Montana Public Ser Docke Electric and Natural	et No. 2024.05.053
DIRECT TESTIMONY	
OF BRIAN B. BIRD	
ON BEHALF OF NORTHWESTERN ENERGY	
TABLE OF CONTENTS	
Description Star	rting Page No.
Witness Information	2
Purpose of Testimony	2
NorthWestern's Role and Services	3
Reliability: Overview of NorthWestern Operations	8
Affordability	12
Sustainability	20
Rate Review and Introduction of Witnesses	26
Verification	36
	Docker Electric and Natural DIRECT TESTIMONY OF BRIAN B. BIRD ON BEHALF OF NORTHWESTERN ENERGY TABLE OF CONTENTS Description table of NorthWestern Operations Purpose of Testimony NorthWestern's Role and Services Reliability: Overview of NorthWestern Operations Affordability Sustainability Rate Review and Introduction of Witnesses

1		Witness Information
2	Q.	Please identify yourself, your employer, and your job title.
3	Α.	My name is Brian B. Bird. I am NorthWestern Corporation d/b/a/
4		NorthWestern Energy's ("NorthWestern" or "Company") President and Chief
5		Executive Officer.
6		
7	Q.	Please provide a description of your relevant employment experience
8		and other professional qualifications.
9	Α.	I have over 35 years of experience within the fields of corporate finance,
10		treasury, tax, audit, and accounting and was promoted to my current position
11		in January 2023. Prior to that, I served for almost 2 years as Chief Operating
12		Officer and 18 years as NorthWestern's Chief Financial Officer.
13		
14		I have Bachelor's degrees in both Finance and Accounting and a Master's
15		degree in Finance and hold a Certified Public Accountant certificate.
16		
17		Purpose of Testimony
	Q.	What is the purpose of your testimony?
18	Α.	The purpose of my testimony is to provide the overarching policy testimony
19		that guides the proposals and requests included in NorthWestern's 2024 Rate
20		Review. More specifically, I discuss the role NorthWestern plays in Montana
21		and its communities and our commitment to Reliability, Affordability and
22		Sustainability. I introduce NorthWestern's witnesses who provide a more

1		detailed explanation of NorthWestern's recent investments in the utility
2		infrastructure needed to provide critical energy services, our proposals in this
3		case, and the reasons the Montana Public Service Commission
4		("Commission") should grant our requests.
5		
6		NorthWestern's Role and Services
7	Q.	Please provide an overview of NorthWestern and the services it
8		provides.
9	Α.	For more than 100 years, NorthWestern has delivered safe, reliable, and
10		innovative energy solutions. We build, maintain, and operate electric and
11		natural gas systems in Montana, South Dakota, Nebraska, and Yellowstone
12		National Park, as reflected in Figure 1 below.
13		
14		NorthWestern's 1,573 employees serve a total of 775,300 gas and electric
15		customers across Montana, South Dakota, and Nebraska, which includes
16		electric service to 337 communities and natural gas service to 202
17		communities. ¹ Within Montana, NorthWestern's 1,269 employees serve
18		405,500 electric customers and 212,100 natural gas customers and cover
19		107,600 square miles, representing 73% of Montana. ² This rate review is
20		limited to the cost of service related to our Montana customers.
21		

¹ See NorthWestern Energy, 2023 Annual Report, at 6, 17 (March 2024), https://issuu.com/northwesternenergy/docs/annual_report_2023_final_for_web?fr=xKAE9_z U1NQ.

² *Id.* at 32, 37, 42 (NorthWestern's 2023 Form 10-K).



Figure 1: Our Service Territory

1	In addition to the ownership and operation of critical natural gas and electric
2	transmission and distribution systems and natural gas production,
3	NorthWestern operates a diverse generation fleet of hydro, wind, solar,
4	natural gas, and coal-fired resources that was 55% carbon-free across our
5	total service territory, and 58% carbon-free across Montana, for 2023.3
6	
7	As a public utility, NorthWestern is subject to direct government regulation of
8	prices and services in Montana by the Commission. Ensuring Montana

³ See *id.* at 31.

1		customers receive safe and reliable energy services is the shared
2		responsibility of both NorthWestern and the Commission. ⁴ As such,
3		NorthWestern requests the Commission consider and approve its proposals
4		for more timely cost recovery in this 2024 Rate Review.
5		
6	Q.	Please explain the drivers of this rate review.
7	Α.	NorthWestern filed this rate review to recover the substantial investments we
8		have made in our combined Montana electric and natural gas infrastructure to
9		ensure our customers continue to receive critical energy services. As
10		depicted in Chart 1 below, since the 2022 Montana Rate Review, which
11		recovered 2021 test-year costs and 2022 known and measurable costs,
12		NorthWestern is expected to invest and place into service over \$1 billion
13		dollars in electric (\$874M) and natural gas (\$174M) by the end of 2024 for our
14		Montana customers. Our investments ensure safe, reliable, and affordable
15		service for Montana customers.
16		

⁴ Montana Public Service Commission, *What We Do For You*, https://psc.mt.gov/About-Us/What-We-Do.

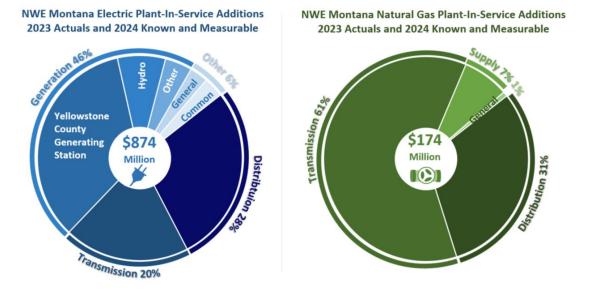


Chart 1: NorthWestern's 2023 and 2024 Investments

2	Four primary policy drivers guide NorthWestern's investments, which are
3	discussed by Michael Cashell:
4	Capacity: The delivery capabilities of the system necessary to meet
5	growth on our system. Typically, when we are speaking about capacity
6	we mean 24/7 energy to our customers. In other words, energy that we
7	can dispatch when we need it and is not intermittent.
8	Reliability: Improve performance of the system including modernization of
9	the system.
10	Asset Life: Maintaining existing equipment and replacing aging
11	equipment to improve asset life. Continuing to re-invest in our existing
12	resources is often the lowest cost and lowest impact solution.

Compliance: The adherence to established regulatory standards and
 requirements for security and safety.

3 Ensuring that our customers continue to receive reliable energy services to meet their critical needs requires continual investment in our infrastructure -4 5 distribution, transmission, and generation – to ensure it is sufficient to meet 6 our customers' energy and capacity needs. Our direct case speaks to the 7 need for investment and operating expenses that are necessary to mitigate 8 potential reliability risks. The direct testimony of Jason Merkel speaks to 9 distribution initiatives, while Mr. Cashell and John Hines discuss the 10 Company's major initiatives in transmission and generation, respectively.

- 11
- 12 Q. Please describe NorthWestern's three strategic pillars in meeting
 13 customer needs.

A. NorthWestern's vision of "enriching lives through a safe and sustainable
 energy future," is upheld by the three pillars of our strategy: Reliability,
 Affordability, and Sustainability. We recognize the critical role NorthWestern
 plays in Montana's transition to the future – a future that requires us to
 balance Reliability, Affordability and Sustainability of the energy services
 provided to our customers. These pillars are discussed in more detail below.

1		Reliability: Overview of NorthWestern Operations
2	Q.	How does NorthWestern's reliability compare to other utilities?
3	Α.	The reliability of our electric and natural gas service is better than that of our
4		industry peers, which is significant considering our large and rugged service
5		territory.
6		
7		Electric service for NorthWestern's Montana customers was 99.98% reliable
8		in 2023. That means out of the 8,760 hours in 2023, the average customer
9		experienced a 2-hour outage. Our service is in the top quartile of our
10		industry. NorthWestern's top electric service reliability is achieved in a service
11		territory in Montana that is expansive with difficult terrain. Our employees
12		endure challenging weather conditions to provide that level of reliable service.
13		

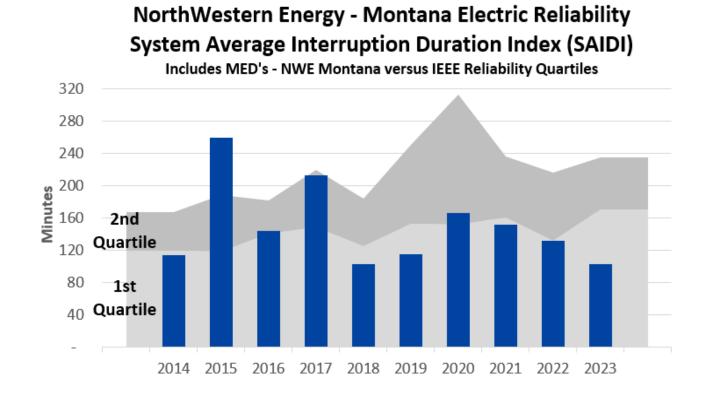
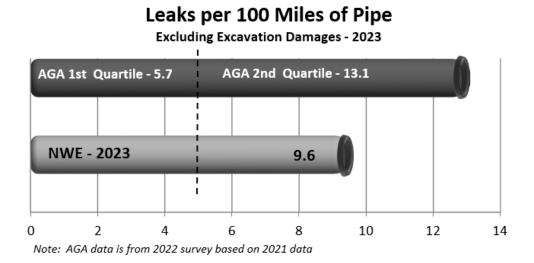
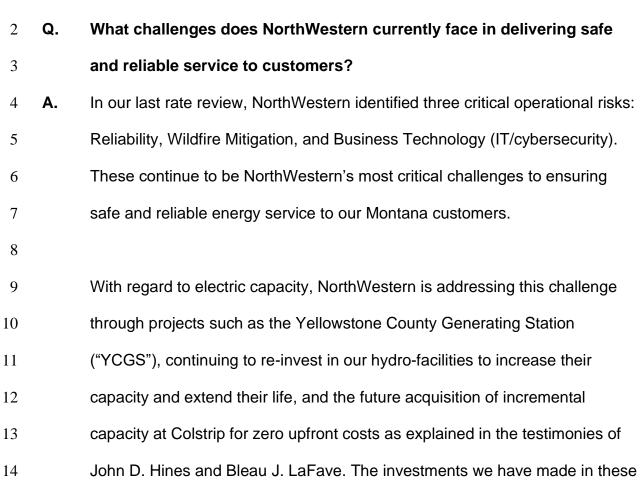


Chart 2: NorthWestern Electric Reliability

On the natural gas side, our service reliability is near 100%. Another natural
 gas reliability measure that is tracked in the industry is leaks per mile. Our
 natural gas system has fewer leaks per mile than the national average.
 Again, this is impressive when you consider the size of our system.

Chart 3: NorthWestern Natural Gas Reliability





resources increase reliability and protect against reliance on the market
 during peak demand.

3

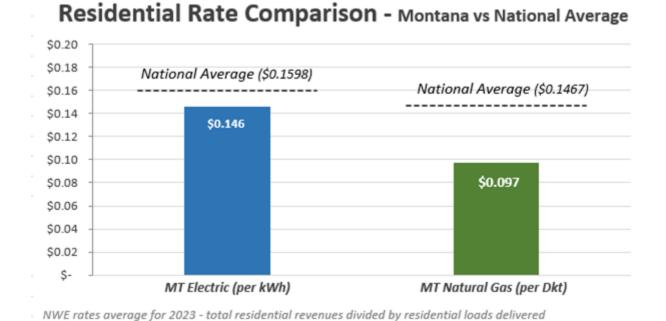
Between January 11 and 16, 2024, Montana experienced a very severe and 4 5 sustained duration cold weather event. System needs were at a critical high; 6 the balancing authority set a new system peak on January 13, as did the 7 natural gas transmission system. NorthWestern experienced its highest ever 8 sustained load over the six-day period. Electric market prices in the Northwest 9 Region were \$600 to \$1,000 per megawatt-hour ("MWh") for this period 10 (approximately 8 to 14 times higher than the average price from January 1 through January 10).⁵ The successful construction of the YCGS and our 11 12 current and future share of Colstrip generation play a critical role in 13 addressing the capacity deficit facing NorthWestern customers. Messrs. 14 Hines and LaFave discuss NorthWestern's efforts to address this capacity deficit. 15 16 17 The mitigation of wildfire risk is a challenge currently facing all utilities, in 18 particular electric utilities in the western states. In its 2022 Montana Rate 19 Review, NorthWestern presented its Enhanced Wildfire Mitigation Plan, which

- 20 expanded upon our existing programs to further address wildfire risks
- 21

incrementally. In this rate review, NorthWestern presents an updated Wildfire

⁵ NorthWestern Energy's response to the Commission's Request for Information regarding system operations during recent severe weather events in Docket No. 2022.09.087 filed on February 20, 2024.

1		Mitigation Plan ("WMP" or "Plan") that addresses more comprehensively both
2		existing and incremental programs to mitigate wildfire risk. This Plan is
3		discussed further in the direct testimonies of Jason C. Merkel, Greg F. Bailly,
4		and Brandi L. Hellwinkel. Timely cost recovery for these programs will be
5		critical as discussed further in Crystal D. Lail's direct testimony. Cynthia S.
6		Fang's direct testimony discusses NorthWestern's proposal for a new
7		balancing account mechanism to enable more timely cost recovery
8		associated with wildfire costs.
9		
10		Finally, the critical role Business Technology plays to ensure safe and reliable
11		energy services to our customers continues to grow. The direct testimony of
12		Jeanne Vold further discusses the need for a re-examination of the cost
13		recovery for certain Business Technology costs to better align with trends
14		occurring in how technology and services are being provided which are
15		discussed further by Jeffrey B. Berzina and Ms. Fang.
16		
17		Affordability
18	Q.	How does NorthWestern's costs of providing electric and natural gas
19		service compare to other utilities?
20	Α.	We provide affordable electric and natural gas services while maintaining high
21		levels of reliability of service, serving Montana residential customers at an
22		average rate well below the national average (see Chart 4).
23		



Natural Gas source: U.S. EIA - U.S. Price of Natural Gas Delivered to Residential Customers for 2023

Electric source: U.S. EIA - Average Retail Price of Electricity for 2023

Chart 4: 2023 Residential Average Rate Comparison

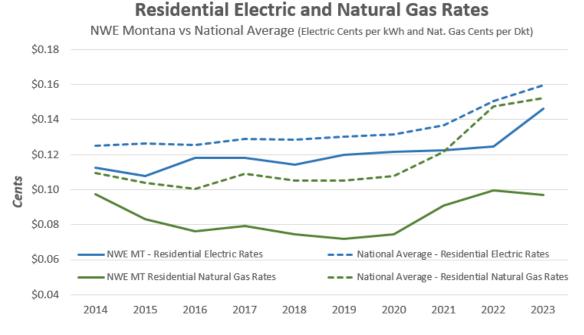


Chart 5: Historic Residential Average Rate Comparison

Electric rates = total revenues from residiential electric customers divided by total MWh's delivered to customers Electric national average includes revenues and energy sold for all utilities/Co-Ops/Electric Generation Providers Natural gas rates = total revenues from residential natural gas customers divided by total decatherms delivered to customers

<u>Sources:</u> Electric: <u>eia.qov</u>/electricity/data/browser - Average retail price of electricity delivered to residential customers Natural Gas: <u>eia.qov</u> Natural gas residential annual sales delivered to residential customers

1 NorthWestern has continued to maintain average residential rates below the

2 national average for more than a decade as presented in Chart 5 above.

3

4

Q. Given the concerns about affordability, why is NorthWestern filing

5

another rate review so soon after the last one?

6 **A.** Unlike other businesses, which are able to increase their prices when cost of

7 service increases, NorthWestern as a regulated utility must seek Commission

- 8 approval through a litigated process before we are able to increase prices to
- 9 our customers for recovery of changes in the cost of service reflected in our
- 10 base rates. Prior to our last rate review, it had been almost four years since

1 our previous electric rate review filed in 2018 and six years since our previous 2 natural gas rate review filed in 2016, which requested the recovery of over \$1 billion in infrastructure investments between rate cases. While the increase 3 4 when considered on an annual basis was below the rate of inflation, the 5 accumulated increase due to the extended years between rate reviews 6 creates challenges for our customers. Filing rate reviews more frequently will 7 result in more timely recovery of costs incurred for NorthWestern and helps avoid rate shock for our customers. Since our 2022 Rate Review, 8 9 NorthWestern has continued to invest in the infrastructure to serve its 10 customers and is expected to invest and place in service over a \$1 billion by 11 the end of 2024. 12 13 Charts 6 and 7 below present the monthly electric and natural gas bill

impacts, respectively, for the typical residential customer from NorthWestern's
 proposed update to rates. The bill impacts associated with NorthWestern's
 rate request in this proceeding are discussed further by Charles R. Lane.

17

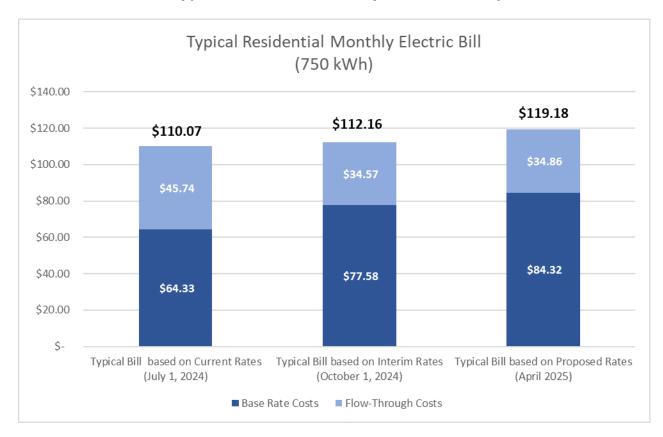


Chart 6: Typical Residential Monthly Electric Bill Impact

1 NorthWestern's proposed interim rate request, including NorthWestern's 2 request for a bridge rate, is expected to result in an increase in the monthly 3 electric bill from current rates of \$110.07 to \$112.16, which is an increase of 4 \$2.09 or 1.90%, for the typical residential customer using 750 kWh per month. 5 6 NorthWestern's proposed electric rate request, including the cost recovery of 7 YCGS, is expected to result in an increase in the monthly electric bill from interim rates of \$112.16 to \$119.18, which is an increase of \$7.02 or 6.26%, 8 9 for the typical residential customer using 750 kWh per month. This includes

1	an expected increase to property taxes, a flow-through cost, that would occur
2	on January 1, 2025, of \$0.29 a month.
3	
4	The total impact of NorthWestern's electric rate proposal from current
5	effective rates would be an increase to monthly electric bills of \$110.07 to
6	\$119.18, which is an increase of \$9.11 or 8.28%, for the typical residential
7	customer using 750 kWh per month.
8	

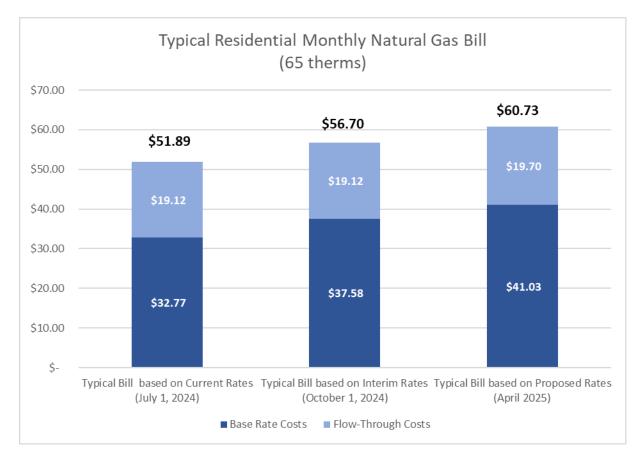


Chart 7: Typical Residential Monthly Natural Gas Bill Impact

NorthWestern's proposed interim rate request is expected to result in an increase in the monthly natural gas bill from current rates of \$51.89 to \$56.70,

9

1	which is an increase of \$4.81 or 9.28%, for the typical residential customer
2	using 65 therms per month.
3	
4	NorthWestern's proposed natural gas rate request is expected to result in an
5	increase in the monthly bill from interim rates of \$56.70 to \$60.73, which is an
6	increase of \$4.03 or 7.10%, for the typical residential customer using 65
7	therms. This includes an expected increase to property taxes, a flow-through
8	cost, that would occur on January 1, 2025, of \$0.57 a month.
9	
10	The total impact of NorthWestern's natural gas rate proposal from current
11	effective rates would be an increase to monthly natural bills of \$51.89 to
12	\$60.73, which is an increase of \$8.84 or 17.04%, for the typical residential
13	customer using 65 therms per month.
14	
15	Our proposed average electric bill would be just under \$120 a month or
16	approximately \$4 per day, which is approximately the cost of a single Big Mac
17	at McDonalds. Our proposed average natural gas bill would be just over \$60
18	a month or approximately \$2 per day, which is approximately the cost of a 16
19	ounce bottle of Coca Cola at the convenience store. This demonstrates how
20	cost effective our service is if we can heat/cool your home, power all your
21	appliances, and provide lighting to our average combined electric and natural
22	gas customers for \$6 per day.

1	Q.	What steps has NorthWestern taken to address affordability?
2	Α.	NorthWestern recognizes that the comparison of typical bills is only one
3		measure of affordability and does not reflect the experience of all of our
4		customers. Consistent with the direction provided by the Commission in our
5		2022 Rate Review, Northwestern calculates and tracks Share of Wallet as
6		further discussed by Ms. Fang.
7		
8		NorthWestern has initiated stakeholder efforts to address information gaps for
9		low-income customers as well as barriers and challenges to assistance
10		program participation. The stakeholder efforts are discussed further by Ms.
11		Fang.
12		
13		As discussed by Ms. Lail, NorthWestern continues to manage its operating
14		and maintenance costs to be the lowest in its group of peers.
15		
16		NorthWestern recognizes the challenges higher utility bills may have for our
17		customers, particularly our low-income customers who will be affected by this
18		increase and other increases on consumer goods. Therefore, we will continue
19		to work with our customers to find ways to reduce their bills and find ways to
20		get them the financial help they need through energy assistance programs. ⁶

⁶ See NorthWestern Energy's Payment Assistance webpage, <u>NorthWestern Energy</u> <u>Payment Assistance</u>.

1		<u>Sustainability</u>
2	Q.	How does the sustainability of NorthWestern's portfolio compare with
3		other utilities?
4	Α.	One aspect of sustainability is the carbon intensity of our portfolio.
5		NorthWestern's total portfolio is 55% carbon free. Our Montana portfolio is
6		even cleaner with 58% of the delivered megawatt-hours in 2023 carbon-free
7		compared to 41% for the nationwide average.7
8		

Figure 2: Comparison of NorthWestern's Portfolio

NorthWestern Energy - 2023 Electric Portfolio





41% Carbon-Free - U.S. Electric Utilities Net Generation - Based on MWh's

Source: EIA.gov Table 7.2b Electric Net Generation: U.S. Electric Power Sector - 2023

⁷ See NorthWestern Energy, 2023 Annual Report, at 6, 17 (March 2024), https://issuu.com/northwesternenergy/docs/annual_report_2023_final_for_web?fr=xKAE9_z U1NQ.

- 1 Figure 3 below provides a more detailed breakdown of NorthWestern's
- 2 Montana portfolio.
- 3

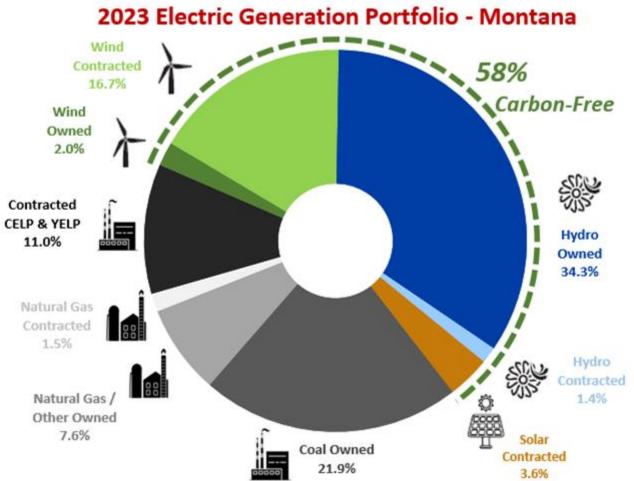


Figure 3: NorthWestern's Montana Electric Generation Portfolio⁸

Based on MWh's supplied from owned & long-term contracted resources.

Contracted energy from Colstrip Energy Limited Partners (CELP), Yellowstone Energy Limited Partners (YELP) as well as a majority of the contracted wind, hydro and solar are federally mandated Qualifying Facilities, as defined under the Public Utility Regulatory Policies Act of 1978 (PURPA).

⁸ 2023 Form 10-K - Page 12 <u>https://www.northwesternenergy.com/docs/default-source/default-document-library/about-us/investors/financials/form-10-k-2023.pdf</u>

Q. Please describe NorthWestern's Net-Zero by 2050 Vision and the role of
 YCGS in that vision.

3 Α. The Net-Zero by 2050 Vision reflects our commitment to achieve carbon 4 neutrality in our electric and natural gas operations by 2050.⁹ Reaching Net Zero requires a series of incremental steps and investments in energy 5 6 generation, infrastructure, technology, and sustainability practices. For 7 example, through investment in pipeline infrastructure and improved 8 compression and leak detection operations, NorthWestern will achieve 9 reductions in methane emissions. For electric generation, until longer 10 duration carbon-free resources are available and cost effective, we need 11 natural gas-fired generation. YCGS supports the variability of wind and solar 12 resources because it is dispatchable when the wind does not blow and the 13 sun does not shine. For instance, YCGS has 18 individual engines that can 14 ramp up and down to offset the variability that wind and solar experience. 15 Thus, YCGS is a great compliment to those two resources. In addition, 16 during extended weather events, we need resources that are available and 17 reliable to help serve customers during extended hours of peak demand. 18 Resources like YCGS provide reliable energy and protection from price 19 volatility in the market for customers.

20

21 We strive for a balanced energy supply portfolio. We are committed to 22 reducing the carbon intensity of our Montana energy portfolio by 90% by

⁹ See the Net Zero by 2050 Vision here: <u>https://www.northwesternenergy.com/clean-energy/net-zero-by-2050</u>.

1 2045. Nearly 60% of the energy produced by NorthWestern for Montana 2 comes from renewable and carbon-free sources, including hydro, wind, and 3 solar. This goal considers Montana's unique geography, terrain, weather, 4 and factors in the challenge we face in Montana of not having enough energy 5 available during peak demand times. We are committed to working with our 6 customers and communities and the State of Montana to help them achieve 7 their sustainability goals, determine the potential applications of new technology on our system, and develop an energy future that is affordable, 8 9 reliable, environmentally responsible, and capable of meeting the needs of all 10 customers. While sustainability is one of our pillars, we will not compromise 11 reliability of service to and affordability for our customers.

12

Q. You mentioned carbon intensity as only one aspect of sustainability.
What are other aspects of sustainability?

A. Sustainability means meeting today's needs while planning for tomorrow as
 well. Through our environmental programs, we find ways to protect and
 enhance rivers, streams, and habitats. When we consider the essential
 nature of the energy services, sustainability must also include a discussion of
 our financial health to ensure our ability to continue to provide critical energy
 service.

21

Q. Please explain the relationship between NorthWestern's financial health
 and sustainability.

A. A financially healthy utility drives lower costs for customers and encourages
 economic development. Utilities compete for capital to invest in critical
 infrastructure to meet the needs of customers, and financially healthy utilities
 attract more capital at a lower cost for their customers. It is simple supply and
 demand economics. Thus, the financial health of the Company has a direct
 impact on customers. Ms. Lail speaks more to the importance of financial
 health to the Company in her testimony.

8

9 Q. How does your relationship with your customers impact the utility?

10 Α. Our role is to ensure our customers receive safe, reliable, and affordable 11 energy solutions. Our customers are vital to our success. We are attentive to 12 our customers' needs and treat our customers with respect. We continue to 13 invest in solutions that strive to be attentive to those customers' needs such 14 as our Advance Metering Infrastructure ("AMI") program. Ms. Schroeppel 15 discusses our efforts related to customer satisfaction and customer 16 experience. Ms. Schroeppel, Mr. Merkel, Ms. Fang, and Jonathan Shafer 17 provide additional testimony on our AMI program.

1 Q. What additional services does NorthWestern provide customers and our 2 communities?

3 Α. We recognize that our role in our communities is more than just as an energy 4 service provider. Our success is tied to the success of each and every one of 5 our communities. We aim to be a good corporate citizen through the 6 contribution of our time, talent, and resources to help our communities fulfill 7 their vision of success.

8

9 NorthWestern is by far Montana's largest infrastructure provider.

10 NorthWestern commissions an annual economic impact analysis by Circle

Analytics,¹⁰ a Montana-based consultant. The analysis quantifies the 11

12 financial impact NorthWestern makes in the states and communities it serves.

13 The study found NorthWestern has a significant impact on the financial well-

14 being of Montana. Through our investments and services, we provide 17,698

good-paying jobs for others and have an annual \$2.2 billion impact on gross 15

17

16

18 Every day, our electric and natural gas personnel in the field interact with our customers to restore service or add new services to our communities. Our 19 20 customer service employees help customers with any questions or complaints they may have regarding that service. These customer service personnel are

21

economic output in Montana.

¹⁰ About Us – Circle Analytics.

1		located at our call centers and at our service centers at our larger locations
2		scattered throughout Montana.
3		
4		NorthWestern is an active partner in each of the communities we serve. With
5		nearly 1,269 Montana employees, we are one of the largest employers in the
6		state, and many of our employees are very active in their communities, which
7		includes community giving of over a \$5 million a year over the past five years
8		(2019-2023).
9		
10		Rate Review and Introduction of Witnesses
11	Q.	Please provide a summary of what NorthWestern proposes in this rate
12		review.
13	Α.	We propose to achieve base cost recovery with a test year revenue
14		requirement, appropriate known and measurable adjustments, and a fair
15		Return on Equity ("ROE") on our investments. We also seek timely interim
16		rates to provide more timely relief for the increased cost of service reflected in
17		this rate review at no risk to Montana customers.
18		
19		We ask that the Commission approve cost recovery for the YCGS, which is
20		expected to be in service in July/August of 2024. In addition, NorthWestern
21		asks the Commission to approve NorthWestern's proposal for a bridge rate to
22		ensure there is no gap in cost recovery for YCGS which will be providing
23		customers with safe and reliable energy.

1	Wildfire Mitigation, Business Technology, and Reliability continue to be critical
2	operational issues for NorthWestern. We propose new balancing accounts
3	for the timely recovery of incremental costs between rate reviews for
4	investments in these areas
5	
6	NorthWestern proposes a standby charge for non-residential electric
7	customers installing behind-the-meter generation to limit the cost shift of grid
8	and reliability service to other customers.
9	
10	We present witnesses that address the various compliance requirements and
11	approvals issued by the Commission from our prior rate review in Final Order
12	No. 7860y, which includes:
13	an analysis of the expected benefits of AMI compared to the stranded
14	costs for existing metering infrastructure; ¹¹
15	a comprehensive jurisdictional cost of service study to include all costs
16	associated with providing wholesale services;12 and
17	 the request for recovery of deferred accounting balances.¹³
18	
19	NorthWestern presents witnesses who discuss each of these proposals in
20	greater detail and I introduce those witnesses below.
21	

¹¹ Final Order No. 7860y, ¶ 336, Docket No. 2022.07.078 (2023).
¹² Id. at ¶ 32.
¹³ Id. at ¶¶ 272 and 318.

1 Q. Please identify the additional witnesses testifying on behalf of

2

NorthWestern in this proceeding.

A. The following are the NorthWestern experts who provide further details
 supporting proposals in this rate review, listed by key functional areas.

5

6 **Generation:** For electricity generation, NorthWestern generates or contracts 7 for power using hydroelectric dam facilities, wind turbines, solar panels, 8 natural gas generators, and coal-powered generators. If NorthWestern does 9 not generate enough energy to meet our customers' needs and is unable to 10 procure sufficient long-term contracts, then electricity must be bought on the 11 market. Natural gas is produced from formations underground. Most natural 12 gas used by NorthWestern comes from Wyoming or Canada. It is produced 13 and transported via pipeline to NorthWestern-owned facilities.

John D. Hines provides the overview and policy direction for
NorthWestern's generation investments to continue to meet customers'
energy and capacity needs in an ever-changing market which includes
YCGS.

 Bleau J. LaFave describes NorthWestern's activities to continue to manage its generation portfolio to meet our customers' energy needs and presents the need and selection process for YCGS..
 Mr. LaFave is supported by the following witnesses to present the prudence of NorthWestern's decision to build and procure YCGS, which is expected to be in service July/August of 2024.

1	Scott A. Leigh of Aion Energy LLC provides testimony on
2	NorthWestern's Request for Proposals ("RFP") process
3	that selected YCGS;
4	 Arne Olson of Energy + Environmental Economics Inc.
5	(E3) provides testimony on the Effective Load Carrying
6	Capability study that supported the RFP modeling; and
7	Michael S. Babineaux provides testimony regarding
8	NorthWestern's RFP modeling.
9	 Joseph M. Stimatz presents an update to NorthWestern's Power
10	Costs and Credits Adjustment Mechanism ("PCCAM") Base, which
11	reflects the impact of YCGS, provides an update on NorthWestern's
12	activities in regional markets, and presents the Ancillary Service
13	component of the Jurisdictional Cost of Service Study.
14	Eugene L. Shlatz of Green Mountain Solutions provides testimony
15	supporting NorthWestern's Ancillary Service component of the
16	Jurisdictional Cost of Service Study.
17	
18	Transmission: For electricity service, power is generated at the source and
19	moved through generation step-up transformers after which it is delivered to
20	the transmission system. The transmission system is designed to carry large
21	quantities of electricity at high voltages. The power is transmitted through the
22	transmission system to substations where it is delivered to other portions of
23	the transmission system, large transmission level customers, or to

substations in each community that then connect to the distribution system
that delivers the power to homes and businesses. For natural gas service,
transmission consists of a series of large underground pipes that carry
purchased, produced, or stored natural gas to large customers on the
transmission system or to city gate stations in each community that then
connect to the distribution system that delivers the natural gas to homes and
businesses.

Michael R. Cashell provides the overview and policy direction for
 NorthWestern's transmission initiatives to ensure safe and reliable
 services for our customers and discusses major projects on the electric
 and natural gas transmission systems.

- Michael S. McGowan presents NorthWestern's Line Loss Studies
 related to Electric Transmission and Distribution.
- 14

Distribution: For electricity service, distribution consists of the power poles and lines or underground lines from substations to your home. The voltage of the power is reduced repeatedly until it can go into your home. NorthWestern is responsible for the distribution up to each customer's meter. For natural gas service, distribution covers the smaller diameter pipes that carry natural gas from city gate stations to your home. These distribution pipes carry the natural gas right up to the meter on your home or business.

Jason C. Merkel provides the overview and policy direction for
 NorthWestern's distribution investments which includes

1	NorthWestern's Wildfire Mitigation Plan, a discussion of the operational
2	benefits of NorthWestern's Advanced Metering Infrastructure project,
3	and an update to NorthWestern's work related to the acquisition of
4	Sleepy Hollow.
5	Gregory F. Bailly provides an update on activities related to
6	NorthWestern's incremental wildfire mitigation activities to date.
7	Brandi L. Hellwinkel presents NorthWestern's updated Wildfire
8	Mitigation Plan.
9	 Jonathan R. Shafer presents NorthWestern's analysis of the
10	expected benefits of AMI compared to the stranded costs for
11	existing metering infrastructure.
12	
13	Business Technology: Our Business Technology ("BT") group provides a
14	critical support services so utility operations can provide safe and reliable
15	service. The cyber security team within the BT group ensures our network
16	and customers remain as digitally secure as possible in an environment
17	where essential data and operations face constant threat. NorthWestern
18	uses the term Business Technology or BT in lieu of "IT" due to the partnership
19	and integration with business strategy and objectives.
20	\circ $$ Jeanne M. Vold provides the overview and policy direction for
21	NorthWestern's BT initiatives and describes the critical role they play in
22	enabling NorthWestern's ability to provide customers with safe and
23	reliable energy service and describes the changes occurring in the

1	technology space that form the basis for NorthWestern's proposal for
2	alternative cost recovery mechanisms for certain BT costs.
3	
4	Customer Care: Our engagement with our customers involves more than
5	just the energy services we provide – it includes the support services we offer
6	for our customers, the way we communicate, and our involvement in the
7	community.
8	 Bobbi L. Schroeppel provides testimony on the work NorthWestern
9	continues to do to engage with our customers including a discussion of
10	the customer benefits of NorthWestern's AMI program.
11	
12	Finance: Finance plays the critical role of ensuring sufficient funding and
12 13	Finance: Finance plays the critical role of ensuring sufficient funding and access to capital that are necessary to enable our operation departments to
13	access to capital that are necessary to enable our operation departments to
13 14	access to capital that are necessary to enable our operation departments to provide safe and reliable service for our customers given our regulatory
13 14 15	access to capital that are necessary to enable our operation departments to provide safe and reliable service for our customers given our regulatory environment.
13 14 15 16	 access to capital that are necessary to enable our operation departments to provide safe and reliable service for our customers given our regulatory environment. Crystal D. Lail presents the Company's capital structure and proposed
 13 14 15 16 17 	 access to capital that are necessary to enable our operation departments to provide safe and reliable service for our customers given our regulatory environment. Crystal D. Lail presents the Company's capital structure and proposed rate of return. She describes what is needed to be a financially healthy
 13 14 15 16 17 18 	 access to capital that are necessary to enable our operation departments to provide safe and reliable service for our customers given our regulatory environment. Crystal D. Lail presents the Company's capital structure and proposed rate of return. She describes what is needed to be a financially healthy utility and how the Company's financial health is critical to our ability to
 13 14 15 16 17 18 19 	 access to capital that are necessary to enable our operation departments to provide safe and reliable service for our customers given our regulatory environment. Crystal D. Lail presents the Company's capital structure and proposed rate of return. She describes what is needed to be a financially healthy utility and how the Company's financial health is critical to our ability to serve our customers in an affordable manner and presents

1	 Jeffrey B. Berzina presents NorthWestern's proposed updated rate
2	base for electric and natural gas based on a 2023 test year and
3	known and measurable 2024 adjustments. He presents
4	NorthWestern's proposal to recover balances associated with
5	deferred accounting approved in the prior rate review ¹⁴ and
6	presents NorthWestern's proposal to capitalize certain Business
7	Technology costs.
8	 Consultant Adrien M. McKenzie presents NorthWestern's updated
9	ROE analysis.
10	 Consultant John J. Spanos presents NorthWestern's updated
11	Depreciation Study.
12	Elaine A. Rich presents NorthWestern's updated proposed revenue
13	requirement for both electric and natural gas based on a 2023 test
14	year and known and measurable 2024 adjustments.
15	Aaron J. Bjorkman presents the updated tax information related to
16	NorthWestern's rate review.
17	
18	Regulatory: As a Montana regulated utility, NorthWestern's Rate Review
10	
19	must comply with the laws and rules established by the State and the
20	Commission, respectively. In instances where existing rules may be limiting
21	our ability to effectively serve our customers, NorthWestern has put forth

¹⁴ Final Order No. 7860y, ¶¶ 272 and 318, Docket No. 2022.07.078 (2023).

1	proposals that seek to work with the Commission to find a solution to ensure
2	we continue to meet our customers' needs.
3	 Cynthia S. Fang presents NorthWestern's regulatory proposals to
4	ensure that the prices customers pay better align with the value of the
5	services they receive. Specifically, Ms. Fang presents the following
6	proposals:
7	Cost Recovery for YCGS to better reflect the value customers will
8	receive which includes:
9	 NorthWestern Bridge Rate Proposal; and
10	 NorthWestern proposal for end of the period rate base
11	treatment for YCGS.
12	New Balancing Accounts to reduce the lag in cost recovery of
13	prudently incurred costs in between rate reviews for three critical
14	service areas:
15	 Wildfire Management Balancing Account;
16	 Business Technology Balancing Account; and
17	 Reliability Compliance Balancing Account.
18	 NorthWestern's proposal to maintain deferred accounting treatment
19	for small natural gas production acquisitions.
20	 NorthWestern's request to initiate a rulemaking to amend
21	Administrative Rules ("ARM") 38.5.1405 and 38.5.1405 and
22	approve NorthWestern's request for relief in the interim pending a
23	full examination of the issue in a rulemaking process.

1In addition, Ms. Fang presents NorthWestern's rate design priorities2which include NorthWestern's proposed moderation to updated3Revenue Allocations and Rate Design for the recovery of base costs4and the development of base rates, and moderation to the allocation of5property taxes among customer classes. She also discusses the6potential for meaningful rate options for customers enabled by the7implementation of AMI, and the need for a standby charge.

- Glenda J. Gibson presents Cost of Service Studies for both electric
 and natural gas that provide the foundation for cost-based revenue
 allocations and rate design. Ms. Gibson also presents the results
 of the Electric Jurisdictional Cost Study and NorthWestern's
 Lead/Lag Studies. In addition, Ms. Gibson presents NorthWestern's
 updated PCCAM and property tax base rates.
- Charles R. Lane presents NorthWestern's updated base rates and
 total rates for electric and natural gas as well as the bill impacts for
 electric and natural gas customers.
- Steve Wishart of Concentric presents testimony to support
 NorthWestern's proposed standby charge to limit the cost shift from
 installation of behind-the-meter generation of non-residential
 customers to other customers.

1 Q. Does this complete your direct testimony?

- 2 **A.** Yes, it does.
- 3

4

Verification

This Direct Testimony of Brian B. Bird is true and accurate to the best of my knowledge, information, and belief.

/s/ Brian B. Bird Brian B. Bird