Hello

I have been driving an all electric vehicle in Washington State since April of 2011. I normally charge at home therefore my usual experience with public chargers are with DCFC chargers in remote locations on long trips.

My first observation is that there simply aren't enough of these chargers. I have always depended on a CHAdeMO charger style and I find that these are the rarest of the DCFC chargers. I have had three vehicles that use this format and I am distressed by the idea put forward by Electrify America (Volkswagen) that the CHAdeMO standard should be abandoned. I am in the process of purchasing a 2023 Mitsubishi Outlander PHEV which will only be available with the CHAdeMO format. No adapter is yet available for CHAdeMO vehicles to use other format DCFCs and, until such time as such adapters are available, the format cannot/should not be abandoned.

The second issue is that of dependability, I would estimate that, at any one time, about 1/3 of all chargers are non-functional. Coupled with the availability issue mentioned above, that produces a recipe designed to strand drivers at remote locations. Chargers may be simply broken or blocked or they are located in places that are not open 24/7, or their payment mechanisms may be fouled up. They may only be partly functional. For example: For 2 years the DCFC located in Cle Elum, Washington owned by Greenlots, only delivered half to the power that it advertised. Since Greenlots charged customers by the minute instead of the kWh, this meant customers had to pay twice as much and connect for twice as long as they should have. There was a disincentive for the company to fix its equipment. Shell Recharge has now taken over the Greenlots system and that particular charger has now been repaired.

Each DCFC operator has a different model for collecting fees. Some want you to use a token and pay a monthly subscription, some want you to use an app on a smart phone and pay from a prepaid account, some use an account but pay as you go. Some charge by the kWh and some by the minute. Often these payment schemes malfunction rendering the unit unusable. We need a standard payment option, hopefully a credit card at the site of the transaction. We need to eliminate the pay-by-minute pricing since it produces a disincentive for operators to repair underperforming equipment.

We are currently supporting three different DCFC charging standards, Tesla, CHAdeMO and CCS. This dilutes our efforts. One standard needs to be adopted for all new cars going forward (like they have done in Europe) and adapters allowing the unsupported standards to use the official DCFC need to be developed and placed at every DCFC location or sold to the general public.

Finally we simply need more of these located in more locations. If you believe in a capitalist
system, you understand that we won't fix many of these problems until there are enough chargers around so that people have a choice of which to use, at which time, competition for customers will force operators to bring down prices and repair equipment as soon as it breaks.

Paul Kahle  
Member: Seattle Electric Vehicle Association  
206-200-7782