SECTION 01 10 00 - SUMMARY

PART 1 - GENERAL

1.1 SUMMARY

- A. This Section includes the following:
 - 1. Work covered by the Contract Documents.
 - 2. Type of the Contract.
 - 3. Phased construction.
 - 4. Work under separate contracts.
 - 5. Owner-furnished products.
 - 6. Access to the site.
 - 7. Owner's occupancy requirements.
 - 8. Work restrictions.
 - 9. Specification and drawing conventions.
- B. Related Sections include the following:
 - 1. Section 015000 "Temporary Facilities and Controls" for limitations and procedures governing temporary use of Owner's facilities.

1.2 PROJECT INFORMATION

- A. Project Identification: EQIX flexible data center.
 - 1. Project Location: Ashburn, VA.
- B. Owner: Equinix, One Lagoon Drive, Fourth Floor; Redwood City, CA 94065.
- C. Architect: Sheehan Nagle Hartray Architecture, 30 West Monroe Street, Suite 900, Chicago, IL 60603.
 - 1. Throughout this document references to "Architect" or "Engineer" mean the Architect/Engineer noted above.
- D. Design-Build Engineers:
 - 1. Mechanical and Plumbing: Southland.
 - 2. Electrical: Rosendin.
 - 3. Throughout this document references to "Engineer" mean the Engineer noted above.

1.3 WORK COVERED BY CONTRACT DOCUMENTS

- A. The Work consists of the following:
 - 1. The Data Center Building is a two (2) story facility accommodating colocation space for approximately 2,880 server cabinets (2,500 minimum) divided into three (3) modules. The two (2) story colocation space will be flanked by a two (2) story electrical bar running along one side and a two (2) story mechanical bar. Shipping and Receiving area is sized

- for three (3) loading docks. Included in the building program is a two (2) story Office Bar containing the Security, Customer Care, Building Operations and Flex Office functions. This Office Bar will be designed to be versatile and capable of accommodating site-specific property restrictions.
- 2. The proposed Data Center Building will have a footprint of approximately 90,000 GSF per story, for a total area of approximately 180,000 GSF. The building will be constructed with structural steel supported on a concrete foundation. Overall mechanical and electrical redundancy will be provided at N+1. The revenue cabinet power density required for the colocation space is 3.5 kW/cabinet in the final build-out. PUE for each building will not exceed 1.4.
- 3. The proposed Data Center Building will be designed to LEED Silver.

1.4 TYPE OF CONTRACT

A. Project will be constructed under a single prime contract.

1.5 PHASED CONSTRUCTION

- A. The Work shall be conducted in three phases, with each phase substantially complete as indicated:
 - 1. Phase 1: Phase 1 will include Owner's standard customer care facilities, executive offices, open office areas, conference rooms, mezzanine level office space and a loading dock with associated shipping and receiving area. Mechanical and Electrical spaces will be included to support the approx. 1020 racks in the Phase 1A Colocation space.
 - 2. Coordinate future phases with Owner.
- B. Before commencing Work of each phase, submit an updated copy of Contractor's construction schedule showing the sequence, commencement and completion dates for all phases of the Work.

1.6 WORK UNDER SEPARATE CONTRACTS

- A. General: Cooperate fully with separate contractors so work on those contracts may be carried out smoothly, without interfering with or delaying work under this Contract. Coordinate the Work of this Contract with work performed under separate contracts.
- B. Concurrent Work: Owner will perform the following construction operations at Project site. Those operations will be conducted simultaneously with work under this Contract.
 - 1. Security.
 - 2. Commissioning.
 - 3. Furniture.
 - 4. Audio/Visual.
 - 5. Data cabinet installation.
 - 6. Waste facility compactors.

1.7 OWNER-FURNISHED PRODUCTS

- A. Owner will furnish products indicated. The Work includes providing support systems to receive Owner's equipment and making plumbing, mechanical, and electrical connections.
 - Owner will arrange for and deliver Shop Drawings, Product Data, and Samples to Contractor.

- 2. Owner will arrange and pay for delivery of Owner-furnished items according to Contractor's Construction Schedule.
- 3. After delivery, Owner will inspect delivered items for damage. Contractor shall be present for and assist in Owner's inspection.
- 4. If Owner-furnished items are damaged, defective, or missing, Owner will arrange for replacement.
- 5. Owner will arrange for manufacturer's field services and for delivery of manufacturer's warranties to Contractor.
- 6. Owner will furnish Contractor the earliest possible delivery date for Owner-furnished products. Using Owner-furnished earliest possible delivery dates, Contractor shall designate delivery dates of Owner-furnished items in Contractor's Construction Schedule.
- 7. Contractor shall review Shop Drawings, Product Data, and Samples and return them to Engineer/Architect noting discrepancies or anticipated problems in use of product.
- 8. Contractor is responsible for receiving, unloading, and handling Owner-furnished items at Project site.
- 9. Contractor is responsible for protecting Owner-furnished items from damage during storage and handling, including damage from exposure to the elements.
- 10. If Owner-furnished items are damaged as a result of Contractor's operations, Contractor shall repair or replace them.
- 11. Contractor shall install and otherwise incorporate Owner-furnished items into the Work.

B. Owner-Furnished Products:

- 1. Mechanical Items as indicated on Drawings and as follows:
 - a. Cooling Towers
 - b. Chillers
 - c. Thermal Energy Storage Tanks
 - d. Air Handling Units
 - e. Underground water storage tanks.
 - f. Condenser.
 - g. Miscellaneous exhaust fans.
 - h. Urea totes.
- 2. Electrical Items as indicated on Drawings and as follows:
 - a. Diesel Generators
 - b. Power quality monitoring system.
 - c. Battery monitoring system
 - d. UPS single module system (SMS) with switchboard.
 - e. UPS multi-module system and SCC bypass switchboard.
 - f. DC power system.
 - g. Medium-voltage switchgear.
 - h. Secondary unit substations.
 - i. Static transfer switches.
 - j. Switchboards with ATS controls.
 - k. Swing bus, switchboard, load bank.
 - I. Power distribution units.
 - m. Remote power panels.
 - n. Transformers
 - o. Fuel storage tanks.

1.8 ACCESS TO THE SITE

- A. General: Contractor shall have full use of Project site for construction operations during construction period. Contractor's use of Project site is limited only by Owner's right to perform work or to retain other contractors on portions of Project.
 - 1. Observe all Rules and Regulations as indicated in attachment following this section.

1.9 COORDINATION WITH OCCUPANTS

- A. Owner Occupancy of Completed Areas of Construction: Owner reserves the right to occupy and to place and install equipment in completed areas of building, before Substantial Completion, provided such occupancy does not interfere with completion of the Work. Such placement of equipment and partial occupancy shall not constitute acceptance of the total Work.
 - 1. Engineer/Architect will prepare a Certificate of Substantial Completion for each specific portion of the Work to be occupied before Owner occupancy.
 - 2. Obtain a Certificate of Occupancy from authorities having jurisdiction before Owner occupancy.
 - Before partial Owner occupancy, mechanical and electrical systems shall be fully operational, and required tests and inspections shall be successfully completed. On occupancy, Owner will operate and maintain mechanical and electrical systems serving occupied portions of building.
 - 4. On occupancy, Owner will assume responsibility for maintenance and custodial service for occupied portions of building.

1.10 WORK RESTRICTIONS

- A. Work Restrictions: Coordinate work restrictions, including but not limited to, hours of on-site work, existing utility interruptions, on-site parking requirements, and security requirements with Owner.
 - 1. Comply with limitations on use of public streets and with other requirements of authorities having jurisdiction.
- B. Nonsmoking Building: Smoking is not permitted within the building or within 25 feet of entrances, operable windows, or outdoor air intakes.

1.11 SPECIFICATION AND DRAWING CONVENTIONS

- A. Specification Format: The Specifications are organized into Divisions and Sections using the 33-division format and CSI/CSC's "MasterFormat" numbering system.
 - Section Identification: The Specifications use Section numbers and titles to help cross-referencing in the Contract Documents. Sections in the Project Manual are in numeric sequence; however, the sequence is incomplete because all available Section numbers are not used. Consult the table of contents at the beginning of the Project Manual to determine numbers and names of Sections in the Contract Documents.
 - 2. Division 01: Sections in Division 01 govern the execution of the Work of all Sections in the Specifications.
- B. Specification Content: The Specifications use certain conventions for the style of language and the intended meaning of certain terms, words, and phrases when used in particular situations. These conventions are as follows:

- 1. Abbreviated Language: Language used in the Specifications and other Contract Documents is abbreviated. Words and meanings shall be interpreted as appropriate. Words implied, but not stated, shall be inferred as the sense requires. Singular words shall be interpreted as plural, and plural words shall be interpreted as singular where applicable as the context of the Contract Documents indicates.
- Imperative mood and streamlined language are generally used in the Specifications.
 Requirements expressed in the imperative mood are to be performed by Contractor.
 Occasionally, the indicative or subjunctive mood may be used in the Section Text for clarity to describe responsibilities that must be fulfilled indirectly by Contractor or by others when so noted.
 - a. The words "shall," "shall be," or "shall comply with," depending on the context, are implied where a colon (:) is used within a sentence or phrase.
- C. Drawing Coordination: Requirements for materials and products identified on Drawings are described in detail in the Specifications. One or more of the following are used on Drawings to identify materials and products:
 - 1. Terminology: Materials and products are identified by the typical generic terms used in the individual Specifications Sections.
 - 2. Abbreviations: Materials and products are identified by abbreviations as indicated on Sheet A001.
 - 3. Keynoting: Materials and products are identified by reference keynotes referencing Specification Section numbers found in this Project Manual.

PART 2 - PRODUCTS (Not Used)

PART 3 - EXECUTION (Not Used)

END OF SECTION