

Electric Vehicle Charging Stations

Quarterly Zoning Inspector Meeting



Types of Charging Stations

- All commercially available EVs can use Level 1 and 2 charging
- The car determines the amount of power it can accept

Level 1

- Uses a common 120-volt household outlet
- Adds 2-5 miles of range per hour charging
- Typically located at home
- Vehicle is parked for a long period of time

Level 2

- Commonly used for daily EV charging
- Adds 10-20 miles of range per hour charging depending on power output and vehicles max charge rate
- Often installed at home for complete charge overnight
- Also found at Public Charging Stations & workplaces
- Vehicle is parked for a long time or is “topped off” during visit

DC Fast Charge

- Up to 400 miles of range per 30 minutes charging
- Found at Public Charging Stations along heavy traffic corridors
- Like a traditional gas/fueling station with substantial refueling while you wait to enable longer travel

Why Discuss EV Charging?

- Market is accelerating
- Zoning – primary tool for implementation until the building code or state code catches up
- EV Charging Stations typically considered an accessory use
 - Located in residential, business, commercial, industrial, institutional, and recreational zones
 - Public charging occurs at destinations with longer parked times
 - Ideal to couple with commercial and recreation zones which also promotes economic development



Considerations when creating local policies

TYPE OF USE- DEGREE TO WHICH CHARGERS ARE AN AMENITY OR DESTINATION



INTENSITY OR DENSITY OF USE- AESTHETICS, ELECTRICAL INFRASTRUCTURE, TRIP GENERATION

PUBLIC ACCESS TO THE USE- BROADLY AVAILABLE TO THE PUBLIC, RESTRICTED TO CUSTOMERS & EMPLOYEES, FOR PRIVATE USE ONLY

BUSINESS CASE OF THE USE- WILL THERE BE A 3RD PARTY VENDOR RECEIVING PAYMENT?

Best Management Practices & Other Considerations



EV charging stations
as a permitted use



EV-Ready Standards



EV Supply Equipment
Standards



EV Parking Space
Design and Location



Required EV Parking
Capacity & Minimum
Parking Requirements



EV-Designed Parking
Use Standards and
Protections



Signage, Safety, and
Other Standards



Definitions