



Misc. Professional Services

EC 2022-38

STA No. 06

Project Name: Village of Estero Water Monitoring

Consultant: Johnson Engineering, Inc.

Tim Denison: tim@johnsoneng.com

Village of Estero Contract No.: EC 2022-38

Village of Estero Account Number: 001-260-5373105

Brief Description: Monitoring water quality, flow and water levels throughout the Village of Estero

Total Fees: \$146,340

The Consultant shall perform the services outlined in the attached Exhibit A – Scope of Services and Exhibit B - Fees, under the terms and conditions outlined in the above referenced Village of Estero Contract No. EC 2022-38.

Consultant: Johnson Engineering, Inc.

By: _____

Name: _____

Title: _____

Date: _____

Village of Estero

By: _____

Name: Steve Sarkozy

Title: Village Manager

Date: _____

Attachments:

Exhibit A – Scope of Services

Exhibit B - Fees

EXHIBIT A

EC 2022-38 MISCELLANEOUS PROFESSIONAL SERVICES SUPPLEMENTAL TASK AUTHORIZATION No. 6

SCOPE OF SERVICES

June 28, 2023

FOR: WATER MONITORING ASSISTANCE 2023-2024

A. PROJECT OVERVIEW

Johnson Engineering, Inc. ("CONSULTANT") shall provide water monitoring assistance to The Village of Estero (VILLAGE). The VILLAGE recently implemented a water resource monitoring program. The program was designed to improve the VILLAGE's understanding of its water resources. The data can be used to help guide future actions/programs by the VILLAGE. The water quality parameters follow those measured by Lee County to allow direct comparisons.

B. SCOPE OF SERVICES

TASK 1: Surface Water Datalogger Reinstallation

CONSULTANT will reinstall surface water datalogger ERNB-SW2 at the location shown on the Water Level Monitoring Location map, *Attachment II*. The metal support pipe and PVC pipe housing the In-Situ Rugged Troll at that location were damaged during recent dredging activities. CONSULTANT will resurvey the top of the well casing and reference elevation to the North American Vertical Datum of 1988 (NAVD88) using a benchmark set in the nearby sidewalk.

TASK 2: Monthly Water Quality Sampling and Flow Monitoring

CONSULTANT will conduct monthly surface water sampling at nine (9) water quality monitoring locations shown on the Water Quality Monitoring Location Map, *Attachment I*, which has been updated to include the four (4) new locations along Estero River that were added recently. CONSULTANT will conduct the monthly surface water sampling from October 1, 2023, through September 30, 2024. Sampling of the Estero River locations will be conducted on the same day that Lee County will be sampling nearby locations. Sampling of locations along Halfway Creek will be conducted within one (1) day of when Lee County will be sampling nearby locations. Samples will be collected at each location where water is at least a foot deep. One (1) field blank sample will also be collected every other month. CONSULTANT will record field measurements of temperature, pH, specific conductance, dissolved oxygen, and turbidity at each location. CONSULTANT will collect the samples in accordance with proper Florida Department of Environmental Protection (FDEP) Standard Operating Procedures (SOP). CONSULTANT will prepare a Chain-Of-Custody (COC) for the samples and deliver them to a state certified laboratory following proper COC procedures in adherence to established hold times. The samples will be laboratory analyzed for E. Coli, enterococci, chlorophyll-a, ammonia nitrogen, organic nitrogen, nitrate nitrogen, nitrite nitrogen, nitrate+nitrite, total Kjeldahl nitrogen, total nitrogen, ortho phosphorus, and total phosphorus. Flow direction and approximate velocity will also be noted at each location. In addition, CONSULTANT will record surface water velocity, water depth, and channel area as needed to calculate flow at the four (4) sites labeled on the updated Flow Monitoring Location Map, *Attachment III*. Velocity and level data recorded by the Doppler flowmeter below Knollview Blvd. (HC@KR) will also be downloaded.

TASK 3: Quarterly Surface Water Level Downloading

CONSULTANT will download water level data from the seven (7) surface water monitor wells shown on the Water Level Monitoring Location map, *Attachment II*, at quarterly intervals. CONSULTANT will also download the BaroTroll as part of this task.

TASK 4: Data Management

CONSULTANT will manage the water quality, water level, and flow data in Excel spreadsheets. The digital and lab report data provided by the lab each month will be reviewed as part of the QAQC process and the lab will be contacted about any discrepancies. Flow data from two (2) United States Geological Society (USGS) sites shown on the Flow Monitoring Location Map, *Attachment III*, will be downloaded from USGS. Water level, flow, and water quality data from Lee County sites in Village of Estero will be downloaded from Lee County.

TASK 5: Annual Water Monitoring Report

CONSULTANT will prepare a monitoring report covering data collected from October 2023 through September 2024. The report will summarize the data collected using tables and charts. It will also provide a comparison of the Village of Estero water quality data to the nearby Lee County water quality data. The report will be provided on or before January 31, 2025.

C. SCHEDULE

Upon notice to proceed by VILLAGE, monitoring will be for the period beginning October 1, 2023 through September 30, 2024.

SUB-CONSULTANT SERVICES:

LAB: Laboratory Testing

Benchmark EnviroAnalytical, Inc. for laboratory testing.

EXHIBIT B

**EC 2022-38 MISCELLANEOUS PROFESSIONAL SERVICES
SUPPLEMENTAL TASK AUTHORIZATION No. 6**

COMPENSATION

June 28, 2023

FOR: WATER QUALITY MONITORING ASSISTANCE 2023-2024

The fees for Task 1 through 5 will be Lump Sum and the Subconsultant will be billed on a Time & Materials basis. Total not to exceed **\$146,340.00**.

For services provided and performed by CONSULTANT for providing and performing the Task(s) set forth and enumerated in Exhibit A entitled "Scope of Services", the VILLAGE shall compensate the CONSULTANT as follows:

TASK	ITEM	AMOUNT (Estimated if T&M)	FEE TYPE (LS; T&M)
1	Surface Water Datalogger Reinstallation	\$1,500.00	LS
2	Monthly Water Quality Sampling and Flow Monitoring (Oct 2023 through Sept 2024)*	\$49,500.00	LS
3	Quarterly Surface Water Level Downloading (4 quarters)**	\$9,500.00	LS
4	Data Management	\$4,000.00	LS
5	Annual Water Monitoring Report (1 year)	\$6,600.00	LS
TOTAL COMPENSATION FOR CONSULTANT'S SERVICES:		\$71,100.00	LS

* Task 2: To be billed at approximately \$4,125 per month.

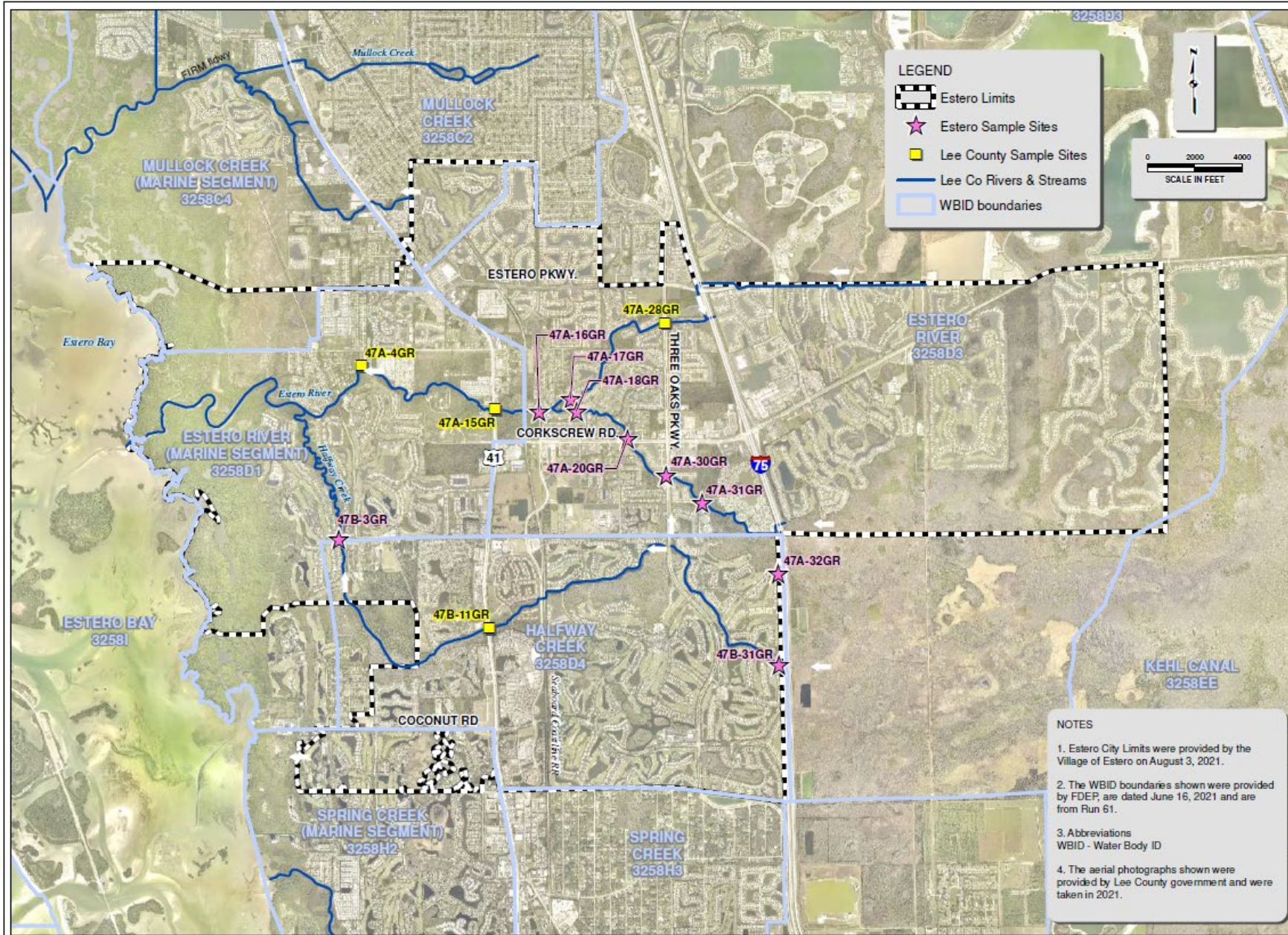
** Task 3: To be billed at approximately \$2,375 per quarter.

For services of CONSULTANT's Sub-Consultants engaged to perform or furnish services, the VILLAGE shall compensate the CONSULTANT as follows:

TASK	SUB-CONSULTANT	AMOUNT (Estimated if T&M)	FEE TYPE (LS; T&M)
LAB	Cost for lab analysis of the samples is estimated at \$660 per sample x 9 samples for 12 monthly events plus 6 field blanks	\$75,240.00	T&M
TOTAL COMPENSATION FOR SUB-CONSULTANT'S SERVICES:		\$75,240.00	T&M

TOTAL COMPENSATION, INCLUDING SUB-CONSULTANTS:		\$146,340.00	LS; T&M
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Attachment I to Exhibit A



\\fms01\drawings\2020\20203178-007\AroGIS\Estero Aerial WQ Sample Sites WBID - March2022 11x17.mxd - pml

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WATER QUALITY MONITORING
VILLAGE OF ESTERO

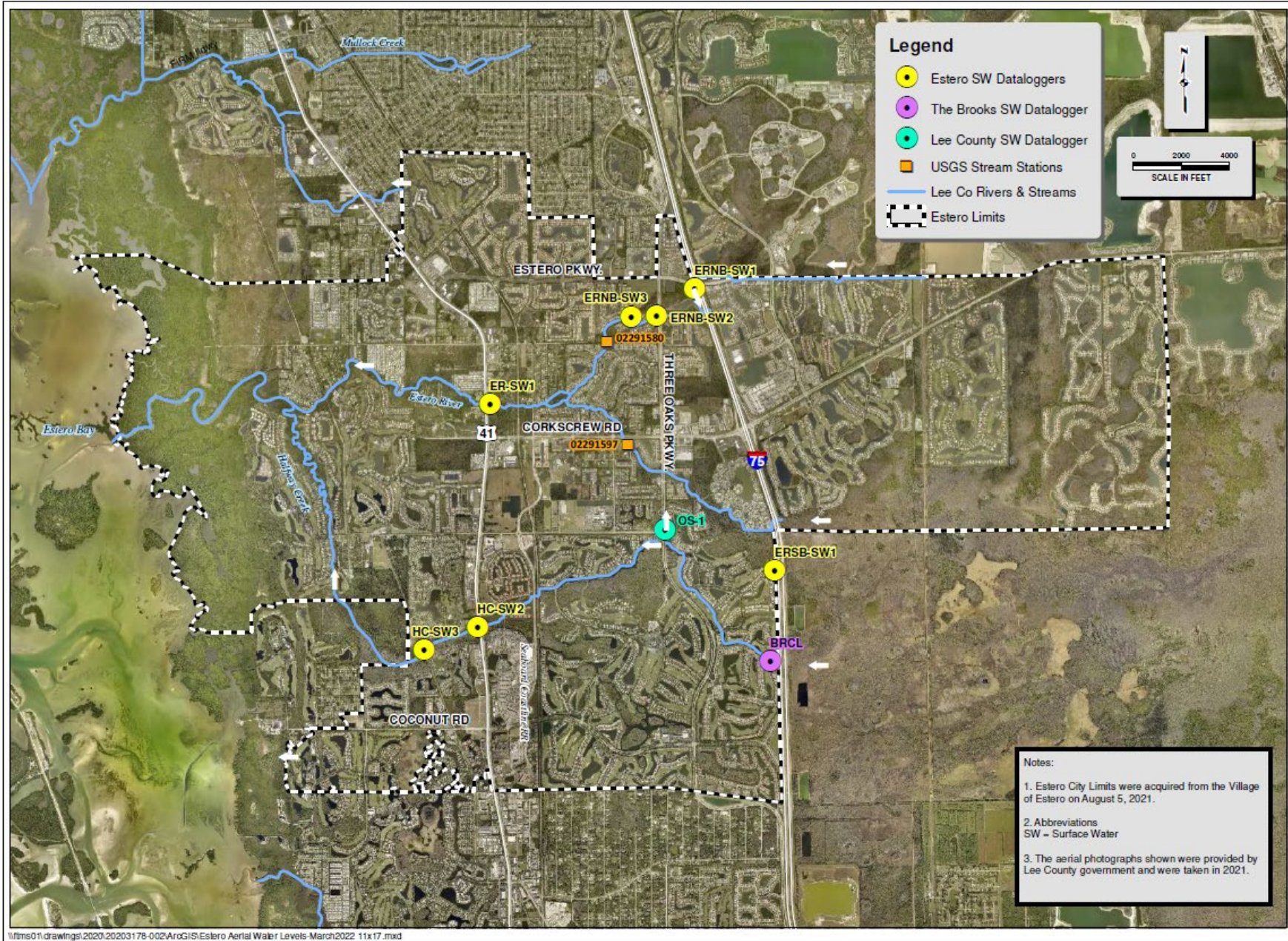
NO.	DATE	REVISIONS DESCRIPTION

DATE: June 2025
 PROJECT NO: 2022140-002
 FILE NO: -
 SCALE: As Shown

WATER QUALITY MONITORING LOCATION MAP

SHEET NUMBER
1

Attachment II to Exhibit A



JOHNSON ENGINEERING
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 3128 JOHNSON STREET
 P.O. BOX 1559
 FORT MYERS, FLORIDA 33902-1559
 PHONE: (239) 334-0645
 FAX: (239) 334-3661
 E.S. #542 & L.S. #545



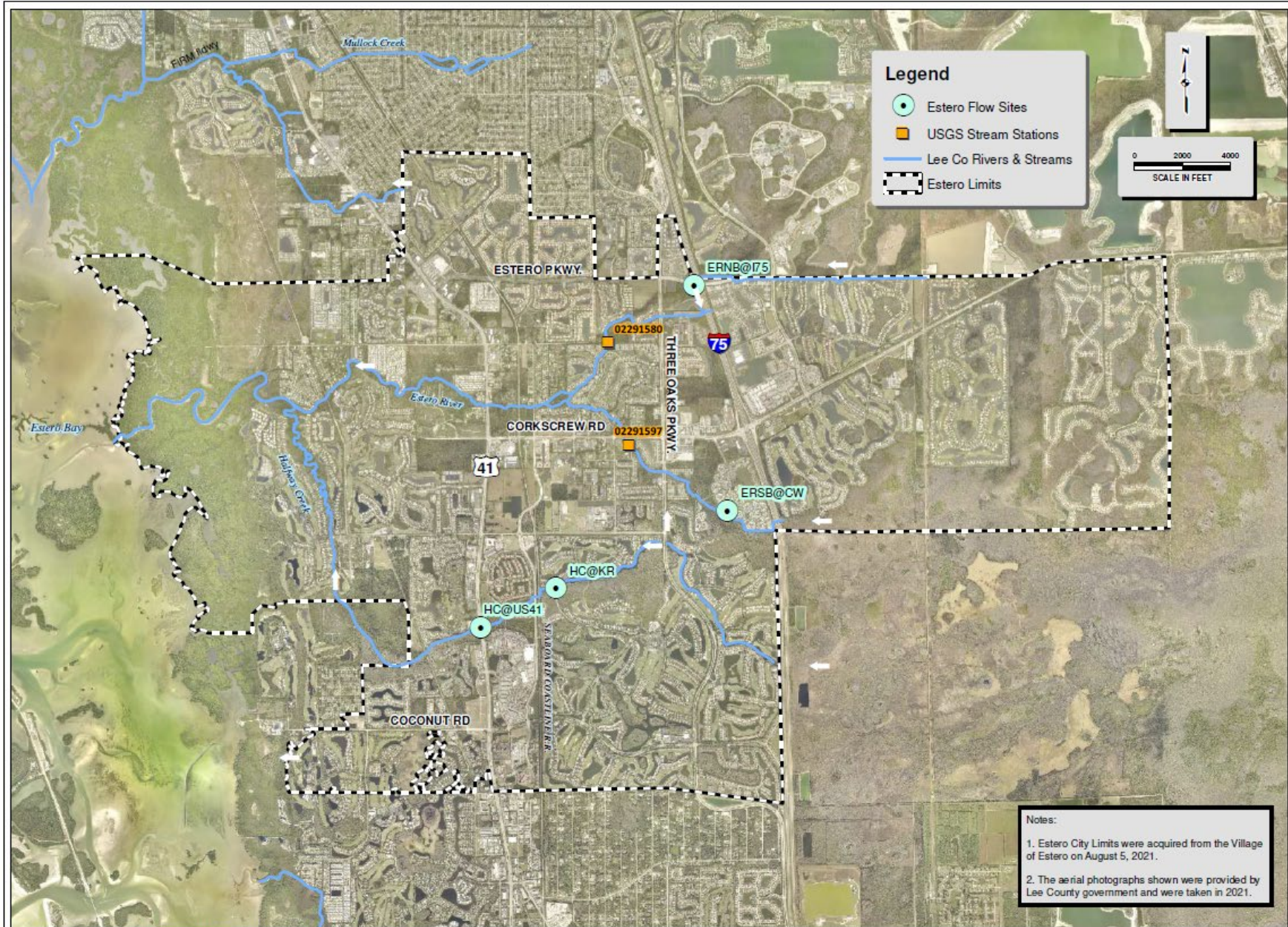
**WATER LEVEL MONITORING
 VILLAGE OF ESTERO**

NO.	DATE	REVISIONS DESCRIPTION

DATE: March 2022
 PROJECT NO.: 20200175-009
 FILE NO.:
 SCALE: As Shown

**WATER LEVEL MONITORING
 LOCATION MAP**

\\flms01\drawings\2020\20203178-002\ArcGIS\Estero Aerial Water Levels-March2022 11x17.mxd



Legend

- Estero Flow Sites
- USGS Stream Stations
- Lee Co Rivers & Streams
- Estero Limits

0 2000 4000
SCALE IN FEET

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FLOW MONITORING
 VILLAGE OF ESTERO

NO.	DATE	REVISION

DATE: June 2023
 PROJECT NO.: 20220140-002
 FILE NO.:
 SCALE: As Shown

Notes:

- Estero City Limits were acquired from the Village of Estero on August 5, 2021.
- The aerial photographs shown were provided by Lee County government and were taken in 2021.

FLOW MONITORING LOCATION MAP

W:\ms01\drawings\2022\20225140-002\ArcGIS\Estero Aerial Flows June 2023 11x17.mxd - pml