

The REC First Year Marked by Achievement

Launched in the Spring of 2020, the <u>NEMA Rail Electrification Council</u> (REC or Council) promotes the adoption of electricity as the main motive power of domestic railroad for freight and passenger transportation and use of railroad rights-of-way as pathways to electric grid integration and innovation. Since its launch, the REC has been quite active.

The Council has published its first whitepaper entitled <u>The Value of Rail Electrification</u>, a discussion paper that objectively provides the challenges associated with rail electrification, its potential advantages, and a path forward to achieve those benefits.

The Council submitted comments to the Federal Energy Regulatory Commission (FERC) proposing incentives for transmission developed along railroad rights-of-way and other brownfield locations. By doing this, the Commission would be employing its rate making and planning authorities to foster a real solution to the problems associated with siting of major interregional or inter-market electric transmission facilities.

The Council wrote a key piece to the recently released official 2021 Rail Plan authored by the Department of Transportation (DOT) of Nevada. In the plan, the REC recommended that Nevada examine an electrified rail system's economic, operational, and environmental benefits. These electrification ideas reflect steps toward implementing the <u>Nevada Governor's Executive</u> <u>Order</u>, which calls for "support for transportation electrification and demand management, including infrastructure, fleet procurement, alternative funding mechanisms, and other programs."

Over the year, the Council has conducted several open meetings. These featured several guest speakers, including Nick Little, the Director Railway Education in the Center for Railway Research and Education at Michigan State University; Clair Moeller, the President and CEO from the Midcontinent Independent System Operator (MISO) and Regional Transmission Organization, Steve Frenkel the Vice President of Direct Connect a transmission company responsible for the SOO Green HVDC Link Project, and a panel of representatives from Amtrak, BNSF Railway, Canadian National, and the California High-Speed Rail Authority.

The Council is moving forward in 2021 by forming three important committees that address fundamental areas of rail electrification. The Wayside Committee will look at trackside infrastructure electrification (e.g., power management, signaling, switching) and integrating trackside renewables such as solar panels and energy storage. The Power Sources Committee will focus on access to railroad rights-of-way and the relationship of transmission providers and developers to the rail network. Finally, the Motive Power Committee will address the transformation of rolling stock fueling power to clean energy alternatives. It will investigate the

technological obstacles and alternatives for electrification (e.g., grid power, battery storage, catenary systems, and the potential of hydrogen fuel cells).

With the new presidential administration now focusing on infrastructure investment and transportation electrification, rail electrification and grid integration are now front and center. The REC looks forward to being an active participant as this moves forward.

Participation in the REC is open to any interested organization. If you are interested in joining, contact NEMA Industry Director Steve Griffith at steve.griffith@nema.org.