

MEMORANDUM



TO: MEGAN MIKUS, DEPUTY DIRECTOR OF PUBLIC WORKS
FROM: WESLEY SCALLIONS, PUBLIC WORKS MANAGEMENT INTERN
SUBJECT: COMMUNITY EV FLEET EXPO
DATE: AUGUST 21, 2023

Mayor and Council –

Good information/advice
shared by EV Municipal
users.

- Victor

On August 17, 2023, staff attended the Community Electric Vehicle (EV) Fleet Expo hosted by SEMCOG in cooperation with the Smart Cities and Community Fleet Collaborative (SC2FC). The Expo offered attendees the opportunity to speak with exhibitors from every facet of the EV world including utility providers, vehicle manufacturers, vehicle distributors, EV integration consulting firms, and more. There was a panel discussion regarding the integration of EVs into everyday life, fleet operations, and funding possibilities for EV infrastructure. Additionally, DTE hosted a test drive event with several EV options.

The biggest takeaways were insights into the challenges of converting a municipal fleet and integrating EV infrastructure. The Fleet and Facilities Unit Manager for the City of Ann Arbor, Matt Kulhanek, spoke at length about some of the difficulties they faced in transitioning some assets to electric. The biggest barrier to entry for them, and everyone at the expo, was cost. EVs are substantially more expensive than their internal combustion counterparts and the infrastructure needed to charge them can be just as expensive. Example: In Ann Arbor two Ford F-150 Lightning's have been purchased for the Ann Arbor Fire Department. These vehicles can run \$10,000+ more than a standard 2023 Ford F-150 and require installation of charging infrastructure.

Additionally, panel members spoke about lessons learned when it comes to municipal fleet EVs. The consensus was the EV market is not currently capable of serving all the needs of a municipal fleet. EV winter maintenance trucks and other heavy-duty vehicles lose most of their efficiency due to lack of battery life and are currently not a viable replacement option. Municipal fleets considering moving towards EVs need to take small steps and thoroughly evaluate the needs of both the City they serve and the fleet itself. Many municipalities have only transitioned certain types of fleet vehicles (usually light duty vehicles with low mileage usage) over to EV. Charging infrastructure requires diligent coordination between administration, the utility provider, and the fleet manager and can present some issues when it comes to providing the power needed.

Finally, the last advice posed to attendees was to manage expectations. Electrification does not happen overnight and if it is rushed can result in massive monetary loss and inefficiencies. Support for the effort needs to be garnered at every level, stakeholders need to realize the upfront capital costs associated with electrification are significant, and the operational needs of a fleet/municipality need to be thoroughly identified before considering any conversion plan.

Information and options for funding, consulting, specific EV vehicle/charger options, and training were gathered and are available upon request.

