Attachment B

Direct Testimony of Rolanda Shine

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MISSOURI PUBLIC SERVICE COMMISSION

FILE NO.

EA-2023-0017

DIRECT TESTIMONY

OF

ROLANDA SHINE

ON

BEHALF OF

GRAIN BELT EXPRESS LLC

August 24, 2022

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I. INTRODUCTION

- O. Please state your name, present position and business address.
- A. A. My name is Rolanda Shine. I am the Vice President of Finance and Capital
- 4 Markets for Invenergy LLC ("Invenergy"). My business address is One South Wacker, Suite 1800,
- 5 Chicago, Illinois 60606.

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- Q. Please describe your education and professional background.
- A. I have worked at Invenergy since 2014. In my role at Invenergy, I oversee analyses
- 8 of project economics for utility scale renewable, transmission and thermal projects. I provide
- 9 guidance to the origination team on strategic opportunities and bid tenders. I also negotiate
- 10 commercial and financing agreements, joint venture agreements, power purchase agreements,
- sales and purchase agreements and members interest purchase agreements. I have assisted with
- over \$1 billion in construction, tax equity and preferred equity financing by utilizing a range of
- structures to maximize project value and recycle capital.
- For example, I closed a \$650 million debt financing deal for the first liquified natural gas
- 15 ("LNG")-to-power project in El Salvador. For the project, I mandated a four-bank club of
- multilateral and expert credit lenders. I also managed construction funds through COVID impacts
- and identified and addressed working capital challenges arising from LNG market volatility and
- delays in revenue.
- 19 Prior to working at Invenergy, I was the Director of Project Finance and Corporate
- 20 Development from 2011 to 2014 and a Senior Manager of Project Finance and Corporate
- Development from 2008 to 2011, both roles at Sun Edison, LLC. While at Sun Edison, LLC,
- among other things, I closed over 150 solar projects with leading tax equity and debt players across
- 23 the Unites States and Spain. I also raised three funds of distributed generation assets and

- streamlined financing process by standardizing documentation and credit analysis. I maximized project value by driving favorable terms on investor yield and lease terms.
- 3 Prior to Sun Edison, LLC, I worked as an Assistant Vice President of the Structured
- 4 Finance Group Emerging Markets for Sumitomo Mitsui Banking Corporation ("Sumitomo")
- 5 from 2007 to 2008. In that role, among other things, I provided structured financing solutions to
- 6 United States and Canadian clients operating in the international markets related to hydropower,
- 7 oil and gas, offshore drilling, LNG and mining. I also conducted underwriting analyses on sponsor
- 8 credit, technology, offtake quality and market uncertainty.
- 9 Prior to Sumitomo, I worked as an associate at Delphos International, where, among other
- things, I advised on multilateral financing strategies for sponsors in natural resource sectors. I also
- served in the Financial Sector Vice Presidency for the World Bank.
- 12 I received a Master of Arts in International Relations degree from the Johns Hopkins
- 13 University, School of Advanced International Studies, with a concentration in international
- 14 economics and Latin American studies. I received a Bachelor of Music degree from Rice
- 15 University.

My curriculum vitae is attached as Schedule RS-1.

Q. What is the purpose of your direct testimony?

- 18 A. I am testifying on behalf of Grain Belt Express LLC ("Grain Belt Express"), which
- 19 is requesting that the Missouri Public Service Commission ("Commission") amend its existing
- 20 certificate of public convenience and necessity ("CCN") to construct, install, own, operate,
- 21 maintain, and otherwise control and manage an approximately 800-mile, overhead, multi-terminal
- 22 ±600 kilovolt ("kV") high-voltage, direct current ("HVDC") transmission line (and associated

1	facilities including converter stations and alternating current ("AC") connector lines (the
2	"Project").
3	As described in more detail in Shashank Sane's testimony, the Project is being developed
4	in two phases. Phase I is that portion of the Project from the interconnect in Kansas to the
5	interconnect with the Midcontinent Independent System Operator, Inc., ("MISO") and Associated
6	Electrical Cooperative, Inc., ("AECI) in Missouri (subject to regulatory approvals). Phase II is
7	that portion of the Project from the interconnect in Missouri to the interconnect at the Sullivan
8	Substation in Indiana.
9	For clarification, Phase I and Phase II of the Project will be financed separately. Grain Belt
10	Express witness Kevin Chandler discusses limited modifications to the financing condition
11	attached to the current CCN which are necessary for financing Phase I and Phase II separately.
12	Specifically, I will describe Grain Belt Express' capability to finance the proposed construction of
13	Phase I and Phase II of the Project without significant adverse financial consequences for Grain
14	Belt Express or its customers. The model, resources, and experience on which Invenergy
15	Transmission and Grain Belt Express will rely to finance both Phase I and Phase II are the same.
16	Q. Are you sponsoring any schedules or exhibits as part of your direct testimony?
17	A. Yes, I am sponsoring the following exhibits/schedules:
18	• Schedule RS-1 – Curriculum Vitae
19 20	 Schedule RS-2 – Table of generation and transmission projects developed and/or constructed by Invenergy Transmission and its affiliates.
21	II. GRAIN BELT EXPRESS' PLAN FOR PROJECT FINANCING
22	Q. Is Grain Belt Express capable of financing the Project?
23	A. Yes. Grain Belt Express has access to the necessary financial resources to carry
24	out the necessary development work for the Project prior to engaging in project-specific financings

- for the construction of each Phase of the Project. Invenergy Renewables has sufficient capital resources to provide the funding necessary to enable Invenergy Transmission and its subsidiaries to undertake the initial development and permitting work for each Phase of the Project. Once each Phase of the Project reaches an advanced stage of development and licensing, Grain Belt Express can enter into project-specific financing arrangements with investors and lenders to secure the capital needed to complete development and construction of each Phase of the Project and place it into operation.
- Q. Does Grain Belt Express have experience financing large infrastructure projects?
 - A. Yes. Invenergy Transmission has developed and financed over 4,000 miles of transmission and collection lines, 88 substations, 96 generator step-up transformers and over 5,000 pad mount transformers over the past 20 years. This is in addition to over 191 large-scale clean power projects in the United States and globally, totaling 30 gigawatts and representing \$47 billion in completed transactions. Through these relationships, Invenergy Transmission will have access to significant amounts of expertise and capital. Invenergy Transmission's financing relationships include such institutions as Wells Fargo, MUFG, GE Capital, JP Morgan, Santander, Morgan Stanley, Natixis, Bank of America and Rabobank.
 - For example, in 2021, Invenergy Transmission expanded into Latin America and closed financing for the Cardal transmission project, which consists of 55 kilometers of new 500 kV high-voltage transmission line, 20 kilometers of new 150 kV transmission line, a new 500 kV substation, and accompanying infrastructure. The project was financed through multilateral and private placement sources of funding.
 - Q. How much is the Project expected to cost?

A. The projected cost to construct the entire Project and place it into operation is approximately \$4.95 billion. This figure encompasses the entire Project cost, including the Kansas, Missouri, Illinois and Indiana segments, but not including any estimated network upgrade costs for RTO interconnections. The projected cost to construct Phase I of the Project and place it in operation is approximately \$3.52 billion, not including the upgrade costs for RTO interconnections. The projected cost to construct Phase II of the Project and place it in operation is approximately \$1.43 billion, not including the upgrade costs for RTO interconnections. Typically upgrade costs are paid upfront and included in the project costs, but for this Project, some costs will be paid upfront and, for the rest, Grain Belt Express will enter into facilities services agreements to pay for the upgrades over time. For those costs, the transmission owner will pay for the upgrades upfront, and Grain Belt Express will repay the transmission owner over a twenty-year period. These payments will be covered by the Project's revenue, so will not be included in the upfront cost of the Project.

Q. Does Grain Belt Express have a viable plan for raising capital?

A. Yes, Grain Belt Express has a viable plan for raising the capital necessary to finance the cost of constructing each Phase of the Project on a project finance basis. Specifically, after advancing development and permitting activities to a stage at which developers of wind and solar generation facilities and other potential customers of the transmission line are willing to enter into commercial agreements for an undivided interest (purchase or lease) or long-term contracts for transmission capacity on the Project, Grain Belt Express will enter into such contracts with interested subscribers that satisfy necessary creditworthiness and other requirements. Grain Belt

¹ A portion of the Kansas converter station may be built out with Phase II in which case the proportional amount would change.

- 1 Express will then raise debt capital using the aforementioned contracts as security for the debt.
- 2 Grain Belt Express may also raise additional equity capital.

- Recent experience shows that significant amounts of liquidity exist in the capital markets for transmission projects that have reached an advanced stage of development. The capital markets have a substantial history of supporting transmission projects including merchant projects and other infrastructure projects through both debt financings (on a project finance basis) and equity investments. Numerous institutional lenders and investors have provided capital to transmission projects and other infrastructure projects and demonstrate continued interest in this sector. Invenergy Transmission has developed relationships with many of the major lenders and investors that have been involved in financing transmission projects, which will directly benefit Grain Belt Express. The table attached as Schedule RS-2 includes a list of transmission line projects financed and constructed or under construction by Invenergy Transmission or its affiliates.
- Q. At what point will the company obtain financing for the construction of the Project?
- A. Our current plan is to obtain construction financing once we have obtained the major regulatory approvals necessary to proceed with each Phase of the Project and we have contracted offtake for a majority of the capacity on each Phase of the Project.
- Grain Belt Express has already obtained certificates to operate as a public utility in Kansas and to construct the 370-mile Kansas portion of the HVDC Line from the Kansas Corporation Commission. Grain Belt Express also received a certificate to operate as a public utility from the Indiana Utility Regulatory Commission and negotiated rate authority from FERC.² On July 26,

²Grain Belt will be seeking amendments to existing regulatory approvals in Kansas and Indiana in 2022 and 2023 in order to incorporate any material changes in the design and engineering of the project that have occurred in recent years as development has advanced in those states.

2022, Grain Belt Express filed for a certificate to operate as public utility in Illinois and an Order is expected from the Illinois Commerce Commission in March 2023.

In addition to obtaining state regulatory approvals, Grain Belt Express will need to enter into contracts for a portion of the transmission capacity on the Project prior to obtaining full financial commitments for the Project. The exact percentage of capacity that needs to be under contract prior to obtaining full financing commitments will depend on the price, counterparty creditworthiness and term in years of the signed transmission contracts.

Q. Please describe the nature of these transmission capacity contracts and why they are necessary to support the Project's financing.

Grain Belt Express and any potential co-owners will offer long-term transmission capacity contracts to its customers. Grain Belt Express will offer firm and non-firm point-to-point transmission service over its available transmission capacity on the line to deliver low-cost renewable resources from western Kansas to potential off-takers in Missouri, Illinois and Indiana utilizing a "shipper pays" or participant-funded model.

Grain Belt Express anticipates it will enter into long-term transmission service or capacity contracts with its off-takers that require the transmission customer to pay a reservation charge that will be paid regardless of how often the reservation is called upon. A reservation charge will require the transmission customer to pay for its reserved capacity regardless of what percentage of the time the customer uses the reserved capacity. This pricing arrangement is typical for transmission lines operated by the transmission owner members of SPP, MISO and PJM. It is also similar to the contractual arrangements for natural gas and other pipelines.

Grain Belt Express' transmission contracts will also include credit requirements for its transmission customers. The credit requirements will require each transmission customer to have

investment grade credit ratings or post additional security in the form of cash, a letter of credit or a parent guarantee from an entity with investment grade credit ratings. These credit requirements will provide revenue certainty, which will allow lenders to be comfortable that Grain Belt Express can repay its debt.

As stated above, Grain Belt Express then intends to raise debt secured by the revenue stream from the transmission capacity contracts to raise the capital necessary to complete the remaining development activities, construct the Project and place it into operation. Grain Belt Express anticipates utilizing a combination of commercial and governmental sources of financing, and at this time is still evaluating all potential options for financing. Options for governmental sources of financing include the Western Area Power Administration ("WAPA") Transmission Infrastructure Program ("TIP"); and the Bipartisan Infrastructure Bill Transmission Facilitation Program; Department of Energy loans to non-federal borrowers for transmission facilities pursuant to the Inflation Reduction Act and potentially other government funding options. Additional equity capital may also be raised to help finance construction of the Project, or Grain Belt Express' existing investors may make additional equity investments in the Project.

Q. How will lenders size the debt they lend to Grain Belt Express?

A. Lenders typically look at project finance borrowing capability based on debt service coverage ratios, where the numerator is contracted cash flow available to service debt, and the denominator is principal and interest owed. In my experience, typical coverage ratios for project finance are 1.25 to 1.50 times. These coverage ratios allow projects like the Project to raise substantial amounts of debt financing to fund construction costs, while maintaining a margin of safety on debt repayment in the event of unforeseen operational or commercial problems.

Q. If Grain Belt Express is able to obtain the regulatory approvals and the transmission contracts as you describe, do you foresee any difficulty in obtaining the necessary financing to build the Project?

- A. No. Invenergy Transmission and its affiliates have significant experience as described above in obtaining financing for large infrastructure projects like the Project and have the resources and network to finance this Project.
- Q. Is it typical for energy projects using project finance to obtain full financing prior to obtaining the necessary permits and other regulatory approvals?
- A. No. In my experience project lenders require the necessary permits and approvals as a condition to funding a project loan. Project-based equity investors typically have the same requirement. While I am aware of certain transactions in which debt and equity investors have made commitments conditioned on obtaining remaining permits and approvals, this model is not preferable for projects such as the Project. First, banks and other lending institutions will not make conditional commitments until they have a high degree of certainty that the Project will actually be approved by the applicable regulatory agencies. Second, the time horizon of Phase I of the Project is such that full construction will not begin until 2024 at the earliest. Conditional commitments to project finance are made where there is a much shorter period of time anticipated between the commitment being made and the anticipated date of the event that will trigger the release of the funds. Third, lenders typically charge a commitment fee on future loan commitments, which can be quite costly to the Project. In summary, debt providers would not make such a long-term commitment to finance the Project before key regulatory approvals are in place.

Q. What conditions may project lenders require before they advance the money to build the Project?

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A. In my experience, lenders only will advance money once certain conditions have been met. Those conditions may include (a) having all necessary permits, (b) having procured any remaining financial commitments beyond lenders' funding to complete construction, and (c) having a high degree of certainty on budget and timeline. While this due diligence creates an additional administrative burden for the transmission developer, it ensures that projects proceed prudently. Construction lenders will not release funds to begin construction unless Grain Belt Express demonstrates that it has commitments for sufficient financing to construct the entire Phase of the Project. Lenders will not take the risk that additional necessary financing cannot be obtained, resulting in an incomplete project with limited collateral value. Therefore, in the CCN Order, the Commission placed a condition on Grain Belt Express' CCN that Grain Belt Express will not install transmission structures associated with each respective Phase of the Project on easement property in Missouri until it has obtained adequate funding to complete each respective Phase of the Project.³ In light of Grain Belt Express' request that it be permitted to construct the Project in phases, Grain Belt Express is requesting an amendment to this condition, as discussed in greater detail in Kevin Chandler's testimony.

III. THE COMMISSION'S PREVIOUS FINDINGS

Q. Are you familiar with the Commission's Order granting the CCN in this proceeding?

³ Section I of the Conditions Agreed to by Grain Belt Express Clean Line LLC and the Staff of the Missouri Public Service Commission, marked as Exhibit 206 and included as Attachment 1 to the CCN Order ("Exhibit 206").

1	A. Yes, In the Commission's March 20, 2019 Report & Order on Remand, ⁴ the
2	Commission found that "Grain Belt and Invenergy together have the financial ability to
3	develop, construct, and operate the Project," concluding that "Invenergy's financial condition is
4	very strong." ⁵ And in the Commission's September 11, 2019 Report and Order, ⁶ the Commission
5	restated that Invenergy possessed requisite financial abilities. ⁷

Q. Should the Commission come to the same conclusion as it did previously?

A. Yes, it should. Nothing occurring in the intervening years, nor the requested changes to the CCN justify a different conclusion to the one reached in 2019—Grain Belt Express and Invenergy have the financial ability to develop construct and operate this Project.

IV. GRAIN BELT EXPRESS MEETS THE *TARTAN* FACTORS FOR ISSUING A CCN

Q. Are you familiar with the Commission's factors for granting a CCN, referred to as the "Tartan Factors"?

A. While I am not an attorney, yes, it is my understanding that, in its review of CCN applications, the Commission has traditionally applied several criteria, which it refers to as the "*Tartan* Factors." Other Grain Belt Express witnesses address several of the *Tartan* Factors in

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⁴ Dkt. No. EA-2016-0358.

 $^{^5}$ *Id.* at p. 43. In the Commission's Findings of Fact, it referenced, among other things, that: Invenergy has raised more than \$30 billion of financing in connection with the successful development of more than 20,046 MW in projects in the United States, Canada, Europe, Central America, and Japan (*id.* at ¶ 60, p. 21); and that Invenergy and its affiliates have in excess of \$9 billion in total assets and \$3 billion in total equity on a consolidated basis (as of December 31, 2017) (*id.* at ¶ 59, p. 21).

⁶ Dkt. No. EM-2019-0150.

 $^{^7}$ *Id.* at ¶ 7. The Commission again referenced the findings listed above in fn. 5. *Compare id.* at ¶¶ 11-17 *with* Report & Order on Remand, EA-2016-0358 (March 20, 2019) at ¶¶ 56-63, pp. 20-22.

- their testimonies. In this testimony, I provide support for the third *Tartan* factor, which requires that an applicant for a CCN must have the financial ability to provide the service.
- Q. In your view, does Grain Belt Express have the financial ability to build and operate the Project, consistent with the Commission's *Tartan* Factors?
- A. Yes, as the Commission previously found in 2019,⁸ Grain Belt Express has the financial ability to develop, construct, and operate the Project. As explained above, Grain Belt Express and its associated partners have a proven record of financing transmission projects like this and are well prepared to finance the Project as amended.
- 9 V. CONCLUSION
- 10 Q. Does this conclude your testimony?
- 11 A. Yes, it does.

⁸ "Report & Order on Remand," Dkt. No. EA-2016-0358 (March 20, 2019).