- VIII. <u>COMMUNICATION FROM MEMBERS</u> None
- IX. <u>OTHER BUSINESS</u> None

X. <u>ADJOURNMENT</u>

On a motion made by Mr. Rousey seconded by Mr. Roy, it was voted: **RESOLVED:** That the Authority adjourn the meeting at 6:35 p.m. Messrs.: Johansen, Armstrong, Rousey, and Roy voted in favor.

Attest: Jennifer Worsman, Acting AWPCA Clerk



Phase 2 – Sewer System Evaluation Survey Farmington Sewershed

Presentation to

Town of Avon Water Pollution Control Authority July 14, 2022

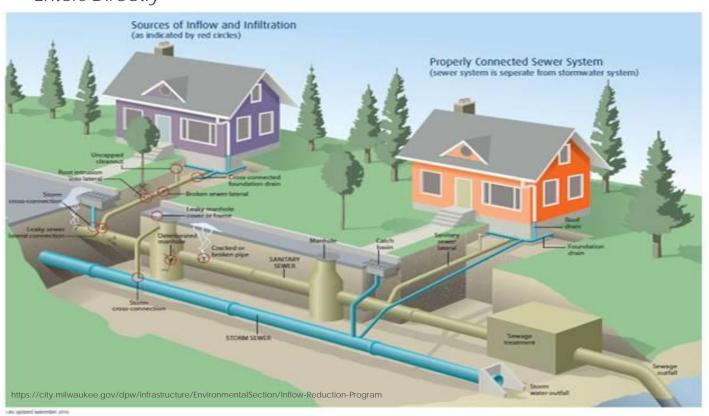
USEPA I/I Abatement Process

<u>Definitions</u>

- Infiltration
 - Enters Indirectly
- Inflow
 - Enters Directly

Three Part Process

- I/I Analysis
- Sewer System Evaluation Survey
- Rehabilitation





EPA Phase 1 Infiltration/Inflow Investigation 2014-2016

Flow Monitoring

- Divided Sewershed into 20 Meter Basins
- EPA Excessive Infiltration & Inflow Metrics
- 30% of meter basins rated as high in one or both metrics

Manhole Inspection

- Visual Inspection of Manhole Structures for evidence of I&I
- 215 Manholes Inspected (20% of Sewershed)
- 14 Severe Defects, 62 Moderate, 201 Minor

Dye Flow Dilution

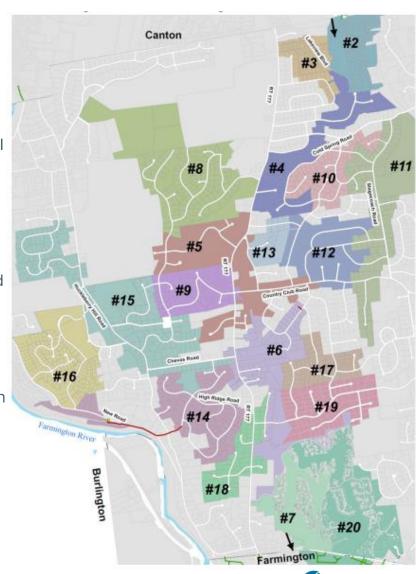
- Quantifies Increased Flow between Pipe Segments during Overnight Low Flow, Isolating Problem Areas to be CCTV'd
- 20 miles Investigated (45% of Sewershed)
- 4 Severe Metersheds, 2 Moderate, 3 Minor

CCTV Investigation

- Targeted a few Problem Areas Isolated During Dye Dilution
- 21 of 54 pipe segments Investigated showed infiltration

Sewer Capacity Analysis of Farmington and Simsbury Sewersheds

- 12 pipe segments found capacity constraints
- Approved by DEEP in 2018





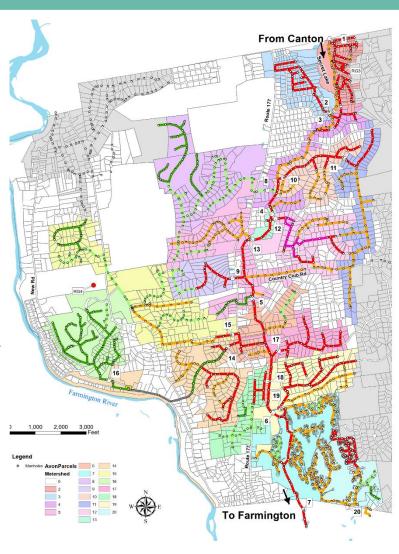
EPA Phase 2 Sewer System Evaluation Survey 2022 – Scope of Work

Smoke Testing – Fall 2022

- Non-toxic, non-staining, non-explosive smoke to find illicit connections
- 4 Metersheds targeted based on Phase 1 Inflow Metric
- <u>Sewer Rehabilitation General Specifications Winter 2022</u>
- Comprehensive Manhole Inspection Early Spring 2023
 - Visual Inspection of Manhole Structures for evidence of I&I
 - 175 Manholes selected based on age of infrastructure and discussion with Town Staff

Dye Flow Dilution – Mid Spring 2023

- Quantifies Increased Flow between Pipe Segments during Overnight Low Flow, Isolating Problem Areas
- 4 Metersheds Investigated based on Phase 1 Infiltration Metric
- Capacity Analysis of Sanford & Hawley Interceptor Summer 2023
 - 2 Flow Meters for 8 Weeks to make Hydraulic Calculations
- CCTV Investigation Spring 2024
 - Target Problem Areas Isolated During Dye Dilution
 - Full Main Interceptor, 6 miles of Gravity Sewers, 100 Service Laterals
- Database of Manhole Frames & Covers to be Raised Throughout
- <u>Final SSES Report Summer/Fall 2024</u>
 - Include recommended rehabilitation plan based on cost effectiveness analysis





EPA Phase 2 Sewer System Evaluation Survey 2022 - Schedule

Article Number	Scope Item	Fee Basis*	Cost/Budget	
2.19	Comprehensive Manhole Inspections	CPFF	\$	60,000
2.20	Develop Database of Manhole Frames & Covers to be Raised	CPFF	\$	5,500
2.21	Smoke Testing for Inflow	CPFF	\$	78,500
2.22	Non-Toxic Dye Flow Dilution Testing	CPFF	\$	102,300
2.23.1	Cleaning and CCTV Inspection of Farmington Sewershed Main Interceptor	CPFF	\$	104,200
2.23.2	Cleaning and CCTV Inspection of Farmington Sewershed	CPFF	\$	125,500
2.23.3	CCTV Service Connections	CPFF	\$	36,000
2.23.4	CCTV Technical Memorandum	CPFF	\$	22,500
2.24	Develop Sewer Rehab General Specifications	CPFF	\$	31,000
2.25	Capacity Analysis of Sanford & Hawley Interceptor	CPFF	\$	38,500
2.26	Develop SSES Report	CPFF	\$	57,000
*Fee Basis = Cost Plus Fixed Fee (CPFF), Hourly (HR), or Lump Sum (LS), as indicated			\$	661,000



Questions