

**BEFORE
THE PUBLIC UTILITIES COMMISSION OF OHIO**

In the Matter of the Application of Duke)	
Energy Ohio, Inc., for Approval of its 2024)	Case No. 24-0045-EL-POR
-2026 Energy Efficiency and Demand Side)	
Management Portfolio of Programs and)	
Cost Recovery Mechanism.)	

In the Matter of the Application of Duke)	Case No. 24-0046-EL-ATA
Energy Ohio, Inc., for Approval of Tariff)	
Amendments)	

DIRECT TESTIMONY OF

TRISHA A. HAEMMERLE

ON BEHALF OF

DUKE ENERGY OHIO, INC.

January 22, 2024

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I. INTRODUCTION AND PURPOSE OF TESTIMONY

1 **Q. PLEASE STATE YOUR NAME AND BUSINESS ADDRESS.**

2 A. My name is Trisha A. Haemmerle. My business address is 139 East Fourth Street,
3 Cincinnati, Ohio 45202.

4 **Q. BY WHOM ARE YOU EMPLOYED AND IN WHAT CAPACITY?**

5 A. I am employed by Duke Energy Business Services, LLC (DEBS), as Lead Manager,
6 Strategy and Collaboration. DEBS provides various administrative and other
7 services to Duke Energy Ohio, Inc., (Duke Energy Ohio or the Company) and other
8 affiliated companies of Duke Energy Corporation (Duke Energy).

9 **Q. PLEASE SUMMARIZE YOUR EDUCATION AND PROFESSIONAL**
10 **QUALIFICATIONS.**

11 A. I graduated from Ohio University with a bachelor's degree in Marketing. I started
12 my career with Cinergy in 1997. I worked for Cinergy and Duke Energy from 1997
13 to 2010 developing, managing, and analyzing survey activities, as well as market
14 research projects. Starting in 2009, I also managed the coordination of verification
15 for the Energy Efficiency (EE) and Demand Side Management (DSM) programs. I
16 assumed my current position in 2010.

17 **Q. HAVE YOU PREVIOUSLY TESTIFIED BEFORE THE PUBLIC**
18 **UTILITIES COMMISSION OF OHIO?**

19 A. Yes, I submitted testimony in support of Duke Energy Ohio's application for recovery
20 of program costs, lost distribution revenue and performance incentives related to its EE
21 and DSM programs, Case Nos. 14-457-EL-RDR, 15-534-EL-RDR, 16-0664-EL-
22 RDR, 17-781-EL-RDR, 18-397-EL-RDR, 19-622-EL-RDR, 20-613-EL-RDR, and
23 21-482-EL-RDR.

1 **Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY IN THIS**
2 **PROCEEDING?**

3 A. The purpose of my testimony is to describe Duke Energy Ohio's proposed new
4 portfolio of EE and DSM programs to offer its residential and non-residential
5 customers beginning in 2024 through 2026 and the associated request for regulatory
6 recovery. My testimony will explain how the Company's proposed EE and DSM
7 programs benefit all customers in the Company's service area, how the proposed
8 programs serve needs unmet by the current competitive market, and how customers
9 have grown to expect such programs over the past nearly thirty years. My testimony
10 will also provide an overview of Evaluation, Measurement and Verification
11 (EM&V) that will be conducted for the portfolio's programs; introduce our current
12 independent third-party evaluators and explain how they were selected; and provide
13 the projected cost-effectiveness results for Duke Energy Ohio's proposed 2024 -
14 2026 portfolio. Finally, my testimony will describe the Company's proposed
15 mechanism for cost recovery and explain why such recovery is appropriate and
16 necessary.

II. OVERVIEW OF THE PROPOSED PORTFOLIO PLAN

17 **Q. WHAT ARE THE ELEMENTS OF DUKE ENERGY OHIO'S PROPOSED**
18 **PORTFOLIO PLAN FILING?**

19 A. There are two main components of Duke Energy Ohio's application. First, Duke
20 Energy Ohio is filing its program portfolio plan of eight proposed residential and
21 non-residential EE, Demand Response (DR) and DSM programs. The programs are

1 described in detail in the testimony of Company witnesses Rick Mifflin, Joy Zins,
2 and Stacy Phillips.

3 The second element of the Company's Portfolio Plan is the Company's
4 proposed cost recovery mechanism: the restoration of a previously used rider, titled
5 Rider DSM. Rider DSM will allow the Company to (1) recover its program costs;
6 (2) certain lost distribution revenues, as detailed in the testimony of Company
7 witness James Ziolkowski; and (3) an after-tax Joint Benefit Recognition
8 Mechanism (JBRM), that, for the limited purpose of this portfolio, will be based on
9 9.5% of the system benefits associated with the total avoided costs resulting from
10 the transmission and distribution savings from customer participation in the
11 Company's portfolio of approved programs.

12 The total of nearly \$68 million in avoided transmission and distribution costs
13 that the Company is proposing to use for purposes of the JBRM calculation, for the
14 three years of the portfolio, comprises about a third of the total avoided costs of the
15 proposed programs of about \$191 million. At this time, the Company is not
16 requesting to recover lost distribution revenues via Rider DSM from any customers
17 that are subject to the Company's decoupling rider, Distribution Decoupling Rider
18 (Rider DDR), which was approved, in Case Nos. 17-1263-EL-SSO, *et al.*, to
19 continue through the end of the Company's current Electric Security Plan. However,
20 in the case that a change in rate design or elimination of the Company's Rider DDR
21 should occur, Duke Energy Ohio requests the ability to adjust Rider DSM to ensure
22 that it continues to be made whole for the lost distribution revenues, *i.e.*, the negative
23 financial impact EE and DSM will have in the absence of Rider DDR.

1 **Q. HOW DO THE COMPANY’S PROPOSED EE AND DSM PROGRAMS**
2 **DIFFER FROM OFFERINGS ALREADY AVAILABLE IN THE**
3 **COMPETITIVE MARKET?**

4 A. First, electric distribution utilities are uniquely qualified and in the best position to
5 systematically capture efficiency gains in the use of electricity and maximize those
6 gains for the benefit of all customers. Duke Energy Ohio has a long history of
7 delivering cost effective EE and DSM programs to its customers since 1992 and
8 thereby becoming customers’ source for EE and DSM. Duke Energy Ohio
9 understands changes in customer preferences and EE advancements in new
10 measures, technologies and program designs that will allow the Company to
11 continue to design new and innovative program offerings.

12 Second, residential customers are often overlooked in the competitive EE
13 marketplace because their individual energy savings are relatively small in
14 comparison to the magnitude of energy savings that can be realized from larger non-
15 residential customers, which have long been the target market for Energy Service
16 Companies. While there was speculation that residential customer needs for EE and
17 DSM Programs would be met by the market, specifically Certified Retail Electric
18 Service Providers, after utility EE programs were discontinued after the enactment
19 of Ohio House Bill 6, the Company is not aware of any substantive EE or DSM
20 offers or activities designed to assist customers, after nearly three years of
21 discontinued EE and DSM programs by Duke Energy Ohio. Furthermore, Certified
22 Retail Electric Service Providers, often lack the knowledge, engagement, expertise
23 and in many cases the necessary capital to pursue EE measures that are potentially

1 available. Program participation from the Company's proposed EE and DSM
2 programs can provide insight into other conservation measures and offerings the
3 customer may be eligible for through current and future offerings and continuously
4 provide opportunities to save energy for the customers.

5 Third, customers face economic challenges under the present economic
6 climate that make it essential to provide energy efficiency incentives that will allow
7 customers to install higher efficient equipment and/or incentivize behavior that will
8 help save energy and minimize energy costs where possible.

9 Fourth, all customers within Duke Energy Ohio's service territory, not only
10 program participants, benefit when the Company's overall load is reduced or load
11 from peak times is shifted because this translates into the suppression of market
12 prices for energy and capacity.

13 Fifth, EE measures reduce the Company's need to purchase capacity, which
14 benefits all customers. As it has done in the past, Duke Energy Ohio plans to
15 continue exploring offerings for the current planning year EE resources that qualify
16 for the PJM capacity auction. Only resources that appear to be cost effective relative
17 to the required incremental costs of EM&V and auction administration will be
18 offered. The auction proceeds will be reflected in the net benefit realized by
19 customers in the form of a credit or reduction in program costs.

20 Finally, Duke Energy Ohio customers have come to expect and rely on these
21 programs. The Company (or a predecessor) has been providing such programs to
22 customers, with Public Utilities of Ohio Commission (Commission) approval, since
23 1992, or sixteen years before any statutory obligation to do so existed. The

1 Company's EE and DSM programs have helped customers save energy, manage
2 bills, and become more sustainable for over a decade and it is in customers' and the
3 state of Ohio's best interest for the Company to offer programs that can continue to
4 deliver savings and benefits to its customers.

5 **Q. HOW WILL EE AND DSM PROGRAMS BENEFIT NON-PARTICIPANT**
6 **CUSTOMERS?**

7 A. The Company's programs will benefit both program participants and non-
8 participants as well as the Company's customers generally. Not only do program
9 participants reduce their energy costs, but the programs also provide energy and
10 capacity benefits which will benefit the entire system, including non-participating
11 customers. Reductions in energy demand reduces rates by enabling the Company
12 to avoid additional capital expenditures associated with meeting higher load on the
13 grid, such as new substations, transformers, and power lines which may lead to
14 market price suppression over time. Finally, reducing load reduces emissions
15 associated with generating electricity, which generates environmental benefits for
16 everyone in the Company's service territory.

17 **Q. WHY IS THE COMPANY PROPOSING AN EE, DR, AND DSM**
18 **PORTFOLIO?**

19 A. EE and DSM programs are a necessity for customers, both to help them manage and
20 reduce their electric bills and to minimize unnecessary use and waste of energy and
21 resources. And specifically, EE in the residential sphere depends on an overall
22 awareness and establishing good habits that are built gradually over time. Thus, the
23 Company is proposing a portfolio that, at an extremely low cost, will allow the

1 participation of the vast majority of its electric residential customers. Furthermore,
2 the proposed programs drive market participation, with the EE programs driving the
3 installation of measures selected by customers. As for the Power Manager®
4 program, it provides customers an opportunity to receive bill credits that reduce
5 overall energy costs and primarily use equipment that has already been installed and
6 will provide bill credits directly to customers who have come to expect them. And
7 with the inclusion of smart thermostats, customers have a choice on their
8 participation preference.

9 **Q. HOW WILL THE COMPANY ASSESS THE PORTFOLIO**
10 **PERFORMANCE?**

11 A. The Company will consider the portfolio successful if the participating customers
12 realize efficiency savings and lower energy bills. In order to provide transparency
13 around the on-going performance of the portfolio, the Company will take additional
14 actions beyond its comprehensive annual rider reconciliation filing associated with
15 the portfolio. First, the Company will take actions to continue to engage its
16 Community Partnership Collaborative (EE Collaborative) on a quarterly basis,
17 following the approval of the proposed EE portfolio, to keep interested stakeholders
18 informed regarding ongoing program performance and garner input regarding
19 potential programmatic enhancements in the current and any new potential
20 programs. Second, the Company will provide a mid-year performance update
21 review with the EE Collaborative, that will provide actual performance details for

1 the first six months of the approval program portfolio and will include customer
2 participation, kWh savings and kW reduction achieved and program expenditures.

3 **Q. AT A SUMMARY LEVEL, PLEASE DESCRIBE THE PORTFOLIO OF**
4 **PROGRAMS THAT THE COMPANY IS PROPOSING IN THIS**
5 **APPLICATION.**

6 A. In its application, Duke Energy Ohio is proposing a portfolio of programs to be
7 offered to its customers beginning sometime in 2024 through 2026 that is tailored
8 towards residential and non-residential customers comprised of eight programs, as
9 listed in Table 1. Collectively, projected participants in these programs would
10 comprise over half of the Company's residential customers. The Company proposes
11 an average annual budget of about \$25,000,000 for the program costs of eight
12 programs and also proposes a 9.5% after-tax Joint Benefit Recognition Mechanism
13 based on the system benefits that only account for the transmission and distribution
14 costs avoided as a result of the programs in the portfolio, as detailed below and in
15 the other testimonies. The amount of the Joint Benefit Recognition Mechanism
16 associated with this portfolio is projected to be an average annual incentive of about
17 \$2,750,000.

Table 1
All Programs
Residential Smart Saver® Residential Energy Assessments Energy Efficiency for Schools Home Energy Report (HER) Neighborhood Energy Saver Power Manager® Business Energy Saver PowerShare®

1 **Q. HOW DOES THIS PORTFOLIO COMPARE TO THE MOST RECENT**
2 **PREVIOUSLY APPROVED PORTFOLIO?**

3 A. First, the proposed portfolio is much leaner and more narrowly focused on meeting
4 needs that cannot be met by the market. The Company has offered the eight
5 requested programs for years prior to being discontinued and customers have relied
6 on Duke Energy Ohio to be a trusted source and an industry leader in EE and DSM.
7 For comparison, the approved budget by the Company in 2020 was \$46,895,800,
8 about twice the current proposed annual budget.
9 Second, the Joint Benefit Recognition Mechanism that is being proposed is
10 specifically focused on the benefits that are realized by the utility system, which
11 provides benefit to both participating and non-participating customers. The
12 mechanism motivates the Company to maximize the avoided transmission and
13 distribution costs that are realized by all customers from the portfolio of programs.
14 Over 90% of joint transmission and distribution benefits are realized by customers
15 with less than 10% retained by Duke Energy Ohio. While there are additional
16 system benefits realized associated with avoided energy and capacity, the Joint
17 Benefit Recognition Mechanism only considers the system benefits of avoided
18 transmission and distribution costs that are realized by all Duke Energy Ohio
19 customers regardless of generation service provider.

20 **Q. WHY IS THE JOINT BENEFIT RECOGNITION MECHANISM**
21 **APPROPRIATE AND NECESSARY?**

22 A. The proposed portfolio of programs offered all meet a need that cannot otherwise be
23 met through market-based approaches. First, the proposed income qualified

1 program helps customers who represent a customer base underserved by the market
2 due to their relative lack of purchasing power, among other things. Income qualified
3 customers benefit from EE and the resulting savings that will be realized on their
4 bills.

5 Second, the Power Manager[®] program has been a successful program for many
6 years. With over 45,000 load controlling devices already installed on residential air
7 conditioning units, resuming this program is a low-cost benefit to customers. The
8 customers receive a monthly credit for allowing the Company to enable the
9 customer's air conditioner to be cycled off and on during a Power Manager[®] event.

10 Another way to participate in the program would be the Bring Your Own Thermostat
11 which leverages customers two-way communicating thermostats instead of
12 traditional load control switches that are installed by the utility. It is intended for
13 customers who have already purchased, installed, and registered a smart thermostat
14 in their home, allowing the utility to avoid the hardware and installation costs
15 associated with traditional direct load control programs. The capacity performance
16 achieved through Power Manager[®] is bid into the PJM auctions which helps offset
17 the cost of the program. Because this program utilizes devices that are *already* in
18 the field and customer owned smart thermostats, its benefits could not be efficiently
19 replicated via a market-based approach.

20 Third, the Residential Smart Saver[®] program offers customers a variety of energy
21 conservation measures designed to increase energy efficiency in their homes. The

1 program provides discounts and rebates for purchasing energy efficient measures
2 and reaches property managers to help make the properties more efficient.

3 Fourth, the Residential Energy Assessments allow customers to have an audit of
4 their home and receive a report on ways to save energy and measures that can be
5 immediately installed in the home.

6 Fifth, the Energy Efficiency Education for Schools Program teaches K-8 public and
7 private school students the importance of conservation and energy efficiency. The
8 program gives them the tools to perform an energy efficiency audit on their home
9 and install efficient measures.

10 Sixth, the Home Energy report (HER) program is a low-cost wide-reaching program
11 designed to educate, engage, and empower customers to become more energy
12 efficient and save energy, resulting in lower energy bills. A periodic engaging report
13 that compares a customer's energy use to similar and energy efficient residences in
14 the same geographical area based upon the age, size and heating source of the home
15 is sent to over 350,000 residential customers. The reports then empower the
16 customers to become more efficient by providing them with targeted actionable EE
17 recommendations as well as inform them of efficiency actions they may elect to take
18 through efficiency opportunities provided in the competitive market. Duke Energy
19 Ohio is in a unique position to offer customers HER, because of the long-standing
20 relationship it has with customers through providing electric bills and distribution
21 service. This relationship creates a unique level of trust which is critical in the
22 engagement of customers around energy usage and the program's effectiveness and
23 cannot be replicated in the market.

1 Seventh, the Business Energy Saver program reaches a niche group of customers
2 and allows for the assessment and reduced cost of installing energy efficiency
3 measures for small businesses.

4 And lastly, PowerShare[®] offers non-residential customers incentives for reducing
5 energy use during peak demand periods. It's a fast, clean, and cost-efficient way to
6 meet peak energy demand, and it helps increase the reliability of the power system
7 and keep energy rates low for all customers.

8 **Q. IS THE JOINT BENEFIT RECOGNITION MECHANISM A REASONABLE**
9 **INCENTIVE FOR THE PORTFOLIO?**

10 A. Yes. First, the Joint Benefit Recognition Mechanism only reflects a small portion
11 (9.5%, after tax) of the system benefits associated with transmission and distribution
12 costs avoided as a result of the programs. Thus, it is narrowly tailored to ensure that
13 retail electric service is “efficient”¹ and “reasonably priced”² and reflects the
14 benefits only associated with the transmission and distribution system that directly
15 benefits all customers. Second, by permitting the Company to offer programs that
16 serve needs that are otherwise not met through market-based approaches, the Joint
17 Benefit Recognition Mechanism “provide[s a] coherent, transparent means of giving
18 appropriate incentives to technologies that can adapt successfully to potential
19 environmental mandates.”³ And finally, by permitting the Company to offer a low-

¹ O.R.C. 4928.02(A).

² *Id.*

³ O.R.C. 4928.02(J).

1 income program, the Joint Benefit Recognition Mechanism allows the Company to
2 further the policy of “[p]rotect[ing] at-risk populations.”⁴

3 **Q. DOES THE PROPOSED PORTFOLIO INCLUDE ANY PROGRAMS**
4 **ASSOCIATED WITH SMART GRID OR TRANSMISSION AND**
5 **DISTRIBUTION?**

6 A. No, the proposed portfolio only reflects programs that target energy and capacity
7 savings associated with EE and DSM that are behind the meter measures and are
8 directly tied to participating customers.

9 **Q. HAS THE COMPANY SOLICITED INPUT FROM STAKEHOLDERS**
10 **REGARDING POTENTIAL PORTFOLIO MODIFICATIONS?**

11 A. Yes. Duke Energy Ohio solicited feedback and program suggestions from
12 stakeholders as part of its EE Collaborative meetings on March 8 and October 26,
13 2023. The last EE Collaborative meeting on October 26, 2023, specifically discussed
14 this application and the proposed portfolio of programs. The Company will continue
15 to engage the EE Collaborative as the application progresses and with program
16 approval, request input and engagement on any new program designs, measures, and
17 feedback on the portfolio of programs offered.

18 **Q. PLEASE DISCUSS THE ROLE OF THE DUKE ENERGY OHIO EE**
19 **COLLABORATIVE AS IT RELATES TO THE OPERATION OF THE**
20 **COMPANY’S PROPOSED PORTFOLIO OF PROGRAMS.**

21 A. The Duke Energy Ohio EE Collaborative comprises interested parties and
22 stakeholders. Regular participants include People Working Cooperatively, Natural

⁴ O.R.C. 4928.02(L).

1 Resource Defense Council, Ohio Partners for Affordable Energy, multiple
2 environmental groups, and the Commission's Staff. The EE Collaborative has a
3 long and successful history with EE and DSM in Ohio.

4 Duke Energy Ohio currently engages with the EE Collaborative to review
5 proposed programs for its portfolio. This allows the Company to obtain input on
6 new program measures and gives the Company an opportunity to hear about market
7 conditions and technology developments, and innovations in efficiency measures.

8 Duke Energy Ohio looks forward to continuing to work with the EE
9 Collaborative to create a transparent EE and DSM process and to realize the benefits
10 of input from the diverse perspectives of the group.

11 **Q. PLEASE DESCRIBE THE RECOVERY MECHANISM AND INCENTIVE**
12 **THAT THE COMPANY IS PROPOSING FOR THE PORTFOLIO OF**
13 **PROGRAMS PROPOSED IN THIS APPLICATION.**

14 A. Duke Energy Ohio is proposing to restore a previously used rider, Rider DSM, under
15 which the Company would recover the following:

- 16 1. The recovery of the actual costs incurred by Duke Energy Ohio to deliver
17 the approved portfolio of EE and DSM programs. EM&V costs would also
18 be included in the event Duke Energy Ohio needs to contract vendors to
19 evaluate the programs. The testimony of Company witness James (Jim) E.
20 Ziolkowski explains how the calculation of such costs will include a credit
21 for auction proceeds obtained from offering qualifying EE resources in the
22 PJM Capacity Auction.

- 1 2. A Joint Benefit Recognition Mechanism of 9.5% after-tax, calculated to
2 reflect only the system benefits associated with the avoided transmission and
3 distribution costs resulting from customer participation in the Company's
4 program portfolio.
- 5 3. Lost distribution revenues unaccounted for by other mechanisms, as detailed
6 in the testimony of Jim Ziolkowski.
- 7 4. Finally, in order to alleviate potential concerns associated with the cost
8 associated with the portfolio, the Company commits that the total amount
9 that would be sought to be recovered from customers associated with the
10 portfolio will not exceed \$28.0 million annually and that the Company will
11 limit program participation if necessary to comply with this cap.

12 **Q. PLEASE EXPLAIN WHY RIDER RECOVERY IS APPROPRIATE AND**
13 **NECESSARY FOR EE AND DSM PROGRAMS.**

14 A. First, the EE marketplace is dynamic, with both customer needs and available
15 technologies varying year to year. The ability to review and adjust program design
16 and scope, as well as size, based on recent outcomes facilitates cost-effectiveness.
17 Incorporating EE programs into base rates means that adjustments can only occur in
18 base rate cases, which are often separated by several years, and therefore do not
19 provide the same ability to rapidly pivot to address constantly changing and meet
20 the most up-to-date customer needs.

21 Second, rider recovery is consistent with the Company's past practice in the
22 absence of statutory mandates. Prior to the enactment of the first statutory EE
23 mandate, State Senate Bill 221, the Company recovered costs of its EE programs

1 under Rider DSM.⁵ Accordingly, the Company proposes to once again use a Rider
2 DSM to recover cost and incentive associated with implementing EE and DSM
3 programs.

4 **Q. DOES THE COMPANY PLAN TO MAKE ANY CHANGES TO THE**
5 **PORTFOLIO DURING THE 2024 PROGRAM YEAR?**

6 A. No, the Company is not anticipating making any changes to the proposed portfolio
7 in 2024.

8 **Q. WHAT ADDITIONAL INFORMATION SUPPORTS DUKE ENERGY**
9 **OHIO'S REQUEST FOR APPROVAL OF ITS EE AND DSM PORTFOLIO**
10 **PLAN?**

11 A. As mentioned previously, Duke Energy Ohio witnesses Rick Mifflin, Joy Zins, and
12 Stacy Phillips will provide a description of the residential, non-residential, and
13 demand response programs, respectively, that are included in the Company's
14 portfolio. Finally, Duke Energy Ohio witness Jim Ziolkowski will discuss the
15 recovery of the proposed EE and DSM portfolio costs through Rider DSM, including
16 the timing of true-up filings.

III. EVALUATION, MEASUREMENT, AND VERIFICATION

17 **Q. PLEASE PROVIDE AN EXPLANATION OF EM&V.**

18 A. EM&V of EE and DSM programs involves documenting program benefits, or
19 impacts, and program effectiveness. Measurement and verification include data
20 collection, monitoring, and consumption analysis associated with the calculation of

⁵ *In the Matter of the Application for Recovery of Costs, Lost Margin, and Performance Incentive Associated with the Implementation of Electric Residential Demand Side Management Programs by The Cincinnati Gas & Electric Company*, Case No. 06-91-EL-UNC, *et al.*, Finding & Order, pp. 4-5 (July 11, 2007).

1 gross energy and demand savings from individual sites or projects and can be a
2 subset of program evaluation. EM&V will also seek to identify whether free-
3 ridership, spillover (participant and non-participant) and leakage have any impact
4 on the net savings calculation of the proposed portfolio.

5 **Q. WHY IS EM&V AN IMPORTANT COMPONENT OF EE AND DSM**
6 **PROGRAMS?**

7 A. Duke Energy Ohio believes that successful, reliable, and cost-effective EE and DSM
8 programs require EM&V activities for several reasons. First and foremost, reliably
9 measuring savings achieved from EE and DSM programs provides certainty for
10 resource planning and provides accountability to customers and shareholders.
11 Second, properly executed evaluation activities support program improvements and
12 enhancements. Accurately understanding savings estimates and program efficacy
13 enables Duke Energy Ohio to drive increased energy savings through improved
14 design, including insights on the targeting and marketing of specific programs to
15 improve overall participation and how to most cost-effectively generate kW and
16 kWh yield from our EE and DSM investments. Duke Energy Ohio will develop an
17 EM&V schedule for each program as needed by the time of program
18 implementation.

19 **Q. WHAT ARE THE COMPANY'S PROJECTIONS OF COST FOR EM&V?**

20 A. If Duke Energy Ohio is required to perform EM&V on the programs, the costs are
21 projected to be at or below 5 percent of program costs.

22 **Q. WHO ARE THE EVALUATORS FOR DUKE ENERGY OHIO?**

1 A. Most recently, Duke Energy Ohio contracted with three evaluators for its EE and
2 DSM process and impact evaluations for the 2017 – 2020 portfolio. The evaluators
3 were Guidehouse Inc. (previously Navigant), Opinion Dynamics Corp. and
4 Resource Innovations (previously Nexant Inc.). In the event Duke Energy Ohio is
5 required to perform EM&V on the proposed programs for, the most recent
6 evaluators would be considered for any future evaluations.

7 **Q. HOW WOULD DUKE ENERGY OHIO CHOOSE THE EVALUATORS?**

8 A. Duke Energy Ohio proposes to utilize the process by which it selected independent
9 third-party evaluators for its most recent previous portfolio. In 2014, Duke Energy
10 Ohio issued a request for proposals (RFP) to provide EM&V services for its EE and
11 DSM programs. The bidders were scored on project management skills, submitted
12 quality plans, experience, and consistency with industry standards and best
13 practices, among other criteria. The top scoring candidates, Navigant (at the time of
14 RFP), Opinion Dynamics Corp and Nexant (at the time of RFP) were then invited
15 to provide proposals, including cost projections, for each DSM program to be
16 evaluated. The evaluator for each program was selected based on the thoroughness
17 and quality of the proposal, cost, and experience in evaluating similar programs.
18 This comprehensive approach to selection has ensured competitive bidding, quality
19 control, and well-managed EM&V. This same process would be in place if Duke
20 Energy Ohio is required to employ evaluators to conduct EM&V.

IV. COST EFFECTIVENESS

21 **Q. IS THE COMPANY'S PROPOSED EE AND DSM PORTFOLIO COST-**
22 **EFFECTIVE?**

1 A. Yes. Duke Energy Ohio uses the same cost effectiveness tests as outlined in the
2 California Standard Practice Manual, which include the Participant Cost Test (PCT),
3 Utility Cost Test (UCT), the Total Resource Costs test (TRC), and the Ratepayer
4 Impact (RIM) Test for a comprehensive screening of energy efficiency measures.
5 Duke Energy Ohio's EE portfolio in this proposed portfolio is cost effective. In fact,
6 the Company's portfolio of programs is highly cost-effective, with an over-all
7 portfolio score of 2.91 for the Utility Cost Test, 2.76 for the Total Resource Cost
8 Test, 1.62 for the Rate Impact Measure Test and 5.48 for the Participant Cost Test.
9 These high scores indicate that the portfolio delivers over double the benefit to cost
10 ratio required to break-even under each of the different perspectives on cost
11 effectiveness. The program participants, the utility system, and even non-participant
12 customers will benefit greatly from Duke Energy Ohio offering the portfolio of
13 programs. Table 2 below provides cost effectiveness scores for each program and
14 the overall portfolio:

Table 2⁶

Program/Portfolio Cost Effectiveness - 2024-2026					
Program		UCT	TRC	RIM	PCT
Residential Programs					
Energy Efficiency Education for Schools		2.57	2.57	0.91	
Home Energy Report		4.07	4.07	1.25	
Neighborhood Energy Saver		0.71	0.71	0.47	
Residential Energy Assessments		3.73	5.99	3.73	
Residential Smart Saver®		2.29	2.03	0.70	18.29
Power Manager®		2.08	1.61	0.62	5.92
Total		2.92	3.00	1.19	12.12
Non-Residential Programs					
Business Energy Saver		3.38	3.62	3.38	
PowerShare®		2.56	2.01	2.13	2.61
Total		2.90	2.55	2.59	2.65
Overall Portfolio Total		2.91	2.76	1.62	5.48

1 **Q. HOW DID THE COMPANY DETERMINE COST-EFFECTIVENESS?**

2 A. The company utilized the DSMore™ model to determine the value of the Avoided
3 Costs of each measure and compared these benefits with the expected program costs,
4 including EM&V, to determine cost-effectiveness. The Commission and Duke
5 Energy’s stakeholders are familiar with DSMore™, as Duke Energy Ohio
6 previously relied on DSMore™ to evaluate its EE and DSM programs for over a
7 decade.

V. CONCLUSION

8 **Q. DOES THIS CONCLUDE YOUR TESTIMONY?**

9 A. Yes.

⁶ Programs without a Participant Test Score (PCT) are programs without participant costs, resulting in a null participant score.

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Summary: Testimony DIRECT TESTIMONY OF TRISHA A. HAEMMERLE ON
BEHALF OF DUKE ENERGY OHIO, INC. electronically filed by Ms. Carmen A.
Brown on behalf of Duke Energy Ohio, Inc. and D'Ascenzo, Rocco O. Mr. and
Vaysman, Larisa M. Ms. and Akhbari, Elyse H. Ms. and Kingery, Jeanne W. Ms..