

BURLINGTON IAP (ANG) Electric Distribution System

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J10 Burlington IAP(ANG) Electric Distribution System

J10.1 BURLINGTON IAP (ANG) Overview

Burlington IAP (ANG) is located inside the city limits of Burlington, Vermont. Burlington is approximately 45 miles northwest of Montpelier, which is the capital of Vermont. The Vermont ANG host unit is the 158th Fighter Group. The base is 223 acres in size, which is leased land from the City of Burlington. There are a total of 40 facilities on base, 19 industrial, 18 administrative and 3 services with no family housing. Current base population is approximately 400 personnel during non-drill duty days and increases to approximately 1000 personnel on a drill duty weekend that occurs once per month.

Future expansion plans (not yet finalized) include the demolition of three structures and construction of two maintenance facilities. It is anticipated that there will be a net gain of approximately 30,000 square feet in facilities.

J10.2 Electric Distribution System Description

The Burlington IAP (ANG) electric distribution system consists of all appurtenances physically connected to the distribution system from the point in which the distribution system enters the Installation and Government ownership currently starts to the point of demarcation, defined by the Right of Way. The system may include, but is not limited to, transformers, circuits, protective devices, utility poles, ductbanks, switches, street lighting fixtures, and other ancillary fixed equipment. The actual inventory of items sold will be in the bill of sale at the time the system is transferred. The following description and inventory is included to provide the Contractor with a general understanding of the size and configuration of the distribution system. The Government makes no representation that the inventory is accurate. The Contractor shall base its proposal on site inspections, information in the technical library, other pertinent information, and to a lesser degree the following description and inventory. Under no circumstances shall the Contractor be entitled to any service charge adjustments based on the accuracy of the following description and inventory.

Specifically excluded from the electric distribution system privatization are:

- Street lighting
- Parking area lighting
- Airfield lighting
- Emergency backup generators

J10.2.1 Electric Distribution System Fixed Equipment Inventory

J10.2.1.1 Description

The Burlington IAP (ANG) Electrical Distribution System is Delta configured and distributed at

4160 v. System is 100% running underground in PVC ductile (thin walled) conduit encased in concrete. System contains approximately 15,171 LF of circuits installed between 1985 and 1996. There are approximately 29 pad mounted transformers that range from 25 to 500 kva installed between 1970 to 2000. There are approximately 10 pre-cast concrete electrical manholes that support the underground circuits that are 6 ft deep and 11 pad mounted electrical vaults. The system also contains 6 switches rated at 600 amps located throughout the distribution system.

Burlington IAP (ANG) has no power generation capabilities except for emergency backup generators that fall outside the scope of this utility's privatization.

J10.2.1.2 Inventory

Table 1 provides a general listing of the major electric distribution system fixed assets for the Burlington IAP (ANG) electric distribution system included in the sale.

TABLE 1
Fixed Inventory
Electric Distribution System Burlington IAP (ANG)

Item	Size	Quantity	Unit	Approximate Year of Construction
Underground Circuits				
3ph, 4w, 15000V, in conduit	1/0 CU	12,471	LF	1996
3ph, 4w, 15000V, in conduit	1/0 CU	2,700	LF	1985
3ph, 4w, 15000V, direct bury	2/0 CU	300	LF	1997
Underground Conduit				
PVC encased in concrete	4"	11,771	LF	1996
PVC encased in concrete	5"	4,200	LF	1996
Overhead Circuits				
	AWG			
3 ph, 3 w, conductor, 15kva	#1/0	100	LF	1995
3ph, 1 w	#1/0	2,700	LF	1985
Transformers				
	Nom kVA			
3 Phase Oil filled, pad mounted	45	1	EA	1996
3 Phase Oil filled, pad mounted	75	1	EA	1996
3 Phase Oil filled, pad mounted	112.5	5	EA	1996
3 Phase Oil filled, pad mounted	150	6	EA	1996
3 Phase Oil filled, pad mounted	225	2	EA	1996
3 Phase Oil filled, pad mounted	225	1	EA	1993
3 Phase Oil filled, pad mounted	225	1	EA	1982

Item	Size	Quantity	Unit	Approximate Year of Construction
3 Phase Oil filled, pad mounted	300	1	EA	2000
3 Phase Oil filled, pad mounted	300	2	EA	1996
3 Phase Oil filled, pad mounted	300	1	EA	1992
3 Phase Oil filled, pad mounted	300	1	EA	1970
3 Phase Oil filled, pad mounted	500	1	EA	1996
3 Phase Oil filled, pad mounted	500	1	EA	1993
1 Phase Oil filled, pad mounted	25	5	EA	1996
1 Phase Oil filled (8'x8'x8' concrete pit)	50	2	EA	1985
Switches				
	Type			
Pad mtd, two way interrupt	600 amp	6	EA	1996
Vaults				
Pad Mtd Terminal Cabinets	22"X66"X30"	11	EA	1996
Manholes				
Pre-cast concrete	6'X6'X6'	7	EA	1996
Pre-cast concrete	6'x8'x6'	3	EA	1996
Handholes				
Pre-cast Quartzite	3'x5'x3'	2	EA	1995

Notes:

AWG = American Wire Gauge

ea = each

LF= linear feet

Nom kVA = nominal kilovolt-amperes

ph - phase

V = volts

w = wire

J10.2.2 Electric Distribution System Non-Fixed Equipment and Specialized Tools

Table 2 lists other ancillary equipment (spare parts) and **Table 3** lists specialized vehicles and tools included in the purchase. Offerors shall field verify all equipment, vehicles, and tools prior to submitting a bid. Offerors shall make their own determination of the adequacy of all equipment, vehicles, and tools.

TABLE 2

Spare Parts

Electric Distribution System Burlington IAP (ANG):

Qty	Item	Make/Model	Description	Remarks
None				

TABLE 3

Specialized Vehicles and Tools

Electric Distribution System *Burlington IAP (ANG)*

Description	Quantity	Location	Maker
None			

J10.2.3 Electric Distribution System Manuals, Drawings, and Records

Table 4 lists the manuals, drawings, and records that will be transferred with the system.

TABLE 4

Manuals, Drawings, and Records

Electric Distribution System Burlington IAP (ANG)

Qty	Item	Description	Remarks
1		Utility Master Drawings	AutoCADD Version 2000
2		Underground Electrical Distribution Repair, Project CRUZ90205, dated March 1994	

J10.3 Specific Service Requirements

The service requirements for the Burlington IAP (ANG) electric distribution system are as defined in the Section C, *Description/Specifications/Work Statement*. The following requirements are specific to the Burlington IAP (ANG) electric distribution system and are in addition to those found in Section C. If there is a conflict between requirements described below and Section C, the requirements listed below take precedence over those found in Section C.

- Although the duct banks are being turned over to the successful offeror, those ducts not currently used for electrical lines will be reserved for the exclusive use of the government. Additional ducts may be made available to the successful offeror at the discretion of the Contracting Officer.
- Government reserves the right to provide power to the base electrical distribution system during periods of extended power outages or during quarterly disaster preparedness/readiness exercises. To accomplish this the government will install an isolation switch near the main substation in order to connect a government owned generator.

J10.4 Current Service Arrangement

- Green Mountain Power Corp
- Annual consumption in 1999 was 2,868,750 kwh per year
- Peak demand is approximately 267,000 kwh/month.

J10.5 Secondary Metering

J10.5.1 Existing Secondary Meters

Table 5 provides a listing of the existing (at the time of contract award) secondary meters that will be transferred to the Contractor. The Contractor shall provide meter readings for all secondary meters IAW Paragraph C.3 and J10.6 below.

TABLE 5
Existing Secondary Meters
Electric Distribution System BURLINGTON IAP (ANG)

Meter Location	Meter Description
None	

J10.5.2 Required New Secondary Meters

The Contractor shall install and calibrate new secondary meters as listed in **Table 6**. New secondary meters shall be installed IAW Paragraph C.13, Transition Plan. After installation, the Contractor shall maintain and read these meters IAW Paragraphs C.3 and J10.6 below.

NONE

New Secondary Meters
Electric Distribution System *Burlington IAP (ANG)*

Meter Location	Meter Description
Install meters on each of four lift stations (adjacent to existing Fire Station Facility 60, adjacent to existing Hydrazine Facility 332, Facility 2855 Main Pump Lift Station, Facility 2856 Munitions Lift Station)	3 Phase, Kilowatt Hour

J10.6 Monthly Submittals

The Contractor shall provide the Government monthly submittals for the following:

1. Invoice (IAW G.2). The Contractor's monthly invoice shall be presented in a format proposed by the Contractor and accepted by the Contracting Officer. Invoices shall be submitted by the 25th of each month for the previous month. Invoices shall be submitted to the person identified at time of contract award.

2. **Outage Report.** The Contractor’s monthly outage report will be prepared in the format proposed by the Contractor and accepted by the Contracting Officer. Outage reports shall be submitted by the 25th of each month for the previous month. Outage reports shall be submitted to the person identified at time of contract award.
3. **Meter Reading Report.** The monthly meter reading report shall show the current and previous month readings for all secondary meters. The Contractor’s monthly meter reading report will be prepared in the format proposed by the Contractor and accepted by the Contracting Officer. Meter reading reports shall be submitted by the 15th of each month for the previous month. Meter reading reports shall be submitted to the person identified at time of contract award.
4. **System Efficiency Report.** If required by Paragraph C.3, the Contractor shall submit a system efficiency report in a format proposed by the Contractor and accepted by the Contracting Officer. System efficiency reports shall be submitted by the 25th of each month for the previous month. System efficiency reports shall be submitted to the person identified at time of contract award.

J10.7 Energy Saving Projects

IAW Paragraph C.3, Requirement, the following projects have been implemented on the distribution system by the Government for energy conservation purposes.

NONE

J10.8 Service Area

IAW Paragraph C.4, Service Area, the service area is defined as all areas within the Burlington IAP (ANG) boundaries.

J10.9 Off-Installation Sites

No off-installation sites are included in the sale of the Burlington IAP (ANG) electric distribution system.

J10.10 Specific Transition Requirements

IAW Paragraph C.13, Transition Plan, **Table 7** provides a listing of service connections and disconnections required upon transfer.

TABLE 7
Service Connections and Disconnections
Electric Distribution System Burlington IAP (ANG)

Location	Description
None	

J10.11 Government Recognized System Deficiencies

Table 8 provides a listing of system improvements that the Government has planned. The Government recognizes these improvement projects as representing current deficiencies associated with the Burlington IAP (ANG) electric distribution system. If the system is sold, the Government will not accomplish these planned improvements. The Contractor shall make a determination as to its actual need to accomplish and the timing of any and all such planned improvements. Capital upgrade projects shall be proposed through the Capital Upgrades and Renewal and Replacement Plan process and will be recovered through Schedule L-3. Renewal and Replacement projects will be recovered through Sub-CLIN AB.

TABLE 8
System Deficiencies
Electric Distribution System Burlington IAP (ANG)

Project Location	Project Description
Bldg 310, Dining Hall/Clinic	Verify the integrity of and repair (as necessary) three splices made (when the line was originally installed in 1995) in the 4,160 kVA line located in a manhole across from building 310.