

NEVI Implementation in Alaska: Case Study



NEVI Implementation in Alaska: Case Study

Contents

Introduction and Objective.....	3
Overview	3
Solicitation Design Process	4
Stakeholder Engagement	5
RFA Priority Locations and Scoring Rubric	5
The Driver Experience	8
Electric Utility and Site Host Requirements	8
Application Evaluation	9
A Qualified, Diverse Applicant Pool	9
Application Quality	10
State Priorities	10
Coverage Across the Corridor.....	11
Ensuring Network Reliability	11
Key Findings and Lessons Learned.....	12
Achieving NEVI Goals	13

Acknowledgements:

NASEO appreciates the assistance and expertise of the Alaska Energy Authority in preparing this case study which will benefit all State and Territory Energy Offices and their partners engaged in creating alternative transportation corridors. We also thank Zachary Strauss of Atlas Public Policy, the primary author, and Delaney Dixon of NASEO for their work in preparing this case study. This case study was released in May 2024.

Notice:

This report was prepared as an account of work sponsored by an agency of the United States Government. Neither the United States Government nor any agency thereof, or any of their employees, makes any warranty, express or implied, or assumes any legal liability or responsibility for the accuracy, completeness, or usefulness of any information, apparatus, product, or process disclosed, or represents that its use would not infringe privately owned rights. Reference herein to any specific commercial process, or service by trade name, trademark, manufacturer, or otherwise does not necessarily constitute or imply its endorsement, recommendation, or favoring by the United States Government or any agency thereof. The views and opinions of authors expressed herein do not necessarily state or reflect those of the United States Government or any agency thereof.

Sponsors:

The material is based upon work sponsored by the U.S. Department of Energy under Award Number DE-EE0010189. The contents are intended for informational purposes only. The authors are solely responsible for errors and omissions.

Introduction and Objective

The National Electric Vehicle Infrastructure (NEVI) Formula Program is a \$5 billion federal program with a primary investment in Direct Current Fast Chargers (DCFCs) along the nation's major highways and interstates. State Departments of Transportation (DOT) and State Energy Offices that administer the NEVI formula funds are implementing the program by soliciting project proposals, issuing contracts, monitoring the reliability and performance of the chargers, and other responsibilities to ensure the success of the program.

As states announce awards and issue contracts for the first round of NEVI funds, there is an opportunity for other states to learn from the successes and challenges of the NEVI program. The National Association of State Energy Officials (NASEO) and the American Association of State Highway and Transportation Officials (AASHTO) partnered with Atlas Public Policy to conduct a series of case studies with the first few states that have announced awards and issued contracts to NEVI recipients. The case studies are intended to delve deeper into the states' solicitation design and stakeholder process; outline the scoring rubric and application evaluation process; discuss the applicant pool variety and quality; highlight state, utility, and site host coordination; and illustrate the successes and challenges of the program. These case studies are part of a larger initiative led by NASEO and AASHTO to enhance coordination and collaboration between State Energy Offices and State DOTs to ensure that NEVI and other EV charger investments are made in a strategic, coordinated, efficient, and equitable manner.

OVERVIEW

On March 1, 2023, the Alaska Energy Authority (AEA) and the Alaska Department of Transportation & Public Facilities (DOT&PF) released the state's official NEVI Request for Applications (RFA) soliciting proposals for public fast charging projects along its singular alternative fuel corridor (AFC) that runs from Anchorage to Fairbanks (AK-3). As part of the RFA, the state delineated 14 priority municipal areas where it sought charging proposals and provided applicants with both the scoring rubric and proposal sections expected in each application. Following a submittal process that ended on May 15, 2023, the agency evaluated a total of 34 proposals from eight distinct applicants submitted across 13 of the 14 priority corridor areas.

On September 25, 2023, AEA and DOT&PF announced a Notice of Intent to Award first-round NEVI prospective grantees, a total of nine proposed projects submitted by four distinct entities across nine priority locations (Table 1). These prospective awards total \$8 million in investment, with \$6.4 million in NEVI funds to be matched with \$1.6 million in cost share provided by prospective grantees. One priority location (Clear) did not receive any applications, while an additional four (Chugiak, Eagle River, Houston, Willow) did not see prospective awards, either because they did not have any viable commercial site hosts or no qualified project proposals were submitted.

Of the nine awards, four went to Tesla, three to eCAMION, and two to real estate developers that will utilize FLO's charging equipment and network. Nearly all of the awards went to large established national electric vehicle service providers (ESVPs), while the site hosts chosen reflected a diversity of locations, including hotels, convenience stores, gas stations, and shopping centers (Table 1).

Following federal approval of three discretionary exceptions, AEA anticipates these initial nine awards will be sufficient to satisfy the requirement for corridor buildout and will shift its focus to community charging in subsequent NEVI funding rounds.

Table 1: Alaska NEVI Round 1 Prospective Awardees

Grantee	Site & Priority Location	Priority Location	NEVI Award	Port Count	Max Power Level
Tesla	Trapper Creek Three Bears	Trapper Creek	\$490,907	8	250kW
Tesla	Jack River Properties	Cantwell	\$490,907	8	250kW
Tesla	Nenana Chevron Gas Station	Nenana	\$490,907	8	250kW
Tesla	Three Bears Gold Hill Convenience and Liquor Store	Ester	\$490,907	8	250kW
eCAMION USA	Mt. McKinley Princess Wilderness Lodge	Denali State Park	\$875,951	4	150kW
eCAMION USA	Westmark Fairbanks Hotel and Conference Center	Fairbanks	\$875,951	4	150kW
eCAMION USA	Denali Princess Wilderness Lodge	Healy	\$875,951	4	150kW
North Anchorage Real Estate Investors	Tikahtnu Commons	Anchorage	\$1,039,746	4	320kW
Browman Development Company Wasilla	Cottonwood Creek Mall	Wasilla	\$952,950	4	320kW

SOLICITATION DESIGN PROCESS

In designing its RFA, AEA engaged with relevant stakeholders to solicit input, identified key priority areas for public charging, established specific requirements for site host and utility coordination, and developed a scoring rubric and evaluation criteria. In the lead-up to the solicitation release, the agency conducted outreach around the state to promote the opportunity with prospective applicants, potential site hosts, and the general public. This section will explore how AEA crafted and designed its RFA and the ways in which the agency engaged with relevant stakeholders in the process.

Stakeholder Engagement

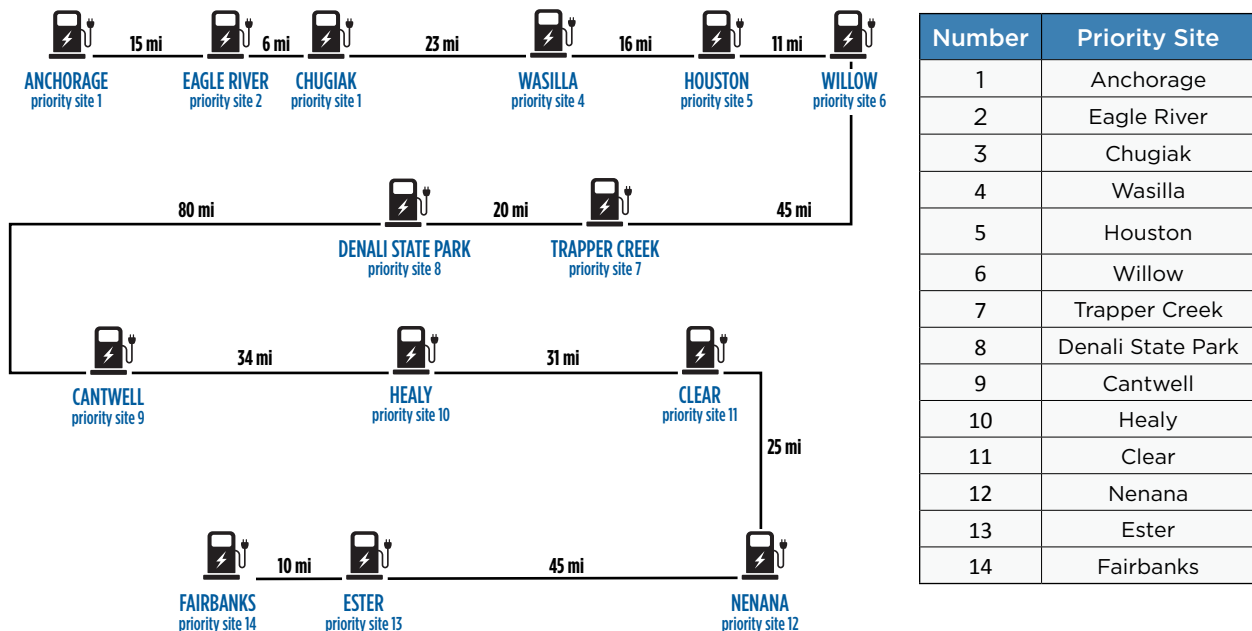
In working closely with DOT&PF, AEA led the RFA development process, advertised the solicitation to prospective applicants and site hosts, and convened the selection committee. In 2022, Alaska’s governor designated AEA as the lead agency on NEVI due to its in-house capacity, subject matter expertise, and experience with EV infrastructure planning through managing public charging grant programs like the VW Settlement funds. That same year, AEA and DOT&PF signed a Memorandum of Agreement establishing a Joint Office and enumerating their respective roles and responsibilities for designing and managing the state NEVI program. Likewise, AEA runs the state’s EV working group and maintains relationships with organizations and stakeholders interested in electric mobility across Alaska.

Prior to the release of the RFA, AEA engaged prospective applicants and site hosts around the state through an outreach process. In developing its NEVI solicitation, the agency leveraged the state EV working group to gather input from Alaska EV drivers and local utilities and to get the word out about the RFA. AEA organized a number of in-person and virtual engagement sessions with many organizations around the state, giving presentations at regional conferences and leading EV workshops in Anchorage, Wasilla, Fairbanks, and Juneau.

RFA Priority Locations and Scoring Rubric

As part of the RFA, the agency enumerated 14 priority locations along the corridor where it sought project proposals and provided an AFC map highlighting the target areas (Figure 1). The provided visuals also communicated the distance between priority locations, pinpointed existing charging infrastructure, and overlaid relevant utility service territories.

Figure 1: AEA Priority Locations and Gap Distances as Provided in RFA



To set expectations and demystify the application process, the RFA outlined all sections required in each proposal, their page limits, and all necessary forms, such as a site host agreement, utility assessment, and project budget (Figure 2).

Figure 2: Required Application Components and Forms as Provided in the RFA

Section	Application Component	Form	Page Limit
1	Administrative Application		
1.1	Signature Page and Certifications	Attachment 2	N/A
2	Technical Application		
2.1	Understanding of Program and Project Methodology Narrative		4
2.2	Management Plan, Schedule, Development and Operation Narrative		6
2.3	Experience and Qualifications Narrative		3
2.4	One-Page Resumes of Project Team		10
2.5	Past EVSE Installations of Contractor		2
2.6	Site Proposal Summary Form	Attachment 3	N/A
2.7	Utility Service Site Information Form	Attachment 4	N/A
3	Pricing Application		
3.1	Site Pricing Application Form	Attachment 5	N/A
3.2	Site Pricing Application Budget Rationale		1

The agency also chose to provide applicants with a full scoring rubric in the RFA, which delineated each section of the proposal, its point value, and the percentage of the total score it comprised. The section-by-section percent values are as follows: Project Pricing (20 percent), Program and Project Methodology (10 percent), Management Plan, Schedule, and Operation (20 percent), Experience and Qualifications (30 percent), and Site Proposal (30 percent).

Figure 3: Scoring Breakdown for Proposal Pricing and Technical Application as Provided in RFA

Pricing Scoring Element	Max Points	% of Total
Site Pricing Application Cost	100	10%
Site Pricing Application Narrative	100	10%
Maximum Site Pricing Application Score	200	20%

Technical Scoring Element	Max Points	% of Total
Understanding of Program and Project Methodology	100	10%
Management Plan, Schedule, Development and Operation	200	20%
Experience and Qualifications	200	20%
Site Proposal	300	30%
Maximum Technical Application Score	800	80%

For the site proposal in particular, the agency offered additional granularity on state priorities and how they would be weighed, such as safety (20 points, 7 percent of site score), cost share (60 points, 20 percent of site score), and utility engagement (80 points, 27 percent of site score). In terms of equity priorities, the state did not offer additional points to applicants who identified as, or committed to working with, minority- or women-owned businesses. Rather, AEA scored applications based on whether the proposed site was in a Justice40 community (40 points, 13 percent of site proposal score). AEA believes providing this level of overall transparency in the RFA improved proposal quality because, from the outset, applicants knew what the state expected and how it would be scored (Figure 4).

Figure 4: Site Proposal Scoring Rubric as Provided in RFA

Criterion	Max Points
Utility Service Site Information Form Evaluation Has the applicant demonstrated a clear understanding regarding the infrastructure need and utility improvement costs for the site? Does the project schedule align with the demonstrated utility infrastructure and utility needs?	80
Site is located within 1 mile of the highway Within 1 mile: 60 points 1-3 miles: 30 points 3-5 miles: 15 points Over 5 miles: 0 points	60
Site provides adequate lighting for security around the EVSE.	20
Site has amenities for users to access while charging their vehicle.	40
Site is located within a Justice40 boundary.	40
Site match contribution: 20%: 20 points 25%: 40 points 30%: 60 points	80
Total Available Base Points	300
Bonus Considerations	Max Points
Site offers pull through charging access.	20
Site offers make-ready work for additional ports and increased speed (e.g. 350 kW) in the future.	20
Site offers additional plug standards to be inclusive of other drivers (e.g. NACS and CHAdeMO).	10

In terms of the proposal submission procedure, applicants were asked to send the completed package to a designated AEA email or to a physical address. However, the RFA did not specify in detail the format in which the application was to be submitted, and the agency received multiple different Microsoft Excel files and project narratives, with several proposals including narratives relevant to multiple different sites. AEA suggests that, in the future, it will consider requiring applicants to submit all documents relevant to a single proposal as one PDF to streamline the evaluation process.

The Driver Experience

In designing the RFA, AEA chose to include point preferences for elements relevant to the driver experience. In the site proposal scoring rubric, AEA awarded applicants 40 points (5 percent of the proposal score) for the quality of the amenities available at or near the site. In the RFA documents, AEA listed several priority amenity examples to prompt applicants, including 24/7 access to restrooms, food options such as convenience stores or dine-in restaurants, canopies, and Wi-Fi accessibility. However, several of the priority charging locations across the corridor had few amenity options given the rural and remote nature of the state. In addition, AEA carved out 20 points for “adequate lighting” in the site proposal rubric as a means to ensure sites were designed with driver safety and physical well-being in mind (Figure 4).

The agency also offered bonus points for sites that included additional connector types (J3400 /CHAdeMO), utility future-proofing to accommodate additional ports and higher power charging, sites with more than four charging ports above 150 kilowatts, and pull-through parking (Figure 4). In doing so, AEA encouraged applicants to design sites that would support a range of different vehicle types and sizes, and that could serve a greater number of drivers faster. In awarding Tesla nearly half of the NEVI sites in the state, AEA ensured that many of their corridor charging locations will be outfitted with eight ports and 250-kilowatt chargers, factors that will improve charging times and reduce congestion in the long term. All Tesla sites in Alaska will include at least eight ports and be outfitted with the company’s charging equipment (Tesla V4) that can output up to 250 kW per vehicle.

Electric Utility and Site Host Requirements

In order to apply, prospective grantees had to demonstrate engagement with the local electric utility responsible for serving their project site. More specifically, applicants were required to reach out to the utility and request they complete and sign an AEA utility site assessment form for each address. This form includes information on the utility infrastructure improvements required, the estimated costs to perform those upgrades, and any matching contribution to be made by the utility. While the utility provided a site-specific cost estimate, the applicant was responsible for putting together the project schedule, which was expected to align with the utility infrastructure upgrade needs communicated on the site assessment form.

AEA provided applicants with contact information for the five local utilities operating along the corridor. To help ensure that these utilities would be able to complete these site assessment requests on time, AEA worked closely with them in the lead-up to the RFA announcement to develop the form. In response to utility feedback during the submittal window, AEA extended the application deadline by two weeks to allow them more time to appropriately respond to incoming requests. Overall, this utility engagement requirement did not appear to burden or slow down the application process; applicants were able to obtain completed utility forms and submit them on time.

Applicants were also required to demonstrate engagement with site hosts, should they be applying as lessees. As part of the proposal package, applicants were required to obtain a signature from the site landowner. In signing the form, site hosts affirmed their commitment to install the NEVI chargers on their property and keep them in the ground for a period of five years.

APPLICATION EVALUATION

AEA opened a three-week Q&A period following the release of the RFA to allow applicants and stakeholders an opportunity to provide feedback, ask questions, and request RFA modifications. In response to comments and inquiries received during the Q&A window, AEA released four addenda and extended the submission deadline by two weeks. However, no substantive changes were made to the RFA following its official release.

Upon closure of the RFA submission period, AEA reviewed the 34 bids they received across their corridor priority locations. This section will address the diversity and quality of the application pool, Alaska's priorities in the review process, and the state's success in filling gaps across all geographies, including rural areas. Likewise, this section will identify ways in which Alaska worked to establish a robust and reliable charging network across its singular AFC.

A Qualified, Diverse Applicant Pool

Given the low level of EV penetration in Alaska and the rural nature of the state, AEA was initially concerned that it may not be able to attract qualified bids across its 14 priority areas. According to Atlas EV Hub, fewer than 2,000 new light-duty electric vehicles (EVs) have been sold in Alaska since 2019, and EVs have made up less than two percent of the total vehicle market share over the past four years.

AEA received a diverse group of 34 proposals that exceeded agency expectations, considering the limited number of potential site hosts and charging providers that could realistically serve a project along the corridor. While one location did not receive any proposals, overall, the NEVI funding proved a strong enough incentive to encourage eight entities to submit applications and dozens of site hosts to commit to hosting chargers. AEA received a diverse group of 34 proposals that exceeded agency expectations, considering the limited number of potential site hosts and charging providers that could realistically serve a project along the corridor. The eight distinct applicants included four large national EVSPs, three property developers, and one Alaska Native Corporation (Table 2).

Of the 34 total applications, more than half were submitted by a single applicant (Universal Charging), which ultimately did not receive any awards. Nearly all the applications were submitted by large national EVSPs, but these entities typically partnered with local or regional Alaska businesses to serve as site hosts. While AEA would have liked to have seen more local companies or site hosts apply as direct grantees, the agency acknowledged that more established, national EVSPs are best equipped to reliably operate and maintain the NEVI charging network. With regard to the site host landscape, applicants put forth an array of site types in their proposals: convenience stores, conference centers, gas stations, hotels, lodges, and shopping centers, with a diverse selection of sites ultimately receiving awards.

Table 2: Applicants by Number of Applications and Awards

Applicant	Applicant Type	Number of Applications	Awards
Browman Development Company Wasilla	Property Manger	1	1
ChargePoint	EVSP	2	0
eCAMION America	EVSP	6	3
Jack River Properties*	Property Manager	1	0
North Anchorage Real Estate Investors	Property Manager	1	1
Tanama Chiefs Conference	Alaska Native Corporation	1	0
Tesla	EVSP	4	4
Universal Charging	EVSP	18	0

* While Jack River Properties did not win a site award as a direct applicant, the company was selected as a site host at Tesla’s Cantwell location.

Application Quality

Overall, AEA deemed the application pool high quality, providing staff with many factors to consider in the review process. According to the agency, all applicants responded well to the narrative portions of the RFA and were able to successfully relay their qualifications and past fast-charging project experience. As part of the proposal, applicants were required to demonstrate past performance and project competence to ensure that they could meet uptime and performance standards and comply with federal NEVI guidance and statutory requirements. The agency gave great consideration to applicants with a proven track record of successful charging projects and the experience necessary to manage NEVI charging sites. In doing their due diligence and ensuring quality control, the state checked applicant references from past projects and cross-referenced historical uptime reported in proposals with public data available on PlugShare, a mobile application that compiles user reviews of EV charging experiences. As part of the evaluation, some applications were disqualified for being non-responsive.

State Priorities

Notwithstanding the high quality of the applicant pool, a number of key AEA evaluation priorities set selected prospective awardees apart. At 20 percent of the total score, project cost served as a major factor in weighing applications against one other; applicants that offered the state more for less were given priority consideration. For example, Tesla proposed several eight-port sites for nearly half the cost (\$613,00) of their closest competitor, ultimately winning awards on all four applications it submitted (Table 2). Likewise, while the Tanana Chiefs Conference, an Alaska Native Corporation, put together a strong proposal that included onsite renewables, the funding requested was nearly four times that of Tesla’s, which ultimately rendered it uncompetitive (Table 1). Likewise, according to AEA, the strongest proposals came from those who homed in on Alaska-specific challenges: the cold weather climate, shortened construction season, and higher construction costs associated with building in rural and remote areas.

Coverage Across the Corridor

While Alaska is a predominately rural state with low EV penetration, AEA did receive applications across 13 of its 14 priority charging locations, including those in more remote areas. The proposals were distributed relatively evenly across the corridor regardless of urban or rural geography, and barring a few exceptions, applicants were able to find suitable site hosts north to south along the AFC. While Anchorage did receive the highest number of applications of any priority location (five), it tied with Nenana, a town of fewer than 500 people (Table 3). AEA did not provide any additional incentives to encourage applicants to submit projects in more rural areas, nor did it offer point preference in the scoring rubric for sites in these locations. This full coverage success demonstrated to AEA that the interest and business case exist for NEVI sites along the corridor.

Table 3: NEVI Priority Location by Number of Applications and Award Status

Priority Location	Number of Applications	Site Awarded?
Anchorage	5	Yes
Eagle River	2	No
Chugiak	1	No
Wasilla	3	Yes
Houston	2	No
Willow	1	No
Trapper Creek	3	Yes
Denali State Park	1	Yes
Cantwell	3	Yes
Healy	3	Yes
Clear	0	No
Nenana	5	Yes
Ester	1	Yes
Fairbanks	4	Yes
Total	34	9 sites awarded

Ensuring Network Reliability

To ensure that grantees comply with federal NEVI uptime requirements (97 percent), AEA and DOT&PF will retain a certain percentage of the total awarded amount, to be disbursed over five years given satisfactory grantee performance. Likewise, the state employed prescriptive selection criteria to ensure only serious applicants with the proper experience and qualifications ultimately received awards. The outcome of doing so was selecting Tesla and eCAMION, two established, national EVSPs, to manage and operate seven of the nine total NEVI sites in Alaska. The two remaining sites will be equipped with FLO charging hardware and utilize FLO networking services. Moreover, the state highly considered applications that addressed Alaska-specific challenges, such as harsh winter weather and a shorter construction season, which illustrated the applicants did due diligence and has a higher change of successfully completing the project within the budget and proposed schedule.

KEY FINDINGS AND LESSONS LEARNED

In reviewing the first round of Alaska NEVI RFA, project proposals, and awards, in addition to conducting an interview with AEA staff, the following lessons learned, and key findings were identified by the authors.

- Following approval of three discretionary exceptions, AEA anticipates the nine first-round NEVI awards will be sufficient to certify corridor buildout.
- NEVI funding proved a strong incentive to attract 34 bids from eight distinct applicants and court a diverse array of site hosts.
- Despite low EV penetration in Alaska and the rural nature of the state, AEA received bids across 13 of 14 priority areas and filled gaps across both urban and rural geographies without providing additional targeted subsidies.
- Proposal pricing (cost) and demonstrated understanding of Alaska-specific challenges were two of the strongest considerations in the evaluation process. AEA also strongly weighed applicant qualifications and proven experience.
- AEA conferred with all relevant utilities in developing required utility cost estimate forms, and this requirement did not hamper applicant submissions. To ensure they could adequately respond to all requests, utilities sought a two-week deadline extension.
- Seven of nine awards were issued to large, established electric vehicle service providers (Tesla and eCAMION). Tesla offered eight-port bids at half the price of the next competitor and was awarded all four sites for which it applied.
- Despite corridor coverage success, AEA noted that it could have conducted additional outreach to court bids in areas that received few or no proposals.
- To streamline the submission process, AEA would like applicants to submit site-specific proposal packages as a single PDF in future funding rounds.
- AEA suggests leveraging existing EV stakeholder groups in the state to gather input and feedback during the solicitation design process.
- Including the scoring rubric in the RFA supports proposal quality; applicants know what that state is looking for and how it will be evaluated. Providing the required application components and page limits in the RFA helps ensure applicants can submit quality bids with all of the necessary information.

ACHIEVING NEVI GOALS

NEVI Goal	State Action
Engage with Relevant Stakeholders in Program Design	<ul style="list-style-type: none"> • Worked with utilities to develop application forms • Gathered input from stakeholders to inform solicitation design • Conducted outreach across state to promote solicitation • Offered time-limited Q&A period during submission window
Ensure Positive Driver Experience	<ul style="list-style-type: none"> • Scored amenities in site proposal rubric • Provided examples of relevant amenities in application • Scored safety/lighting in site proposal rubric • Offered points to sites with additional connector types • Offered points to sites with future proofing
Establish a Reliable Charging Network	<ul style="list-style-type: none"> • Included percent retainage in contract • Selected established EVSPs • Strong consideration for candidate experience/qualifications • Conducted due diligence and applicant quality control
Fill Gaps Across All Geographies Including Rural Areas	<ul style="list-style-type: none"> • Satisfied requirements for corridor buildout • Received applications in rural areas without additional incentives
Prioritize Equity and Disadvantaged Communities	<ul style="list-style-type: none"> • Provided extra points to sites in Justice40 communities

