

**WMATA FQ18152 Amendment 07 – Appendix B – Amendment 06 Appendix C Technical Specification Text Changes**

1. Section 1.1 Page 6, Paragraph 5, Amendment 06 Appendix C Technical Specification. Replace paragraph with the paragraph below.

The Contractor will be responsible for the delivery ~~of a turnkey of an integrated~~ solution and will be responsible for coordination with WMATA's current fare payment system provider. This coordination includes ~~legal agreements and responsibility for delivery of software modifications to the current fare system to support the system integration needed to deliver a solution where faregate functionality interfaces with the current fare payment application which manages WMATA's fare tariff and the distribution of web sales transactions, refunds, "hot listed" fare media, and transit benefit data to devices~~collaborative efforts to finalize an interface control document ICD, coordinated efforts to develop interfaces and test system interfaces, and coordinated efforts through system testing and deployment.

2. Section 2.1, Page 17, Paragraph 5, Amendment 06 Appendix C Technical Specification. Replace with the paragraph below.

Multiple faregates aligned in a row shall constitute a faregate array. Faregates shall be monitored and controlled centrally and locally. Release of faregate barriers for passage through a faregate aisle shall be controlled by the Cubic TR4 Payment Processing Target when a successful payment transaction is completed; from the station manager device when manually activated by the Station Manager; from a tactile emergency button inside the station kiosk; and, remotely from the Rail Operations Control Center (ROCC) or other authorized user workstation. Faregate software will control barriers based on fare validation information received from the Cubic TR4 PPT. Faregates shall also be interfaced with WMATA's emergency system and automatically open under emergency alarm system or power loss.

3. Section 2.9, Page 32, First paragraph, Amendment 06 Appendix C Technical Specification. Replace with the paragraph below.

~~WMATA will specify and procure POE switches to be incorporated into faregates to support PPT integration and to support the integration of PVs with Station Terminals. The contractor shall supply one POE-capable gigabit Ethernet switch per faregate aisle. The switch technical information shall be submitted to WMATA for review and approval. The PPTs associated with a single aisle and the faregate controller (SBC) for that aisle shall be connected to this switch via CAT6 cabling. All connected devices shall communicate with their respective back end systems through the switch, which shall be attached to the WMATA LAN/WAN infrastructure. Faregate SBCs shall communicate with the faregate control system back end and the PPTs shall communicate with the Nextfare 5 back end system. The Contractor will be responsible implementing current system modifications to~~

support this connectivity and for coordination with WMATA to establish IP addressing within WMATA's network. Faregate ~~SBC as well as~~ PPT communications to their controlling back end systems shall include secure authentication protocols.

4. Section 4.5.6, Page 67. First paragraph, Amendment 06 Appendix C Technical Specification. Replace with paragraph below.

The Contractor shall ~~design and conduct the~~provide on-site support for System Interface test to evaluate how well and accurately the equipment and software provided interfaces with the current fare payment application which will be planned and lead by the systems integrator. The individual tests within this Section shall be performed under varying conditions, using a statistically valid sample that will demonstrate all functions as specified for all fare payment applications and accepted WMATA fare media and fare products. The interfaces to be tested shall include all interfaces between the faregates, PPTs and the current fare payment system in WMATA's AFC simulation laboratory.

5. Section 4.5.6, Page 69, Amendment 06 Appendix C Technical Specification. Add text below to the end of the section.

Integration testing is expected to demonstrate the means by which the faregate connects to the PPT with the faregate and test their interactions. To effectively test the faregate system the payment target (PPT) component must connect via Ethernet/https to one limited copy of the central Nextfare 5 application. The integration testing is simply to ensure that the two components, PPT & faregate exercise all of their interface functionality per the ICD provided. The faregate vendor and the system integrator that provides the PPT will work together to create a stripped down copy of the current WMATA QA CC or production CC database and application and putting it on a laptop which will meet the integration testing environment requirements.

There will be 6 kits developed by the system's integrator in conjunction with the faregate provider and available to be exercised to test the functionality.

The full systems integration testing of all software and firmware updates will be conducted at WMATA's AFC Lab and the testing will verify all systems interfaces and fare operation functions. It is anticipated that the first round of testing may result in additional software or configuration changes and the base scope shall include provisions for completing two rounds of testing with a 30 period to implement changes for retesting. This retesting will be determined based on the severity of the defects and an agreed upon schedule of the fixes to be performed.

6. Section 8.1, Page 107, Paragraph 2, Amendment 06 Appendix C Technical Specification. Replace paragraph with the paragraph below.

At WMATA's sole discretion, the Contractor will be required to provide ongoing maintenance services. These optional maintenance services are grouped as follows:

- Parts warranty: Parts warranty is for the repair and replacement of all component parts that are not considered consumable and has an initial option period of 4 years that begins after the base one year option period is ended, and an additional 5 one year options.
- Field maintenance: Field maintenance is for all maintenance services including staffing and maintenance supplies, consumable parts, and tools and support for all device preventative and corrective maintenance.
- Software maintenance: Software maintenance is for the continuation of base software maintenance responsibilities for an additional 5 one year options.

~~Ongoing parts bench maintenance services will begin at the end of the one year parts warranty and extend for a base period of 4 years with an additional 5 one year options. Ongoing field maintenance service (corrective and preventative maintenance) for deployed devices will have an initial period of 5 years with an additional 5 one year options. WMATA will make the final determination of this option determine if initial maintenance options are to be exercised, not less than 180 days before planned final system acceptance.~~

~~WMATA requires the contractor to transition the responsibilities for these services to WMATA or to another WMATA-approved entity at the conclusion of the performance period of the Support Services Contracts. Accordingly, at the conclusion of the Support Services performance period, the Contractor shall, at no charge, turn over to WMATA all items used by the Contractor to perform the Support Services defined in this Section, including but not limited to, manuals, procedures, computers, applications, devices, tools and vehicles.~~

7. Section 8.2, Page 108. Paragraph 2, Amendment 06 Appendix C Technical Specification. Replace with paragraph below:

The Contractor shall submit a Spare Parts Catalog with the pricing and shipping requirements for each catalog item. The Spare Parts Catalog shall clearly distinguish parts that are repairable from consumable parts that must be replaced periodically or upon failure. **CDRL 8.2.** The Contractor shall also provide recommended spare parts and maintenance consumable items to support one year maintenance service for installed devices. **CDRL 8.3.** ~~At WMATA's sole discretion, the Contractor shall provide continued parts repair and replacement for an initial period of 4 years with an additional 5 one year option periods~~

8. Section 8.3, Page 110, Paragraph 3, Amendment 06 Appendix C Technical Specification. Replace with paragraph below.

The Contractor shall also respond to software changes and system enhancements as requested by WMATA. Per this agreement a labor pool of ~~4000~~2000 Software Engineering and

Programming hours will be available to be used at WMATA's discretion for the development and testing of software changes and system enhancements. All other Software Maintenance and support requests will be delivered as part of the annual Software Maintenance Agreement which will be invoiced monthly at an agreed upon flat fee.