## Guidance on Accessible Electric Vehicle (EV) charging spaces and accessible Electric Vehicle Supply Equipment (EVSE) for public parking facilities owned or operated by the Commonwealth of Massachusetts

## February 2023

This guidance provides practical examples of how to make EV charging accessible and usable by persons who have disabilities. It may not address all code required elements. Alternative layouts are possible and actual parking layouts should be reviewed by a design professional. When working with existing parking facilities, provision of accessible routes, regrading of paved surfaces, and restriping of parking spaces may be necessary. This guidance was developed by the DCAMM Office of Planning, Statewide Accessibility Initiative and is intended for Commonwealth of Massachusetts facilities. While it is intended to address most accessibility requirements, conforming to the guidance provided does not guarantee compliance with all MassEVIP, state or federal accessibility requirements.

Additional guidance from the US Access Board on accessible EV charging can be found at <u>https://www.access-board.gov/tad/ev/</u>. The guidance provide below appears to be consistent with the federal guidance.

The Commonwealth of Massachusetts has obligations under Title I and II of the Americans with Disabilities Act (ADA) to ensure non-discrimination in employment and must ensure all public programs, services, and activities are accessible to persons with disabilities. To meet this mandate, State entities must ensure that at least 5% of the site's EV charging spaces, but not less than one such space, be accessible to persons with disabilities. Accessible EV charging spaces must include the following:

- 1. An 8' wide charging space adjacent to an 8' wide striped access aisle.<sup>1</sup>
- 2. The charging space and access aisle must be level and adjacent to an accessible route.
- 3. The EVSE must be located on a connecting accessible route to the accessible charging space.
- 4. The EVSE must have a level, clear maneuvering space of 48"x30" at the controls.
- 5. The controls must be within an accessible reach<sup>2</sup> and not require tight grasping, pinching, or twisting of the wrist.
- 6. The parking layout must be designed so the charging cord does not conflict with the accessible route when connected to a vehicle as cord may be a barrier.

Accessible EV charging space(s) can share an access aisle with a designated, accessible parking space. However, accessible EV charging spaces cannot count toward the minimum number of required accessible parking spaces in a parking facility. At this time, accessible EV charging spaces are not required to include the International Symbol of Accessibility (ISA) as the symbol would indicate the charging space is restricted to those with a disability placard.

In addition to the above requirements, the following are considerations for best practice:

- Accessible EV charging space(s) should be as located as close as possible to an accessible entrance of the building or facility and on a connecting, accessible route to that entrance.
- A permanent standing sign with the following words is recommended to indicate the accessible EV space is designed with persons needing accessible features in mind. "This charging space has accessible features".
- The International Symbol of Accessibility should not be used at accessible, EV charging spaces unless the intent is to restrict the charging space to persons who have disability placards.

<sup>&</sup>lt;sup>1</sup> Alternative charging space and access aisle dimensions may be possible provided the total clear width equals 16' at a minimum. The 16' distance provides the required clearance to be considered "van accessible".

<sup>&</sup>lt;sup>2</sup> Accessible reach is defined in 521CMR, the Rules and Regulations of the Massachusetts Architectural Access Board. Typically, controls located nor more than 48" above the paved surface will comply.

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The parking layouts shown below are intended to show two strategies to layout accessible EV charging spaces in an efficient way while providing accessibility features to at least one parking space.



In the layout above, two EV charging spaces are provided. Both spaces are restricted to EVs. The parking space on the left satisfies the 5% requirement for accessible EV charging because it is adjacent to an 8' wide access aisle and the EVSE is located on an accessible route. Anyone with an EV can charge in either space regardless of whether they have a disability placard or not.



In the layout above, two EV charging spaces are provided. Both spaces are restricted to EVs. Both electrical vehicle parking spaces are accessible because they are both adjacent to an 8' wide access aisle and the EVSE is located on an accessible route. Anyone with an EV can charge in either space regardless of whether they have a disability placard or not.