

**TOWN OF MINA**  
**PROPOSED AMENDMENT TO ZONING LAW**  
**Town Board Review: May 9, 2024**

**ARTICLE II – DEFINITIONS**

**SECTION 202: DEFINITIONS (ADDITIONS)**

ELECTRIC VEHICLE SUPPLY EQUIPMENT (EVSE), are commonly referred to as EV chargers. They provide power to EVs, including fully electric vehicles and plug-in hybrid vehicles that use a combination of gasoline and electricity. In general, there are three levels of EV charging, which deliver different charging experiences due to the amount of power (or range) they can provide within a given period of time. Charging times differ between vehicle models due to battery sizes and the charging rates that a given vehicle can accommodate.

ELECTRIC VEHICLE LEVEL 1 CHARGERS – Level 1 chargers charge a vehicle using a standard wall outlet. These chargers can provide up to 5 miles of range per hour, with charging loads ranging from 1 – 3 kW. Given the power level, these chargers are most appropriate for home charging, typically overnight. Average charging time is 8 to 20 hours.

ELECTRIC VEHICLE LEVEL 2 CHARGERS – Level 2 chargers charge a vehicle with a moderately stepped-up electric power. These chargers provide 20 to 30 miles of range per hour of charging (depending on vehicle model), with charging loads ranging from 3 to 20 kW. Given the medium power level, these chargers are most appropriate for charging while parked for one or more hours at home, work, or while shopping. The vast majority of EV chargers in the United States, are Level 2 chargers. Average charging time is 4 to 8 hours.

ELECTRIC VEHICLE LEVEL 3 NON-COMMERCIAL FAST CHARGERS are sometimes referred to as direct current fast chargers (DCFC) or Level 3 chargers. They use much higher amounts of electric power. These chargers can provide 60 to 200 or more miles of charge in 20 to 30 minutes. Charging loads of fast chargers start at 50 kW, but can go as high as 350 kW. The electrical upgrade required and the high installation cost may make EV Level 3 Non-Commercial Fast Chargers less feasible for single home installation.

ELECTRIC VEHICLE LEVEL 3 COMMERCIAL FAST CHARGERS/COMMERCIAL EV CHARGING STATIONS – These chargers are also Level 3 direct current fast chargers (DCFC). They are typically installed in commercial locations such as high transit corridors or public fueling stations. They are usually installed in multiple quantities (clusters) as free-standing units for general public use and enable rapid charging of EV batteries to 80% capacity in as little as 30 minutes. These units draw large amounts of electrical current, and require utility upgrades and dedicated circuits.

Installation costs are high. Commercial charging stations typically charge a fee for public use and require additional design features to enable payment interfaces, provider networks, and reservation systems. Commercial chargers require adequate access, parking, and egress. Adequate safety measures must be in place to ensure damage prevention and operator protection.

## **ARTICLE IV – DISTRICT REGULATIONS**

### **SECTION 401: RESIDENTIAL (R1) DISTRICT**

- B. Uses Requiring No Permit (Requires Compliance with Law)
  - Electric Vehicle Level 1 Chargers
  - Electric Vehicle Level 2 Chargers
  - Electric Vehicle Level 3 Non-Commercial Fast Chargers

### **SECTION 402: AGRICULTURAL RESIDENTIAL (AR) DISTRICT**

- B. Uses Requiring No Permit (Requires Compliance with Law)
  - Electric Vehicle Level 1 Chargers
  - Electric Vehicle Level 2 Chargers
  - Electric Vehicle Level 3 Non-Commercial Fast Chargers

### **SECTION 403: LAKESIDE RESIDENTIAL (R2) DISTRICT**

- B. Uses Requiring No Permit (Requires Compliance with Law)
  - Electric Vehicle Level 1 Chargers
  - Electric Vehicle Level 2 Chargers
  - Electric Vehicle Level 3 Non-Commercial Fast Chargers

### **SECTION 404: AGRICULTURAL (A1) DISTRICT**

- B. Uses Requiring No Permit (Requires Compliance with Law)
  - Electric Vehicle Level 1 Chargers
  - Electric Vehicle Level 2 Chargers
  - Electric Vehicle Level 3 Non-Commercial Fast Chargers
- D. Uses by Special Permit (Hearing Required)
  - Electric Vehicle Level 3 Commercial Fast Chargers

### **SECTION 405: HISTORIC BUSINESS (B1) DISTRICT**

- B. Uses Requiring No Permit (Requires Compliance with Law)
  - Electric Vehicle Level 1 Chargers
  - Electric Vehicle Level 2 Chargers
  - Electric Vehicle Level 3 Non-Commercial Fast Chargers
- D. Uses by Special Permit (Hearing Required)
  - Electric Vehicle Level 3 Commercial Fast Chargers

**SECTION 406: COMMERCIAL (B2) DISTRICT**

- B. Uses Requiring No Permit (Requires Compliance with Law)
  - Electric Vehicle Level 1 Chargers
  - Electric Vehicle Level 2 Chargers
  - Electric Vehicle Level 3 Non-Commercial Fast Chargers
- D. Uses by Special Permit (Hearing Required)
  - Electric Vehicle Level 3 Commercial Fast Chargers

**SECTION 407: SUNNYSIDE BUSINESS (B3) DISTRICT**

- B. Uses Requiring No Permit (Requires Compliance with Law)
  - Electric Vehicle Level 1 Chargers
  - Electric Vehicle Level 2 Chargers
  - Electric Vehicle Level 3 Non-Commercial Fast Chargers
- D. Uses by Special Permit (Hearing Required)
  - Electric Vehicle Level 3 Commercial Fast Chargers

**SECTION 408: SHADYSIDE BUSINESS (B4) DISTRICT**

- B. Uses Requiring No Permit (Requires Compliance with Law)
  - Electric Vehicle Level 1 Chargers
  - Electric Vehicle Level 2 Chargers
  - Electric Vehicle Level 3 Non-Commercial Fast Chargers
- D. Uses by Special Permit (Hearing Required)
  - Electric Vehicle Level 3 Commercial Fast Chargers

**ARTICLE VI – SUPPLEMENTAL REGULATIONS**

**SECTION 657 – ELECTRIC VEHICLE LEVEL 3 COMMERCIAL FAST CHARGERS/COMMERCIAL ELECTRIC VEHICLE CHARGING STATIONS**

- A. Purpose – This section regulates the allowable locations and permitting process in the Town of Mina for electric vehicle level 3 commercial fast chargers/commercial electric vehicle charging stations. The goal is to create a streamlined permitting process for electric vehicle charging stations while promoting public health and safety and preventing specific adverse impacts in the installation and use of such charging stations.
- B. Installation Requirements –
  - a. All electric vehicle charging station equipment shall meet the requirements of the New York Electrical Code, the National Electrical Code, the Society of Automotive Engineers, the National Electrical Manufacturing Association, and

accredited testing laboratories, such as Underwriters Laboratories, and rules of the Public Utilities Commission.

- b. Installation of electric vehicle charging stations and associated wiring, bonding disconnecting means and overcurrent protective devices shall meet the requirements of all applicable provisions of the New York Electrical Code.
  - c. Installation of electric vehicle charging stations shall be incorporated into the load calculation of all new or existing electrical services and shall meet the requirements of the New York Electrical Code. Electric vehicle charging equipment shall be considered a continuous load.
  - d. Anchorage of either base-mounted or wall-mounted electric vehicle charging stations shall meet the requirements of the New York Building or Residential Code as applicable per the provisions of the manufacturer's installation instructions. Mounting of charging stations shall not adversely affect building elements.
  - e. Prior to the granting of certificate of compliance, an electrical inspection shall be conducted by a licensed electrical inspector and reviewed and approved by the Town of Mina Code Enforcement office.
- C. Conditions – Prior to submitting an application for processing, the applicant shall verify that the installation of electric vehicle charging station(s) will not have adverse impact to the public health and safety and/or building occupants. Such verification shall be in writing and shall include all necessary maps, diagrams, technical drawings/specifications and any other documents necessary to provide the following information:
- a. A letter from the utility company servicing the proposed charging station site certifying that the electrical system capacity and loads are sufficient, or will be upgraded to be sufficient, to accommodate the charging station(s) prior to the installation thereof,
  - b. Electrical system wiring, bonding and overcurrent protection,
  - c. Building infrastructure affected by charging station equipment and associated conduits,
  - d. Areas of charging station equipment and vehicle parking,
  - e. Any additional information that the Building Inspector/Code Enforcement Office may reasonably require, including but not limited to, a letter from a certified electrical engineer as to the safety of all proposed construction.
- D. Permitting Process – A checklist of all requirements for compliance shall be in accordance with the recommendations contained in the most current version of the “Electric Vehicle Charging Permitting Guidebook” as published by the New York State Energy Research and Development Agency (NYSERDA). At minimum, the adopted checklist shall require the applicant to submit:

- a. A completed permit application.
- b. The permit application fee.
- c. A proposed site plan (for projects located in nonresidential zoning districts, or for commercial use).
- d. An accurate survey or depiction showing the proposed placement of the charging station(s).
- e. For charging station(s) proposed to be located inside a structure, a floor plan showing the proposed location of the equipment.
- f. Manufacturers specifications, including the UL listing.
- g. Single-line wiring diagram, including the following:
  - i. Conductor types and sizes.
  - ii. Size of the over current device (circuit breaker) supplying the EVCS.
  - iii. Conduit size, type and location.
  - iv. The manufacturer and model of the charging station(s).
  - v. The size of the main electric panel, distribution panels (subpanels) and disconnects.
  - vi. Type (level) of charging station(s).
- h. Electrical load calculation, including the size of existing electrical panel, existing load on the panel and proposed load/circuits from the electric vehicle charging system.
- i. Verification that the existing main service panel and all panels in the electrical system used for the charging station(s) are safe and free of electrical hazards.
- j. Verification of compliance with NYS Building Code, Chapter 4, Section 406.2.7, or an updated or amended version of the same. Verification of compliance with NFPA 70-531, Article 625, or any updated or amended version of the same.
- k. Verification of compliance with all state or federal regulations applicable.