

National Regulatory Conference 2019

Has the Time Come for Electric Vehicles and Storage?

This panel will discuss electrification efforts in Virginia and across the country, and the challenges and opportunities that exist for transportation electrification and energy storage. Panel discussion will address policy initiatives, as well as regulatory and legal challenges, for electric vehicle adoption and expansion of charging infrastructure. **Philip Jones**, Alliance for Transportation Electrification, will moderate this panel and the speakers will be **Emil Avram**, Dominion Energy; **Patrick Bean**, Tesla; and **Marcy Bauer**, EVgo.

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 - d. New York Public Service Commission Order Establishing Framework for Direct Current Fast Charging Infrastructure Program and Tesla Petition for Rehearing
 - e. Tesla, Inc. Letter to Delaware Public Service Commission regarding CPCN certification and regulation of EV charging stations as “public utilities”

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Panel Discussion Outline

1. Overview of the EV market and progress of transportation electrification initiatives (all panelists)

2. Recent legal and regulatory actions affecting electrification and EV infrastructure (all panelists)

- Volkswagen settlement funds – In 2016, Volkswagen settled lawsuits with the State of California and the Federal Trade Commission regarding efforts by the carmaker to cheat on emissions tests and deceive customers regarding the pollution from its vehicles. The lawsuits alleged violations of several environmental and consumer protection laws. The affected vehicles included 2009 through 2014 models from the Volkswagen family of cars. Volkswagen agreed to settle the lawsuits for a combined total of \$14.7 billion.
- \$4.7 billion of these settlement funds are to go towards environmental mitigation projects, include investments in Zero Emissions Vehicle (“ZEV”) infrastructure.
- The panelists will discuss the progress of Volkswagen settlement fund programs.
- Panelists will discuss the 2018 Virginia Energy Plan and Governor’s recommendations regarding transportation infrastructure (attached).
- Discussion other legal and regulatory barriers to electrification that have arisen, including potential regulation of charging stations by state commissions. (Reference attached Tesla, Inc. letter to Delaware Public Service Commission).

3. Utility EV tariffs and rate design (Emil Avram and Marcy Bauer)

- What role will utility rate design play in transportation electrification?
- Dominion Energy Virginia received approval to offer an experimental EV rate schedule between in 2011. Virginia allows such experimental rate schedules for purposes of “acquiring information which is or may be in furtherance of the public interest.” Panelists will discuss the information acquired by Dominion’s EV tariff and plans for future offerings.
- Panelists will discuss key features of successful EV tariffs.

- Reference to Dominion Schedule EV and Baltimore Gas & Electric EV Tariff (attached)

4. Grid modernization efforts in Virginia and nationally (all panelists)

- Apart from settlement-funded programs, what other policy initiatives are states enacting to facilitate the integration of EVs? Which states and utilities are leaders in this regard?
- Virginia’s 2018 Grid Transformation and Security Act (“GTSA”) provides that grid transformation projects, including utility investments in EV charging stations, are “in the public interest.” Virginia’s largest utilities must file Grid Transformation Plans with the SCC. Panelists will discuss the status of Virginia utilities’ grid transformation efforts.

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Speaker Biographies

Philip B. Jones
Alliance for Transportation Electrification
Executive Director



Philip B. Jones is currently the president of Phil Jones Consulting LLC, where he provides consulting services to the energy industry. Jones serves on the Advisory Council of EPRI (EPRI AC) which reviews the R&D programs of the Electric Power Research Institute; he also is a Member of the Western Grid Group (WGG), which focuses on the promotion of clean energy resources in the Western Interconnection; and he is serving as the executive director of the Alliance For Transportation Electrification.

Jones previously served as a Commissioner on the Washington State Public Utilities Commission, was the past President of NARUC (National Association of Regulatory Utility Commissioners), and presently serves on its Board of Directors. He previously chaired and served on the Board of Directors of NRRI (National Regulatory Research Institute). Jones also served on the Telecommunications Committee and the International Relations Committee in 2005. He also served as Co-Chair of the Washington Action Committee. He previously served on the Advisory Council of the Electric Power Research Institute (EPRI), which is the public interest council to advise electric utilities on R&D priorities. Prior to his commission appointment, he served as managing director of Cutter & Buck (Europe), BV in Amsterdam, the Netherlands for five years.

From 1983 – 1988 Jones served as senior legislative assistant to Senator Daniel J. Evans, the former U.S. Senator from Washington State, and staffed him on energy policy issues before the Senate Energy and Natural Resources Committee, as well as international trade policy. He was responsible for a broad range of energy issues, including hydroelectric re-licensing, nuclear waste management, energy conservation and renewables, and the Bonneville Power Administration.

Jones is a native of Spokane, Washington. He graduated from Harvard College with honors with a degree in East Asian Studies in 1977.

Emil Avram
Dominion Energy
Vice President – Innovation

Emil Avram is Vice President–Innovation. He works across business units to foster innovation, creativity and development in Dominion Energy’s people, processes and strategies.

Avram joined Dominion Energy in 2001 as a project manager in Power Generation. He was named manager- Power Generation Engineering in 2005 and senior business development manager in 2006. He became director-Business Development in 2008 and director- Engineering Services in 2017. He assumed his current post in July 2018.



Avram received his bachelor’s degree in aeronautical engineering from Massachusetts Institute of Technology (MIT), his master’s degree in mechanical engineering from Rensselaer Polytechnic Institute, and his MBA from the University of Connecticut.

He currently serves on the board of directors of the Innovation and Entrepreneurship Investment Authority / Center for Innovative Technology, a non-profit corporation that accelerates the next generation of technology and technology companies in Virginia.

Patrick Bean
Tesla
Policy and Business Development

Patrick Bean is a Senior Manager of Policy and Business Development at Tesla. Patrick manages Tesla’s charging infrastructure policy, rate design, energy procurement and electric utility engagement efforts. He serves as an expert witness in electric vehicle and rate design regulatory proceedings. Prior to Tesla, he was Deputy Director of Policy & Electricity Markets at SolarCity and led a “Utilities of the Future” research program at a Saudi Arabia-based think tank, KAPSARC. Patrick began his career a strategic generation planner at Southern Company where conducted economic analysis of which power plants to build, retire, retrofit with environmental controls, and fuel switch. He has a bachelor’s degree in environmental science and policy from Marist College, and a masters in energy and environmental resources from Duke University.



Marcy Bauer
EVgo Services LLC
Director, Program Operations

Marcy Bauer is Director of Program Operations for EVgo, the largest public fast charging network in the US. Marcy has been working in the clean transportation space for almost 10 years, and her experience spans the entire sector – consumer and fleet education on vehicles and charging, charging station site development and host engagement, public policy, utility engagement, OEM engagement, and industry analysis. Ms. Bauer earned her Bachelor of Science in Molecular Biology from Vanderbilt University, and her Master of Environmental Science from Miami University in Ohio. Marcy is on the Steering Committee for Plug-In NC, is involved in several clean transportation stakeholder and working groups throughout the Eastern region, and is heading up EVgo's charger deployment throughout Virginia under the state's VW Settlement Appendix D.



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VIRGINIA ENERGY PLAN

The Commonwealth of Virginia's 2018 Energy Plan

OFFICE OF THE SECRETARY OF COMMERCE AND TRADE
DEPARTMENT OF MINES, MINERALS AND ENERGY

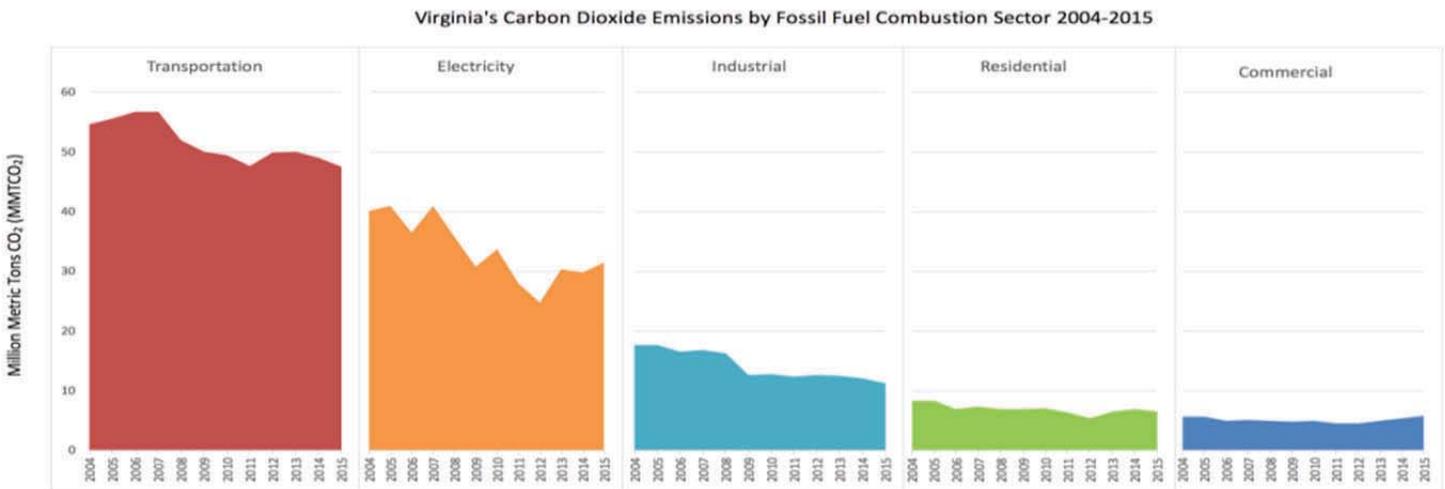
ELECTRIC VEHICLES AND ADVANCED TRANSPORTATION

XIII. ELECTRIC VEHICLES

Transportation forms an integral part of Virginia's economy and environment. The transportation sector is the largest end-use energy-consuming sector in the state.³⁰ In 2017, Virginia's drivers spent \$33,500,000 on 13,000,000 gallons of imported gasoline and diesel per day to fuel their vehicles.³¹ Each gallon of petroleum fuel produces 19 pounds of carbon dioxide (CO₂), and results in a total daily vehicle output of 123,500 tons of CO₂ in Virginia. This makes transportation the largest source of CO₂.

Figure 7: Carbon Dioxide Emissions by Sector

In recent years, Virginia has made considerable progress in reducing the carbon intensity

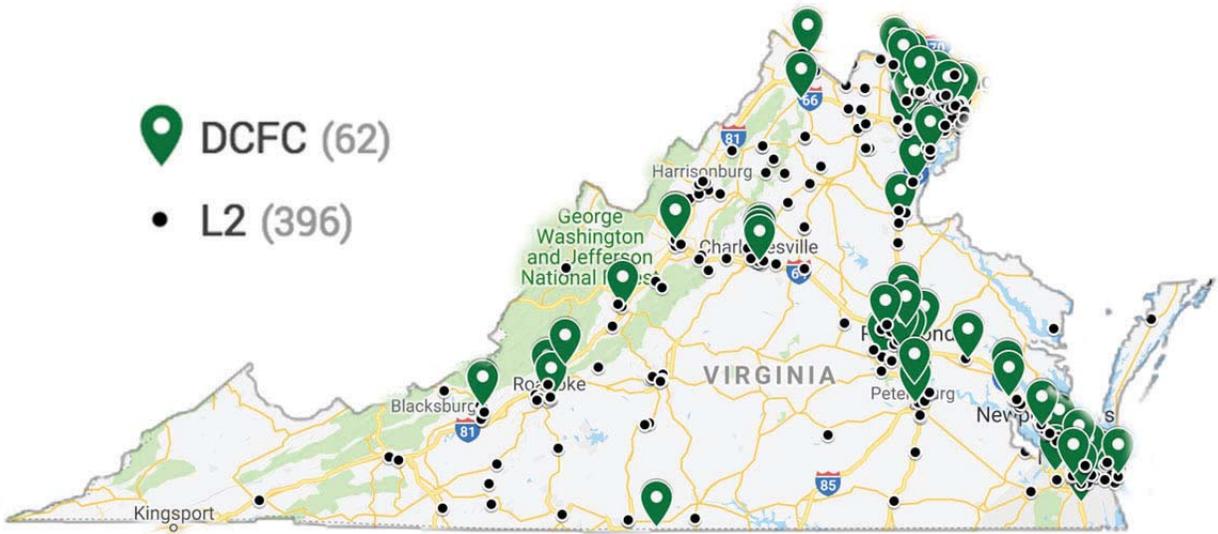


Emission estimates are based on energy consumption data from EIA's State Energy Consumption, Price, and Expenditure Estimates (SEDS) released Summer 2017
<https://www.eia.gov/state/seds/seds-data-complete.php?sid=US#CompleteDataFile>

of its electric generation through the use of natural gas and renewable energy resources. With a cleaner electric grid in Virginia, electric vehicles (EVs) provide a “well-to-wheel” emissions and energy consumption advantage over conventional vehicles running on gasoline or diesel.³²

Significant progress has also been made in electric vehicle technology in recent years, including performance improvements and cost reductions. Certain passenger battery-electric vehicles (BEV) currently on the market have ranges of over 200 miles on a single charge. In 2017, the two-millionth EV was sold, and EVs make up more than 10 percent of new vehicle sales in several local U.S. markets. In 2018, Volkswagen, General Motors, BMW, Ford, Fiat, and Volvo all announced \$100 billion investments in new EVs and plan to release numerous new EV models by 2025.

RECOMMENDED ACTIONS



In 2017, Virginia was designated a beneficiary in the Volkswagen Diesel Emission Mitigation Settlement. In August 2018, the Commonwealth awarded a contract to EVgo to develop a statewide public charging network to accelerate EV adoption. The network will complement existing and other large-scale deployments of charging infrastructure underway maximizing the state's investment. The network will prioritize high-powered DC fast charger (DCFC) deployment along heavily traveled corridors and metropolitan areas, while ensuring charging accessibility across the entire state. Lower output Level 2 (L2) chargers will also be dispersed statewide.

The program will offer sites with multiple chargers to ensure redundancy and will be designed to accommodate additional chargers or power for future upgrades. EV charging site and corridor signage will integrate with Virginia's existing systems to allow the public to safely and efficiently find desired charging stations. The network will be developed over three (3) one (1)-year investment cycles, and when complete, approximately 95% of Virginians will be within 30 miles of a DC fast charger.

Growing the fleet of EVs increases the need for emissions-free electric generation and requires an electric distribution system able to accommodate the demand of EVs and their charging systems.



RECOMMENDATIONS

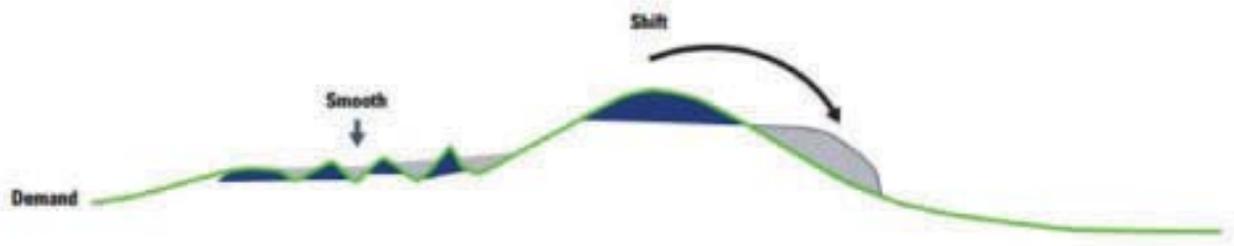
- ***The Commonwealth should adopt the Advanced Clean Cars (ACC) program.***
The ACC program includes both low-emission vehicle (LEV) standards as well as the Zero Emission Vehicles (ZEV) program. Adopting the LEV standards is especially important in light of recent federal action to roll back fuel efficiency standards, and a ZEV program would increase access to a wide range of EV models. Consumer access is linked to higher adoption rates and, as of 2015, 65% of nationwide EV sales occur in the nine states with a ZEV program.
- ***The Commonwealth should develop a comprehensive Virginia Transportation Electrification Action Plan and should include a goal for new electric vehicle-charging infrastructure by the end of 2021.*** A Transportation Electrification Action Plan could provide a more in-depth exploration of legislative, administrative, and public-private partnership opportunities to accelerate vehicle electrification. Through the stakeholder outreach process, the Commonwealth should also create an EV awareness marketing campaign to include an informational website and other marketing materials to promote the benefits of electric transportation.
- ***The Commonwealth should establish a Green Fleet Program and clean vehicle purchasing standards for state agencies.*** With an emphasis on its own fleet of vehicles, the Commonwealth should expand efforts for alternative fuel vehicles and work toward the electrification of public fleets across Virginia. To lower costs, the Commonwealth should also evaluate opportunities to provide joint procurement options for local governments.

XIV. INTEGRATION OF EMERGING TECHNOLOGIES

As the number of EVs and their charging needs increase, so too will the load that utility companies have to manage. Uncontrolled, EV load growth has the potential to exacerbate already expensive system peaks. Although it is difficult to estimate with certainty the effects of added load that EVs will place on Virginia’s electricity grid and the grids serving Virginia, the potential is significant.³⁴

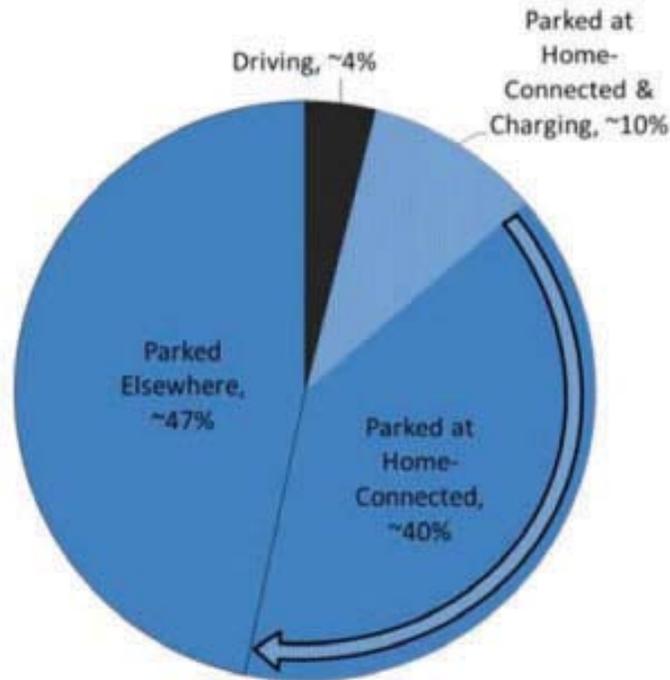
Given its flexibility, EV charging can be used by utilities to make the grid itself more flexible. EV load can be moved to times of day when it is less expensive to serve. As illustrated in Figure 9, the demand to which EVs might contribute (blue) could be shifted off-peak (gray), avoiding the need for new generation. EV load could also be moved to times when otherwise unused renewable energy might be available.³⁵

Figure 9: Depiction of Load Shift Potential



An EV’s ability to provide both load and generation, while also serving as a source of mobility, suggests the potential for coordination between regulators, customers, equipment providers, and grid operators to take advantage of EVs as grid resources.³⁶ EV charging services are capable of providing significant benefits to the overall utility transmission and distribution network if they are properly deployed, but without a price signal, drivers will generally plug in and charge immediately upon arriving home after work, exacerbating evening peak demand.³⁷

RECOMMENDED ACTIONS



A properly-designed rate can help mitigate these problems by sending price signals to customers that encourage them to charge their vehicles when there is less stress on the system during off-peak periods.

While rate design can play a key role in managing EV charging, utilities have developed smart charging programs to further enable vehicle integration. Examples of smart charging include demand response, one-way controlled charging, or vehicle-to-grid. Demand response (DR) principles can be applied in the EV charging context. Utilities can simply pause charging at peak times or when supply is otherwise disrupted. A DR approach could help stabilize grid frequency and avoid the dispatch of often more-expensive and dirty peaking generation resources.

Another version of smart charging, referred to as “one-way, controlled charging,” adds scheduling and modulating charging to the basic DR approach. This allows utilities greater flexibility to move the charging activity to times when the grid is most capable of providing the service, saving the EV owner and power company expense by avoiding the need for additional investment in infrastructure or generation capacity.

Vehicle-to-Grid (V2G) or two-way charging can be thought of as an advanced form of smart charging. It essentially allows for an EV’s battery to serve as a storage device that can discharge power back onto the grid when called upon.³⁸

XV. ADVANCED TRANSPORTATION PROGRAMS

Virginia has a number of ongoing transportation initiatives to advance clean and domestic fuel options for transportation. Virginia has worked to support local decision makers in moving towards clean domestic fuels, educating and encouraging fleet managers to retire vehicles earlier and purchase safer and cleaner fuel vehicles. Strategies include a focus on the deployment of cleaner vehicles in state and local government fleets, dray equipment at the Port of Virginia, other diesel vehicle replacements, and public education and outreach.

Virginia currently provides a number of funding opportunities for replacement of heavy-duty vehicles and procurement of vehicles, including those using compressed natural gas, propane, electricity, hydrogen, biodiesel, and ethanol. The emerging fuels of renewable propane and renewable natural gas can bring further benefit

RECOMMENDATIONS

- ***Virginia should continue fleet and consumer clean fuel adoption programs for all Virginia fuels.*** Virginia’s cleaner fuels as a replacement to gasoline and diesel can include ethanol, biodiesel, propane, and natural gas. As part of these programs, Virginia should offer one-on-one technical support for fleet managers and organizations seeking to transition to alternative and clean fuels. Virginia has worked to support local decision makers in moving towards clean domestic fuels, educating and encouraging fleet managers to retire vehicles earlier and purchase safer and cleaner fuel vehicles.
- ***Virginia should support bulk collaborative procurement options for use by school and local government fleets in order to reduce the costs of clean vehicle acquisition.*** Virginia is a partner in the ‘Fleets for the Future’ procurement effort run through the Metropolitan Washington Council of Governments. This approach can reduce the initial costs of vehicles and infrastructure as government and private sector managers purchase in bulk. The Commonwealth should evaluate engaging in similar aggregated procurement that may enable fleets to reduce their costs of clean vehicle acquisition.

VW “Clean Diesel” Consent Decree Overview

May 26, 2017



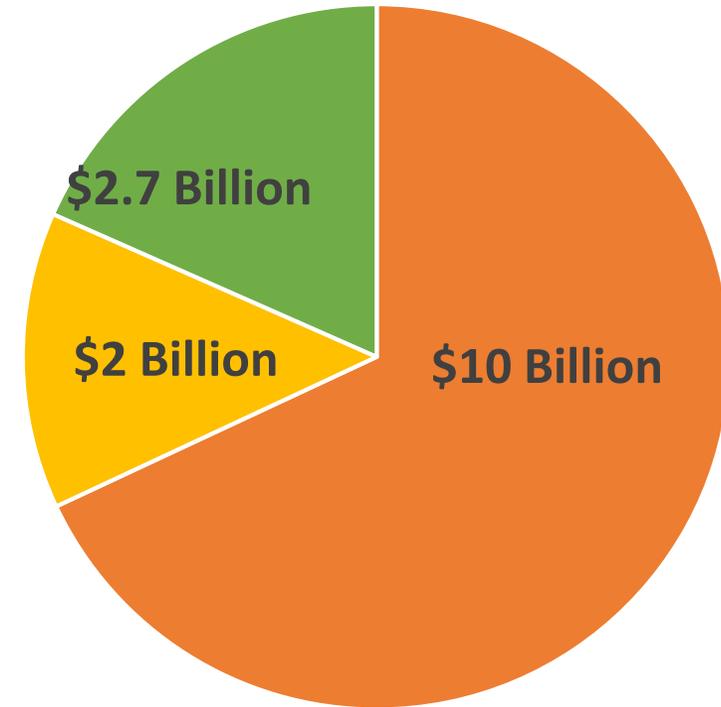
VW “Clean Diesel” Consent Decree: The Basics

First Partial Consent Decree

On October 25, 2016, the U.S. District Court approved a partial consent decree between the U.S., California, and Volkswagen regarding approx. 500,000 MY 2009-2015 vehicles with 2.0 L diesel engines.

Volkswagen admitted to employing defeat devices that caused the vehicles to emit levels of NOx significantly above EPA and CARB compliance levels.

The settlement has three parts, totaling \$14.7 billion.



- Vehicle buybacks and modification
- Zero Emission Vehicle Investment
- Environmental Mitigation Trust Fund

VW “Clean Diesel” Consent Decree: The Basics

\$10 Billion Vehicle Buyback, Lease Termination and Vehicle Modifications (Appendix A)

- Covers individual consumers who purchased or leased subject 2.0 L vehicles

\$2 Billion ZEV Investment Commitment over 10 years (Appendix C)

– National ZEV Investment Plan

- *Developed by VW et al.; approved by EPA, which has sole authority for making decisions.*
- \$1.2 Billion over 10 years, distributed in four, 30-month investment cycles for U.S., except California

– California ZEV Investment Plan

- *Developed by VW et al.; approved by CARB, which has sole authority for making decisions.*
- \$800 million over 10 years, distributed in four, 30-month investment cycles for California

\$2.7 Billion Environmental Mitigation Trust Fund (Appendix D)

- \$900 Million to be deposited by VW et al. into Trust Account no later than 30 days after the effective date
 - An additional \$900 million will be distributed on 2nd and 3rd anniversaries of effective date.
- Allocated among U.S. states, Indian tribes, D.C. , and Puerto Rico on a % basis to fund actions that will **reduce NOx emissions** where the 2.0 L subject vehicles were, are, or will be operated.

VW “Clean Diesel” Consent Decree: The Basics

Second Partial Consent Decree (approved May 11, 2017 by U.S. District Court)

- Regarding approximately 80,000 MY 2009 – 2016 **3.0 L diesel engines**
- Adds an additional \$225 million to the Environmental Mitigation Trust Fund

Third Partial Consent Decree (civil penalties and injunctive relief)

- January 11, 2017 – VW plead guilty and agreed to pay \$4.3 billion in civil and criminal penalties to the U.S. Treasury.

ZEV Investments May Include:

- Design/planning, construction/installation, operation/maintenance of ZEV infrastructure
 - Level 2 charging at multi-unit dwellings, workplaces, and public sites
 - DC fast charging facilities accessible to all vehicles utilizing non-proprietary connectors
 - Later generations of charging infrastructure
 - ZEV fueling stations (can include heavy-duty vehicles in CA)
 - Brand-neutral education or public outreach that builds or increases public awareness of ZEVs
 - Programs or actions to increase public exposure and/or access to ZEV car sharing services and ZEV ride hailing services, including ZEV autonomous vehicles
 - California’s “Green City” initiative
 - Includes operation of ZEV car sharing services, zero emission transit applications, and zero emission freight transport projects.

\$2.7 Billion Environmental Mitigation Trust Fund

- **Goal:** *Achieve reductions of **NOx emissions** in the United States.*
- **Beneficiaries:** U.S. States, Indian Tribes, D.C., Puerto Rico
- **\$2.7 Billion** is available for eligible mitigation actions, including:
 - **Eligible Vehicle Classes/Equipment:**
 - Class 8 Local Freight Trucks, Port Drayage Trucks ('92 to '09 MY)*
 - Class 4-8 School, Shuttle or Transit Bus ('92 to '09 MY)*
 - Freight Switchers
 - Ferries/Tugboats (marine)
 - Ocean Going/Great Lakes Vessels Shorepower
 - Class 4-7 Local Freight Trucks (Medium Trucks – '92 to '09 MY)*
 - Airport Ground Support Equipment
 - Forklifts and Port Cargo Handling Equipment
 - Light-duty ZEV Supply Equipment (*up to 15% of allocation*)
 - Level 1, Level 2, or fast charging equipment
 - Light-duty hydrogen fuel cell vehicle supply equipment
 - DERA Option – beneficiaries may use Trust Funds for non-federal match.
 - ***Use of funds as match for other federal funding opportunities is uncertain (not mentioned).***

**If state regulations already require upgrades to '92 to '09 MY vehicles, eligible vehicles shall also include MY '10 to '12.*

\$2.7 Billion Environmental Mitigation Trust Fund – Initial Allocations

Eligible Beneficiary	Initial Allocations	Eligible Beneficiary	Initial Allocations	Eligible Beneficiary	Initial Allocations
Puerto Rico	\$ 7,500,000	Louisiana	\$ 18,009,993	Colorado	\$ 61,307,576
North Dakota	\$ 7,500,000	Kentucky	\$ 19,048,080	Wisconsin	\$ 63,554,019
Hawaii	\$ 7,500,000	Oklahoma	\$ 19,086,528	New Jersey	\$ 65,328,105
South Dakota	\$ 7,500,000	Iowa	\$ 20,179,540	Oregon	\$ 68,239,143
Alaska	\$ 7,500,000	Maine	\$ 20,256,436	Massachusetts	\$ 69,074,007
Wyoming	\$ 7,500,000	Nevada	\$ 22,255,715	Maryland	\$ 71,045,824
District of Columbia	\$ 7,500,000	Alabama	\$ 24,084,726	Ohio	\$ 71,419,316
Delaware	\$ 9,051,682	New Hampshire	\$ 29,544,297	North Carolina	\$ 87,177,373
Mississippi	\$ 9,249,413	South Carolina	\$ 21,636,950	Virginia	\$ 87,589,313
West Virginia	\$ 11,506,842	Utah	\$ 32,356,471	Illinois	\$ 97,701,053
Nebraska	\$ 11,528,812	Indiana	\$ 38,920,039	Washington	\$ 103,957,041
Montana	\$ 11,600,215	Missouri	\$ 39,084,815	Pennsylvania	\$ 110,740,310
Rhode Island	\$ 13,495,136	Tennessee	\$ 42,407,793	New York	\$ 117,402,744
Arkansas	\$ 13,951,016	Minnesota	\$ 43,638,119	Florida	\$ 152,379,150
Kansas	\$ 14,791,372	Connecticut	\$ 51,635,237	Texas	\$ 191,941,816
Idaho	\$ 16,246,892	Arizona	\$ 53,013,861	California	\$ 381,280,175
New Mexico	\$ 16,900,502	Georgia	\$ 58,105,433	Tribal Subaccount	\$ 49,652,857
Vermont	\$ 17,801,277	Michigan	\$ 60,329,906	Trust Cost Subaccount	\$ 27,000,000
				Tribal Cost Subaccount	\$ 993,057
				Total	\$ 2,700,000,000

Note: Beneficiaries may request funding at any time, but not more than 1/3 of allocation during the first year after settling defendants make the initial deposit, or 2/3 of allocation during the first two years after the initial deposit. Must spend 80% of funding within 10 years; 100% within 15 years.



Schedule EV

RESIDENTIAL ELECTRIC VEHICLE CHARGING
(EXPERIMENTAL)

I. APPLICABILITY

This schedule is applicable, in conjunction with Schedule 1, to the separately metered and billed supply of electricity to a battery charging system installed for the purpose of operating a licensed electric motor vehicle which is subject to state inspection, and which is either owned or leased by the Customer. (Metering may be installed as a sub-meter behind the Schedule 1 meter, in which case consumption under this schedule will be subtracted from the Schedule 1 meter for purposes of billing Schedule 1.) The supply of electricity to such charging system must be via a dedicated hard-wired circuit, single-phase, at not more than 240 volts, nor more than 100 amperes. During the experimental period, receipt of service under this schedule is conditional upon Company approval.

Service under this schedule shall terminate effective November 30, 2018 ("Closure Date"). However, any Customer, who received service under this schedule on the Closure Date, may continue to receive service in accordance with this schedule until such Customer (i) selects an alternative, applicable schedule, (ii) discontinues service at the service location, or (iii) discontinues operating an electric vehicle – in which case such customer shall provide the Company with notice within thirty (30) days. In either case, this schedule shall no longer be available at the service location. No new Customer may receive service under this schedule after the Closure Date.

II. AVAILABILITY

This schedule is available to no more than 750 participants in the Company's Electric Vehicle (EV) Pilot Program who contract for service under this schedule to be effective on or before September 1, 2016.

III. MONTHLY RATE

A. Distribution Service Charges

1. Basic Customer Charge
Basic Customer Charge \$2.73 per billing month.
2. Plus Distribution kWh Charge
 - a. All On-peak and Off-peak kWh @ 2.3784¢ per kWh
 - b. Plus All Super Off-peak kWh @ 0.0103¢ per kWh
3. Plus each Distribution kilowatt-hour used is subject to all applicable riders, included in the Exhibit of Applicable Riders.

(Continued)

Schedule EV

RESIDENTIAL ELECTRIC VEHICLE CHARGING
(EXPERIMENTAL)

(Continued)

III. MONTHLY RATE (Continued)

B. Electricity Supply (ES) Service Charges

1. Generation kWh Charge

All On-peak ES kWh	@	10.1665¢ per kWh
All Off-peak ES kWh	@	1.3491¢ per kWh
All Super Off-peak ES kWh	@	0.6457¢ per kWh

2. Plus Transmission kWh Charge

All kWh	@	0.970¢ per kWh
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3. Plus each Electricity Supply kilowatt-hour used is subject to all applicable riders, included in the Exhibit of Applicable Riders.

IV. DEFINITION OF ON-PEAK, OFF-PEAK, AND SUPER OFF-PEAK HOURS

On-peak hours are the hours between 6 a.m. and 10 p.m. Super off-peak hours are the hours between 1 a.m. and 5 a.m. All other hours are Off-peak.

V. METER READING AND BILLING

A. Meters may be read in units of 10 kilowatt-hours and bills rendered accordingly.

B. The Company shall have the option of reading meters monthly or bimonthly. When the meter is read at other than monthly intervals, the Company may render an interim monthly bill based on estimated kWh usage during periods for which the meter was not read.

C. When bills are calculated for a bimonthly period, the Basic Customer Charge shall be multiplied by two.

VI. TERM OF CONTRACT

The term of contract shall be for not less than twelve billing months.

RESIDENTIAL ELECTRIC VEHICLE TIME-OF-USE - ELECTRIC
SCHEDULE EV

Availability: At the Customer's request, for BGE Standard Offer Service residential customers who purchase or lease a plug-in electric vehicle and charge the vehicle through a connection to the BGE electric distribution system . A plug-in electric vehicle is any vehicle propelled by an engine that utilizes, at least in part, on-board electric energy from a battery charging system. Electric vehicles include plug-in hybrid-electric vehicles (PHEV), extended range electric vehicles (EREV) and battery electric vehicles (BEV). This schedule is available to residential customers who charge their electric vehicles at their primary residence on a single time-of-use meter that is also used to measure consumption at the primary residence (whole house) level. Participation requires the installation of a Smart Meter capable of measuring hourly time-of-use data.

Delivery Voltage: Service at Secondary Distribution Systems voltages.

Monthly Net Rates:

Delivery Service Customer Charge:	\$ 7.90 per month,
Less: Competitive Billing (where applicable) (see Section 7.7 for details)	\$ 0.62 per month,

Energy Charges:

Generation and Transmission Market-Priced Service Charges can be found on www.bge.com and [Rider 1 – Standard Offer Service](#).

Delivery Service Charge:	0.03147 \$/kWh
(Excludes Rider 10 - Administrative Cost Adjustment)	

Minimum Charge: Net Delivery Service Customer Charge.

Billing Seasons: Summer rates are billed for usage from June 1 through September 30.
 Non-Summer rates are billed for usage from October 1 through May 31.

(Continued on Next Page)

Schedule EV continued**Rating Periods:****Summer**

Peak - Between the hours of 10 am and 8 pm on weekdays, excluding the National holidays listed below.

Off-Peak - All times other than those defined for the On-Peak rating period.

Non-Summer

Peak - Between the hours of 7 am and 11 am, and the hours of 5 pm and 9 pm on weekdays, excluding the National holidays listed below.

Off-Peak - All times other than those defined for the On-Peak rating period.

The Non-Summer time periods shown above will begin and end one hour later for the period between the second Sunday in March and the first Sunday in April, and for the period between the last Sunday in October and the first Sunday in November.

Holidays

All hours on Saturdays and Sundays and the following National holidays are Off-Peak: New Year's Day, President's Day, Good Friday, Memorial Day, Independence Day, Labor Day, Thanksgiving, Christmas, and the Monday following such of these as fall on Sunday.

Late Payment Charge: Standard. (Sec. 7.4)

Payment Terms: Standard. (Sec. 7)

Subject to Riders applicable as listed below:

1. Standard Offer Service
2. Electric Efficiency Charge
3. Miscellaneous Taxes and Surcharges
4. Budget Billing
8. Energy Cost Adjustment
9. Customer Billing and Consumption Data Requests
10. Administrative Cost Adjustment
12. Prepaid Pilot
13. Change of Schedule
14. Qualified Rate Stabilization Charge
15. Demand Response Service
16. Nuclear Decommissioning and Standard Offer Service Return Credits
20. Financing Credit
21. Billing in Event of Service Interruption
22. Minimum Charge for Short-Term Uses
23. Advanced Meter Services
25. Monthly Rate Adjustment
26. Peak Time Rebate
28. Small Generator Interconnection Standards
30. Demand Resource Surcharge
31. Electric Reliability Investment Initiative Charge
32. Community Energy Pilot Program

**RANDOLPH ELECTRIC MEMBERSHIP CORPORATION
ASHEBORO, NORTH CAROLINA
SCHEDULE A26TOU-PEV
SINGLE-PHASE TIME-OF-USE SERVICE – PLUG-IN VEHICLE**

EFFECTIVE DATE:

AVAILABILITY

This schedule is available on a voluntary basis to all single-phase consumers that normally would receive service under Rate Schedule A26. If for any reason there is a meter failure in the electronic time-of-use meter, the consumer's monthly kWh usage will be billed at the A26 rate.

TYPE OF SERVICE

Service under this schedule shall be single-phase, 60-hertz, at the Cooperative's available secondary voltage.

RATE - MONTHLY

Basic Facilities Charge:		\$ 27.50 per month
Energy Charges:		
All on-peak kWh	@	36.42 ¢ per kWh
All off-peak kWh	@	8.43 ¢ per kWh
All super off-peak kWh	@	3.02 ¢ per kWh

WHOLESALE POWER ADJUSTMENT CLAUSE

The above per kWh charges may be increased or decreased monthly in accordance with the Cooperative's Wholesale Power Adjustment Clause (Schedule WPCA).

ENERGY EFFICIENT HOME DISCOUNT

The above kWh rates will be discounted by 4.25% for all-electric homes meeting the current standards as set forth by Randolph EMC as to energy efficiency. Energy efficient standards will include, but shall not be limited to: insulation R factors; attic ventilation; basement and crawl space ventilation; the use of storm windows and doors or windows and doors using thermal glass; proper caulking and sealing of windows and doors; load management switches on water heaters and air conditioners; and other energy efficient methods and equipment as deemed suitable by Randolph EMC.

MINIMUM MONTHLY CHARGE:

The minimum monthly charge shall be the Basic Facilities Charge.

MINIMUM ANNUAL CHARGE FOR SEASONAL SERVICE

Consumers requiring service only during certain seasons not exceeding nine months per year may guarantee a minimum annual charge, in which case, there shall be no minimum monthly charge. The minimum annual charge shall be sufficient to assure adequate compensation for the facilities installed to service the consumer. In no event, however, shall the minimum annual charge be less than twelve times the minimum monthly charge determined in accordance with the foregoing paragraph.

RANDOLPH ELECTRIC MEMBERSHIP CORPORATION

SCHEDULE A26TOU-PEV

SINGLE-PHASE TIME-OF-USE SERVICE – PLUG-IN-VEHICLE

DETERMINATION OF ON-PEAK, OFF-PEAK, & SUPER OFF PEAK HOURS

	ON-PEAK	OFF-PEAK	SUPER OFF-PEAK
April 16 th – October 15 th	3:00pm – 6:00pm	5:00am – 3:00pm 6:00pm – 10:00pm	10:00pm – 5:00am
October 16 th – April 15 th	6:00am – 8:00am	5:00am – 6:00am 8:00am -10:00pm	10:00 pm – 5:00am
Weekends Holidays**	Not Applicable	5:00am – 10:00pm	10:00 pm – 5:00am

**Holidays considered off-peak holidays are New Year’s Day, Good Friday, Memorial Day, Independence Day, Labor Day, Thanksgiving Day, the day after Thanksgiving, and Christmas Day. If any of these holidays fall on a Saturday or Sunday then Friday will be considered the holiday for Saturday and Monday will be considered the holiday for Sunday.

TEMPORARY SERVICE

Temporary service, such as service to construction jobs, fairs, and carnivals, shall be supplied in accordance with the foregoing rate, except that the consumer shall pay in addition to the foregoing charges the total cost of connecting and disconnecting service, less the value of materials returned to stock. A deposit, in advance of construction, may be required in the full amount of the estimated bill for service, including the cost of connection and disconnection.

CONTRACT TERM

Any consumer choosing to be served under this time-of-use schedule will have their kilowatt-hour usage pattern monitored by the Cooperative for a two-month period prior to being put on this rate schedule. Results of the monitoring period will be shared with the consumer to help them determine if they, in fact, do want to be put on this rate schedule. If the consumer decides to be put on the schedule, they shall remain on the schedule for a minimum of one year, unless they agree to pay to the Cooperative a fee of \$100.00.

RANDOLPH ELECTRIC MEMBERSHIP CORPORATION

**SCHEDULE A26TOU-PEV
SINGLE-PHASE TIME-OF-USE SERVICE – PLUG-IN-VEHICLE**

TERMS OF PAYMENT

Bills under this schedule are net and are due when rendered. Bills are past due based on the following schedule:

<u>Cycle</u>	<u>Past Due Date</u>
1	28 th of Month
2	5 th of Month
3	12 th of Month
4	19 th of Month

Bills not paid by the above past due dates are subject to disconnection as outlined in the *Service Rules and Regulations* of Randolph EMC.

TAXES

All rates are subject to North Carolina Sales Tax.

SCHEDULE EV-1
PILOT – RESIDENTIAL ELECTRIC VEHICLE SERVICE

Availability

Available on voluntary basis as a pilot program for residential consumers taking service under Schedule 31 who also desire metered service for the sole purpose of electrically charging a licensed automobile or light truck. Service on this tariff is limited to electric vehicles that are SAE J1772 compliant and registered and operable on public highways in the State of Minnesota. Low-speed electric vehicles, including golf carts, are ineligible to take service under this tariff even if licensed to operate on public streets. The consumer may be required to provide the Association with proof of registration of the electric vehicle prior to taking service under this tariff. Service is subject to the established rules and regulations of the Association.

Term

The pilot program will be offered for a minimum of a two year period. At the end of the initial two year pilot period, the Association will determine if this program will be continued, modified, or eliminated. If it is eliminated, the consumers participating in the pilot program will revert back to the appropriate retail rate tariff for their class of service.

Type of Service

Single phase or three phase, 60 hertz, at available secondary voltages.

Rate

Energy Charges:

Off-Peak: 6.74¢ per kWh
On-Peak: 41.44¢ per kWh
Other: Schedule 31 energy charges apply
Plus RTA and applicable sales tax

Definition of Periods

Energy Charge time periods are defined as follows:

Off-Peak 9:00 pm to 8:00 am Mon. – Fri., and all day Weekends and Holidays
On-Peak 4:00 pm to 9:00 pm Mon. – Fri., excluding Holidays
Other 8:00 am to 4:00 pm Mon. – Fri., excluding Holidays

Holidays shall be: New Years Day, Memorial Day, Independence Day, Labor Day, Thanksgiving Day and Christmas Day.

DAKOTA ELECTRIC ASSOCIATION
4300 220th Street West
Farmington, MN 55024

SECTION: V
SHEET: 4.1
REVISION: 1

SCHEDULE EV-1
PILOT – RESIDENTIAL ELECTRIC VEHICLE SERVICE
CONTINUED

Metering

Electric service under this rate must be supplied through a sub-metered circuit (installed at the consumer's expense) and approved electric vehicle charging equipment. Installations must conform to the Association's specifications. The consumer shall supply, at no expense to Dakota Electric, a suitable location for meters and associated equipment used for billing and for load research. For purposes of monitoring consumer load under this pilot program, the Association may install load research metering at its expense.

Resource and Tax Adjustment (RTA)

The Energy Charge shall be adjusted for incremental changes in purchased power costs, incremental changes in Dakota Electric's conservation tracker account balance, and incremental changes in real and personal property taxes above or below the appropriate base costs. The conservation tracker account factor shall be calculated as described in the Resource Adjustment Rider (Sheet 51). The real and personal property tax factor shall be calculated as described in the Property Tax Adjustment Rider (Sheet 53). The purchased power cost factor shall be adjusted by \$0.0001 per kilowatt-hour or major fraction thereof, of which the Association's total projected power cost per kilowatt-hour annually exceeds, or is less than \$0.0903 per kilowatt-hour sold. The year used for the annualized RTA will be January 1 through December 31. The projection shall be reviewed after six months (July) and adjusted if necessary. The RTA shall be filed with the Public Utilities Commission each year before implementation.

Data Privacy

Participation in any load research effort as part of this schedule will be strictly voluntary. The Cooperative's use of such load research data will be strictly limited to the provision of electric service. The Cooperative will not disclose, share, rent, lease, or sell such data to any third party or affiliate for any other purpose, without the consumer's express, affirmative written informed consent.

Taxes

The rates set fourth are based on taxes as of January 1, 2014. The amount of any increase in existing or new taxes on the transmission, distribution, or sales of electricity allocable to sales hereunder, excluding real and personal property taxes already recovered through the RTA, shall be added to the above rate as appropriate.

Terms of Payment

The above charges are net. Balances over \$10.00 not received by the Association by the next scheduled billing date will have an interest charge of 1.5 percent or \$1.00, whichever is greater, added to the balance.

STATE OF NEW YORK
PUBLIC SERVICE COMMISSION

At a session of the Public Service
Commission held in the City of
Albany on February 7, 2019

COMMISSIONERS PRESENT:

John B. Rhodes, Chair
Gregg C. Sayre
Diane X. Burman, concurring
James S. Alesi

CASE 18-E-0138 - Proceeding on Motion of the Commission
Regarding Electric Vehicle Supply Equipment and
Infrastructure.

ORDER ESTABLISHING FRAMEWORK FOR DIRECT CURRENT FAST CHARGING
INFRASTRUCTURE PROGRAM

(Issued and Effective February 7, 2019)

BY THE COMMISSION:

INTRODUCTION

On April 13, 2018, a "Joint Petition" was filed by the New York Power Authority (NYPA), New York State Department of Environmental Conservation (DEC), New York State Department of Transportation (DOT), and the New York State Thruway Authority (NYSTA) (collectively, Joint Petitioners), seeking rate relief to encourage the Statewide deployment of Direct Current Fast Charging (DCFC) facilities for electric vehicles (EVs). In particular, the Joint Petition requested that the Public Service Commission (Commission) direct investor-owned electric utilities (IOUs) to modify their tariffs such that DCFC customers would:

- i) qualify for service under a non-demand-billed service classification;
- ii) be exempt from any kilowatt (kW) or kilowatt hour (kWh) limit that would jeopardize their entitlement to take

non-demand billed service; and, iii) be provided a one-time opportunity to elect to take service under the applicable demand-metered service classification.

On April 24, 2018, the Commission commenced this proceeding to consider various EV-related issues, such as those raised in the Joint Petition, as well as the role of the IOUs in providing infrastructure and rate design to accommodate the needs and electricity demand of EVs and electric vehicle supply equipment.¹ The Commission also directed Department of Public Service (Staff) to convene a technical conference to consider various topics.²

On July 18-19, 2018, Staff hosted a technical conference, in collaboration with the New York State Energy Research and Development Authority (NYSERDA), to solicit stakeholder input, identify issues to be addressed, and establish the scope of a subsequent Staff whitepaper.³

On August 16, 2018, the Secretary to the Commission issued a notice seeking post-technical conference comments and announcing a subsequent working group to address rate design principles to be applied to electric vehicle charging stations.⁴ These discussions led to a subsequent stakeholder engagement process, which was led by NYPA and Consolidated Edison Company of New York, Inc. (Con Edison), and resulted in the development of a "Consensus Proposal" among several entities. On November 21, 2018, the Consensus Proposal was filed by Con

¹ Case 18-E-0138, Order Instituting Proceeding (issued April 24, 2018).

² Id., pp. 4-5.

³ Case 18-E-0138, Notice of Technical Conference (issued May 25, 2018).

⁴ Case 18-E-0138, Notice of Working Group Meeting and Request for Post-Conference Comments (issued August 16, 2018).

Edison, Central Hudson Gas & Electric Corporation (Central Hudson), New York State Electric & Gas Corporation (NYSEG), Niagara Mohawk Power Corporation d/b/a National Grid (National Grid), Orange and Rockland Utilities, Inc. (O&R), Rochester Gas & Electric Corporation (RG&E), NYPA, DEC, DOT, NYSERDA, and NYSTA (collectively, the Consensus Parties). The Consensus Proposal seeks to encourage Statewide deployment of new, publicly accessible DCFC Facilities by implementing an annual declining per-plug incentive program. The incentives, as proposed, would be available for each IOU to address the short-term economic challenges of installing publicly available and affordable DCFC stations, due to the nascent EV market in New York.

By this order, the Commission adopts the Consensus Proposal, with modifications, as discussed below. The Commission finds that the per-plug incentive programs developed by each utility are appropriately sized to encourage DCFC station development in a cost-effective manner. By directing an interim review process, the Commission will ensure that the deployment goals of these programs are met with the most efficient use of ratepayer funds, while providing the right system benefits in the most beneficial locations of the distribution grid, and in a manner best suited to accelerate market-based deployment. The DCFC facility deployments spurred by these incentives will help to achieve the State's Zero-Emission Vehicle (ZEV) goals,⁵ and advance the State Energy

⁵ On October 24, 2013, Governor Cuomo entered into a Memorandum of Understanding with the Governors of California, Connecticut, Maryland, Massachusetts, Oregon, Rhode Island, and Vermont agreeing to coordinate and collaborate to promote effective and efficient implementation of ZEV regulations. The Memorandum of Understanding (MOU) is available at: dec.ny.gov/docs/air_pdf/zevmou.pdf

Plan's targets of reducing greenhouse gas (GHG) emissions 40 percent below 1990 levels by 2030, and 80 percent below 1990 levels by 2050.⁶

BACKGROUND

The Joint Petition indicated that strategic deployments of DCFC facilities are key to reaching the State's ZEV goals. As the Joint Petitioners explained, slower-charging elements are developing in New York, but the pace of public DCFC station development has been inadequate. The Joint Petitioners stated that DCFC stations, going forward, will typically be rated at 50 kW or higher, and take service under a rate with both demand and energy charges. According to the Joint Petitioners, during this period of early adoption of EVs and low utilization of DCFC stations, demand charges impose a disproportionate cost on station operation and render any DCFC station business model infeasible.

As State agencies and authorities that share an interest in encouraging EV adoption and deployment, the Joint Petitioners requested that the Commission pursue a two-part strategy to address rates that unduly restrain DCFC deployment. Under the first part, the Joint Petitioners requested that the Commission direct each IOU to immediately modify their Service Classification 2 (SC-2) or Small-General non-demand-metered tariffs so that DCFC station customers: a) qualify for a non-demand-metered service classification; b) are exempt from any kW or kWh limit that would jeopardize their entitlement to take service under that tariff; and, c) have a one-time opportunity to elect to take service under the applicable demand-metered service classification. The Joint Petitioners explained that,

⁶ Case 14-M-0094, Clean Energy Fund, Order Authorizing the Clean Energy Fund Framework (issued January 21, 2016).

by accommodating DCFC customers under a service classification without a demand charge, the economic viability markedly improves in this period of low utilization. Moreover, the Joint Petitioners stated, this immediate relief would constitute a timely recognition of the essential role that public DCFC stations play in alleviating concerns over EV range and supporting the larger public policy goal of rapidly increasing EV adoption.

As part of the second part of the strategy, the Joint Petitioners requested that the Commission address broader EV implementation plans and establish principles to guide IOUs in redesigning rates applicable to DCFC accounts in a newly-commenced proceeding. Joint Petitioners explained that, by granting both elements of relief, the Commission would enable the State to reach its ZEV deployment, environmental, and system planning objectives, while avoiding unduly burdening electric ratepayers.

According to the Joint Petitioners, a substantial increase in EVs can increase utility and system load factors and utilization of utility infrastructure, which can in turn increase utility revenue, and ultimately reduce rates for non-participating customers. The Joint Petitioners explained that several studies in utility service territories across the United States show that increased EV charging will grow the number of megawatt hours (MWh) that flow through the electric grid and contribute towards the costs to operate and maintain the transmission and distribution system, allowing for the reduction in rates for all ratepayers. Furthermore, the Joint Petitioners cited a study by M.J. Bradley & Associates estimating that, if New York's ZEV Mandate goals are achieved, the net present value (NPV) of annual utility net revenues would exceed the incremental costs to serve the EVs. According to the Joint

Petitioners, increased EV adoption, made possible by increased penetration of DCFC facilities from eliminating demand charges, should yield net positive value of \$109 to \$175 million due to the increased demand and throughput in 2025 alone.

The Joint Petitioners argued that a significant concern for potential EV buyers is "range anxiety," which may be alleviated by strategic deployment of DCFC stations. Deploying DCFC capabilities would address actual range issues, as well as the perception that range is a problem for EVs, by being highly visible infrastructure, according to the Joint Petitioners. Further, the Joint Petitioners stated that there are presently only 78 DCFC plugs at 44 stations that are publicly available to all EV drivers, while New York will need approximately 1,500 total DCFC plugs to support the ZEV goals.

As discussed in the Joint Petition, operation and maintenance costs for DCFC stations include charges for electricity, software subscriptions, station management, billing, and preventative and corrective maintenance. However, according to the Joint Petitioners, the amount of electricity usage and the applicable electric tariff is the primary driver. The Joint Petitioners elaborated that when DCFC station utilization rates are very low, demand charges can account for 80 percent to 90 percent of a station's monthly electric bill. Because of this, the Joint Petitioners asserted that the NPV of a DCFC in New York is negative under many utilization levels, and that this discourages DCFC investment, particularly at this early stage of EV market development.

The Joint Petitioners further argued that rates applicable to DCFC stations are not cost-based because of the unique load profile and the currently limited costs these facilities impose on the electric system. Analogizing to customers with on-site generation taking service under standby

rates, the Joint Petitioners suggested that the Commission recognize the low load factors of DCFC stations and change cost allocations.

As stated in the Joint Petition, shifting to a service class without a demand rate would likely incent DCFC facility development Statewide, except that in Con Edison's service territory an additional incentive would be required. In order to incent DCFC development in Con Edison's service territory, the Joint Petitioners suggested that the Commission authorize Con Edison to redirect its Business Incentive Rate (BIR) as a further discount on the SC-2 or Small General non-demand rate proposed for DCFC stations.

Reiterating their second request for relief, the Joint Petitioners suggested that a generic proceeding would enable the Commission and stakeholders to remedy the rate issues caused by DCFC facilities. Specifically, they suggested moving a substantial amount of revenue collection for shared distribution and transmission infrastructure from monthly demand charges to kWh charges. The Joint Petitioners suggested that rates to recover the costs of facilities far upstream from a customer, such as distribution substations and transmission lines shared by many customers, should be structured to enable a substantial portion of their cost recovery through kWh charges instead of through existing demand charges.

Finally, the Joint Petitioners asserted that utilities should be required to implement long-term DCFC rate plans to provide relative certainty regarding future demand charge operation costs for DCFC stations. In addition to stand-alone EV tariffs to make DCFC stations viable, the Joint Petitioners suggested that the Commission's generic proceeding could also consider medium and heavy-duty electric vehicle issues.

THE CONSENSUS PROPOSAL

The Consensus Parties state that their proposal would be implemented differently for each IOU, and is designed based on two principles. First, that DCFC stations should receive service under the appropriate, demand-metered, service classification. Second, that utility-specific programs should provide limited term cost relief and be designed with an appropriate size and scope to encourage the development of DCFC infrastructure, consistent with state ZEV goals.

According to the Consensus Parties, the Consensus Proposal would: 1) provide an annual declining per plug incentive to qualifying DCFC station operators for approximately seven years (i.e., 2019 - 2025); 2) require service to be provided under a demand-metered classification; 3) pay the incentive on a per-plug basis for each plug with simultaneous charging capability of at least 50 kW; and, 4) provide a higher incentive for plugs capable of simultaneously charging at 75 kW and above, in order to provide a greater incentive to install plugs with faster charging capability. Further, the total number of plugs across all utility service territories that may receive an incentive would be limited to 1,074, and the maximum potential cost of the per plug incentives over the proposed seven-year term of the program would be approximately \$28 million. The Consensus Parties request that the IOUs be authorized to recover the costs of this program with interest, including applicable incremental administrative costs.

The Consensus Proposal identifies common program parameters amongst the IOUs, including: 1) applicability to only new DCFC facilities that are publicly accessible (i.e., without site-specific physical access restrictions such as radio-frequency identification, security badge, or otherwise limited access); 2) eligibility and incentive levels based on

when a service application is submitted; 3) the provision of incentive payments when the plugs are energized; 4) incentives that are available on a first-come basis; 5) qualifying plugs that must be capable of charging at 50 kW or more; and, 6) higher incentives for plugs rated at 75 kW or greater.

Further, the Consensus Parties state that each IOU would file an annual report with the Commission 60 days following the end of each calendar year providing the annual number of DCFC stations installed and the amount of incentive paid. The IOUs would also collectively develop a website, to be updated monthly, showing the remaining incentives available. Finally, the Consensus Proposal contains many IOU-specific program details, which are described below.

Central Hudson

Central Hudson proposes to provide an incentive for a maximum of 100 plugs, limited to 34 plugs in the first year, 68 plugs in year two, and 100 plugs in the following years. Central Hudson would conduct a study to determine the magnitude of any necessary system upgrades after an application is received. Customers would have 60 days to remit payment of their Contribution in Aid of Construction (CIAC), if required. Systems would be required to become energized within one year of a customer remitting a CIAC payment, or if no CIAC payment is required, within one year of such notification by the utility. Additionally, to limit and/or avoid infrastructure constraints and/or system reliability impacts, Central Hudson proposes that the siting of DCFC stations be subject to its approval.

The starting incentive proposed would be \$11,000 per plug for plugs rated at 75 kW or greater, regardless of the year of participation, and would decline ratably over a maximum payment period of five years. The incentive for plugs rated between 50 kW and 75 kW would be 60 percent of what is paid to

plugs rated at 75 kW and above. Incentive payments will be made 30 days following each successive twelve months of operation. If fully subscribed, Central Hudson states that the total cost of its proposal over the seven-year program period would be \$3.3 million.

The utility proposes to recover program costs from ratepayers through its Revenue Decoupling Mechanism (RDM), although it proposes to initially defer a portion of the costs and reverse the deferral in later years of the program. Central Hudson notes that its proposal would require that customers participating in the program be excluded from its RDM targets in future rate proceedings until the program concludes.

Con Edison

Con Edison proposes to offer per plug and load factor incentives, designed to operate in conjunction with the current EV Quick Charging Station Program delivery rate reduction offered under its BIR. A customer would be required to meet the eligibility criteria of the EV Quick Charging Station Program component of the BIR to participate in the per plug incentive program.⁷ NYPA or its customers seeking to participate in the BIR would be required to establish a Con Edison account in order to be eligible for the BIR EV direct current fast charging station program.

Con Edison proposes that customers be eligible to enroll in the per plug incentive program until 400 plugs are subscribed, or through December 31, 2025, whichever is earlier. Similarly, customers can enroll in the EV Quick Charging Station

⁷ Con Edison proposes substantive changes to the Electric Vehicle Quick Charging Station Program component of BIR, including: 1) elimination of the government incentive requirement; 2) permitting government participation; and, 3) extending, to December 31, 2025, the date for delivery rate reductions from the current date of April 30, 2025.

Program component of the BIR until December 31, 2025, or until a 30 MW cap on participation is reached. If cap limits are met for one program, customers may participate in the other program, if not fully subscribed and if the customer meets the eligibility criteria. In addition, customers would be allocated space in the program for a period of one year from the later of the date that the customer provides proof of a building permit or, if applicable, payment of an excess distribution facilities charge.

The Con Edison incentive is proposed to start at \$4,000 per plug for plugs with simultaneous charging capability rated at 75 kW or greater, regardless of year of participation, and declines ratably, over a maximum payment period of seven years.⁸ The incentive for plugs rated between 50 kW and 75 kW is proposed to be 60 percent of that paid to plugs rated at 75 kW and above. Additionally, the Con Edison program includes bonus incentives of \$500 and \$1,500 per site for achieving a load factor of 5 percent and 10 percent, respectively.

Con Edison proposes that per-plug and load factor incentive payments would be made 60 days following each successive twelve-month period of operation. If fully subscribed, Con Edison states that the estimated maximum annual program costs of the per-plug incentive over the seven-year program period would be \$6.4 million. This estimate does not include the load factor incentive. Con Edison proposes that program costs be deferred for future recovery.

⁸ Con Edison notes that the per plug incentives are designed to provide a combined benefit in conjunction with the delivery rate reductions offered under the BIR. If the BIR delivery rate reductions change during the program, Con Edison proposes that the per plug incentive be re-determined to maintain the combined value of the programs.

NYSEG

NYSEG proposes to provide an incentive for a maximum of 160 plugs for up to seven years, depending on the year a customer qualifies for an incentive. Per its proposal, NYSEG will conduct a study to determine the magnitude of any necessary system upgrades after an application is received. Customers would have 60 days to remit payment of their CIAC payment, if required. Systems would be required to become energized within one year of a customer remitting a CIAC payment, or if no CIAC payment is required, within one year of such notification by the utility.

The proposed incentive for 2019 is \$8,000 per plug for plugs rated at 75 kW or greater, and declines ratably over the seven-year program term, or by \$2,286 per year. The year in which a customer qualifies for an incentive through a completed application would determine the program year incentive level for which that customer is eligible. The incentive for plugs rated between 50 kW and 75 kW is proposed to be 60 percent of that paid to plugs rated at 75 kW and above. If fully subscribed, NYSEG states that the total maximum cost of its proposal over the seven-year program period would be \$5.12 million. The utility proposes to recover program costs through a class-specific non-by-passable charge (NBC).

Per the utility's proposal, participants would be paid up to the maximum annual per plug incentive. However, such payments will not exceed the total delivery costs for the twelve-month billing period in which the incentive is calculated. The difference between the maximum allowable incentive and the actual incentive payment would be added to the maximum allowable incentive for the following year, through 2022. However, from 2021 to 2022, the roll over will be limited to \$6,000. No roll over would be allowed after 2022. Finally,

NYSEG proposes to require that the DCFC stations be separately metered and that ancillary station load shall not exceed 10 kW.
National Grid

National Grid proposes to provide an incentive for a maximum of 300 plugs, with yearly limitations in the first three years of the program of 100 plugs in 2019, 200 plugs in 2020, and 300 plugs in years three through seven. National Grid, per its proposal, would conduct a study to determine the magnitude of any necessary system upgrades after an application is received and customers would have 60 days to remit CIAC payment, if required. Systems would be required to become energized within one year of a customer remitting a CIAC payment, and thereafter they could be removed from the program, subject to National Grid's discretion.

The 2019 incentive proposed is \$7,500 per plug for plugs with simultaneous charging capability rated at 75 kW or greater, and declines ratably each year by \$2,143, notwithstanding the year in which a customer begins to receive an incentive. The incentive for plugs with simultaneous charging capability rated between 50 kW and 75 kW is proposed to be 60 percent of that paid to plugs rated at 75 kW and above. If fully subscribed, National Grid states that the total maximum cost of its proposal over the seven-year program period would be approximately \$6.9 million. National Grid proposes to issue the annual incentive to eligible plugs in the first quarter of the subsequent calendar year.

In addition, National Grid proposes to recover program costs through a combination of its RDM and a deferral. National Grid would adjust the delivery revenues in its RDM reconciliation by subtracting the total incentives paid during the annual period of the RDM reconciliation, up to the total delivery charges incurred by participating customers' charging

stations during the same year. National Grid notes that this provision would require a revision to its tariff. Any incentive payments above this amount would be deferred for future recovery from all customers. Additionally, National Grid proposes to defer the costs associated with any full-time employees or contractor added to administer the program; such deferred costs would be recovered in the future from all customers.

O&R

O&R's proposal is substantially similar to Con Edison's. O&R proposes to offer per plug and load factor incentives designed to operate in conjunction with a delivery rate reduction that would be offered to EV Quick Charging Stations under a newly-proposed component of its Economic Development Rider (EDR).

As part of the Consensus Proposal, O&R proposes to modify its EDR by creating an EV Quick Charging Station Program component to allow demand-billed participants that construct and own a publicly accessible charging station, with a minimum 65 kW of aggregate charging capacity, to receive a 20 percent delivery rate discount. O&R would allow up to 3 MW of aggregate electric vehicle charging load under the EV Quick Charging Station Program. The delivery rate discount would be available through December 31, 2025. Under the program, electric loads not associated with quick charging infrastructure would be limited to 10 kW per account. O&R proposes that, to be eligible for participation in the per plug incentive program, a customer must meet the eligibility criteria of the EV Quick Charging Station Program component of its EDR.

As proposed, customers would be eligible to enroll in the per plug incentive program through December 31, 2025, or until 40 plugs are subscribed, whichever is earlier. Similarly, customers could enroll in the EV Quick Charging Station Program

component of the EDR until December 31, 2025, or until the 3 MW cap on participation is reached. If cap limits are met for one program, customers could participate in the other program, if not fully subscribed. Per O&R's proposal, customers would be allocated space in the program for a period that is the later of one year from the date that the customer provides proof of a building permit or, if applicable, one year from the date of payment of an excess distribution facilities charge.

The starting incentive proposed is \$8,000 per plug for plugs with simultaneous charging capability rated at 75 kW or greater, regardless of year of participation, and declines ratably, over a maximum payment period of seven years.⁹ The incentive for plugs with simultaneous charging capability rated between 50 kW and 75 kW is proposed to be 60 percent of that paid to plugs rated at 75 kW and above. Additionally, bonus incentives of \$500 and \$1,500 are proposed per site for achieving a load factor of 5 percent and 10 percent, respectively.

O&R proposes that the per-plug and load factor incentive payments be made 60 days following each successive twelve months of operation. If fully subscribed, O&R states that the maximum cost of the per-plug incentive over the seven-year program period would be \$1.28 million, excluding the load factor incentive. The utility proposes that program costs be recovered volumetrically, across all service classifications, through its Energy Charge Adjustment surcharge.

⁹ O&R notes that the per plug incentives are designed to provide a combined benefit in conjunction with the delivery rate reductions offered under the EDR. If the EDR delivery rate reductions change during the program, O&R proposes that the per plug incentive be re-determined to maintain the combined value of the programs.

RG&E

RG&E's proposal is substantially similar to NYSEG's. RG&E proposes to provide an incentive for a maximum of 74 plugs and for up to seven years, depending on the year a customer qualifies for an incentive. Per its proposal, RG&E would conduct a study to determine the magnitude of any necessary system upgrades after an application is received, and customers would have 60 days to remit payment of their CIAC payment, if required. Systems would be required to be energized within one year of a customer remitting a CIAC payment, and thereafter could be removed from the program, subject to the discretion of RG&E.

The 2019 incentive proposed is \$17,000 per plug for plugs with simultaneous charging capability rated at 75 kW or greater and declines ratably each year, or by \$4,857, notwithstanding the year in which a customer begins to receive an incentive. The incentive for plugs with simultaneous charging capability rated between 50 kW and 75 kW is proposed to be 60 percent of that paid to plugs rated at 75 kW and above. If fully subscribed, RG&E states that the total maximum cost of its proposal over the seven-year program period is \$5.032 million. The utility proposes to recover program costs through a class-specific NBC.

Per the utility's proposal, it would pay up to the maximum annual per plug incentive. However, such payments would not exceed the total delivery costs for the twelve-month billing period in which the incentive is calculated. The difference between the maximum allowable incentive and the actual incentive payment would be added to the maximum allowable incentive for the following year, through 2022. From 2021 to 2022, however, the roll-over would be limited to \$12,750. No roll over would be allowed after 2022. Lastly, RG&E proposes that DCFC stations

would be required to be separately metered and that ancillary load could not exceed 10 kW.

PUBLIC NOTICE

Pursuant to the State Administrative Procedure Act (SAPA) §202(1), a Notice of Proposed Rulemaking (Notice) regarding the Joint Petition was published in the State Register on May 23, 2018 [SAPA No. 18-E-0138SP1]. The time for submission of comments pursuant to the Notice expired on July 23, 2018. Comments regarding the Joint Petition were received from nineteen parties. A Secretary's Notice Soliciting Comments regarding the Consensus Proposal was issued on November 23, 2018, requesting public comment by December 14, 2018. Comments regarding the Consensus Proposal were received from nineteen different parties.

LEGAL AUTHORITY

Pursuant to Public Service Law (PSL) §§5, 65, and 66, the Commission has the legal authority to take the actions prescribed in this order. The Commission has authority to direct utilities to formulate and carry out long-range programs, individually or cooperatively, with economy, efficiency, and care for the public safety, the preservation of environmental values and the conservation of natural resources. Furthermore, the Commission has broad discretion and judgment in choosing the means of achieving statutory mandates, and has the authority to adopt different methodologies or combinations of methodologies in balancing ratepayer and investor interests.¹⁰

Pursuant to PSL §65, the Commission has authority to ensure that "every electric corporation and every municipality

¹⁰ Multiple Intervenors v. Public Service Commission of the State of New York, 154 A.D.2d 76 (3d Dept. 1991).

shall furnish and provide such service, instrumentalities and facilities as shall be safe and adequate and in all respects just and reasonable." The Commission also has authority to prescribe the "safe, efficient and adequate property, equipment and appliances thereafter to be used, maintained and operated for the security and accommodation of the public" whenever the Commission determines that the utility's existing equipment is "unsafe, inefficient or inadequate."¹¹

SUMMARY OF COMMENTS

Joint Petition

Comments regarding the Joint Petition were received from National Fuel Distribution Corporation (NFG); Advanced Energy Economy Institute (AEE Institute); EVgo; Tesla, Inc. (Tesla); the City of New York (the City); jointly by the Sierra Club and the Natural Resources Defense Council (NRDC); NYPA; PSEG Long Island; the Acadia Center (Acadia Center); Greenlots; ChargePoint, Inc. (ChargePoint); jointly by Central Hudson, Con Edison, NYSEG, National Grid, O&R and RG&E (collectively, the Joint Utilities); Electric Vehicle Charging Association (EVCA); General Motors (GM); EV Box North America Inc. (EVBox); Plug In America; Ford Motor Company (Ford); Lovely A. Warren, Mayor of the City of Rochester (the City of Rochester); Kevin J. Helfer, Parking Commissioner of the City of Buffalo (the City of Buffalo); and several individuals.

NFG filed a letter on April 18, 2018 and additional comments on July 20, 2018. According to NFG, the scope of this proceeding is inconsistent with fuel and resource diversity and should consider the environmental benefits of the enhanced use of natural gas vehicles (NGVs). Alternatively, NFG suggests

¹¹ PSL §66(5).

that the Commission institute a proceeding that addresses all aspects of the transportation sector. Furthermore, NFG recommends using on-site natural-gas fired combined heat and power (CHP) to generate electricity at charging stations to alleviate rate, reliability, and infrastructure upgrade concerns.

AEE Institute almost fully supports the Joint Petition, with the additional recommendation that the Commission distinguish between DCFC-dedicated retail accounts and those DCFC accounts where the charging station's demand is coupled with the premises' overall demand (behind-the-meter applications).

EVgo supports the Joint Petition, stating that fast charging is key to widespread EV adoption and existing rate structures are the largest cost barrier to EV infrastructure deployment. Additionally, EVgo requests that the Commission consider the Joint Petition on a faster track than the generic proceeding.

Tesla identifies demand charges as a significant barrier to DCFC deployment and supports the Joint Petition. Tesla recommends the demand charge holiday model approved for Southern California Edison as the optimal path forward. Furthermore, Tesla asserts that increased EV adoption will lead to higher system utilization during off-peak hours, thereby increasing revenue to the utility and benefitting all ratepayers. Finally, Tesla recommends that the DCFC rate should be technology agnostic, available to new and existing stations, include manageable eligibility requirements, and be available to fleet and heavy-duty charging.

The City recognizes that as EV adoption increases and DCFC station utilization increases, non-demand-metered rates may no longer be appropriate. Nonetheless, the City recommends that

the Commission adopt the Joint Petition and direct Con Edison to 1) modify its non-demand-metered rates to accommodate DCFC stations, and 2) expand Con Edison's BIR discount program to include DCFC facilities.

The Sierra Club and NRDC support the Joint Petition's near-term strategy to mitigate the impact of demand charges and the request for a generic proceeding to consider long-term principles. The Sierra Club and NRDC argue that existing demand charges fail to send a relevant price signal to encourage off-peak charging and do little to mitigate the impacts of peak load.

NYPA offers additional support for the Joint Petition and suggests that the Commission take a holistic view of the contributions EV drivers provide to the system costs when considering the requested change. Stating that the Commission should adopt its proposal, NYPA reiterates the merits of the near-term rate solution for DCFC facilities and suggests that the Commission study the load from existing stations in New York with any other public DCFC facility data to develop a long-term rate that reflects the impact DCFC stations have to the electric system.

PSEG Long Island supports the goal of adopting efficient rate designs and IOU programs to encourage EV adoption, and the Joint Petitioners' request for a generic proceeding. PSEG Long Island explains the set point incentive it developed to provide a monthly off-tariff rebate to the DCFC customers that effectively caps the delivery and power supply portions of the electric bill at a predetermined dollar per kilowatt hour set point, while keeping the DCFC customers on a standard commercial rate that includes demand charges. PSEG Long Island advises that transitioning all DCFC stations to SC-2 rates may set an unreasonable market expectation that energy-

only rates are appropriate permanently, and make it difficult for the utilities to return DCFC customers to demand-based rates when incentives are no longer justified.

The Joint Utilities support addressing DCFC station deployment challenges, and state that a broader policy discussion is needed so that key considerations are not missed. The Joint Utilities recognize that the cost of electricity service is a significant component of the overall economics of a DCFC facility, and that action is needed to incentivize this infrastructure development.

The Joint Utilities suggest that a NYSERDA incentive may be appropriate to subsidize up-front costs, and that up-front interconnection costs may be reduced through utility make-ready programs. Eliminating demand charges entirely will remove the price signals needed to encourage DCFC owners to manage their impact on the electricity system, according to the Joint Utilities. Contrary to the Joint Petition's arguments, the Joint Utilities maintain that DCFC facilities will likely impact coincident and non-coincident demands in ways that will be additive at upstream facilities and impact system peaks. The Joint Utilities reiterate that any solution should preserve demand charges, as they are the mechanism to influence behavior in a way that reduces system impacts, and eliminating them may create a situation akin to net energy metering.

Additionally, the Joint Utilities suggest that DCFC issues may be addressed without conflicting with established rate design principles and in a complementary manner with ongoing initiatives, such as using a battery-based energy storage resource to manage demand charges. The Joint Utilities point out that a variety of funding sources are available to address the economics of DCFC stations, and in particular recommend that NYSERDA funds already collected on utility

customer bills through surcharges could be used to provide transparent levels of support needed to satisfy DCFC station requirements.

The Acadia Center supports the Joint Petition's request to allow customers deploying DCFC stations to receive service on non-demand-metered tariffs in the short term, and recommends that the Commission examine an appropriate cost-based DCFC rate design in the long-term. Furthermore, the Acadia Center indicates that state regulations must be reformed to integrate new electric end use technologies as a resource capable of optimizing the electric system, and revenue mechanisms must be identified to fund appropriate infrastructure. Demand charges are a major impediment to DCFC deployment, according to the Acadia Center, and DCFC station visibility and availability are crucial to long-distance travel.

Greenlots encourages the Commission to explore potential near-term options for mitigating current costs associated with low utilization demand charges for successful ownership and management of DCFC infrastructure. Greenlots argues that the discussion has largely failed to adequately acknowledge available technology options to minimize or mitigate costs associated with demand charges. Greenlots points out that demand rates are also more attractive to DCFC infrastructure owners than volumetric rates at a certain level of utilization.

ChargePoint supports the Joint Petition's recommended near-term relief to DCFC site hosts and suggests that the Commission continue to address long-term issues. As an alternative to the demand charge relief, ChargePoint recommends that the Commission consider a variety of alternative rate design options. ChargePoint points out that the next generation of fast chargers, such as ChargePoint's Express Plus product line capable of charging vehicles up to 500 kW, will exacerbate

DCFC issues, but are necessary to meet the needs of an evolving market.

EVCA encourages swift Commission action in support of the Joint Petition. According to EVCA, current utility tariffs are not designed with DCFC in mind and present significant barriers to investment.

GM explains that a network of DCFC stations is critical to growing the EV market and meeting state policy goals. Furthermore, GM states that this network is the key to attracting investment in increasingly advanced mobility services that will be built on EV technology, such as autonomous vehicle applications. GM supports the Joint Petition.

EVBox supports the Joint Petition but argues that a future proceeding should include all commercial and residential rates for EV users and not just be confined to DCFC facilities. EVBox suggests that the Commission immediately grant the Joint Petition's requests for relief, and explore alternative rate structures consistent with the modern principles of rate design.

Plug In America supports the Joint Petition, and suggests that demand charges may not be appropriate even when utilization increases. According to Plug In America, time-varying rates will be a better means of addressing system impacts than kW-based demand charges because the DCFC station peak demand may not align with the system peak and non-coincident peak demand does not impose as many costs on the grid.

The City of Buffalo strongly supports tariff revisions to reduce or eliminate the demand charges and encourages development of a broad statewide program to deploy this critical element of infrastructure needed. The City of Buffalo notes that it currently lacks any Level 3 charging options, but would like to continue the momentum gained from leveraging funds from

Governor Cuomo and the DEC's ZEV Infrastructure Rebate program to build 16 charging stations with 32 ports in its downtown area.

The City of Rochester is actively engaged in promoting EVs and EV charging infrastructure, and strongly supports tariff revisions to reduce or eliminate DCFC station demand charges and encourages development of a broad statewide program. According to the City of Rochester, even with programs providing assistance with equipment and installation costs, demand charges far exceed the potential revenue stream from DCFC station utilization.

Ford fully supports the Joint Petition to provide immediate rate relief and future rate structure design guidelines for DCFC networks. Ford explains that in order to achieve mass EV adoption, substantial charging infrastructure challenges must be overcome. Among these challenges, Ford says, a highly visible public DCFC network is a necessary enabler for customers to overcome range anxiety and for long-distance travel.

Consensus Proposal

Comments regarding the Consensus Proposal were received from the Alliance for Transportation Electrification (ATE); Multiple Intervenors (MI); Natural Gas Vehicles for America (NGV America); jointly by the Utilities Workers Union of America, Local 1-2, and International Brotherhood of Electrical Workers, Local Unions 10 & 97 (collectively, the Local Unions); NYPA; Joint Utilities; the City; NFG; CALSTART; jointly by NRDC, Sierra Club and Acadia Center (collectively, the Clean Energy Parties); jointly by the Alliance of Automobile Manufacturers, the Association of Global Automakers, America Honda Motor Company, Audi of America, Ford Motor Company, General Motors, Hyundai Motor Company, Kia Motor Corporation, Mitsubishi Motor

R&D of America, and Nissan North America (collectively, the Joint Automakers); AEE Institute; Tesla; Greenlots; jointly by EVgo, ChargePoint, and CALSTART (collectively, the Joint Commenters); Electrify America; the Capital District Transportation Committee (CDTC); the Clean Communities of Central New York (CCCNY); and EV Connect.

In addition to the Consensus Parties, the Consensus Proposal is supported by ATE, the City, CALSTART, Clean Energy Parties, Joint Automakers, Tesla, Greenlots, Joint Commenters, and Electrify America, although most supporters view it as a first or interim step and urge that the dialogue continue. MI notes that it is not opposed to the proposal.

ATE states that the Consensus Proposal is a creative means to assist in this early market development process without impinging on the Commission's consistent regulatory principles. That is, it addresses the widely recognized challenge presented by demand charges but without carving out one sector with a special and open-ended tariff. ATE states that the per plug incentive levels are appropriate because, while they are meaningful, they are not so large as to support installations that will be commercially non-viable in the long term.

MI supports the Consensus Proposal's reliance on a demand-based rate design and cost-based rates. MI states that demand charges: 1) help ensure that the rate design applied to DCFC stations is compensatory; 2) are consistent with cost causation principles; 3) are consistent with how similarly-situated customers are billed; 4) sends appropriate price signals that would maximize efficient utilization; and, 5) avoid awkward and/or controversial transitions from non-cost-based rate designs. MI comments that it does not challenge the projected cost of the Consensus Proposal and urges the Commission to consider an alternative funding source such as

collected but uncommitted Clean Energy Fund dollars. MI cites over two dozen policy-oriented initiatives currently funded by customers and states that the Commission should strive to avoid or minimize the imposition of further, incremental obligations. MI states that, per NYSERDA's most recent quarterly report, it appears that there are currently more than \$1 billion in unallocated 'Market Development' funds and approximately \$285 million in unallocated 'Innovation & Research' funds. Thus, with a projected cost, at maximum participation, of approximately \$30 million, the Consensus Proposal could easily be funded out of uncommitted Clean Energy Fund (CEF) dollars. MI explains that funding through the CEF would be appropriate, as one of the stated purposes of the CEF is to address areas where the private sector is unlikely or unable to develop energy-related environmental solutions, including transportation.

MI continues that if its proposal to fund the costs associated with the Consensus Proposal from uncommitted CEF funds is not adopted, the costs should be allocated and recovered from customers based on cost causation principles. MI claims that, based on such principles, all or most of the costs are appropriately allocated to mass market customers. MI rationalizes that the Consensus Proposal is intended to facilitate the growth of EVs which will be purchased and utilized mostly by mass market customers, that the perceived need to increase DCFC stations is in response to mass market customer range anxiety and that the proposed financial incentives are being offered to spur the development of additional stations for their benefit.

The Joint Utilities state that the design of the Consensus Proposal supports certain rate design and other principles adopted in the Commission's Reforming the Energy

Vision (REV) Track Two Order including cost causation, fair value, economic sustainability, and policy transparency.

Greenlots states that the Consensus Proposal avoids changes to the underlying rate structure, including demand charges, which send important price signals. It also notes that, with higher utilization, normal rate structures that include demand charges will likely become preferable to DCFC operators.

The Joint Commenters state that while the Consensus Proposal is an important interim step in addressing operational cost barriers, it urges the Commission against viewing it as a substitute for comprehensive rate reform. They recognize that the Commission may be concerned with providing a new technology with a distinct rate design but state that so long as EV charging rates are set above marginal costs, these new loads will benefit all ratepayers. The Joint Commenters state that the incentive levels should be reexamined to ensure that they are sufficient.

Similarly, Electrify America states its belief that the Consensus Proposal is a step in the right direction but also believes that demand and service fees should be kept to a minimum and only reflect the true aggregated incremental impact on system peak and grid infrastructure.

CDTC, CCCNY and EV Connect, while not specifically addressing the Consensus Proposal, state their support for the elimination of demand charges, and recommend treating DCFC stations as small commercial accounts subject to kWh charges.

AEE Institute is not supportive of the Consensus Proposal stating that it is crafted as an insufficient short-term subsidy, whereas it believes making accommodations using existing non-demand metered rates for stand-alone EV charging stations would provide a more sustainable near-term option while

the Commission develops a longer-term solution. It also notes that, except for Con Edison's adder for higher utilization rates, the incentive level is not tied to performance, which could lead to inefficient allocation of program funds and may result in DCFC stations sitting idle or nearly idle, but still receiving utility payments. AEE Institute states that due to the relatively small size of the proposed program, funding may run out relatively quickly requiring the Commission to either authorize additional funding for the program or develop an alternative. It is concerned that the small size could create a rush to secure positions in the application queue or an attempt to fill the queue with many projects in hopes of securing some of them. It states that the situation may result in unnecessary delays in project implementation and lead to installations in poorly selected sites. AEE Institute also notes that, at the end of the incentive payment period, some DCFC station locations may become financially unviable.

AEE Institute, Tesla, and Electrify America raise concerns that only new DCFC chargers would be eligible for an incentive under the Consensus Proposal. They note that this limitation may put existing chargers at a competitive disadvantage compared to new chargers that receive an incentive. They state that mechanisms or rate designs covering all DCFC chargers, regardless of in-service date, are necessary and more equitable.

The comments of ATE, the Clean Energy Parties, AEE Institute, Tesla and Greenlots address the number of plugs eligible for the incentive under the Consensus Proposal. ATE states that many more DCFC plugs will be required over time though they will most likely not need incentives as utilization increases.

The Clean Energy Parties strongly recommend that the program size be expanded upward from 1,074 plugs, and modifying the incentive amounts accordingly, noting that if the program was scaled up commensurately to achieve the Joint Utilities' portion of the 4,717 plugs from the Electric Infrastructure Projection Tool (EVI-Pro) Lite¹² model assuming 75 percent home charging capability, it would increase to about 3,377 plugs. The Clean Energy Parties further state that vehicle fueling, and operational costs are pivotal in fleet operators' decisions to purchase EVs, and ensuring that medium- and heavy-duty vehicles have comparable market transformation opportunities as light-duty vehicles should be a core focus of this proceeding.

Greenlots states that the incentive payments to DCFC station operators are straight forward and relatively easy to understand, but that even if the proposed program is fully subscribed it represents only a small fraction of the DCFC infrastructure that will be needed. It emphasizes that New York must make sure not to lose momentum in seeking other activities, policies and programs with the capability of being much more impactful in accelerating the transition to transportation electrification.

In its comments, NYPA explains that the Electric Power Research Institute forecasts that starting in approximately 2019 there will be a much greater variety of EV models due to falling cost of batteries, and that most will have higher charging capacity than the current market. NYPA explains that growth in the Sport Utility Vehicle/Crossover vehicle type is forecasted to increase electric demand indicating that the Audi e-Tron is capable of charging at 150kW. NYPA concludes that "50kW and

¹² The EVI-Pro Lite tool is accessible on the U.S. Department of Energy's Alternate Fuel Data Center website at: <https://afdc.energy.gov/evi-pro-lite>.

75kW and above are appropriate tiers for the immediate and temporary relief proposed in the consensus proposal.” In its comments, Electrify America states that it is creating future-ready stations to charge the next generation of higher charging power EVs through state-of-the-art 350kW-capable dispensers. Electrify America states that the Consensus Proposal creates a disincentive for investments in customer-friendly higher-powered charging above the 75kW threshold but encourages the Commission to approve the Consensus Proposal as a first step.

The Consensus Parties, using EVI-Pro Lite, calculate that more than 1,500 DCFC plugs are likely needed to support the charging needs of the State’s target of 800,000 ZEVs by 2025.¹³ The Clean Energy Parties comment that it is likely that the Consensus Parties kept EVI-Pro Lite’s default assumption that 100 percent of EV drivers have access to home charging, which overstates the percentage of drivers that have access to EV home charging in a mature New York EV market and therefore significantly understates the amount of DCFC plugs needed to support 800,000 ZEVs. The Clean Energy Parties claim that assuming 75 percent of EV drivers have home chargers, the model finds that 4,717 DCFC plugs are needed to support 800,000 EVs in New York.

ATE, the Local Unions, the Joint Utilities, the Joint Automakers and Tesla address the Consensus Proposal’s requirement that DCFC stations be available to the public. ATE states that DCFC that is easily accessible to the public is an essential prerequisite for widespread transportation electrification. The Local Unions state that the Consensus Proposal’s rules, including the requirement that chargers are publicly available, appear to be reasonable and appropriate. The

¹³ See http://www.dec.ny.gov/docs/air_pdf/zevmou.pdf.

Joint Utilities state that having more DCFC stations available in publicly accessible areas may help to encourage customers to purchase EVs. The Joint Automakers state that a network of DC fast charging stations, which is highly visible to consumers and convinces them that EV charging infrastructure is everywhere consumers want to go, is critical to the successful growth of the plug-in EV market. The Joint Automakers further state that DCFC can be a critical enabler of transitioning commercial and Transportation Network Companies (TNCs) fleets to electrification.

The comments of ATE, CALSTART, the Clean Energy Parties, the Joint Automakers, Greenlots and the Joint Commenters encourage the Commission to consider the needs of fleet vehicles and TNCs as part of this proceeding. CALSTART states that because of the disproportionate impact of truck and bus traffic on public health, the electrification of these fleets is of critical importance for all ratepayers from public health and environmental justice perspectives. It continues that heavier vehicles have greater power and energy demands and are frequently charged in depot-style configurations. CALSTART maintains that commercial EV technologies are available now and currently in demand in New York, and states that the considerations for bringing commercial EV operations to cost parity with petroleum are distinct from those of light-duty passenger cars. It avers that a solution that works for the public DCFC use case is not necessarily conducive to commercial fleet electrification, maintaining that these customers likely require greater adjustments to non-demand charge portions of the utility bill, which along with demand charges constitute the fueling cost for an electric fleet. According to CALSTART, its experience in California suggests that a menu of rate options, including several time-of-use (TOU) options, will best support

fleet electrification while also encouraging fleets to charge during lower-cost hours.

The Joint Commenters urge the Commission to utilize this opportunity to enable critically important use-cases for EV charging that are not always available to the public, such as state and local government fleets. The Joint Commenters state that shared-use mobility platforms including carshare and TNCs exist on the premise that shared vehicles are utilized much more robustly than personal vehicles and therefore can better overcome significant fixed costs associated with personal mobility.

Tesla states that the fixed per plug incentive sends companies a signal to construct stations, but does not encourage high utilization of stations, except for Con Edison's and O&R's proposals. Tesla recommends replicating the design of Con Edison's and O&R's incentives, explaining that applying similar mechanisms statewide can strike a balance between fixed and variable cost considerations for operators, as well as the overall costs for the Consensus Proposal. Tesla notes that access to convenient public charging is an important factor for many drivers considering the purchase of an EV, and questions whether the number of plugs to be incentivized is sufficient. It states that charging stations are increasingly being built with more plugs which could effectively make the proposed program very short term despite nominally running through 2025.

NGV America comments that to assure fair competition, delivery rates for electric compressors in operation at natural gas fueling stations should be similarly discounted and qualify for the business incentive rates offered by utilities. It states that policies that favor only EVs could distort markets in New York and unfairly discourage the use of natural gas and other low-carbon solutions. If no incentives are provided to

natural gas fueling stations, NGA America recommends that the Commission take steps to provide discounted rates or otherwise ensure natural gas fueling stations are not subsidizing EV infrastructure through the rates they are charged. NFG similarly states that the Commission should encourage the continued adoption of NGVs and support the development and submission of incentive and/or rate proposals for future Commission consideration.

On December 24, 2018 EVgo filed an out-of-time letter, focusing on the State's immediate investment approach for leveraging public funding to catalyze private sector investment. EVgo argues that NYPA's overwhelming focus on direct ownership and network development of DCFC infrastructure risks undercutting private market participants, potentially distorting consumer-facing pricing, and limiting the ability of public funding to maximize EV charging access. EVgo specifically cites these concerns as the reason why they did not submit a proposal for the John F. Kennedy Airport charging hub. They go on to suggest that a model such as that being used in the Commonwealth of Virginia to deploy Volkswagen Diesel Settlement "Appendix D" funds, where those funds were leveraged with a competitive procurement to build a statewide charging network.¹⁴

In response to EVgo, NYPA summarizes the Evolve NY program's portfolio approach and suggests that EVgo's letter is inappropriately filed in this docket. NYPA concludes its rebuttal by reiterating the fundamental issue that their efforts seek to address is that operating cost or demand charge relief

¹⁴ NYPA filed responsive comments on December 27, 2018, specifically responding to EVgo's critical letter. As this reply letter, and the January 16, 2019 response of EVgo, discuss issues beyond the scope of the Joint Petition and the Consensus Proposal recommendations, the Commission declines to summarize those issues that are not relevant.

is necessary to support the infrastructure needed to assist in electrifying the transportation sector and achieve New York's GHG emission goals.

DISCUSSION

Joint Petition

The Commission finds that placing DCFC stations on SC-2 or Small General non-demand-billed tariffs is unnecessary at this time. The Commission is not persuaded by the Joint Petitioners' claim that DCFC stations impose limited costs on the electric system. As State agencies work towards achieving New York's ZEV goals, utilization factors will increase and load profiles must develop in a way that is beneficial to the electric system. Allowing DCFC facilities to take service on non-demand-billed tariffs would shift costs and send the wrong price signals to DCFC station owners. Demand charges send the appropriate price signals to customers to influence behavior and operate in a manner that benefits the distribution grid.

Demand charge holidays in other jurisdictions have been temporary, and demand charges phased-in at the holiday's expiration. The Commission recognizes the economic challenges DCFC station developers currently face but declines to move away from cost-based rates by granting the Joint Petitioners' request to allow DCFC station customers to qualify for a service classification without a demand charge. Given that the Consensus Proposal is expected to provide similar relief, while maintaining a rate that reflects cost-causation, a demand charge holiday in New York is unnecessary.

The Commission is similarly not persuaded by the Joint Petitioners' argument that precedent supports demand charge discounts in support of beneficial technology, evidenced by standby rate exemptions and flexible rate service contracts.

Standby rate exemptions are applicable to customers with designated technologies including: fuel cells, wind, solar thermal, photovoltaics, sustainably-managed biomass, tidal, geothermal, and/or methane waste, and to customers with efficient Combined Heat and Power (CHP) generation assets.¹⁵

While the Commission agrees that standby service rates for customers with on-site generation are designed to accommodate and promote distributed generation, standby service rates established at each utility are designed to recover costs more accurately and granularly. Standby rates seek to align individual customers' contributions to system costs with the rates such customers pay, thereby sending accurate price signals to those customers.¹⁶ This is accomplished through contract demand charges and as-used demand charges.¹⁷ Customers that qualify for a standby rate exemption are billed under standard rates, which also include demand charges.

Regarding the Joint Petitioners' second request for relief, the Commission instituted this proceeding to remove inappropriate obstacles to EV adoption and ensure critical EV supply equipment and infrastructure (EVSE&I) is in place to support the State's ZEV targets.¹⁸ Staff has been tasked with

¹⁵ Case 14-E-0488, In the Matter of the Continuation of Standby Rate Exemptions, Order Continuing and Expanding the Standby Rate Exemption (issued April 20, 2015).

¹⁶ See, Case 15-E-0751, In the Matter of the Value of Distributed Energy Resources, Whitepaper on Standby and Buyback Service Rate Design and Residential Voluntary Demand Rates (filed December 12, 2018) (Staff Standby and Buyback Whitepaper).

¹⁷ Standby rates are comprised of customer charges (which are designed to recover customer specific costs like services and meters), contract demand charges (which are designed to recover the costs that are local to a customer), and as-used demand charges (which are designed to recover upstream costs).

¹⁸ Case 18-E-0138, Order Instituting Proceeding, p. 3.

developing a whitepaper that addresses a range of EV topics including utility roles, and potential ownership models, supporting EVSE&I. The Commission expects Staff to continue to engage with stakeholders and issue a whitepaper for public notice and comment. The Joint Petitioners' requests are being addressed, and the Commission invites all parties to continue to engage in this effort.

The Commission is not addressing NFG's request to institute a proceeding that addresses all aspects of the transportation sector in this order; but, is adopting an incentive program specific to electric vehicles to support the State's ZEV deployment goals in a way that benefits and protects New York's ratepayers and our distribution grid.

Consensus Proposal

A. Ratemaking Principles

Delivery costs are a function of the resources needed to supply power to customers during the system peak and the individual customer's peak usage. The customer's proportion of these peaks are measured in the coincident and non-coincident demands customers register on the utilities' systems. The Consensus Proposal provides the needed support for DCFC stations during the early stages of EV adoption without disturbing the utilities' underlying cost-based rate structures. Placing DCFC stations on existing non-demand metered rates, as proposed by many commenters, would potentially result in charging such customers rates that are below cost in a non-transparent, not readily quantifiable manner. More problematic, other customers in the same non-demand metered service classifications would be negatively affected because embedded cost of service studies would assign such classes increased demand-related costs with insufficient additional revenues to recover such costs, thereby

reducing the non-demand metered classes' rates of return which can lead to above average rate increases in future rate plans.

By incentivizing DCFC stations through a transparent annual incentive instead of through a demand charge exemption as proposed by some commenters, the Commission is being consistent with past approaches to rate design.¹⁹ Therefore, a per station delivery cost cap, as proposed by NYSEG and RG&E, is adopted. Since per-plug incentive payments are to be capped at the station's delivery cost it is appropriate to require that stations be separately metered and ancillary load be limited to 10 kW, as Proposed by NYSEG and RG&E. The Commission directs each IOU to cap the total DCFC station annual incentive payment at the lower of the station's aggregate per-plug incentive amount or the total delivery costs for the twelve-month billing period for which the incentive is being calculated.

B. Incentive Eligibility

1. New vs. Existing Chargers

Under the Consensus Proposal, 1,074 new plugs may be eligible to receive annual incentives. Ratepayer funds must be put to maximum benefit to accomplish the goals of the program, which is especially critical if the Clean Energy Parties are correct in arguing that nearly 5,000 DCFC plugs may be needed to support New York's ZEV target. Providing ratepayer-funded incentive payments to existing chargers is inconsistent with the program goal.

The Commission adopts the proposal that the per-plug incentive only be available to newly constructed chargers. The purpose of the program is to increase the number of publicly accessible chargers to address the range anxiety of potential EV

¹⁹ See Case 14-M-0101, Reforming the Energy Vision, Order Adopting a Ratemaking and Utility Revenue Model Policy Framework (issued February 26, 2015), p. 118.

drivers, thereby inducing EV sales to meet the State's ZEV goals. While existing infrastructure has great value in promoting EV adoption, the Commission declines to retroactively incent those developers. AEE Institute's comment that it is not clear if the incentive levels will be enough to move the market is well taken, and the Commission will evaluate the adequacy of, and potentially adjust, the incentive levels at an interim review discussed below.

2. Public Entity Eligibility

The Commission's REV initiative seeks to build a modern electric grid that is clean, reduces costs, and recognizes locational and temporal value. In order to meet the State's ZEV and GHG reduction targets, the Commission is leveraging and accelerating private investment while prudently investing ratepayer funds. For the limited purpose of deploying the DCFC infrastructure needed to support the State's public policy objectives, NYPA, the City, and Electrify America may be eligible for this per-plug incentive program as station developers. In their role as DCFC station developers, these entities are competing in the private market, and face the same nascent market concerns that have slowed private development in New York.²⁰

In recognition of EVgo's legitimate concern that public entity ownership risks undercutting the private market, the Commission underscores that this per-plug incentive is limited in time and value. In order to capture the substantial

²⁰ A recent report illustrates that the State faces one of the largest charging gaps, while EV uptake will grow most rapidly in markets like New York. See The International Council on Clean Transportation, Quantifying the Electric Vehicle Charging Infrastructure Gap Across U.S. Markets (January 2019), https://www.theicct.org/sites/default/files/publications/US_charging_Gap_20190124.pdf.

public benefits that EV deployment will realize, as enumerated by the Clean Energy Parties and other commenters, the Commission will leverage the institutional capital and readiness to deploy exhibited by NYPA and the other public entities with unencumbered, NYSERDA legacy funds to build out New York's DCFC infrastructure. It is appropriate to utilize uncommitted, unencumbered, NYSERDA legacy funds for this infrastructure deployment that will spur EV deployment. Private market participants are encouraged to utilize this incentive program to deploy DCFC infrastructure in New York, where the market has so far failed to materialize.

In order to preserve the Commission's general beneficiary pays policy where benefits accrue to collection-paying customer classes, the Commission declines to allow NYPA to access a per-plug incentive funded exclusively with SBC funds. As discussed in greater detail below, the Commission directs the IOUs to develop and implement a surcharge mechanism for customer groups that did not contribute to the SBC, and add this collection to the NYSERDA legacy funds.

3. Number of Plugs Eligible

The Clean Energy Parties note that using EVI-Pro Lite's electric vehicle infrastructure projection tool with a modified assumption that 75 percent of EV drivers have home chargers, the model finds that 4,717 DCFC plugs are needed to support 800,000 EVs in New York, showing that more plugs need to be incentivized. However, the electric vehicle infrastructure projection tool is dependent on other factors which must be considered in addition to the percentage of drivers with access to home charging. Given the uncertainty of technological advances and the impacts of uncertain forecasting, as well as the reasonable expectation of cost declines, the maximum number of plugs eligible for an incentive will remain as proposed at

1,074 plugs. The Commission does not anticipate 1,074 incremental plugs will satisfy the DCFC charging needs in New York, but this incentive is designed to motivate market development. As more EVs are sold and the market develops, the economics for all DCFC stations should improve.

As discussed above, Central Hudson and National Grid included limitations on the plugs eligible for the per plug incentive in the first two years of the program to roughly 33 percent and 66 percent of the program total in years one and two, respectively. Such a limit does provide an opportunity to re-evaluate the programs and reduces the maximum incentive payout. However, the Commission finds that limiting the number of eligible plugs by year may unnecessarily slow DCFC station development. In as much as the 1,074 plugs eligible for an annual incentive and the magnitude of the annual incentives may not be set at optimal levels, an interim review will provide the Commission with the ability to correct such imprecise expectations. Central Hudson and National Grid's per-plug limitations are rejected. Instead, the Commission adopts an interim review process to better achieve the objectives of beneficial deployment and ratepayer benefits. The Commission expects this interim review will provide an opportunity to adjust this DCFC per-plug incentive program, if needed, to accelerate market-based deployment at the most efficient level of ratepayer support.²¹

This interim review is in-line with the spirit of Central Hudson's proposal that it reserve the right to seek Commission approval to reduce the incentives and/or end the

²¹ Such adjustments may include: modifying annual incentive payment levels; locational restrictions; approved vendor lists for eligible equipment; public entity eligibility; and, other prudent program improvements.

program due to significant declines in DCFC equipment costs or lack of participation. The Commission declines to vest Central Hudson with the authority to independently reduce incentive levels beyond the declining amounts established by this order, but welcomes each utility to recommend such program changes in their annual reports.

At this time, the Commission also rejects Central Hudson's proposal that DCFC stations seeking eligibility under this program will be subject to the utility's approval. The Commission expects that developers and utilities will collaboratively site these DCFC stations in areas of the distribution system that will benefit from their increased load. A developer may choose to site a DCFC facility with the station's long-term economic business case weighing more heavily than near-term distribution system upgrade costs, but the interconnecting utility can and should charge each developer an adequate contribution toward the cost of adding or upgrading utility facilities.²² The Commission expects to pay particular attention to locational deployment lessons learned at the interim review, and adjust the program's locational deployment considerations, if warranted, based on data reported in the annual utility reports.

The Commission's interim review will begin by October 1, 2023, or when each utility has completed applications for 45 percent of the total number of plugs eligible in their territory, whichever is earlier. The purpose of this interim review process is to consider changes to the program that may include more efficient incentive structures, methods of better

²² For example, Central Hudson's currently effective Tariff Leaf: 98 provides for unusual conditions and increased loads cost recovery from the customer.

capturing system benefits, or acceleration of market-based deployment.

To inform this interim review, and as prudent reporting, the Commission directs each utility to submit a detailed annual report by March 1st after completion of each program year. The annual report must detail: the cumulative number of plugs for which the utility has received applications; the number of plugs in service and their geographic siting; the number of plugs under construction and their estimated in-service dates; station equipment type; installation costs; energy usage data including kWh dispensed, start/stop times, peak kW per charging station, amount of time each vehicle is plugged in, amount of time each vehicle is actually charging, and load curves; comparisons of peak DCFC station demand with local peak demand and system peak demand; usage fees; and, technologies used to manage demand.²³ This interim review will allow the Commission to evaluate the success of the per-plug incentive program, and make any prudent changes.

4. Data Availability

In addition to annual reports as proposed by the Consensus Parties and required by the Commission, a successful DCFC incentive program must provide station developers with useful information. Therefore, the Commission directs the Joint Utilities to add an electric vehicle charging station information page to their individual websites. The Joint Utilities are directed to include, at minimum, program applications, year-by-year incentive amounts, interconnection resources, queue status, and other useful information. The Joint Utilities should work with relevant stakeholders to

²³ In order for the electric utilities to compile such data, developers accessing this incentive must collect and report it to the utility.

identify the most useful content, format, and accessibility of this information and shall update their DCFC incentive program websites monthly.

5. Charging Capability

The requirement that plugs must be capable of simultaneously dispensing at 50 kW or more to qualify for the incentive is appropriate, as most of the ZEVs presently on the road can charge at 50 kW or less.²⁴ While there is no specified power consumption associated with DCFC, 50 kW is typical of level 3 charging. Generally available DCFC infrastructure of this level will lower charge time and range anxiety of current and potential ZEV owners. Simultaneous charging capability shall be defined as the nameplate rating of the charger divided by the number of plugs.

In the Consensus Proposal, the filing parties indicate that chargers with 75 kW of simultaneous capacity meet the maximum charging demand of many EVs currently on the road, but acknowledge that higher demand charging capabilities will become commercially available and DCFC charging infrastructure will need to follow.²⁵ The Commission adopts the tiered incentive levels proposed, as a reasonable method of incentivizing DCFC technology. The per-plug incentive for each 50-74 kW DCFC shall be 60 percent of the total incentive, while each plug at 75 kW or greater shall receive 100 percent of the incentive payment. A station's incentive is capped at the lower of the sum of the

²⁴ At 50 kW it takes approximately 20 minutes to provide enough charge to drive 50 miles.

²⁵ "Next generation" charging stations will deliver as much as 350 kW of power, but most mass-market vehicles are not presently capable of accepting charges at this level. The Commission acknowledges some Tesla "Supercharging" stations deliver this level of charge to Tesla vehicles, but such proprietary technology is not eligible for this incentive.

individual plug incentives or the actual annual demand of the station.

6. Public Accessibility of Plugs

A common Consensus Proposal program parameter amongst the utility-specific designs included the requirement that DCFC stations be publicly accessible. While the Consensus Proposal defines publicly accessible DCFC stations as those allowing access without site-specific physical access restrictions (e.g., supermarkets, malls, retail outlets, rest stops, visitor centers, train stations, hotels, restaurants, and parking garages or lots where DCFC stations are open to the public and will be used by a wide variety of users), additional refinement as to what constitutes a publicly accessible charging station is necessary to ensure the largest possible pool of public benefits. For purposes of this incentive program, customers should not have to pay to access a participating DCFC station. The Commission recognizes that pay-to-park lots are commonplace, and may offer EV charging as a service, but a pay-to-park lot is not analogous to the public accessibility of a gas station and DCFC facility sited there may not receive this per-plug incentive without waiving the access fee for charging customers.²⁶

For the purposes of this program, publicly accessible DCFC stations will be defined as those Level 3 stations that utilize both a Society of Automotive Engineers (SAE) Combined

²⁶ The Commission notes that customer utilization behavior strategies such as fees for dwell times when a vehicle is not actively charging are not considered access fees and a publicly accessible station may charge a dwell fee.

Charging System (CCS)²⁷ plug type commonly in use by American and European manufactures (e.g., Chevrolet, BMW, Mercedes, and Volkswagen) and a CHAdeMO²⁸ plug type commonly in use by Asian manufactures (e.g., Nissan and Mitsubishi). Tesla uses its own standard, not SAE CCS nor CHAdeMO, which the Commission does not recognize as publicly accessible for purposes of this incentive program. However, some Tesla vehicles can connect to CHAdeMO DCFC plugs with an adaptor. Tesla DCFC stations will become eligible for this per-plug incentive where their proprietary technology is coupled with plug types that enables use by EVs with Asian and European charging systems.²⁹

There are about a dozen charging stations networks operating in the United States that require network membership as a condition of station use. To ensure maximum accessibility of DCFC stations by the public, stations eligible for an incentive under this program must be usable without requiring a paid membership in a charging station network. Networked stations that offer single per-use charging fees payable through a commonly accepted payment method such as cash, credit, or debit will satisfy this criterion. While payment through a smartphone application is permitted, in order to qualify as publicly accessible for purposes of this program, it may not be the only form of payment a DCFC station accepts. Regarding NGV America's and NFG's request for incentives and/or discounted electric rates for the fueling of NGVs, such

²⁷ SAE International Standards are used to advance mobility engineering throughout the world; the SAE CCS is a standardized charging environment.

²⁸ CHAdeMO is a direct current charging standard for EVs that enables communication between the car and the charger, developed and certified by CHAdeMO Association.

²⁹ The Commission is not prescribing that Tesla deploy a particular technology (i.e., CHAdeMO versus SAE CCS).

considerations are inconsistent with the scope of this proceeding. This proceeding was instituted to support New York's ZEV sales mandate, which requires manufacturers to sell approximately 800,000 to 1 million, plug-in hybrid, all-electric, or fuel cell vehicles in New York by 2025. The Commission declines NGV America and NFG's request at this time. The scope of this proceeding is properly focused on EVs, and the Commission will not incorporate NGVs at this time.

C. Incentive Level

The Consensus Parties indicate that the utilities' proposed incentive levels were derived using model electric bills assuming that DCFC stations received service under volume-based rates. They acknowledge, however, that even with the incentive proposed, the ultimate success of the business model will be largely driven by station utilization. As indicated by AEE Institute and Tesla, Con Edison's and O&R's proposals contain a performance component to encourage higher station utilization whereas Central Hudson, National Grid, NYSEG and RG&E eschew the load factor bonuses, opting instead for higher per plug incentives.

As evidenced by the need for this incentive, the capital and operating costs associated with owning and operating DCFC charging stations are not trivial. As such, DCFC station operators appear to have sufficient incentive to maximize their stations' utilization even without specific load factor incentives. The Commission therefore denies Con Edison and O&R's load factor bonus incentive. However, to ensure that the program is achieving the desired results, the incentive components and levels will be reviewed at the interim evaluation.

The Con Edison, O&R, and Central Hudson programs set the initial incentive level for qualifying applicants at the

maximum level, independent of the year in which the applicants qualify. However, the NYSEG, RG&E, and National Grid proposals set the initial incentive level for qualifying applicant's depending on the year in which the applicants qualify.

The Consensus Proposal used a model electric bill assuming volume-based rates for DCFC as a target in sizing and shaping the incentive. Providing incentives at the maximum level, independent of the year in which the applicants qualify, may overcompensate station owners. The Commission expects that DCFC station developers will be able to capture cost savings from technology cost declines and lessons learned through increased development, which justify establishing this declining annual incentive at the outset.

Therefore, the Commission directs Con Edison, O&R, and Central Hudson to modify their programs such that the initial incentive is based on the year in which the DCFC qualifies, consistent with the NYSEG, RG&E and National Grid proposals. An application shall be deemed complete, and the incentive level fixed, when the developer submits a completed application for the program. Program applications are to be deemed complete at the latter of when the station owner/developer provides proof of a building permit, or when the developer provides a CIAC payment for excess distribution facilities, if applicable. CIAC payments are to be remitted within 60 days of the utility communicating such a fee. An applicant that fails to remit payment for their CIAC within 60 days shall be removed from the program, barring exceptional circumstances that justify additional time in which the developer and utility may solve engineering difficulties.

As explained above, each of the utilities designed a seven-year incentive program, except for Central Hudson that established a five-year program. The Commission directs Central

Hudson to modify its program so that DCFC station developers in their service territory may also participate in a seven-year program, consistent with the rest of the State.

As explained in Appendix E of the Consensus Proposal, the O&R per-plug incentives were designed to provide a combined benefit in conjunction with the delivery rate discount offered under the EDR, which is currently 20 percent. O&R proposes to re-calculate the per-plug incentive if the EDR delivery rate discount changes. This proposal makes the O&R program substantially similar to Con Edison's. However, such similarity is not necessary. The Commission finds it reasonable to leverage Con Edison's BIR, which is currently open to electric vehicle quick charging stations that have a minimum 100 kW publicly accessible capacity and is receiving government economic incentives, with this per-plug incentive to motivate the DCFC market. The Commission declines to extend this exception to the O&R EDR delivery rate discount, and will not authorize an EV quick charging component as proposed. To make the O&R program consistent with that of the other utilities, the EDR component is to be eliminated and the per plug incentive is to be recalculated to capture the expected 20 percent discount.³⁰

The Commission adopts Con Edison's proposal to modify the eligibility requirement of the electric vehicle quick stations component of the BIR such that: 1) governmental customers are eligible; 2) the requirement that the station be receiving government economic incentives are waived; and, 3) the date for delivery rate reductions are extended from the current date of April 30, 2025, to December 31, 2025. The Commission finds that DCFC station deployment is a public benefit, and costs and benefits flow to both ratepayers and society at large.

³⁰ The Commission estimates the per-plug incentive will increase to \$10,400 in year one of the program.

The design of this BIR applied to DCFC customer accounts is to provide site hosts the appropriate incentive to deliver this public good. In order to deliver the maximum public benefits, all developers shall be eligible for the BIR. Support for DCFC infrastructure is a special use case, and factually different from other use cases for economic development rates. Con Edison's BIR-eligibility expansion is appropriately targeted and narrow in terms of scope, as the BIR is only available if the DCFC station is built and serving the public, and is appropriately inclusive to site hosts that are providing a direct capital investment by building this critical infrastructure.

D. Program Costs and Recovery

According to many commenters, increased EV adoption will lower the average electric cost of service and reduce rates for ratepayers, due to incremental utility revenue from serving these new customers. The Commission cannot forecast if these comments will prove to be accurate, because EV deployment is uncertain. Nonetheless, the Commission recognizes the importance of meeting our State ZEV targets and commits electric ratepayer funds to incentivize the market to build the necessary infrastructure and capture the benefits those goals will realize.

As proposed, the maximum potential cost of the per plug incentives over the seven-year life of the program described in the Consensus Proposal is approximately \$28 million. The Consensus Parties propose that the utilities be authorized to recover applicable incremental administrative costs of the program, with interest, in addition to the other

program costs. Per-plug incentive program costs, as modified by the Commission, are \$31.6 million statewide.³¹

The Commission is mindful of imposing incremental collections on ratepayers to motivate the DCFC market, and therefore adopts MI's recommendation to use CEF funds to fund DCFC plug incentives in principle. Because CEF budgets and goals are for the full ten-year period, MIs observation that the CEF has unallocated CEF funds at this time is accurate, although those funds will be deployed as the CEF portfolio is developed. Instead of CEF collections, the Commission directs the use of identified unencumbered, uncommitted NYSERDA legacy funds (i.e. remaining System Benefits Charges) to fund these DCFC per-plug incentives for those customer classes that have contributed to the SBC.

Early in the SBC proceeding, the Commission recognized that many SBC programs will deliver greater benefits and operate more effectively when operated on a Statewide basis.³² Therefore, the Commission directed the IOUs to retain a portion of the revenues to fund certain utility-administered, unexpired public-benefit programs that predated the SBC, and transfer the remainder to NYSERDA to fund statewide administered public benefit programs. In order to realize the State's goals of transportation electrification and GHG emission reduction, the Commission has identified unencumbered legacy SBC funds that are available to fund this incentive. The Commission directs NYSERDA to transfer this funding, as outlined in Appendix A, to the respective utilities within 90 days of the effective date of this order. The utilities will be required to accrue carrying

³¹ Appendix A contains maximum program budgets per utility.

³² Case 94-E-0952, In the Matter of Competitive Opportunities Regarding Electric Service, Opinion and Order Concerning System Benefits Charge Issues (issued January 30, 1998), p. 7.

charges on unused funds at their respective pretax rates of return. Any funds remaining at the conclusion of the seven-year program shall be deferred for future disposition by the Commission.

Not all DCFC station developers who may be eligible for this per-plug incentive program have contributed to the SBC. In order to preserve the Commission's general policy of benefits accruing to the collection-paying participants, the IOUs are directed to develop a surcharge mechanism for customer groups that did not contribute to the SBC. The surcharge shall be developed by dividing total program costs by the total annual delivery kWh for each IOU. This surcharge shall be administered to all non-SBC paying customers for a period of one-year, beginning January 1, 2020. The funds collected using this surcharge shall be combined with the NYSERDA legacy dollars to fund the DCFC per-plug incentive program at each IOU. Each IOU shall file tariff revisions necessary to enable this surcharge by March 1, 2019.

The Commission declines to grant the IOU's request for explicit deferral and recovery authority for administrative costs of this per-plug incentive program. Processing new service interconnections is a core utility competency, and while DCFC stations pose a new technology application, the incremental administrative costs of this program are expected to be minimal. As always, if the incremental costs are in fact material, the IOU's may petition for deferral treatment.

Con Edison proposes to re-determine the per-plug incentive if the BIR delivery rate reductions change during the term of the program. However, charging stations may not necessarily take part in both the BIR and per-plug incentive programs. As proposed, if cap limits are met for one program, but there is still space in the other program, Con Edison would

allow customers to participate in the remaining program. Since the per-plug program funding being provided by NYSERDA was developed using the incentive levels contained in the Consensus Proposal, Con Edison may not change its incentives without Commission approval.

E. Outstanding Issues

With respect to the electrification of fleet vehicles, fleet operators are afforded the opportunity to diversify demand and achieve higher charger utilization factors. As CALSTART indicates in its comments, such vehicles are frequently charged in depot-like configurations and fleet operators likely require greater adjustments to the non-demand charge portions of the utility bill. Currently, the electric utilities all offer Time-of-Use rate options, including the hourly pricing of supply, that may benefit fleet operators as CALSTART suggests. Additionally, supply may be procured from third party energy service companies operating in the utilities' service territories. To encourage further dialogue in this proceeding, Staff's forthcoming whitepaper should consider the needs of fleet vehicles and TNCs.

CONCLUSION

In furtherance of the State Energy Plan carbon reduction targets and the ZEV deployment goals, the Commission adopts the DCFC per-plug incentive program to support this critical public infrastructure. This statewide incentive program is intended to benefit the State's ratepayers, and as such, the Commission may adjust the program parameters to achieve maximum locational deployment benefits, the correct number of DCFC stations deployed, the most efficient system benefits, and other lessons that may be learned by the interim review.

The Commission orders:

1. The Commission adopts the Consensus Proposal with modifications as discussed in the body of this order.

2. Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc., New York State Electric & Gas Corporation, Niagara Mohawk Power Corporation d/b/a National Grid, Orange and Rockland Utilities, Inc., and Rochester Gas and Electric Corporation are directed to cap the total direct current fast charging station annual incentive payment at the total delivery costs for the 12-month billing period for which the incentive is being calculated as discussed in the body of this order.

3. Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc., New York State Electric & Gas Corporation, Niagara Mohawk Power Corporation d/b/a National Grid, Orange and Rockland Utilities, Inc., and Rochester Gas and Electric Corporation are directed to require that stations be separately metered and ancillary load be limited to 10 kW in order to qualify for the per-plug incentive, as discussed in the body of this order.

4. Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc., New York State Electric & Gas Corporation, Niagara Mohawk Power Corporation d/b/a National Grid, Orange and Rockland Utilities, Inc., and Rochester Gas and Electric Corporation shall each file an interim report with the Department of Public Service Staff by October 1, 2023 or when 45 percent of the total number of completed applications for plug incentives in each service territory have been received, whichever happens first, as described in the body of this order.

5. Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc., New York State

Electric & Gas Corporation, Niagara Mohawk Power Corporation d/b/a National Grid, Orange and Rockland Utilities, Inc., and Rochester Gas and Electric Corporation shall file a detailed annual report by March 1st, after completion of each program year as described in the body of this order.

6. Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc., New York State Electric & Gas Corporation, Niagara Mohawk Power Corporation d/b/a National Grid, Orange and Rockland Utilities, Inc., and Rochester Gas and Electric Corporation are directed to add an electric vehicle charging station information page to their websites by March 1, 2019, to be updated monthly, as described in the body of this order.

7. Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc., and Orange and Rockland Utilities, Inc., are directed to modify their programs, such that the initial incentive is based on the year in which the direct current fast charging station qualifies for the program, as described in the body of this order.

8. Central Hudson Gas & Electric Corporation is directed to modify its program, so that the direct current fast charging station developers may participate in a seven-year program.

9. Orange and Rockland Utilities, Inc. is directed to modify its program to eliminate the Economic Development Rate component and to recalculate the per plug incentive, as described in the body of this order. Within 10 days of the issuance of this order, the Company is also directed to provide the New York State Department of Public Service Staff and the New York State Energy Research and Development Authority the maximum per-plug incentive payments of its program, assuming the revisions in this order.

10. Consolidated Edison Company of New York, Inc., shall file an updated Business Incentive Rate tariff, to become effective on not less than one day's notice on March 1, 2019.

11. Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc., New York State Electric & Gas Corporation, Niagara Mohawk Power Corporation d/b/a National Grid, Orange and Rockland Utilities, Inc., and Rochester Gas and Electric Corporation are directed to develop a surcharge mechanism to be administered to all non-System Benefits Charge paying customers for a period of one year, beginning January 1, 2020, and to file tariff revisions necessary to enable this surcharge on ten days' notice by November 1, 2019.

12. Within 90 days of the issuance of this order, the New York State Energy Research and Development Authority shall transfer unencumbered, uncommitted legacy System Benefits Charge funds to each investor owned electric utility in the amounts listed in Appendix A to this order.

13. The requirements of Public Service Law §66(12)(b) and 16 NYCRR §720-8.1, related to newspaper publication of the tariff amendments described by ordering Clauses 10 and 11, are waived.

14. In the Secretary's sole discretion, the deadlines set forth in this order may be extended. Any request for an extension must be in writing, must include a justification for the extension, and must be filed at least one day prior to the affected deadline.

15. This proceeding shall be continued.

By the Commission,

(SIGNED)

KATHLEEN H. BURGESS
Secretary

APPENDIX A

Maximum DCFC Incentive Payments by Utility	
Utility	\$
Con Edison	6,400,000
O&R	1,664,000
Central Hudson	4,400,000
NYSEG	5,120,000
RG&E	5,032,000
National Grid	9,000,000
Total	31,616,000

**STATE OF NEW YORK
PUBLIC SERVICE COMMISSION**

**Proceeding on Motion of the
Commission Regarding Electric
Vehicle Supply Equipment and
Infrastructure**

CASE 18-E-0138

PETITION FOR REHEARING

Introduction

Pursuant to New York Public Service Law § 22 and Section 3.7 of the Commission’s rules and regulations, 16 NYCRR § 3.7, Tesla, Inc. (“Tesla”) files the instant Petition for Rehearing of the Public Service Commission (“Commission” or “PSC”) *Order Establishing Framework for Direct Current Fast Charging Infrastructure Program* (“Order”) issued and effective February 7, 2019 in the above captioned docket (the “Order”).

The Order largely adopted a “Consensus Proposal” developed by stakeholders “to address the short-term economic challenges of installing publicly available and affordable [Direct Current Fast Charging (“DCFC”)]” electric vehicle (“EV”) charging stations.¹ In the Consensus Proposal, “publicly accessible stations” were defined as meaning, essentially, “physically accessible” stations, described as “those allowing access without site-specific physical access restrictions (e.g., supermarkets, malls, retail outlets, rest stops, visitor centers, train stations, hotels, restaurants, and parking garages or lots where DCFC stations are open to the public and will be used by a wide variety of users).”² The Proposal’s Sponsors cited studies

¹ Order, p. 3. (emphasis added).

² Order, p. 44. (emph. added.) *See also Id.* at p. 9 (noting that “The Consensus Proposal identifies common program parameters amongst the IOUs, including . . . applicability to only new DCFC facilities that are publicly accessible (i.e., without site-specific physical access restrictions such as radio-frequency identification, security badge, or otherwise limited access)[.]”

showing that increased investments in physically accessible DCFC stations, which the Sponsors described as occurring “[a]long major roads and in urban areas,” eliminated EV drivers’ range anxiety, and was therefore key to increasing EV adoption.³

However, without providing any notice of intent to adopt an alternative definition to that set forth in the Consensus Proposal, and without any reasonable record support or rational basis, the Order defines “publicly accessible stations” as meaning, essentially, those stations that are technologically accessible. Specifically, the Order defines “publicly accessible stations” as consisting exclusively of “those . . . stations that utilize both a . . . plug type commonly in use by American and European manufacturers (e.g., Chevrolet, BMW, Mercedes, and Volkswagen) and a . . . plug type commonly in use by Asian manufactures (e.g., Nissan and Mitsubishi).⁴ As acknowledged by the Order, such a definition disqualifies Tesla’s charging technology from eligibility for the incentive as the Commission states that “such proprietary technology is not eligible for this incentive”⁵ unless Tesla stations are deployed with plugs useable by non-Tesla customers.⁶

Tesla respectfully submits that the Order’s novel definition of “publicly accessible” is unlawful and arbitrary and capricious since it is devoid of record support, lacking a rational basis,⁷ and discriminatory.⁸ For these reasons, the Order should be reversed and remanded.

³ Consensus Proposal, p. 3.

⁴ *Id.*, pp. 44 – 45.

⁵ See Order, p. 43, fn. 25

⁶ See *Id.*, p. 45 (“Tesla uses its own standard . . . which the Commission does not recognize as publicly accessible for purposes of this incentive program . . . Tesla DCFC stations will become eligible for this . . . incentive where their proprietary technology is coupled with plug types that enables use by EVs with Asian and European charging systems.”)

⁷ See generally *Matter of Pell v. Bd. Of Educ.*, 34 N.Y. 2d 221, 231 (1975) (in reviewing an agency decision, a court can apply the arbitrary and capricious test; arbitrary agency action is without sound basis in reason and is generally without regard to the facts) (citation omitted).

⁸ See *New York State Ass’n of Counties v. Axelrod*, 78 N.Y.2d 158, 166 (1991).

Procedural Background

In April of 2018, “Joint Petitioners”⁹ requested that the Commission direct the state’s utilities to modify the rates to provide immediate and long-term rate relief to EV charging station hosts as means of encouraging the deployment of electric vehicles. Specifically, the Petitioners recognized that increasing the numbers of charging stations would alleviate drivers’ concerns over EV range, and thereby support the larger public policy goal of rapidly increasing EV adoption.¹⁰ Towards that end, the Petitioners recommended that the Commission direct the state’s utilities to modify the tariffs charged to EV charging customers.¹¹ Rate relief was required, to remove the “significant financial barriers to the development of a network of DCFC.”¹²

In June 2018, the Commission opened this docket to consider various EV-related issues and directed staff to convene a technical conference to consider various topics. The “Consensus Proposal”¹³ that emerged therefrom “call[ed] for each [of the state’s utilities] to provide an annual per-plug incentive to support third party investment in publicly available direct current fast charging stations to encourage increased electric vehicle penetration.”¹⁴

On November 3, 2018, the Commission issued a Notice Soliciting Comments on the Consensus Proposal. The Notice directed interested persons to consult the Proposal if they

⁹ The Joint Petitioners were the New York Power Authority (“NYPA”), the New York State Department of Environmental Conservation (“DEC”), the New York State Department of Transportation (“DOT”), and the New York State Thruway Authority (“NYSTA”).

¹⁰ Order, p. 4.

¹¹ Order, pp. 1 – 2.

¹² NYPA September Comments, p. 2.

¹³ Parties to the Consensus Proposal were: Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc. (“Con Ed”), NYPA, New York State Department of Environmental Conservation, New York State Department of Transportation, New York State Electric & Gas Corporation (“NYSEG”), New York State Energy Research and Development Authority, New York State Thruway Authority, Niagara Mohawk Power Corporation, Orange and Rockland Utilities, Inc. (“O&R”), and Rochester Gas and Electric Corporation (“RG&E”).

¹⁴ Notice Soliciting Comments (November 23, 2018), p. 1.

wished to provide comment thereon. The Notice provided no indication that the Commission might entertain any definition of the phrase “publicly accessible” other than that contained in the Proposal.¹⁵ Nor had the Order Instituting Proceeding, which identified nine topics for discussion in the preceding technical conference,¹⁶ nor the Notice of Working Group Meeting and Request for Post-Conference Comments, which identified fourteen topics.¹⁷ There was no evidence advanced by any party on whether changing the definition from physical accessibility to technological accessibility would help, or would hurt, the State’s goal of rapidly increasing EV deployment.

Further underscoring that the Commission’s decision to re-define “publicly accessible” was arbitrary and capricious, the Order cites no comment or record basis urging that the definition be changed. Most importantly, the Order contains no analysis or citations to any evidence showing that changing the definition will spur more private sector investment in charging station infrastructure than would the use of the prior definition.¹⁸

Tesla respectfully submits that disqualifying Tesla from eligibility for the incentive will impede the state’s ability to close the gap between the numbers of plugs it needs, in order to attain the 800,000 zero emission vehicles (“ZEV”) that the state wants on New York roads by 2025. Thus, the Order will fail to leverage and accelerate private investment while prudently investing ratepayer funds, contrary to the Commission’s stated purpose in conducting this proceeding.¹⁹

¹⁵ See *supra*, n. 4 and surrounding text.

¹⁶ Order Instituting Proceedings, Issued and Effective April 24, 2018, pp. 4 – 5.

¹⁷ Notice and Request for Working Group Meeting and Request for Post-Conference Comments, Issued August 16, 2018. Indeed, the most relevant topic still identified physical accessibility as having the most relevance. Question 4 stated: “What is the best way for utilities, charging station providers, and site hosts to work together to *locate* charging stations where they best meet electric system, customer and community needs?” (emphasis added).

¹⁸ See Order, pp. 44 – 45.

¹⁹ *Id.*, p. 38.

Tesla

Tesla is a leading developer and manufacturer of electric vehicles, as well as other clean energy products and services. In order to serve its customers, Tesla funds, builds and operates its own network of charging stations and operates these as a service to its customers. The network is not intended to be a profit center for the company. Every Tesla customer is, at the time of vehicle purchase, effectively investing in both a car and in the charging station network.

In 2012, Tesla began developing its network of Superchargers to enable customers to confidently make road trips with quick charging sessions on highly traveled routes. Tesla's charging network and vehicles utilize a Tesla connector which is capable of charging vehicles with both alternating current (Level 1 and Level 2 charging at 110 volts or 240 volts up to 890 amps) and direct current (currently up to 120 kW). When Tesla began developing its charging station network in 2012, other DCFC networks and connector types (CHAdeMO and Combo CCS) were limited to a 50 kW charge rate, thus necessitating the development of a connector and network capable of higher charging rates and quicker charger sessions.

To date, Tesla has largely absorbed the costs of installing and operating an extensive network of charging stations in order to serve its customers. The costs of which are significant. As noted by the New York Power Authority, interconnection costs for DCFC chargers can reach over \$100,000 in some areas of the state.²⁰ Operating costs can also be significant, as high demand charges are expensive to station operators.²¹ Thus, Tesla supported the Consensus Proposal, as it "represent[ed] an important first step to addressing cost barriers for DCFC deployments."²²

²⁰ NYPA Comments, pp. 2 – 3.

²¹ *Id.*, p. 2.

²² Tesla's December 14, 2018 Comments, p. 2.

However, the Order has expressly conditioned Tesla's eligibility to receive the incentive on Tesla's installing CHAdeMO or CCS plugs, which plugs serve only non-Tesla customers.²³

Given the Commission's recognition that it needs to leverage private investment in order to meet the State's ZEV and GHG reduction targets,²⁴ Tesla questions whether the Commission gave sufficient consideration to the impact of excluding the one manufacturer whose EVs comprised 80% of the DCFC capable vehicle sales in 2018, and 60% since 2012.²⁵

Tesla does not view its charging network as a "walled garden," and has discussed opening the network with other OEMs, however the conversations have yet to be conclusive.

As noted in Tesla's 2018 Q1 Earnings Call:

[W]e're happy to support other automakers and let them use our Supercharger stations. They would just need to pay the share of the cost proportionate to their vehicle usage. And they would need to be able to accept our charge rate or at least – and our connector, at least have an adaptor to our connector. So this is something we're very open to, but so far none of the other car makers have wanted to do this.²⁶

Tesla respectfully urges the Commission to refrain from discriminating against Tesla and undermining New York's ability to achieve its ZEV and GHG reduction targets, by reversing the Order and remanding it. The grounds for rehearing are the errors of law and fact described below.

Argument

²³ The Order was factually incorrect that Tesla customers can use CHAdeMO or CCS, discussed *infra*.

²⁴ Order, p. 38. *See also* Order, p. 30 (noting the Consensus Parties' calculation that more than 1m500 DCFC plugs are likely needed to support the charging needs of the State's target of 800,000 ZEVs by 2025).

²⁵ Data specifying vehicle models is available in AFDC data (which database was cited by the Joint Petition, p. 9, n. 39, and Tesla's comments on the Joint Petition, p. 2), specifically, at <https://afdc.energy.gov/data/10567> Also *See* InsideEV's Monthly Plug In Sales Scorecard, available from <https://insideevs.com/monthly-plug-in-sales-scorecard/> There are thirteen EV models available for purchase today that are capable of DC fast charging, including the Tesla Model 3, Tesla Model S, Tesla Model X, Chevrolet Bolt, Nissan Bolt, Mitsubishi Outlander PHEV, Volkswagen e-Golf, Ford Focus Electric, Hyundai Ioniq, Honda Clarity BEV, Kia Soul EV, Jaguar I-Pace, and BMW i3.

²⁶ 2018 Q1 Tesla, Inc. Earnings Call. Available from <https://edge.media-server.com/m6/p/nwvzygovo>, beginning at 50 minutes.

New York Public Service Law § 22 allows the Commission to grant and hold a rehearing “if in its judgment sufficient reasons therefore be made to appear.” 16 NYCRR § 3.7(b) states: “Rehearing may be sought only on the grounds that the Commission committed an error of law or fact or that new circumstances warrant a different determination. A petition for rehearing shall separately identify and specifically explain and support each alleged error or new circumstance said to warrant rehearing.”

Errors of Law

The Commission cites Public Service Law §§ 5, 65 and 66 as the basis of its authority to adopt and/or modify the Consensus Proposal.²⁷ The standard a court would use to review a Commission’s decision under any of the foregoing laws is essentially the same. *See, Multiple Intervenors v. Public Service Com.*, 166 A.D. 2d 140 (S.Ct. of N.Y. App. Div. 3rd 1991)²⁸ construing Section 5 (and holding that the appropriate test for review of the Commission’s demand side management orders and opinions was whether the determination was arbitrary and capricious and lacked a rational basis); *New York Tel. Co. v. PSC*, 95 N.Y.2d 40 (Ct. of App. 2000) construing Section 65 (and holding that the Commission’s determinations are entitled to deference and may not be set aside unless they are without rational basis or without reasonable support in the record); and *Black Radio Network, Inc. v. PSC*, 253 A.D.2d 22 (App. Div. 3d Dept. 1999) construing Section 66 (and holding that “as a general rule, courts should defer to the PSC on questions involving that agency’s special expertise . . . Nonetheless . . . , the courts may scrutinize the PSC’s determination to ensure that it is not . . . irrational and unreasonable.”). The standard is also the same where a court is reviewing an agency’s interpretation of a settlement

²⁷ Order, p. 17.

²⁸ The Order cites to this case as illustrative of its Authority. Order, p. 17.

agreement to determine whether the agency had a rational basis to support its decision). *United Water N.Y., Inc. v. PSC*, 252 A.D. 2d 810 (App. Div. 3rd Dept. 1998).

The Order’s novel re-definition of “publicly available” was unlawful, as it fails both the rational basis and reasonable record support tests. The re-definition is also unlawful, as it results in a rate that is discriminatory, contrary to Public Service Law § 65.2 and § 65.3. A discriminatory and disparate impact adds to the lack of a rational basis in the record, particularly where an agency has utterly failed to substantiate its conclusion that it has a basis for doing so). *See New York State Ass’n of Counties, supra*, 78 N.Y. 2d at 166.

1. The Commission Erred in Re-Defining a Term Critical to the Consensus Proposal Without Record Support

As indicated above, the Commission was well aware that both the Consensus Proposal and the Joint Petition that preceded it, exclusively defined “publicly accessible stations” as meaning stations that are physically accessible.²⁹

The Commission was clearly bound to notify the public if it was intending to re-define “public availability” and thus the eligibility of customers.³⁰ This is especially the case, given that the Commission is already on record as having defined the term as meaning “physically accessible.” In Case 13-E-0199, *In the Matter of Electric Vehicle Policies*, where the Commission was inquiring whether it had jurisdiction over “publicly available Charging Stations,” the Commission highlighted only the importance of public accessibility to increasing

²⁹ *See supra*, n. 2, and surrounding text. *See also* Joint Petition, p. 9, stating:

In fact, a recent review of reports on EV incentive effectiveness has as its first recommendation: install more charging stations, including DCFC stations in metro areas and along major travel corridors, which “are likely to have an outsized effect on [EV] adoption in the next few years.”

³⁰ *See, e.g., Matter of Alvarado v. State of N.Y., Dept. of State, Div. of State Athletic Commn.*, 110 AD2d 583, 488 NYS2d 177 [1st Dept 1985].

customer acceptance and use of EVs.³¹ The Commission’s decision to exclude Tesla’s technology and charging stations as currently developed was a “bolt from the blue” and is unlawful.³²

If the Commission wished to investigate whether departing from its prior decisions was warranted, it should have alerted the public and stakeholders in the Notice Soliciting Comments on the Consensus Proposal, in any of the two requests for comment on specified topics, or it could have issued a new notice soliciting comments about technology eligibility.

2. The Commission Erred in Re-Defining a Term Critical to the Consensus Proposal without a Rational Basis in the Record

The public is entitled to assume the Commission will behave consistently.³³ As no would-be commenter had any reason to believe they needed to put on a case regarding “technological availability,” it is not surprising that very few parties did comment on the topic, and where they did, their comment was sparse. Nevertheless, in the few instances where statements were made – for example, by both the Joint Petitioners and the Consensus Proposal Sponsors – the authors were clear that they were agnostic as to technological differences, given the far more pressing need to enlist the resources of all would-be investors in charging stations so as to achieve the State’s ZEV and GHG reduction targets. Thus, the Joint Petitioners stated:

³¹ See May 22, 2013 Notice of New Proceeding and Seeking Comments, Case 13-E-0199, p. 2, where the Commission stated:

The availability of Charging Stations is vitally important to increased customer acceptance and use of PEVs, Public Charging Stations may be installed in garages, parking lots, or next to parking spaces along public streets. The availability of public Charging Stations at numerous locations will allow customers to charge vehicles while parked overnight (e.g., at or near residences and hotels), at work, conducting errands, or at shopping, eating and entertainment venues (e.g., at or near shopping malls, arenas and stadia, or in commercial entertainment districts).

³² *Williston Basin Interstate Pipeline Co. v. FERC*, 165 F.3d 54, 63 (1999) (finding FERC’s method for reaching a decision as lacking adequate support in the record since it was made without having forewarned the parties of the factual material on which it would rely, and providing an opportunity for rebuttal).

³³ See e.g., *Proceeding on Motion of the Commission to Enable Community Choice Aggregation Program; Proceeding on Motion of the Commission as to the Policies, Requirements and Conditions for Implementing a Community . . .* 2018 N.Y. PUC LEXIS 131, CASE 14-M-02241 Case 15-E-0082 (March 16, 2018).

Presently in New York State, there are only 78 DCFC plugs at 44 stations that are publicly available to all EV drivers. There are an additional 120 DCFC plugs that are available exclusively for Tesla EVs. However, New York will need approximately 1,500 total DCFC plugs to adequately support the amount of projected BEVs likely operating under the ZEV mandate regulations in 2025.³⁴

The Consensus Proposal Sponsors stated likewise.³⁵ While the statement notes there are different plugs, it does not say whether the 1500 plugs needed are specifically for non-Teslas, it is reasonable to conclude that more Tesla plugs are needed for NY to meet its ZEV mandate regulation by 2025. In fact, The U.S. Department of Energy (“DOE”) tool used to develop the 1500 DCFC estimate does not specify connector types.³⁶ Moreover, the DOE’s EV charging database includes Tesla Superchargers as “Public Stations.”³⁷

Given these statements by the Consensus Proposal’s Sponsor, the Order’s “bolt from the blue” is even more troubling. The Commission clearly found that “[i]n order to meet the State’s ZEV and GHG reduction targets, the Commission [must] leverage[e] and accelerat[e] private investment while prudently investing ratepayer funds.”³⁸ However, the Order will have the opposite effect and will undercut the State’s efforts “to meet the State’s ZEV and GHG reduction targets.” More to the point, the Order fails to explain whether the program is in fact a “prudent invest[ment of] ratepayer funds,” given that it would now be excluding the one manufacturer whose EVs comprised 80% of the DC fast charging capable vehicle sales in 2018, and the program would be incentivizing charging stations that cannot be utilized by the overwhelming majority of EVs on the road today, and/or that are likely to be on the road in the foreseeable future.

³⁴ See Joint Petition Preliminary Statement, p. 9.

³⁵ See Consensus Proposal, p. 3 and n. 11.

³⁶ U.S. Department of Energy. EVI-Pro Lite Tool. Available from <https://afdc.energy.gov/evi-pro-lite> NY infrastructure requirement estimate based on 800,000 electric vehicles.

³⁷ U.S. Department of Energy. Electric Vehicle Charging Station Locations. Available from https://afdc.energy.gov/fuels/electricity_locations.html#/find/nearest?fuel=ELEC

³⁸ Order, p. 38.

3. The Commission Erred in Approving a Discriminatory Rate

For the Commission to have changed a definition that was critical to the Proposal, discriminated against Tesla, and potentially thwarted its own mission, it was required to provide a reasoned basis for doing so. *See New York State Ass'n of Counties*, 78 N.Y. 2d at 166 (a discriminatory and disparate impact adds to the lack of a rational basis in the record, particularly where an agency has failed to substantiate its conclusion that it has a basis for doing so).

The Commission's Order also creates a discriminatory program that violates Public Service Law § 65.2 and § 65.3. Section 65.2 of Public Service Law states that "No...electric corporation...shall directly or indirectly, **by any special rate, rebate, drawback or other device or method**, charge, demand, collect or receive from any person or corporation a greater or less compensation for... electricity...**than it charges, demands, collects or receives from any other person or corporations for doing a like and contemporaneous service with respect thereto under the same or substantially similar circumstances or conditions.**"

[emphasis added]. Tesla provides its charging services to members of the public under the same circumstances and conditions as other charging operators that are eligible for the program. Yet given the special incentive method, Tesla will be paying significantly more for electricity than other network operators.

For example, an eight charger Tesla station in Rochester Gas and Electric's territory that has a peak demand of 300 kW and consumes 20,000 kWh per month will pay nearly *3.5 times more* than a non-Tesla station of the same size and usage profile. The program as modified and approved by the Commission is in direct violation of § 65.2, as well as § 65.3 which states "No... electric corporation... shall make or grant any undue or unreasonable preference or advantage to any person, corporation, or locality, or to any particular description of service in

any respect whatsoever, **or subject any particular person, corporation or locality or any particular description of service to any undue or unreasonable prejudice or disadvantage in any respect whatsoever.**” [emphasis added]. The Commission’s Order will subject Tesla to electricity costs more than double that of other providers of DCFC services, or require Tesla to deploy equipment for non-Tesla EVs at significant costs in order to qualify for the program, which is undue and unreasonable prejudice that puts Tesla at a disadvantage to other charging operators.

4. The Commission’s Failure to Meet its own Principles Underscores its Lack of Basis

The genesis of this proceeding was a request to provide rate relief to DCFC operators. In its Order and in reference to Ratemaking Principles, the Commission states that “by incentivizing DCFC stations through a transparent annual incentive instead of through a demand charge exemption as proposed by some commenters, the Commission is being consistent with past approaches to rate design.”³⁹ The Commission’s decision, however, violates *five* of the ten rate principles adopted in the Reforming the Energy Vision by discriminating against a particular technology, in this case Tesla’s charging stations, and promoting an outcome that is inconsistent with New York’s policy goals.⁴⁰ The five rate design principles include (with emphasis added):

1. Encourage outcomes: Rates should encourage desired market and policy outcomes including energy efficiency and peak load reduction, improved grid resilience and flexibility, and reduced environmental impacts **in a technology neutral manner.**
2. Policy transparency: Incentives should be explicit and transparent, and **should support state policy goals.**

³⁹ See Order, p. 37

⁴⁰ See Case 14-M-0101 “Order Adopting a Ratemaking and Utility Revenue Model Policy Framework”. Appendix A May 19, 2016. .

3. Decision-making: Rates should encourage **economically efficient and market-enabled decision-making, for both operations and new investments, in a technology neutral manner.**
4. Customer-orientation: The customer experience should be practical, understandable, and **promote customer choice.**
5. Economic sustainability: Rate design should reflect a long-term approach to price signals and the ability to **build markets independent of any particular technology or investment cycle.**

The Order fails to meet the Commission’s REV principles. For example, the Order is distinctly **not** technologically neutral, given that it qualifies eligibility on use of a particular charging technology. The Order also fails to explicitly or transparently explain the math – how is it that disqualifying Tesla will support the goal of reducing range anxiety. The Order **contravenes** market-enabled decision-making and customer choice, given its disqualification of the one OEM that is serving the bulk of EV drivers on the roads today.

Having utterly failed to explain how the decision will further the Commission’s REV principles, the Order’s re-definition of “publicly available” lacks a rational basis.

5. The Commission’s Factual Error Heightens the Discriminatory Nature of its Decision and Constitutes Further Evidence of its Lack of Rational Basis

The Commission’s sole effort to justify its exclusion of Tesla and Tesla customers rests on its assumption that Tesla EVs drivers will be able to avail themselves of non-Tesla plugs.⁴¹ Presumably, the Commission believes that if Tesla EV drivers can charge at non-

⁴¹ See Order, p. 45 (“ . . . some Tesla vehicles can connect to CHAdeMO DCFC plugs with an adaptor.”)

Tesla plugs, they too can benefit from reduced range anxiety, regardless of who installed the plug.

The Commission errs. The Tesla Model 3, the best-selling EV in 2018 that comprised approximately 60% of all DC fast charging capable vehicle sales, cannot currently utilize the CHAdeMO adapter. The Tesla-CHAdeMO adapter is currently only available for Model S and Model X vehicles. The adapter costs \$450 for customers to purchase, and a small percentage of Tesla customers have elected to purchase the adapter.

The Commission states in its Order that Tesla will become eligible for the per plug incentive when chargers are “coupled with plug types that enables use by EVs with Asian and European charging systems,” but footnote 29 adds it is not prescribing *which* charging technology Tesla should deploy (i.e., CHAdeMO versus SAE CCS).⁴² However, the Commission is prescribing that Tesla deploy *another* technology other than its own. Doing so imposes an unreasonable burden on Tesla. To qualify, Tesla would be required to either create an entirely new business segment at a significant cost that can service, manage and bill drivers of other OEMs, or would require Tesla to find willing partners to co-develop sites.⁴³ While Tesla has worked with other network operators to co-locate stations, opportunities are likely limited for this program. Some operators are interested in locating chargers at *existing* Tesla stations. In those circumstances, the other operators’ chargers would be eligible for the incentive because they are new stations, but Tesla’s chargers would be ineligible because they are *existing* stations. Moreover, not all charging operators have the same market needs at a given time. For example, one operator may already have a

⁴² See Order at p. 44.

⁴³ It is important to note that Tesla does not sign exclusive arrangements with site hosts that would bar other network operators from deploying stations at the same location.

market or area sufficiently covered and not have resources, interest or a sufficient customer demand to develop additional stations.

Furthermore, the Commission imposing a requirement for a charging provider to change their business model and to deploy specific technologies is inconsistent with the Commission's Declaratory Ruling in 13-E-0199 which declared "The Public Service Law does not provide the Commission with jurisdiction over (1) publicly available electric vehicle charging stations; (2) the owners or operators of such charging stations, so long as the owners or operators do not otherwise fall within the Public Service Law's definition of 'electric corporation;'. . . ."⁴⁴

If Tesla is dissuaded from investing in charging stations to serve its customers, fewer EVs might be purchased in New York, putting New York's ZEV goals further out of reach. Thus, the policy outcome of the Commission's decision is counter-productive. Such error in fact warrants reversal and remand.

Conclusion

For the reasons set forth herein, the Order should be reversed and remanded.



Kevin Auerbacher,
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⁴⁴ Declaratory Ruling on Jurisdiction Over Publicly Available Electric Vehicle Charging Stations. Case 13-E-0199. Issued November 22, 2013.

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July 10, 2019

Delaware Public Service Chairman & Commissioners
Dr. Rajnish Barua, Executive Director
861 Silver Lake Boulevard
Cannon Building, Suite 100
Dover, DE 19904

Dear Chairman, Commissioners, and Executive Director Barua:

On behalf of Tesla, Inc., ("Tesla") I am writing to express opposition to the Delaware Public Service Commission ("PSC" or "the Commission") Staff's petition to the Commission to inform all known entities providing a public electric or gas charging service of the need to secure a Certificate of Public Convenience and Necessity ("CPCN") and to seek approval of rates to be charged to customers.

Regulating EV charging service providers as public utilities is unprecedented and unwarranted in the United States. The consequences of issuing the Staff's proposed public notice are substantial and should not be taken lightly. The notice would immediately and negatively impact the electric vehicle ("EV") charging industry and EV drivers in Delaware and throughout East Coast that rely on convenient public charging stations. Requiring a CPCN is not in the public interest, would lead to unnecessary costs and burdens for EV service providers, and potentially lead to a halt in charging station operation and future development. It would almost certainly lead to contraction in publicly accessible stations at a time of growing need for access to EV charging, as well.

In its petition, Staff states that even though it believes a legislative exception to the definition of "Public Utility" (*26 Del. C. § 201(d)(1)*) is appropriate for electric vehicle charging, Staff is not "at liberty to pick and choose which Delaware laws to follow." Tesla disagrees with this characterization of Staff's dilemma. There is no pressing statutory directive to treat electric vehicle charging as if it were the same thing as an investor owned utility. On the contrary, this is a strained attempt to shoehorn electric vehicle charging into the public utility legal construct. As Tesla will show below, *26 Del. C. § 201(d)(1)* cannot be read alone to require this extreme application of a statute that is not meant to apply to electric vehicle charging. Other Title 26 statutory provisions related to the rights, responsibilities, and characteristics of public utilities make it clear that electric vehicle charging is not contemplated within the public utility legal definition because those provisions could not physically apply to electric vehicle charging stations. At best, there is ambiguity and conflict amongst Title 26 provisions, but that is not the same thing as a clear directive that electric vehicle charging stations should be classified as public utilities. Such an outcome would be bad public policy, spurned by an equally bad interpretation of legislative inaction on the issue.

Tesla respectfully requests that the PSC issue another order delaying Staff's public notice request until June 30, 2019 to allow for legislative clarification, in accord with the Electric Vehicle Charging Association's July 9, 2018 comments. As the Electric Vehicle Charging Association aptly noted, the legislative clarification that Staff and others previously sought on this point was well on the way to successful passage into law. It failed only due to time constraints and not as a matter of substantive policy. The Commission should not follow the legislature's effort by then seeking to enact a policy

contrary to the legislature's efforts. As stated above, the outcome would devastate the industry and its customers. There is no need for this, the law does not demand it, and it would serve no public good.

In the alternative, Tesla asks the Commission to treat such proposed action as a formal rulemaking to create a regulation.¹ This action should be governed by the Delaware Administrative Procedures Act, requiring notice and opportunity for comment *prior* to any Commission action.² There is great need for a deliberate and thoroughly developed approach to this proposal. Staff's proposal would be a novel and dramatic departure from the application of the regulatory construct to the EV industry. Further, the public utility law construct is incompatible with multiple practical aspects of electric vehicle charging stations; therefore, to simply declare that EV charging is synonymous with public utilities would wreak havoc and create tremendous uncertainty. Clarity is needed before proceeding down this unorthodox and unprecedented path.

Ultimately, Tesla strongly opposes the regulation of electric vehicle charging as a public utility for a variety of legal and policy reasons. Tesla again respectfully requests that Staff and the Commission reconsider this proposal for the reasons below.

I. When read in conjunction with other statutes related to the public utility framework, it follows that electric vehicle charging stations cannot be public utilities.

Entities that provide EV charging services and other businesses implicated by the PSC Staff's broad interpretation do not act as public utilities and cannot reasonably meet the requirements of public utilities as set forth in other sections of Delaware Code, including *26 Del. C. § 203B(a)* which states that:

"Subject to the provisions of § 202 of this title, the Commission shall, upon notice and after hearing, establish boundaries throughout the State within which public utilities providing retail electric service shall have the obligation and authority to provide retail electric service..." (emphasis added)

Setting aside the unreasonable endeavor of establishing service territories for public EV charging providers in the CPCN process, charging providers are not equipped to provide retail electric service. For example, assuming an EV charging provider's service territory is a parking lot and adjacent property housing charging equipment, the provider would be obligated to provide retail electric service to a customer that chooses to build a store in the parking lot.

The equipment EV charging providers operate can only charge electric vehicles. The operators do not provide electric service for all inhabitants and electrical equipment within the area they operate.

¹ 29 Del. C. § 10102(7) "Regulation" means any statement of law, procedure, policy, right, requirement or prohibition formulated and promulgated by an agency as a rule or standard, or as a guide for the decision of cases thereafter by it or by any other agency, authority or court. Such statements do not include locally operative highway signs or markers, or an agency's explanation of or reasons for its decision of a case, advisory ruling or opinion given upon a hypothetical or other stated fact situation or terms of an injunctive order or license.

² 29 Del. C. §§10111-10118.

Instead EV operators serve a limited number of consumers that have invested in electric vehicles, including consumers that reside in other States but happen to drive and charge their vehicles in Delaware.

It is clear from other statutes explaining the rights and responsibilities of electric utilities that electric vehicle charging stations are simply not public utilities. Their functions and characteristics are wholly distinct. The Commission should not seek to force EV charging into this definition.

II. Public EV charging is a service provided by competitive enterprises operating under a variety of business models, and the enterprises are not operating as public utilities.

According to the U.S. Department of Energy, there are more than 35 charging stations and over 100 public EV charging plugs in Delaware.³ Some public charging stations are available for free, others are available with parking or time-based fees. Every charging station owner and/or operator is a *retail customer* of a Delaware investor owned utility, co-op, or municipal utility and are not themselves a utility or electric supplier.

Tesla owns and operates three Supercharger stations with 28 stalls in Delaware that provide Tesla customers with a convenient fast charging experience. In stark contrast to a utility's cost-plus business model, Tesla provides Supercharging services at a price *below* its own costs of services and does not intend for Supercharging to be a profit center. In addition to Supercharger stations, Tesla works with local businesses to install public Level 2 charging stations.

Admittedly, *26 Del. C. § 102(2)*, on its face, is a broadly-written statute; however, the logical conclusion of the application of this statute that Commission Staff is considering here would have an absurd outcome for many businesses in Delaware, not just EV charging operators. For example, businesses including hotels and restaurants that offer free EV charging would be considered public utilities and also be required to obtain a CPCN.

26 Del. C. § 203B(h)(1) states that "A retail electric customer has the right to lease or own (satisfied by partial ownership) facilities on its own property *to transmit or distribute electricity to itself.*" (emphasis added). A potential outcome of this is any retail electricity customer that allows the public to utilize electrical outlets on its property would be considered a public utility. This would ensnare a variety of businesses as public utilities, including airports and cafes that offer public cell phone charging, or automobile mechanics and road service companies that charge a dead 12 volt car battery.

III. Regulating EV charging service providers as public utilities is unreasonably burdensome and would lead to unintended consequences counter to public interest.

26 Del. C. § 114 includes a schedule of charges, fees, and expenses of proceedings. Each CPCN carries a fee of \$750, which is more than some charging stations cost. And given the uncertainty of potential service territories, each charging station in the State may be required to file separate requests for CPCN. Since the rates EV charging operators bill customers would also require Commission approval,

³ Department of Energy Electric Vehicle Charging Station Locations. See https://www.afdc.energy.gov/fuels/electricity_locations.html#/analyze?fuel=ELEC®ion=DE

the operators would be subject to additional fees to file a rate petition (\$50-\$100). Moreover, the operators would also be required to pay expenses incurred by the Commission, its agents, and the Division of Public Advocate associated with rate proceeding in accordance with *26 Del. C. § 114(b)(1)*.

Deeming EV charging operators as a public utility would significantly increase site development timelines and costs. Regulation as a public utility would likely limit the availability of public charging stations in the State just as EVs are becoming more prevalent. Electric vehicles provide a variety of benefits, including lower operating costs for drivers, and zero direct greenhouse gas and ozone emissions. Stymieing the growth of EVs and EV charging stations will limit the accrual of these benefits in Delaware.

To the extent that Delaware seeks to expand access to electric vehicles to meet the objectives of the Delaware Low Emission Vehicle Program (*7 Del. C. § 1140*), classifying EV charging as a utility greatly frustrates that goal.

IV. Regulating EV charging service providers as public utilities is unprecedented and unwarranted in the United States.

Over twenty states have formally determined that EV charging services are not public utilities, and no State has taken an action similar to the PSC Staff's interpretation of Delaware Code and recommendation that EV charging providers seek a CPCN.

Most recently, the Alabama PSC initiated a generic proceeding in October 2017 to determine their jurisdiction over electric vehicle charging stations. The Alabama Commission issued an order on June 22, 2018 that concluded a person who owns, operates, leases or controls EV charging equipment is not a public utility.⁴ The Alabama Commission noted that they could not "...discern a circumstance where *the operation of an [electric vehicle charging station], in and of itself*, gives rise to utility status or implicates the jurisdiction of this Commission."⁵

To be clear, the Delaware PSC Staff's proposal would be not only be detrimental to electric vehicle drivers and companies, but would also be contrary to every other U.S. jurisdiction's legal treatment of the issue.

V. The PSC should issue an order delaying Staff's public notice request until at least June 30, 2019, or initiate a docket upon its own motion to forbear from regulation of EV charging stations in accordance with *26 Del. C. § 201(d)*.

On August 2, 2017, the PSC Staff submitted a petition requesting the Commission authorize public notice for electric charging station operators to file applications for a CPCN. The Commission issued an order delaying Staff's petition and approved the Department of Natural Resources and Environmental Control's recommendation that parties coordinate on draft legislation to be submitted to the Delaware General Assembly.⁶ Legislation passed the Senate and the committee of jurisdiction in

⁴ See Alabama Public Service Commission Docket No. 32694: "Generic Proceeding to Determine the Commission's Jurisdiction Over Electric Vehicle Charging Stations."

⁵ Ibid. at pg. 7.

⁶ See Delaware PSC Order No. 9110 in PSC Docket No. 17-0933.

the House. Unfortunately, the House did not take up the bill for a vote before their session ended, and therefore the bill did not pass.

In both of its 2017 and 2018 petitions, the Staff notes that it believes in exceptions are appropriate for EV charging service providers.⁷ Given Staff's position, and lack of clear applicability to public utility regulations, Tesla recommends that the Commission delay public notice until June 30, 2019, or under its own motion, forbear EV charging operators from its supervision and regulation. Title 26 Del. C. § 201(d)(1) states:

“In the exercise of supervision and regulation over public utilities other than those that provide telecommunications services, the Commission may, upon application or on its own motion, after notice and hearing, **forbear from ("deregulate") in whole or in part, its supervision and regulation over some or all public utility products or services and over some or all public utilities where the Commission determines that a competitive market exists for such products and services and where the Commission finds that such deregulation will be in the public interest.**” (emphasis added)

Such a forbearance is appropriate and in the public interest given public EV charging has operated in a competitive environment, the importance of public EV charging stations to supporting the growth of EV adoption, and the negative implications that utility regulation would have on site hosts and businesses operating in Delaware.

VI. If the Commission wishes to proceed with Staff's recommendation, interested parties must first be afforded the opportunity to build a public record.

If this issue is to be addressed by the Commission, the Commission must apply formal Delaware Administrative Procedures Act rulemaking procedures and protections to create a regulation.⁸ Notice and opportunity for comment on Staff's proposal *prior* to any Commission action is required.⁹

While the decisions of other State Commissions are not applicable to operations in Delaware, it is nonetheless important for the Delaware Commission to note the national precedent and procedures others Commissions have established. The Alabama Commission and others around the country have held open processes, generic proceedings, or adjudicated proceedings in order to determine whether EV charging services are public utilities. Issuing notices to public EV charging providers to seek CPCN does not afford those providers with due process. To the extent that Commission Staff is concerned about the Commission's action or inaction subsequent to a lack of legislative guidance on this point, a

⁷ See Docket No. 17-0933 “Petition of the Delaware Public Service Commission Staff Seeking Commission Authority to Notify Known Delaware Electric and Natural Gas Charging Services of the Requirements of Delaware Public Utility Law” pg. 3. And See Staff's draft 2018 letter.

⁸ 29 Del. C. § 10102(7) "Regulation" means any statement of law, procedure, policy, right, requirement or prohibition formulated and promulgated by an agency as a rule or standard, or as a guide for the decision of cases thereafter by it or by any other agency, authority or court. Such statements do not include locally operative highway signs or markers, or an agency's explanation of or reasons for its decision of a case, advisory ruling or opinion given upon a hypothetical or other stated fact situation or terms of an injunctive order or license.

⁹ 29 Del. C. §§10111-10118.

well-developed record that analyzes the legal issues involved by interested parties will work to inform the issue substantially.

Given the broad definition of “public utility”, the implications that regulation would have on an EV charging operator’s business and property, the right to due process is critically important. We recommend that the Commission seek to develop a public and evidentiary record before implementing Staff’s recommendation. However, the preferred outcome would be no action by this agency so that the legislature can provide the clear exception sought.

Tesla appreciates the opportunity to share these positions at the Commission’s public meeting, and welcomes further dialogue the Commission, PSC Staff, and other stakeholders to resolve this important issue.

Sincerely,

A handwritten signature in black ink, appearing to read 'P. Bean', enclosed within a large, loopy oval stroke.

Patrick Bean
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