







Electric Vehicle Infrastructure Plan

FINAL / JULY 29, 2022





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Acronyms

Acronym	Definition	
AADT	Average Annual Daily Traffic	
ACOG	Association of Central Oklahoma Governments	
AEP	American Electric Power	
AFC	Alternative Fuel Corridors	
AFDC	Alternative Fuels Data Center	
AFV	Alternative Fuel Vehicle	
BABA	Build America, Buy America Act	
BEV	Battery Electric Vehicles	
BMV	Bureau of Motor Vehicles	
CAM	Cathode Active Materials	
CCS	Combined Charging System	
CFR	Code of Federal Regulations	
CNG	Compressed Natural Gas	
DAC	Disadvantaged Communities	
DAS	Department of Administrative Services	
DCFC	Direct Current Fast Charger	
DOE	Department of Energy	
EDC	Electric Distribution Companies	
EPA	Environmental Protection Agency	
EV	Electric Vehicle	
EVSE	Electric Vehicle Supply Equipment	
FCV	Fuel Cell Vehicles	
FHWA	Federal Highway Administration	
ICE	Internal Combustion Engine	
IIJA	Infrastructure Investment and Jobs Act	
INCOG	Indian Nations Count of Governments	
L2	Level 2 Charging Station	
LNG	Liquified Natural Gas	
LPG	Liquified Petroleum Gas	
MPO	Metropolitan Planning Organization	

Acronym	Definition	
NEPA	National Environmental Policy Act	
NEVI	National Electric Vehicle Infrastructure	
NRDC	Natural Resources Defense Council	
OCPP	Open Charge Point Protocol	
ODOT	Oklahoma Department of Transportation	
OEM	Original Equipment Manufacturer	
OKSILC	Oklahoma Statewide Independent Living Council	
OSEE	Oklahoma Secretary of Energy & Environment	
PHEV	Plug-in Hybrid Electric Vehicles	
R.C.	Revised Code	
REC	Rural Electric Cooperative	
RFP	Request for Proposals	
RTPO	Regional Transportation Planning Organization	
SSO	Standard Service Offering	
US DOE	United States Department of Energy	
US DOT	United States Department of Transportation	

1.0 Introduction

The National Electric Vehicle Infrastructure (NEVI)

Formula Program, funded by the Bipartisan Infrastructure Law (BIL), is a new \$5 billion program that plans to make historic investments in electric vehicle (EV) charging infrastructure across the country. The goal of this program is to establish a network of 500,000 EV chargers by 2030 along federally designated <u>alternative fuel corridors</u> (AFC) in the United States (U.S.) and ensure a convenient,

NEVI Program Funds

Oklahoma will receive \$66.3 million in NEVI program funding over five years beginning with \$9.8 million in 2022.

reliable, affordable and equitable charging experience for all users. To achieve this national goal, each state is required to develop an EV Infrastructure Deployment Plan (Plan) that describes how NEVI Formula Program funds will be used in conformity with guidance from the Federal Highway Administration (FHWA).

1.1 About the NEVI Plan

The Oklahoma NEVI Plan began in April 2022 and was led by the Oklahoma Department of Transportation (ODOT) and Oklahoma Secretary of Energy and Environment (OSEE), in coordination with state agencies, local Metropolitan Planning Organizations (MPOs), Regional Transportation Planning Organizations (RTPOs), Clean Cities Coalitions, utilities and public stakeholders and committees per FHWA's recommended stakeholder groups from their 90-day guidance. The Plan presented in this document represents ODOT and OSEE's commitment to increasing access to EV charging infrastructure across the state.

1.2 **NEVI Plan Purpose**

Oklahoma's NEVI Plan will guide ODOT and OSEE over the next five years, as they receive and distribute NEVI funds across the state, and work toward fulfilling their responsibility in building a national EV charging network. This network will include EV charging corridors across the State that improve economic development, tourism, and the environment.

1.3 NEVI Plan Vision and Goals

ODOT envisions a comprehensive strategy that ensures EV travel across the State through equitable and accessible placement of EV chargers throughout Oklahoma's roadway network. A fully compliant and accessible network of EV chargers will reduce 'range anxiety,' by ensuring that chargers are conveniently located in a safe environment and available at any time.

The following presents Oklahoma's NEVI Plan vision and goals. More detail on the vision and goals can be found in Chapter 4.0 Plan Vision and Goals.

Oklahoma NEVI Plan Vision: ODOT's vision for the NEVI Plan is to develop a comprehensive electric vehicle network to enable EV travel across the state and spur economic development. The network will give drivers confidence and flexibility when driving Oklahoma's roads for personal, professional, or recreational purposes, regardless of distance traveled, location in the state or weather conditions. The framework will be developed in a way that provides equity to all Oklahoma motorists.

Oklahoma NEVI Plan Goals: ODOT's goals for the NEVI Plan, in accordance with FHWA guidance, focuses on building out FHWA designated Alternative Fuel Corridors (AFC's), then expand to regional and local routes of significance, equity-based destination charging and freight charging locations. ODOT's NEVI Plan goals are also in alignment with ODOT's stated goals and the Governor's goals. The NEVI Plan goals are summarized below:

- Goal #1: Develop an Electric Vehicle Charging Plan that puts Oklahoma in the Top 10 for Electric Vehicle Performance Measures in the United States.
- Goal #2: Develop and Implement Statewide Policies that Encourage the Responsible Development of Oklahoma's Natural Resources.
- Goal #3: Comprehensive Charging Plan:
- Goal #4: Data Gathering and Evaluation:
- Goal #5: Program Implementation and Administration:
- Goal #6: Develop and sustain Oklahoma's Workforce:
- Goal #7: Access to EV Charging Stations:

1.4 Existing Electric Vehicle Infrastructure in Oklahoma

The State of Oklahoma has made great strides in not only expanding EV charging infrastructure but supporting the very businesses that are contributing to the rise in electric vehicle use. Oklahoma has 19 charging stations on designated Alternative Fuels Corridors (AFC) that are fully NEVI compliant and serve the 7,159¹ EVs registered in that state as of May 2022.

The Oklahoma Department of Environmental Quality (DEQ) is managing \$3.1 million in Volkswagen State Environmental Trust charging infrastructure projects to increase access in the state. The DEQ announced two rounds of funding: a first round (2019) focused on transportation corridors and single point locations; and a second round (FY 2021) of target locations to fill in the Oklahoma charging network. This program reimburses up to 80% of the cost for charging

¹ Registered BEV's and PHEV's as of May 2022, Oklahoma Gas and Electric

station projects. More information can be found on the ChargeOK website and factsheet (updated July 7, 2020).

Oklahoma's approach to EV infrastructure development over the next five years includes three phases to maximize NEVI funding and ensure compliant and reliable EV deployment across the state (see **Figure 1**). In phase one, ODOT will prioritize building out NEVI compliant Interstate corridors and begin U.S. and state corridor build outs. In phase two, ODOT will continue work on U.S. and state corridors, while beginning discretionary funds allocation. In phase three, ODOT will focus all remaining discretionary funding to address other transportation issues per NEVI program guidance.

Phase I Phase II Phase III Interstate US/State US/State Discretionary Interstate Corridors & US/State Corridors Corridors & **Funds** Corridors Discretionary Year 3 Year 4 Year Year 2 Year 5 Agency coordination, guidance and feedback

Figure 1: Anticipated Dates of Milestones and EV Infrastructure Deployments

Source: ODOT

Agency and partner coordination is a critical element in the development of this plan. During the five years of the NEVI program, ODOT's partnership with the Joint Office of Energy and Transportation², FHWA, state agencies, regional planning organizations, tribes and others will remain of key importance. Input from the public will also help shape this plan, ensuring that this document, the planning timeline, and project outcomes reflect a broad range of perspectives, while also achieving NEVI program requirements.

² "The Joint Office of Energy and Transportation was created through the Bipartisan Infrastructure Law (BIL) to facilitate collaboration between the U.S. Department of Energy and the U.S. Department of Transportation.

2.0 State Agency Coordination

ODOT has actively engaged intra-departmental divisions in planning and directly coordinated with the Oklahoma Governor's Office and multiple state agencies as described throughout this section. ODOT has also coordinated with its neighbor states of Kansas, Missouri, Arkansas, Texas, New Mexico and Colorado, to ensure infrastructure placement coordination. Below are key details from these efforts to date. **Figure 2** shows a map of the neighboring state AFCs and NEVI-compliant chargers.

- **Kansas** Coordination efforts focused on the I-35 AFC and other routes of significance in northern Oklahoma.
- **Missouri** Coordination efforts focused on the I-44 AFC and other routes of significance in northeastern Oklahoma.
- **Arkansas** Coordination focused on AFC's I-40, US-412 and other routes of significance in eastern Oklahoma.
- **Texas** Coordination efforts focused on AFC's I-40, I-44, I-35, U.S. 62, U.S. 69 and other routes of significance in southern Oklahoma.
- New Mexico Coordination efforts focused on routes of significance in western Oklahoma.
- **Colorado** Coordination efforts focused on AFC U.S. 385 and other routes of significance in northwestern Oklahoma.

This chapter captures the roles and interests of the various entities, details the engagement activities to date, and summarizes partners' roles, interests, and impacts on the NEVI planning and deployment processes. The three categories for state level partner engagement are:

- 1) Internal ODOT Division coordination;
- 2) State Agency coordination; and
- 3) Oklahoma Governor's Office coordination.

Table 1 summarizes internal roles and engagement activities at ODOT by office.

Table 1: Internal Roles at ODOT

Office	Role & Engagement Activities	
General Counsel, Alternative	Advise on procurement options.	
Project Delivery	Advise on procurement options.	
Chief Financial Officer, Budget &	Review five-year spending plan.	
Forecasting		
General Counsel,	Provide guidance on options for match funds and Title 23	
Chief Legal Council	implementations for NEVI.	

Office	Role & Engagement Activities
Strategic Asset and Program Management Division, Statewide Planning & Research	Provide connection to other statewide plans, including coordination with MPOs.
Traffic Engineering Division Traffic Operations	Provide traffic data including trends.
Multimodal Division, Transit	Advise on state transit programs and assist with transit agency coordination.
Multimodal Division, Grants	Administer funding programs and provide technical assistance
Office of Civil Rights, Opportunity, Diversity, and Inclusion (ODI)	Advise on ODI aspects of NEVI planning & deployment.
Environmental Division Services	Advise on and support environmental clearance of EVSE sites.
Right of Way Division,	Advise on and support real estate procurement and
Real Estate	delivery process.

Source: ODOT

All Oklahoma electric vehicle charging infrastructure is the responsibility of ODOT's Multimodal Division. For more information visit the <u>Oklahoma NEVI website</u>.

Table 2 summarizes the primary state agency partner roles, interests, impacts, and engagement activities – specific to NEVI – by agency.

Table 2: Oklahoma EV Charging Collaborators

Agency	Department Role	NEVI Role
OKLAHOMA Transportation	Department responsible for all transportation related functions in the state. The umbrella agency for all transportation in Oklahoma.	Five-year program management of all program aspects. Mapping, Planning, Program Management (Contracting, right of way, NEPA, Procure, Inspection, Disbursement, Reporting)

Agency	Department Role	NEVI Role
OKLAHOMA Turnpike Authority	Responsible for the states turnpike network. Coordination with ODOT, OTA is under the Oklahoma Transportation Cabinet.	OTA will not receive Federal NEVI funds. ODOT will help install NEVI compliant EVSE within one-mile of the OTA system. OTA may choose to build NEVI compliant EVSE within their own service plaza's using their own funds.
OKLAHOMA Secretary of Energy & Environment	OSEE oversees all energy and environmental issues. OSEE has implemented the states VW Settlement program.	OSEE will partner with ODOT throughout the five- year NEVI program to help administer Federal funds.
OKLAHOMA Environmental Quality	The DEQ mission is to protect and improve public health and the environment.	The Department will partner with ODOT and be responsible for ensuring health and environment of the EVSE installations.
OKLAHOMA Dept. of Agriculture, Food and Forestry	The Department is dedicated to protecting and promoting the highest standards of agricultural goods and natural resources.	The Department will partner with ODOT and ensure the EVSE installation is meeting the Departments standards.
OKLAHOMA Commerce	The Department's mission is to bring jobs, investment, and economic prosperity to the state of Oklahoma.	The Department will partner with ODOT, EVSE vendors and landowners / developers to maximize economic opportunities for the state.
OKLAHOMA Corporation Commission	The Commission is a regulatory agency with emphasis on the Fuel, Oil and Gas, Public Utilities, and Transportation Industries	The Commission will partner with ODOT and regulate the installation of the EVSE sites.

Source: ODOT

ODOT, as the lead Oklahoma agency for the NEVI Program Formula funding, will continue to actively engage and coordinate with both intra-departmental divisions and state agency partners.

Kansas Colorado. Missouri (385) 66 64 Guymon 83 (56) Woodward Enid 35 Tulsao (60)**•** StillWater New Mexico 0 44 0 Oklahon a City 0 40 0 DC Fast Chargers Arkansas 1 59 Interstate, Fully Compliant Lawton 25-mile travel distance 70 Interstate, Not Fully Route Type 82 Compliant Interstate Other US, State, and Other Louisiana Existing DCFC in Routes Neighboring State Round 1-6 EV AFC 25-mile travel · ~ 50 miles from OK · ~ border distance

Figure 2: Neighboring State Alternative Fuel Corridors with NEVI-Compliant Chargers

 $Source: AFDC.\ Chargers\ as\ of\ 6/16/2022,\ corridors\ through\ Round\ 6\ awards.$

3.0 Public Engagement

ODOT is leading the NEVI Program for the state of Oklahoma. As head of the program, ODOT has developed a public engagement strategy to continuously seek input from stakeholders and the general public throughout the five-year NEVI program and beyond. The goal for this section is to identify an overall engagement approach, identify a level of engagement for stakeholder groups, gather input that will continually inform the process, and to document the coordination activities to include with the submission of the plan and then make annual updates.

3.1 Stakeholders Involved in Plan Development

ODOT is in ongoing engagement with the following stakeholder groups and audiences to meet the NEVI Formula Program requirements. A preliminary list of stakeholder group meetings is listed below and will be frequently updated. A more detailed list including names, addresses and emails has been developed separately.

- **Planning Partner Engagement:** Metropolitan Planning Organizations, Regional Transportation Planning Organizations, Council of Governments, Federally Recognized Tribes boundaries are shown in Appendix B.
- **Technical Partner Engagement:** Investor-owned Utilities, Cooperative Utilities, Municipal Utilities, industry representatives from electric vehicle supply equipment (EVSE) companies and petroleum and convenience store operators.
- Stakeholder Organization Engagement: Identify and involve FHWA-mandated stakeholder groups in the plan's development to include local governmental entities, labor organizations, representatives of the transportation and freight logistics industries, public transportation agencies, neighboring states and urban, rural and disadvantaged communities.
- **Equity Community Engagement:** Underrepresented or disadvantaged communities, community-based organizations, environmental justice and equity-based stakeholder groups. Additional information on the equity priority communities can be found in Chapter 10.
- General Public Engagement: General public engagement including all registered motorists with emphasis on current and prospective EV owning motorists.

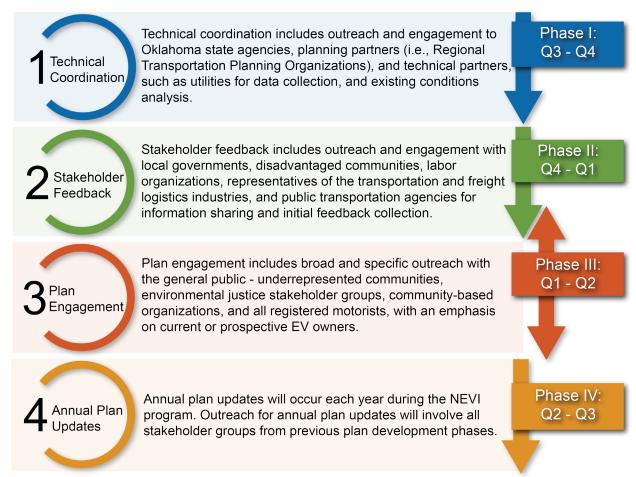
3.2 Public Engagement

The NEVI formula program is new for both ODOT and the general public, and therefore a clear and effective public engagement process was a key driver in the development of this Plan, as

ODOT plans for the next five years of this program. Divided into four phases, as shown in **Figure 3**, the public engagement process, and thus the Plan itself, begins and ends with public engagement with partner agencies, stakeholders, and the general public. While this Plan establishes the initial public engagement process, ODOT will engage stakeholders over the life of the program to build upon, and incorporate, feedback received during the five-year period. Initial outreach has started with the development of this Plan, but public engagement will continue throughout the next five years. Input from community and stakeholder groups will inform the technical work and will help refine information in the Plan. Information will be documented and updated on an annual basis. A meeting log/matrix has been developed to track meetings.

ODOT's public engagement process will include four key phases – Technical Coordination, Stakeholder Feedback, Plan Engagement and Annual Plan Updates. **Table 3** provides details about the stakeholders who will be contacted within each phase, as well as the timing of each public engagement effort. The development of this Plan document included phases one through three, but these phases will be completed in detail for annual NEVI Plan updates.

Figure 3: Annual Public Engagement Process



Note: Public engagement is set up for the Federal fiscal year calendar which runs from October 1st to September 30th. Source: ODOT

A summary of stakeholder engagement activities that have occurred between April and June are shown in **Table 3**.

Table 3: Summary of Stakeholder Meetings

Phase	Organization Type	Agency/Organization	Meeting Purpose	Meeting Date
Phase I	Planning Partner	ACOG, INCOG, OSEE (Clean Cities Meeting)	Review goals of EV Plan and outline engagement and collaboration opportunities.	4/8/2022
Phase I	Technical Partner	Oklahoma Gas and Electric	Discuss EV Plan and approach. Review electric grid needs, abilities and information.	4/20/2022
Phase I	Stakeholder Organization	Oklahoma Transit Association	Review goals of EV Plan and outline engagement and collaboration opportunities.	5/23/2022
Phase I	Technical Partner	Oklahoma Gas and Electric	Review electric grid needs, abilities and information discuss potential location gaps.	5/23/2022
Phase I	Planning Partner	ODOT Tribal Transportation Council	Review goals of EV Plan and outline engagement and collaboration opportunities.	5/26/2022
Phase II	Planning Partner	ODOT, FHWA, FTA, INCOG, ACOG, LMPO, Frontier	Review goals of EV Plan and outline engagement and collaboration opportunities.	6/1/2022
Phase II	Stakeholder Organization	City of Oklahoma City	Review goals of EV Plan and outline engagement and collaboration opportunities.	6/8/2022

Phase	Organization Type	Agency/Organization	Meeting Purpose	Meeting Date
Phase II	Planning Partner	Association of Regional Councils	Review goals of EV Plan and outline engagement and collaboration opportunities.	6/21/2022
Phase II	Stakeholder Organization	Petroleum Marketers and Convenience Store Association	Review goals of EV Plan and outline engagement and collaboration opportunities. Encourage discussion of economic opportunities	6/21/2022
Phase II	Planning Partner	Oklahoma Municipal League	Review goals of EV Plan and outline engagement and collaboration opportunities.	6/22/2022
Phase II	Stakeholder Organization	Francis Energy	Review goals of EV Plan and outline engagement and collaboration opportunities.	7/22/2022

Source: ODOT

In summary, an annual public engagement report will be provided with more information on meetings with key take-a-ways as defined by the proposed rulemaking. Feedback from meetings will be used to inform and update the NEVI Plan on an annual basis.

3.3 Public Engagement Activities

The public engagement process uses strategies such as electronic communication and media relations to inform and involve stakeholders and interested parties. Most of the outreach opportunities to date have been a combination of virtual meetings to facilitate efficient engagement, but also in-person meetings and presentations. ODOT will continue the public engagement outreach activities beyond the submittal of this Plan including identifying and meeting with disadvantaged and underserved communities.

Alternative engagement strategies will be used when needed to comply with the Americans with Disabilities Act (ADA) of 1990 in Oklahoma such as with the Oklahoma Statewide Independent Living Council (OKSILC). Additionally, measures are being taken to ensure input from

traditionally underrepresented communities, as defined in Title VI of the Civil Rights Act of 1964 (Title VI). ODOT will work with existing stakeholder groups to identify underserved or disadvantaged communities and groups. As additional stakeholder groups are identified, efforts will be made to coordinate with them and use their input to inform updates to the Plan.

3.4 Direct Meetings with State Agencies, Planning Partners, and Technical Partners:

ODOT staff and state agency leadership regularly provide updates to others on plan progress and gather input from them. These meetings are also used to coordinate engagement with regional transportation planning agencies, utilities, and other technical partners. Activities include:

- Brief State agency leadership on progress and upcoming engagement plans and events, as well as garnering input. Meetings typically last one hour. If, necessary, smaller followup calls/meetings may then take place with various state departments including Oklahoma Energy and Environment, Department of Environmental Quality, Department of Commerce, Department of Agriculture, Food and Forestry, Corporation Commission.
- Brief metropolitan planning organizations (MPO) leadership and staff receive their input in one group virtual meeting and smaller follow-up discussions/calls, as needed. ODOT will continue to provide information for them to engage their government members.
- Meet with Oklahoma City and Tulsa for urban areas (INCOG, ACOG, Grand Gateway COG) the RTPOs in the southwest and northwest. During the discussions the team should consider how to position these areas for future grants.
- Host meetings with grassroots EV Clean Cities Coalition chapters in Oklahoma. Asked them to solicit feedback by a certain date. Hold follow up meetings to discuss input.
- Coordinate with utility providers on utility availability at identified sites including meetings
 or calls with investor-owned utilities or co-ops, municipal utilities to address discuss
 feasibility and challenges.

3.5 Organizational Stakeholder Group Meetings:

ODOT staff engaged or will engage stakeholder organizations (i.e., local government, labor, transit, industry, etc.) in relevant group meetings. Meetings included:

- Labor Organizations: Will engage the electrical contractors to share information about the transition to electric vehicles.
- Private Sector: Met with utility companies, EVSE companies and potential site hosts.

3.6 Virtual Public Engagement Information

Program Webpage: ODOT has developed a project specific website (<u>oklahoma.gov/evok</u>) to keep the public, stakeholders and other interested parties informed and offer an opportunity to provide feedback and input. Fact sheets, presentations and other materials along with contact information is provided on the web page as needed.

Virtual Public Meetings: Virtual public meetings will be hosted by ODOT to keep the public, stakeholders and other interested parties informed and offer an opportunity to provide feedback and input. The first virtual public meeting occurred online for people to see and comment on information between June 20, 2022, and July 5, 2022. In the first week of the meeting, more than 220 people visited the meeting and provided 116 comments. General themes of the comments collected fall into the following categories:

Location

- Location of charging stations are critical and having coverage in rural areas is essential.
- Charging stations should be in areas with amenities like restaurants or convenience stores or near common fueling areas.

Operations and electric capacity

- Compatibility with chargers or ability to have adapters for different types of vehicles is desired.
- o Ports with higher charging capability (350kW) is needed.
- Additional ports beyond the minimum (4) are needed.
- o Concerns about energy consumption and drain on resources were voiced

Funding and program management

 Government over spending on programs that should be driven by market demand and the private sector.

Public Comment Period: The draft Oklahoma NEVI plan will be posted on the ODOT website and public comments will be solicited.

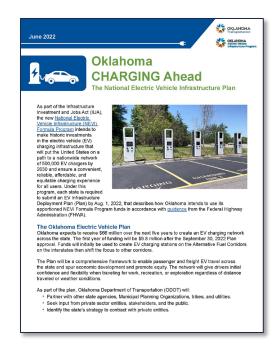
Launch online public survey: In future phases gather additional feedback from stakeholder groups and the public through online survey to ask more specific questions about needs, locations, and areas of concern.

3.7 Communication and Notification Methods

Fact Sheet: A fact sheet includes project-specific information and contact information for the public to submit questions and comments. Fact sheets can be updated as the project progresses. Fact sheets are translated reflective of community demographics, if needed.

Email Blasts: Email blasts are used to inform and update stakeholders on the project's progress or request input on strategies to inform and involve the public.

Other Communication Methods: social media, new releases or media interviews will be used to communicate the project's progress or updates.



4.0 Plan Vision and Goals

Oklahoma's NEVI Plan vision and goals provide an outlook for the five-year program and beyond. Oklahoma's Plan vision and goals are the foundation for which the NEVI plan is established. The vision and goals support the establishment of an interconnected network that will facilitate: 1) data collection; 2) equitable access; and 3) network reliability. At the end of the plan vision and goals, there is one outcome-oriented goal with a quantified target. More outcome-oriented goals with quantified targets will be developed over the five-year program period.

The Oklahoma NEVI Plan vision and goals are based on input from the Oklahoma VW Settlement goals, Oklahoma Department of Transportation Vision and the Governor's Plan for the State described in the following subsections.

4.1 Oklahoma NEVI Plan Vision and Goals

The following section presents Oklahoma's NEVI Plan vision and goals.

Oklahoma NEVI Plan Vision: ODOT's vision for the NEVI Plan is to develop a comprehensive electric vehicle network to enable EV travel across the state and spur economic development. The network will give drivers confidence and flexibility when driving Oklahoma's roads for personal, professional, or recreational purposes, regardless of distance traveled, location in the state or weather conditions. The framework will be developed in a way that provides equity to all Oklahoma motorists.

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ODOT plans to identify data needed to track and measure progress on the state's NEVI plan goals and will seek to report that quantified progress to the USDOT and general public. More detail on how the goals will be measured can be found in Chapter 13 Program Evaluation.

• Goal #1: Develop an Electric Vehicle Charging Plan that puts Oklahoma in the Top 10 for Electric Vehicle Performance Measures in the United States. Oklahoma is at the forefront of innovation and mobility. Based on criteria such as increase in EV sales, low electricity rates and ratio of charging stations to the population^{3,} Oklahoma will maintain that status as it rolls out electric vehicle charging over the next five years.

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³ Gorzelany, J. The Most EV-Friendly State in the U.S. MYEV.com. https://www.myev.com/research/comparisons/most-ev-friendly-states

- Goal #2: Develop and Implement Statewide Policies that Encourage the Responsible Development of Oklahoma's Natural Resources. The Office of the Secretary of Energy & Environment helps develop and advance policies that encourage energy exploration and production and responsible environmental stewardship throughout Oklahoma. The NEVI Plan will consider Oklahoma's natural resources in planning and implementation of the NEVI Plan. Energy is an important statewide goal in Oklahoma. Therefore, as Oklahoma looks to generate more electric power for electric vehicle charging, the state has a goal of generating that electricity through renewable energy sources such as wind.
- **Goal #3: Comprehensive Charging Plan:** Create a charging plan that ensures a convenient, reliable, affordable and equitable charging experience for motorists.
- Goal #4: Data Gathering and Evaluation: Ensure relevant data on NEVI funded charging stations is gathered and evaluated to develop good business decisions and ensure that the network meets FHWA standards of access, reliability and convenience.
- Goal #5: Program Implementation and Administration: Utilize NEVI funds to incentivize the market through third party partnerships to own and operate charging equipment that creates a convenient, reliable, affordable and equitable charging experience for motorists.
- Goal #6: Develop and sustain Oklahoma's Workforce: Educate and advance
 Oklahoma's workforce through the NEVI Plan using resources from the Oklahoma
 Department of Commerce and its partners.
- Goal #7: Access to EV Charging Stations: The Oklahoma NEVI Plan's goal is to enable distance and intercity travel with EVSE reliability.

As described above, ODOT's overall timeline for the NEVI Plan will initially focus on building out FHWA Designated AFCs. After the Joint Office has certified Oklahoma's AFCs as "fully built out" to NEVI compliant standards, ODOT will expand NEVI formula funded charging station deployments. Oklahoma's NEVI Formula Funding is therefore expected to disburse in the phases as shown in **Figure 1**.

The Oklahoma NEVI goals were based on the foundation of the Oklahoma VW Settlement Goals, Oklahoma Department of Transportation Vision and Goals and the Governor's Plan for the State.

4.2 Oklahoma Volkswagen Settlement Goals

The State of Oklahoma seeks to build a strategic network of electric vehicle charging stations across the state. The goals of the ChargeOK grant program are to increase the use of EVs in

place of gas-powered cars, to mitigate harmful air emissions and reduce concerns related to EV charging capability across Oklahoma. Using this funding, The Department of Environmental Quality (DEQ) has been implementing the ChargeOK Grant Program in the following two categories of projects:

- **Transportation Corridors** direct current fast charging (DCFC) projects on designated electric vehicle transportation corridors and
- **Single Point Locations** DCFC/Level 2 electric vehicle supply equipment (EVSE) charging projects for single destination locations or locations that serve as a community charging hub.

4.3 Oklahoma Department of Transportation Vision and Goals

Transportation impacts our lives each day – from the bridges you cross to the signs you read to the construction reports you follow. A good transportation system allows travelers to drive or carpool to work, enjoy recreational activities and access health care. It allows companies to supply products and services to consumers. ODOT ensures Oklahoma has a safe and efficient highway system by building and maintaining Interstates, U.S. highways and state highways. Partnering with the Oklahoma Turnpike Authority, ODOT provides customers with a choice of a safe, convenient, efficient, user-funded transportation network focusing on fiscal responsibility and promoting economic development.

ODOT's EV Plan goals are consistent with ODOT's Long-Range Transportation Plan 2020-2045, (August 2020).

- Safety and Security Ensure a safe and secure transportation system for all users.
- Infrastructure Preservation Preserve and maintain the condition of Oklahoma's multimodal transportation system in a state of good repair through risk-based, data-driven decision-making processes.
- **Mobility and Accessibility** Facilitate the movement of people and goods, improve connectivity between regions and activity centers, and increase travel mode choices.
- **Economic Vitality** Provide a reliable multimodal transportation system for people and goods that coordinates with land development patterns, strengthens communities, and supports a healthy and competitive Oklahoma economy.
- **Environmental Responsibility** Minimize and mitigate transportation-related impacts to the natural and human environments.
- Efficient Intermodal System Management and Operation Maximize system performance and operations.

• **Fiscal Responsibility** – Sustainably fund and efficiently deliver quality transportation projects while continuing to leverage additional resources in coordination with ODOT's partners.

4.4 Governor's Plan

Governor Kevin Stitt's vision is to make Oklahoma a top ten state in all areas of society, including transportation.

5.0 Contracting

The following chapter discusses the State's plans for contracting with private entities, including plans for the participation of small businesses. The chapter will discuss how the State will ensure that EV charging infrastructure is delivered in a manner that leads to efficient and effective deployment against broader Plan goals. Also, the chapter discusses the State's contracting strategy for achieving efficient delivery of ongoing operations and maintenance activities during and after the period of the award. Finally, this chapter identifies how the State will ensure that contractors will engage communities where EV charging infrastructure will be installed.

5.1 Laws & Rules Applicable to NEVI Formula Funding

The NEVI Formula program was created by H.R. 3684, commonly referred to as the Bipartisan Infrastructure Law (BIL), which was enacted November 15, 2021. Under the BIL, the NEVI Formula program was placed under the administration of the U.S. Department of Transportation (U.S. DOT). Consequently, the NEVI Formula funds are governed by all relevant federal laws and U.S. DOT Federal Highway Administration rules, as well as Oklahoma state laws and ODOT agency rules.

ODOT has significant experience administering U.S. DOT FHWA funding through a variety of agency programs and projects. NEVI funding is new to ODOT, and so are the FHWA NEVI Notice of Proposed Rulemaking (NPRM) issued June 9, 2022 for public comment. ODOT will be closely following the NEVI rulemaking process and work to incorporate all NEVI Formula program final rules into the agency's procurement process and contracts for any parties awarded Oklahoma NEVI Formula program funds.

Key among applicable NEVI funding is the Build America, Buy America Act (BABA) (Sections 70901-52 of the Infrastructure Investment and Jobs Act, Public Law 117-58). This federal law intends to only appropriate funds to projects that utilize American made steel, iron, or manufactured goods. ODOT will incorporate BABA criteria into their competitive procurement process and contractual obligations for final parties awarded. With this, ODOT intends to require applicants to follow all BABA laws.

5.2 ODOT's NEVI Procurement & Contracting Strategies

The Joint Office 90 Day NEVI Program guidance states that "FHWA anticipates that in most instances States will elect to contract with private entities for the installation, operation, and maintenance of EV charging infrastructure." This is in fact the case in Oklahoma. ODOT intends to create a competitive procurement program that will request applications from interested EVSE site hosts and private parties who ODOT will ultimately select and award NEVI Formula program funding to install, own, and operate EVSE charging stations in compliance with all federal and state laws and agency rules. This program will require coordination between

EVSE vendors and local property owners, ensuring contractors engage communities where NEVI funded EV charging stations will ultimately be installed, operated, and maintained.

ODOT will follow state and federal laws related to Title 23, including diversity equity and inclusion related to labor, fair wage laws, and civil rights. ODOT has established goals around DBE participation in contracts and in public meetings. In addition, ODOT completed a 2021 Disparity Study for its DBE program for federal aid contracts, which will provide a guide for ODOT during NEVI program contracting and procurement.

While the final Oklahoma NEVI procurement program is still under development by ODOT and its peer agencies, ODOT will pursue the following set of interlocking strategies to ensure any EVSE stations ultimately awarded NEVI funding will provide efficient delivery of installation, ongoing NEVI program compliant operations, and maintenance and reporting activities during and after the period of the award. ODOT's strategies for developing its procurement program, soliciting applications, contracting with awardees, and managing the program are described in **Figure 4**.

Competitive Procurement • ODOT seeks applications for EVSE site hosts and owner operators for NEVI Formula Program funding **Eligible Applicants** Private Sites Public Sites Partnerships **Eligible Locations** • Exits on Interstates and EV AFCs • Exits within eligible charging "gaps" • Eligible sites within 1-mile driving distance **Selection Criteria** • Minimum NEVI compliance • Ranked criteria such as readiness, available amenities, cost, etc. **Transportation NEVI Program**

Source: ODOT

Figure 4: ODOT NEVI Procurement & Contracting Strategies

5.3 ODOT's NEVI Procurement & Contracting Next Steps

ODOT must receive U.S. DOT FHWA approval of its NEVI Formula program plan to receive year one and year two funding after federal approval and move forward with procurements and contracting with final awarded EVSE sites. Once the Oklahoma NEVI Plan is approved, ODOT must perform a variety of tasks to launch and administer its NEVI procurement program and execute contracts with all parties awarded NEVI funding. **Figure 5** describes the major next steps in the process for ODOT to design its procurement program, solicit applicants, execute all associated contracts and permitting, and manage the program to ensure all awarded parties install, operate, maintain, and report on NEVI funded EVSE according to U.S. DOT and ODOT compliance standards.

Figure 5: ODOT NEVI Procurement & Contracting Major Next Steps



Source: ODOT

As detailed in item #7 in **Figure 5** as well as described in more detail in Chapter 8, ODOT fully intends to execute contracts with all parties awarded NEVI funding. These contracts will be designed to fully incorporate and flow down relevant terms and conditions of Federal law, NEVI Formula program final rules, and ODOT specific provisions that will ensure both the minimum compliance requirements of the NEVI program are met, as well as U.S. DOT and ODOT goals of building a convenient, reliable, affordable, and equitable public charging network along Oklahoma's portions of the Interstate Highway System and Alternative Fuel Corridors.

6.0 Existing and Future Conditions Analysis

The electric vehicle industry has quickly become one of Oklahoma's most important economic industries. The growth of the EV sector has come through the State's commitment to diversify its economy to bring innovative companies and jobs to Oklahoma. The following Chapter introduces the State's geography, terrain, and climate (to include current and future temperature and precipitation patterns). This Chapter also includes a discussion of industry/market conditions (to include EV ownership/availability, grid capacity, electric utilities that service the study area) and land use patterns.

6.1 State Geography, Terrain, Climate and Land Use Patterns

Oklahoma is a relatively flat state with some low hills in the southeast portion of the state. Rainfall varies widely from east to west, with the eastern portions of the state receiving the most rain. Wind power is incredibly prevalent in Oklahoma, with about 41% of the state's overall electric generation coming from wind sources in 2021⁴. **Figure 6** shows elevation, average annual rainfall, and wind farms across the state.

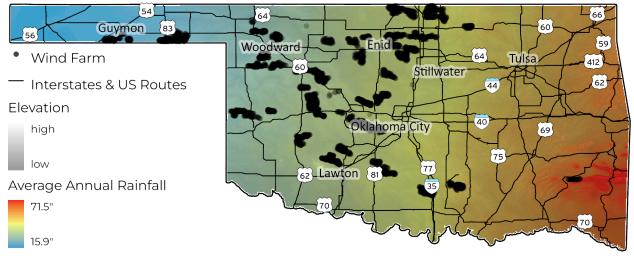


Figure 6: Elevation, Rainfall, and Wind Farms in Oklahoma

Source: Northwest Alliance for Computational Science and Engineering, PRISM Climate Group, USGS

Land cover in Oklahoma is depicted in **Figure 7** and **Table 4.** As shown in the table, 63% of the state is grassland, cultivated crops and pastureland, with deciduous forest making up 16.67%, mostly in the southeast portion of the state.

⁴ (2022, May 19). *Oklahoma State Profile and Energy Estimates*. U.S. Energy Information Administration. <u>U.S.</u> Energy Information Administration - EIA - Independent Statistics and Analysis

Guymon Woodward Enid Stillwater - Interstates & US Routes Land Cover Classification Oklahoma City Open Water 69 ■ Developed, Open Space Developed, Low Intensity Lawton Developed, Medium Intensity ■ Developed High Intensity ■ Barren Land (Rock/Sand/Clay) ■ Deciduous Forest Pasture/Hay ■ Evergreen Forest Mixed Forest Cultivated Crops Shrub/Scrub Woody Wetlands Grassland/Herbaceous ■ Emergent Herbaceous Wetlands

Figure 7: Land Cover Classification in Oklahoma

Source: Multi-Resolution Land Characteristics Consortium

Table 4: Land Cover Classification

Land Cover Classification	Percentage of Oklahoma Land
Grassland / Herbaceous	33.92%
Cultivated Crops	17.21%
Deciduous Forest	16.67%
Hay / Pasture	11.87%
Shrub / Scrub	6.00%
All Others	14.33%
Total	100.00%

Source: Multi-Resolution Land Characteristics Consortium

6.2 State Travel Patterns, Public Transportation Needs, Freight and Other Supply Chain Needs

In the State of Oklahoma, the higher volumes of average annual daily traffic (AADT) can be seen around the major cities of Oklahoma City and Tulsa, as shown in **Figure 8**. Outside of Oklahoma City and Tulsa, daily traffic tends to stay along the major Interstates and U.S. highways that connect population centers throughout the state of Oklahoma. Truck trips, shown

in **Figure 9**, are highly concentrated along I-40 west of Oklahoma City, and I-44 East of it. I-35 and US-69 also carry large amounts of truck traffic.

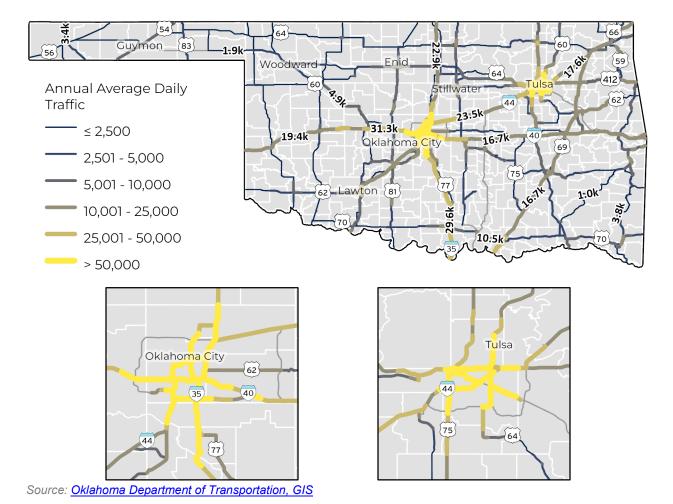


Figure 8: Map of Oklahoma Average Annual Daily Traffic

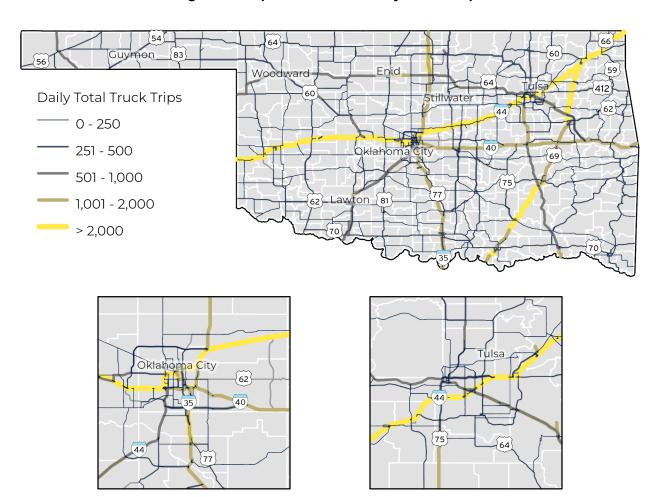


Figure 9: Map of Oklahoma Daily Truck Trips

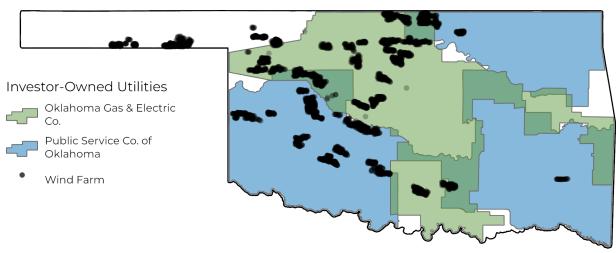
Source: Oklahoma Department of Transportation, GIS

The investor-owned utilities throughout the state are primarily split between Oklahoma Gas and Electric, Electric Company, Public Service Company of Oklahoma and Liberty Utilities⁵. As shown in **Figure 10**, both companies are very prominent throughout the state and have overlapping coverage predominantly in the southern and eastern sides of the state. The coverage of investor-owned utilities can be seen over most of the state but lacks coverage along the Oklahoma panhandle. The cooperative utilities have more rural coverage throughout the state compared to the investor-owned utilities, as shown in **Figure 11**.

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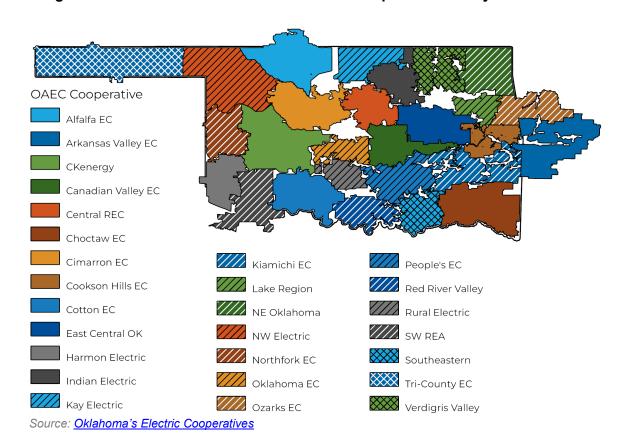
⁵ *Electric Utility.* Oklahoma Corporation Commission. https://oklahoma.gov/occ/divisions/public-utility/electric-utility.html

Figure 10: Oklahoma Investor-Owned Utilities and Wind Generation



Source: Homeland Infrastructure Foundation-Level Data (HIFLD)

Figure 11: Oklahoma Association of Electric Cooperatives Utility Service Areas



6.3 Alternative Fuel Corridors - Corridor Networks

The State of Oklahoma is currently home to 976 miles of "Corridor Ready" AFCs along eight Interstates, U.S. routes, and state routes according to the Alternative Fuels Data Center⁶. Along with the approved corridors, Oklahoma is continually working to improve the EV network. Currently there are 981 "Corridor Pending" miles along 10 routes. **Figure 12** shows the Ready and Pending corridors for Oklahoma and neighboring states, along with the most recent corridor submitted to FHWA in the recent AFC Round 6 Designations. **Table 5** provides the location and miles of each pending and ready AFC corridor. Approximately 68 miles of U.S. 412, a future Interstate in the IIJA Act, was nominated and awarded in Round 6. **Figure 13** shows detailed views of Round 1-6 nominations around Oklahoma City and Tulsa.

⁶ Data Downloads. Alternative Fuels Data Center. https://afdc.energy.gov/data_download/

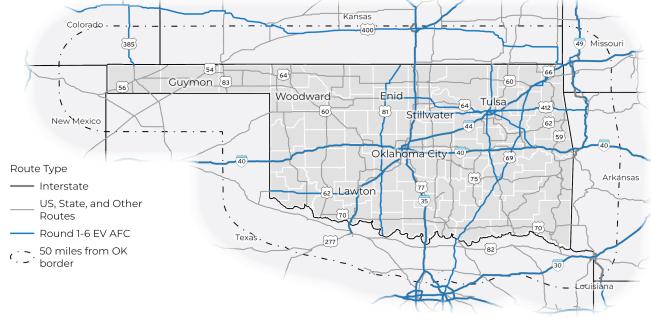


Figure 12: Oklahoma and Neighbor State Alternative Fuel Corridors

Source: Rounds 1-6 from Alternative Fuels Data Center, accessed 7/13/2022

Figure 13: Alternative Fuel Corridors in Oklahoma City and Tulsa



Source: Rounds 1-6 from Alternative Fuels Data Center, accessed 7/13/2022

Table 5: Pending and Ready Alternative Fuel Corridors

Route	Rounds 1-6 Pending Miles	Rounds 1-6 Ready Miles	Rounds 1-6 Total AFC Miles
I-35	89	147	236
I-40	98	232	330
1-44	36	290	325
US-62	93	0	93
US-69	198	44	242
US-75	22	132	154
US-81	230	0	230
US-412	173	26	199
SR-51	17	72	89
SR-351	22	33	56
Total	978	976	1,954

Source: Rounds 1-6 from <u>Alternative Fuels Data Center</u>, accessed 7/13/2022

6.4 Existing Locations of Charging Infrastructure Along AFCs

Oklahoma has a total 147 publicly availably DCFC throughout the state (**Figure 14**). Among these 147 chargers, 17 along Interstates are fully NEVI compliant. Forty-eight others, while also located along Interstates, are not fully compliant with NEVI power requirements. Note that at the time of writing, none of the Francis Energy DC Fast charging stations were shown in the Alternative Fuels Data Center (AFDC) database⁷ as NEVI compliant. Based on research of the Francis Energy stations, the team identified a number of them as additional NEVI compliant locations that are not shown in the AFDC data. An additional 82 DCFCs that do not meet NEVI criteria are located elsewhere throughout the state. Coverage is a critical element of electric vehicle charging infrastructure. However, there are still notable gaps around Tulsa and on I-35 north of Oklahoma City. **Table 6** shows the locations, power levels, and networks for each of the compliant chargers in Oklahoma. Location 25 consists of two sites, each with two 200kW chargers, and both within a mile of the same exit. Due to their proximity and US-412's status as a future interstate, these two locations together have been counted as one compliant site.

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⁷ Station Data for Alternative Fuel Corridors. Alternative Fuels Data Center. https://afdc.energy.gov/corridors

Table 6: Fully NEVI Compliant Electric Vehicle Charger Details

	Charger Power					
ID*	(#CCS Ports, kW)	Route	Location	EV Network		
4	1x 50 1x 150 2x 350	I-35	Walmart 129 1715 N. Commerce Ardmore, OK 73401	Electrify America		
43	4x 200	I-35	SureStay Hotel by Best Western 4545 White Ave Blackwell, OK 74631	Francis Energy		
66	4x 200	I-35	Phillips 66 A&W 12253 US-7 W Davis, OK 73030	Francis Energy		
77	4x 200	I-35	Western Farmers Electric Co-op 2900 S Telephone Rd Moore, OK 73160	Francis Energy		
108	2x 60 4x 200	I-35	Washita Casino 30639 OK-145 Paoli, OK 73074	Francis Energy		
136	1x 150 3x 350	I-35	Walmart 277 501 SW 19TH ST. Moore, OK 73160	Electrify America		
139	1x 150 3x 350	I-35	Casey's Blackwell 4415 W Doolin Ave Blackwell, OK 74631	Electrify America		
152	1x 50 1x 150 2x 350	I-40	Love's Erick 901 N Sheb Wooley Ave Erick, Oklahoma, 73645	Electrify America		
46	2x 50 2x 100 4x 200	I-40	Cherokee Travel Mart 245 S Walbaum Rd Calumet, OK 73014	Francis Energy		
94	4x 200	I-40	Hutch's C-Store #119 2001 E 7th St Elk City, OK 73644	Francis Energy		
138	1x 150 3x 350	I-40	Walmart 392 1349 E Eagle Rd Weatherford, OK 73096	Electrify America		
39	4x 60 4x 200	I-44	Hilton Garden Inn and Convention Center 135 NW 2nd St Lawton, OK 73501	Francis Energy		

	Charger Power			
ID*	(#CCS Ports, kW)	Route	Location	EV Network
90	4x 200	I-44	Williams Food 1812 E First St Chandler, OK 74834	Francis Energy
117	2x 60 4x 200	1-44	EZ GO 1896 I-44, Mile Marker 56 Chickasha, OK 73018	Francis Energy
119	2x 60 4x 200	1-44	EZ GO Mile Marker 169 E Turner Turnpike, I-44 Chandler, OK 74834	Francis Energy
137	1x 150 3x 350	I-44	Walmart 324 105 W. Hwy 16 Bristow, OK 74010	Electrify America
135	2x 150 2x 350	I-44 and US-60	Walmart 50 268 S. 7th St. Vinita, OK 74301	Electrify America
25	2x 200 and 2x 200	US- 412**	Colton's 32 Alexander Blvd Sand Springs, OK 74063 Harbor Freight Tools 651 E Charles Page Blvd Sand Springs, OK 75063	Francis Energy (both)

^{*}These IDs correspond with each charger location in ODOT's geodatabase and with Figure 14.

^{**} US-412 has been designated as a future interstate.

Source: U.S. Department of Energy, <u>Alternative Fuels Data Center</u>, and ODOT research as of 3/30/2022

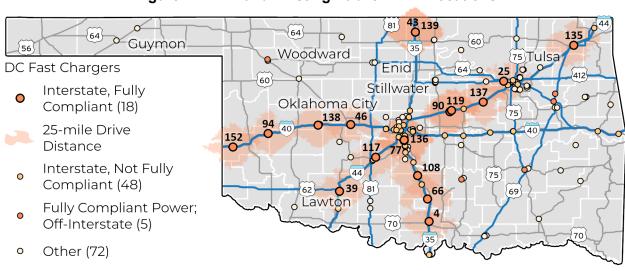


Figure 14: AFC and Existing Public DCFC Locations

EV Alt Fuel Corridor

Note: While there appear to be gaps at some locations at this scale, such as between points 4 and 66, the coverage area does overlap. The discrepancy is due to a lack of exits between these points that would fill out the polygons shown on the map.

Source: U.S. Department of Energy, <u>Alternative Fuels Data Center</u>, as of 3/30/22. Additional chargers verified on *Plugshare* 6/15/2022

6.5 Known Risks and Challenges

One of the largest risks for Oklahoma is the relatively lower travel volumes along some Interstates and U.S. and state routes. In order to enable EV drivers along these routes that already have AFC designation, the full 600kW total charger deployment is needed. However, due to the lower traffic volumes on some of the more rural routes, the market may not think these locations are worth the cost of installation. Oklahoma will consider this when procuring chargers to ensure that any lower-traffic areas are not left behind. In addition, while the number of EVs registered in Oklahoma has more than doubled in the past 24 months (**Figure 15**), the total number of EVs registered (both battery electric vehicles and plug-in hybrid electric vehicles) is only around 7,000, or around 0.35% of the total passenger car fleet in the State.

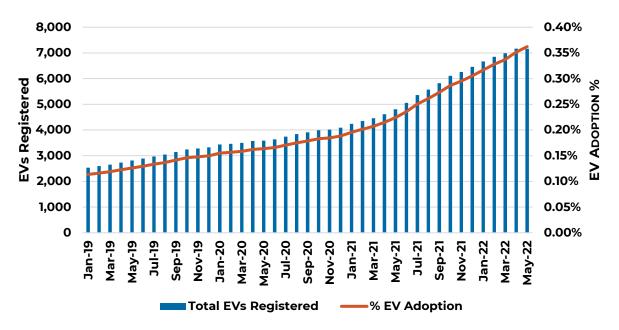


Figure 15: Oklahoma EV Registrations, Jan. 2019 - May 2022

Source: Oklahoma Gas and Electric, May 2022

Oklahoma has a comparatively large portion of tolled highways, which are managed separately from the toll-free federally funded highways and have different rules regarding paying for services at rest areas. ODOT will continue to coordinate with the OTA to ensure the goals around EV charging are aligned.

Other challenges that could arise throughout the process include political opposition to chargers, various permitting issues depending on specific locations, under-utilization of chargers leading to low profitability for owners/operators, funding for EVs and EV parts, continued supply chain delays, weather affecting a site's viability, etc. In addition, there are a handful of Tesla Superchargers and one Tesla store in the state. While Tesla Superchargers have historically been exclusive to Tesla vehicles, there are discussions about opening these chargers up to non-Tesla vehicles after similar changes in Europe. This could be a risk for other charging companies looking to deploy nearby but would ultimately be a benefit for EV drivers in the state. Oklahoma will monitor each of these factors and adjust accordingly as chargers are deployed.

EV infrastructure is still evolving and in 5 years there may be charging solutions that are not common today. ODOT needs to be adaptable to these innovations and allow the opportunity to utilize these technologies if they become viable solutions. Examples could be wireless and dynamic charging that is already available or some unknown advancement that changes the face of EV charging.

7.0 Electric Vehicle Charging Infrastructure Deployment

This chapter discusses the overarching strategy for ODOT's NEVI EV charging infrastructure installations and associated policies to meet ODOT's vision and goals.

7.1 Funding Sources

Oklahoma is allocated \$66 million, over the next five years, in NEVI Formula funds to create an EV charging network across the state, which will cover build-out of Oklahoma's AFCs and allow ODOT to address additional priorities as their program evolves. ODOT will seek to have vendors or site hosts bidding on the projects provide the minimum required 20% match. ODOT is open to covering operations and maintenance costs, including utility fees in the overall project cost and using their federal allocation to cover 80% of these costs.

7.2 2022 Infrastructure Deployments/Upgrades

ODOT has analyzed their AFC system to determine viable locations for new NEVI compliant EVSE installations as well as identified existing locations of NEVI compliant EVSE and other existing EVSE chargers that might be upgraded to meet minimum NEVI Formula Program standards. The following subsections include information about how NEVI funded EVSE deployments will be built out to "corridor ready" status, and address needs for upgrades, redundancy, increases in capacity, freight movement, public transit needs, and local, state, and federal policy considerations over the five-year administration of NEVI Formula funding. ODOT has followed the process for analysis, planning, and mapping to determine the approximate locations for NEVI compliant installations along Oklahoma's Interstate AFCs as a first priority in FY2022. The goal of this analysis was to come up with a scoring criterion at each exit along the Interstates outside of the existing NEVI compliant coverage areas to determine the likelihood of 3-phase power to support 4-150kW DC fast chargers. The deployment of future NEVI compliant charging locations along US and State routes will be implemented after the interstates are fully built out.

Step 1: Identify existing NEVI compliant charging sites and create a 25-mile driving distance buffer around NEVI compliant sites. Note that the NEVI guidelines state chargers should be every 50 miles, but by using a 25-mile driving distance buffer, it's easier to see the gaps where chargers should be located. **Figure 16** shows the coverage areas for the existing NEVI compliant EVSE and coverage areas.

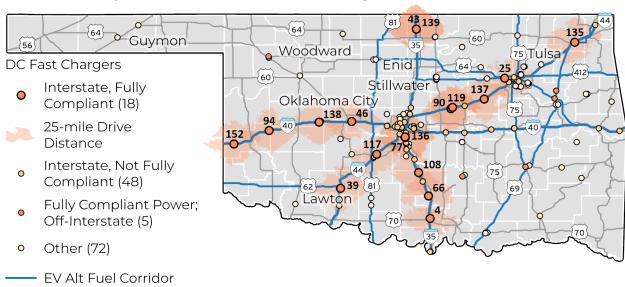


Figure 16: Oklahoma AFC and Existing Public DCFC Locations

Source: U.S. Department of Energy, Alternative Fuels Data Center and ODOT research as of 3/30/2022.

Step 2: Identify the Interstate gaps in charging outside existing NEVI compliant charging coverage areas. Note that some of the coverage areas appear to cover multiple Interstates but are not considered to serve other Interstates unless they are within one mile of each Interstate. For example, the existing NEVI compliant charging site on I-35 south of I-40 would not serve I-40 east or west of downtown Oklahoma City. Figure 17 shows the coverage area gaps highlighted in green. Table 7 shows the exits along I-40, in the green highlighted areas, that are outside of existing compliant coverage areas, as an example coverage analysis.



Figure 17: Oklahoma Interstate Charger Coverage Gaps

Source: U.S. Department of Energy, Alternative Fuels Data Center and ODOT research as of 6/18/2022.

Step 3: Identify all Interstate exits within the coverage area gaps. Exclude any exits that that are not accessible from both directions. I-40 is used as an example in **Figure 18** and **Figure 19**.

Table 7: Example Corridor Siting Analysis on I-40

Exits along I-40 Outside of Existing NEVI Compliant Charging Coverage Areas					
Exit 132: N Cimarron Rd	Exit 157A*: SE 29th St	Exit 237: Bryant Rd			
Exit 134: Frisco Rd	Exit 157B: S Air Depot Rd	Exit 247: N4030Rd			
Exit 136: Garth Brooks Blvd	Exit 157C: Town Center Dr	Exit 255: N4100 Rd			
Exit 137: N Czech Hall Rd	Exit 159A: Industrial Blvd	Exit 259: N4140 Rd			
Exit 138: N Mustang Rd	Exit 159B: S Douglas Blvd	Exit 262: N4170 Rd			
Exit 140: S Morgan Rd	Exit 162: S Anderson Rd	Exit 265: Broadway St			
Exit 142: S Council Rd	Exit 166: S Choctaw Rd	Exit 270: S4250 Rd			
Exit 143: S Rockwell Ave	Exit 169: Peebly Rd	Exit 278: OK-2			
Exit 144: S MacArthur Blvd	Exit 172: Harrah-Newalla Rd	Exit 284: Ross Rd			
Exit 145: Meridian Ave	Exit 176: S Mcloud Rd	Exit 287: Rd 4425			
Exit 146*: S Portland Ave	Exit 178: Hwy Dr	Exit 291: OK-10			
Exit 148: S Pennsylvania Ave	Exit 185: N Kickapoo Ave	Exit 297: Thornton St			
Exit 149: S Western Ave	Exit 186: Harrison Ave	Exit 303: N4570 Rd			
Exit 150: S Shields Blvd	Exit 192: Valley View Rd	Exit 308: S Kerr Blvd			
Exit 127*: (I-35): MLK Ave	Exit 200: US-377	Exit 311: E Cherokee Ave			
Exit 154: Scott St	Exit 212: OK-56	Exit 321: Main St			
Exit 155A: S Sunnylane Rd	Exit 217: OK-48	Exit 325: US-64			
Exit 155B: SE 15th St	Exit 221: S Woody Guthrie St	Exit 330: Dora Rd			
Exit 156A: S Sooner Rd	Exit 227: N3830 Rd				
Exit 156B*: Hudiburg Rd	Exit 231: N3870 Rd				

^{*} Exit does not serve both directions of travel and was not considered

Source: ODOT research

Step 4: Investigate the number and type of amenities within one mile driving distance from exit as a proxy to determine likelihood of 3-phase power availability. Assume 3-phase power is available if one of the following is true:

- The exit has a truck stop or a retail/big box store, or
- The exit has at least 2 gas stations/convenience stores and 1 high turnover restaurant, or vice versa.
- Evidence on distribution pole line, I.e., poles that have cluster of three transformers or three wires on crossarm.

Two examples of exits along I-40 are shown below. **Figure 18** shows exit 217 that does not meet the siting criteria with only one gas station. **Figure 19** shows exit 166 that meets the siting criteria since it has at least one truck stop within one mile of the Interstate.

Figure 18: I-40, Exit 217



Figure 19: I-40, Exit 166



Step 5: Group the potential sites to ensure that any site selected in one group will be within 50 miles of a charger in the next group. The I-40 corridor is used below as an example (**Figure 20**).

Stillwater

Group A

Oklahoma Group C

Group E

Group G

Group B

Group D

Group F

Group B

Group D

Figure 20: I-40 Exits that Met the Siting Criteria by Group

Source: ODOT

Alternatively, if the goal of the siting analysis is to achieve the fewest number of chargers (minimum buildout), based on the existing NEVI compliant charger at exit 108, the "optimized" siting is shown in **Table 8** in orange highlight with chargers every 50 miles along I-40. By limiting the viable sites to only the exits that are spaced as close to 50 miles as possible, the total number of charging sites along the corridor can be reduced (note that exits in groups B and E are not needed).

Table 8: I-40 Exits that Met the Siting Criteria by Group

Group	Corridor Exit	# of Gas Stations/Conv Store (none=0, 1=1, >=2=2)	# of Restaurants (none=0, 1=1, >=2=2)	Truck Stop Facilities (Y/N)	Retail Center/ Big Box Store (Y/N)
	Exit 136: Garth Brooks Blvd	2	2	N	Y
	Exit 137: N Czech Hall Rd	1	2	N	Υ
	Exit 138: N Mustang Rd	1	2	N	Υ
	Exit 140: S Morgan Rd	0	2	Y	N
	Exit 142: S Council Rd	2	2	Υ	Υ
	Exit 143: S Rockwell Ave	1	2	N	Υ
۸	Exit 144: S MacArthur Blvd	2	2	N	Υ
Α	Exit 145: Meridian Ave	2	2	N	N
	Exit 155A: S Sunnylane Rd	2	2	N	Υ
	Exit 155B: SE 15th St	0	2	N	Υ
	Exit 156A: S Sooner Rd	1	2	N	Υ
	Exit 157B: S Air Depot Rd	1	2	N	Υ
	Exit 157C: Town Center Dr	0	2	N	Υ
	Exit 159B: S Douglas Blvd	2	2	N	N
	Exit 166: S Choctaw Rd	2	2	Y	N
	Exit 176: S Mcloud Rd	2	2	Y	N
В	Exit 178: Hwy Dr	0	0	Y	N
	Exit 185: N Kickapoo Ave	2	2	N	Υ
	Exit 192: Valley View Rd	0	0	Y	N
С	Exit 200: US-377	2	2	Y	N
C	Exit 212: OK-56	1	2	Y	N
D	Exit 221: S Woody Guthrie St	2	2	Y	N
D	Exit 240B*: US-62/US-75	2	2	N	Υ
Е	Exit 265: Broadway St	2	2	N	N
	Exit 278: OK-2	1	2	N	N
	Exit 287: Rd 4425	0	1	Υ	N
F	Exit 297: Thornton St	1	2	Y	N
	Exit 308: S Kerr Blvd	0	2	Υ	Y
	Exit 311: E Cherokee Ave	1	2	N	N
G	Exit 321: Main St	0	0	Υ	N
G	Exit 325: US-64	1	1	Υ	N

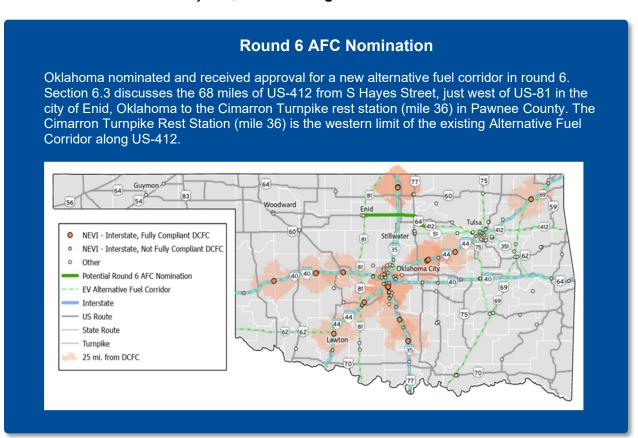
^{*} Would require an exception since the commercial area is slightly greater than 1 mile off I-40

Source: ODOT

Once all existing EV AFCs are analyzed for site viability, ODOT will coordinate with utilities for power availability at each exit. Additional steps to determine station location or decision-making framework will include items such as equity considerations and/or input from community engagement to help prioritize the viable exits. For the sites that met the two criteria in step 4 and that are shown in step 5, ODOT will continue further analysis to include criteria such as equity, proximity to other DCFCs, tourism, freight routes, transit routes, AADT, EV adoption, etc.

By continuing this step-by-step process for all of the Interstates in Oklahoma, all of the viable exits were identified and grouped to ensure no more than 50-mile coverage gaps. In an effort to keep the size of the deployment table more manageable, **Table 9** includes only a sample of potential charging locations for each group of the proposed charging locations along current AFCs in the state. These represent the minimum number of approximate sites determined through ODOT's analysis. The final locations will be determined by ODOT soliciting competitive applications who will select sites that ODOT will review and award based on the applicants' ability to meet all NEVI criteria and ODOT goals. Each group identified has multiple exits that are viable, but only one exit will be chosen per group during the bidding process. The EV network and station ownership will be dependent on bids, so those columns were not included.

ODOT will utilize a phased approach to achieving full coverage, beginning with Interstates in FY22, as seen in **Table 9** and **Figure 21**, and then expanding use of funds to other AFCs along U.S. and State routes in later years, as seen in **Figure 22**.



The siting analysis for the U.S. and State routes is similar to the Interstate methodology but differs slightly since many of these routes are not limited access with individual exit locations like Interstates. Instead of a singular point analysis, a more general area analysis was conducted looking typically at towns along the routes that had traveler amenities and the likely existence of 3-phase power.

Table 9: Example Generalized Proposed Interstate Charging Locations Details

State EV Charging Location Unique ID*	Route (Rounds 1-6 Pending)	Location	Utility Territories	Percentage of FY23-FY26 Funding and Party Responsible
1122	I-35	Exit 1401	OK Gas & Elec, OR Red River Valley RRL Elec Assn	80% NEVI; 20% EVSE Owner
1	I-35	Exit 140	OK Gas & Elec.	80% NEVI; 20% EVSE Owner
13	I-35	Exit 174	OK Gas & Elec., OR Central REC	80% NEVI; 20% EVSE Owner
33	I-40	Exit 142	OK Gas & Elec.	80% NEVI; 20% EVSE Owner
53	I-40	Exit 166	OK Gas & Elec., OR Oklahoma EC	80% NEVI; 20% EVSE Owner
62	I-40	Exit 200	OK Gas & Elec., OR Canadian Valley EC	80% NEVI; 20% EVSE Owner
121	I-40	Exit 240B	Public Service Co. of OK, OR East Central Oklahoma Elec. Coop Inc.	80% NEVI; 20% EVSE Owner
68	I-40	Exit 265	OK Gas & Elec., OR Public Service Co. of OK, OR East Central OK	80% NEVI; 20% EVSE Owner

State EV Charging Location Unique ID*	Route (Rounds 1-6 Pending)	Location	Utility Territories	Percentage of FY23-FY26 Funding and Party Responsible
78	I-40	Exit 311	OK Gas & Elec., OR Cookson Hills EC	80% NEVI; 20% EVSE Owner
82	I-40	Exit 325	OK Gas & Elec., OR Arkansas Valley EC, OR Cookson Hills EC	80% NEVI; 20% EVSE Owner
86	I-44	Exit 5	Public Service Co. of OK, OR Cotton EC	80% NEVI; 20% EVSE Owner
104	I-44	Exit 124	OK Gas & Elec.	80% NEVI; 20% EVSE Owner
114	I-44	Exit 240	Public Service Co. of OK	80% NEVI; 20% EVSE Owner

^{*}Defined by the State – this should match the unique ID in the State's applicable GIS databases. It should be clear that the Unique IDs correspond to general locations for proposed installations rather than pinpoint geocoordinates. One point per direction of travel per exit. These ID's also match the map in Figure 20.

Source: ODOT

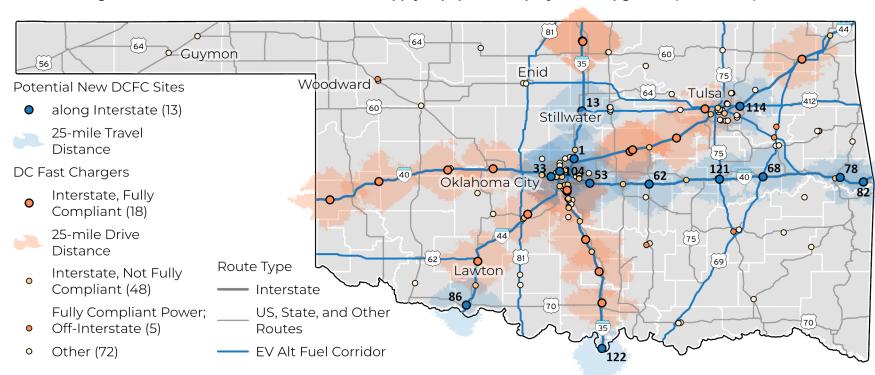


Figure 21: Fiscal Year 22 Electric Vehicle Supply Equipment Deployments/Upgrades (Interstates)

ODOT does not intend to restrict its competitive procurement process to the 13 sites shown in this process. ODOT will design its competitive procurement program, as described in Chapter 5, to include both NEVI formula program minimum requirements and any further ODOT-defined scoring criteria such as the ability of the site to maximize EV charging gap coverage, available power, available amenities, cost-effectiveness, etc.

Note: While there appear to be gaps at some locations at this scale, such as between Lawton and Oklahoma City, the coverage area does overlap. The discrepancy is due to a lack of exits between these points that would fill out the polygon.

Source: ODOT

7.2.1 Upgrades of Corridor Pending Designations to Corridor Ready Designations

Oklahoma has no complete AFCs that currently meet the new FHWA Round 6 and NEVI compliant standards. **Table 10** summarizes the minimum number of chargers needed for Oklahoma to be fully built out to cover the 10 currently designated AFCs. Based on charging vendor outreach, it was assumed that the average cost to build a new NEVI compliant site would range from \$600,000 to \$1.2 million depending on site attractiveness (i.e. expected revenue or competition in bidding), the cost of upgrading power service, and any other site or charger specific infrastructure needs (i.e. use of solar or storage). For planning purposes, it was assumed that \$1 million per NEVI compliant site would be used in this Plan.

Table 10: Existing Electric Vehicle Alternative Fueld Corridors - Proposed Charging Locations Details

Route	# NEVI Compliant Charging Sites	Groups of Chargers (that fill Gaps)	Options to Fill Gaps	Min. Build-out \$	Notes
I-35	5	3	12	\$3,000,000	
I-40	4	7	30	\$7,000,000	
*I-44	6	5	15	\$5,000,000	Portions of H.E. Bailey, Turner, & Will Rogers Turnpikes
US-62	0	3	4	\$3,000,000	
US-69	2	6	7	\$6,000,000	
US-75	0	4	13	\$4,000,000	
US-81	0	7	14	\$7,000,000	
*US-412	0	4	4	\$4,000,000	Includes the US-412 portion awarded in AFC Round 6. Portions of the Cherokee & Cimarron Turnpikes
SR-51	1	3	4	\$3,000,000	
*SR-351	1	1	4	\$1,000,000	Portions of the Muskogee Turnpike already within NEVI compliant coverage area
10 AFC's	19	43	107	\$43,000,000	

^{*}Due to constraints with Turnpike Toll Roads receiving federal funding, ODOT will not seek to site NEVI locations within the Turnpike right-of-way portions of these routes (e.g., service plazas) in Oklahoma. Source: ODOT

81 64 Guymon 60 (56) Enid Woodward ⁹ Potential New DCFC Sites 64 (60) along Interstate (13) Stillwater 9 9 Tulsa 25-mile Travel Distance 75 along US & State Oklahoma City Routes (21) 25-mile Travel Distance DC Fast Chargers Lawton 69 Interstate, Fully Compliant (18) 25-mile Drive 70 Distance Route Type Interstate, Not Fully Compliant (48) Interstate Fully Compliant Power; US, State, and Other Off-Interstate (5) Routes Other (72) EV Alt Fuel Corridor Source: ODOT

Figure 22: Oklahoma Electric Vehicle Alternative Fuel Corridor Designations and Proposals

In two locations, I-40 at US-69 and I-40 at US-75, the proposed charger is close enough to both routes to count as compliant for both. In these cases, an additional charger is not needed or recommended at the overlap. In other locations, such as along US-62 west of Lawton, the travel distance polygons do not appear to overlap at this scale due to a lack of exits to local roads, but they do overlap when examined at a smaller scale. Coordination with neighboring states about charging gaps along state borders has taken place. For example, the charging gap in the far northeast part of the state along I-44 will be covered as part of Missouri's NEVI plan to install a NEVI compliant charger in Joplin, MO, which is within 50 miles of the existing NEVI compliant charger in Vinita, OK (ID 135 in **Table 6**). As with the Interstate locations in **Figure 20**, the U.S. and State Route locations shown in **Figure 22** are only illustrative and will be chosen using a competitive bid process based on actual sites selected by bidders.

7.2.2 Increases of Capacity/Redundancy along Existing AFC

Once Oklahoma's AFCs are fully built out, ODOT will look for opportunities to provide redundancy to the network, whether that is in the form of additional DCFC at high volume locations or installing high power chargers at new sites. In either case, the state of Oklahoma is open to EVSE owned and operated by non-state, public, and a variety of private parties. ODOT will also seek to support discretionary grant applications that fill in network gaps and provide redundancy in critical locations.

7.2.3 Electric Vehicle Freight Considerations

ODOT developed the Oklahoma Freight Transportation Plan to provide a safe, reliable, and productive freight transportation system that supports the growing economy and population in the state. It strives to accomplish the following outcomes:

- Increase attention and focus on freight needs and opportunities.
- Improve coordination of freight planning across multiple modes.
- Provide guidance for other state and regional/metropolitan freight planning efforts.
- Obtain input from the public and private stakeholders regarding state freight planning.

PLAN DOCUMENT | DECEMBER 2017
Oklahoma Freight Transportation Plan
2018–2022

Chapter 4, The Freight Future describes the trends that affect the demand for and provision of freight transportation services in the state. The text outlines the implications that the trends pose for the current freight system in Oklahoma. Some of the key take-a-ways regarding electricity and electric vehicles included:

- Wind Energy According to the U.S. Energy information Administration, in 2015
 Oklahoma ranked third in the nation in net electricity generation from wind, which
 provided about one-fourth of the state's total.
- Adoption of different and new technology is apt to accelerate, including use of national gas and hybrid electric trucks, and safety advances associated with connected and automated/autonomous vehicles (C/AV).
- Proximity to Electric Vehicle (EV) fast charging stations was used as a performance measure in the evaluation criteria for evaluating potential freight projects.

The Oklahoma freight network consists of the state's transportation corridors and assets designated as parts of the National Highway Freight Network (NHFN). The Primary Highway Freight System (PHFS) is the network of highways identified as the most critical highway

portions of the U.S. freight transportation system. **Figure 23** shows Oklahoma's National Highway Freight Network.



Figure 23: Oklahoma National Highway Freight Network

Source: National Highway Freight Network

The Oklahoma Primary Highway Freight Network corridors of I-35, I-40 and I-44 are also Oklahoma Alternative Fuel Corridors and will be addressed in the States NEVI Plan. Oklahoma has started preparing for an update to the State Freight Plan and it is anticipated to be completed in 2022.

7.2.4 Public Transportation Considerations

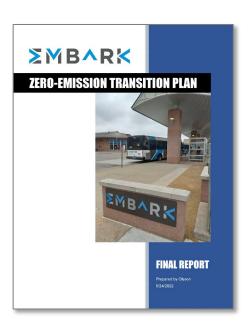
Once the State has built out and certified its AFCs, discretionary funding will remain available to address non-AFC areas. Key among these issues are Oklahoma residents who prefer not to drive or do not have personal vehicle access and need transit as a solution to meet their mobility needs. As a partner to Oklahoma's public transportation providers, ODOT is uniquely positioned to support providers around the state to improve public transportation with NEVI program funds. Funding can be used in a variety of ways, including implementation of EV charging infrastructure at transit-specific parking areas that are publicly accessible.

ODOT will continue to work with its public transportation partners throughout the state to assess and evaluate mutually beneficial charging infrastructure opportunities in areas for the public after all AFC are fully built out.

Currently across the state, transit agencies in both urban and rural communities are beginning to invest in electric vehicle infrastructure and integrate electric buses into their fleets. These communities include Oklahoma City, Tulsa, Norman and Cherokee Nation. Other agencies across the state are in the beginning stages of fleet electrification by identifying EV facility locations, funding opportunities, and considering routes within their system that would most benefit from electrification. Additionally, The Regional Transportation Authority of Central

Oklahoma (RTA) has begun discussions around the development of park and ride lots, whereby the integration of EV charging could provide a local benefit for people utilizing parking areas to access transit.

To guide future zero-emission bus procurement, Embark, the Oklahoma City Region's public transportation provider, developed a Zero-Emission Transition Plan in 2022. The Plan will provide a roadmap for Embark as they seek funding opportunities to transition electric buses or other zero emission vehicles into their fleets. The Plan aligns with Embark's effort to phase in alternative fuel buses, such as CNG and electric – Embark's first battery electric bus (BEB) entered service in 2020, and a second BEB is expected to be delivered in 2022⁸.



7.3 FY23-26 Infrastructure Deployments

ODOT will initially focus on building out FHWA Designated AFCs. After the USDOT Secretary has certified Oklahoma's AFCs as "fully built out" to NEVI compliant standards, ODOT will seek to expand NEVI formula funded EVSE deployments to additional priority areas. In general, the expected annual federal allocation and matching funds will follow the values noted in **Table 11**.

Table 11: Expected Year 2 through Year 5 Annual Federal and Matching Funds

	Federal Funding	Matching Funding	Total Funding
Program Management (Assumed 5%)	\$3,314,849	\$828,712	\$4,143,561
EVSE Deployment Dollars Available (Total minus PM)	\$62,982,123	\$15,745,531	\$78,727,654
Program Total	\$66,296,972	\$16,574,243	\$82,871,215
Total Number of EVSE Sites at \$1M/Site	62*	15*	78*
Year 1 total	\$9,812,934	\$2,453,234	\$12,266,168
Annual Total (Y2 through Y5)	\$14,121,010	\$3,530,252	\$17,651,262
Total %	80%	20%	100%

^{*} Estimated number of EVSE sites that can be built assuming \$1M/site

Source: ODOT

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⁸ (2022). Zero-Emission Transition Plan: Final Report. Embark

Based on the total number of proposed EVSE sites to fully build out Oklahoma's AFC network shown in **Table 10** (43 charging locations - 15 on Interstates and 28 on US/State Routes), the preliminary funding allocation by year is shown in **Table 12**.

Table 12: Preliminary Allocation of Funding

Phase	Annual Deployment	Annual Federal Funding Available*	Expected Funding Spent	Notes
	Y1: Interstates	\$9,322,287	\$9,000,000	9 Interstate chargers
I	Y2: Interstates & US/State Routes	\$13,414,960	\$13,000,000	6 Interstate chargers and 7 US/State route chargers
	Y3: US/State Routes	\$13,414,960	\$13,000,000	13 US/State route chargers
II	Y4: US/State Routes & Discretionary	\$13,414,960	\$8,000,000	8 remaining US/State route chargers and discretionary
III	Y5: Discretionary	\$13,414,960	TBD	Remaining discretionary
		\$62,982,127	\$43,000,000	

^{*} Less assumed 5% project management costs

Source: ODOT

7.4 State, Regional, and Local Policy

The proliferation of electric vehicles across the state has spurred investment in and implementation of charging infrastructure, making electric vehicles the number one alternative fuels vehicle in Oklahoma⁹. Efforts to maintain and grow electric vehicles have included both statewide policy and regional coordination. These policies include:

Plug-In Electric Vehicle (PEV) Infrastructure Support - Oklahoma utilities joined the
National Electric Highway Coalition (NEHC), committing to create a network of direct
current fast (DC Fast) charging stations connecting major highway systems from the
Atlantic Coast to the Pacific of the United States. NEHC utility members agree to ensure

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⁹ Alternatives Fuels Data Center

efficient and effective fast charging deployment plans that enable long distance EV travel, avoiding duplication among coalition utilities and complement existing corridor DC fast charging sites.

- **Plug-In Electric Vehicle (PEV) Fee -** PEV owners must pay an annual registration fee in addition to standard vehicle registration fees, at a rate that is dependent upon vehicle weight. Revenue from the annual fee will be apportioned to the Driving on Road Infrastructure Vehicles of Electricity Revolving Fund ¹⁰.
- Electric Vehicle Supply Equipment (EVSE) Charging Tax Public EVSE are subject to a tax of \$0.03 per kilowatt-hour. The EVSE charging tax will go into effect on January 1, 2024. The tax does not apply to EVSE at private residences. Tax revenue will be apportioned to the Driving on Road Infrastructure with Vehicles of Electricity (DRIVE) Revolving Fund. Oklahoma residents may apply EVSE tax payments as income tax credits that may be carried forward for up to five years¹¹.
- Electric Vehicle Supply Equipment (EVSE) Tax Exemption EVSE with a charging
 capacity of less than 50 kilowatts are exempt from the \$0.03 per kilowatt-hour tax on
 electricity used to recharge electric vehicles¹².

¹⁰ Reference <u>House Bill</u> 2234, 2021, and <u>Oklahoma Statutes</u> 68-6511

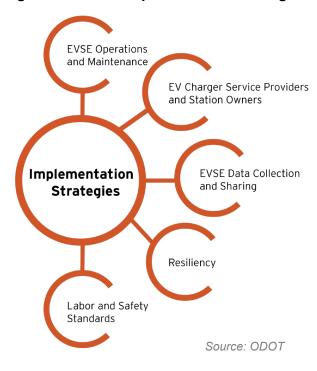
¹¹ Reference House Bill 2234, 2021, and Oklahoma Statutes 68-6501 through 68-6510

¹² Reference Senate Bill 600, 2021

8.0 Implementation

As described in Chapter 5 and Chapter 7, ODOT will use a competitive procurement process to award third-party (public, private, or a combination of both) owner-operators NEVI funding to install, operate and maintain compliant EVSE. ODOT's contractual terms and conditions will reflect both NEVI formula program requirements and ODOT specific requirements to awarded parties. EVSE contracts will be intended to ensure basic NEVI minimum compliance while also meeting ODOT's goals of convenient, reliable, affordable and equitable charging; reliable data for program evaluation and compliance; and safe and reliable EV deployment. The sections below provide an overview of ODOT's implementation strategies based on NEVI's Notice of Proposed Rule Making (NPRM). Figure 24 provides a snapshot of the 5 overarching implementation categories reflected in Chapter 8.

Figure 24: ODOT Implementation Strategies



8.1 Strategies for EVSE Operations and Maintenance

ODOT has reviewed the Notice of Proposed Rulemaking (NPRM) and begun working internally to develop contracts. The contracts ODOT develops for any parties awarded NEVI formula funds will specifically be required to comply with final rules in NRPM including:

- Accessibility Charging stations and related system must be available for use 24/7 and allow customers to report issues with ADA multilingual access.
- **Payment Methods** Contactless payment method accepting of all major debit/credit cards capabilities must be available, along with the ability for users to access the system without having a previous membership.
- Service Expectation While system maintenance is expected, charging services are
 expected to be available at a minimum of 97% of the time, meaning any downtown for
 system maintenance must be at 3% or less annually. A customer support number will
 be developed.
- **Long-Term Maintenance** EVSE will be required to be maintained in compliance for at least five years after install date.

8.2 Strategies for Identifying Electric Vehicle Charger Service Providers and Station Owners

Per ODOT and NPRM standards, ODOT will ensure a transparent procurement process, making public the number of bids, awardees, contract terms, project financial cost and award amounts and disclosures of how fees for charging will be set by awardee.

ODOT will publicize requests for proposals (RFPs) through their website, press releases, social media outlets, and other forms of public notices. These efforts will also include leveraging partnerships with regional MPOs, and other local entities to ensure activities made known by the public and potential EVSE providers and station owners.

8.3 Strategies for EVSE Data Collection and Sharing

As outlined in the NPRM, ODOT will ensure that third party contracts fulfill their obligation of EVSE data collection and data sharing. Awarded third parties will be required to comply with all NPRM communications protocols and standard. Some of the NPRM data collection and sharing standards will include:

Network Interoperability –

- EVSE hardware must have the ability to receive/implement secure, remote software updates, with real-time protocol translation, encryption/decryption, authentication, and authorization with network.
- Network must be capable of communicating with other Networks to enable an EV driver to use a single credential to charge at Charging Stations that are a part of multiple Charging Networks.
- Charging Networks must be capable of secure communication with electric utilities, other energy providers, or local energy management systems.
- **Cyber Security** strategies must address identity and access, encryption, malware detection, event logging/reporting, software updates and secure operation.
- **Customer Data Privacy** Only gather personal info "strictly necessary" to provide charging service and take all reasonable measures to safeguard data.
- **Data submittal** Quarterly and annual data submittals will be provided to ODOT on uptime, cost of electricity to operate EVSE, maintenance and repair costs, as well as name, address, type of private entity involved in installation, operation and maintenance.

Charging data trends and system usage will be published for the public through an ODOT web-based dashboard. The dashboard will provide a map of stations and relevant system data.

8.4 Strategies to Address Resilience, Emergency Evacuation, Snow Removal/Seasonal Needs

Deploying, operating, and maintaining a resilient NEVI funded EVSE is critical to ODOT. Standards that will be required to ensure operability year after year include:

- Resiliency ODOT will consider additional scoring criteria / weighted criteria in its
 competitive procurement for stations that have resiliency technologies through
 Distributed Energy Resources (DERs) such as solar, wind, and battery storage. These
 technologies not only ensure year over year operation, but that will make the cost of
 EVSE operation lower and the station able to operate in the event of a grid outage.
- **Emergency** ODOT will continue to work closely with the Oklahoma Department of Emergency Management to promote the availability of EVSE in emergency situations.
- **Snow removal / seasonal** 24/7 accessibility to charging stations is a critical feature of this program. During snow and ice events, vendors will be required to ensure charging stations (at the station and on property providing access to charger) are made clear and accessible for users during winter weather through snow and ice treatment and removal.

8.5 Strategies to Promote Strong Labor, Safety, Training and Installation Standards

ODOT is committed to strong labor, safety, training and installation standards, and recognizes the NPRM standard for equipment certification. ODOT will require that all EVSE are certified by an Occupational Safety and Health Admin National Testing Lab before installation, and that electricians installing, operating, and maintaining equipment must be Electric Vehicle Infrastructure Training Program (EVITP) certified or hold another equal credential to ensure safe installation.

ODOT will coordinate with the Oklahoma Office of Workforce Development, as mentioned in **Chapter 11**, to consider opportunities to recognize EVITP within the Oklahoma Works program. Building on partnerships to ensure that a skilled workforce is available to implement emerging technologies such as EVSE is critical to the Oklahoma's economy and to ODOT's mission to provide a safe, economical and effective transportation network for the people, commerce and communities of Oklahoma.

9.0 Civil Rights

All Federal and State civil rights will be upheld throughout the NEVI program. All Federal laws, state laws and accompanying requirements have long been incorporated into ODOT's existing procurement process including but not limited to Title VI of the Civil Rights Act, the Americans with Disabilities Act, and Section 504 of the Rehabilitation Act.

Oklahoma passed an Anti-Discrimination Act which states that employers may not discriminate on the basis of race, color, religion, sex, national

Civil Rights

The Oklahoma Department of Transportation (ODOT) ensures that no person or groups of persons shall, on the grounds of race, color, sex, age, national origin, disability/handicap, or income status, be excluded from participation in, be denied the benefits of, or be otherwise subjected to discrimination under any and all programs, services, or activities administered by ODOT, its recipients, sub-recipients, and contractors.

origin, age, genetic information or disability, unless the employer can demonstrate that a disability accommodation would impose an undue hardship on the operation of the employer's business¹³. ODOT will comply with these laws for all NEVI purposes and will hold any third-party contractor to the same compliance. Compliance will occur, at a minimum in these areas:

- Outreach All public meetings will follow the state and Federal Civil Rights laws as well
 as guidance from the ODOT Public Involvement Plan to ensure that all voices are
 heard as planning for the NEVI program takes place.
- Procurement All procurement documents will lay out Civil Rights laws and expected compliance requirements. ODOT's Procurement Division¹⁴ will assist in creating the procurement documents.
- Contracting Given the NEVI program will have contracts extending to at least five years, contracts will have data collection and routine check-ins to support performance measurement and contract compliance verification throughout the contract period. ODOT's Contracts Compliance Division will assist the project team in all aspects of contracts and Civil Rights compliance for this program. The mission of the Contract Compliance Division is to ensure equal employment opportunity within ODOT, to level the playing field for DBEs by providing full and meaningful participation opportunities in ODOT's federally funded highway projects and to plan, implement and provide guidance to prevent discrimination in federal aid programs and activities 15.

¹³ Oklahoma Anti-Discrimination Act Okla. Stat. tit. 25, §§ 1101-1706

¹⁴ Procurement Division. Oklahoma Transportation. https://oklahoma.gov/odot/about/contact-us/divisions/procurement-division.html

¹⁵ Contract Compliance Division. Oklahoma Transportation. https:/oklahoma.gov/odot/business-center/contract-compliance.html

- **Installation and Testing** All installations will be completed to ADA standards and testing will be done to verify.
- **Data Collection** As mentioned above in Contracting, it is expected that data to measure performance measurement will be collected. This data can assist in compliance verification.
- Operations and Maintenance Any other contractual verification processes will take place during Operations and Maintenance.

ODOT is continuing to review and evaluate best practices around ADA accessibility at charging stations, including the <u>U.S. Access Board (access-board.gov)</u> on accessible charging stations. ODOT will work to provide resources and information to cover ADA access for the public on ODOT's NEVI program website.

10.0 Equity Considerations

ODOT is committed to enacting the goals outlined in Executive Order 14008 relating to Justice40 by ensuring 40% of the benefits of NEVI Formula Program funds are received by disadvantaged communities. ODOT, through its established approach to public involvement and engagement activities as well engaging with stakeholders is documented in the ODOT Public Involvement Plan. ODOT is committed to creating an equitable approach to transportation and gathering input from all stakeholders regarding needs and concerns. Public engagement, as described Chapter 3, will be a critical part of this process. Current guidance is to use the Argonne National Laboratory 16 toolset to identify disadvantaged communities. ODOT will monitor USDOT guidance throughout the program to comply with the latest recommendations. Oklahoma also has a unique relationship with Federally Recognized Tribes and will take additional measures to engage with, and be respectful of, these communities.

Additionally, ODOT will evaluate rural and urban Oklahoma and ensure that benefits of charging infrastructure are realized in rural communities. Rural Oklahomans share a higher transportation burden compared to those living in urban areas, due to a combination of lower-income levels and a propensity to drive more miles on average each day¹⁷. ODOT will rely on household vehicle miles traveled (VMT) data, Argonne National Laboratory tools and regional planning partners to examine rural areas and ensure infrastructure is equitably distributed in these underserved areas.

10.1 Identification and Outreach to Disadvantaged Communities (DACs) in the State

ODOT has a robust public engagement process that will be used in conjunction with the interim Joint Office guidance tools to identify and conduct outreach with disadvantaged communities. While the details are described in **Chapter 3**, the approach involves communication with other state agencies, planning partners, technical partners, stakeholders, equity communities, and the general public. **Figure 3** describes the phased approach ODOT will take to incorporate diverse viewpoints and demographics into the planning and implementation. **Table 3** contains a summary of these activities conducted to date.

Work is just beginning on the outreach efforts. ODOT intends for there to be a strategic focus on disadvantaged communities, tribal communities and rural communities. ODOT's Public Involvement process outlines how ODOT will engage in these communities over the five-year NEVI Program and incorporate their input into.

ODOT's stakeholders include equity groups, and those groups and communities are being developed. **Table 13** is a starting point for some of the initial community-based organizations

Electric Vehicle Charging Justice40 Map. https://anl.maps.arcgis.com/apps/webappviewer/index.html?id=33f3e1fc30bf476099923224a1c1b3ee

¹⁷ (2020). Affordability of Household Transportation Fuel Costs by Region and Socioeconomic Factors. Argonne National Laboratory. https://publications.anl.gov/anlpubs/2021/01/165141.pdf

that work with and within disadvantaged communities this is in addition to any other stakeholder coordination or coordination with Federally recognized Tribes. ODOT will work to engage these groups in discussions around charging station deployment and their input will be incorporated into annual plan updates.

Table 13: Initial Community Based Organization

Name	Location	Website
YWCA OKC	OKC	https://www.ywcaokc.org/
YWCA Tulsa	Tulsa	https://www.ywcatulsa.org/
Oklahoma Native Assets Coalition Inc.	OKC	https://oknativeassets.org/
Urban League of Greater OKC	OKC	https://urbanleagueok.org/
Bartlesville Regional United Way	Bartlesville	https://www.bartlesvilleuw.org/
Catholic Charities of the Archdiocese of OKC	ОКС	https://www.catholiccharitiesok.org/
OKC Community Foundation	OKC	https://www.occf.org/
		https://www.nativeknot.com/Religious-
Grand Nation Inc.	Vinita	Grantmaking-And-Other-/Other-Social-
		Advocacy-Organizati/Grand-Nation-Inc.html
Oklahoma Sustainability Network	OKC	https://www.oksustainability.org/
Sustainable Tulsa Inc.	Tulsa	https://sustainabletulsainc.org/
Oklahoma Center for Community and Justice Inc.	Tulsa	http://www.occjok.org/
Norman Pride Inc.	Norman	http://www.normanokpride.org/
Up With Trees Inc.	Tulsa	http://www.upwithtrees.org/
Compatible Lands Foundation Inc.	Tulsa	http://www.compatiblelands.org/
Oklahomans for Equality Inc.	Tulsa	http://www.okeq.org/
OKC Beautiful Inc.	OKC	http://www.okcbeautiful.com/
Oklahoma Women's Coalition Inc.	OKC	http://www.okwc.org/
Oklahoma Women in Technology	Edmond	https://okwomenintech.org/
OKC Black Justice Fund	OKC	https://blackjusticefund.org/
NE OKC Renaissance	OKC	https://www.neokcr.org/
Guymon Community Enrichment Foundation	Guymon	https://guymoncef.org/
Chahta Foundation	Durant	https://chahtafoundation.com/

10.2 Process to Identify, Quantify and Measure Benefits to DACs

ODOT's Public Involvement (PI) Plan and Policy identifies strategies for performing activities required to engage audiences in a meaningful dialog regarding needs, and inform stakeholders to achieve public engagement goals and inform stakeholders, to inform the NEVI Plan and

annual updates with new and evolving information from stakeholder and community audiences ODOT regularly conducts public involvement meetings, virtual public involvement meetings and hearings as required by federal law, as well as having a range of best practices for identifying and performing outreach to meaningfully include diverse audiences and underserved communities to participate in such meetings. ODOT will build upon those activities and identify other options for engaging and incorporating input into the NEVI Plan. ODOT's public engagement plan outlines how best to respond to the public's inquiries and compliance with all federal and state regulations and guidelines including low English proficiency (LEP), Environmental Justice, and ADA requirements.

The ODOT NEVI Project Team will develop a specific approach for equity-based communities, residents and organizations, to meet the guidelines of the NEVI Formula Program to ensure meaningful equity-based community engagement takes place and feedback is incorporated into annual Oklahoma NEVI Plan updates.

ODOT will follow the three general steps to achieve equity-based community engagement, listed below and outlined in **Figure 25**.

- Identify and connect with community-based organizations and residents of rural and disadvantaged communities, including tribes as well as other partner organizations serving the communities.
- Engage community-based organizations and residents through different forums such as drop-in centers, pop up meetings and virtual meetings or surveys to listen and understand local needs, transportation concerns, and EV input
- 3. **Incorporate** community input into NEVI Plan updates where NEVI Formula Program rules and available funding can align with local transportation equity goals.



Figure 25: Equity-Based Outreach Strategy

Source. ODO I

In addition, the first tool used by ODOT to identify DACs was the Argonne EV Charging Justice40 Map Tool. These census tracts were mapped, as seen in Figure 26. According to this tool, 66% of Oklahoma's land area is within a DAC. However, DACs were not the only factor considered by ODOT. A large portion of the state is also within Federally Recognized Tribal Lands, as seen in Figure 27. Two sources were used to identify Tribal Lands: The Bureau of

Indian Affairs Land Area Representation¹⁸ was consulted to determine the boundaries of Tribal Statistical Areas. In addition, the Argonne EV Charging Justice40 Map Tool identifies Tribal Lands. In both cases, Tribal boundaries are for illustrative purposes only. For precise tribal boundaries, ODOT will reach out to the appropriate tribe. ODOT is in communication with Tribes about their charging needs and will continue to incorporate their feedback as the NEVI program rolls out and into annual updates.

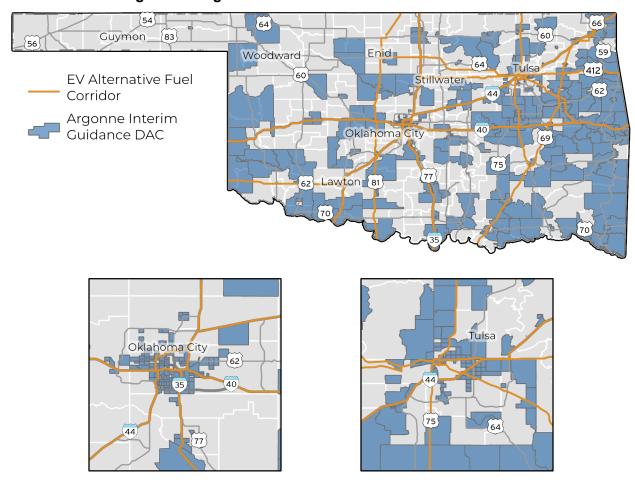


Figure 26: Argonne Justice40 Census Tracts in Oklahoma

Source: Argonne National Laboratory

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¹⁸ U.S. Department of Indian Affairs

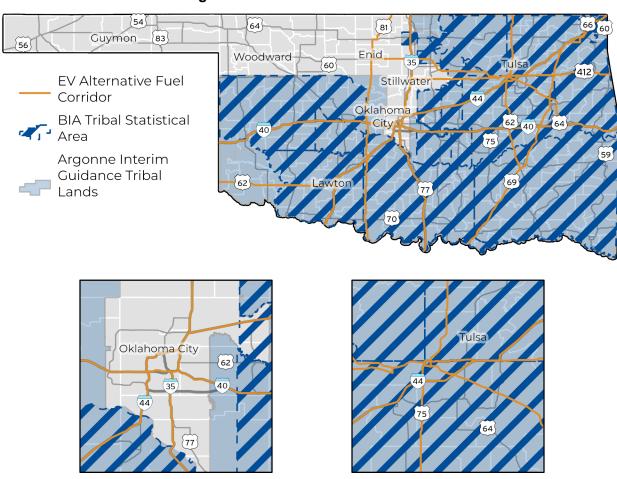


Figure 27: Tribal Lands in Oklahoma

Source: Argonne National Laboratory, U.S. Department of the Interior Indian Affairs

10.3 Benefits to Disadvantaged Communities through this Plan

Benefits to DACs will be measured in the following ways:

- Portion of miles of AFC in DAC
- Portion of funding allocated to deployment within DACs
- Laborers employed from DACs

The existing percentage of AFC miles in DACs can be seen in **Table 14**, totaling 45.7% overall. Funding allocation will be tracked throughout the program's deployment to ensure equitable distribution of chargers and adjusted to increase the number of chargers in less-favorable markets. Labor force will be tracked to encourage hiring and building skills of those who live in DACs.

ODOT will continue to seek out disadvantaged community groups and organizations in order to gather input to help inform the NEVI Plan and where funding is allocated. Groups will continually

be added and updated throughout the process and input will inform the annual NEVI Plan updates. ODOT will continue to provide updates on the locations of chargers in disadvantaged communities and the additional potential workforce benefits.

Table 14: Miles of Alternative Fuel Corridors in Disadvantaged Communities

Route	DAC Miles	DAC Percent	AFC Miles
I-35	109.66	46.5%	235.94
I-40	197.76	60.0%	329.68
I-44	108.71	33.4%	325.16
US-412	71.83	76.6%	200.49
US-62	40.08	43.0%	93.31
US-69	127.90	52.8%	242.04
US-75	93.31	60.6%	153.92
US-81	95.03	41.3%	230.07
SR-351	42.58	76.6%	55.60
SR-51	6.91	7.8%	88.53
Total	893.77	45.7%	1,954.74

Source: ODOT

These preliminary assessments provide a baseline from which to build on in future annual NEVI Plan updates. As the Plan moves forward, ODOT will gather additional data that will help further identify DACs, understand benefits and understand how to best to measure outcomes (i.e., distribution of chargers, labor force, etc.). ODOT will reflect best practices confirmed through these engagements in annual reports to USDOT and in annual NEVI Plan updates. **Table 15** below shows the area of land and percentage that is DAC and designated Tribal land, and **Table 16** shows the total interstate miles and those within DAC areas.

Table 15: Percent Disadvantaged Community Area and Tribal Land

Descriptions	Square Miles	Percent
Oklahoma area	69,899	100.0%
DAC area	45,079	64.5%
Argonne Tribal area	53,362	76.3%
BIA Tribal area	49,450	70.7%

Sources: Argonne DACs and Tribal Lands are from: <u>Argonne National Laboratory</u>.

BIA Tribal Lands are from: <u>U.S. Department of Interior, Department of Indian Affairs</u>

AFCs are from: <u>Alternative Fuels Data Center</u>

Table 16: Percent Disadvantaged Community Areas along Interstates

Descriptions	Miles	Percent
Oklahoma Interstate	1,866	100.0%
Interstate miles within DAC	874	46.8%
AFC miles within DAC	894	45.7%

Sources: Argonne DACs and Tribal Lands are from: <u>Argonne National Laboratory</u>.

BIA Tribal Lands are from: <u>U.S.</u> Department of Interior, Department of Indian Affairs

AFCs are from: Alternative Fuels Data Center

11.0 Labor and Workforce Considerations

Oklahoma has become a leader in workforce development and EV innovation. As the state begins to attract more EV technology and opportunity for growth occurs, the workforce must be well equipped to grow alongside it. Oklahoma's workforce development programs and partnerships between the Department of Commerce, Office of Workforce Development, and innovative hubs like the Mid-America Industrial Park in Pryor, OK can provide an opportunity to train a future workforce, ensuring a pipeline of qualified workers exists, and provide opportunities for those who have historically been left out of specific training and experience needed for high-quality high-tech jobs. As part of the NEVI NPRM, ODOT will follow requirements regarding the BABA Act by incorporating them into their contracting and procurement process.

Throughout the NEVI Formula Program, ODOT expects EV-related workforce to increase dramatically. Increases in EV jobs will further support ODOT in this effort by creating more qualified and reliable contractors as EV deployment gets underway.

11.1 Vehicle Electrification | Opportunities and Challenges

Mid-America Industrial Park

At 9,000 acres and offering nearly a dozen different tax incentives, Mid-America Industrial Park provides opportunities for both high tech industries such as EV and the workforce needed to support a new and growing industry. Together, these incentives have attracted the interest of electric vehicle maker Canoo to invest in a production plant in Pryor. The State's businessfriendly environment and incentive rich packages have put the State in a prime position to attract electric vehicle industries.

Source: Oklahoma To Pay Electric Car Company Canoo \$15M To Build Manufacturing Plant. March 2, 2022, Newson6.com

EVs are forecasted to be a significant area of growth in the future of the private and commercial motor vehicle markets, and the Bipartisan Infrastructure Law's \$5 billion in NEVI state Formula funds and additional \$2.5B in competitive grants will only further boost the transportation sector's electrification transition. Centrally located in the United States, and a workforce that understands power generation, Oklahoma has a competitive advantage to capitalize on these market trends, attract original equipment manufacturers (OEM) investments, and create new job opportunities in the design, assembly, operations, and maintenance of EVs and EVSE.

11.2 Developing a Qualified Workforce

While there are a wide variety of career pathways that will be directly and indirectly impacted by vehicle electrification, being a certified electrician will be an asset in the State. While there is overwhelming evidence that electrification is the future of the transportation sector, Oklahoma must be strategic in how it achieves both transportation electrification and related workforce development outcomes.

With economic and workforce development as a priority, Oklahoma EV job creation and training are at the forefront of EV technology in the state. Additionally, it is important to highlight that EVs represent a technological transition in the automotive industry, creating opportunity for new specialties in both electrical and automotive industries.

Licensed and EVITP Certified Electricians

Developed in collaboration with Industry Partners and Stakeholders across the Automotive, Utility, and EVSE Manufacturing sectors and with Industry Related Professional Associations and Educational Institutions, the Electric Vehicle Infrastructure Training Program EVITP certification is required under NEVI NPRM. Currently there are 21 EVITP certified electric contractors in Oklahoma¹⁹ as shown in **Figure 28** and continuing to build a qualified pool of these electricians will be critical moving forward.

ODOT will partner with workforce development efforts in the state to promote the need for EVITP certified electricians. Through Oklahoma's student electrical intern program, electrical apprenticeships, and journeyman programs, the state will scale up the number of EVITP certified electricians by ensuring that existing electricians are first, licensed through the Oklahoma Construction Industries Board, and then EVITP certified through the 18-hour program and hands-on learning needed for EVSE charging station installation. ODOT will the ensure the process to attain EVITP certification will be incorporated into the NEVI program procurement and contracting process.



Figure 28: EVITP Certified Electricians

Note: This map displays 7 of the 21 EVITP certified electricians licensed to operate in Oklahoma. Source: EVITP.org/Oklahoma

¹⁹ Electric Vehicle Infrastructure Training Program (EVITP) for Oklahoma. EVITP

Workforce Development

Oklahoma Works is Oklahoma's workforce development initiative, housed within the Office of Workforce Development (OOWD), and



administers the federal Workforce Innovation and Opportunity Act (WIOA). Oklahoma Works helps job seekers access employment, education, training, and support services. The program also matches employers with the skilled workers they need²⁰. This program will become even more critical in the years ahead as Oklahoma is expected to experience a worker shortage by 2028, with many industries facing a skills gap.

Governor's Impact Goals

In the years ahead, whether electricians need support upskilling to become EVITP certified, or companies need support finding certified electricians, Oklahoma Works provides an opportunity to help solve these important worker/employer needs for Oklahoma's growing EV sector. The needs in this industry fit within Oklahoma Governor Stitt's impact goals to propel Oklahoma into a Top 10 State for workforce development. These impact goals include:

- 1. Increase Oklahoma's labor force participation rate from 60% to 65%
- 2. Create 50,000 new private sector jobs paying an average salary of \$55,000 per year
- 3. Achieve Top Ten status in U.S. unemployment rate
- 4. Increase effectiveness in serving businesses by 20%

Objectives

The four impact goals listed above from Oklahoma's WIOA are supported by a set of four objectives:

- 1. Expand Oklahoma's workforce to satisfy industry and economic development goals
- 2. Upskill Oklahoma's workforce
- 3. Offer workforce solutions to Oklahoma's businesses
- 4. Build Oklahoma's workforce system capacity

Oklahoma Works, supporting the Governor's Impact Goals and Objectives, will be an important partner in helping meet EVITP demands as part of EV infrastructure deployment across the State. ODOT will continue to partner with this initiative and promote workforce development needs to ensure that the state is prepared and equipped to deliver NEVI program implementation needs.

²⁰ Workforce Innovation and Opportunity Act (WIOA). https://oklahomaworks.gov/wioa-2/

12.0 Cybersecurity

Cybersecurity and individual personal privacy concerns continue to rise in importance as technology continues to advance and play a larger role in day-to-day activities. Applying the right cybersecurity and privacy solutions are absolutely necessary as ODOT implements this NEVI program.

Oklahoma recently designated cybersecurity as a topic of interest in their State of Oklahoma Transportation Modernization Plan²¹. ODOT and OTA, in coordination with OMES, are working together to create a consolidated Information Technology Office that will have cybersecurity as a major function of the operation within these agencies. This new IT Office and cybersecurity function will help outline the importance and need for cybersecurity services within the agencies and will assist in the creation of cybersecurity and privacy requirements for the NEVI program. If additional resources are needed, the State of Oklahoma's Cyber Command²², an agency that is responsible for advancing a statewide approach to cybersecurity, will make their Compliance and Privacy Teams available to the project team. Data Privacy continues to be an item of interest, not only in Oklahoma, but nationally. Recent attempts in the state legislature to increase consumer control over their data have stalled but will probably be a recurring item of interest²³.

ODOT will contract with a third party for the purchase, installation, operations, maintenance and data collection of the EV chargers. Therefore, cybersecurity and privacy risks will be the responsibility of the third party. These responsibilities and their associated requirements will be outlined in procurement documents and contracts. An overarching requirement of each third party that responds to the procurement will be to submit a cybersecurity plan that addresses, at a minimum, the following:

- Data collection methodologies
- How ongoing updates to those methodologies over the contract period will be shared with the project team
- Software, including security software, update methodology (timing and how it affects users)
- Security and privacy breach notification requirements both to the project team and to the EV charger user

²¹ State of Oklahoma Transportation Modernization Plan. https://oklahoma.gov/content/dam/ok/en/odot/modernization/Draft%20OK%20Transportation%20Modernization%2 0Recommendation%20Report%20Website.pdf

²² Cyber Command. Oklahoma Office of Management and Enterprise Services. https://oklahoma.gov/omes/services/information-services/cybercommand.html

²³ Proposed State Privacy Law Update: May 9, 2022. https://www.jdsupra.com/legalnews/proposed-state-privacy-law- update-may-9-3544252/

- Language stating the third party will comply with any local, state and federal law as it relates to cybersecurity or privacy
- If awarded the contract, an agreement to take part in a privacy impact assessment at the start of the project and throughout, as needed

The selected third-party vendor will need to share data for performance measurement and future plan development. All data will be de-identified before it is shared to reduce privacy risks.

13.0 Program Evaluation

ODOT intends to require NEVI funded EVSE owners to operate networked EVSE on Open Charge Point Protocol Networks and provide charging station usage reports. The reporting information submitted will identify aggregate utilization data for the previous reporting period, and for each NEVI compliant EVSE funded by ODOT.

ODOT will seek to utilize EVSE report information, detailed in Section 680.112 Data Submittal of the Federal Highway Administration, 23 CFR Part 680, National Electric Vehicle Infrastructure Formula Program, Notice of Proposed Rulemaking.

Oklahoma Department of Transportation shall submit on a quarterly basis charging station use, cost, reliability, and maintenance data in a manner prescribed by the FHWA.

This may include the development of a quarterly report on the NEVI program progress or the development of an online dashboard.

ODOT's goals for the NEVI Plan, in accordance with FHWA guidance, focuses on building out FHWA designated Alternative Fuel Corridors (AFC's), then expand to regional and local routes of significance, equity-based destination charging and freight charging locations. ODOT will utilize their three-step approach of "identify, engage and incorporate" to work with equity-based communities, residents and organizations to identify charging locations and provide performance measures on how the Oklahoma NEVI Plan goals are being met. **Table 17** provides an example of the performance measures that may be used in the first annual report.

Table 17: Example Performance Measures for Oklahoma NEVI Goals

Goal Description	Approach
Goal #1: Develop an Electric Vehicle	Oklahoma is constituently ranked in the top
Charging Plan that puts Oklahoma in the Top	10 states for EV Charging stations per capita.
10 for Electric Vehicle Performance Measures	Monitor this ranking to maintain this status ²⁴ .
in the United States.	_
Goal #2: Develop and Implement Statewide	Work with the Oklahoma Office of the
Policies that Encourage the Responsible	Secretary of Energy & Environment to
Development of Oklahoma's Natural	monitor electric vehicle energy generation in
Resources.	the state.
Goal #3: Comprehensive Charging Plan.	Receive annual feedback from the Joint office
	of Energy and Transportation.

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²⁴ Gorzelany, J. The Most EV-Friendly State in the U.S. MYEV.com. https://www.myev.com/research/comparisons/most-ev-friendly-states

Goal Description	Approach
Goal #4: Data Gathering and Evaluation.	Develop a report that defines how
	performance measures will be gathered, evaluated and presented to the public and the Joint Office.
Goal #5: Program Implementation and	Utilize public outreach surveys to gather
Administration.	feedback form third party vendors and the
	public to measure if the charging equipment
	that creates a convenient, reliable, affordable
	and equitable charging experience for
	motorists.
Goal #6: Develop and Sustain Oklahoma's	Coordinate with the Oklahoma Department of
Workforce.	Commerce and its partners to track workforce
	development related to the electric vehicle
	program.
Goal #7: Access to EV Charging Stations: The	This will be accomplished by ensuring that
Oklahoma NEVI Plan's goal is to enable	90% of Oklahoma residents live within 25
distance and intercity travel with EVSE reliability.	miles of NEVI Compliant Chargers.

Source: ODOT

Example performance measure data may include:

- total charging sites
- total sessions/drivers per month
- total downtime events
- total reduced GHG emissions
- average number of active chargers
- charger use by area

- average energy consumed per session
- enforcement of charger uptime
- compliance monitoring
- usage profile by charger type
- time of use/kWh consumed
- GHG reduction benefit

- Service provider compliance reporting
- understanding operational costs
- benchmarking with other states
- Justice 40 equity benefit reporting
- measure impact of policy decisions

In addition to the quarterly reports to the FHWA, Oklahoma will make publicly available an annual report describing the community engagement activities conducted as part of the development and approval of the most recently submitted State EV Infrastructure Deployment Plan.

14.0 Discretionary Exceptions

At this time, ODOT has not identified any requested exceptions from the requirement that charging infrastructure is installed every 50 miles along that State's portion of the Interstate Highway System within one travel mile of the Interstate. As ODOT intends to work with third party EVSE applicants for NEVI funding and ultimate award of funds to third party EVSE owner-operators, ODOT will monitor all future Oklahoma NEVI locations for requested discretionary exemptions and seek to gather all relevant information from prospective site hosts about the need for any such exemptions. In the case a need for a discretionary exemption request arises, particularly in rural parts of the state, ODOT will work to provide all necessary information to the Joint Office for approvals.

15.0 Next Steps

This initial Oklahoma Electric Vehicle Infrastructure Deployment Plan complies with FHWA's February 10, 2022, NEVI guidance. It defines the initial phases of deployment and will leverage previously EV strategy documents more for future phases (i.e. non-AFC DCFC charger priorities, freight charging).

The plan incorporates stakeholder perspective at all levels to support the Plan's defined goals and outcome and will continue to do so as each phase is planned and implemented. ODOT will also continue to access how best to support equity in communities through the program. ODOT is committed to following and annually updating this Plan as it leverages necessary resources to support NEVI deployment.

Appendix

Appendix A: Comprehensive List of Viable Exits / Locations along Alternative Fuel Corridors in Oklahoma

AFC Corridor	Group*	Site*	Viable Exits/Locations**
	Α	1	Exit 1: US-77
	Α	2	Exit 3: Rogers Rd
	Α	3	Exit 5: Hide-A-Way Rd
	Α	4	Exit 15: Memorial Dr
	В	1	Exit 151: E Seward Rd
I-35	В	2	Exit 157: OK-3333
1-35	В	3	Exit 174: OK-5151
	В	4	Exit 186: US-6464
	В	5	Exit 203: Acre Rd
	В	6	Exit 157: OK-33
	С	1	Exit 174: OK-51
	С	2	Exit 186: US-64
	Α	1	Exit 136: Garth Brooks Blvd
	Α	2	Exit 137: N Czech Hall Rd
	Α	3	Exit 138: N Mustang Rd
	Α	4	Exit 140: S Morgan Rd
	Α	5	Exit 142: S Council Rd
	Α	6	Exit 143: S Rockwell Ave
	Α	7	Exit 144: S MacArthur Blvd
	Α	8	Exit 145: Meridian Ave
	Α	9	Exit 155A: S Sunnylane Rd
I-40	Α	10	Exit 155B: SE 15th St
	Α	11	Exit 156A: S Sooner Rd
	Α	12	Exit 157B: S Air Depot Rd
	Α	13	Exit 157C: Town Center Dr
	Α	14	Exit 159B: S Douglas Blvd
	В	1	Exit 166: S Choctaw Rd
	В	2	Exit 176: S McLoud Rd
	В	3	Exit 178: Hwy Dr
	В	4	Exit 185: N Kickapoo Ave
	В	5	Exit 192: Valley View Rd
	С	1	Exit 200: US-377
	С	2	Exit 212: OK-56
	D	1	Exit 221: S Woody Guthrie St
	D	2	Exit 240B: US-62

AFC			
Corridor	Group*	Site*	Viable Exits/Locations**
Corridor	E	1	Exit 265: Broadway St
	F	1	Exit 278: OK-2
	F	2	Exit 287: OK-100
	F	3	Exit 297: Thornton St
	F	4	Exit 308: S Kerr Blvd
	F	5	Exit 311: E Cherokee Ave
	G	1	Exit 321: Main St
	G	2	Exit 325: US-64
	A	1	Exit 1: E2000 Rd
	A	2	Exit 5: US-70
	В	1	Exit 5.3: US-227 / 8th St
	C	1	Exit 112: SW 104th St
	С	2	Exit 114: SW 74th St
	C	3	Exit 117: E Frontage Rd
	C	4	Exit 118: SW 29th St
I-44	C	5	Exit 121: NW 10th St
	C	6	Exit 122: NW 23rd St
	C	7	Exit 124: N May Ave
	C	8	Exit 125: Northwest Expy
	D	1	Exit 228: E 51st / S Harvard Ave
	D	2	Exit 230: E 41st St
	E	1	Exit 240: County Line Rd
	E	2	Exit 255: E 490 Rd
	A	1	N 6th Street (Hollis, OK)
	В	1	N Navajoe Street (Altus, OK)
US-62	В	2	N Veterans Dr (Altus, OK)
	С	1	NW Quanah Parker Trailway (Lawton, OK)
	Α	1	I-44 Interchange (Big Cabin, OK)
	В	1	US-62 OR US-69/OK-165 (Muskogee, OK)
	С	1	OK-266 (Checotah, OK)
US-69	D	1	E Comanche Ave (McAlester, OK)
	Е	1	D1742 Rd (Stringtown, OK)
	E	2	Hwy 7 (Atoka, OK)
	F	1	W Main St (Durant, OK)
	Α	1	E Main St (Henryetta, OK)
US-75	Α	2	US-62 (Okmulgee, OK)
	Α	3	Box Ave (Okmulgee, OK)
	Α	4	Fairgrounds Blvd (Okmulgee, OK)
	В	1	W 151st St (Glenpool, OK)
	В	2	141st St (Glenpool, OK)

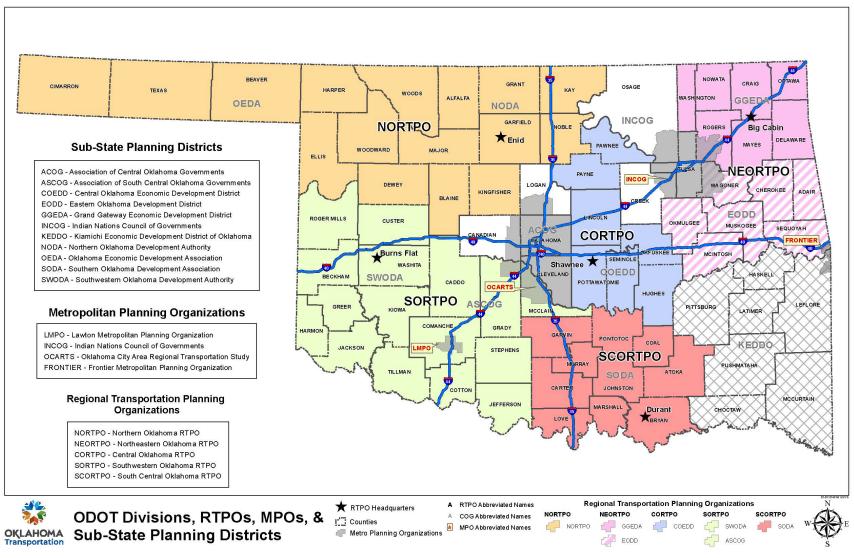
AFC Corridor	Group*	Site*	Viable Exits/Locations**
	В	3	121st St (Glenpool, OK)
	С	1	81st St (Tulsa, OK)
	С	2	71st St (Tulsa, OK)
	D	1	Price Rd (Bartlesville, OK)
	D	2	SE Adams Blvd (Bartlesville, OK)
	D	3	Tuxedo Blvd (Bartlesville, OK)
	D	4	E Durham Ave (Dewey, OK)
	Α	1	E 2160 Rd (Terral, OK)
US-81	В	1	Hillery Rd (Comanchee, OK)
	В	2	Duncan Towne Square / Rodeo Dr (Duncan, OK)
	В	3	Elk Ave (Duncan, OK)
	С	1	I-44 (Chickasha, OK)
03-01	D	1	S Shepard Ave (El Reno, OK)
	E	1	E Will Rogers Dr (Kingfisher, OK)
	F	1	W Southgate Rd (Enid, OK)
	F	2	W Owen K Garriott Rd (Enid, OK) (See US-412)
	G	1	OK-11 (Medford, OK)
	Α	1	Exit 28: US 59 (Kansas, OK)
	В	1	Exit 6: OK-82 (Locust Grove, OK)
	В	2	US-69 (Chouteau, OK)
	С	1	Exit 37: OK-18 (Pawnee, OK)
	D	1	Exit 1: I-35 (Perry, OK)***
US-412	D	2	OK-15/74 (Garber, OK)***
	Е	1	42nd St (Enid, OK)
	Е	2	30th St (Enid, OK)
	Е	3	S Van Buren St (Enid, OK)
	Е	4	S Oakwood Rd (Enid, OK)
	Е	5	S Garland Rd (Enid, OK)
	Α	1	N3300 Rd (Stillwater, OK)
OK E4	Α	2	S Western Rd (Stillwater, OK)
OK-51	В	1	N 3rd St (Yale, OK)
	С	1	Coonrod Dr/Basin Rd (Mannford, OK)
OK-351	Α	1	Kenosha St (Broken Arrow, OK)
	Α	2	S 117th E Ave (Broken Arrow, OK)
	Α	3	N Elm Pl (Broken Arrow, OK)
	Α	4	S 145th E Ave (Broken Arrow, OK)

^{*} Only one site will be chosen as a charging location from each group.

^{**} The viable locations shown along US and State Routes are representative intersections that have existing amenities. Additional viable intersections within the towns listed is possible.

^{***} Location will likely require a discretionary exception due to closest amenities being greater than 1 mile off the corridor.

Appendix B: ODOT Divisions, RTPOs, MPOs, and Sub-State Planning District



Source: ODOT