1410297646 Appendix A – Technical Specifications REMOVAL/REPLACEMENT AND INSPECTION OF JEA OWNED AIR RELEASE VALVES

PART 1 - GENERAL

1. GENERAL

The following supplemental specifications are intended to address the requirements and processes for the removal, replacement, and inspection of associated appurtenances to JEA owned air release valves on sewer force mains within the JEA wastewater collection system.

- a. Definitions
 - i. OWNER: JEA
 - ii. CONTRACTOR: Service and inspection provider for JEA owned air release valves (ARVs) for the OWNER.
 - iii. Not-to-Exceed: The CONTRACT shall not exceed the total annual budgeted amount of funds for this contract (\$300,000).

PART 2 - EXECUTION

2. SCOPE

The intent of this contract is for the CONTRACTOR to perform the physical removal and replacement of JEA owned air release valves (ARV) and inspection of associated appurtenances within assigned ARV Inspection routes within the JEA service territory. All assigned routes have been mapped and are grouped together geographically to reduce travel time between ARVs. To ensure all ARVs are in optimal condition this contract will require inspection with digital documentation of all appurtenances associated with the ARV such as the saddle connection (when visible), piping, isolation valve, the manhole/vault, and manhole/vault lid. If an ARV is in a condition where the removal of the ARV could lead to possible breakage leading to a sanitary sewer overflow (SSO) the condition of the appurtenance should be recorded in the inspection report and reported to the contract administrator for further action.

ARV Removal and Replacement

The ARV removal/replacement services shall include all work associated with the safe removal of each ARV connected to JEA sewer force mains above the ARV isolation valve and replace with either a new or refurbished ARV provided by JEA. The vast majority of ARVs are located in concrete vaults primarily consisting of precast manhole risers or rectangular structures which extend vertically from the force main to ground level or above. Access into the vault is through a standard manhole lid or hinged access hatch. When removal and replacement of the ARV requires entry into the manhole or vault, confined space entry protocols must be followed.

STOPPAGE OF WORK

A work stoppage will be issued for any of the following reasons if discovered by or reported to the Manager of Water & Sewer Preventative Maintenance for any of the following reasons: Working

unsafely in regards to improper MOT, and not following confined space entry protocol; multiple SSOs caused by the contractor for not taking proper precautions when removing/replacing ARVs; or multiple false flagging of ARVs for isolation valve failure. A stoppage of work will result in a meeting to cover the topic for the stoppage. Any item causing a stoppage of work that continues may result in a termination of contract.

MATERIALS PROVIDED BY JEA

JEA will provide the following items to the CONTRACTOR: new or refurbished, tested, and certified functioning ARVs based on the schedule provided to JEA two weeks in advance. ARV Inspection Route Maps created by JEA for ARV inspections.

ACCESS TO CONTRACTOR'S OPERATING RECORDS

The Contractor shall provide immediate access to its operating records as required by JEA and applicable regulatory agencies.

FACILITY LOCATIONS

Services rendered by the Contractor may involve all JEA owned facilities within our service area (primarily in Duval County, but includes Clay, St. Johns and Nassau Counties)

WORK AND QUANTITIES

Payment for mileage and travel time is not allowed. Unit prices entered on the Bid Workbook should encompass the cost of all work performed to complete each job assigned. Quantities for this contract are not guaranteed and are subject to the availability of funds.

CONTRACTOR shall provide:

- The services listed above.
- Provide data collection hardware (wifi compatible tablet that can access the internet in the field)
- All ancillary services, equipment and materials to complete this work including planning, permits, and any required traffic control.

CONTRACTOR shall develop an organized, systematic approach for removal/replacement and inspection of each ARV. Prior to the field assessment, the CONTRACTOR will review OWNER'S ARV Inspection Route Maps for the ARV removal/replacement and field inspection. It is the responsibility of the CONTRACTOR to confirm locations of all ARVs. All collected data shall be recorded electronically in the field by the CONTRACTOR in a database format, updated daily and submitted weekly to OWNER for review. The software program utilized by the contractor is a web based program controlled by JEA, where JEA will provide the contractor with a login ID and instructions to how to update the data form.

The following tasks associated with this project shall be provided by the CONTRACTOR and include, but are not limited to:

- Task 1 Pre-Field Work Planning: Review of available field data to develop a logical and comprehensive schedule for the ARV removal/replacement and field inspection of each ARV in coordination and with approval of OWNER. The inspection areas will be determined by OWNER. The CONTRACTOR's efforts will include, but are not limited to, planning for traffic control, access to secured areas, and emergency response planning if needed. Permits (if needed) will be coordinated with OWNER. Plan and schedule for the ARV removal/replacement and field inspection work shall be submitted for review a minimum of two weeks prior to scheduled start of field work. This submittal shall also include the computer tablets proposed for use so that they may be setup and confirmed operational. All costs associated with this activity are to be incorporated into the various unit price line items as described in Section 3 (MEASUREMENT AND PAYMENT)
- Task 2 Data Collection and Daily Reporting –The CONTRACTOR shall furnish
 electronic field-data collection equipment (i.e. computer tablet) for each QUALIFIED
 INSPECTOR to collect, store, and upload data formatted in a template approved by the
 OWNER. The data shall be uploaded and saved daily to the online project database
 provided by the OWNER. The data collection shall be divided into four sections. Digital
 photographs to include.
 - Pictures of existing site surroundings (ARV manhole: the frame looking N, E, S, and W)
 - o Picture of the ARV prior to removal and post replacement.
 - CONTRACTOR shall furnish field data collection equipment (i.e. computer tablet) that will be synced daily. Equipment shall comply with the following requirements:
 - o Connected to internet via Wi-Fi or cell phone network.
 - o Minimum storage space of sixty-four (64) gigabytes.
 - o Camera capable of taking digital photos.

The CONTRACTOR shall be responsible for completing all the ARV removal/replacement and field inspection work by no later than September 15, 2021. If additional crews are required to meet the contract schedule, the CONTRACTOR shall schedule and coordinate these activities such that the established inspection routes are completed in an order approved by the Manager of Water and Sewer Preventative Maintenance or his designee.

3. MEASUREMENT AND PAYMENT

Make payment on the basis of work actually performed completing each item in the Bid, such work including, but not limited to, the furnishing of all necessary labor, materials, equipment, transportation, cleanup, and all other appurtenances to complete the removal and replacement of ARVs and the inspection of associated appurtenances. Any other item not specifically pointed in the pay item descriptions below are to be considered incidental and incorporated into the price of the line items provided.

Pay item – ARVs Removed, Replaced, & Appurtenances Inspected
 Shall be paid for the total number of ARVs successfully removed, replaced with ARV provided by JEA, and all associated appurtenances inspected and documented digitally

2. Pay item – ARVs Flagged for Isolation Valve Failure

Shall be paid for the total number of ARVs flagged for an Isolation Valve Failure where the removal and replacement of the ARV was not completed due to the CONTRACTOR encountering a failed isolation valve where the removal of the ARV would result in an SSO. When this condition is encountered, the ARV shall be inspected fully and noted in the inspection report as "Isolation Valve Failure" and notify the JEA inspector so that JEA forces can replace the full ARV assembly. Payment will be made for the trip and data collection.

4. MINIMUM QUALIFICATIONS

Due to limited contracts of this nature found within the state of Florida, the CONTRACTOR shall provide references of work completed with ARVs proving that the contractor is knowledgeable of the components and function of ARVs and how to repair them.