UNITED STATES OF AMERICA BEFORE THE FEDERAL ENERGY REGULATORY COMMISSION

Building for the Future Through)	RM21-17-000
Electric Regional Transmission)	
Planning and Cost Allocation)	
and Generator Interconnection)	

COMMENTS OF THE AMERICAN COUNCIL ON RENEWABLE ENERGY

The American Council on Renewable Energy ("ACORE"), a national nonprofit organization dedicated to advancing the critical importance of renewable energy and to advocating for the market structures, policy changes and financial innovations designed to advance renewable energy deployment, hereby submits these comments in response to the Federal Energy Regulatory Commission's ("FERC" or "Commission") April 21, 2022 Notice of Proposed Rulemaking, issued in the above-captioned proceeding, which seeks comments on proposed reforms to remedy deficiencies in the regional transmission planning and cost allocation requirements.¹

I. SUMMARY OF COMMENTS

ACORE greatly appreciates the Commission's issuance of this proposed rule, which is a critical step towards the achievement of much needed improvements to the regional transmission planning process. The Commission is correct in its finding that reforms are needed to its electric regional transmission planning and cost allocation requirements. ACORE strongly supports the centerpiece of the proposed rule – the requirement for transmission providers to conduct long-term transmission planning to meet transmission needs driven by projected changes in the resource mix and demand, using multiple scenarios and a minimum 20-year horizon. In these

¹ Building for the Future Through Electric Regional Transmission Planning and Cost Allocation and Generator Interconnection, Docket No. RM21-17-000, 179 FERC ¶ 61,028 (2022) ("NOPR").

comments, ACORE recommends improvements in the final rule, including the establishment of a minimum set of benefits for all transmission planning and cost allocation; greater stringency in the consideration of key drivers; the use of a portfolio-based approach; and the incorporation of a wider scope of grid-enhancing technologies. These reforms should apply not just to Regional Transmission Organizations and Independent System Operators (RTOs/ISOs) but to all transmission providers to maximize the achievable benefits.

With the passage and signing of the Inflation Reduction Act of 2022, many analysts are projecting a dramatic acceleration of the growth of clean energy resources.² It is essential that the needed transmission is built to deliver those resources to consumers and achieve the resulting reductions in greenhouse gas emissions.

II. NEED FOR REFORM

The Commission has correctly identified the need for improvements to regional transmission planning. Moreover, as discussed in detail in the comments of Americans for a Clean Energy Grid on this NOPR, the Commission clearly has the legal authority and responsibility to require these reforms to the transmission planning process.

As ACORE stated in its comments on the Advance Notice of Proposed Rulemaking in this docket,³ long-term systemic reforms to the transmission planning process are needed to

² See for example, Jesse D. Jenkins, Erin N. Mayfield, Jamil Farbes, Ryan Jones, Neha Patankar, Qingyu Xu, Greg Schivley, REPEAT Project, *Preliminary Report: The Climate and Energy Impacts of the Inflation Reduction Act of 2022* (August 2022) at 15, projecting "annual additions increasing from 15 GW of wind and 10 GW of utility-scale solar PV in 2020 to an average of 39 GW/year of wind additions in 2025- 2026 (~2x the 2020 pace) and 49 GW/year of solar (~5x the 2020 pace), with solar growth rates increasing thereafter." Available at:

https://repeatproject.org/docs/REPEAT_IRA_Prelminary_Report_2022-08-12.pdf

³ Building for the Future Through Electric Regional Transmission Planning and Cost Allocation and Generator Interconnection, 176 FERC ¶ 61,024 (2021) ("ANOPR").

holistically evaluate potential transmission investments and proactively plan for not just future load but also future generation.⁴

ACORE strongly agrees with the Commission's finding that the following shortcomings in the current transmission planning and cost allocation processes produce unjust, unreasonable, unduly discriminatory, and preferential Commission-jurisdictional rates:⁵

- Current planning methods fail to identify transmission needs driven by changes in the resource mix and demand, which reduces the likelihood that needed transmission will be built.⁶
- Customers may be forced to pay for less efficient or cost-effective investment in transmission facilities than would otherwise be achieved with long-term, more comprehensive regional transmission planning and cost allocation."⁷
- A disproportionate share of transmission is being built for local needs, not the more expansive regional and interregional facilities needed to integrate the new resource mix and provide reliability benefits. These local projects are developed outside the regional transmission planning and cost allocation processes, resulting in less efficient and cost-effective transmission development.⁸ As ACORE pointed out in its ANOPR comments, "while these local projects may be preferred by utilities, they are clearly insufficient to address the larger needs of the transmission system."

⁴ ACORE Initial ANOPR Comments (October 2021) at 6.

⁵ NOPR at P 34.

⁶ NOPR at P 33 and 35.

⁷ NOPR at P 33.

⁸ NOPR at P 36 and 40.

⁹ ACORE Initial ANOPR Comments at 22.

- The use of interconnection-related network upgrades to drive transmission expansion, a piecemeal process unlikely to identify the most efficient or cost-effective transmission facilities. ACORE's ANOPR comments noted that the current approach "not only chronically underestimates future renewable generation, but the timing mismatch—whereby new transmission construction can require significant lead time, yet interconnection customers are often expected to achieve commercial operation on shorter timelines or risk termination of their interconnection agreements—is another hindrance to renewable generation development."
- The allocation of the costs of transmission facilities selected in the regional transmission plan is not done in a manner to ensure that allocation is at least roughly commensurate with the estimated benefits.¹²

These shortcomings identified by the Commission are in line with both ACORE's ANOPR comments, and the following conclusion reached by The Brattle Group and Grid Strategies LLC in their recent assessment of transmission planning:

Most of the planning processes used today result in inefficient investments that increase total system-wide costs. The narrowly focused current approaches do not identify opportunities to take advantage of the large economies of scale in transmission that come from "up-sizing" reliability projects to capture additional benefits, such as congestion relief, reduced transmission losses, and facilitating the more cost-effective interconnection of the renewable and storage resources needed to meet public policy goals. Neither do the narrowly focused approaches identify investments that create option value by increasing flexibility to respond to changing market and system conditions. For example, in-kind replacement of aging existing facilities misses opportunities to better utilize scarce rights-of-way for upsized projects that can meet multiple other needs and provide additional benefits, thus driving up costs and inefficiencies. And the current piecemeal approach certainly does not yield any larger regional or interregional solutions,

¹⁰ NOPR at P 36.

¹¹ ACORE Initial ANOPR Comments at 25.

¹² NOPR at P 35.

such as transmission overlays, that could more cost-effectively address the nation's public policy needs. ¹³

With such needs for improvements to transmission planning in mind, the remainder of these comments address the specific reforms proposed by the Commission.

III. TRANSMISSION PLANNING REFORMS

ACORE commends the Commission for the overall framework of the proposed transmission planning reforms, including the identification of transmission needs driven by changes in the resource mix and demand through the development of Long-Term Scenarios; evaluation of the benefits of regional transmission facilities to meet these needs over a minimum time horizon of 20 years from the in-service date; establishment of transparent and not unduly discriminatory criteria to select transmission facilities in the regional transmission plan for purposes of cost allocation that more efficiently or cost-effectively address these transmission needs in collaboration with states and other stakeholders.¹⁴

While this overall framework represents a vast improvement in regional transmission planning, ACORE recommends further changes in the final rule as described in these comments. As the Commission correctly points out, these reforms proposed here will create greater efficiencies and save costs for consumers – goals must be kept in mind when evaluating where there is room for improvement in the final rule.

With regard to cost savings, in his dissent, Commissioner Christies asserts: "States did not join RTOs to pay for other states' public policies or to pay for the public policy goals of huge

¹³ Pfeifenberger, et al, "Transmission Planning for the 21st Century: Proven Practices That Increase Value and Reduce Costs," (October 2021) at 3, available at: https://acore.org/transmission-planning-for-the-21st-century/.

¹⁴ NOPR at 69.

multinational corporations or asset managers."¹⁵ But transmission can have multiple benefits outside of delivering power from an individual resource or resources, and such a viewpoint reduces opportunities to determine the full scope of the benefits. The goal of the planning improvements proposed here is precisely to determine the optimal transmission mix and allocate those costs according to the multiple benefits provided.

The below chart prepared by The Brattle Group and Grid Strategies LLC, using data from an analysis by researchers from the Massachusetts Institute of Technology demonstrates such cost savings. ¹⁶ Given the clear benefit of reforming transmission planning, ACORE's recommendations in these comments aim to maximize the benefits achievable from these reforms.



FIGURE 3. ELECTRICITY SYSTEM COSTS BY TYPE AND TRANSMISSION PLANNING SCENARIO

¹⁵ Commissioner Christie dissent at P 13.

¹⁶ Pfeifenberger et al (2021) at 12, using data from P. R. Brown and A. Botterud, *The Value of Inter-Regional Coordination and Transmission in Decarbonizing the US Electricity System*, Joule, Vol. 5, No. 1, at 115–134, January 20, 2021.

A. <u>Separate treatment of reliability, economic and public policy projects creates</u> inefficiencies in the planning process.

The Commission proposes to retain the current planning processes for reliability and economic projects while subjecting only public policy projects to the long-term regional transmission planning (LTRTP) reforms. ¹⁷ ACORE recognizes that near-term reliability planning will need to continue, such as for compliance with North American Electric Reliability Corporation (NERC) requirements, but doing so does not negate consideration of reliability benefits within the LTRTP as doing so may provide opportunities for potential right-sizing of those projects where possible.

The need for a more formal integration of these multiple benefits is apparent in the Commission's acknowledgement that it is possible that transmission facilities selected in a regional transmission plan to address public policy needs "may provide near-term reliability or economic benefits and thus potentially displace facilities that are under consideration as part of existing regional transmission planning processes." Moreover, the Commission acknowledges that these separate approaches "will likely inform each other" but does not propose any requirements for incorporating the shorter-term reliability and economic planning exercises in LTRTP. Instead, the Commission asks transmission providers to "explain on compliance how the initial timing sequence for LTRTP interacts with existing regional transmission planning efforts." Rather than present the transmission providers with a lack of structure, the Commission should instead require that both the short-term and long-term planning processes

¹⁷ NOPR at 72 and 73.

¹⁸ NOPR at 253.

¹⁹ *Id*.

²⁰ *Id*.

evaluate the same set of multiple benefits. Doing so would achieve the cost savings identified as a key driver for the reforms proposed in this NOPR. As explained by The Brattle Group and Grid Strategies LLC:

When transmission planning is based only on identifying least-cost transmission solutions for single drivers—such as generation interconnection and other reliability needs, economic and market efficiency needs, or public policy needs—these economies of scope provided by larger regional projects capable of simultaneously addressing multiple needs at both the regional and local transmission system levels are not captured, unreasonably raising system-wide electricity costs and rates.²¹

For example, two solutions to address a particular reliability need may offer vastly different total system-wide benefits. Thus, the higher-cost transmission solutions can actually result in significantly lower net cost from a system-wide perspective. ²²

B. Best available and consistent data inputs should be utilized in the long-term plans.

The proposed rule gives the transmission providers flexibility as to how they incorporate many transmission drivers into their LTRTP, which could lead both to an undercounting of future transmission needs and a lack of consistency in the planning processes. Specifically, the Commission proposes to require the inclusion of federal, state, and local laws and regulations, state-approved integrated resource plans and expected supply obligations for load serving entities; to provide "flexibility" on the incorporation of trends in technology and fuel costs, resource retirements, and generator interconnection requests and withdrawals; and that "it may be appropriate to discount" utility, corporate federal, state, and local goals.²³

First, allowing "flexibility" for certain trends can result in a wide range of assumptions and inconsistency between transmission providers. Given the multiple public sources of information available, the Commission can identify common resources to be used for the

²¹ Pfeifenberger et al (2021) at 21.

²² *Id.* at 30.

²³ NOPR at P 106-109.

establishment of scenarios based on different trends in fuel and technology costs, along with other factors, ²⁴ resources in the interconnection queues and withdrawal rates, ²⁵ and projected retirements. ²⁶ Another useful resource is the Department of Energy's National Transmission Planning Study which will be utilizing a set of linked modeling exercises that project generation expansion, distributed resource development and end-use demand, along with a model of the power system flows with a probabilistic assessment of resource adequacy and resilience. ²⁷ While this study focuses more on interregional transmission and will not replace the transmission provider planning processes, ²⁸ it is one example of myriad sources of data to support those analyses.

Second, the recommended discounting of certain goals can understate significant drivers of the growing need for transmission expansion -- voluntary procurement of renewable resources by corporations, ²⁹ local governments, and utilities³⁰ all of which can be significant drivers of resource development.

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²⁴ For example, Cole et al., National Renewable Energy Laboratory, 2020 Standard Scenarios Report: A U.S. Electricity Sector Outlook, available at: https://www.nrel.gov/docs/fy21osti/77442.pdf;;

²⁵ For example, Rand et al., Lawrence Berkeley National Laboratory, *Queued Up: Characteristics of Power Plants Seeking Transmission Interconnection As of the End of 2021*, available at: https://emp.lbl.gov/queues

²⁶ For example, US Electricity Information Administration, *Electric Power Monthly*, Table 6.6 – Planned U.S. Electric Generating Unit Retirements; available at: https://www.eia.gov/electricity/monthly/epm_table_grapher.php?t=table_6_06

²⁷ See, US Department of Energy - National Transmission Planning Study, Technical Review Committee Meeting #1 (May 20, 2022), Slide 36, available at: https://www.energy.gov/sites/default/files/2022-05/TRC%205.20%20Compiled%20Slide%20Deck web.pdf

²⁸ *Id.*, Slide 7, stating that the study will not "Replace existing regional and utility planning processes," but will "Inform existing planning processes."

²⁹ See the CEBA Deal Tracker at https://cebuyers.org/deal-tracker/

³⁰ See for example, Edison Electric Institute's map with links to individual utility goals, available at: https://www.eei.org/issues-and-policy/clean-energy; and *Historic climate bill faces state schism on clean energy*, EnergyWire, August 8, 2022, noting that: "According to the Edison Electric Institute, 39 electric

Such flexibility and discounting may reduce the projected renewable energy development and/or understate retirements, impeding the Commission's goal of ensuring that transmission is developed where most needed. Moreover, a lack of consistency in how these drivers are considered among transmission providers can adversely impact interregional transmission planning, already in need of improvement, as discussed later.

C. <u>Scenario planning with probabilistic assessments is an essential component of long-term transmission planning.</u>

ACORE strongly supports the proposed requirement for at least a 20-year horizon for transmission planning, the use of at least four scenarios, and revisions to those scenarios at least once every three years.³¹ These provisions in the NOPR reflect ACORE's recommendation in its ANOPR comments that transmission planning "should more proactively consider future generation in addition to future load and use a 20-year planning horizon, that could be updated biannually."³²

Uncertainties in data do not require granting flexibility or encouraging discounting but instead can be addressed with multiple scenarios that are continuously revised as recommended in the NOPR. For example, one scenario can include a discounted set of goals while another can add a contingency factor for demand that exceeds those goals. Similarly, a range of scenarios for the extent of electrification of buildings and transportation could be incorporated.

The scenario analysis should incorporate a probabilistic-based range of future weather and other events that includes extreme events, such as to support the analyses of the benefits of

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power companies in its membership — including most of the nation's largest — have goals to achieve carbon-free electricity by 2050 or before."

³¹ NOPR at 97.

³² ACORE Initial ANOPR Comments at 25.

mitigation of extreme events and system contingencies and mitigation of weather and load uncertainty. Lawrence Berkeley National Laboratory recently conducted a study of the impact of transmission on reducing pricing differentials, and found that: "Extreme conditions and high-value periods play an outsized role in the value of transmission, with 50% of transmission's congestion value coming from only 5% of hours," and "[t]ransmission planners run the risk of understating the benefits of regional and interregional transmission if extreme conditions and high-value periods are not adequately considered." 33

A recent multi-value transmission analysis by Telos Energy for the Energy Systems

Integration Group (ESIG) explains that the "scenarios included a range of values for amounts of renewable generation and storage additions, coal and gas plant retirements, and probabilistic load and gas prices, for a total of 120 different futures. While studies of this complexity and intensity would have been difficult to run a decade ago, new data sets, modern planning tools, and computational improvements allow for a significant increase in our understanding of power system risks." Further, the authors explain that "moving away from a snapshot analytical framework to assessing multiple future scenarios is vital for effective planning." ³⁵

D. The Commission should require a minimum set of benefits.

ACORE commends the Commission for the provision of an expansive list of benefits in Table 1 of the NOPR that go beyond the use of adjusted production costs. As Telos Energy notes:

³³ Millstein, et al, *Empirical Estimates of Transmission Value using Locational Marginal Prices*, Lawrence Berkeley National Laboratory (August 2022) at 33, available at: https://eta-publications.lbl.gov/sites/default/files/lbnl-empirical transmission value study-august 2022.pdf

³⁴ Derek Stenclik and Ryan Deyoe, Telos Energy, *Multi-Value Transmission Planning for a Clean Energy Future: A Report of the Transmission Benefits Valuation Task Force*, Energy Systems Integration Group at 33, available at: https://www.esig.energy/multi-value-transmission-planning-report.

³⁵ *Id.* at 37. ACORE is not implying that 120 scenarios would be needed.

The use of adjusted production cost as the primary, or sole, metric for evaluating transmission benefits is problematic for two reasons. First, it leaves significant value on the table by largely ignoring some of the most important reasons why transmission is needed. For example, it almost completely excludes benefits from system reliability, resource adequacy, and capacity. It also excludes the benefits of accessing lower-cost renewables—which is largely a capital cost savings rather than production cost savings. Second, as the grid transitions to increasing shares of renewable energy, baseline production costs inherently shrink. ³⁶

The benefits categories listed in Table 1 represent a best practice, standard set of benefits and track closely with recommended multi-benefit planning approaches.³⁷ Full adoption of this entire list is essential for transmission planning and cost allocation. Allowing transmission providers to ignore certain benefits could lead to unjust and unreasonable planning rules, and incorrect determinations of transmission needs. ³⁸ This list provides a discrete set of benefits which do not overlap, and therefore the full set must be evaluated.³⁹

In recognition of the potential burden on transmission provider staff and resources, ACORE supports the proposal from Grid Strategies LLC for the use of a screening tool to be applied to each benefits category and for those benefits found likely to be significant to be subject to a more thorough evaluation. 40

The resulting set of benefits would then be utilized for both the LTRTP and cost allocation. Moreover, this set of benefits should be viewed as a floor and not a limitation on the benefits to be included. Transmission providers should be able to include additional benefits for

³⁶ *Id.* at 8.

³⁷ Rob Gramlich, Grid Strategies LLC, *Enabling Low-Cost Clean Energy and Reliable Service Through Better Transmission Benefits Analysis*, (August 2022) at 9, citing Pfeifenberger et al, available at: https://acore.org/enabling-low-cost-clean-energy-and-reliable-service-through-better-transmission-benefits-analysis-a-case-study-of-misos-long-range-transmission-planning/; Stenclik and Deyoe at 19.

³⁸ Gramlich (2022) at 17.

³⁹ *Id.* at 10-15.

⁴⁰ *Id.* at 17.

the purposes of planning and cost allocation. For example, transmission providers may wish to include greenhouse gas and air pollutant emissions reductions,⁴¹ as well as associated environmental justice impacts (such as a heavier weighting given to reductions in emissions in environmental justice communities).

E. <u>Incorporating network upgrades not achieved through the interconnection process is a positive step.</u>

ACORE supports as a minimum first step the Commission's proposal to require transmission providers to evaluate in the LTRTP certain interconnection-related network upgrades identified in studies from at least two queue cycles, with a minimum voltage of at least 200 kV and/or estimated cost of \$30 million that have not been completed because of withdrawals from the queue.⁴²

The proposed inclusion of such identified upgrades in the planning process, while a positive step, does not obviate the need for greater transmission planning and interconnection reforms. The outcome of this NOPR should be to establish comprehensive long-term transmission planning that incorporates the needed upgrades and thereby minimizes the need for their funding through the interconnection process. ACORE noted in its ANOPR comments that reforms to transmission planning "would have the salutary effect of not having individual interconnection customers pay for and be subject to the time to construct upgrades that should have been included in a transmission plan in the first place." It is also crucial that given the FERC issuance of a separate NOPR on Improvements to Generator Interconnection Procedures

⁴¹ For example, MISO's Long-Range Transmission Planning incorporated reductions in carbon emissions, and prior studies by SPP and CAISO also include emissions reductions. See *Id.* at 5 (Figure 2) and 11.

⁴² NOPR at 166.

⁴³ ACORE Initial ANOPR Comments at 18.

and Agreements,⁴⁴ this particular reform not impede any other needed interconnection process reforms.

F. Establishing criteria to identify and evaluate transmission facilities calls for a more holistic and portfolio-based approach.

ACORE agrees with the Commission that criteria for determining transmission needs should be transparent and not unduly discriminatory; ensure that more efficient or cost-effective transmission facilities are selected; and maximize benefits to consumers over time without overbuilding transmission facilities. These goals are best addressed by long-term portfolio-based approach to determine all of the transmission needs holistically. But the NOPR leaves the decision to use a portfolio approach to the discretion of the transmission provider, potentially resulting in inefficiencies. The Brattle Group and Grid Strategies LLC explain:

Given the prevalence of network externalities, it is generally inefficient to plan transmission one line at a time and for one local (or even regional) system at a time. Efficiency requires planning a full portfolio of network assets together, across a wide geographic area.⁴⁷

Further, ACORE recommends that the selected facilities need not be net-beneficial in every scenario, and supports the use of a weighted-benefits approach, described in the NOPR and in recent expert reports on transmission planning.⁴⁸

⁴⁴ 179 FERC ¶ 61,194 (June 16, 2022)

⁴⁵ NOPR at P 245.

⁴⁶ NOPR at P 175.

⁴⁷ Pfeifenberger et al (2021) at 21.

⁴⁸ Pfeifenberger et al (2021) at 59-60, Stenclik and Devoe (2022) at 37.

ACORE also agrees with the allowance for transmission providers to right-size their transmission plans "subject to the outcomes of subsequent Long-Term Regional Transmission Planning cycles, such that a previously selected transmission facility is no longer needed."

In response to the Commission's request for comment on holding a periodic forum to share best practices in implementation of the LTRTP,⁵⁰ ACORE strongly supports such a forum which can include the identification of sources of data, modeling approaches, and methodologies for determining the benefits. Moreover, while not specifically discussed in this NOPR, ACORE supports the establishment of an independent transmission monitor, as described in the comments filed by Potomac Economics.⁵¹ Such an entity can assist with the identification of these best practices and ensure transparency in the planning process and supporting analyses. For example, a Grid Strategies LLC report on advanced conductoring recommends such a transmission monitor for the purpose of assessing "opportunities for greater efficiency and reliability from alternative operations methods or technologies."⁵²

G. <u>Grid enhancing technologies must be fully incorporated into transmission planning and</u> cost allocation.

ACORE supports the proposal for transmission providers to incorporate evaluations of dynamic line ratings and advanced power flow control devices into both current and future transmission planning and cost allocation, and specifically to determine whether incorporating these technologies into existing transmission facilities could meet the same regional transmission

⁴⁹ NOPR at P 248.

⁵⁰ NOPR at P 255.

⁵¹ Comments of Potomac Economics, LTD, Docket No. RM21-17-000 (August 3, 2022) at 6-9.

⁵² Jay Caspary and Jesse Schneider, Grid Strategies, LLC, *Opportunities to Use Advanced Conductors to Accelerate Grid Decarbonization* (February 2022) at 25, available at: https://acore.org/wp-content/uploads/2022/03/Advanced_Conductors_to_Accelerate_Grid_Decarbonization.pdf

need more efficiently or cost-effectively than other potential transmission facilities; and whether incorporating these technologies as part of any potential regional transmission facility would be more efficient or cost-effective.⁵³

ACORE also recommends that this requirement also encompass advanced conductoring and topology optimization. Grid Strategies LLC explains that "advanced conductors are capable of generating significant consumer savings and carbon emission reductions through their ability to operate the grid more efficiently, integrate more renewables onto the grid, and increase grid resilience," but "despite the clear need for replacements and upgrades over the next few decades, utilities, Independent System Operators (ISOs), and Regional Transmission Organizations (RTOs) have surprisingly few planned reconductoring projects expected to be placed in service before 2030." Advanced conductoring also provides benefits when incorporated into frequently congested newer lines and into newly built transmission. 56

Topology optimization also should be incorporated into the LTRTPs. A recent DOE report notes that topology optimization increases the transfer capacity of transmission, and "because this is a software application, the cost can be quite low compared to most hardware solutions."

⁵³ NOPR at P 274.

⁵⁴ Caspary and Schneider (2022) at 8.

⁵⁵ *Id.* at 13

⁵⁶ *Id.* at 14

⁵⁷ *Grid Enhancing Technologies: A Case Study on Ratepayer Impact*, US Department of Energy (2022) at 88, available at: https://www.energy.gov/sites/default/files/2022-04/Grid%20Enhancing%20Technologies%20-

^{%20}A%20Case%20Study%20on%20Ratepayer%20Impact%20-

^{%20}February%202022%20CLEAN%20as%20of%20032322.pdf

H. The proposed transmission planning reforms should apply to both RTO/ISO and non-RTO/ISO planning regions.

Regarding the Commission's request for comment on the application of the Long-Term Regional Transmission Benefits in non-RTO/ISO regions, ⁵⁸ ACORE strongly supports the application of all the requirements in the NOPR to both RTO/ISO and non-RTO/ISO regions. Doing so will maximize the benefits clearly identified in the NOPR and set the stage for improved interregional planning between these regions. It is also worth noting that several of these benefits will have a symbiotic effect with the expansion of wholesale markets in these regions, such as access to lower cost generation, increased competition and increased liquidity.

IV. COST ALLOCATION AND STATE AGREEMENTS

ACORE fully supports greater involvement of the states in the determination of cost allocation, as emphasized in the NOPR.⁵⁹ The importance of state support was demonstrated by MISO the involvement of the states and stakeholders in multiple processes that led to the approval of the first tranche of long-range transmission projects and their associated cost allocation, including lengthy discussions with stakeholders and the Organization of MISO States (OMS) about which benefits to include and how to estimate them.⁶⁰

ACORE also supports the retention of Order 1000 principles for such cost allocation. Because these cost allocation principles center on the allocation of costs in a manner that is at least roughly commensurate with estimated benefits, it is essential that the set of benefits described in Table 1 be used in the allocation of costs.

⁵⁸ NOPR at P 187.

⁵⁹ NOPR at P 302 and 303.

⁶⁰ Gramlich (2022) at 6.

While greater state involvement is important, this process cannot hold up the cost allocation determination and in turn the development of needed transmission. The Commission should therefore adopt a few overriding principles, such as a limitation on the time frame for coming to an agreement. ACORE supports affording flexibility in determining what constitutes "agreement" among the relevant state entities and as an alternative to an agreement, the transmission provider submittal of an explanation of the good faith efforts to seek agreement within the time frame established. Moreover, ACORE agrees that where agreements on cost allocation have already been reached with state entities for projects with multiple benefits evaluated, the transmission providers should not be required to revisit those agreements.

V. INCORPORATION OF LOCAL PROJECTS

ACORE recommended in its ANOPR comments that local projects have "increasingly been the focus of utility planning processes," and that the "disproportionate focus on these smaller projects amounts to a series of temporary fixes and should not be permitted to effectively crowd out investment in larger and potentially more efficient regional investments." Therefore, the proposed stakeholder involvement in local transmission planning is a beneficial reform, but lacks clarity on whether there is a more formal requirement to fully consider such local projects alongside other options in the LTRTP. For example, the Commission proposes to require "a stakeholder meeting to review identified reliability criteria violations and other transmission needs that drive the need for local transmission facilities," and "as part of the regional transmission planning process, a stakeholder meeting to review potential solutions to those

⁶¹ NOPR at P 306 and P 308.

⁶² NOPR at P 314.

⁶³ ACORE Initial ANOPR Comments at 22.

⁶⁴ Id. at 23.

reliability criteria violations and other transmission needs,"⁶⁵ but it is unclear how such stakeholder discussions of these potential solutions will then be formally considered by the transmission provider in developing the regional transmission plan.

ACORE also supports the proposed requirement for an evaluation of whether planned in-kind replacement of transmission facilities operating at or above 230 kV can be "right-sized" to more efficiently or cost-effectively address regional transmission needs identified in the long-term plans. ⁶⁶ The Commission should also clarify that this "right-sizing" should not only be in the long-term plans but also in any short-term plans for reliability and economic projects.

VI. INTERREGIONAL PLANNING

There is a significant body of evidence of the massive benefits and need for greater interregional transmission, especially with the increasing frequency of extreme weather events. A recent addition to the documentation of these benefits is the modeling exercise by Telos Energy of the addition of a 2-gigawatt HVDC line between ERCOT North and Southern Company where the systems were evaluated as unreliable by retiring gas and coal generators in the model. The results indicate almost no loss-of-load events for Southern Company (0.01 days/year) and a LOLE of 0.1 (days/ year) for ERCOT. This shows that the interregional transmission makes two unreliable systems reliable without adding new generation capacity. 67 Moreover, this also demonstrates the importance of incorporating non-RTO/ISO regions into interregional transmission planning and development.

⁶⁵ NOPR at P 401.

⁶⁶ NOPR at P 403.

⁶⁷ Stenclik and Deyoe (2022) at 51.

Another recent addition is Lawrence Berkeley National Laboratory's study of the potential role of transmission in mitigating energy price differentials. This study found that "interregional links are usually, but not always more valuable than within region links," and "may have higher value due to more diversity of weather, load profiles, and generator resources than is found within regions."

The Commission's proposals for improving interregional transmission planning through information sharing and the identification of interregional transmission facilities that may be a more efficient or cost-effective means of meeting transmission needs,⁶⁹ are beneficial but not sufficient to lead to the development of needed interregional transmission. ACORE therefore urges the Commission issue a NOPR establishing a more robust interregional transmission planning process and a methodology (or methodologies) for the creation of a minimum transfer capacity standard.⁷⁰

VII. JOINT OWNERSHIP

While ACORE is not commenting on the relative merits of the provisions in the NOPR allowing the exercise of a right of first refusal where joint ownership is established,⁷¹ if FERC does finalize that proposal, then the eligible joint ownership arrangements should require dissimilar parties. For example, a joint ownership of just two incumbent utilities or their affiliates wouldn't qualify. It is highly unlikely that joint ownership between incumbent utility transmission owners would achieve the additional benefits described by the Commission

⁶⁸ Millstein, et al. (2022) at 20.

⁶⁹ NOPR at P 426-428.

⁷⁰ For example, see Sheila Tandon Manz, General Electric Consulting, *Potential customer benefits of interregional transmission* (November 2021), at 18-21, https://acore.org/wp-content/uploads/2021/12/02-GEEnergyConsulting_ACORE_InterregionalTransmissionMemo_211129.pdf

⁷¹ NOPR at P 351.

expected to result from these arrangements, namely to "help increase opportunities for investment in the transmission system, as well as ensure not unduly discriminatory access to the transmission system by transmission customers." Such arrangements would also not meet the Commission's expectation that "jointly-owned regional transmission facilities, which may involve the participation of multiple nearby load-serving entities and potentially those that are public power entities, may increase collaboration within the regional transmission planning process."

VIII. CONCLUSION

ACORE greatly appreciates the reforms proposed by the Commission and urges it to move expeditiously towards a final rule that incorporates these recommended improvements. With the passage and signing of the Inflation Reduction Act of 2022, a significant and unprecedent growth in renewable resources is expected, creating an even greater need for a massive expansion of the transmission system to deliver those resources. Finalizing greatly needed reforms to transmission planning and cost allocation, as recommended in these comments, is one essential step towards ensuring that the transmission system is expanded to achieve a clean energy future, is cost effective, and maximizes the myriad benefits of transmission.

⁷² NOPR at P 372.

⁷³ *Id*.

Respectfully submitted,

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