

August 3, 2022

Daniel C. Goldner, Chair New Hampshire Public Utilities Commission 21 South Fruit Street, Suite 10 Concord, NH 03301

RE: DE 21-078: Electric Vehicle Make Ready and Demand Charge Alternative

Comments by ReVision Energy, Inc.

Dear Chair Goldner,

Thank you for granting ReVision Energy intervenor status in DE 21-078.

ReVision Energy supports the settlement agreement and urges the commission to approve it by the requested deadline of August 15th.

Our **EV Charging Station Demand Charge Economic** spreadsheet submitted on April 4th, 2022 aptly illustrates that even with significant grant funding (e.g. from the VW settlement trust) providing up to 80% of project costs, return on private investment is not possible even with optimal utilization rates. Any additional utility-based infrastructure investment and demand charge reduction would dramatically assist in making such projects viable, particularly in rural New Hampshire where utilization rates will take longer to grow adequate revenue.

Transportation electrification represents one of the most massive transitions ever undertaken by the energy sector. It poses a direct threat to entrenched fossil fuel interests and as such is not operating on a level playing field given the resources opposing it. Nonetheless as a form of disruptive innovation, it is clear that its many benefits to rate payers and society outweigh the short-term investment needed to help it be successful, and despite headwinds has continued to make progress. Just two weeks ago the U.S. light duty market reached a milestone where 5% of all new car sales had plugs. Every major car manufacturer is in the midst of massive investment to re-tool facilities and grow new supply chains in anticipation of this impending shift. Charging infrastructure is the flip side of the same coin and NH vehicle sales depends on driver's ability to charge. Public charging infrastructure is one area New Hampshire must grow investment in to keep up with this shift in sales, for the sake of its citizens and tourism related industries. Utility make-ready programs and providing some form of demand charge relief are proven tools that can dramatically assist growth of these resources, hastening private investment, raising utilization rates, and ultimately creating a self-sustaining charging ecosystem without need for future public subsidies.

Public and workplace charging is particularly essential to make EV ownership possible and affordable for low to moderate income households that may not have ready access to charging, especially if they live in an apartment, park on a street or rent their home. These are the same households who spend a disproportionate amount of their household budgets on energy. With



electricity costs saving consumers that drive electric approximately \$1000 per year over what they would spend on gasoline. See EPA.gov Fuel economy website comparing a Nissan LEAF EV to a similar sized gas fueled Nissan Sentra (15,000 miles/year \$4.50/gallon). Please note that the average price for a new vehicle in May according to Kelley Blue Book was \$47,148. A new Nissan LEAF (before a \$7500 federal tax credit) ranges from MSRP \$27,400-28,800. The combined operations and maintenance savings make investing in plug in vehicles <u>substantially</u> more affordable than gas powered vehicles. Also, to make EVs more accessible, US Congress is currently considering legislation (The Inflation Reduction Act) that will include a \$4000, at the point-of-sale federal tax credit for used EVs purchased by low-income residents. In addition, 1. the Union of Concerned Scientists recently released a study showing driving electric reduced greenhouse gases by roughly half. UCS analysis finds that over its lifetime—from manufacturing to operation to disposal-the average new battery electric vehicle produces roughly half the global warming pollution than a comparable gasoline or diesel vehicle. Based on the most recently available data on power plant emissions and EV sales, driving the average EV in the United States produces global warming emissions equal to a gasoline vehicle that gets 91 miles per gallon. It is worth noting that EVs become cleaner as time passes and more renewable power generation is added to the grid and used to charge EVs.

These benefits only begin to scratch the surface of what is possible as a result of transportation's shift to electricity. The battery storage provided by electric vehicles, such as school buses, can be harnessed by utilities to supplement their power needs during peak load. Ford's F-150 pick up has captured the imagination of contractors, who can use it for their power tools, and homeowners, who can use it for an emergency back up during power failures and with vehicles sitting idle overnight, most drivers can charge off peak overnight. The reality will be that *ALL* Eversource ratepayers and New Hampshire residents will share in the financial and environmental benefits of EV ownership - *IF* the state assists in creating widespread and affordable public charging.

We fully support this settlement as it will create a foundation of fast charging stations in Eversource territory on highway corridors to enable travel into and throughout the state. The demand charge alternative will help stabilize operational losses during the initial years of low utilization. Furthermore, by limiting the number of eligible accounts and the enrollment period, private developers will step up and commit to early investments – and many of these project developers will employ clean energy workers that live in New Hampshire. There is much good in this proposal.

Ultimately, DE 21-078 is a critical first step for the state of New Hampshire in its journey to join the new energy economy. We still need to deploy many more chargers in every county and municipality to enable EV drivers to stay, live, work and recreate. We still need a broader utility make ready program in all regulated utility service territories that would not be limited to the VW RFP funded sites and would also assist in the install of Level 2 stations. When combined with federal funding and federal tax credits these actions would encourage more long-term private investment, accelerate a competitive business environment and enable New Hampshire communities and business owners to make charging accessible to a broader group of state citizens, thus increasing their freedom to choose from more affordable transportation options.



We wholeheartedly encourage you to approve DE 21-078 as soon as is possible

Sincerely,

/s/ James Penfold

James Penfold Director, eMobility Solutions ReVision Energy 7 Commercial Drive Brentwood, NH 03833

1. *Driving Cleaner* | Union of Concerned Scientists (ucsusa.org): How Electric Cars and Pick-Ups Beat Gasoline on Lifetime Global Warming Emissions by <u>David Reichmuth</u>, <u>Jessica Dunn</u>, <u>Don Anair</u> Published Jul 25, 2022