Overview

This document outlines the general requirements and procedures for City of Flora Electric Department (Utility) to provide primary metered services to electric customers. A primary metered customer (Customer) is defined as a customer that is metered at the Utility’s distribution customer voltage, also known as primary or medium voltage.

In order to insure that the guidelines contained within this document are followed, Customer should contact the Flora Superintendent of Public Services during the design phase of new projects or as soon as practical. The Superintendent of Public Services can be reached at 618-662-4625.

General Utility and Customer Requirements

- The Utility shall install, own, operate and maintain all electric distribution facilities on the source (or line) side of the primary meter.
- Due to personnel safety issues and differing design/code requirements, Utility personnel will not perform any work on Customer facilities, unless as defined under a separate agreement.
- The Customer shall install, own, operate and maintain all electric distribution facilities downstream (Customer Side) of the primary meter. Ownership includes the responsibilities of design, permitting, procurement, installation, future replacement, and ongoing maintenance. The Customer will be responsible for hiring, or contracting with, qualified electricians to install, operate and maintain their equipment.
- The Customer may be responsible for costs associated with construction power or line extension costs upstream of the primary meter if needed. Please refer to the City of Flora Electric System Service Rules.
- The location of the primary metering equipment and all associated utility distribution equipment required for establishing a primary metered service shall be coordinated with the Superintendent of Public Services.
- The Customer’s system will be subject to inspection and approval by Utility for the metering, protective devices, and interconnection facilities.

Design Standards

- Construction and operation of Customer facilities must be consistent with the National Electric Code (NEC) with jurisdiction by the responsible local code enforcement agency (City of Flora).
- The Customer's electric distribution system must be designed to match Utility's 12,470 volts and all transformers must be in the delta-wye configuration.
- The Customer’s electric distribution system must be designed to prohibit 'feedback' into the Utility’s system. Any operation of the Customer's primary system must be coordinated with the Superintendent of Public Services.
- All primary metering equipment will be supplied and billed to the customer at cost.
City of Flora Electric Department
Primary Metered Service Requirements and Procedures

Operational Procedures

Customer Contact Information

The Customer must provide Utility with the appropriate contact personnel for purposes of coordinating and accessing Customer owned facilities containing switchgear or switchboards. Customer will be responsible for contacting the Superintendent of Public Services prior to performing any work on the Customer Side of the system that may impact Utility’s distribution system. Customer must notify the Superintendent of Public Services at least 48 hours in advance at 618-662-4265.

Switching and Tagging

Safety of the Utility’s employees and contractors is paramount. To this end, the required uniform method of switching and tagging is defined below. As part of these procedures, Utility will require coordinated access to Customer’s main switchgear or transformer.

Customer’s switchgear must be capable of providing the following:

- Main utility breaker must be capable of providing a visible open
- A means for grounding out the line-side cable
- A means of attaching a Utility lock during coordinated efforts, such as scheduled or unplanned outages

Terminations

The Customer will be responsible for terminating their primary voltage conductors on the load-side of the primary metering cabinet (required for pad-mounted primary meter enclosures) or the load side of the primary riser switch (required for pole-mounted primary metering). The primary metering cabinet shall contain a current transformer and two bushings per phase (one for Utility and one for the Customer to terminate their respective conductors). The lugs on the termination should be NEMA rated. This work must be performed by a licensed electrical contractor. See Attachments A and B for pad mount and pole mount examples.

Customer-owned Generation

Utility prefers and encourages the use of an open-transition (non-paralleled operation) design if the Customer decides to install generating facilities for standby or back-up purposes. An Interconnection Agreement between the Customer and Utility is required if the Customer elects a closed-transition (grid-tied or paralleled operation) system. This agreement must be executed before parallel operation of the generating facilities can commence. Please refer to the City of Flora’s Interconnection Agreement.
Protection Coordination & Automatic Transfer Schemes

All Customer switchgear settings and protective devices shall be designed to coordinate with Utility’s system. Contact the Superintendent of Public Services to provide additional information, and to ensure compliance to Utility standards.

Energizing Equipment

Before energizing the primary metered service, the following shall be required:

- To establish an account, customer shall contact City Hall at 618-662-8313.
- Customer must install a permanent address label on meter base (meter base labeling must match labeling on Customer switchgear).
- Customer should contact the Superintendent of Public Services at least 2 weeks before the requested “need date” for energization to allow for scheduling and coordination.
- Utility personnel and Customer’s electrical contractor will perform an inspection/test of the following upon energization:
  1. Voltage Test
  2. Phase Test
  3. Inspect Terminations
  4. Visual open capability, at approved Customer location
  5. Ability for City to tag and lock equipment, at approved Customer locations.
  6. Ability for City to place a ground, at approved Customer location.

Continuing Operations

- Utility cannot guarantee the availability or continuity of delivery of electric service.
- The Customer is responsible for providing phase-loss and surge protection systems for Customer owned equipment.
- In the event of an outage, Utility will make all reasonable, safe and prudent efforts to quickly restore power to the line side of the primary meter. The Customer will be treated on a basis equal to other City customers in determining restoration priority.
- If Customer facilities are isolated by local fuses or other protective devices, or if it is perceived that any damage may have occurred to Customer equipment, Utility will require a qualified, authorized Customer representative to approve reenergization of their facilities by Utility. Please refer the City of Flora’s Restoration Release, Hold Harmless and Indemnification Agreement.
Continuing Operations

- Utility may disconnect service to Customer, if at any time and in the sole opinion of Utility, the Customer facilities are presenting a public safety hazard or are causing an adverse reliability or power quality impact to the Utility Electric Distribution System or to other Utility customers.

Primary metered rate

- A separate rate structure applies to primary metered electric services. Please refer to the City of Flora Electric Rate Ordinance.

Signed and delivered this _______, day of ________________________, 20____.

________________________________ ______________________________
Print Name Title

________________________________ ______________________________
Signature Telephone Number
Attachment A – Pad Mount Primary Metering

ELECTRIC PRIMARY METERING

SIDE VIEW

WIRING DIAGRAM 4–WIRE

REAR VIEW

FRONT VIEW
Attachment B – Pole Mount Primary Metering