

April 8, 2022

MEMORANDUM

To: Karen Hays, Air Branch Chief *KH*

Through: James Boylan, Assistant Branch Chief

From: DeAnna Oser, Ambient Monitoring Program Manager

RE: Fulton June 15, 2021 – June 27, 2021 Sampling Results for Ethylene Oxide

Samples of Ethylene Oxide (EtO) were collected during the period of June 15, 2021 – June 27, 2021, in the south Fulton area to characterize the EtO concentrations. The samples were sent to Eastern Research Group (ERG) for analysis. The Qualifier code of “2” is applied to samples to indicate that the collection deviated from established procedures, but the integrity of the sample was not compromised. Qualifier code “LK” is assigned by lab indicating Analyte Identified; Reported Value May Be Biased High. Please note that ERG is now providing values for levels below the detection limit.

Location	Date	Qualifier	EtO Concentration (ug/m ³)
F1	06/15/2021	2	0.41
F1	06/27/2021	2	0.41
F2	06/15/2021	2	0.37
F2	06/27/2021	2, LK	0.57
F2 QA	06/15/2021	2	0.20
F4	06/15/2021	2	0.27
F4	06/27/2021	LK	1.55

If you have any questions, please let me know.

DGO/do



Eastern Research Group
601 Keystone Park Drive
Suite 700
Morrisville, NC 27560

August 25, 2021

Ms. Jaime Gore
GA Ambient Monitoring Program
4244 International Pkwy, Suite 120
Atlanta, GA 30354
Project Name: Fulton

Dear Ms. Jaime Gore,

This report contains the analytical results for the sample(s) received under chain(s) of custody by Eastern Research Group on 07/01/21 11:26 through 07/23/21 11:00.

Values below the MDL for QC results in this report are recorded as ND, however the actual values are reported in the accompanying Excel report with a "U" flag (Under the detection limit). The actual values are reported in AQS.

This test is accredited under the 2016 TNI Standard for Environmental Laboratories (FL DOH Certification # E87673). All analyses were performed as described in the US EPA-approved QAPP, under the contract for UATMP, NATTS, CSATAM, PAMS and NMOC support (US EPA Contract No. EP-D-14-030). This cover page is an integral part of this report, and any exceptions or comments are noted on the last page.

Release of the data contained in this data package and in the data submitted in the electronic data deliverable, has been authorized by the Program Manager, or the Program Manager's designee as verified by the following signature.

The issuance of the final Certificate of Analysis takes precedence over any previous Report. If you have any questions, please contact me at 919-468-7924.

Sincerely,

Julie Swift
Program Manager
julie.swift@erg.com

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CERTIFICATE OF ANALYSIS

U.S. Environmental Protection Agency, Region 4

4244 International Pkwy, Suite 120

Atlanta, GA 30354

ATTN: Ms. Jaime Gore

PHONE: (404) 362-4912 FAX: (919) 541-0516

FILE #: 4222.00

REPORTED: 08/25/21 12:20

SUBMITTED: 07/01/21 to 07/23/21

AQS SITE CODE:

SITE CODE: Fulton

ANALYTICAL REPORT FOR SAMPLES

<u>SampleName</u>	<u>LabNumber</u>	<u>Matrix</u>	<u>Sampled</u>	<u>Received</u>
F1	1070115-01	Air	06/15/21 23:59	07/01/21 11:26
F2	1070115-02	Air	06/15/21 23:59	07/01/21 11:26
F4	1070115-03	Air	06/15/21 23:59	07/01/21 11:26
Fulton FB	1070115-04	Air	06/24/21 23:59	07/01/21 11:26
F2 QA	1070206-01	Air	06/15/21 23:59	07/02/21 10:13
F1	1072321-01	Air	06/27/21 23:59	07/23/21 11:00
F2	1072321-02	Air	06/27/21 23:59	07/23/21 11:00
F4	1072321-03	Air	06/27/21 23:59	07/23/21 11:00



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FILE #: 4222.00

REPORTED: 08/25/21 12:20

SUBMITTED: 07/01/21 to 07/23/21

AQS SITE CODE:

SITE CODE: Fulton

Description: F1

Lab ID: 1070115-01

Sampled: 06/15/21 23:59

Pressure @ Receipt: 7.50" Hg

Canister #: 19640

Received: 07/01/21 11:26

Comments:

Analyzed: 07/09/21 06:15

Air Toxics by EPA Compendium Method TO-15

<u>Analyte</u>	<u>Results</u>		<u>Flag</u>	<u>MDL</u>
	<u>ppbv</u>	<u>ug/m³</u>		<u>ppbv</u>
Ethylene oxide	0.228	0.41		0.0261



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FILE #: 4222.00

REPORTED: 08/25/21 12:20

SUBMITTED: 07/01/21 to 07/23/21

AQS SITE CODE:

SITE CODE: Fulton

Description: F2

Lab ID: 1070115-02

Sampled: 06/15/21 23:59

Pressure @ Receipt: 8.50" Hg

Canister #: A21036

Received: 07/01/21 11:26

Comments:

Analyzed: 07/02/21 22:19

Air Toxics by EPA Compendium Method TO-15

<u>Analyte</u>	<u>Results</u>		<u>Flag</u>	<u>MDL</u>
	<u>ppbv</u>	<u>ug/m³</u>		<u>ppbv</u>
Ethylene oxide	0.202	0.37		0.0261



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FILE #: 4222.00

REPORTED: 08/25/21 12:20

SUBMITTED: 07/01/21 to 07/23/21

AQS SITE CODE:

SITE CODE: Fulton

Description: F4

Lab ID: 1070115-03

Sampled: 06/15/21 23:59

Pressure @ Receipt: 6.50 "Hg

Canister #: 33529

Received: 07/01/21 11:26

Comments:

Analyzed: 07/02/21 23:20

Air Toxics by EPA Compendium Method TO-15

<u>Analyte</u>	<u>Results</u>		<u>Flag</u>	<u>MDL</u>
	<u>ppbv</u>	<u>ug/m³</u>		<u>ppbv</u>
Ethylene oxide	0.150	0.27		0.0261



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FILE #: 4222.00

REPORTED: 08/25/21 12:20

SUBMITTED: 07/01/21 to 07/23/21

AQS SITE CODE:

SITE CODE: Fulton

Description: Fulton FB

Lab ID: 1070115-04

Sampled: 06/24/21 23:59

Pressure @ Receipt: 29.5 " Hg

Canister #: A21031

Received: 07/01/21 11:26

Comments: Field Blank

Analyzed: 07/20/21 15:52

Air Toxics by EPA Compendium Method TO-15

<u>Analyte</u>	<u>Results</u>		<u>Flag</u>	<u>MDL</u>
	<u>ppbv</u>	<u>ug/m³</u>		<u>ppbv</u>
Ethylene oxide	ND	ND	U	0.0261



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FILE #: 4222.00

REPORTED: 08/25/21 12:20

SUBMITTED: 07/01/21 to 07/23/21

AQS SITE CODE:

SITE CODE: Fulton

Description: F2 QA

Lab ID: 1070206-01

Sampled: 06/15/21 23:59

Pressure @ Receipt: 7.00" Hg

Canister #: 114386

Received: 07/02/21 10:13

Comments:

Analyzed: 07/09/21 07:16

Air Toxics by EPA Compendium Method TO-15

<u>Analyte</u>	<u>Results</u>		<u>Flag</u>	<u>MDL</u>
	<u>ppbv</u>	<u>ug/m³</u>		<u>ppbv</u>
Ethylene oxide	0.111	0.20		0.0261



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 4244 International Pkwy, Suite 120
 Atlanta, GA 30354
 ATTN: Ms. Jaime Gore
 PHONE: (404) 362-4912 FAX: (919) 541-0516

FILE #: 4222.00
 REPORTED: 08/25/21 12:20
 SUBMITTED: 07/01/21 to 07/23/21
 AQS SITE CODE:
 SITE CODE: Fulton

Description: F1 **Lab ID:** 1072321-01 **Sampled:** 06/27/21 23:59
Pressure @ Receipt: 7.50" Hg **Canister #:** 19650 **Received:** 07/23/21 11:00
Comments: **Analyzed:** 07/23/21 20:05

Air Toxics by EPA Compendium Method TO-15

<u>Analyte</u>	<u>Results</u>		<u>Flag</u>	<u>MDL</u>
	<u>ppbv</u>	<u>ug/m³</u>		<u>ppbv</u>
Ethylene oxide	0.229	0.41		0.0261



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FILE #: 4222.00

REPORTED: 08/25/21 12:20

SUBMITTED: 07/01/21 to 07/23/21

AQS SITE CODE:

SITE CODE: Fulton

Description: F2

Lab ID: 1072321-02

Sampled: 06/27/21 23:59

Pressure @ Receipt: 8.50" Hg

Canister #: SAT028

Received: 07/23/21 11:00

Comments:

Analyzed: 07/23/21 22:06

Air Toxics by EPA Compendium Method TO-15

<u>Analyte</u>	<u>Results</u>		<u>Flag</u>	<u>MDL</u>
	<u>ppbv</u>	<u>ug/m³</u>		<u>ppbv</u>
Ethylene oxide	0.318	0.57	LK	0.0261



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FILE #: 4222.00

REPORTED: 08/25/21 12:20

SUBMITTED: 07/01/21 to 07/23/21

AQS SITE CODE:

SITE CODE: Fulton

Description: F4

Lab ID: 1072321-03

Sampled: 06/27/21 23:59

Pressure @ Receipt: 5.00 "Hg

Canister #: 35131

Received: 07/23/21 11:00

Comments:

Analyzed: 07/23/21 23:07

Air Toxics by EPA Compendium Method TO-15

<u>Analyte</u>	<u>Results</u>		<u>Flag</u>	<u>MDL</u>
	<u>ppbv</u>	<u>ug/m³</u>		<u>ppbv</u>
Ethylene oxide	0.857	1.55	LK	0.0261



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U.S. Environmental Protection Agency, Region 4
 4244 International Pkwy, Suite 120
 Atlanta, GA 30354
ATTN: Ms. Jaime Gore
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FILE #: 4222.00
REPORTED: 08/25/21 12:20
SUBMITTED: 07/01/21 to 07/23/21
AQS SITE CODE:
SITE CODE: Fulton

Analyte	Result	Units	Source Result	RPD	RPD Limit	Notes
Air Toxics by EPA Compendium Method TO-15 - Quality Control						
<i>Batch B1G0203 - Summa Canister Prep</i>						
Blank (B1G0203-BLK1)			Prepared & Analyzed: 07/02/21			
Ethylene oxide	ND	ppbv				U
<i>Batch B1G0811 - Summa Canister Prep</i>						
Blank (B1G0811-BLK1)			Prepared & Analyzed: 07/08/21			
Ethylene oxide	ND	ppbv				U
Duplicate (B1G0811-DUP5)			Source: 1070206-01 Prepared: 06/15/21 Analyzed: 07/09/21			
Ethylene oxide	0.119	ppbv	0.11	6.79	25	
<i>Batch B1G1308 - Summa Canister Prep</i>						
Blank (B1G1308-BLK1)			Prepared: 07/13/21 Analyzed: 07/20/21			
Ethylene oxide	ND	ppbv				U
<i>Batch B1G2304 - Summa Canister Prep</i>						
Blank (B1G2304-BLK1)			Prepared & Analyzed: 07/23/21			
Ethylene oxide	ND	ppbv				U
Duplicate (B1G2304-DUP1)			Source: 1072321-01 Prepared: 06/27/21 Analyzed: 07/23/21			
Ethylene oxide	0.230	ppbv	0.23	0.131	25	



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FILE #: 4222.00
REPORTED: 08/25/21 12:20
SUBMITTED: 07/01/21 to 07/23/21
AQS SITE CODE:
SITE CODE: Fulton

Analyte	Result	Units	% Difference	Limit (%)	Notes
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Air Toxics by EPA Compendium Method TO-15 - Quality Control

Sequence 2107010

Calibration Check (2107010-CCV1)

Prepared & Analyzed: 07/02/21

Ethylene oxide	2.17	ppbv	-13.3	30.00
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Sequence 2107022

Calibration Check (2107022-CCV1)

Prepared & Analyzed: 07/08/21

Ethylene oxide	2.20	ppbv	-11.9	30.00
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Sequence 2107033

Calibration Check (2107033-CCV1)

Prepared & Analyzed: 07/20/21

Ethylene oxide	2.36	ppbv	-5.6	30.00
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Sequence 2107070

Calibration Check (2107070-CCV1)

Prepared & Analyzed: 07/23/21

Ethylene oxide	2.44	ppbv	-2.3	30.00
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CERTIFICATE OF ANALYSIS

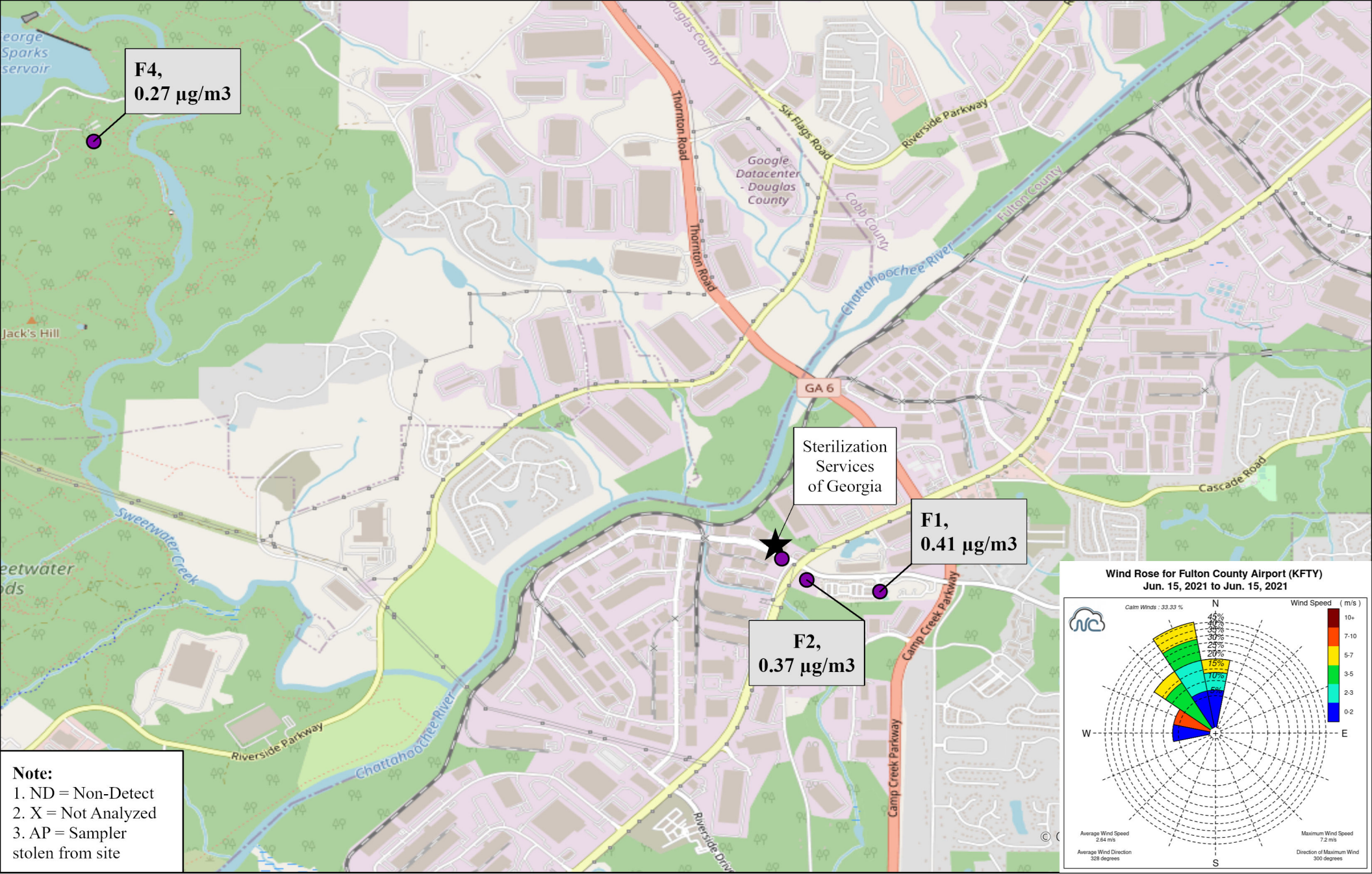
U.S. Environmental Protection Agency, Region 4
4244 International Pkwy, Suite 120
Atlanta, GA 30354
ATTN: Ms. Jaime Gore
PHONE: (404) 362-4912 **FAX:** (919) 541-0516

FILE #: 4222.00
REPORTED: 08/25/21 12:20
SUBMITTED: 07/01/21 to 07/23/21
AQS SITE CODE:
SITE CODE: Fulton

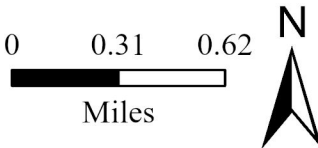
Notes and Definitions

U Under Detection Limit
LK Analyte identified; Reported value may be biased high.
ND Analyte NOT DETECTED
NR Not Reported
MDL Method Detection Limit
RPD Relative Percent Difference

Note: This test is accredited under the 2016 TNI Standard; however the following analytes are not accredited: acetylene, bromodichloroethane, dichlorotetrafluoromethane, ethyl tert butyl ether, n-octane, tert amyl methyl ether, trichlorofluoroethane, and bromochloromethane.



Note:
 1. ND = Non-Detect
 2. X = Not Analyzed
 3. AP = Sampler stolen from site

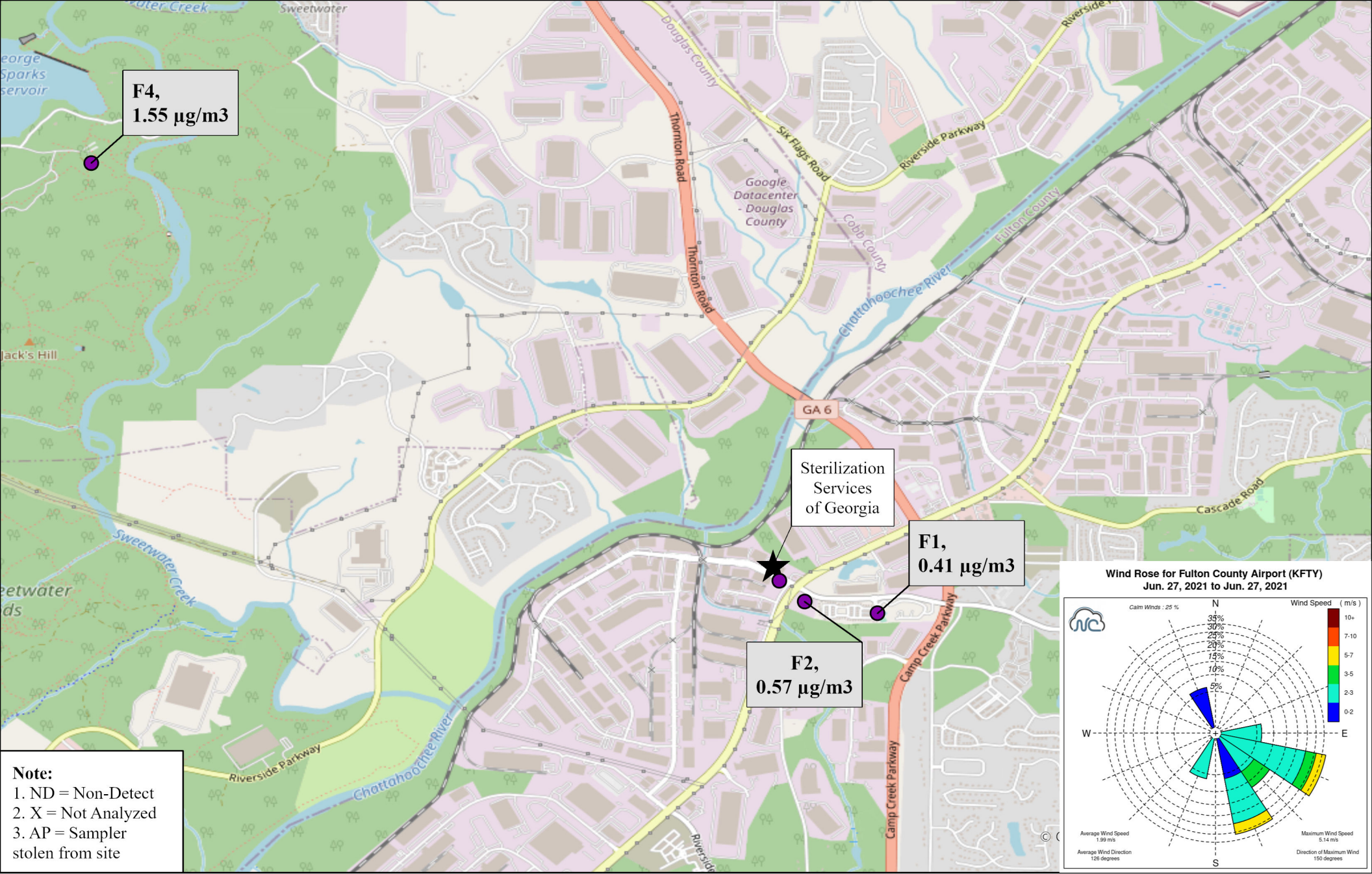


Site ID, Concentration (µg/m³)

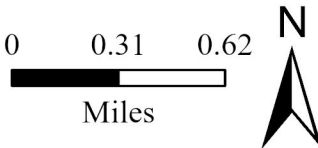
Ethylene Oxide Sampling
 Fulton County, GA

June 15, 2021
 Sampled By: Georgia Environmental Protection Division
 Analyzed By: Eastern Research Group





Note:
 1. ND = Non-Detect
 2. X = Not Analyzed
 3. AP = Sampler stolen from site

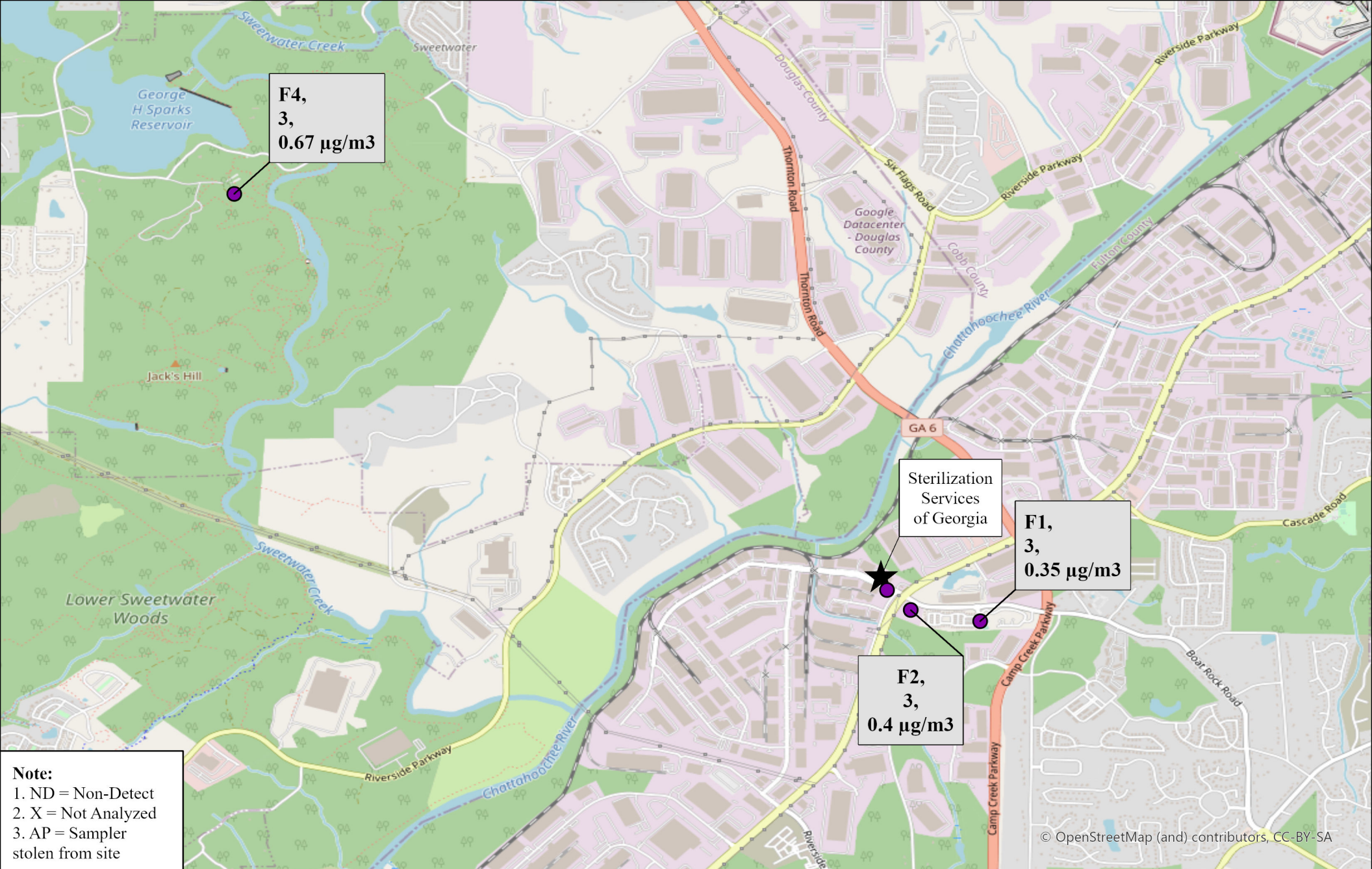


Site ID, Concentration (µg/m³)

Ethylene Oxide Sampling
 Fulton County, GA

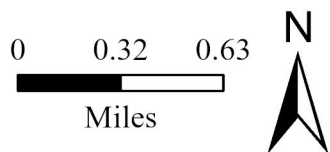
June 27, 2021
 Sampled By: Georgia Environmental Protection Division
 Analyzed By: Eastern Research Group





Ethylene Oxide Sampling
 Fulton County, GA

June 2021 Site Average Values
 Note: Not detectable values were included in average calculations as a value of 0.
 Sampled By: Georgia Environmental Protection Division
 Analyzed By: Eastern Research Group



**Site ID, Number of Samples,
 Concentration (µg/m³)**