

REGIONAL ELECTRIC VEHICLE INFRASTRUCTURE IMPLEMENTATION STRATEGY

Robert Christopher
Environmental Planner

MWAQC-TAC
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Introduction

- The Regional Electric Vehicle Infrastructure Implementation (REVII) Strategy is being designed to support state and local governments as they prioritize locations for publicly accessible EV infrastructure deployment
- The information provided in the strategy will inform states and local jurisdictions as they apply for funding from federal programs such as future funding opportunities from the Bipartisan Infrastructure Law's Charging and Fueling Infrastructure (CFI) Discretionary Grant Program.
- The strategy will be developed by the TPB's on-call consultant, ICF, and funded largely through the TPB's Unified Planning Work Program (UPWP) Technical Assistance Program.
- The REVD Working Group will be asked to review draft deliverables for the REVII Strategy.

Primary Deliverables

- Electric vehicle projections for three forecast scenarios, by county and region, for analysis years 2030, 2035, and 2045
- GIS mapping for use by local jurisdiction staff
- Public-facing GIS mapping linked to COG's EV Clearinghouse
- Report with an overview of regional EV deployment implementation strategy, with a snapshot for each county detailing county projections for EVs, areas of interest, challenges and opportunities, and equity considerations

Project Schedule

- July 2023: Project kick-off
- September 2023: draft EV projections
- November 2023: draft EV charger deployment needs mapping
- January 2024: draft report
- February – March 2024: Final recommendations and report

Strategy

- Phase 1: Electric Vehicle and Charging Needs Assessment and Forecast
- EV projections for 2030, 2035, and 2045 by county and region
- Scenario development is informed by:
 - Vehicle registration data and population data
 - Technology readiness
 - Total cost of ownership
 - Existing and upcoming federal policies
 - Barriers to EV adoption

Phase 2: Electric Vehicle Charger Deployment Planning

- Use EV projections to estimate number and type of chargers needed
- Recommendations will identify sites that have a high probability for charging demand.
- A GIS map will be created that shows priority charging locations and will be available for download and use by member jurisdictions.

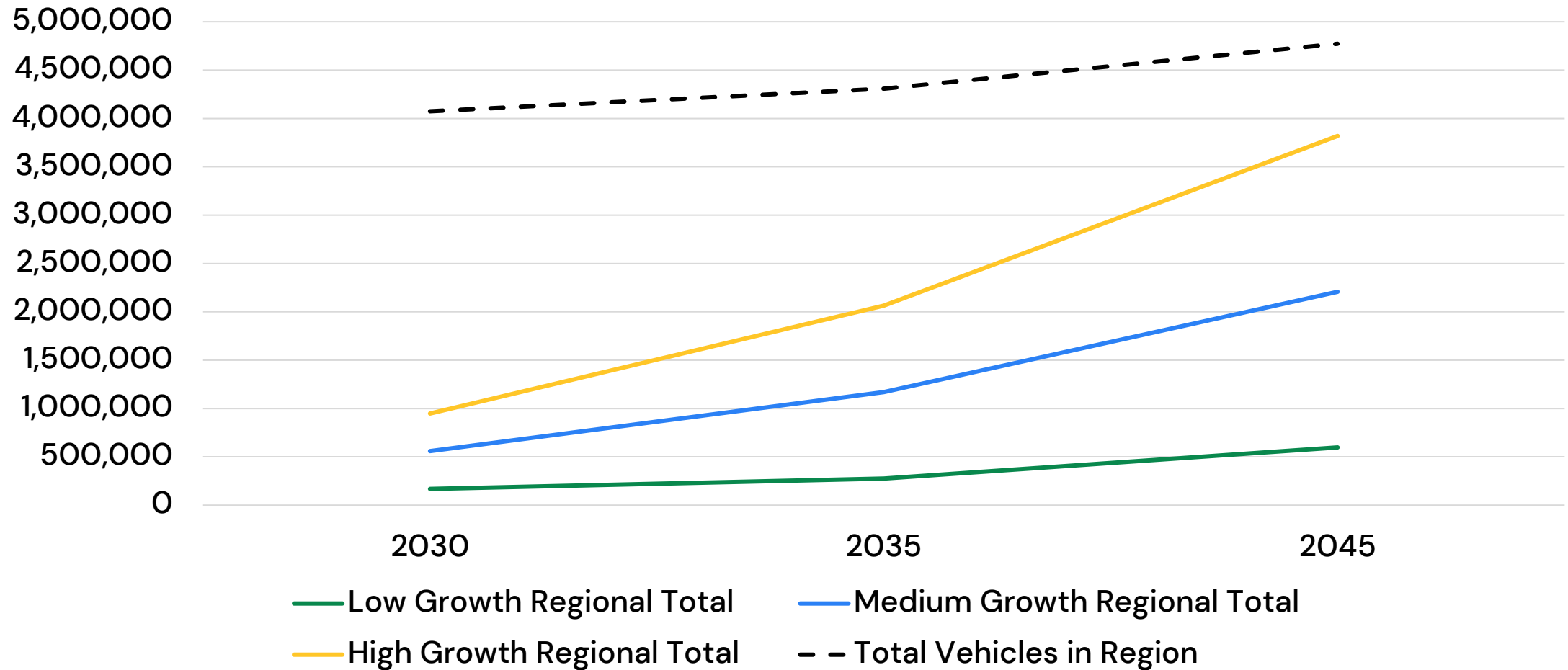
Scenarios

- **Business as Usual (BAU):** Growth rate informed by historical vehicle registration data and knowledge of the jurisdiction, serves as a conservative estimate.
- **Medium:** Average of BAU and high scenarios.
- **High:** Jurisdiction's proportion of state or district ZEV adoption goals; subsequent goal of 80% EVs by 2045. This scenario serves as the maximum potential for EV adoption.
 - EV registration goals & Advanced Clean Cars
 - 80% assumes maximum capacity for EVs on the grid

Scenario Inputs

Input Data	Source
State Population	US Census Bureau
Jurisdiction Population	A combination of MWCOG Cooperative Forecast 10 and US Census Bureau
Vehicle Registration	MWCOG data
EV and PHEV Registrations	MWCOG data
EV Adoption Goals	A combination of the Alternative Fuels Data Center and state or district agencies

Regional EV Projections by Scenario and Year



Robert Christopher

Environmental Planner

(202) 962-3205

rchristopher@mwcog.org

mwcog.org

777 North Capitol Street NE, Suite 300

Washington, DC 20002



Metropolitan Washington
Council of Governments