City of Colusa California

STAFF REPORT

DATE: August 16, 2022

TO: City of Colusa Mayor and Council Members

FROM: Fernanda Vanetta through Jesse Cain, City Manager

AGENDA ITEM:

Subject: Possible planning and construction of Electric Vehicle (EV) charging infrastructure in the City of Colusa

Recommendation: To get direction about the future of charging infrastructure in the City of Colusa and to identify partners and stakeholders that would like to participate in the planning and implementation process.

BACKGROUND ANALYSIS:

Electric vehicles are quickly changing our transportation landscape, a change that promises to bring benefits to individuals, businesses, and entire communities. As of right now, rural communities are lagging in EV charging infrastructure when compared to more substantially populated areas. As a result, there are several initiatives to help support the development of infrastructure in traditionally underrepresented or underserved segments of the population.

In rural parts of the country—home to 20 percent of Americans and almost 70 percent of America's road miles—EVs can be an especially attractive alternative to conventional vehicles. Rural residents drive more than their urban counterparts, spend more on vehicle fuel and maintenance, and often have fewer alternatives to driving to meet their transportation needs. Over the long run, EVs will help residents of rural areas reduce those costs and minimize the environmental impact of transportation in their communities.[1]

But beyond individual benefits that EV can provide, charging infrastructure also bring benefits to communities. This includes economic development opportunities, health benefits and lower greenhouse gas emissions.

Given current limits on the range of EVs, those drivers may be especially attuned to the availability of charging stations along their routes and plan their stops accordingly. Given the time it takes to charge (depending on the availability of level 2 or a DC Fast Charging Station) most consumers are likely to combine their stops with other activities, like dining, shopping, and

[1] U.S. Department of Transportation – "Charging Forward – A Toolkit for Planning and Funding Rural Electric Mobility Infrastructure"

other attractions. Thus, providing EV charging stations can enable rural communities to draw regional travelers driving EVs, while bringing additional revenue to local businesses.
Partnerships are a crucial element of establishing charging infrastructure. The type of partnership and direction should consider the goals and vision of the community. Key partners to planning, funding, and implementing electric vehicle supply equipment (EVSE) are statewide partners, local and regional planning agencies, electric utilities, charging networks and site hosts.

Partners and how they impact the process:

- Statewide and multistate partners, including organizations planning for EV corridors, State environmental, energy, and transportation agencies, and multistate initiatives working on climate change and electric vehicles, can help identify key stakeholders and provide technical assistance or funding.
- Local and regional planning partners include Clean Cities coalitions that can help rural entities get started on an EVSE project and transportation planning agencies that can help align EVSE projects with broader transportation planning efforts and available funding.
- Electric Utilities, like PG&E, are a critical partner in planning for EV infrastructure.
- Charging Networks Many public charging stations are owned or operated by private charging network companies, such as ChargePoint, Electrify America, EVgo, and Greenlots. These charging networks commonly require a membership to recharge an EV at their stations. Network companies also provide users with station information to locate and get directions to their charging stations.
- Site Hosts is the owner or occupant of land on which an EV charging station is built. Site hosts represent a variety of industries and land use types, including:
    - Tourist destinations and public lands
    - Businesses and institutions, such as hotels, shops, and restaurants
    - Community sites, such as a public library or town hall

Additional considerations for placement and needs are the Electricity Supply Requirements that can be summarized in the following graphic from the DOT:

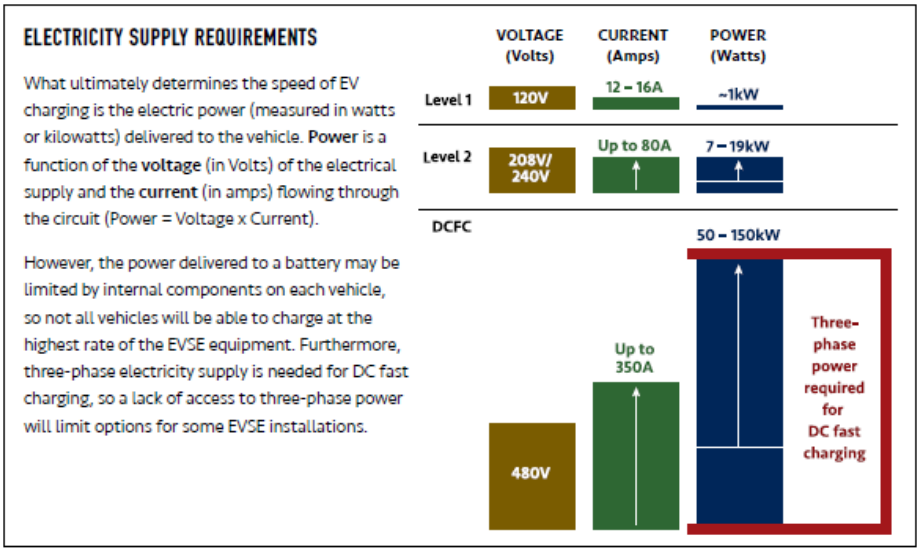

Figure 5.5. Electricity supply needs of different charging speeds, including the importance of three-phase power for fast charging. (Source: USDOT Volpe Center)

In summary the City Council and citizens can discuss their vision to plan and install an electric charging network that can benefit its populace and bring further economic development to the region. Below is a quick summary of the project development and planning process.

Key Steps in planning EVSE projects:

BUDGET IMPACT: The budget impact is dependent on direction of future projects.