

Residential EV Service Process Overview

Thank you for your interest in SPU's Residential EV Service. The following will provide you with a process overview for obtaining EV Service* in your home.

- 1. Choose a qualified electrician for the installation.
 - a. Electrical work will be necessary as a separate electric meter is required for your EV service.
- 2. Your electrician should contact SPU's engineering staff to review the installation requirements.
 - a. <u>mdrouillard@shakopeeutilities.com</u> or 952-345-2475
- You will need to apply online for EV service at:
 a. ShakopeeUtilities.com>Residential>Start/Stop Service or go directly to the application
 - https://shakopeepublicutilities.formstack.com/forms/application_utilities_residential
 - i. Click "Start New Service"
 - ii. "Apply for Residential Service (Electric and/or Water)"
 - iii. Select the radio button for "Residential EV Charging Service"
 - iv. Complete the application and click "Submit Form"
- 4. There is an \$85 EV Meter Fee that must be paid prior to SPU installing the EV meter.
 - a. You will be invoiced for this fee following receipt and approval of your EV Service Application.
- 5. Appropriate electrical permits are required. Your electrician should do this on your behalf through the city/township in which you reside.
 - a. Send copy of electrical permit to SPU via email or fax
 - i. <u>electric@shakopeeutilities.com</u>
 - ii. 952-403-0831(fax)
 - iii. Include scheduled date of inspection
- 6. Your qualified electrician installs the new EV meter socket, new conduit, new cables, and new branch circuit protection (NEC compliant) from the point of service on your residence to your EV charger or charger outlet.
 - a. The EV service branch circuit protection cannot be part of, nor wired from/through, your existing electrical panel that is fed from your existing electric meter
 - b. The EV charger or charger outlet will need to be fix mounted and direct wired to the new EV meter socket with a breaker or fuse (aka branch circuit protection) that is wired in-between the EV meter socket and the EV charger or charger outlet. Your existing/new EV charger or charger outlet cannot be wired from, nor through, your existing electrical panel.
 - c. The new EV meter socket will need to be:
 - i. Supplied by your electrician
 - 1. SPU does not supply nor stock residential meter sockets
 - ii. Located outside, near your existing electric meter, within view and "made accessible" per NEC code requirements

- Wired from the LINE side of your existing electric meter socket using dual lugs such as Milbank P. No. K4977 or an SPU approved equivalent means of connection.
 - This part of the installation will require a brief power outage to your residence. SPU electricians will need to be scheduled on site to complete this step.
- iv. **NOT** wired in a **subtractive** metering configuration with the existing house meter, meaning it **cannot** be wired from the load side of your existing house meter socket
- v. EV Meter Socket Specifications
 - 1. 200Amp
 - 2. Single phase
 - 3. Form 2S meter compatible
 - 4. With bypass lever
 - 5. Ringless
- d. The installation for this new EV meter socket, charger and branch circuit protection will need to comply with NEC Code as well as NEC Article 625
- 7. Electrical Inspector conducts an inspection on the installation.
- 8. Once approved, Electrical Inspector contacts SPU to confirm inspection has passed *see blue box below*.
 - a. Inspector calls SPU dispatch @ 952-345-2473
- 9. SPU schedules the installation of the EV meter into the new EV meter socket.

To minimize any delays and outages at this point in the process, **your electrician should coordinate with SPU Dispatch and the Electrical Inspector in advance** so both parties are planning for a specific date/timeframe. Installation must be approved prior to SPU installing the EV meter into the new socket.

- There will be a brief power outage while making the connections between the house meter and the new EV meter socket.
- If you are currently charging your EV every night, please share this with your electrician early in the process as charging could be affected by the cutover of the EV Charger's wiring to the new meter socket and new branch circuit protection.

*EV Service is limited to the charging of electric vehicles only. No other uses are permitted.