

This document has been prepared as part of the implementation project of Legal Pathways to Deep Decarbonization (Michael B. Gerrard and John C. Dernbach, eds. Environmental Law Institute [2019]) (LPDD). For background information on the project, see <https://lpdd.org>

Memorandum in Support of Executive Order Directing [State/Municipal] Departments To Procure Alternative Fuel Vehicles

Introduction: In the United States, the transportation sector accounts for 28% of the total energy consumed, 72% of petroleum usage and about a third of GHG emissions.¹ Cars and trucks use about half the total energy consumed by the transportation sector, which also includes trains, subways, planes, ships and other water craft.

To reduce the United States' greenhouse gas emissions by at least 80% from 1990 levels by 2050 will require the implementation of legal pathways that achieve a fuel economy level for light duty vehicles such as cars and sport utility vehicles in excess of 100 miles per gallon, and deployment of approximately 300 million alternative fuel vehicles, specifically hydrogen fuel cell vehicles ("HFCV"), battery electric vehicles ("BEV"), plug-in hybrid vehicles ("PHEV") and simple hybrid electric vehicles ("HEV") that recharge predominantly through regenerative braking. We collectively refer to all four as Alternative Fuel Vehicles ("AFVs"). "The goal is to shift 80%-95% of the miles driven from gasoline to lower carbon energy sources like electricity and hydrogen."²

State and local governments have a critical role to play in the implementation of several of the legal pathways for the increased utilization of AFVs. Among other things, they can exercise the "power of the purse" to procure AFVs as the internal combustion engine-powered vehicles ("ICE vehicles") in their state and municipal fleets are retired, thereby contributing significantly to the creation of a viable market for AFVs.

The model executive order (the "Model Order") accompanying this memorandum can be used to establish a state or local "Green Fleet Transition" program. It is common practice among state governors and local mayors to issue executive orders imposing policies, procedures and directives with respect to the administration of the departments that serve under them. The power to issue such orders is derived from state constitutions, municipal charters and (in some instances) statutes granting to governors and mayors the power to run their jurisdictions as chief executive officers. However, some jurisdictions may have imposed limits on, or procedures (like

¹ U.S. Energy Information Agency: Annual Energy Review: 2011 (2012). Available at: <http://www.eia.gov/totalenergy/data/annual/> (accessed: June 10, 2016). See, also, <http://www.eia.gov/todayinenergy/detail.php?id=29612>.

² Michael Gerrard and John Dernbach, *Legal Pathways to Deep Decarbonization in the United States* (Environmental Law Institute, 2019), Ch. 14, at 353. See also, Chris Gearhart, *Implications of Sustainability for United States Light-Duty Transportation Sector*, 3 MRS Energy & Sustainability 1, 7, note 6 (2016)

public notice or notice to the legislature) for the issuance of, executive orders³, and there are municipalities (e.g., those organized under the “weak mayor” model) where the power of the mayor is limited. Presumably, the chief executives of state and local governments are well aware of the extent of their power to direct the activities of agencies and departments within their jurisdictions. Nevertheless, knowledgeable legal counsel should be consulted to address any questions that may arise with respect to power of the chief executive to issue the Model Order, or the procedural requirements for its issuance.

Discussion of the Model Order: The Model Order begins with the identification of some of the benefits that would result from a green fleet transition program, including the reduction of greenhouse gas emissions, reduced emission of the traditional pollutants that harm public health, and fiscal savings accruing from reduced fuel and maintenance costs associated with the operation of electric vehicles.⁴ It calls for the development by the state or municipal department responsible for vehicle procurement of a plan for the orderly transition of the government fleet over time. Such a plan would:

- provide for the retirement and disposition of ICE vehicles and the procurement of AFVs in accordance with a timetable consistent with deep decarbonization goals;*
- require AFV procurement to follow lawful and fiscally responsible procedures, in accordance with specifications that account for the whole-life costs of vehicles;*
- allow for joint procurement with other governmental entities;*
- require the identification and utilization of available governmental incentives;*
- accommodate the special needs of Police, Fire and other departments requiring vehicles with particular performance capabilities;*
- require the procurement and installation of the infrastructure needed for convenient recharging of the electric vehicles added to the fleet; and*
- require periodic reporting and program adjustments.*

The Model Order is intended as a guide to assist a state or locality in the establishment of a well-considered program for the transition of its fleet to AFVs. We expect that each entity will make adjustments to the model to fit its particular needs, goals and political circumstances.

³ See The Council of State Governments, “Gubernatorial Executive Orders: Authorization, Provisions, Procedures” (Table 4.5, *The Book of the States 2017*, found at <http://knowledgecenter.csg.org/kc/system/files/4.5.2017.pdf>.

⁴ Electric Vehicle Transp. Ctr., Univ. Cent. Fla., Electric Vehicle Life Cycle Cost Analysis (Feb. 2017)

