

WIRING RULES AND REGULATIONS OF TOMBIGBEE ELECTRIC POWER ASSOCIATION

The following rules and information are issued to make it possible for anyone engaged in electrical wiring or installation of electrical equipment to comply with the service requirements as readily as possible. All building contractors, electricians, and other planning new construction or altering and rewiring existing structures should be familiar with the following requirements. Situations pertaining to electric service not covered by the following rules should be taken up with TEPA before final plans are made.

In recognition of the continuing trend toward greater use of electricity in the home, TEPA advises all homeowners and wiring contractors to give serious consideration to the provision of adequate capacity in their service entrance. Present day appliances and household equipment have now developed to the point that proper sizing of service equipment is needed to provide the needed capacity for even the smallest of homes. Where electric heat is installed 100 ampere service equipment is not adequate for most homes.

The contractor/owner shall be responsible for complying with the minimum standards for sizing service equipment according to N.E.C. 230-79. You may also be required to comply with local ordinances adopted by municipal or county governments.

**Table 1.
RESIDENTIAL SINGLE PHASE SERVICE CONDUCTOR TYPES AND SIZES (RHW-
THW-THWNTHHN-XHHW)**

Service Rating	Conductor Size		Neutral		Bare Copper Ground
	Copper	Aluminum	Copper	Aluminum	
100 amp	#3	#2	#3	#2	#6
200 amp	2/0	4/0	#2	1/0	#4
400 amp	500 mcm	600 mcm	250 mcm	350 mcm	#2

RESIDENTIAL SERVICE CONNECTIONS

A. Point of Attachment of Association Wires to Building.

No building shall be supplied through more than one service drop (NEC 230-2) except for the purpose listed in section (NEC 230-2).

Point of attachment shall be a minimum of 10 feet clearance from ground (NEC 230-24 and 230-26) (See Sketch #1). Where 10 feet clearance cannot be obtained from weatherhead to finished grade (ground level), a mast type riser is required to obtain the required height. It shall be a 2-inch rigid conduit or larger and extend through the roof a minimum of 18 inches (See Sketch #2). Service entrance wires shall extend past weatherhead a minimum of 15 inches.

B. Location of meter.

It shall be installed at a point on the outside wall of the building and shall not be more than six (6) feet nor less than five (5) feet above ground level measured from center of meter socket. Open car porches are considered as being outside the building.

The meter shall be accessible to the meter reader and other employees of TEPA at all times. If the building where the meter is located is altered such that proper meter access is prevented or if required mounting heights cannot be met, the customer shall be responsible for locating the meter to an accessible location on the building, or installed on a meter pole.

It shall not be placed in a location where it is subject to the action of water running off a roof.

TEPA will provide to its members either a 100 amp or 200 amp single phase meterbase.

REMODELING OLD WIRING

When remodeling an old service entrance, it will be treated as a new service and will be subject to the above rules and regulations.

All entrance cable shall be run flat against the building and fastened with approved cable clamps. These clamps are to be spaced not more than two feet apart.

POLE METER INSTALLATIONS

1. The meter socket shall be installed not more than six (6) feet or less than five (5) feet from ground level measuring from center of meter socket.
2. The weatherhead shall be six (6) inches below the lowest secondary wire and four (4) feet of wire shall extend past the weatherhead.
3. The conduit shall be of size called for in the National Electric Code for the number and size of wires being used.
4. Metering equipment shall be grounded.

Refer to Sketch #3.

GROUNDING

The three methods of grounding approved by TEPA are: service entrance switch ground, meter base ground, and at the weatherhead.

Grounding conductors shall be sized according to Table 1. (Residential Single Phase Service Conductor Types and Sizes).

The ground rod shall be in one piece of 1/2 inch or larger nonferrous or 5/8 inch galvanized ferrous metal rod not less than eight (8) feet long with approved clamp.

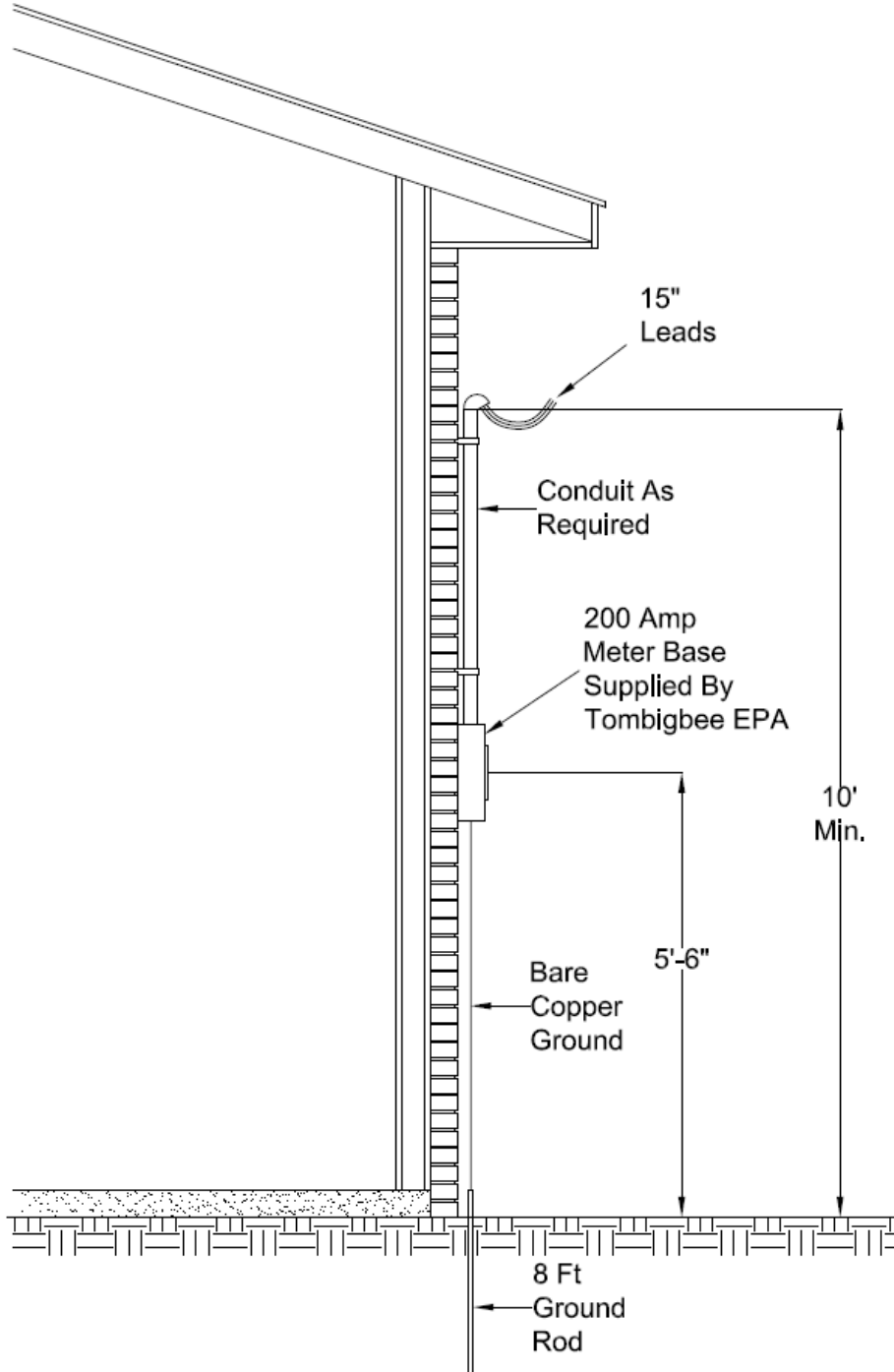
All water systems with ten (10) feet or more of metal pipe buried should be bonded to the driven ground.

PROTECTIVE EQUIPMENT

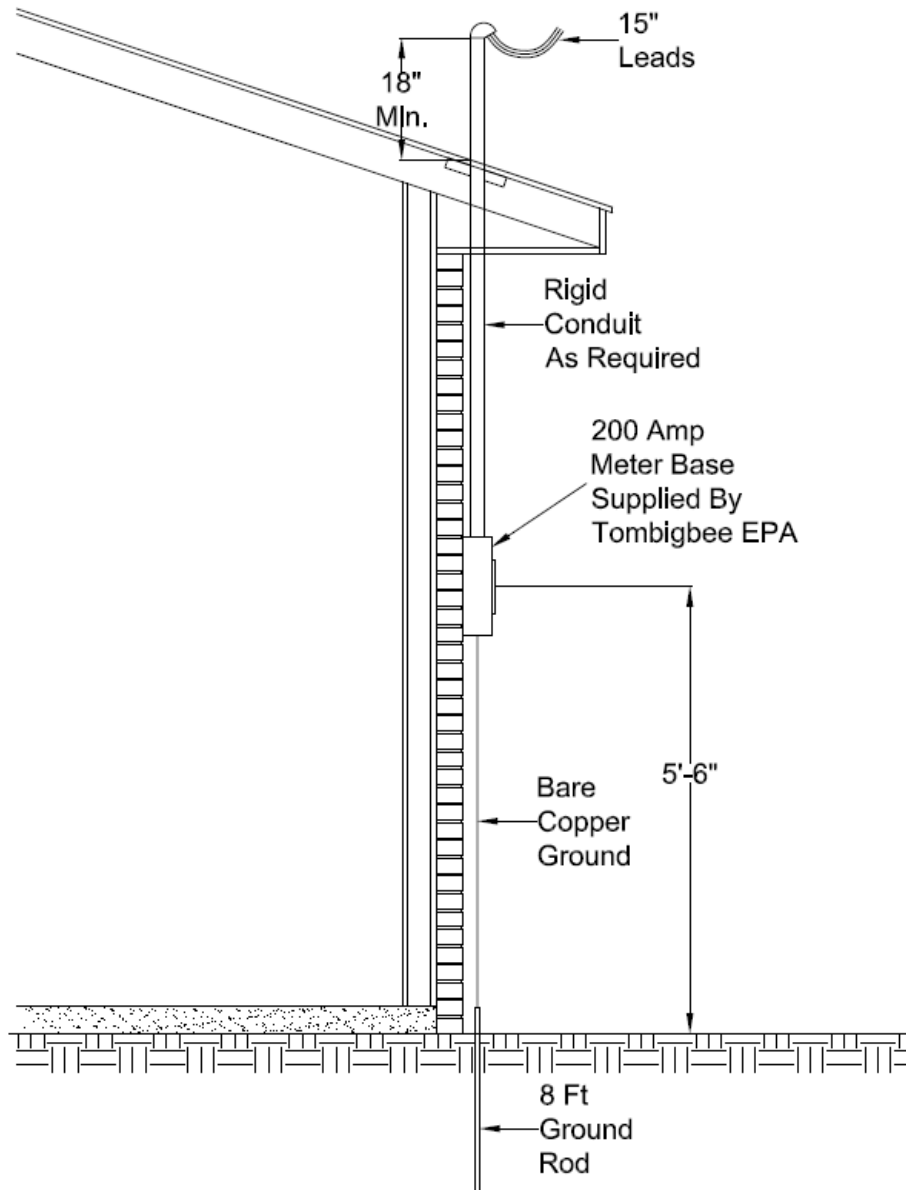
An approved safety type service entrance switch with fuse receptacle or circuit breaker assembly shall be provided in all services. This switch shall be enclosed in a metal case and of the deadfront type.

Before installing 3 phase equipment or CT Metering, TEPA shall be contacted as to whether it is available and economically feasible.

Residential Service Sketch #1



Residential Service Sketch #2



Meter Loop Sketch #3

